



# SMART SOLUTION

YOUR ULTIMATE  
SOLUTION PARTNER



**ANNUAL REPORT 2020**

WHA CORPORATION PUBLIC COMPANY LIMITED







Work  
Life  
Solutions

**Premium Office**  
next to MEGA Bangna

**Gateway to the EEC**



completion by end 2020  
**02-719-9555**  
[www.wha-group.com](http://www.wha-group.com)  
[marketing@wha-group.com](mailto:marketing@wha-group.com)



ASIA PACIFIC  
PROPERTY  
AWARDS  
ARCHITECTURE

in association with



**AWARD WINNER**

COMMERCIAL HIGH RISE  
ARCHITECTURE THAILAND

WHA Bangna  
Business Complex  
by Palmer & Turner  
(Thailand) Ltd

2020-2021



## VISION

"Be recognized as a market leader in aligning vertical integrated logistics facilities provider, total solution industrial estates, utilities, power, and digital infrastructure platforms with high quality capturing throughout value chain in Asia".



## MISSION

- To fulfill requirements of key major business partners, shareholders and stakeholders
- To focus on innovative and effective strategy, business, finance, service quality, safety, environment, community, and good governance disciplines
- To create a last-long relationship with strategic alliance
- To provide unrivalled quality products with knowledge and expertise that lead to win-win solutions
- To maintain financial discipline to maximize return on equity
- To develop world class logistic facilities, industrial estates, utilities, power and property customer solutions
- To differentiate comprehensive platform for both infrastructure data center as well as customized service solutions for leading MNCs and Thai conglomerates
- To develop, engage talent and experience team to enhance organizational core competency



## WHA GROUP CORPORATE CULTURE



### ADVANCED

Lead initiatives and adjust to change circumstances to proactively create values to customer and stay advance in competitiveness.



### PARTNERSHIP

Build and maintain active partnerships and/ or network of contacts internally and externally to further the organization's goals.



### CHAMPION

Ensure strong achievement orientation and entrepreneurial by holding high expectations for oneself to achieve a higher levels and always seeking new business opportunities.



### INTEGRITY

Instill mutual trust and confidence, create a culture that fosters transparency and work ethics and demonstrates a sense of corporate responsibility.



### RESOURCEFUL

Ensure to create sound expertise and practical solutions to customer to strengthen an efficient and effective working with them.





# CONTENTS



## STRATEGIC PERFORMANCE OVERVIEW

• Performance Overview	2
• Our Locations	4
• Message From Chairman & Group CEO	6
• Group Shareholding Structure	10
• Logistics & Industrial Properties Business	14
• Industrial Development Business	16
• Utilities & Power Business	18
• Digital Platform Business	20



## CORPORATE INFORMATION

• Organization Chart	22
• Board of Directors	24
• Audit Committee and Executive and Committee	26
• Profiles of Directors, Executives and Company Secretary	27
• Major Developments	48
• Nature of Business Operation	54
• Risk Factors	86
• General and Other Material Information	97



## MANAGEMENT AND CORPORATE GOVERNANCE

• Capital Structure	108
• Dividend Policy	111
• Management Structure	112
• Corporate Governance	125
• Corporate Social Responsibilities : CSR	144
• Anti-Corruption	153
• Internal Control and Risk Management	154
• Report of the Audit Committee	156
• Connected Transactions	158



## FINANCIAL INFORMATION

• Management Discussion and Analysis (MD&A)	161
• Report of the BOD's Responsibility to the Financial Statements	172
• Auditor's Report and Financial Statements	173





## PERFORMANCE OVERVIEW



### WHA Corporation PCL (WHA)

#1 Logistics facilities developer offering a variety of premium facilities uniquely servicing our clients' needs.

Registered Capital • THB 1,568 mm      Paid-Up Capital • THB 1,495 mm



### WHA Industrial Development PCL (WHAID)

#1 Industrial Estate developer delivering world-class solutions to industrial customers.

Registered Capital • THB 6,000 mm      Paid-Up Capital • THB 3,882 mm

**98.54%**



### WHA Utilities and Power PCL (WHAUP)<sup>1</sup>

Integrated Industrial Utilities & Power provider with solid business growth.

Registered Capital • THB 3,825 mm      Paid-Up Capital • THB 3,825 mm

**70.45%**



### WHA Infonite Co., Ltd. (WHA Infonite)

Digital Service Provider Providing a digital platform solution for leading companies. This fully-integrated and supported initiative adds value to WHA group.

Registered Capital • THB 400 mm      Paid-Up Capital • 400 mm

**97.67%**

## PROPERTY FUNDS AND REITS Group Asset Management Platform

**15%**  
WHART

NAV per unit • THB 10.80  
Paid-Up Capital • THB 23,169 mm  
Total Asset • THB 38,154 mm

**15%**  
HREIT

NAV per unit • THB 9.08  
Paid-Up Capital • THB 6,223 mm  
Total Asset • THB 9,914 mm

**15%**  
WHABT

NAV per unit • THB 10.67  
Paid-Up Capital • THB 1,931 mm  
Total Asset • THB 2,708 mm

**22.95%**  
HPF

NAV per unit • THB 9.21  
Paid-Up Capital • THB 4,630 mm  
Total Asset • THB 4,424 mm

## JV COLLABORATIONS

### Logistics Partnership

**65%** WHA KPN Alliance  
**50%** Central WHA Alliance  
**51%** WHA Daiwa Logistics Property  
**51%** WHA -JD Alliance  
**50%** WHA KW Alliance

### Industrial Development Business Partnership

**60%** Eastern Seaboard Industrial Estate  
**99%** WHA Industrial Zone Nghe An Joint Stock Company  
**51%** WHA TUS  
**49%** BIG WHA Industrial Gas

### Digital Business Partnership

**33.33%** Genesis Data Center  
**15%** Supemap (Thailand)

## UTILITIES AND POWER BUSINESS COLLABORATIONS

### Utilities Business Partnership

**47%**  
Cau Lo Water Supply JSC

**34%**  
Duang River Surface Water Plant JSC

### Power Business Partnership

**35%** Gheco-One  
**12.75%** Houay Ho Power  
**25%** Gulf Solar  
**25%** B.Grimm Power (WHA) 1  
**5%** Glow IPP

**25%** Gulf JP NLL  
**75%** WHA Gunkul  
**33.33%** Chonburi Clean Energy Green Solar Roof  
**25%** Gulf TS 1-4, Gulf VTP, Gulf NLL 2  
**35%** Gulf WHA MT

Remarks : <sup>1</sup> Held by WHA Industrial Development PCL.



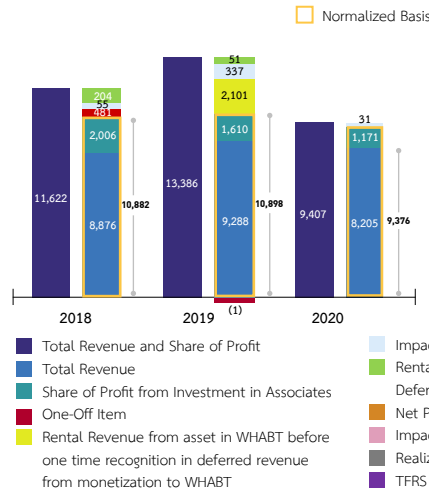
## OPERATING PERFORMANCE

### 2020 OVERALL HIGHLIGHT

- For 2020, WHA Group confirmed its status as Thailand's leading developer of Logistics Properties, Industrial Estates, Industrial Utilities and Power and provider of Digital Platform. Total Revenue and Share of Profit and Net Profit for 2020 were THB 9,406.6 mm and THB 2,523.7 mm, respectively. This statutory figure consists of the normal business operation and FX impacts, which was almost all unrealized gain/loss. In addition, the Company's Normalized Total Revenue and Share of Profit and Normalized Net Profit stood at THB 9,376.0 mm and THB 2,542.6 mm, respectively.

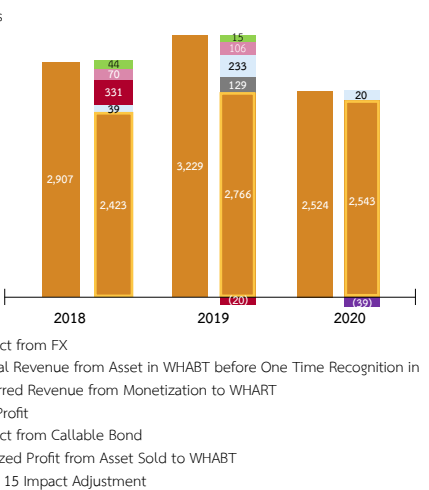
### TOTAL REVENUE

(Unit : THB mm)



### NET PROFIT

(Unit : THB mm)



## Revenue and Gross Profit Breakdown

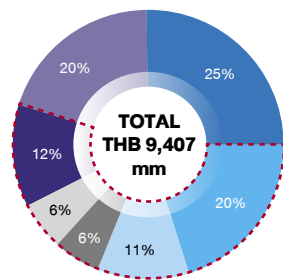
### 2020 REVENUE BREAKDOWN

(Unit: THB mm)

Rental Property	1,157
Sale of Industrial Estat	1,884
Sale of IP's	2,368
Utilities	1,893
Power	1,032
Div & Mgt	526
Others	547
Recurring	

Recurring vs Non-Recurring = 55:45

Remark: Share of profit from JV's and Associates included



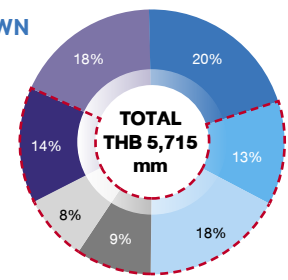
### 2020 GROSS PROFIT BREAKDOWN

(Unit: THB mm)

Rental Property	808
Sale of Industrial Estate	1,029
Sale of IP's	1,168
Utilities	722
Power	997
Div & Mgt	526
Others	465
Non-Recurring	

Recurring vs Non-Recurring = 62:38

Remark: Share of profit from JV's and Associates included Gross profits are based on consolidated financial statements and thus affected by PPA adjustment

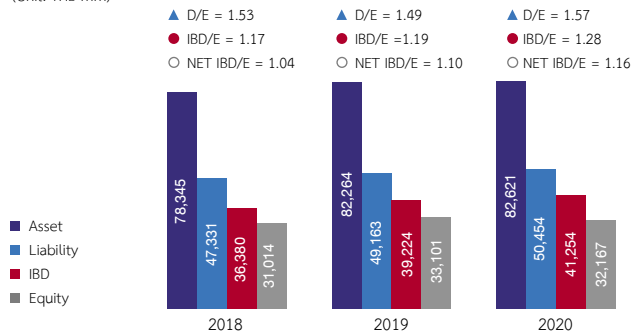


## Financial Position

- As of 31 December 2020, the Company had total assets of THB 82,621.1 mm, increasing by THB 357.3 mm from THB 82,263.8 mm as of 31 December 2019. The main reasons are from continuously developed new projects, increase in equipment related to solar rooftop business and investment of reclaimed water project, decrease in investment in associates from the adoption of new accounting standard (TFRS 9), reflecting to the mark-to-market of financial instruments in associates of power business, and due to decrease in investment value of REITs from market price change.

### CAPITAL STRUCTURE

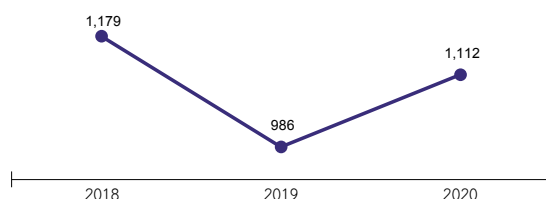
(Unit: THB mm)



- At 2020 Finance Cost increased to THB 1,112.3 mm which increased by 12.8%, compared to the same period of last year due to the accounting impact of early redemption of bond. If excluding such an impact, the finance cost increased by 1.8%. However, the Company's weighted average cost of fund decreased by 0.37% (decreasing from 3.41% at the end of 2019 to 3.04% at the end of 2020).

### FINANCIAL COST

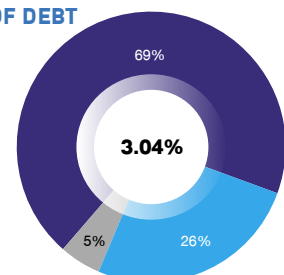
(Unit: THB mm)



### WEIGHTED AVERAGE COST OF DEBT

(Unit: THB mm)

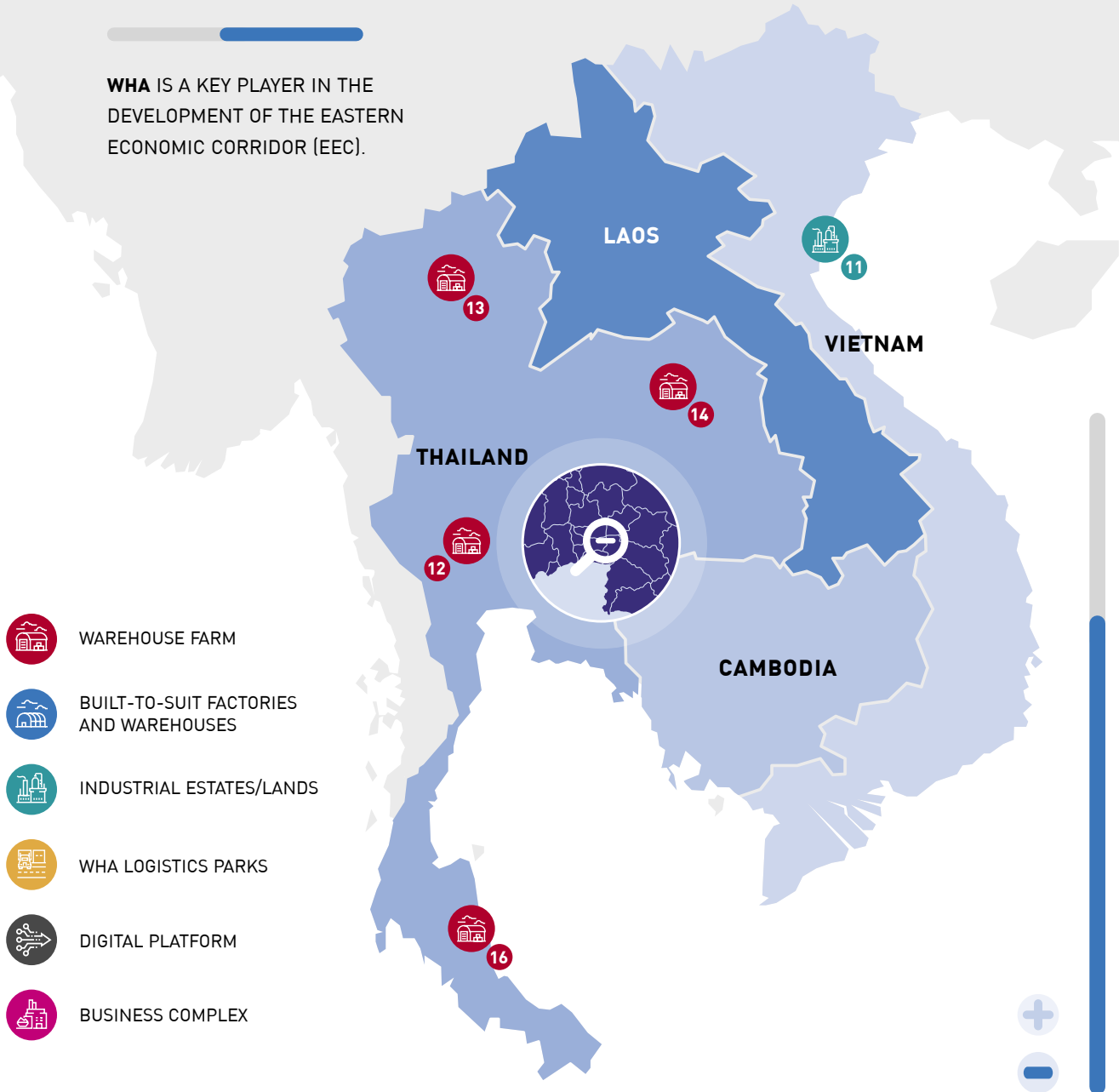
BOND	28,342
TERM LOAN	10,975
SHORT TERM NOTE	1,950





## WHA 50+ STRATEGIC LOCATION IN THAILAND

WHA IS A KEY PLAYER IN THE DEVELOPMENT OF THE EASTERN ECONOMIC CORRIDOR (EEC).



### WAREHOUSE FARM

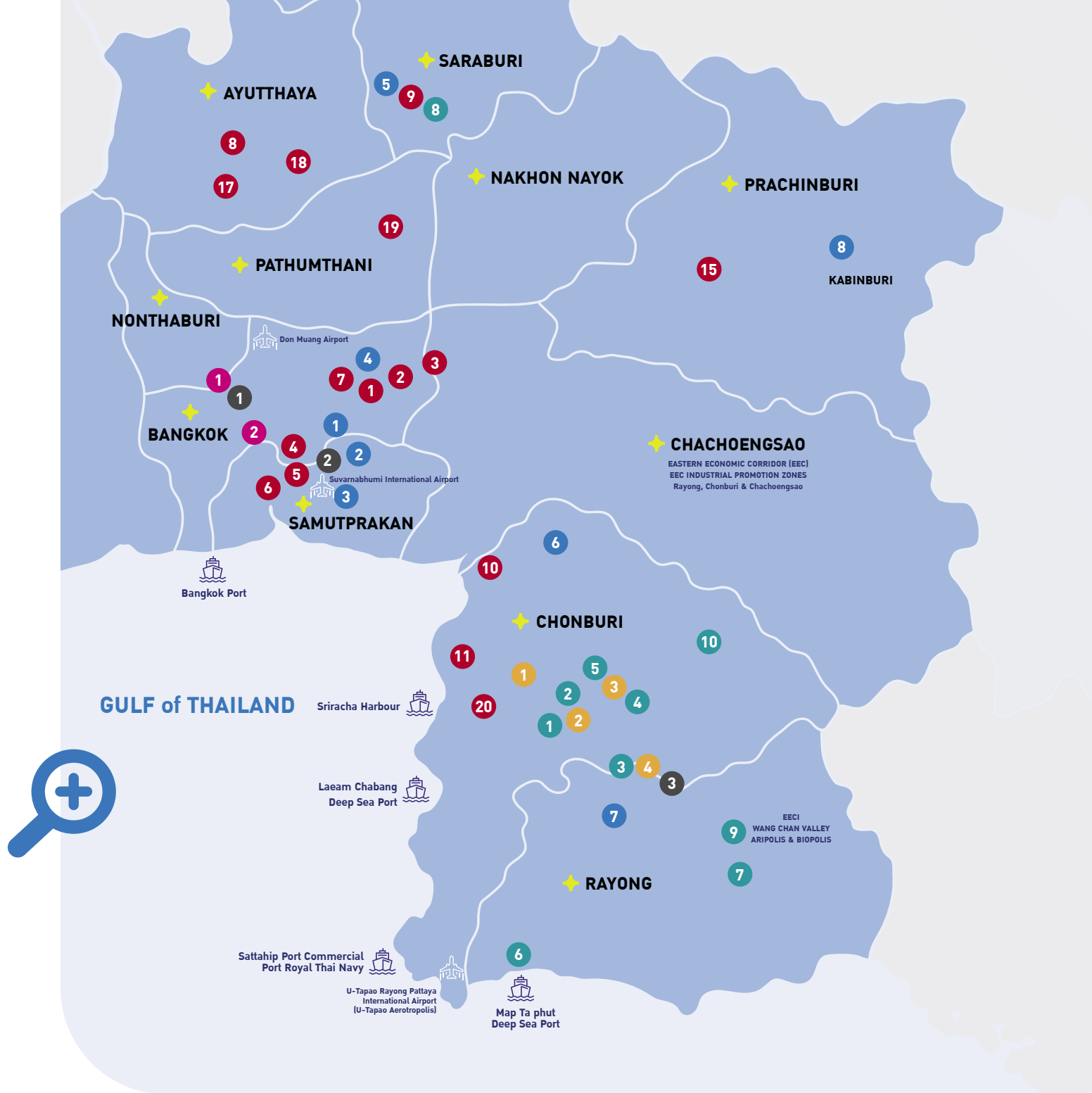
1. WHA Mega Logistics Center Bangna-Trad km.18
2. WHA Mega Logistics Center Bangna-Trad km.19
3. WHA Mega Logistics Center Bangna-Trad km.23 (2 Phases)
4. WHA Mega Logistics Center Chonlaharnpichit km.3 (2 Phases)
5. WHA Mega Logistics Center Chonlaharnpichit km.4
6. WHA Mega Logistics Center Chonlaharnpichit km.5
7. WHA Mega Logistics Center Ladkrabang
8. WHA Mega Logistics Center Wangnoi 61
9. WHA Mega Logistics Center Saraburi
10. WHA Mega Logistics Center Panthong, Chonburi (2 Phases)
11. WHA Mega Logistics Center Laemchabang
12. WHA Mega Logistics Center Rama II, km.35
13. WHA Mega Logistics Center Lampoon
14. WHA Mega Logistics Center Khon Kaen
15. WHA Mega Logistics Center Kabinburi
16. WHA Mega Logistics Center Surathani
17. WHA Mega Logistics Centers Wangnoi 61 Phase 2
18. WHA CENTRAL Mega Logistics Center Wangnoi 63
19. WHA Mega Logistics Center Lum Luk Ka
20. WHA Mega Logistics Center Laemchabang 2



### BUILT-TO-SUIT FACTORIES AND WAREHOUSES

1. Consumer Goods Distribution Center
2. Healthcare Air-Con Distribution Center
3. Hazardous Goods Distribution Center
4. Ladkrabang Logistics Center (2 Phases)
5. Diaper Manufacturing
6. Consumer Goods Distribution Center
7. Aerospace Manufacturing
  - Motorbike Manufacturing
  - Automation & Robotics
  - Aerospace Factory
8. WHA Ready Built Factory Park 1 @Hi-tech Kabin





#### INDUSTRIAL ESTATES / LANDS

1. WHA Chonburi Industrial Estate 1 (WHA CIE 1)
2. WHA Chonburi Industrial Estate 2 (WHA CIE 2)
3. Eastern Seaboard Industrial Estate (Rayong) (ESIE)
4. WHA Eastern Seaboard Industrial Estate 1 (WHA ESIE 1)
5. WHA Eastern Seaboard Industrial Estate 2 (WHA ESIE 2)
6. WHA Eastern Industrial Estate (Map Ta Phut) (WHA EIE)
7. WHA Rayong Industrial Land (WHA RIL)
8. WHA Saraburi Industrial Land (WHA SIL)
9. WHA Eastern Seaboard Industrial Estate 4 (WHA ESIE 4)
10. WHA Eastern Seaboard Industrial Estate 3 (WHA ESIE 3)
11. WHA Industrial Zone 1 - Nghe An Vietnam



#### WHA LOGISTICS PARKS

1. WHA Logistics Park 1 (WHA LP 1)
2. WHA Logistics Park 2 (WHA LP 2)
3. WHA Logistics Park 3 (WHA LP 3)
4. WHA Logistics Park 4 (WHA LP 4)



#### DIGITAL PLATFORM

1. WHA Mega Center Vibhavadi-Rangsit
2. WHA Mega Center Bangna-Trad
3. WHA Mega Center Eastern Seaboard



#### BUSINESS COMPLEX

1. SJ Infonite / Business Complex
2. Bangna-Trad Business Complex



## MESSAGE FROM CHAIRMAN AND GROUP CEO



“

Although WHA Group has ached challenges from the COVID-19 pandemic, the Company has maintained its customer base; and strong operating results have been forthcoming, across all business hubs, as a result of the Company continuing to nurture its strong foundations. Furthermore, the Company has continued to identify new business opportunities which emphasize innovative solutions that create value-added products and services; and the Company has explored business expansion in both Thailand and Vietnam; all whilst upholding financial discipline and efficient financial management.

”



The year 2020 was a challenging year across the globe due to the COVID-19 pandemic which not only caused epic infection and death rates, but also resulted in the world's largest recessions since the Great Depression. Yet in 2020, WHA Group confirmed its status as Thailand's leading developer of Logistics Properties, Industrial Estates, Industrial Utilities and Power, and Digital Platform provider. The Company reported total revenue and share of profit at THB 9,406.6 million, and net profit at THB 2,523.7 million. The normalized net profit excluding FX impact and one-time gain/loss item stands at THB 2,542.6 million with total asset of THB 82,621.1 million. This solid performance reflects the robustness of WHA Group's 4-business hub platform and the Company's capabilities in effective organizational restructuring for dealing with changes, challenges and unexpected situations.

The Logistics business grew in line with booming E-commerce and consumer business and rising demand for premium warehouse facilities. In 2020, WHA Group developed 5 new Built-to-Suit projects comprising leasable area of over 130,000 sq.m. As a result, at the end of 2020, total rental warehouse space under owned and managed was 2.5 million sq.m.

Pertaining to its Industrial Estate Development business, WHA Group continuously develops and expands new industrial estates. The Company's 11th domestic industrial estate, 1,280-rai WHA Rayong 36 located in the Eastern Economic Corridor (EEC), had started construction since Q4 2020. In Vietnam, WHA Industrial Zone 1- Nhge An attracted overwhelming interest from investors with total land sales in 2020 exceeding the original target. The Company is pushing the construction of the next phase, covering land area of 6,800 rai. Moreover, the Company signed a collaboration agreement with the local government of Thanh Hoa province to develop two industrial zones - (1) WHA Smart Technology Industrial Zone – Thanh Hoa, and (2) WHA Northern Industrial Zone – Thanh Hoa, with a combined land area of 7,500 rai. This has

marked another successful milestone for WHA Group's overseas business.

Coupled with this, WHA Group has co-operated with its business allies to present new products and services, for example, the establishment of a joint venture with Tus-Holdings, a leading Chinese developer of a science and technology service centers, to implement the first innovation and incubation center "TusPark WHA" in Thailand, which will become a Science Park in the next phase. Additionally, the Company has also established a joint venture with Bangkok Industrial Gas Ltd. ("BIG") to produce and distribute industrial gas to the customers in WHA industrial estates.

In its Utility Business, WHA Group focuses on providing high value-added products and innovative water solutions by launching (1) Thailand's biggest Reclamation Water Plant, which has a capacity of 9.125 million cubic meters per year located in WHA Eastern Industrial Estate (Map Ta Phut); (2) Demineralized Water plant, contracted to provide water to Global Power Synergy Plc (GPSC) under an annual contract of 1.6 million cubic meters for 15 years; and (3) an introduction of new innovations and modern technologies, for example, an adoption of SCADA system (supervisory control and data acquisition).

Meanwhile, the Company's Power business has continued to enlarge its customer portfolio with the development of renewable energy solutions, in particular solar projects including rooftop, floating and ground-mounted systems. In 2020, the Company has increased additional electricity-generating capacity of solar power of 50.8 MW, raising the shareholding equity of Power business to 590 MW. The Company has also focused on developing innovative solutions with strategic partners such as Peer to Peer energy trading platform with Blockchain technology and has pursued international expansion through merger and acquisition. Furthermore, WHA Group has already established a strong footprint in industrial development, water



production and sales, and wastewater management in Vietnam. Previous investments have contributed to a growing customer base, relationships and network of business partners, which further enhance opportunities for other businesses overseas.

In its Digital Platform business, WHA Group has maintained a strong commitment to develop and offer new services and innovative digital products that respond to increasingly sophisticated customer demand. For example, the company has rolled-out the FTTx network in WHA industrial estates to accommodate the connectivity of future 5G and data center services, along with an investment in a 5G tower to serve as a crucial building block which supports both the Company and its industrial customers' digital innovation and transformation goals.

In addition, The Company also successfully divested 3 mega logistics centers to WHA Premium Growth Freehold & Leasehold REIT (WHART) comprising the leasable area of 128,789 sq.m., and divested warehouses and factories to Hemaraj Leasehold REIT (HREIT) comprising the leasable area of 48,127 sq.m., with total value of 2 transitions of 4,870 million Baht. Additionally, in a highly-celebrated milestone, WHA Group recently inaugurated WHA Tower, its new headquarters located on Debaratna Road (Bangna Trad) KM 7. The 25-storey Grade A office building offers a gross area of 52,000 sq.m. The building won the "Commercial High Rise Architecture Thailand" award for its contemporary, environmentally-friendly design which promotes creativity and work-life balance. Office spaces are now available for rent.

For 2021, WHA Group believes the economy will improve, yet it shall err on the side of caution, and shall remain ready to adjust to disruptions and challenges from both internal and external factors which could arise. In 2021, the Company shall continue

to focus on creating new value-added products and services via innovative solutions and business platforms combining with infrastructure base. The Company also expects digital transformation to continually emerge. WHA Group will also continue to firmly adhere to operate by driving business forward on the principle of sustainability and consideration to stakeholders covering all three dimensions, including environmental(E), social(S) and governance(G) as the Company has an important role toward supporting and driving economy and social growth in Thailand, both raising the technological and innovative capabilities of the production and service industries, attracting foreign direct investment, employment and labor skill development, as well as reduction of costs transport and logistics from the manufacturer to the consumer, etc. involved directly with a development of the capability in the country's competitiveness.

In closing, on behalf of the Chairman, the Group CEO, the Board of Directors and executives, I would like to thank you all for your support and contribution to our success. I would like to express my gratitude to all shareholders for your trust; to all customers for allowing us to serve you; and to our business partners and financial institutions for supporting our growth. Finally, I thank the Board of Directors, the Executive Committees and all employees for your demonstrated capabilities to drive the businesses forward and grow sustainably, in pursuit of the best value for society, shareholders, customers and stakeholders.



**Ms. Jareeporn Jarukornsakul**

Chairman and Group CEO

WHA Corporation Public Company Limited



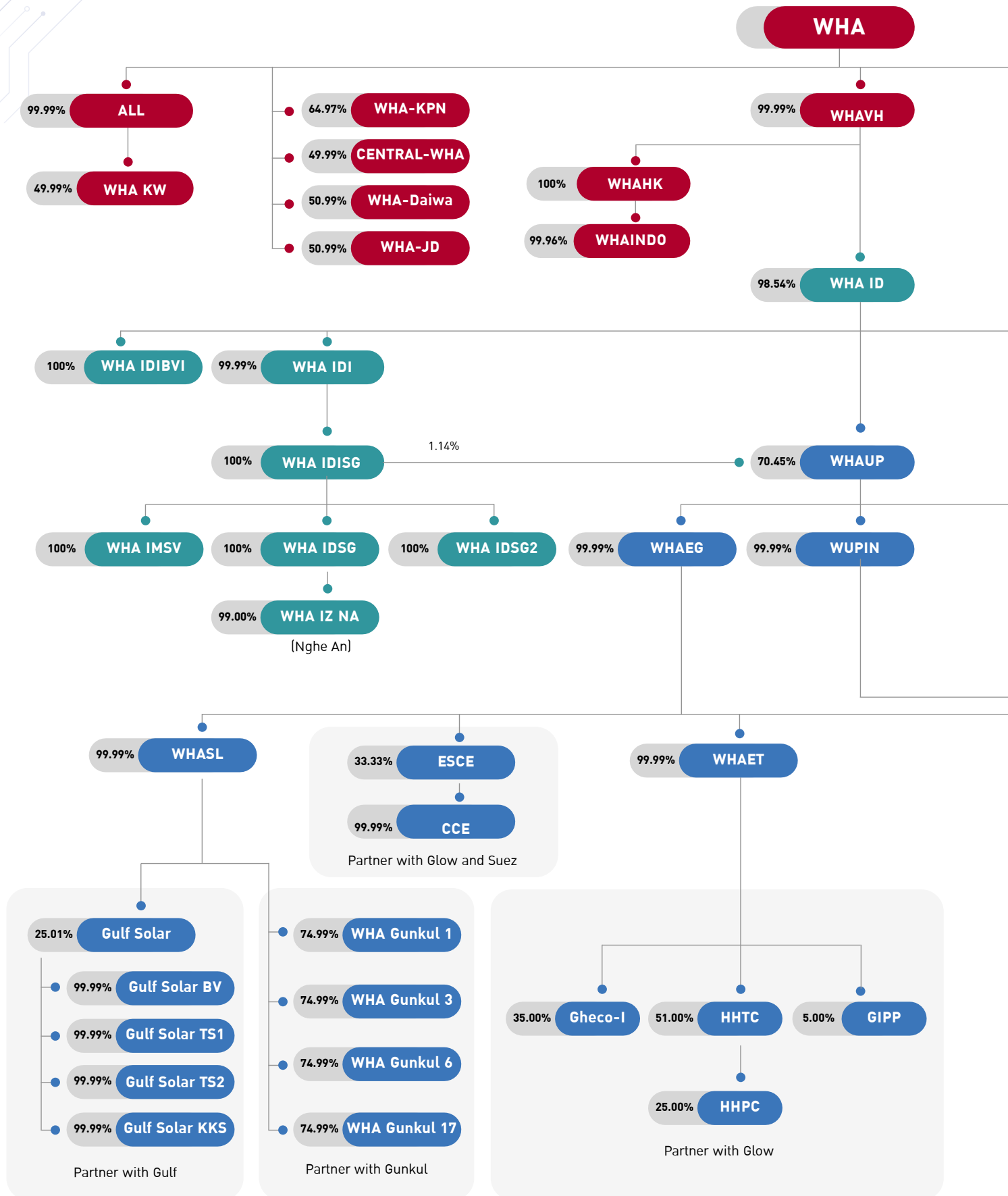


**WHA**  
Logistics

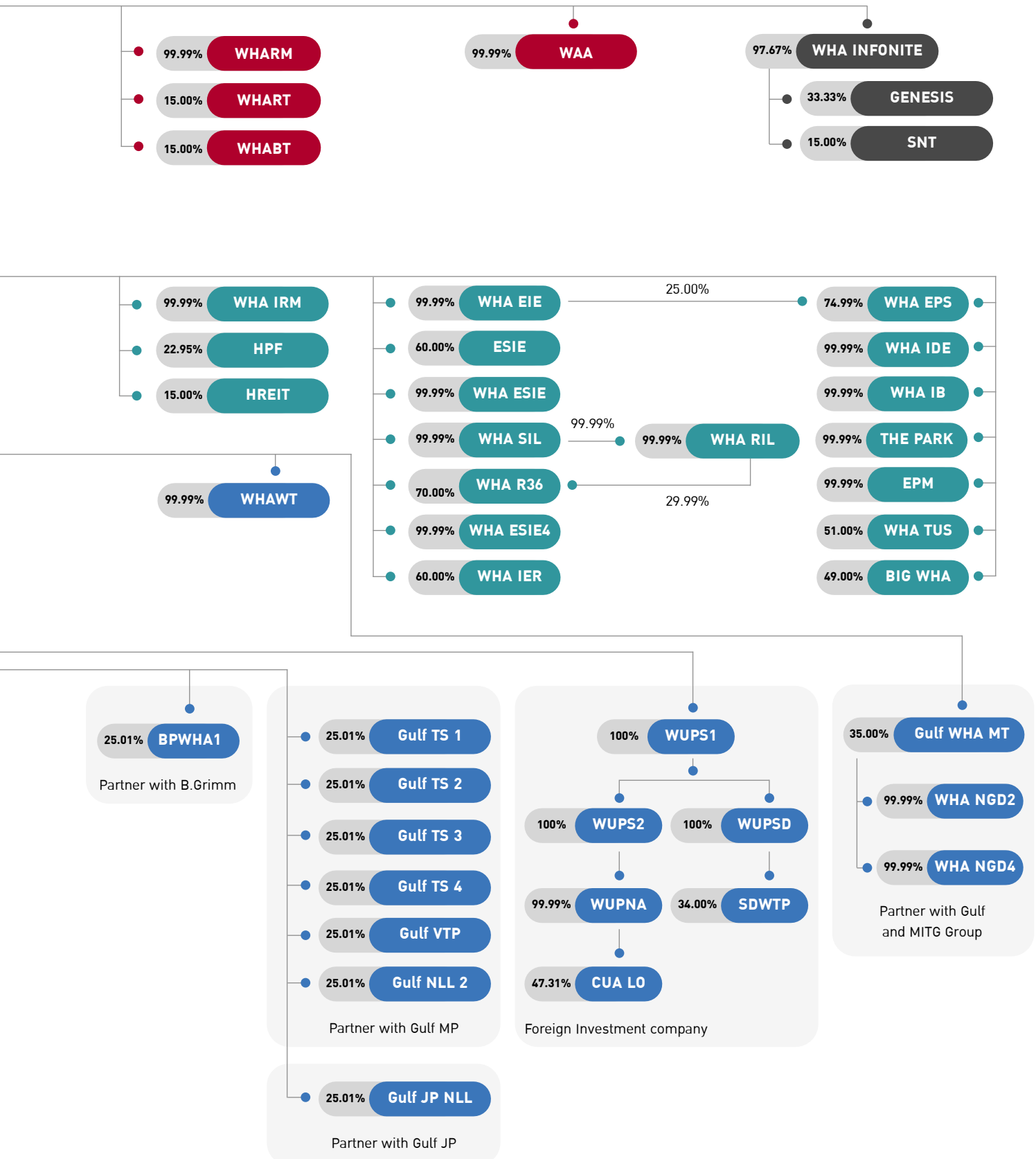
Logistics Center  
[www.wha-group.com](http://www.wha-group.com)  
Tel. +66 (0) 2 753 3750



# GROUP SHAREHOLDING STRUCTURE









## GROUP SHAREHOLDING STRUCTURE

AS OF 31 DECEMBER 2020

### WHA

- WHAVH
- WAA
- ALL
- WHA KW
- WHAHK
- WHAINDO
- WHA-KPN
- CENTRAL WHA
- WHA-Daiwa
- WHA-JD
- WHARM
- WHART
- WHABT

### WHA Corporation Public Company Limited

WHA Venture Holding Co., Ltd.  
 Warehouse Asia Alliance Co., Ltd.  
 WHA Alliance Co., Ltd.  
 WHA KW Alliance Co., Ltd.  
 WHA Corporation (Hong Kong) Co., Ltd.  
 PT. WHA International Indonesia  
 WHA KPN ALLIANCE Co., Ltd.  
 CENTRAL-WHA ALLIANCE Co., Ltd.  
 WHA Daiwa Logistics Property Co., Ltd.  
 WHA-JD Alliance Co., Ltd.  
 WHA Real Estate Management Co., Ltd.  
 WHA Premium Growth Freehold and Leasehold REIT  
 WHA Business Complex Freehold and Leasehold REIT

### WHA Infonite

- Genesis
- SNT

### WHA Infonite Company Limited

Genesis Data Center Co., Ltd.  
 Supernap (Thailand) Co., Ltd.

### WHAID

- WHA IDIBVI
- WHA IDI
- WHA IDISG
- WHA IDSG
- WHA IDSG2
- WHA IMSV
- WHA IZ NA
- WHA TUS
- BIG WHA
- WHA IRM
- HPF
- HREIT
- ESIE
- WHA ESIE
- WHA EIE
- WHA SIL
- WHA RIL
- WHA R36
- WHA ESIE4
- WHA IER
- WHA IDE
- WHA IB
- WHA EPS
- EPM
- THE PARK
- WHA TUS
- BIG WHA

### WHA Industrial Development Public Company Limited

WHA Industrial Development International (BVI) Co., Ltd.  
 WHA Industrial Development International Co., Ltd.  
 WHA Industrial Development International (SG) Pte. Ltd.  
 WHA Industrial Development (SG) Pte. Ltd.  
 WHA Industrial Development 2 (SG) Pte. Ltd.  
 WHA Industrial Management Services Vietnam Co., Ltd.  
 WHA Industrial Zone Nghe An Joint Stock Company  
 WHA TUS Co., Ltd.  
 BIG WHA Industrial Gas Co., Ltd.  
 WHA Industrial REIT Management Co., Ltd.  
 Hemaraj Industrial Property and Leasehold Fund  
 Hemaraj Leasehold Real Estate Investment Trust  
 Eastern Seaboard Industrial Estate (Rayong) Co., Ltd.  
 WHA Eastern Seaboard Industrial Estate Co., Ltd.  
 WHA Eastern Industrial Estate Co., Ltd.  
 WHA Saraburi Industrial Land Co., Ltd.  
 WHA Rayong Industrial Land Co., Ltd.  
 WHA Rayong 36 Co., Ltd.  
 WHA Eastern Seaboard Industrial Estate 4 Co., Ltd.  
 WHA Industrial Estate Rayong Co., Ltd.  
 WHA Industrial Development Engineering Co., Ltd.  
 WHA Industrial Building Co., Ltd.  
 WHA Eastern Pipeline Services Co., Ltd.  
 Eastern Seaboard Property and Marina Services Co., Ltd.  
 The Park Residence Co., Ltd.  
 WHA Tus Co., Ltd.  
 BIG WHA Industrial Gas Co., Ltd.

WHAUP	WHA Utilities and Power Public Company Limited
● WHAWT	WHA Water Co., Ltd.
● WUPIN	WHAUP International Co., Ltd.
● WUPS1	WHAUP (SG) 1 Pte. Ltd.
● WUPS2	WHAUP (SG) 2 Pte. Ltd.
● WUPSD	WHAUP (SG) 2DR Pte. Ltd.
● SDWTP	Duong River Surface Water Plant Joint Stock Company
● CUA LO	Cua Lo Water Supply Joint Stock Company
● WUPNA	WHAUP Nghe An Joint Stock Company
● WHAEG	WHA Energy Co., Ltd.
● WHASL	WHA Solar Co., Ltd.
● WHAET	WHA Energy 2 Co., Ltd.
● BPWHA1	B.Grimm Power (WHA) 1 Ltd.
● ESCE	Eastern Seaboard Clean Energy Co., Ltd.
● CCE	Chonburi Clean Energy Co., Ltd.
● Gheco-1	Glow-One Co., Ltd.
● GIPP	Glow IPP Co., Ltd.
● HHTC	Houay Ho Thai Co., Ltd.
● HHPC	Houay Ho Power Co., Ltd.
● Gulf WHA MT	Gulf WHA MT Natural Gas Distribution Co., Ltd.
● WHA NGD2	WHA Eastern Seaboard NGD2 Co., Ltd.
● WHA NGD4	WHA Eastern Seaboard NGD4 Co., Ltd.
● Gulf Solar	Gulf Solar Co., Ltd.
● Gulf Solar BV	Gulf Solar BV Co., Ltd.
● Gulf Solar TS1	Gulf Solar TS1 Co., Ltd.
● Gulf Solar TS2	Gulf Solar TS2 Co., Ltd.
● Gulf Solar KKS	Gulf Solar KKS Co., Ltd.
● Gulf TS 1	Gulf TS1 Co., Ltd.
● Gulf TS 2	Gulf TS2 Co., Ltd.
● Gulf TS 3	Gulf TS3 Co., Ltd.
● Gulf TS 4	Gulf TS4 Co., Ltd.
● Gulf VTP	Gulf VTP Co., Ltd.
● Gulf NLL2	Gulf NLL2 Co., Ltd.
● Gulf JP NLL	Gulf JP NLL Co., Ltd.
● WHA Gunkul 1	WHA Gunkul Green Solar Roof 1 Co., Ltd.
● WHA Gunkul 3	WHA Gunkul Green Solar Roof 3 Co., Ltd.
● WHA Gunkul 6	WHA Gunkul Green Solar Roof 6 Co., Ltd.
● WHA Gunkul 17	WHA Gunkul Green Solar Roof 17 Co., Ltd.





## LOGISTICS & INDUSTRIAL PROPERTIES

The Company is committed to be a leading company as a warehouse project developer, distribution center, and high quality factory located in a strategic location around Bangkok, Eastern Economic Corridor, and other provinces.

The Company is able to fully meet the needs of its customers due to its project location, project design with international standards and quality of construction. This could reduce the cost of customer operations and increase long-term competitive advantages.





# #1 LOGISTIC FACILITIES DEVELOPER

OFFERING A VARIETY OF PREMIUM FACILITIES UNIQUELY SERVICING OUR CLIENTS' NEEDS



**2.5** Million Sq.m.  
UNDER OWNERSHIP & MANAGEMENT



**200<sup>+</sup>**  
WELL-KNOWN  
TENANTS PROFILE ON  
41 STRATEGIC LOCATIONS



SUCCESSFUL ASSET  
MONETIZATION INTO  
**WHART &  
HREIT**



**WHA TOWER**  
AWARDED "COMMERCIAL HIGH  
RISE ARCHITECTURE THAILAND"  
FOR ITS CONTEMPORARY, AND  
ENVIRONMENTALLY-FRIENDLY  
DESIGN



# NUMBER 1 INDUSTRIAL ESTATE DEVELOPER

DELIVERING WORLD-CLASS SOLUTIONS TO INDUSTRIAL CUSTOMERS



**11** OPERATING  
INDUSTRIAL ESTATES/ ZONES  
AND OTHERS IN PIPELINE



REAL ESTATE DEVELOPMENT OVER

**68,900<sup>/1</sup>** rai

<sup>/1</sup> Including operate and under development in Thailand and Vietnam.



**WHA Industrial  
Zone Nghe An**  
RECEIVING OVERWHELMING  
INTEREST FROM INVESTORS

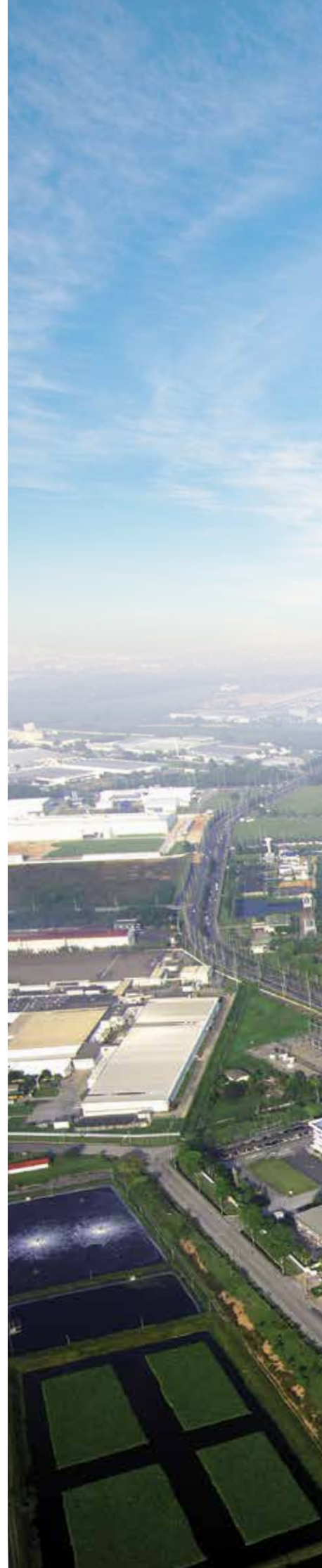
AND READY TO DEVELOP THE NEXT PHASE.



**PARTNERSHIP**  
WITH BUSINESS ALLIES IMPLEMENT 1<sup>st</sup>  
INNOVATION AND INCUBATION CENTER

**TUS PARK WHA**

WHICH WILL BECOME A  
**SCIENCE PARK**  
IN THE NEXT PHASE







## INDUSTRIAL DEVELOPMENT

Industrial Development Hub is operated through the Company's subsidiary, WHAID Group, responsible for developing industrial estates and/ or zones and selling of land to enterprises who demand to make their investment in industrial estates / zones and industrial promotional zones. Enterprises can gain special privileges provided by Industrial Estate Authority of Thailand and / or Thailand Board of Investment. Another crucial role of WHAID Group is to act as a center for providing utilities and facilities for clients inside the industrial estates/ zones e.g. electricity, water supply, wastewater treatment, waste disposal, telephone, internet and coordinating with the authority on environmental control.





## UTILITIES & POWER

Utilities & Power Hub is operated through the Company's subsidiary, WHAUP Group, the provider of utilities in the WHAID Group's industrial estates/ zones i.e. raw water, industrial water, and wastewater treatment. WHAUP Group also has investments in power businesses, through joint ventures with both domestic and foreign power plants, who have expertise in the power business field. Our power plants include both Conventional Fuel and Renewable Energy power plants.







# INTEGRATED INDUSTRIAL UTILITIES & POWER PROVIDER WITH SOLID BUSINESS GROWTH



**114** Million m<sup>3</sup>  
OF UTILITIES SALES AND  
MANAGEMENT VOLUME



**INITIATIVE OF  
VALUE ADDED  
PRODUCTS** VIA  
TECHNOLOGY AND INNOVATION  
SUCH AS DEMINERALIZED WATER AND  
INNOVATIVE WASTEWATER TREATMENT



**LAUNCH  
THAILAND'S LARGEST  
SOLAR CARPARK**

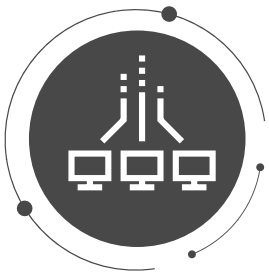


**POWER CAPACITY  
INCREASED TO  
590** Equity MW.

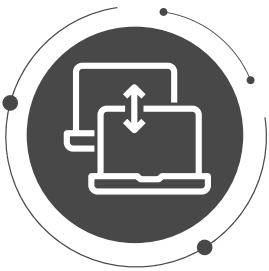


## DIGITAL PLATFORM

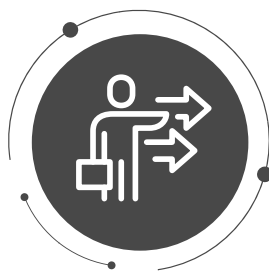
Providing a digital platform solution for leading companies. This fully-integrated and supported initiative adds value to WHA group.



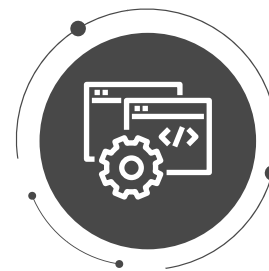
**4** DATA CENTERS WITH  
TIER III AND IV STANDARD  
COMMENCED OPERATION  
WITH 459 EQUITY RACKS



**FTTX SERVICE  
COVERING  
10**  
INDUSTRIAL ESTATES



**SPEARHEAD  
DIGITAL  
INNOVATION &  
TRANSFORMATION**



**PARTNERSHIP  
WITH BUSINESS ALLIES  
DEVELOPING DIGITAL INNOVATION**  
**5G**  
SOLUTION IN I.E.





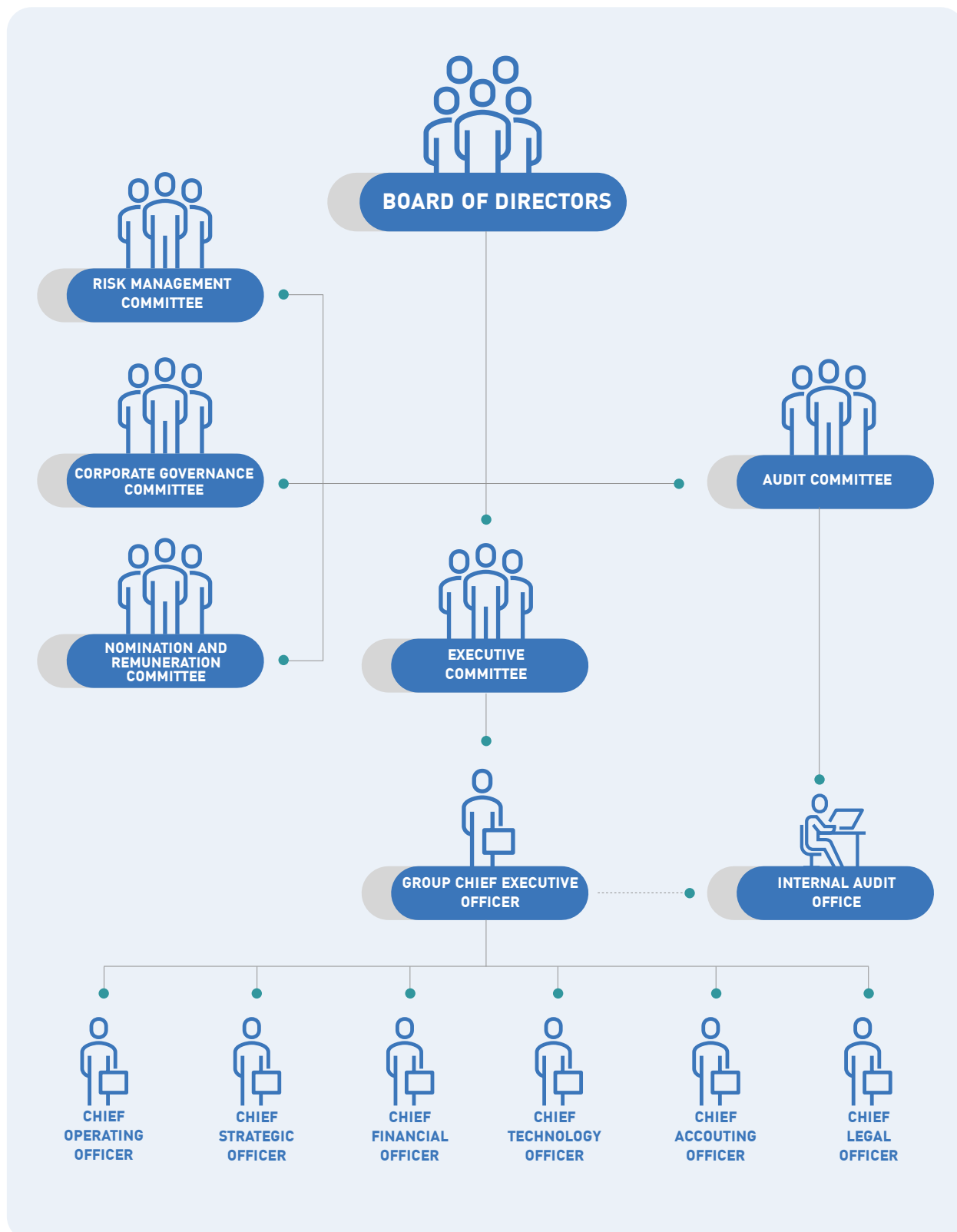
## DIGITAL PLATFORM

Digital Platform Hub is operated through the Company's subsidiary, WHA infonite Company Limited, which was granted NBTC internet services (type 1), providing co-location data centers, fiber optic network (FTTx) and also managed services.



# THE COMPANY'S ORGANIZATION CHART

AS AT 31 DECEMBER 2019







# BOARD OF DIRECTORS

AUDIT COMMITTEE AND  
EXECUTIVE COMMITTEES





## BOARD OF DIRECTORS

AS OF 31 DECEMBER 2020



**1 Ms. Jareeporn Jarukornsakul**  
Chairman of the  
Board of Directors

**2 Mr. David Richard Nardone**  
Vice Chairman of  
the Board of Directors

**3 Mr. Vivat Jiritikarnsakul**  
Director

**4 Mr. Jakrit Chaisanit**  
Director

**5 Mr. Krailuck Asawachatroj**  
Director

**6 Mr. Narong Kritchanhai**  
Director



**7 Mr. Somsak Boonchoyruengchai**  
Director

**8 Mrs. Anchalee Chavanich**  
Independent Director

**9 Lt. Gen. Prachya Chalermwat Ph. D.**  
Independent Director

**10 Dr. Apichai Boontherawara**  
Independent Director

**11 Dr. Somsak Pratomsrimek**  
Independent Director

**12 Dr. Kritsana Sukboonyasatit**  
Independent Director





## AUDIT COMMITTEE



**Mrs. Anchalee Chavanich**  
Chairman of the Audit  
Committee



**Dr. Apichai Boontharawara**  
Audit Committee Member



**Dr. Somsak Pratomsrimek**  
Audit Committee Member



**Dr. Kritsana Sukboonyasatit**  
Audit Committee Member



## EXECUTIVE COMMITTEE



**Ms. Jareeporn Jarukornsakul**  
Chairman of the Executive Committee  
and Group Chief Executive Officer



**Mr. David Richard Nardone**  
Executive Committee Member



**Mr. Vivat Jiratikarnsakul**  
Executive Committee Member



**Mr. Jakrit Chaisanit**  
Executive Committee Member  
Chief Operating Officer



**Mr. Krailuck Asawachatroj**  
Executive Committee Member  
Chief Strategic Officer



**Mr. Narong Kritchanchai**  
Executive Committee Member  
Chief Legal Officer



**Mr. Somsak Boonchoyruengchai**  
Executive Committee Member  
Chief Accounting Officer



**Mr. Natthapatt Tanboon-ek**  
Executive Committee Member  
Chief Finance Officer



# PROFILES OF DIRECTORS, EXECUTIVES AND COMPANY SECRETARY





# PROFILES OF DIRECTORS, EXECUTIVES AND COMPANY SECRETARY

AS OF 31 DECEMBER 2020



## Ms. Jareeporn Jarukornsakul

Age : 53 year

Position / Appointed Date :

- **Chairman of the Board of Directors**  
Date of Appointment: 9 February 2018
- **Chairman of the Executive Committee**  
Date of Appointment: 9 February 2018
- **Chairman of the Risk Management Committee**  
Date of Appointment: 14 May 2015
- **Nomination and Remuneration Committee Member**  
Date of Appointment: 29 October 2015
- **Group Chief Executive Officer**  
Date of Appointment: 29 October 2015
- **Acting Chief Technology Officer**  
Date of Appointment: 28 February 2020

### Education

- The Honorary PH. D. Degree, Logistics and Supply Chain Management, Christian University of Thailand
- Master of Business Administration, Bangkok University
- Bachelor of Public Health, Mahidol University

### Training

- Role of Chairman Program (RCP) 46/2020, IOD
- Director Accreditation Program (DAP) 210/2015, IOD
- Director Certification Program (DCP) 94/2012, IOD
- Corporate Governance for Capital Market Intermediaries (CGI) 17/2016, IOD

### Training

- Senior Executives on Justice Administration Program National Justice Academy, Office of Judiciary (Class 20/2015)
- Capital Market Leader Program (Class 18/2014), Capital Market Academy
- National Defense Course (Class 60/2017), National Defense College of Thailand
- The Executive Program in Energy Literacy for a Sustainable Future (Class 9/2017), Thailand Energy Academy

**Shareholding Proportion (%) :** 23.29%

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Other Listed Companies

Period	Position	Company	Type of Business
2018 - Present	Chairman of the Board of Directors and Chairman of the Executive Committee	WHA Utilities and Power Public Company Limited	Utilities and Power
2016 - Present	Chairman of the Risk Management Committee, Nomination and Remuneration Committee Member	WHA Utilities and Power Public Company Limited	Utilities and Power
2020 - Present	Member of the Technology Committee and Member of the Corporate Social Responsibility Committee	Siam Commercial Bank Public Company Limited	Financial Institution
2019 - Present	Director	Siam Commercial Bank Public Company Limited	Financial Institution



### Subsidiaries of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2018 - Present	Chairman of the Board of Directors and Chairman of the Executive Committee	WHA Industrial Development Public Company Limited	Property Developer
2019 - Present	Chairman of the Board of Directors	WHA Real Estate Management Co., Ltd.	Trust Manager
2015 - Present	Director	WHA Venture Holding Co., Ltd.	Holding company
2015 - Present	Director	WHA Infonite Co., Ltd.	Digital services
2006 - Present	Director	Warehouse Asia Alliance Co., Ltd.	Property developer on warehouses and factories
2003 - Present	Director	WHA Alliance Co., Ltd.	Property developer on warehouses and factories
2018 - 2020	Director	WHA Corporation (Hong Kong) Co., Ltd.	Holding company
2003 - 2020	Director	WHA Indonesia Co., Ltd.	Property developer on warehouses and factories

### Joint Venture of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2020 - Present	Director	WHA KW ALLIANCE Co., Ltd.	Development, construction, management and operation of business complex facilities and real estate projects.
2019 - Present	Director	WHA-JD Alliance Company Limited	Property developer on warehouses and factories
2016 - Present	Director	CENTRAL WHA ALLIANCE Co., Ltd.	Property developer on warehouses and factories
2016 - Present	Chairman of the Board of Directors	WHA Daiwa Logistics Property Co., Ltd.	Property developer on warehouses and factories
2013 - Present	Chairman of the Board of Directors	WHA KPN ALLIANCE Co., Ltd.	Property developer on warehouses and factories
2016 - 2019	Director	Genesis Data Center Co., Ltd.	Digital services

### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2020 - Present	Director	WHA TUS Co., Ltd.	Develop and operate an innovation project
2019 - Present	Director	WHA Industrial Development 2 (SG) Co., Ltd.	Holding company
2019 - Present	Chairman of the Board of Directors	WHA Real Estate Management Co., Ltd.	Trust Manager
2018 - Present	Chairman of the Board of Directors	WHA Industrial Estate Rayong Co., Ltd.	Property developer
2017 - Present	Chairman of the Board of Directors	WHA Industrial Zone Nghe An Joint Stock Company	Property Developer
2017 - Present	Director	WHA Industrial Management Services Vietnam Co., Ltd.	Consulting services and general management
2016 - Present	Director	WHA Industrial Development International Co., Ltd.	Holding company
2016 - Present	Director	WHA Industrial Development (SG) Pte. Ltd.	Holding company
2015 - Present	Director	WHA Eastern Industrial Estate Co., Ltd.	Property developer

### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2015 - Present	Vice Chairman of the Board of Directors	Eastern Seaboard Industrial Estate (Rayong) Co., Ltd.	Property developer
2015 - Present	Director	WHA Eastern Seaboard Industrial Estate Co., Ltd.	Property developer
2015 - Present	Director	WHA Saraburi Industrial Land Co., Ltd.	Property developer
2015 - Present	Director	WHA Rayong Industrial Land Co., Ltd.	Holding company
2015 - Present	Director	WHA Eastern Pipeline Services Co., Ltd.	Pipe Pack Rental
2015 - Present	Director	WHA Industrial Development International (BVI) Pte. Ltd.	Holding company
2015 - Present	Director	WHA Industrial Development Engineering Co., Ltd.	Design and Construction Supervision Service
2015 - Present	Director	The Park Residence Co., Ltd.	Real Estate Development and Service Management
2015 - Present	Director	WHA Industrial Development International (SG) Pte. Ltd.	Investment in associate/subsidiaries
2015 - Present	Director	WHA Rayong 36 Co., Ltd.	Property developer
2015 - Present	Director	Eastern Seaboard Property and Marina Services Co., Ltd.	Property for investment and marina services
2015 - Present	Director	WHA Eastern Seaboard Industrial Estate 4 Co., Ltd.	Property developer
2015 - 2020	Director	WHA Industrial Development International (Cayman) Co., Ltd.	Holding company

### Subsidiaries of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Chairman of the Board of Directors	WHAUP (SG) 2DR PTE. LTD.	Holding company
2018 - Present	Chairman of the Board of Directors	WHAUP Nghe An Joint Stock Company	Industrial water and wastewater treatment services
2018 - Present	Chairman of the Board of Directors	WHA Solar Co., Ltd.	Investment and development of renewable energy business
2017 - Present	Chairman of the Board of Directors	WHAUP (SG) 1 PTE. Limited	Holding company
2017 - Present	Chairman of the Board of Directors	WHAUP (SG) 2 PTE. Limited	Holding company
2017 - Present	Chairman of the Board of Directors	WHAUP International Co., Ltd.	Holding company
2015 - Present	Chairman of the Board of Directors	WHA Water Co., Ltd.	Water resources development and management
2015 - Present	Chairman of the Board of Directors	WHA Energy Co., Ltd.	Holding company
2015 - Present	Chairman of the Board of Directors	WHA Energy 2 Co., Ltd.	Holding company

### Joint Venture of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2018 - 2021	Chairman of the Board of Directors	Eastern Seaboard Clean Energy Co., Ltd.	Electricity and Power Generation
2018 - 2021	Chairman of the Board of Directors	Chonburi Clean Energy Co., Ltd.	Electricity and Power Generation
2019 - 2020	Director	Duong River Surface Water Plant Join Stock Company	Water distributor, Hanoi Vietnam
2018 - 2020	Director	Gulf JP NLL Co., Ltd.	Generator and distributor of electronic power
2018 - 2020	Director	Gulf Solar Co., Ltd.	Producing and distributing electricity by solar photovoltaic rooftop
2018 - 2020	Director	Gulf Solar TS1 Co., Ltd.	Generator and distributor of electronic power
2018 - 2020	Director	Gulf Solar TS2 Co., Ltd.	Generator and distributor of electronic power
2018 - 2020	Director	Gulf TS1 Co., Ltd.	Generator and distributor of electronic power
2018 - 2020	Director	Gulf TS3 Co., Ltd.	Generator and distributor of electronic power
2017 - 2020	Director	WHA Eastern Seaboard NGD4 Co., Ltd.	Natural Gas Distribution

### Joint Venture of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2016 - 2020	Director	WHA Eastern Seaboard NGD2 Co., Ltd.	Natural Gas Distribution
2015 - 2020	Director	B.Grimm Power (WHA) 1 Limited	Generator and distributor of electronic power
2013 - 2020	Director	WHA Gunkul Green Solar Roof 1 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2020	Director	WHA Gunkul Green Solar Roof 3 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2020	Director	WHA Gunkul Green Solar Roof 6 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2020	Director	WHA Gunkul Green Solar Roof 17 Co., Ltd.	Generator and distributor of electronic power from solar energy
2015 - 2020	Director	Gulf WHA MT Natural Gas Distribution Co., Ltd.	Natural Gas Distribution
2015 - 2020	Director	Gulf Solar BV Co., Ltd.	Generator and distributor of electronic power
2015 - 2020	Director	Gulf Solar KKS Co., Ltd.	Generator and distributor of electronic power
2015 - 2020	Director	Gulf TS2 Co., Ltd.	Generator and distributor of electronic power
2015 - 2020	Director	Gulf TS4 Co., Ltd.	Generator and distributor of electronic power
2015 - 2020	Director	Gulf VTP Co., Ltd.	Generator and distributor of electronic power
2015 - 2020	Director	Gulf NLL2 Co., Ltd.	Generator and distributor of electronic power
2018 - 2020	Chairman of the Board of Directors	Rayong Clean Energy Co., Ltd.	Electricity and Power Generation
2018 - 2020	Chairman of the Board of Directors	Glow Hemaraj Wind Co., Ltd.	Electricity and Power Generation
2018 - 2019	Director	Gheco-One Co., Ltd.	Electricity and Power Generation
2015 - 2019	Director	Houay Ho Thai Co., Ltd.	Holding company
2013 - 2017	Director	WHA Gunkul Green Solar Roof 2 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2017	Director	WHA Gunkul Green Solar Roof 4 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2017	Director	WHA Gunkul Green Solar Roof 5 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2017	Director	WHA Gunkul Green Solar Roof 8 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2017	Director	WHA Gunkul Green Solar Roof 9 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2017	Director	WHA Gunkul Green Solar Roof 10 Co., Ltd.	Generator and distributor of electronic power from solar energy
2013 - 2017	Director	WHA Gunkul Green Solar Roof 16 Co., Ltd.	Generator and distributor of electronic power from solar energy

### Other Companies

Period	Position	Company	Type of Business
2020 - Present	Director	SCB 10X Co., Ltd.	Investment and develop financial business
2012 - Present	Director	WHA Holding Co., Ltd.	Holding company
1993 - Present	Director	S and J Holding Co., Ltd.	Holding company
2018 - 2019	Director	Supernap (Thailand) Co., Ltd.	Server Service





## Mr. David Richard Nardone

**Age :** 65 years

**Position / Appointed Date :**

- **Vice Chairman of the Board of Directors**

Date of Appointment: 25 April 2016

- **Executive Committee Member**

Date of Appointment: 12 May 2016

### Education

Master of Business Administration, Northeastern University, Boston, USA

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Training

- Director Certification Program (DCP 57/2005), Thailand Institute of Directors (IOD)

### Work Experience (past 5 years)

#### Other Listed Companies

Period	Position	Company	Type of Business
2016 - Present	Executive Committee Member and Risk Management Committee Member	WHA Utilities and Power Public Company Limited	Utilities and Power
2008 - Present	Director	WHA Utilities and Power Public Company Limited	Utilities and Power

#### Subsidiary of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
1994 - Present	Director, Executive Committee Member and Group Executive Industrial and International	WHA Industrial Development Public Company Limited	Property developer

#### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2020 - Present	Vice Chairman of the Board of Directors	WHA TUS Co., Ltd.	Develop and operate an innovation project
2019 - Present	Director	WHA Industrial Development 2 (SG) Co., Ltd.	Holding company
2017 - Present	Director	WHA Industrial Zone Nghe An Joint Stock Company	Property Developer
2017 - Present	Director	WHA Industrial Management Services Vietnam Co., Ltd.	Consulting services and general management
2016 - Present	Director	WHA Industrial Development (SG) Pte. Ltd.	Holding company
2016 - Present	Director	WHA Industrial Development International Co., Ltd.	Holding company
2015 - Present	Director	WHA Industrial Development International (SG) Pte. Ltd.	Investment in associate/subsidiaries
2014 - Present	Director	WHA Eastern Seaboard Industrial Estate 4 Co., Ltd.	Property developer
2013 - Present	Director	Eastern Seaboard Property and Marina Services Co., Ltd.	Property for investment and marina services

#### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2012 – Present	Director	WHA Rayong 36 Co., Ltd.	Property developer
2005 - Present	Director	WHA Rayong Industrial Land Co., Ltd.	Property developer
2005 - Present	Director	WHA Saraburi Industrial Land Co., Ltd.	Property developer
2003 - Present	Director	The Park Residence Co., Ltd.	Real Estate Development and Service Management
2001 – Present	Director	WHA Industrial Development Engineering Co., Ltd.	Design and Construction Supervision Service
1997 - Present	Director	WHA Industrial Development International (BVI) Co., Ltd.	Holding company
1996 - Present	Director	WHA Eastern Seaboard Industrial Estate Co., Ltd.	Property developer
1995 - Present	Director	WHA Eastern Pipeline Services Co., Ltd.	Pipe Pack Rental
1994 - Present	Managing Director	Eastern Seaboard Industrial Estate (Rayong) Co., Ltd.	Property developer
1994 - Present	Director	WHA Eastern Industrial Estate Co., Ltd.	Property developer
1994 - 2020	Director	WHA Industrial Development International (Cayman) Co., Ltd.	Holding company

#### Joint Venture of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2020 - Present	Director	BIG WHA Industrial Gas Co., Ltd.	Industrial gas production and pipeline network distribution
2018 - Present	Managing Director	WHA Industrial Estate Rayong Co., Ltd.	Property developer

#### Subsidiaries of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Director	WHAUP (SG) 2DR PTE. LTD.	Holding company
2018 – Present	Director	WHA Solar Co., Ltd.	Investment and development of renewable energy business
2018 – Present	Director	WHAUP Nghe An Joint Stock Company	Industrial water and wastewater treatment services
2017 – Present	Director	WHAUP International Co., Ltd.	Holding company
2017 – Present	Director	WHAUP (SG) 1 PTE. Limited	Holding company
2017 – Present	Director	WHAUP (SG) 2 PTE. Limited	Holding company
2015 – Present	Director	WHA Energy 2 Co., Ltd.	Holding company
2011 – Present	Director	WHA Energy Co., Ltd.	Holding company
2005 – Present	Director	WHA Water Co., Ltd.	Water resources development and management

#### Joint Venture of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2021 - Present	Chairman of the Board of Directors	Eastern Seaboard Clean Energy Co., Ltd.	Electricity and Power Generation
2021 - Present	Chairman of the Board of Directors	Chonburi Clean Energy Co., Ltd.	Electricity and Power Generation
2020 - Present	Directors	Duong River Surface Water Plant Joint Stock Company	Water resources development and management
2013 - Present	Vice Chairman of the Board of Directors	Gheco-One Co., Ltd.	Electricity and Power Generation



## Mr. Vivat Jiratikarnsakul

**Age :** 64 years

**Position / Appointed Date :**

- **Director** Date of Appointment: 25 April 2016
- **Executive Committee Member**  
Date of Appointment: 12 May 2016

### Education

- Bachelor of Engineering (Sanitary Engineering), Chulalongkorn University

### Training

- Anti-Corruption for Executive Program (ACEP 2/2014), Thailand Institute of Directors (IOD)
- IOD Luncheon briefing 1/2013 : Thailand Economic Outlook 2013, Thailand Institute of Directors (IOD)

### Training

- Director Accreditation Program (DAP 2/2003), Thailand Institute of Directors (IOD)
- Director Certification Program (DCP 38/2003), Thailand Institute of Directors (IOD)

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5)

#### Other Listed Companies

Period	Position	Company	Type of Business
2016 - Present	Executive Committee Member and Corporate Governance Committee Member	WHA Utilities and Power Public Company Limited	Utilities and Power
2008 - Present	Director	WHA Utilities and Power Public Company Limited	Utilities and Power

#### Subsidiary of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
1995 - Present	Executive Committee Member and Chief Operating Officer	WHA Industrial Development Public Company Limited	Property developer
1994 - Present	Director	WHA Industrial Development Public Company Limited	Property developer

#### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2020 - Present	Director	WHA TUS Co., Ltd.	Develop and operate an innovation project
2019 - Present	Director	WHA Industrial Estate Development 2 (SG) Co., Ltd.	Holding company
2017 - Present	Director	WHA Industrial Zone Nghe An Joint Stock Company	Property Developer
2017 - Present	Director	WHA Industrial Management Services Vietnam Co., Ltd.	Consulting services and general management
2016 - Present	Director	WHA Industrial Development (SG) Pte. Ltd.	Holding company
2016 - Present	Director	WHA Industrial Development International Co., Ltd.	Holding company
2015 - Present	Director	WHA Industrial Development International (SG) Pte. Ltd.	Holding company
2014 - Present	Director	WHA Eastern Seaboard Industrial Estate 4 Co., Ltd.	Property developer



#### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2013 - Present	Director	Eastern Seaboard Property and Marina Services Co., Ltd.	Property developer
2012 - Present	Director	WHA Rayong 36 Co., Ltd.	Property developer
2005 - Present	Director	WHA Saraburi Industrial Land Co., Ltd.	Property developer
2005 - Present	Director	WHA Rayong Industrial Land Co., Ltd.	Property developer
2003 - Present	Director	The Park Residence Co., Ltd.	Real Estate Development and Service Management
2001 - Present	Director	WHA Industrial Development Engineering Co., Ltd.	Design and Construction Supervision Service
1997 - Present	Director	WHA Industrial Development International (BVI) Co., Ltd.	Holding company
1996 - Present	Director	WHA Eastern Seaboard Industrial Estate Co., Ltd.	Property developer
1995 - Present	Director	WHA Eastern Pipeline Services Co., Ltd.	Pipe Pack Rental
1994 - Present	Director	Eastern Seaboard Industrial Estate (Rayong) Co., Ltd.	Property developer
1994 - Present	Director	WHA Eastern Industrial Estate Co., Ltd.	Property developer
1994 - 2020	Director	WHA Industrial Development International (Cayman) Co., Ltd.	Holding company

#### Joint Venture of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2020 - Present	Director	BIG WHA Industrial Gas Co., Ltd.	Industrial gas production and pipeline network distribution
2018 - Present	Director	WHA Industrial Estate Rayong Co., Ltd.	Property developer

#### Subsidiaries of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Director	WHAUP (SG) 2 DR PTE. LTD.	Holding company
2018 - Present	Director	WHA Solar Co., Ltd.	Investment and development of renewable energy business
2018 - Present	Director	WHAUP Nghe An Joint Stock Company	Industrial water and wastewater treatment services
2017 - Present	Director	WHAUP (SG) 1 PTE. Limited	Holding company
2017 - Present	Director	WHAUP (SG) 2 PTE. Limited	Holding company
2017 - Present	Director	WHAUP International Co., Ltd.	Holding company
2015 - Present	Director	WHA Energy 2 Co., Ltd.	Holding company
2011 - Present	Director	WHA Energy Co., Ltd.	Holding company
2005 - Present	Director	WHA Water Co., Ltd.	Water resources development and management

#### Joint Venture of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Director	Duong River Surface Water Plant Joint Stock Company	Water resources development and management
2018 - Present	Director	Gheco-One Co., Ltd.	Electricity and Power Generation
2009 - Present	Director	Houay Ho Power Co., Ltd.	Electricity and Power Generation
2008 - Present	Director	Houay Ho Thai Co., Ltd.	Holding company

## Mr. Jakrit Chaisanit

Age : 47 year

Position / Appointed Date :

- **Director** Date of Appointment: 23 April 2012
- **Executive Committee Member** Date of Appointment: 25 May 2012
- **Corporate Governance Committee Member**  
Date of Appointment: 18 February 2014
- **Chief Operating Officer** Date of Appointment: 29 October 2015



### Education

- Master of Engineering in Project Management, Faculty of Engineering, University of Maryland
- Bachelor Degree of Engineering Program in Environmental Engineering, Chulalongkorn University

Shareholding Proportion (%) : 0.05

Family relationship between the director : None

### Training

- Director Accreditation Program (DAP 94/2012), Thailand Institute of Directors (IOD)

### Work Experience (past 5 years)

#### Subsidiaries of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2018 - Present	Director	Warehouse Asia Alliance Co., Ltd.	Property developer on warehouses and factories
2018 - Present	Director	WHA Venture Holding Co., Ltd.	Holding Company
2018 - Present	Director	WHA Alliance Co., Ltd.	Property developer on warehouses and factories
2014 - Present	Director	WHA Corporation (Hong Kong) Co., Ltd.	Holding Company

#### Joint Venture of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Director	Genesis Data Center Co., Ltd.	Digital Services
2018 - Present	Director	WHA KPN Alliance Co., Ltd.	Property developer on warehouses and factories
2018 - Present	Director	WHA Daiwa Logistics Property Co., Ltd.	Property developer on warehouses and factories

#### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Director	WHA Industrial Development 2 (SG) Co., Ltd.	Holding Company
2017 - Present	Director	WHA Industrial Zone Nghe An Joint Stock Company	Property developer
2016 - Present	Director	WHA Industrial Development International Co., Ltd.	Holding Company
2016 - Present	Director	WHA Industrial Development (SG) Pte. Ltd.	Holding Company
2015 - Present	Director	WHA Industrial Development Engineering Co., Ltd.	Design and Construction Supervision Service
2015 - Present	Director	WHA Industrial Building Co., Ltd.	Sell and Lease of Factory

#### Other Company

Period	Position	Company	Type of Business
2003 - Present	Managing Director	A & J Builder Co., Ltd.	Construction Business

## Mr. Krailuck Asawachatroj

**Age :** 48 year

**Position / Appointed Date :**

- **Director** Date of Appointment: 25 April 2016
- **Executive Committee Member** Date of Appointment: 12 May 2016
- **Chief Strategic Officer** Date of Appointment: 24 February 2016
- **Chief Financial Officer** Date of Appointment: 16 August 2019 to 31 August 2020



### Education

- Master of Financial Engineering, New York University, USA
- Master of Business Administration, Majoring Finance, Claremont Graduate University, USA
- Bachelor of Industrial Engineering, Thammasat University

### Training

- CPD Course - Financial Statement 2019, CPD Tutor
- Director Certification Program (DCP 175/2014), Thailand Institute of Directors (IOD)

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Subsidiaries of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2019 - 2020	Chief Financial Officer	WHA Industrial Development Public Company Limited	Property developer
2015 - Present	Director, Executive Committee Member and Chief Strategic Officer	WHA Industrial Development Public Company Limited	Property developer

#### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2018 - Present	Director	WHA Industrial Estate Rayong Co., Ltd.	Property Developer
2017 - Present	Director	WHA Industrial Zone Nghe An Joint Stock Company	Property Developer
2017 - Present	Director	WHA Industrial Management Services Vietnam Co., Ltd.	Consulting services and general management
2016 - Present	Director	WHA Industrial Development International Co., Ltd.	Holding Company
2016 - Present	Director	WHA Industrial Development (SG) Pte. Ltd.	Holding Company
2015 - Present	Director	WHA Eastern Industrial Estate Co., Ltd.	Property Developer
2015 - Present	Director	Eastern Seaboard Industrial Estate (Rayong) Co., Ltd.	Property Developer
2015 - Present	Director	WHA Eastern Seaboard Industrial Estate Co., Ltd.	Property Developer
2015 - Present	Director	WHA Saraburi Industrial Land Co., Ltd.	Property Developer
2015 - Present	Director	WHA Rayong Industrial Land Co., Ltd.	Property Developer
2015 - Present	Director	WHA Eastern Pipeline Services Co., Ltd.	Pipe Pack Rental
2015 - Present	Director	WHA Industrial Development International (BVI) Co., Ltd.	Holding Company
2015 - Present	Director	The Park Residence Co., Ltd.	Real Estate Development and Service Management
2015 - Present	Director	WHA Industrial Development Engineering Co., Ltd.	Design and Construction Supervision Service
2015 - Present	Director	WHA Industrial Development International (SG) Pte. Ltd.	Holding company in overseas
2015 - Present	Director	WHA Rayong 36 Co., Ltd.	Property developer
2015 - Present	Director	Eastern Seaboard Property and Marina Services Co., Ltd.	Property developer
2015 - Present	Director	WHA Eastern Seaboard Industrial Estate 4 Co., Ltd.	Property developer
2015 - Present	Director	WHA Industrial REIT Management Co., Ltd.	Trust Manager
2015 - 2020	Director	WHA Industrial Development International (Cayman) Co., Ltd.	Holding company





## Mr. Narong Kritchanchai

**Age :** 44 year

**Position / Appointed Date :**

- **Director** Date of Appointment: 23 April 2012
- **Executive Committee Member** Date of Appointment: 25 May 2012
- **Corporate Governance Committee Member**  
Date of Appointment: 18 February 2014
- **Chief Legal Officer** Date of Appointment: 24 February 2016

### Education

- Master of Laws, Cornell University, New York USA
- Bachelor of Laws, Thammasat University

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Training

- Director Accreditation Program (DAP 94/2012),  
Thailand Institute of Directors (IOD)

### Work Experience (past 5 years)

#### Subsidiaries of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2017 - Present	Director	WHA Venture Holding Co., Ltd.	Holding company
2017 - Present	Director	WHA Alliance Co., Ltd.	Property developer on warehouses and factories
2017 - Present	Director	Warehouse Asia Alliance Co., Ltd.	Property developer on warehouses and factories

#### Subsidiary of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2017 - Present	Director	WHA Industrial Zone Nghe An Joint Stock Company	Property developer
2015 - Present	Director	WHA Industrial Building Co., Ltd.	Sell and Lease of Factory

#### Joint Venture of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Director	WHA KPN Alliance Co., Ltd.	Property developer on warehouses and factories

#### Other Companies

Period	Position	Company	Type of Business
2006 - Present	Director	Nakit Property Co., Ltd.	Property developer
2006 - Present	Director	RL Counsel Co., Ltd.	Legal Counsel

## Mr. Somsak Boonchoyruengchai

Age : 50 year

Position / Appointed Date :

- **Director** Date of Appointment: 23 April 2012
- **Executive Committee Member** Date of Appointment: 25 May 2012
- **Chairman of the Corporate Governance Committee**  
Date of Appointment: 18 February 2014
- **Chief Accounting Officer** Date of Appointment: 18 August 2019



### Education

- Master of Accounting, Faculty of Commerce and Accounting, Chulalongkorn University
- Bachelor of Accounting, Faculty of Business Administration, Rajamangala University of Technology

### Accountant Training Program:

- TFRS 15 (Income from contract), TFRS 16 (Leases), TFRS 9 (Classification and Measurement), TFRS 9 (Impairment) and TFRS 9 (Hedge Accounting), DST

### Training

- Director Accreditation Program (DAP 94/2012), Thailand Institute of Directors (IOD)

Shareholding Proportion (%) : 0.01

Family relationship between the director : None

### Work Experience (past 5 years)

#### Subsidiaries of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2018 - Present	Director	WHA Venture Holding Co., Ltd.	Holding company
2018 - Present	Director	WHA Alliance Co., Ltd.	Property developer on warehouses and factories
2018 - Present	Director	Warehouse Asia Alliance Co., Ltd.	Property developer on warehouses and factories

#### Joint Venture of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2013 - Present	Director	WHA KPN Alliance Co., Ltd.	Property developer on warehouses and factories

#### Subsidiaries of WHA Industrial Development Public Company Limited

Period	Position	Company	Type of Business
2018 - Present	Director	WHA Industrial Building Co., Ltd.	Sell and Lease of Factory
2017 - Present	Director	WHA Industrial Zone Nghe An Joint Stock Company	Property developer

#### Other Companies

Period	Position	Company	Type of Business
2019 - Present	Director	WHA Real Estate Management Co., Ltd.	Property Developer
2018 - Present	Director	S and J Holding Co., Ltd.	Holding company
2004 - Present	Director	Honesty Auditing Co., Ltd.	Accounting Audit Service
1995 - Present	Director and Managing Partner	A. Ruengroj Furniture Part., Ltd.	Furniture Producer and Interior Design



## Mrs. Anchalee Chavanich

**Age :** 70 year

**Position / Appointed Date :**

- **Independent Director**

Date of Appointment: 22 June 2020

- **Chairman of the Audit Committee**

Date of Appointment: 22 June 2020

### Education

- Master of Science (Engineering Management), University of Missouri-Rolla, USA
- Bachelor of Engineering (Industrial), Chulalongkorn University

### Certifications

- The Rule of Laws for College of the Constitution Court (2/2014), The Constitutional Court of the Kingdom of Thailand
- The Executive Program in Energy Literacy for Sustainable Future (TEA 3/2014), Thailand Energy Academy
- The Fourth Training Course on Administrative Justice for Executives (4/2012), The Office of the Administrative Courts of Thailand
- Advanced Security Management Program, National Defense College of Thailand (ASMP 3/2012)
- Executive Leadership Program (7/2008), Capital Market Academy

### Certifications

- Role of Chairman Program (RCP 13/2006), Thailand Institute of Directors (IOD)
- Audit Committee Program (ACP 1/2004), Thailand Institute of Directors (IOD)
- Director Certification Program (DCP 45/2004), Thailand Institute of Directors (IOD)
- Finance for Non-Finance Director (FND 10/2004), Thailand Institute of Directors (IOD)
- Politics and Governance in Democratic Systems for Executives (6/2002), King Prajadhipok's Institute
- National Defense College (NDC 11/1998), the Joint State-Private Sector Course

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Other Listed Companies

Period	Position	Company	Type of Business
2018 - Present	Independent Director and Chairman of the Audit Committee	Inoue Rubber (Thailand) Public Company Limited	Elastomer Producer
2016 - Present	Independent Director, Chairman of the Audit Committee and Corporate Governance Committee Member	B. Grimm Power Public Company Limited	Power Business
2016 - 2020	Director	WHA Industrial Development Public Company Limited	Property Developer

#### Other Companies

Period	Position	Company	Type of Business
2020 - Present	Director of Foundation	The Engineering Institute of Thailand Under H.M. The King's Patronage of Foundation	-
2019 - Present	Advisor	The Energy Commission, House of Representatives	-
2018 - Present	Honorary Member	The University Council, Dhurakij Pundit University	-
2017 - Present	Honorary Advisor	Eastern Economic Corridor Office of Thailand (EEC)	-
2011 - Present	President	Thai Industrial Estate and Strategic Partner Association	-
2000 - Present	President of Foundation	Coral & Coastal Conservation Foundation	-





## Lt. Gen. Prachya Chalermwat, Ph. D.

**Age :** 60 year

**Position / Appointed Date :**

- **Independent Director**  
Date of Appointment: 22 June 2020
- **Risk Management Committee Member**  
Date of Appointment: 22 June 2020

### Education

- Ph. D. in Computational Science, George Mason University, USA
- Master of Computer Science, The George Washington University, USA
- Bachelor of Electrical Engineering, Chulachomklao Royal Military Academy

### Training

- SANS Certificate (SEC504), Ethical Hacking and Incident Response
- AcInfotech: CSSP Preparation
- Strategic Board Master Class (SBM 9/2020), Thailand Institute of Directors (IOD)
- Risk Management Program for Corp. Leaders (RCL 15/2019), Thailand Institute of Directors (IOD)

### Training

- Role of Chairman Program (RCP 44/2019), Thailand Institute of Directors (IOD)
- IT Governance Program (ITG 9/2018), Thailand Institute of Directors (IOD)
- National Defense Course (Class 60/2018), National Defense Collage of Thailand
- Director Certification Program (DCP 210/2015), Thailand Institute of Directors (IOD)
- Director Accreditation Program (DAP 51/2013), Thailand Institute of Directors (IOD)

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Other Companies

Period	Position	Company	Type of Business
2020 - Present	Secretary General as National Cybersecurity Committee	National Cybersecurity Committee (Report directly to the Prime minister)	
2018 - Present	Director	Metropolitan Electricity Authority	State Enterprise
2018 - Present	Security Advisor	Workpoint Entertainment Public Company Limited	Entertainment
2008 - Present	IT Advisor	Haadthip Public Company Limited	Sparkling Beverage Manufacturer
2018 - 2020	Senior Advisor	Office of Permanent Secretary for Defense	Governance Agency
2014 - 2017	Director	Provincial Electricity Authority	State Enterprise

## Dr. Apichai Boontherawara

**Age :** 66 year

**Position / Appointed Date :**

- **Independent Director** Date of Appointment: 29 April 2014
- **Audit Committee Member** Date of Appointment: 29 April 2014
- **Chairman of the Nomination and Remuneration Committee**  
Date of Appointment: 23 January 2017



### Education

- Ph.D. in Economics, University of Washington, USA
- Master Degree of Economics (English Program), Thammasat University
- Bachelor Degree of Economics, Thammasat University

### Certifications

- Strategic Board Master Class (SBM 9/2020), Thailand Institute of Directors (IOD)
- Monitoring the Internal Audit Function Program (MIA 12/2012), Thailand Institute of Directors (IOD)
- Director Certification Program (DCP 53/2005), Thailand Institute of Directors (IOD)

### Certifications

- Audit Committee and Continuing Development Program (ACP 8/2005), Thailand Institute of Directors (IOD)
- Director Accreditation Program (DAP 17/2004), Thailand Institute of Directors (IOD)

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Other Companies

Period	Position	Company	Type of Business
2017 - Present	Director	Kang Yong Electric Public Company Limited	Electricity Producer
2017 - Present	Director	Thai Group Holdings Public Company Limited	Holding Company
2011 - Present	Director and Vice Chairman of Executive Committee	Southeast Capital Co., Ltd.	Finance and Insurance
2011 - Present	Director and Vice Chairman of Executive Committee	Southeast Insurance Public Company Limited	Finance and Insurance
2011 - Present	Director and Vice Chairman of Executive Committee	Southeast Life Insurance Public Company Limited	Finance and Insurance
2009 - Present	Audit and Risk Management Committee	Chiang Mai University	Educational Institution



## Dr. Somsak Pratomsrimek

**Age :** 48 year

**Position / Appointed Date :**

- **Independent Director**

Date of Appointment: 23 April 2012

- **Audit Committee Member**

Date of Appointment: 23 April 2012

- **Risk Management Committee Member**

Date of Appointment: 18 February 2014

### Education

- Ph.D. in Accounting, Chulalongkorn University
- Master of Science in Accounting, Thammasat University
- Bachelor of Accountancy, Burapha University

### Certifications

- Certificate of Thai Financial Reporting Standard, 2013
- Director Accreditation Program, (DAP 94/2012), Thailand Institute of Directors (IOD)
- Certified Public Accountant (CPA) Thailand
- Diploma of Thai Financial Reporting Standards (DipTFR) Issued by TFAC (Thailand)

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Other Companies

Period	Position	Company	Type of Business
2016 - Present	Managing Director	CPA Solution Co., Ltd.	Accounting Training Consultant
2017 - 2018	Executive Committee Member	Bangkok Mass Transit Authority (BMTA)	State Enterprise, Ministry of Transport





## Dr. Kritsana Sukboonyasatit

Age : 49 year

Position / Appointed Date :

- **Independent Director**  
Date of Appointment: 23 April 2012
- **Audit Committee Member**  
Date of Appointment: 23 April 2012
- **Nomination and Remuneration Committee Member**  
Date of Appointment: 18 February 2014
- **Risk Management Committee Member**  
Date of Appointment: 18 February 2014

### Education

- Ph. D. in Arts, Khon Kaen University
- Master of Business Administration, Chulalongkorn University
- Bachelor of Business Administration, Chiang Mai University

### Certifications

- Director Accreditation Program, (DAP 96/2012), Thailand Institute of Directors (IOD)
- Lead Assessor (TQA 2004), Office of Thailand Quality Award
- Productivity Improvement Japan Productivity Center, (1998)

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Other Companies

Period	Position	Company	Type of Business
2003 - Present	Managing Director	Business Excellence Consulting Co., Ltd.	Consultant
2003 - Present	Auditor of the Award Thailand	Office of Thailand Quality Award	Government Agency

## Mr. Natthapatt Tanboon-ek

Age : 45 year

Position / Appointed Date :

- **Executive Committee Member**

Date of Appointment: 1 September 2020

- **Chief Financial Officer**

Date of Appointment: 1 September 2020



### Education

- Master of Business Administration (Finance), University of Baltimore, MD, USA
- Bachelor of Engineering (Electrical), Chulalongkorn University

### Certifications

- e-learning CFO's Refresh Course (English Version) 2020, Thailand Securities Institute (TSI), The Stock Exchange of Thailand
- New Revenue Recognition Criteria according to TFRS 15 for General Business Program (Class 4/2019), Federation of Accounting Professions (TFAC)
- Summary of changes and significant issues of TFRS (revised version) Program (Class 2/2019), Federation of Accounting Professions (TFAC)

### Certifications

- Executive Development Program (EDP) Class 11, Thai Listed Company Association
- Financial Advisor License, Securities and Exchange Commission
- Credit Derivative and CDO Master Class Training Course
- Beta Alpha Gamma (awards granting to top 10% of MBA students of accredited universities in USA)
- Finance for Financial Manager, GDF SUEZ University
- Company Secretary Program (CSP 33/2009), Thai Institute of Directors (IOD)

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Other Listed Companies

Period	Position	Company	Type of Business
2019 - Present	Executive Committee Member	WHA Utilities and Power Public Company Limited	Utilities and Power
2019 - 2020	Chief Financial Officer	WHA Utilities and Power Public Company Limited	Utilities and Power
2017 - 2019	Chief Financial Officer	Sernsang Power Corporation Public Company Limited	Utilities and Power
2008 - 2017	Senior Vice President - Treasurer	Glow Energy Public Company Limited	Power

#### Joint Venture of WHA Corporation Public Company Limited

Period	Position	Company	Type of Business
2020 - Present	Director	WHA KW ALLIANCE Co., Ltd.	Development, construction, management and operation of business complex facilities and real estate projects.

#### Joint Venture of WHA Utilities and Power Public Company Limited

Period	Position	Company	Type of Business
2019 - Present	Director	Eastern Seaboard Clean Energy Co., Ltd.	Holding Company
2019 - Present	Director	Chonburi Clean Energy Co., Ltd.	Electric Power Generation and Transmission
2019 - Present	Director	Houay Ho Thai Co., Ltd.	Holding Company
2019 - Present	Director	B. Grimm Power (WHA) 1 Co., Ltd.	Electric Power Generation and Transmission
2019 - Present	Director	WHA Gunkul Green Solar Roof 1 Co., Ltd.	Electric Power Generation and Transmission
2019 - Present	Director	WHA Gunkul Green Solar Roof 3 Co., Ltd.	Electric Power Generation and Transmission
2019 - Present	Director	WHA Gunkul Green Solar Roof 6 Co., Ltd.	Electric Power Generation and Transmission
2019 - Present	Director	WHA Gunkul Green Solar Roof 17 Co., Ltd.	Electric Power Generation and Transmission
2019 - Present	Director	Gulf WHA MT Natural Gas Distribution Co., Ltd.	Natural Gas Distributor
2019 - Present	Director	WHA Eastern Seaboard NGD2 Co., Ltd.	Natural Gas Distributor
2019 - Present	Director	WHA Eastern Seaboard NGD4 Co., Ltd.	Natural Gas Distributor
2019 - Present	Director	Gulf JP NLL Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf Solar Co., Ltd.	Producing and distributing electricity by solar photovoltaic rooftop
2019 - Present	Director	Gulf Solar BV Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf Solar TS1 Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf Solar TS2 Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf Solar KKS Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf TS1 Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf TS2 Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf TS3 Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf TS4 Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf VTP Co., Ltd.	Generator and distributor of electronic power
2019 - Present	Director	Gulf NLL2 Co., Ltd.	Generator and distributor of electronic power
2562 - 2563	กรรมการ	บริษัท ระยอง คลีน เอ็นเนอร์ยี่ จำกัด	ผลิตและส่งไฟฟ้า



## Mr. Sirisak Kijruksa

Age : 59 year

Position / Appointed Date :

- **Corporate Secretary** Date of Appointment: 12 May 2016

### Education

- Bachelor Degree of Accounting, Bangkok University

**Shareholding Proportion (%) :** None

**Family relationship between the director :** None

### Work Experience (past 5 years)

#### Subsidiary of WHA Corporation PCL

Period	Position	Company	Type of Business
2016 - Present	Director	WHA Industrial Development Engineering Co., Ltd.	Design and Construction Supervision Service
2009 - Present	Director of Legal	WHA Industrial Development PCL.	Property developer
2009 - Present	Corporate Secretary	WHA Industrial Development PCL.	Property developer



## MAJOR DEVELOPMENTS

THE COMPANY HAD SERIES OF MAJOR DEVELOPMENTS SUMMARIZED PER BELOW TABLES

### Business and Operation

2018

#### Major Development

- Jan**
- On 4 January, the Company Group sold 19 leasehold units of factory buildings, and 2 leasehold units of warehouses, located in the industrial estates of the Company Group in Rayong and Chonburi and WHA industrial area in Saraburi, with a total area of 55,131 sq.m. or equivalent to the asset value of THB 1,589.85 mm to HREIT trust.
  - In January, WHAUP operated commercially to sell water for industry and waste water treatment in WHA Eastern Seaboard Industrial Estate No. 4 (WHA ESIE4) with 3,600 m<sup>3</sup> of industrial water production capacity per day and the amount of waste water treatment capacity of 1,500 m<sup>3</sup> per day.
- Apri**
- In April, the WHAUP received a corporate credit rating and subordinated debentures without guarantee at the A- level and the rating outlook at Stable by TRIS Rating.
- May**
- On 16 May, WHAID entered into Shareholder Agreement with IRPC PCL. (“IRPC”) so as to establish a joint venture company with registered capital of THB 650 mm in which WHAID holds 60%, and IRPC holds 40% of the shares in order to develop industrial estate on land area of approximately 2,152 rai located at Ban Khai, Rayong.
  - WHAUP established a subsidiary in order to invest in industrial water business in WHA Industrial Zone Nghe An project, Vietnam and obtained 49-year right to operate the business in the area. WHAUP will develop water utilities covering the first phase of the project with total area of approximately 3,100 rai and demand for industrial water, and wastewater treatment of approximately 12,000 m<sup>3</sup>, and 9,600 m<sup>3</sup> per day.
- Jun**
- WHA Infonite, a subsidiary of the Company has invested in shares purchase of SuperNap (Thailand) Company Limited (“SuperNap”) in the amount of 15% of the total shares or equivalent to THB 211.5 mm (SuperNap has the registered and paid-up capital of THB 2,000 mm and THB 1,410 mm, respectively). SuperNap operates a data center certified by Tier IV standard and provides a server co-location, consulting services, training in term of data center building and data center operating as well as related services.
- Jul**
- After the land expropriation was completed, the Company was handed over the area in the WHA Industrial Zone Nghe An Phase 1 project from the Vietnamese government, so as to start developing the project.
  - In 2018, WHAUP, the company’s subsidiaries, has started to operate commercially additional solar power plants so as to generate electricity with the production capacity of 2.6 equity megawatts.
  - In the third quarter, the Reclaimed Water Project (RO) project of WHAUP in WHA Eastern Industrial Estate (WHA EIE) has started commercial operations with a production capacity of 7,500 m<sup>3</sup> per day.

2018

## Major Development

- Nov** • On 19 November, the Company signed a Memorandum of Understanding (MoU) with Yunnan Energy Investment Group (YEIG) to develop strategic logistics cooperation between Yunnan, Laos and Thailand under “One Belt, One Road” policy. Overall, the MoU covers cooperation in the areas of industrial properties, road and rail transportation, cold chain transportation, central Asia railway, the construction of an Asia-Pacific Model E-port network, car trading and others between China, Thailand and ASEAN countries.
- Dec** • On 4 December, the Company Group had and long-term leased assets of warehouses, factories and offices in four projects ie. WHA Mega Logistic Center Project Rama 2 km.35, WHA KPN Mega Logistics Center Project km.23, DSGHSIL Project, and WHA Central Mega Logistic Center Wang Noi 63 to WHART totally leased area of 156,534.61 square meters accounting for asset value of THB 4,464.5 mm.
- In December, WHA Eastern Seaboard NGD2 Company Limited (“NGD2”), joint venture company held indirectly by WHAUP 35% through Gulf WHA MT Company Limited (“Gulf WHA MT”), officially CODs Natural Gas Distribution Project to customers in WHA Eastern Seaboard Industrial Estate 2.
- On 24 December, the Company Group sold 9 leasehold units of factory buildings located in the Saraburi Industrial Zone, with a total area of 15,916 sq.m. accounting for asset value of THB 477 mm.

2019

## Major Development

- Jun** • Gulf NLL 2 Power Plant Project (SPP) officially started COD with the installed capacity of 127 megawatts or equivalent to 32 equity megawatts.
- Mar** • The Company Group signed additional solar power plants with the production capacity of 5.00 megawatts, accumulated to 14.3 megawatts owned by the Group. The power plant is under construction and expected to be COD within first quarter 2020
- on 28 March, WHAUP Nghe An Joint Stock Company (“WUPNA”), a subsidiary of WHAUP, acquired 47.31% of shares in Cua Lo Water Supply Joint Stock Company, a company in Vietnam, with total water production capacity of 13,000 cubic meters per day.
- Apri** • On 1 April, WHAID launched WHA Eastern Seaboard Industrial Estate 3 (WHA ESIE 3), the Group’s 10th newly-operated industrial estate in Thailand located in the EEC area comprising a total of 2,198 rai
- WHA Industrial Zone Nghe An Project Phase 1 Milestone 1 was substantially completed and expected to be ready for transfer in 2020
- Oct** • The Company received 5 Star Rating for Good Corporate Governance evaluated by Thai Institute of Directors (IOD).
- On 25 October, WHAUP (SG) 2DR PTE. LTD. (“WUPSD”), a subsidiary of WHAUP (SG) 1 PTE. LTD. acquired 34 percent shares of Duong River Surface Waterplant Joint Stock Company (“SDWTP”), a leading water supplier in Hanoi, Vietnam. As of 31 December 2019, SDWTP has a production capacity of 110 million cubic meters per year.



2019

## Major Development

- Nov**
- WHAID bagged the 2019 “People’s Choice” Award and the 2019 AMCHAM CSR Excellence (ACE) Recognition Award, “Platinum Level”, during the annual award ceremony organized by the American Chamber of Commerce in Thailand (AMCHAM).
  - WHA Industrial Estate Rayong (WHA IER) received a Smart Industrial Estate certificate in the New City category during a presentation ceremony at the Digital Thailand Big Bang. The industrial estate was recognized by Digital Economy Promotion Agency’s Smart City Thailand Office for its commitment to developing a smart industrial estate (Smart IE). The certificate program is aimed at supporting sustainable city management using technology and innovations, in line with the government’s Thailand 4.0 initiative.
  - Chonburi Clean Energy Company Limited, an associate of WHAUP holding 33.33 percent shares, started COD industrial waste to energy power plant in WHA CIE 1 with an installed power generating capacity of 8.6 megawatts or equivalent to 2.88 equity megawatts supporting disposal of up to 400 tons in non-hazardous industrial wastes per day or 100,000 tons per year.
- Dec**
- The Company Group sold and leased long term assets of warehouses factories, and offices in 5 projects ie. WHA Mega Logistics Center Project (Chonharnpichit Km.3, phase1), DTS Factory Project, Roehling Factory Project, WHA KPN Mega Logistics Center Project (Bangna-Trad Km.23, phase 2), and WHA Mega Logistics Center Project (Chonharnpichit Km.3, phase2) to WHA Premium Growth Real Estate Investment Trust “WHART” totally lease area 155,237 square meters with the total asset value of THB 4,880.3 mm.

2020

## Major Development

- Jun**
- The Company continues to adhere with an intention of the Thai Private Sector Collective Action against Corruption Thai CAC (Thai CAC). In June of this year, the Company has been certified to renew as member of the Thai CAC for another 3 years from 2017. The said certification shall be valid for 3 years from 30 June 2020 to 29 June 2023.
- Aug**
- WHAID had enter into the joint venture agreement with Bangkok Industrial Gas Co., Ltd., Thailand’s leading provider for innovation of integrated industrial gas, in order to construct the first industrial gas production plant and gas pipeline system in the Eastern Seaboard Industrial Estate (ESIE), with purpose to serve customers utilizing Nitrogen Gas. Also, WHAID had planned to expand this service to its other Industrial Estates in Thailand in long term, which this will be consistent with the Company’s concept of being “Smart Eco Industrial Estates”.
- Sep**
- WHA Group in cooperation with TUS Holdings Co., Ltd. (TUS), established a joint venture company named WHA TUS Co., Ltd. (WHA TUS), in order to open the first innovation center for science and technology in Thailand under the name of “TusPark WHA” where it is located in the center of Bangkok on Rama 4 Road, on the land under the management of Chulalongkorn University, with the area of 1,408 square meter, with more than 230 working desks, where can accommodate more than 80 startup companies.
- Oct**
- The Company officially launched the first WHA E-commerce Park Project in Thailand covering the total area of 200,000 square meter, located on Bangna-Trad Road KM. 37, Bang Pakong District, Chachoengsao Province, where is a strategic location convenient for travel and transport.

- Oct**
- WHAUP opened the largest Solar Car Park Project in Thailand on the parking lot, having the total roof area of 31,000 square meters, with total power generation capacity of 4.88 Megawatts.
  - 6 Industrial Estates of WHA were obtained the ECO Industrial Town Award from the ECO Innovation Forum 2020 event organized by the Industrial Estate Authority of Thailand, Department of Industrial Works, Federation of the Thai Industries, and the Water and Environment Institute for Sustainability.
- Nov**
- The Company was assessed on good corporate governance by the Thai Institute of Directors (IOD) as continuously being in the 5-star group which is the highest score. In this regard, the companies is one of the 3<sup>rd</sup> highest score group\* among all assessed companies in the Stock Exchange of Thailand and the SET50 group, and obtained the 2<sup>nd</sup> highest score\* from all assessed companies in the real estate and construction sector. (\*Reference: this information was obtained from the results of the Corporate Governance Report of Listed Companies Year 2020, an individual report of the Company prepared by the Thai Institute of Directors as per the request of the Company).
  - The Company was selected as member of the Thailand Sustainability Investment (THSI) for the year 2020.
  - WHA Group was obtained the AMCHAM CSR Excellence Recognition Award for 11 consecutive years, and in the “Platinum Level” for 2 consecutive year.
  - WHA Tower, the new head office of the Company in Bang Na area, designed by Palmer & Turner (Thailand) Ltd., was obtained the Commercial High Rise Architecture Thailand Award.
- Dec**
- On 3 December, WHA Group sold and long term leased for warehouses, factories and office buildings, totaling 3 projects ie. WHA Mega Logistics Center Project (Laem Chabang 1), WHA Mega Logistics Center Project (Laem Chabang 2) and WHA KPN Mega Logistics Center Project (Bangna-Trad Road KM. 23 Phase 3), to WHA Premium Growth Real Estate Investment Trust “WHART”, having a total leasing area of approximately 128,789 square meter with the total assets value of Baht 3,234.0 million.
  - On 14 December, WHA Group sold 15 leasehold units of warehouses, factories and office buildings, located in WHA Chonburi Industrial Estate 1 (WHA CIE1), WHA Eastern Seaboard Industrial Estate 1 (WHA ESIE 1), WHA Logistics Park 2 (WHA LP 2), WHA Logistics Park 4 (WHA LP 4), and WHA Saraburi Industrial Land, having the total building area of 48,127 square meter to Hemaraj Leasehold Real Estate Investment Trust “HREIT” which was equivalent to the total assets value of Baht 1,337.7 million.
  - WHAID had signed a Memorandum of Understanding (MoU) with Thanh Hoa Provincial People’s Committee (Thanh Hoa PPC) for the development of two industrial zones in the province. Positioning itself to attract high value technology companies, the first project will be named “WHA Smart Technology Industrial Zone – Thanh Hoa” with the total area of approximately 3,750 rai (600 hectare), plus an additional residential area of 188 to 313 rai (30 to 50 hectares). The second project, will be named WHA Northern Industrial Zone – Thanh Hoa, with the total area of approximately 3,375 rai (540 hectares), will target downstream industries including plastics, rubber, chemical and bio-chemical products, metal fabrication and foundries, building materials, automotive parts, mechanical assembly, appliances and others. The Company will immediately proceed with request for license and project approval. The construction for WHA Smart Technology Industrial Zone - Thanh Hoa and WHA Northern Industrial Zone - Thanh Hoa expected to commence in the year 2023 and 2022, respectively.

## The Company's Capital

2018

### Development

**Jan** • On January 5, the Company has increased the paid-up capital from THB 1,432,243,032.10 to THB 1,432,630,019.10 from the exercise of WHA-W1 warrants on 25 December 2017.

**Apri** • On 27 April, the Company issued debentures No.1/2561 to institutional investors and/or high net worth investors in the amount of THB 3,000 mm which comprises of 2 tranches as shown in the table below:

No.	No. of units	Size (THB mm)	Fixed interest rate (per annum)	Tenor (years)
1	1,900,000	1,900	2.39	3
2	1,100,000	1,100	2.87	5

**Jun** • On 26 June, WHAUP issued THB debentures No.1/2561 to institutional investors and high net worth investors in the amount of THB 5,000 mm which comprises of 3 tranches as shown in the table below:

No.	No. of units	Size (THB mm)	Fixed interest rate (per annum)	Tenor (years)
1	2,390,000	2,390	2.65	3
2	1,290,000	1,290	3.17	5
3	1,320,000	1,320	3.66	7

**July** • On 9 July, the Company has increased the paid-up capital from THB 1,432,630,019.10 to THB 1,433,426,716.90 from the exercise of WHA-W1 warrants on 25 June 2018.

**Sep** • On 18 September, the Company issued THB 300 mm debentures No.2/2561 to Private Placement less than 10 investors (PP10), having a tenor of 1 year at a fixed rate of 2.00% per annum.

**Oct** • On 19 October, the Company issued debentures No.3/2561 to institutional investors and/or high net worth investors in the amount of THB 3,500 mm which comprises of 4 tranches as shown in the table below:

No.	No. of units	Size (THB mm)	Fixed interest rate (per annum)	Tenor (years)
1	337,800	337.80	2.77	2
2	454,200	454.20	3.48	3.5
3	328,000	328.00	3.74	5
4	2,380,000	2,380.00	4.03	7

**Dec** • On 25 December, there were 5,581,379 units of warrants exercised by WHA-W1 and the Company has increased the paid-up capital from THB 1,433,426,716.90 to THB 1,439,141,825.20 on 7 January 2019.



## The Company's Capital

2019

### Development

- Apr** • On 24 April, the Company issued debentures No.1/2562 for to institutional investors and/or high net worth investors in the amount of THB 3,500 mm which comprises of 3 tranches as shown below:
  - THB 2,100 mm, tenor 3 years at a fixed rate of 2.95%
  - THB 1,000 mm, tenor 5 years at a fixed rate of 3.40%
  - THB 400 mm, tenor 7 years at a fixed rate of 3.69%
- Jun** • On 27 June, the Company issued THB 200 mm debentures No.2/2562 to Private Placement less than 10 investors (PP10), having a tenor of 3 years 3 days at a fixed rate of 2.75% per annum.
- Jul** • On 1 July, the Company has increased the paid-up capital from THB 1,439,141,825.20 to THB 1,470,909,845.20 from the exercise of WHA-W1 warrants on 25 June 2019.
  - On 2 July, the Company issued THB 2,000 mm debentures No.3/2562 to Institutional investors, having a tenor of 2 years 11 months and 24 days at a fixed rate of 2.75% per annum.
- Dec** • On 25 December, there were 23,194,565 units of warrants exercised by WHA-W1 and the Company has increased the paid-up capital from THB 1,470,909,845.20 to THB 1,494,660,151.90 on 3 January 2019.

2020

### Development

- Feb** • On 21 February, WHAUP issued debentures No.1/2563 to institutional investors and/or high net worth investors in the amount of THB 3,000 mm as detailed below:
  - THB 1,500 mm, tenor 1.83 years at a fixed rate of 2.28%
  - THB 1,500 mm, tenor 10 years at a fixed rate of 3.25%
- Mar** • On 4 March, there were 22,771 units of warrants exercised by WHA-W1 and the Company has increased the paid-up capital from THB 1,494,660,151.90 to THB 1,494,683,467.90 on 13 March 2020
- Jul** • On 3 July, the Company issued debentures No.1/2563 to institutional investors and/or high net worth investors in the amount of THB 4,000 mm as detailed below:
  - THB 2,050 mm, tenor 3 years at a fixed rate of 3.30%
  - THB 1,450 mm, tenor 4 years at a fixed rate of 3.75%
  - THB 500 mm, tenor 5 years at a fixed rate of 4.20%
- Sep** • On 11 September, the Company issued THB 100 mm debentures No. 2/2563 to Private Placement less than 10 investors (PP10), having a tenor of 3 years, at a fixed rate of 2.80% per annum.



## NATURE OF BUSINESS OPERATION

The Company is the leader of one-stop service which covers all of customer demands relating to logistics service of which classifies into 4 business as follows;



1



**Logistics Business**



3



**Utilities & Power Business**



2



**Industrial Development Business**



4



**Digital Platform Business**

Revenue structure, as recorded in consolidated financial statement of the Company and its subsidiaries during 2018-2020, can be summarized as follows;

Unit : Million Baht

	2018 (Audited)		2019 (Audited)		2020 (Audited)	
Rental, service and utilities income	3,279.3	28.2%	3,306.6	24.7%	3,379.1	35.9%
: Rental and service income from warehouses, distribution centers and factories	1,183.1	10.2%	1,048.0	7.8%	1,336.0	14.2%
: Utilities income	2,096.2	18.0%	2,258.7	16.9%	2,043.2	21.7%
Income from sales of real estate	5,130.5	44.1%	7,156.4	53.5%	3,932.1	41.8%
: Income from industrial land sale	2,124.9	18.3%	3,505.0	26.2%	1,883.9	20.0%
: Income from investment properties	3,005.6	25.9%	3,651.3	27.3%	2,048.1	21.8%
Total income from sales and services	8,409.8	72.4%	10,463.0	78.2%	7,311.2	77.7%
Other income	669.8	5.8%	977.1	7.3%	886.7	9.4%
: Dividend income from Property Fund and REIT & Trust management fee for REIT, and property management fee for Property Fund and REIT	399.6	3.4%	540.7	4.0%	527.4	5.6%
: Other income <sup>1</sup>	270.2	2.3%	436.4	3.3%	359.2	3.8%
Total Revenue	9,079.6	78.1%	11,440.1	85.5%	8,197.9	87.1%
Share of profit (loss) of associates and joint ventures <sup>2</sup>	2,542.6	21.9%	1,945.693	14.5%	1,208.8	12.9%
Total income with share of profit (loss)	11,622.2	100.0%	13,385.8	100.0%	9,406.6	100.0%

Remark:

<sup>1</sup> Other income consisted of interest income, gain from sale of short-term investments and others.

<sup>2</sup> Share of profit of associates and joint ventures mainly came from power business.

## Products and Services



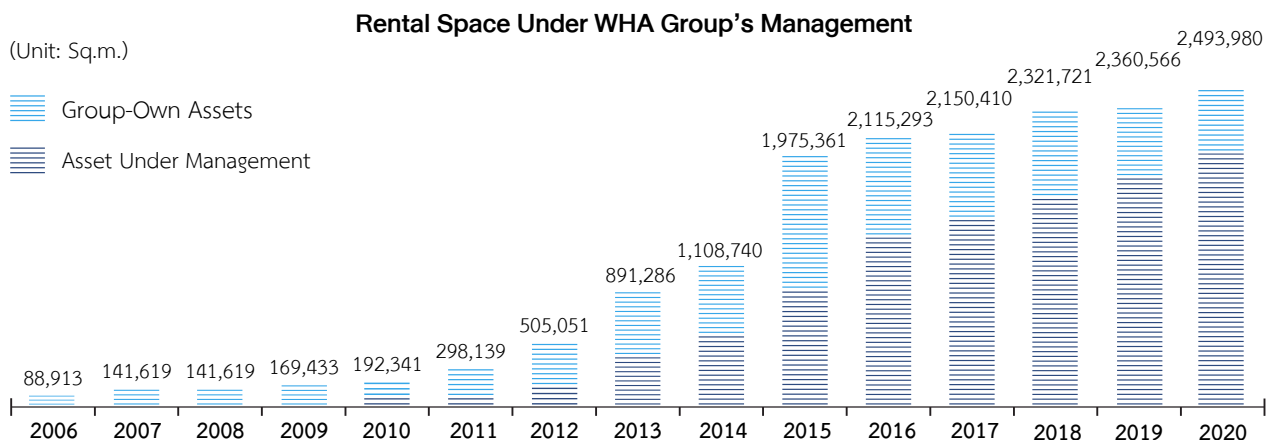
### 1 Logistics Business

The Company is committed to be a leading company as a warehouse project developer, distribution center, and high quality factory located in a strategic location around Bangkok, Eastern Economic Corridor, and other provinces. The Company is able to fully meet the needs of its customers due to its project location, project design with international standards and quality of construction. This could reduce the cost of customer operations and increase long-term competitive advantages.

Real estate business development and management could be described in accordance with the types of products and the services provided, details are as follows;

- a) Real estate development business for rental and service income
  - 1) Warehouse and Distribution Center
    - Built-to-suit project
    - Warehouse Farm project
    - WHA Logistics Parks project (Ready-Built)
  - 2) Factory
    - Built-to-Suit Project
    - Ready-Built Project
  - 3) Other projects
- b) Real estate development business for sale
- c) Investment and real estate management business
- d) Trust management business

Real Estate development and management business is a major source of revenue for the Company. As of year-end 2020, the Company has expended its business in connection to its space rental business and space rental under the Company's management of more than 2,493,980 square meters, as the Company has offered a more variety of project types to its customers.



**Remark:** Total leasable area includes occupied space which generates income, preleased area and to be developed area.

## A) Real estate development business for rental and service income

Real estate development business for rental and service income is a real estate development project for the warehouse building, distribution centers, factories in order to rent and provide services to customers who emphasis on quality and high construction standards. They are located in strategic locations in the logistic areas, such as Bangna-Trad km 18-23 Ladkrabang Rama II and areas in the Eastern Economic Corridor project, including provincial cities such as Ayutthaya, Saraburi, Khon Kaen, Surat Thani and Lamphun etc. The Company's projects are located near to industrial estate, industrial area and/or Industrial zone, in providing our customers with competitive landscape. The projects are classified by product type and services offered, details are as follows:

### 1) Warehouse buildings and distribution centers

#### ● Built-to-Suit Project

Built-to-Suit Project is a project development according to the needs of customers. Most of the projects are large-scale building, ranging from 5,000 to 70,000 square meters which were designed and developed to meet complex, variety usage and best suit the need of

each customer to give most benefit to their business nature and working procedure. Most of Built-to-Suit contracts are long-term lease with an average rental period between 5 and 15 years, and the tenant shall deposit for contract and service guarantee in cash and/or bank guarantees at the rate equivalent to approximately 3-12 months of rental fee, under the condition that If the tenant cancels the lease contract before the lease expiration specified in the lease agreement, the lessee shall compensate the rent for the remaining lease term to the Company.

#### ● Warehouse Farm Project

The Warehouse Farm project is a combination of Built-to-Suit and Ready-Built project with premium quality construction concept. It is a project developed to meet the increasing demand of both existing and new customers. Built-to-Suit buildings in Warehouse Farm are ranged from 5,000 to 30,000 square meters, while Ready-Built buildings in Warehouse Farm are approximately 3,000 to 5,000 square meters. The majorities of Built-to-Suit contract are long-term contracts for more than 5-10 years, while Ready-Built buildings in Warehouse Farm are short-term contract of approximately 3 years term. In addition, the Company provides options for renewal with the same condition as Built-to-Suit project.



Furthermore, the Company also looks after the common area of the projects such as central electricity services, security services, road repair services, public utilities and facilities, etc.



## Examples of Built-to-Suit Project

Project location : Laemchabang, Chonburi  
 Leased space : 20,000 sq.m.  
 Project type : Distribution center



Project location : Bangna-Trad km. 19  
 Leased space : 20,000 sq.m.  
 Project type : Distribution center



Project location : Saraburi Province  
 Leased space : 55,000 sq.m.  
 Project type : Plant and distribution center



## Examples of Warehouse Farm Project

Project location : Chonlaharnpichit km. 5  
 Leased space : 64,000 sq.m.  
 Project type : Warehouse Farm



Project location : Ladkrabang  
 Leased space : 90,000 sq.m.  
 Project type : Warehouse Farm

### ●WHA Logistics Park (Ready - Built)

The WHA Logistics Park project is a high-quality Ready-Built project with the average area ranging from 2,400 to 25,000 square meters per site. The project is located in the logistics center and surrounded by industrial estates. The location is close to the deep sea port, and Eastern Economic Corridor zone which can meet the needs of the customers as well as third party logistics service providers. WHA Logistics Park offers four projects as follows:

Project	Location	Unit Size	Outstanding
WHA Logistics Park 1	Highway No. 331, Chonburi	195 Rai	Located between Laem Chabang Port and WHAID's Industrial Estates. It is only 20 kilometers from the port in Free Zone and the General Zone.
WHA Logistics Park 2	WHA Eastern Seaboard Industrial Estate 1 (WHA ESIE 1) on Highway No. 3574, Rayong	63 Rai	Located in the Free Zone with target customers in the automotive cluster and others.
WHA Logistics Park 3	WHA Eastern Seaboard Industrial Estate 1, on Highway No. 3574, Rayong	18 Rai	Located in General Zone
WHA Logistics Park 4	Nearby Eastern Seaboard Industrial Estate (ESIE), Rayong	63 Rai	Located in General Zone which is the center of Eastern Industrial area

## Examples of Ready-Built Project

Project location : WHA Logistics Park 1



Project location : WHA Logistics Park 4



Project location : WHA Logistics Park 2

### 2) Warehouse and Factory Buildings

#### ● Built-to-Suit

The Company has a design and development team with extensive experience in design and construction of various projects. In order to meet the complex needs of our customers. In the design phase, the factory layout will be adjusted to suit with customer's production process, allowing for continuity of the production process and defects reduction. As a result, this project will best benefit our customers in terms of cost reduction and enhanced production efficiency.

#### ● Ready-Built

Ready-Built project is developed to cater for small and medium-sized industry (SMEs), an average warehouse area ranging from 450 to 10,000 square meters. Most of the projects located in industrial zones and duty free zones in many industrial estates of WHAID Group. Therefore, the Ready-Built buildings will provide customers with greater flexibility, in terms of financial investments as well as business growth opportunities.

Further, WHA Ready-Built Factory Park 1 has an approximate area of 13 Rai, which located in Kabinburi Hi-Tech Industrial Estate, Prachin Buri. (The first factory project located outside WHA Industrial Estate / Industrial Area). The project is located in the middle of Bangkok and the Northeast of Thailand. It is convenient to transport by land, water and air.



**Project :** WHA Ready-Built Factory Park 1

#### 3) Other projects

##### ● The projects in which the Group invests for development and lease

The Company plans to acquire the property which has been completely built and/or the property which have been partially built for development and lease. The target property should be in good condition and reasonably priced so that they can be further developed and leased to interested clients (including the existing tenants). This investment will enhance the Company's opportunity to increase the leased space while reducing the construction period. Also, the Company can implement its expertise in space design and improvement to meet the clients' requirements.

##### ● Office buildings for rent

The Company has built and developed built-to-suit office buildings for rent for clients who want Including the development of premium office building for leasing both the high rise and low-rise types and/or purchase the fully completed office buildings

for rent and/or partially completed property for development and lease. The Company will consider investing in the projects which are in good condition and reasonably priced. This will also help expand the Company's client base.

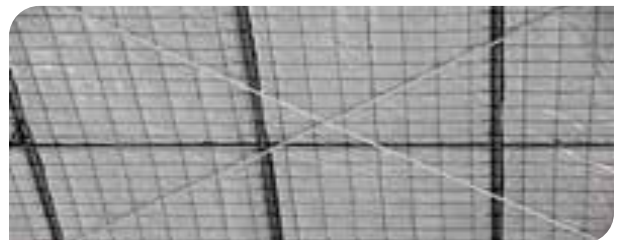
##### Examples of design which aims to meet different needs of tenants

- Interior space design for the most effective inventory turnover
- Determination of the appropriate height of floor and access for large vehicles to facilitate goods delivery and transfer
- Shelf design for flexibility of adjustability of tenant operations to facilitate the product arrangement/ packaging and lessen the mistakes
- Temperature control of both Multi-Temperature and Cold Storage type which enables the control of the quality of the stored products

#### Examples of project specifications

##### Seamless metal sheet roof

Seamless metal sheet roof helps reduce the problem of leaking through seams.



##### Insulating roof

Insulating materials are installed under the roof which consist of ventilation holes to help cooling down the heat within the building and maintain the quality of the stored products.



### Natural ventilation system

Louvers and bird screens installed around the building and the higher position of the roof improve the air circulation within the building.



### Environmental management principles

Infrastructure in the project such as product distribution system, warehouse and production plant have been developed in accordance with the international standards. These include the design of building structure to reduce dust and dirt accumulation and prevention of termites and insects.



### Strong Burnished Floor

The floor structure is made of the specific concrete material which is much stronger than general concrete. Also, the Burnished Floor, which is an innovative technology of surface polishing, is used in the project to prevent scratches from heavy operations and reduce dust accumulation and floor cracks.

## B) Property development for sale

The Company has a clear policy to sell the property to Property Funds or Real Estate Investment Trusts to generate capital resources for development of the Company's future projects. However, the sale of property to Property Funds or Real Estate Investment Trusts requires an approval from investment unit holders, and the Company, as one of the investment unit holders of Property Funds or Real Estate Investment Trusts, is not eligible for casting votes. In addition, the sale of the Company's property depends on other uncontrollable factors such as the market situations which affect the capital raising of Property Funds or Real Estate Investment Trusts. Nevertheless, the Company may consider selling the certain property to support the needs of capital use and the investment policy of the Company.

The Company will select the property to sell to Property Funds or Real Estate Investment Trusts on the basis that such property has to be completely developed

and fully eligible for sale according to the investment policy of Property Funds or Real Estate Investment Trusts and the relevant laws and regulations. The quantity and the size of the projects to be sold to Property Funds or Real Estate Investment Trusts will be determined based on the amount of capital in need for the expansion of the new project or the profits expected to be received from the sale.

In 2020, WHART has additionally invested in 3 projects of the Group. This investment results in WHART having the total of 32 projects under its investment as at 31 December 2020, amounting for 1,412,140 sq.m. of the leased space in buildings and 423,601 sq.m. of roofed leased space. The overall value of assets is THB 42,595 mm.

Furthermore, in 2020, Hemaraj Leasehold Real Estate Investment Trust ("HREIT") raised capital by issuing and offering the investment units for sale for investing in the leasehold of another 48,127 sq.m. of the



finished factory buildings and warehouses within industrial estates/industrial zones of WHAID Group as at 31 December 2020 HREIT had additional resulting in HREIT having 380,632 sq.m. of the leased space and the total value of assets THB 11,489 mm.

Also, the Company plans to sell the developed projects to the third parties, especially the current tenants of the projects, which will increase the Company's income.

### C) Real Estate investment and management

The Company plans to invest in the real estate business through Property Funds or Real Estate Investment Trusts in the proportion of not over 20 percent of all investment units for consistently gaining the dividends every year. However, the decision to invest in Property Funds or Real Estate Investment Trusts depends on the needs of capital and the amount of money raised by the sale of assets to Property Funds or Real Estate

Investment Trusts at the time. Therefore, the investment in Property Funds or Real Estate Investment Trusts may be different from the indicated policy. In addition, the Company has been appointed as the manager of real estate for the assets of Property Funds or Real Estate Investment Trusts, from which the Company receives the income for management of the real estate of Property Funds or Real Estate Investment Trusts for investment in the real estate.

### D) Real Estate Investment Trusts Management

The Company has established WHA Real Estate Management Co., Ltd. as a subsidiary for conducting the business related to WHART management and established WHA Industrial REIT Management Co., Ltd. to manage HREIT. The two companies receive the management fee on annual basis as well as the fee for acquisition and distribution of assets according to the asset value.

## Summary of the projects of the Group of Companies and the projects of the Property Funds or Real Estate Investment Trusts

(The area of the completed projects and the projects under construction as of 31 December 2020)

Unit: square meters

Project status	Group	WHART	HPF	HREIT	WHABT
Completed projects	182,176	1,412,140	150,117	380,632	30,215
Projects under construction	125,025	-	-	-	-





## 2 Industrial Development Business

Industrial Development Hub is operated through the Company's subsidiary, with WHAID Group responsible for developing Industrial estates and/or zones and selling of land to enterprises who demand to make their investment in Industrial estates/zones and Industrial Promotional zones. Enterprises can gain special privileges provided by Industrial Estate Authority of Thailand and/or Thailand Board of Investment. Another crucial role of WHAID Group is to act as a center for providing utilities and facilities for clients inside the Industrial Estate e.g. electricity, water supply, wastewater treatment, waste disposal, telephone, internet and coordinating with the authority on environmental control.

As at 31 December 2020 WHAID has developed and is managing 10 industrial estates and industrial zones in the following table:

Industrial Estate/ Zone		Location	Project size (Rai)	Prominent Features
1) WHA Chonburi Industrial Estate 1	WHA CIE 1	Sriracha, Chonburi	3,482	This industrial estate is situated at general industrial zone and industrial zone particularly for export. Major customers are comprised of heavy steel, energy, automotive parts, electrical parts, and building materials.
2) WHA Chonburi Industrial Estate 2	WHA CIE 2	Sriracha, Chonburi	632	This industrial estate is located near to an accessible highway i.e. a new highway no. 331 and highway 3241, linked to Laemchabang Port which is good for transportation and shortly connected to Sriracha district which is roughly 25 km away.
3) WHA Eastern Industrial Estate (Map Ta Phut)	WHA EIE	Map Ta Phut, Rayong (connect with National Petrochemical Complex)	3,760	This industrial estate is catered for some heavy industries including steel, petrochemical and chemical. This industrial estate is equipped with large-scale utilities with a capability to distribute untreated water, clarified water, tap water, high voltage electricity and wastewater treatment system. Apart from large-scale utilities, this industrial estate has additional services provided such as Electricity procurement, water steam, demineralized water for industries and pipe installation system for liquid and gas transportation.
4) Eastern Seaboard Industrial Estate (Rayong)	ESIE	Pluakdaeng, Rayong	9,688	This industrial estate is a joint venture between WHAID Group and Siam Food Products PCL, with a proportional of 60:40 respectively. It was established in 1995. This industrial estate is proclaimed to be a fully-integrated industrial hub and one of the world's largest automotive cluster, occupied with major automobile manufacturers together with more than 100 downstream automotive manufacturers, most of which are the world's most renowned automobile brands. This industrial estate has become the central hub of automotive production with a combined capacity contributing to one-third of Thailand's total automotive production.

Industrial Estate/ Zone		Location	Project size (Rai)	Prominent Features	
5)	WHA Eastern Seaboard Industrial Estate 1	WHA ESIE 1	Pluakdaeng, Rayong	8,003	The industrial estate is connected to Eastern Seaboard (Rayong) Industrial Estate (ESIE), easily commutable by car. Additionally, ESIE is only 12 km from WHA Chonburi Industrial Estate 1 (WHA CIE 1). This industrial estate is a cluster for automobile manufacturers and automobile downstream industries.
6)	WHA Saraburi Industrial Land	WHA SIL	Nong kee, Seraburi	3,619	This industrial zone is catered for building materials, ceramics, paper, packaging, metal, and electricity industries.
7)	WHA Rayong Industrial Land	WHA RIL	Bankai, Rayong	3,438	This industrial zone is for machinery, automotive equipment, electrical metals and other downstream industries. At the present, this industrial zone has a strategic location in the eyes of domestic and foreign industrial enterprises. It is considered to be the production base for industrial machinery, mining, and construction materials, exported worldwide.
8)	WHA Eastern Seaboard Industrial Estate 2	WHA ESIE 2	Sriracha, Chonburi	3,650	This industrial estate is located approximately 25 km from Laemchabang port and close to automotive cluster which is in WHA Industrial Estate such as WHA CIE 1, WHA CIE 2, ESIE and WHA ESIE 1. Customer groups include automobile manufacturers and downstream manufacturers.
9)	WHA Eastern Seaboard Industrial Estate 4	WHA ESIE 4	Pluakdaeng, Rayong	1,870	This industrial estate is an industrial promotion zone for Next-generation Automotive, Aviation and Logistics, Robotics and Automation industry since 24 January 2018.
10)	WHA Eastern Seaboard Industrial Estate 3	WHA ESIE 3	Nongyai, Chonburi	2,198	This industrial estate is an industrial promotion zone that will serve investors in next generation industries such as Next Generation Automotive, Robotics and Automation, Aviation and Logistics.

At the end of 2020, WHAID Group is managing 8 Industrial Estates and 2 Industrial Zones in Thailand, together with an undeveloped land bank, totaling to 48,897 Rai, with a total 839 customers, and over USD 33,200 mm has been invested by our clients in the industrial estates/ zones. WHAID Group is targeting at customers who require a full service solution i.e. Industrial Estate fully equipped with utilities, power, capable to heavy production manufacturer, with good supporting

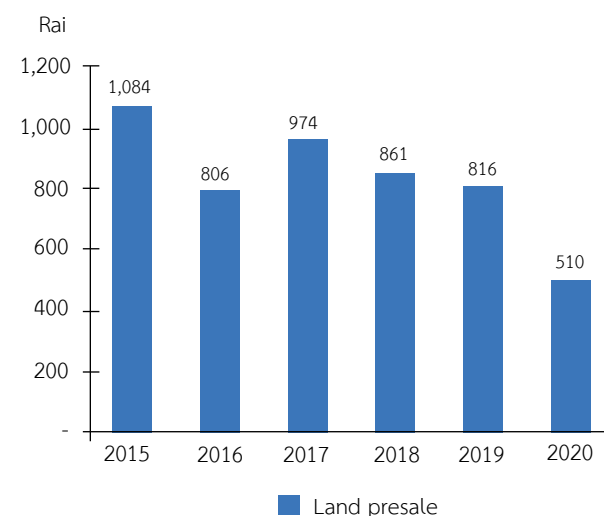
infrastructure e.g. automobile industries, petrochemical industries, steel industries, energy industries etc.

In addition, WHAID Group has expanded its investment to Nghe An Province, Vietnam, by establishing a subsidiary named WHA Industrial Zone Nghe An Joint Stock Company, to develop the “WHA Industrial Zone Nghe An” Industrial Zone, where it has obtained the registration certificate for the Phase 1 investment for an area of 498 hectares (3,110 Rai). In the year 2020, WHAID

Group has developed the Phase 1 which covered an area of 498 hectares (3,110 Rai) where the Phase 1 A having the area of 145 hectares (906 Rai) has been completely developed with land leased more than 50% of the net leasing land area in the year 2020.

As WHAID group provides entire services for entrepreneurs who intend to construct the factory in Thailand, therefore, the number of land sale have continuously grown in 2019. In 2020, the subscription for land in the industrial estate and industrial zone in Thailand and Vietnam is 816 Rai in total (exclusive of land stated in the intention letter and agreement letter on the sale of land located in Thailand and in the industrial estate in Vietnam, in the amount of 195 Rai) and 510 Rai (exclusive of land stated the intention letter and agreement letter on the sale of land located in Thailand and in the industrial estate in Vietnam, in the amount of 149 Rai), respectively. The Company has revenue from the transfer of land in the industrial estate of approximately Baht 3,505.0 million and approximately Baht 1,487 million, respectively. Also, as of 31 December 2021, there are approximately 9,000 Rai of land in Thailand, awaiting for development and sale, and other approximately 2,220 Rai located in the WHA Industrial Zone Nghe An Phase 1B. This is considered that WHAID

Land presale in industrial estate / zones of WHAID Group



Source: the Company

Group is the largest industrial estate developer in Thailand. WHAID Group has land subscription for the year 2015-2020 in the amount of 4,665 Rai in total, where has approximately 46% market share.

## Details of Industrial Estate Zoning

WHAID Group categories its industrial estates and industrial zoning into 6 different zones, in according with its use of land, details are as follows:

Zoning by Usage	Definition of Each Zoning
General Industrial Zone	• The zone is designated for industrial and industrial-related activities.
Free Zone / Export Processing Zone-EPZ	• The zone is designated for industrial, commercial operations and other related-activities, which are beneficial to the nation as a whole. Import duties on machinery under the Free Zone Economic are tax exempted.
Commercial Zone	• The zone is designated for commercial operations including banks, post office, hospital, gas station and educational institution etc.
Residential Zone	• The zone is designated for residential area such as apartments, condominiums and houses etc.
Logistics Zone	• The Zone is designated for construction of warehouses or factories for rent in relation to logistic business.
Common Area and Public Utility System	• The area is designated for construction of public utility and public infrastructure such as road, water supply system, waste water treatment system, reservoir, public parks etc.





## 3 Utilities & Power Business

Utilities & Power Business is operated through the Company's subsidiary, WHAUP Group, the provider of utilities in the WHAID Group's industrial estates/zones i.e. raw water, industrial water, and wastewater treatment and joined the investment in the utility project selling tap water in Vietnam. WHAUP Group is also into power business, through joint ventures with both domestic and foreign power plants, who have expertise in the power business field. Our power plants include both Conventional Fuel and Renewable Fuel power plants.

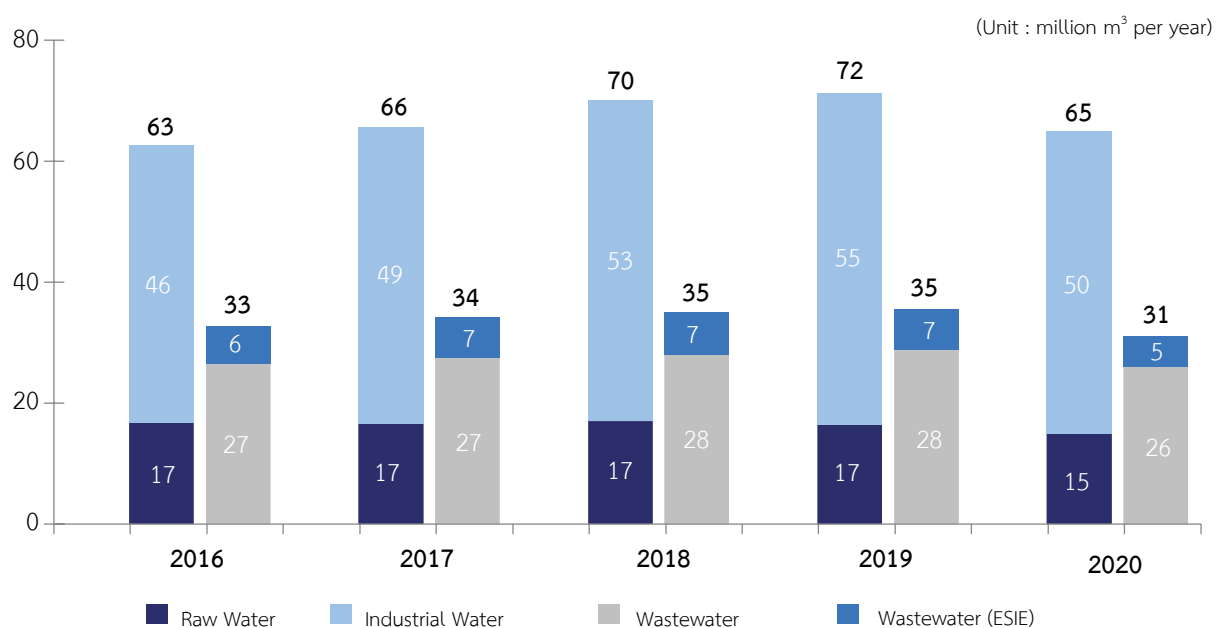
### 1) Utilities can be categorized as follows:

Products and Services	Prominent Features
1) Raw Water	Procuring and distributing raw, untreated water to enterprises in WHAID Group's Industrial Estate with focusing mainly on heavy steel manufacturers, Independent Power Plant Producers (IPP), and Small Power Plant Producers (SPP).
2) Industrial Water	<p>Producing and distributing industrial water to enterprises in industrial estate which can be divided into two main categories as followings:</p> <ol style="list-style-type: none"> <li>(1) Processed Water – Purified water through precipitation, filtration, and sterilization with Chlorine. Target customers include automobile manufacturers, automobile part manufacturers, food processing manufacturers, electronic manufacturers etc.</li> <li>(2) Clarified Water – Purified water through precipitation, filtration, and sterilization with Chlorine (adding higher Chlorine concentration compared to the processed water). The Concentrated Chlorine Solution added to the clarified water will evaporate prior to distributing to the customers, as it can be ensured that the Chlorine will not be eroding customers' machinery. The target customers include heavy metal industries, petrochemicals and power plants.</li> <li>(3) Premium clarified water for industry has the characteristics that is higher than the normal industrial water produced by passing through the high-quality membrane and distributed to the customers in the power plant group mainly.</li> <li>(4) Demineralized Water – Demineralized water is the highly pure water used in some industry such as Power plant, Petrochemical, Electronics etc.</li> </ol>
3. Wastewater Treatment	Providing wastewater treatment for customers inside the industrial estates in compliance with the Ministry of Industry, prior to draining into the natural water resource or recycling to be reuse in the production process.

At present the business of selling and managing water inside the country, the WHAUP group has the water production capacity for all the industrial estates at the maximum of 354,766\* cu. m per day, and has the maximum capacity in managing wastewater combined at 162,256 cu. m per day. In 2020 the company group sold the raw water volume for industry to all the industrial estates in the amount of 177,706 cu. m per day, and the average volume of managing the wastewater on all of the industrial estates in the amount of 85,184 cu. m per day.

*\*The total reclaimed water production (recycling of wastewater) 25,000 cu. m per day at Map Ta Phut Industrial Estate (WHA EIE).*

### Utilities Production by WHAUP Group



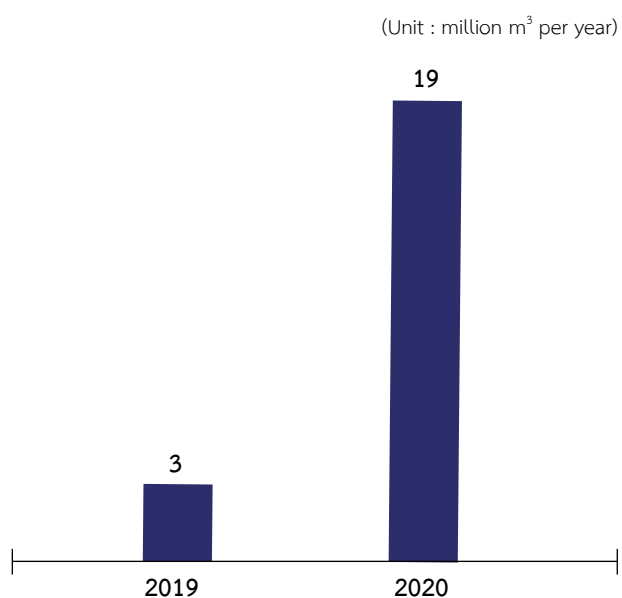
The WHAUP group has a policy to provide other types of utilities to the operators in and out of the industrial estates in the future as well. Moreover, the company has been certified on the quality standards of ISO 9001:2015 and the environmental standard of ISO 14001:2015.

Moreover, in 2019 the company started to expand the business to Vietnam on the tap water in the industrial estate of WHA group, and the investment in buying some shares in the tap water business.

As for the business of selling and managing water overseas at WHA industrial estate Zone 1 – Nghe An in Vietnam, the WHAUP group has the maximum tap water production of 12,000 cu. m per day, and has the capacity on the wastewater management totaling 3,200 cu. m per day.

Moreover, the company has invested in buying shares in the tap water business in Vietnam for two companies are Cua Lo Water Supply, which is the producer and the distributor of tap water in Nghe An and Duang River Surface Water Plant (SDWTP), which is one of the leading tap water providers of Hanoi with the shareholding ratios of 47% and 34% respectively. The two projects had the water production totaling 13,000 and 300,000 cu. m per day. In 2020 the company group had the selling volume of tap water in all projects in Vietnam at 50,739 cu. m per day.

### The volume on providing the utility inside Vietnam by the company group based on the shareholding ratio



## 2) Power

WHAUP Group invests in both domestic and foreign electricity generating and distribution businesses together with the reputable electricity business entrepreneurs who have expertise in generating and distributing electricity and operated by itself in the solar power plant project Including investment in natural gas distribution and distribution business details as follows:

Power Plant Project	Location	Fuel Type	Power Produce Type	Investment Proportion	Total Installed Capacity			Capacity by shareholding proportion		COD
1) Operated Power Plant Projects (Already-COD)										
Joint Venture Projects with Glow’s Group										
Gheco-One	Industrial Estate Map Ta Phut	Coal	IPP	35.00%	Power	660	MW	231	MW	Aug 2012
Glow IPP	WHA CIE 1	Combined-Cycle Power Plant with Natural Gas	IPP	5.00%	Power	713	MW	36	MW	Jan 2003
Houay Power	Lao PDR	Hydro Power	IPP	12.75%	Power	152	MW	19	MW	Sep 1999
Joint Venture Projects with Gulf’s Group										
Gulf JP NLL	WHA RIL	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam Chilled water	123 8 4,600	MW TPH RT	31 2 1,150	MW	May 2013
Gulf Solar KKS	WHA LP1	Solar Power	VSPP	25.01%	Power	0.25	MW	0.06	MW	Dec 2014
Gulf Solar BV	WHA CIE	Solar Power	VSPP	25.01%	Power	0.13	MW	0.03	MW	Jun 2014
Gulf Solar TS1	WHA ESIE 1	Solar Power	VSPP	25.01%	Power	0.13	MW	0.03	MW	Aug 2014
Gulf Solar TS2	ESIE	Solar Power	VSPP	25.01%	Power	0.09	MW	0.02	MW	Jan 2015
Joint Venture Projects with Gunkul Engineering’s Group										
WHA Gunkul Green Solar Roof 17	WHA Mega Logistic Center Wangnoi 61 Ayuthaya	Solar Power	VSPP	74.99%	Power	1.00	MW	0.73	MW	Jul 2014
WHA Gunkul Green Solar Roof 3	WHA Mega Logistic Center Bangna-Trad Km.18	Solar Power	VSPP	74.99%	Power	0.83	MW	0.62	MW	Apr 2014
WHA Gunkul Green Solar Roof 6	WHA Mega Logistic Center Bangna-Trad Km.18	Solar Power	VSPP	74.99%	Power	0.83	MW	0.62	MW	Apr 2014
WHA Gunkul Green Solar Roof 1	WHA Mega Logistic Center Bangna-Trad Km.18	Solar Power	VSPP	74.99%	Power	0.64	MW	0.48	MW	Apr 2014

Power Plant Project	Location	Fuel Type	Power Produce Type	Investment Proportion	Total Installed Capacity			Capacity by shareholding proportion		COD
Joint Venture Projects with B Grim Power's Group										
B.GRIMM Power (WHA) 1	WHA CIE 1	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam	130 30	MW TPH	33 8	MW TPH	Nov 2016
Joint Venture Projects with Gulf MP's Group										
Gulf VTP	ESIE	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam	137 20	MW TPH	34 5	MW TPH	May 2017
Gulf TS1	ESIE	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam	134 30	MW TPH	34 8	MW TPH	Jul 2017
Gulf TS2	ESIE	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam	134 30	MW TPH	34 8	MW TPH	Sep 2017
Gulf TS3	WHA ESIE 1	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam	130 25	MW TPH	32 6	MW TPH	Nov 2017
Gulf TS4	WHA ESIE 1	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam	130 25	MW TPH	32 6	MW TPH	Jan 2018
Gulf NLL2	WHA RIL	Cogeneration System with Natural Gas	SPP	25.01%	Power Steam	127 10	MW TPH	32 3	MW TPH	Jan 2019
Joint Venture with GLOW and SUEZ										
CCE	WHA CIE	Waste-to-Energy	VSPP	33.33%	Power	8.6	MW	2.9	MW	Nov 2019
2) Information about the commercially operating power plants by WHA Group										
Solar power plants	-	Solar Power	Private PPA	100%	Power	36.9	MW	36.9	MW	May 2018-Dec 2019
Total [Combined 1)and 2]) [Consisted of : Commercially operating power plants in terms of JV and WHAUP sole proprietorship]					Power Steam Chilled water	2,619 148 4,600	MW TPH RT	590 38 1,150	MW TPH RT	
3) Power Plant Projects (Under Construction)										
Solar Rooftop	-	Solar Power	Private PPA	100%	Power Power		MW MW	11.4 11.4	MW MW	Q1/2021-Q3/2021





## 4 Digital Platform Business

WHA Group offered Digital Platform services through its subsidiary, WHA Infonite Company Limited which was granted NBTC internet services (type 1) by office of The National Broadcasting and Telecommunications Commission, and currently is in the process of submitting for NBTC (type 3), an operating license for a mass telecommunication service provider. The offered services are described as follows:

### A. Data Center

A dedicated space for rent to house computer systems and associated components, such as telecommunications and storage systems, with a world-class standard, a high-security operating system, an experienced consultant service in accordance with the information security management system ISO/IEC 27001: 2013. A customer will prepare a server and lease out a storage space in our data center. Currently, WHA Group has 4 operating data centers, 3 of which are constructed in equivalent to Tier III data center standard and start operation since late 2017. In 2018, WHA Group has acquired 15 percent equity stake in Supernap (Thailand) Company Limited, operating a Tier V Gold standard data center located in Chonburi Province. All of the data centers are to be connected with high-speed fiber optic, enabling the customers to conveniently access to the data center from their working stations and/or offices. The data centers are to obtain a world-class standard, in which electricity backup generators are installed in order to prevent from downtime, 24-hours ambience monitoring i.e. controlled temperature and humidity, allowing server to function efficiently together with longer machine life expectancy, 24-hours onsite staffs and security guards, installation of security cameras and fire alarm. Data centers are also designed to support as a Disaster Recovery site. Data centers are looked after by expertise with more than 20 years of working experience in the field, who is certified with Certified Accredited Tier Design from Uptime Institute. Last but not least, 24-hours Business Continuity Plan (BCP) is provided on-site in order to assist our clients to manage their IT system contentedly.

WHA Group is currently providing data center service as an infrastructure service, known as co-location. Co-location service is for corporations, government entities or state enterprises, who are looking for a dedicated space for rental server hosting services to be used as main site and back up (Disaster Recovery) site in order to prevent company's database from any unexpected situation or natural disaster that might cause damage to customer's main sites

In 2019, the Company has introduced the management of renewable energy by installing the Solar Rooftop at the Data Center located at Bang Na Trad Km. 1. Such solar rooftop is considered the first and the only place in Thailand that uses renewable energy in the Data Center. In the year 2020, the Company was certified the PCI-DSS "Payment Card Industry Data Security Standard v 3.2.1" for the Data Center, which is the security standard on financial transactions for the customer entering into the financial and banking transaction. This aims to create the confidence to customer in depositing their data.

### B. Fiber Optic FTTx Service

WHA Group has invested in laying of the fiber optic network (FTTx) in WHA Group's industrial estates, providing infrastructure to support high-speed connection for clients in industrial estates. Service operators have no longer need to invest in the FTTx infrastructure. Our clients in industrial estates can now enjoy a better high speed connection with their head quarter/office branches all over the world, through an enhanced network security system. FTTx network is a fundamental communication service with high speed and high security, allowing for various communication types such as images, sounds and data.

At the end of 2020, the Company has established the fiber optic network (FTTx) and provides such network services in covering total area of 6 industrial estates, namely (1) WHA Saraburi Industrial Land, (2) WHA Rayong Industrial Land, (3) WHA Eastern Seaboard 2 Industrial Estate, (4) WHA Eastern Seaboard 3 Industrial Estate, (5) WHA Eastern Seaboard 4 Industrial Estate, and (6) WHA Chonburi 2 Industrial Estate.

The Company is under the construction of the fiber optic network (FTTx) in other 4 industrial estates, namely (1) WHA Chonburi 1 Industrial Estate (2) WHA Eastern (Map Ta Phut) Industrial Estate (3) Eastern Seaboard (Rayong) Industrial Estate, and 4) WHA Eastern Seaboard 1 Industrial Estate. It is estimated that the construction will be completed within the year 2021.

The establishment and provision of the fiber optic network (FTTx) service in all 10 industrial estates and industrial zones would lead the Company to reach more 800 customers and generate regular income from the lease of fiber optic network (FTTx). The Company expected that the demand for fiber optic network (FTTx) will increase from the fact that various companies intend to digitalize its organization, as well as initially implementing technology and innovations to develop their business to be more efficient. The advantage which customers will receive from utilizing the fiber optic network (FTTx) managed and operated by the Company is the flexibility and the ability in freely switching the internet providers since the company is a sole owner of the network provided in industrial estates and industrial zones, and the Company does not have any interest in providing internet service, including that customer is able to directly connect between their factories located in various industrial estates of WHA, which this will increase the speed and safety of data transmission as well.

### **C. Managed Services**

A full service of system and technology management provided to organizations, such as IT hardware, software, and/or solutions procurements, technical team recruitment, and IT system planning. The Company has various kinds of managed services to offer for customers' extended needs as following.

#### **• IT Outsourcing and Business Process Outsourcing (BPO)**

A service provider to deliver IT-enabled business process, IT human resources, applications and infrastructure solutions to enhance our clients' business outcomes. WHA Group can assist our clients outsourcing their IT facilities, enabling for an efficient IT resource management, thus reducing their overall IT expenses. The service is popular among clients in industrial estates, due to the fact that most of the clients are foreign manufacturing companies. These groups of clients have their expertise on the production facilities while IT department is considered as their supporting business

unit. Thus, this group of clients would gain most benefits from our IT outsourcing service.

The Company has started to provide IT outsourcing services to automotive customer, and has a plan to expand its IT outsourcing and BPO services to target customers in banking and other industries who would like to improve their efficiency and reduce cost.

#### **• System Integration Service**

The Company gives advice, designs, acquires, implements, maintains and brings together IT component subsystem in providing a comprehensive IT solution for our clients. The Company will be taking care throughout the whole process from design, installation, implementation and training as well as system maintenance throughout the lifetime, or other as agreed.

The Company has various business partnerships to increase diversity in products and services, hardware, software, applications, and new technology, to meet customers' needs such as DELL, HP, HITACHI, CISCO, ADVA, HUAWEI, SAMSUNG, ORACLE, RUBIX, CHECKPOINT, etc.

#### **• Cloud Services**

Cloud services are innovative services on top of the data center infrastructure service, co-location service. The Company will provide computer resources, both hardware and software, and computer network preparation, along with a team of experienced professionals who have been certified by world-class agencies such as Dell Certification, Hitachi Data System Certification, VM Ware Certification and OpenStack Certificate, to provide advice and control the computer network system for customers. This is to serve customers who want to reduce the cost of purchasing IT equipment, applications, software, and system maintenance. Cloud services will be an alternative for organizations with no expertise or IT personnel. The company has divided cloud services into 3 types as follows:

1) Infrastructure as a Service (IaaS) is the service that provides infrastructure such as virtualized server, storage, network and firewall. WHA Group helps customer to reduce number of physical servers, to monitor IT security system as well as to provide high-speed internet network. WHA Group will be responsible for an investment on IT infrastructure and the maintenance of the system, given the benefit to the clients in reducing their IT expenses, enabling for an efficient management of the IT resources in the most cost-effective manner.

2) Platform as a Service (PaaS) is a service suitable for corporations with IT professionals, who are able to develop their own applications or those who need to develop complex applications. WHA Group will prepare IT infrastructure and application developing software e.g. hardware, operating system, middleware, database, software development tools and database. The service enables clients to effectively manage their IT resources, minimize the set-up time and having no need to invest on IT infrastructure.

3) Software as a Service (SaaS) is a service of pay-per-use or renting of software/applications, via the utilization of WHA Group's data processing units. Clients do not need to invest on IT system, not to mention hardware nor software because the software/applications provided are on cloud which can be accessed from anywhere via web browser or internet connection. All of the data processing is done through WHA Group's server. Examples of SaaS are Email on cloud, Anti-Virus, Firewall, Information back up system and Workflow cloud based ERP. SaaS facilitates smooth operations connectivity and enables a fully-automated workplace. Switching to SaaS can enhance operation efficiency, allowing for an in-depth data analysis. It is highly recommended for a corporation with high growth potential, as it enables a comprehensive business solution.

#### ● Rental/Leasing IT Equipment and Software

The Company will rent or lease out IT hardware, software, and IT peripheral to clients, as well as looking after of the maintenance of the rented or leased out equipment as contracted for 3 to 5 years or as agreed upon. Clients will benefit from after sale service such as having expert IT consultants, equipment sourcing, system maintenance which can best suit clients' requirements at the most cost effective manner. Clients do not need to have a huge investment on the IT equipment.

### Benefits from the Board of Investment of Thailand (BOI)

As at 31 December 2020, WHA Group has received the benefits from the Board of Investment of Thailand (BOI) for activities as follows:

The Company's subsidiaries have received the benefits from the Board of Investment of Thailand (BOI) totally 80 certificates for activities as follows;

type of business	Amount of certificates
• Building factories and warehouses activities	45
• Real estate development for industrial	25
• Logistics parks	1
• Public utilities and basis services Production of tap water or water supply for industry	7
• Data Center activities	2

Significant privileges consist of:

1) Tax exemption on the profit that the Company gains for 8 years since the first date of revenue generated. If the Company has loss from the operation, BOI allows the Company to deduct the loss from the profit that might occur in another 5 years after BOI expiry date. In addition, the Company can also choose to deduct the loss in one year or multiple years combine.

2) Tax exemption on the profit that the Company gains (no more than 100% of the finance cost that is not included in land cost and working capital that have 7 years of useful life). If the Company has loss from the operation, BOI allows the Company to deduct the loss from the profit that might occur in another 5 years after BOI expiry date. In addition, the Company can also choose to deduct the loss in one year or multiple years combine.

3) Tax exemption on the profit that the Company gains (no more than 100% of the finance cost that is not included in land cost and working capital that have 8 years of useful life). If the Company has loss from the operation, BOI allows the Company to deduct the loss from the profit that might occur in another 5 years after BOI expiry date. In addition, the Company can also choose to deduct the loss in one year or multiple years combine.

4) The Group does not need to include dividend received from a BOI-promoted entity to calculate the income tax expense during the exemption period.

5) Tax deduction (50% of normal rate) on net profit within 5 years after the end of the right period as mentioned in 1 above.

6) Two times deduction on travel, electricity, and water supply cost within 10 years starting from the date that the Group receives its first profit from the operation.

7) Deduction on investment cost (25% of investment cost that is not included in the normal depreciation rate).

8) Import duty tax exemption on machinery, as per Board of Investment of Thailand's (BOI) approval

## Marketing and Competition

In order to increase the competitiveness and enhance the Company to achieve its goal according to the established vision in becoming a leader in this business, the Company places an importance in annually reviewing mission and strategy of the Company. The Board of Directors' Meeting has monitored on the implementation of the strategy together with the annual budget planning, including improvement of its strategy to ensure that it is up-to-date and always be in line with market conditions and competition. In this regard, the business strategy and the overview of the industrial condition and the important competition of each business group can be summarized as follows.



### 1 Logistics Business

The Company realizes the importance of creating value to tenants in terms of logistics cost management by understanding clients' specific needs and models of business to develop and design special projects. We select the location which address clients' needs and hand over the project in timely manner under reasonable rents so that tenants can rest assured that, by renting the projects, the logistics management will be more effective, which results in the Company being trusted and winning biddings for several projects. To maintain its leadership in real estate development and management and sustainable growth, the Company has implemented the following business strategies:

#### Business strategies

##### 1) Domestic and International Expansion in CLMVI and China Linkage

WHA Group is striving to develop Built-to-Suit projects to meet the needs of domestic clients and tenants while emphasizing on quality, expertise, experience, and long-term reputation of the Company. The Company also aims to extend credentials to capture new demand in strategic logistics locations such as Bangna-Trad and EEC provinces by leveraging on WHA's premium brand, solid track record of high quality standards. Regarding international markets, the Company currently has a footprint in Indonesia for built-to-suit project to serve multinational clients. WHA Group also plans to expand and look for business opportunities in CLMVI countries and China linkage since these countries have a large and growing population especially labors

while the labor cost is quite competitive and the economic growth rate is still high. In order to do this, the Company targets to reap benefit from group-wide synergy for business expansion in CLMVI, especially Vietnam in which WHA Industrial Development Plc. has already had a strong foundation. In additions, WHA will leverage on existing relationship with our clients and establish partnership with foreign partners with experiences and footprint in target countries to explore international opportunity.

##### 2) Focus on High-Growth Industries as well as the Government Promoting Sector

WHA Group emphasizes on High-Growth Industries e.g. E-Commerce, Healthcare sector, Aviation and Aerospace, automotive and food processing. The Company also aims to capture opportunities from EEC and other government's policies specifically an upgrade of Thai's industry clusters to be future industries (S-Curve Industries or High-value Industries) and those infrastructure development investment or upgrade projects e.g. High-speed Rail, Sea Port, Airport.

##### 3) Emphasis on Disruptive Technology and Innovative Practices Embrace

WHA Group will continuously improve its products and services in order to stay ahead of the competition. The company aims to create digital innovation by embracing disruptive technologies such as Internet of Things (IoT), automation, robotics, big data to offer new and value-added products and services to customers. In particular, WHA Group is currently studying smart warehouse and logistics 4.0 concept. The Company will also implement innovative practices in terms of business, financial and construction to create new business model as well as increase the Company's productivity, efficiency and reliability.

##### 4) Long-term Partnership with Global/Regional Players Establishment

WHA Group has been focusing on establishing long-term and mutually beneficial partnerships with global and regional players. The Company plans to escalate relationship with existing customers and key players in E-Commerce sector, Third-party Logistics (3PLs) sector as well as other Thai and multinational corporations to expand business opportunities both domestic and internationally.

##### 5) Organization and People Development

WHA Group emphasizes on organization and people development to create a strong foundation for the Company's sustainable growth. The Company prepares 5-year manpower plan to align with WHA Group's business plan and strategy. During the past years,



the Company has completed numerous people development programs to develop employees' well-rounded skills and enhance employee engagement. Apart from maximizing WHA Group synergies, the Company plans to leverage on digital technology to transform organizational activities and processes as well as create key competencies such as real-time information, data-driven decision, and operational efficiency improvement.

## Target Customers

### 1) Domestic and international manufacturers and distributors of products, including

a) International manufacturers and retailers who need and realize the importance of complicated and high-quality of distribution center. Also, these multinational companies are in need of the business operators whom they can trust in terms of quality, cost, delivery time, and pre- and post-delivery service. Therefore, these companies express their interest in renting the projects from professional business operators more than other groups of tenants.

b) Domestic manufacturers and distributors are the tenants who see the importance and are in need of the logistics system development. In the past, these tenants built and managed the inventory, product

distribution centers and plants by themselves, which require high costs but generate low efficiency. At present, these clients choose to use outsourcing service (this trend has occurred in Australia, USA and Japan) to increase competitiveness to an international level.

### 2) Third Party Logistics providers (3PLs)

Most of this group of clients are leading international companies who have expertise in logistics management. They manage distribution and transportation of the goods which are not the main business or ability of the owners. These companies will invest in the creation of product distribution network from the provision of vehicles, warehouse, operators, equipment, and operation supporting system.

### 3) Electronic Commerce Business (e-Commerce)

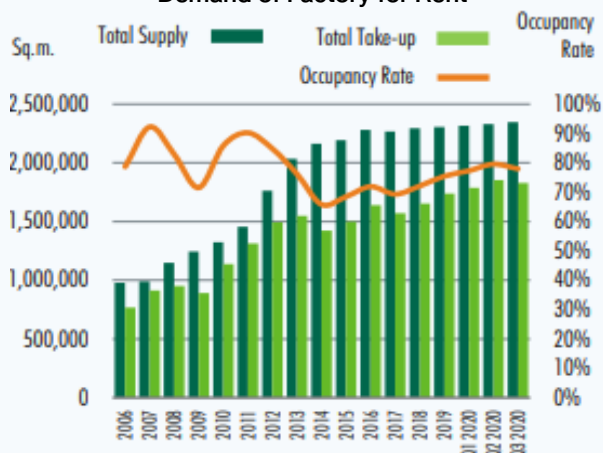
Currently, most of business operators both domestic and international use technologies or electronic tools to help them sell products. Thus, Technologies play the important role in the ease of selling products, fasten delivery time, decrease cost of selling channels, and increase its efficiency. This increase the demand in warehouse and distribution center in strategic locations where they can distribute their products promptly.

## Industry situation

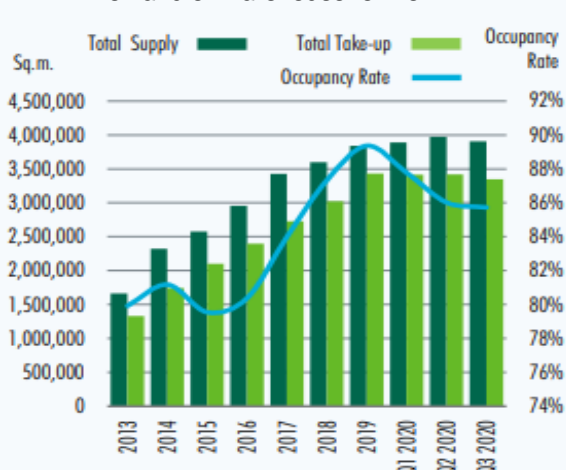
Logistics business is very important for business operators as well as national development. Thailand also realizes the importance of logistics and is established as the logistics hub to support the ASEAN Economic Community (AEC). In addition, the Eastern Economic Corridor (EEC) Policy encourages Thailand to develop the national logistics system at regional and international level to increase the competitiveness and to support the ASEAN Economic Community (AEC). In addition, Thailand has advantage in logistic because of the advantage of good utility system, location, labor skill, and banking systems, as well as the development and investment promotion plans of the public sector which will support Thailand to remain a logistics hub.

To increase the competitiveness of business operators and to support the ASEAN Economic Community (AEC), therefore, the government is trying to push forward the development of infrastructure which supports the multimodal transport focusing on the cost-effective transport, rail transport and regional and international link. Also, the efficiency of Supply Chain Optimization of the industrial sector is also emphasized.

**Demand of Factory for Rent**



**Demand of Warehouse for Rent**



In the year 2020, the COVID-19 outbreak affects manufacturing industry and the export of Thailand, including, the investment from overseas due to the temporary suspension of travel. As a result, the net foreign direct investment in the manufacturing industry in the third quarter had dropped 8.1% compared to the previous year. However, positive impact from the COVID-19 outbreak to logistic business is the rapid growth of E-Commerce and Online Shopping businesses, which motivate the demand for warehouse. Although, the foreign investor, currently, cannot travel to Thailand, many parties believe that trade war between USA and China remains a positive factor for the lease of factory and warehouse from the relocation in manufacturing of the enterprises in China to avoid tariff for exports to USA.

In the third quarter of 2020, the demand and supply for rental space of factory continuously grow to accommodate the production distribution of the entrepreneurs in China, including their supply chain, with a slightly increase of vacancy rate of rental space because some tenants decide to purchase factories instead of leasing them. Also, the demand and supply for rental space of warehouse has steadily grown, with a slightly increase of the vacancy rate compared to the previous year. It is expected that the entrepreneurs increasingly build the warehouses and factory to accommodate the demand expected to be higher from the EEC policy, along with the increasing demand from the relocation of manufacturing from China to Thailand, as well as supporting the rapid growth of E-Commerce business.

In addition, entrepreneurs in Thailand are increasingly interested in using the service from various logistic service providers, where most of them do not intend to invest in real estate being not the main business of their companies. This is because the investment in real estate will consume a lot of investment cost and a long period of time. Also, these companies must spend a portion of their investment in the development of information technology system, vehicles and people, and they do not have an expertise to invest in the development of real estate. Therefore, various companies in industry sector intend the expert in real estate development to be the developer and provider for such services.

Business owners in Thailand are also becoming increasingly interested in using various logistic services. These business owners usually do not want to invest in real estate that is not part of their main activity because it is costly and time consuming. They will also need to put their investments in developing information technology, transport vehicle, and personnel. Furthermore, they do not have the expertise to invest and develop real estate by themselves. Therefore, companies in the industry expects that someone with the expertise and experience in real estate to develop projects and provide them with the services they need.

## Competition

### • Direct competition from other developers

There is currently a small number of warehouse, distribution centers, and high quality factory for rent developers which are located in the same strategic location as the Company. These other developers include Frasers Property (Thailand) Public Company Limited (former “TICON Industrial Connection Public Company Limited”) and its subsidiaries (Frasers group), Pinthong Industrial Park Limited, and Thai Pattana Industrial Factory Public Company Limited. All three companies develop ready-built and built-to-suit warehouses and factories for rent. However, Pinthong Industrial Park and Thai Pattana Industrial Factory are not considered as our direct competition because they focus on building warehouses and factories for sale or rent to small or medium enterprises.

### • Competition from industrial estate developers

The Company’s competition also includes business owners that start from developing industrial estates and later on expands to develop their own warehouses and factories in their estate in order to add to the products and services they are able to provide. Competition includes Amata Summit Ready Built Company Limited who develops ready-built factory buildings for sale and rent to medium and small operators. These industrial estate developers’ opportunity is limited to their own industrial estates or in the industrial estates for which they provide service. On the contrary, the Company can freely develop properties in any location seen that the Company and tenants want without limitation.

Furthermore, because the Company bought common shares of WHAID Group (former "Hemaraj Group"), the Company has various locations to offer to the tenants which responds to their needs and the Company's flexibility puts us at the advantage when compared to other industrial estate developers.

- **Competition from other small-scale developers of warehouses for sale and rent**

At present, there are several small-scale developers of warehouses and factory buildings for sale and rent located in strategic areas for logistics business. This group of developers only target small to mid-sized businesses who are looking for low-cost warehouses for rent; therefore, these developers are not in direct competition with the Company.



## 2 Industrial Development Business

### Business Strategy

#### 1) No. 1 Leading Industrial Estate Developer in Thailand sustainably

a) Ensure success of estates currently under development such as WHA ESIE 4, RY 36, WHA SIL2 and WHA IER (Joint Venture with IRPC).

b) Leverage on its premium brand and track-record of high quality standards to target higher value industries. Focus on potential customers in the list of promoted business or selected industries benefiting from various incentive schemes.

c) Create ultimate customer satisfaction by improving current products/services and introducing ones new products/services, including partnerships with industry experts.

d) Adopt new technologies and innovation to increase productivity, efficiency and redundancy of its products and services as well its internal processes.

e) Continue the roll out its unique SMART ECO Industrial Estate concept.

f) Develop new partnerships and advance existing ones with land owners for land acquisition and increasing land bank in strategic locations.

#### 2) Brand building for investment opportunities, starting at Vietnam and other countries in the region to allocate assets appropriately

a) Ensure success of Nghe An Project.

b) Leverage on growing Vietnam capability to expand to new locations.

c) Develop strategic partnerships with land owners or significant corporates for land acquisition or new products and services.

d) Explore international expansion opportunities in other regional countries that meet required investment criteria such as target locations and characteristics as well as financial returns threshold.

e) Create WHA Group regional growth platform.

#### 3) Expand businesses to the Industrial Estate Development Project (High-Value Industrial Projects) in Thailand and Vietnam

a) Capture opportunities resulting from EEC or other government schemes / S-Curve industries or successful concepts from neighbor countries

b) Explore potential partnerships and collaboration with Educational Institutions or Industry Experts.

#### 4) Build Company Group into a High Performance Organization

a) Embrace Digital Transformation and develop Digital / Technology and Innovation / Entrepreneurship capabilities

b) Maximize WHA Group synergies



## 3 Utilities & Power Business

### Business Strategy

#### Utilities Business Strategy

#### 1) Continuous expansion of utilities services in tandem with the new WHAID's Industrial Estates

WHA Utilities and Power Public Company Limited ("WHAUP") will continue to expand its utilities facilities in the new WHAID's industrial estates both in Thailand and in regional countries in order to provide

industrial water distribution and wastewater management services to industrial customers as well as introduce other water solutions to satisfy the needs of customers in term of operation management and financial.

## **2) Proactive in expanding utilities business outside WHAID's industrial estates**

WHAUP aims to capture business opportunities from the increasing demand of raw water, industrial water and wastewater management in both industrial and non-industrial markets particularly in the EEC area. The company is developing business alliances with other industrial estate developers to expand utilities business in non-WHA industrial estates by leveraging on its expertise and experience in utilities business, the ability to control cost as well as its well understanding of industrial customers' need. For non-industrial market, the company plans to build up strong relationship with local authorities as well as communities to develop potential collaborations on utilities distribution and management services to serve growing water consumptions.

## **3) Introduction of new solutions, innovation of utilities business to the market**

In order to satisfy various and sophisticated needs of industrial customers, WHAUP targets to offer a more variety of products to customers with a focus on membrane technology and reclamation concept adoption in creating new types of industrial water such as Recycled Water/Reclamation Water, Demineralized Water, Desalination System, Wastewater Pre-treatment, etc. These new solutions or innovations will help reduce raw water cost and offer alternative raw water sources which will not only to serve existing customers but will also help create new customer base.

## **4) Expansion to CLMV, particularly in Vietnam as the highest potential market**

The Company plans to expand its utility business to regional countries, especially to countries with high utility consumption, so it targets CLMV countries especially Vietnam which is a high potential country since the number of populations is growing, the economic growth is strong leading to the increasing manufacturing activities. Currently, WHAUP has started to operate utility business in Vietnam by establishing a subsidiary to operate since May 2018 and in year 2019, the Company

invested in 2 tap water companies. Moreover, the Company Group has gained several business partners, which allow the Company to find investment opportunities in the water business.

## **Energy business strategy**

### **1) Strategy for distributing clean energy at the competitive price**

The Company is aware on the environmental impact by intending the expansion and development of clean energy project with knowledge and understanding in energy technology and the need of customer, effective management both in terms of operation and financial cost. This help in the selection of appropriate technology to meet the need of customer with competitive price and at a lower price compared to competitor, which help reduce the production cost for industrial customer.

### **2) Strategy for implementing the various innovation and smart solutions to the better energy management in industrial area.**

The Company is in the process of studying and developing various energy innovation, including new market structure of electricity such as Peer-to-Peer Energy Trading, studying new fee structures such as Net Metering, Net Billing, studying new technology such as energy storage system, and studying the management and operation of new form of power system such as microgrid systems, etc., in the industrial estate of WHA group, in order to accommodate the transform of energy industry into the decentralized electricity generation and clean energy generation. This will help reduce production cost and enhance the energy stability for the entrepreneur in the industrial estate, and increase the investment opportunity to the Company.

### **3) Strategy in being leader developer of the power plant for captive energy project and microgrid system for industrial area.**

The Company is in the process of conducting feasibility study about the development of the power plant for captive energy project and microgrid systems, in order to distribute electricity and steam to entrepreneur in various industrial areas, by starting from the industrial estate of WHA group, which will improve the stability of the electricity supplied to customer in various factories from nowadays. This is because it will be able to manage



the different kind of electricity production to be cost-effective and consistent with the energy consumption characteristic of the user in the specific area, as well as having low cost of steam production. Also, it promotes the use of alternative energy and helps reduce energy loss from the distribution of electricity through transmission line over long distance, including helping in reduce production cost for entrepreneur in the industrial estate, as well as helping to protect the environment.

**4) Strategy to focus on expansion of its business both in Thailand and CLMV countries, especially in Vietnam where is market with the highest potential**

The Company plans to expand its energy business mentioned above to the market in Thailand and oversea, especially in the country with high population and economic growth rate, and having huge demand for energy such as CLMV countries, especially Vietnam which is a country having potential in investment. The Company is currently in the process of studying in investing the Solar Farm Project and Wind Farm Project, which has a

long-term power purchase agreement with the Vietnam Electricity Authority or EVN.

### Power Business Strategy

Industrial Development Hub and Utilities & Power Hub have similar customer base, mostly based in Industrial Estates. The two-business hubs are accommodating/complimenting one another in providing a full-service business model. The two hubs are focused on International Clients who are looking to expand their investment tapping into Thailand. The majority of the clients are the Japanese manufacturers which has contributed to half of clients' portfolio. Remaining clients consist of those from Europe, the USA and ASEAN (Singapore, Malaysia and Thai). Our clients come from various industrial clusters e.g. automotive, auto-parts, electronic, construction materials, metal casting, consumer products, logistic etc. As of year-end 2019, there were 818 clients with total of 1,235 contracts in the industrial estate with the following client proportion in each industry:

Type of Industry	(cubic meter / rai / day)
Electricity power producer	80-120
Petrochemical	40-60
Others <sup>1</sup>	4-7

Remark: <sup>1</sup> Others consist of Automotive industry, Consumer product industry, Electronic industry etc.

Source: The Company

### Industry Trend

The overview of investment promotion application in 2020 could be summarized as follows;

Type Of Industry	Investment Promotion Application in 2020	
	Number of Project	Investment (Million baht)
Promotion Application	1,717	481,150
Promotion Approval	1,501	361,410
Promotion Issuance	1,320	430,670

Source : <http://www.boei.go.th>

From the number of those application for investment promotion, most of businesses applying for investment promotion are the targeted businesses under the significant policy of the government. There are 12 targeted industries applying for investment promotion that are in line with significant policy of the government, totaling 806 projects with an investment capital of Baht 216,830 million, or 54% of the total approved projects, or 60% of the investment value. Most of the projects applying for investment promotion are the investment in agriculture and food processing industries. The industry with the highest investment value is the automotive and automotive parts industries.

## Business in the utility and energy service

### On utilities

Thailand is considered to be one of the largest water consumers in Southeast Asia by dividing the water use objectives into two main groups are (1) Household consumption such as using water for consumption and general use and tourism and (2) Industrial consumption such as in the various industrial factories. This is in reference to the master plan on the management of water resource, which is prepared by the Water Resource Policy and Management Commission, Department of Water Resource. A report on the water uses for consumption and general use and tourism in 2015 required 4,783m cu. m, while in the future in 2037 is forecast to need water by 5,991m cu. m, and the industrial use in 2015 in the industrial sector had a demand of 1,913m cu. m. It is expected the future water demand in 2037 amounting to 3,488m cu. m. In the main areas with the factories and industrial groups are Bangkok metropolis and the vicinity provinces, including the area in the eastern region, which is the main industrial area. However, in other regions, most of the industries are continuous from the agriculture and production for use within the locality.

*Source: Master plan on water resource management 20 years (2018 – 2037)*

### Power Business

The power business in Thailand is an infrastructure service under the supervision and regulation of the Ministry of Energy, the ERC and the National Energy Policy Board (NEPB), which are in charge of development to ensure the stability and sustainability of the national power

utility. Originally, EGAT was solely responsible for generating power to support nationwide consumption. After demand for electricity sharply rose as a result of economic expansion and population increase, past governments promoted private partnership in the power generation business with a view to mitigating EGAT's investment burden to construct power plants to respond to growing demand for electricity. Starting in 1992, the government launched a policy encouraging the private sector's participation in power generation and invited it to bid for the construction of power plants. Such policy inaugurated a new role of IPPs and SPPs in the country's power generation business in 1994. As there is great support for alternative energy power generation, VSPPs are taking an active role in the country's power industry. Electricity industry in Thailand is a public utility which supervised by the Ministry of Energy (ME), the Energy Regulatory Commission (ERC) and the National Energy Policy Commission (NEPC), in order to develop and supply the electricity of the country with stability and sustainability. Originally, the Electricity Generating Authority of Thailand (EGAT) is a solely electricity generator. Subsequently, the tendency of electricity demand is higher due to the economic expansion and the population increase, the government, therefore, encourages private sector to increasingly participate in generating electricity in order to mitigate the burden of EGAT, by construction of the power plant to accommodate the increasing demand for electricity. Since 1992, the government has established the policy to enhance the role of the private sector in generating the electricity and allow them to participate in bidding for the construction of power plant. As such, there are the independent power producer (IPP) and small power producer (SPP) who have involved in the electricity generation for the country since 1994. At present, due to the promotion in utilization of renewable energy for electricity generation, there are many small power producer who has entered into the industry of electricity generation for the country. The cost for generation of electricity from solar has rapidly fallen in the past period, as such, many entrepreneurs have invested in installing the generating system for solar electricity, for their own use or distributing to user in industrial factory or other large establishments. This is because they can produce electricity with an average cost per unit lower than electricity purchased from the Provincial Electricity Authority (PEA) and Metropolitan Electricity Authority (MEA).

According to the development plan for electricity generation of Thailand B.E. 2561 – 2580, (as amended no. 1) (PDP 2018 revision 1), the Ministry of Energy has maintained the capacity of electricity generation under the agreement at the end of the plan for 77,211 MW times according to the PDP 2018 revision 1, in order to maintain the stability of the electricity system of the country. The capacity for the generation of electricity from renewable energy remains at 18,696 MW, but the target and plan for distribution of the electricity generated from the renewable energy are adjusted to be in line with the community power plant policy for the foundational economy under the promotion policy of the government.

The demand for electricity in the country depend on the economic condition. The average growth rate is approximately 0.9 - 1.1 times of the GDP growth rate. For the industry trend in 2021 – 2022, the power business provided by private party is possible to grow better, which is driven by both demand with the certain market and supply from the investment promotion policy of the government under the plan for development of electricity generation capacity and plan for development of renewable and alternative energy. In this regard, the investment in power plant has grown since 2021, consisting of solar power projects installed on the roof of the private shelter, biogas and trash, respectively, because these are the target group which the government will gradually purchase electricity. Also, it is also a group which has competitive potential in terms of cost and material sources.

*\*Source: Trend on electricity production business industry, Krungsri Research on 30 July 2020.*



## 4 Digital Platform Business

### Business Strategy

#### 1) Strengthen market share in the domestic market of digital platform services

The Company will continue to focus on expanding market share in the domestic market by providing Data Centers, FTTx, and Managed services to WHA Group's customer-base of more than 1,000 customers. In addition, the global trend of digital economy as well as the Thai government's new economic

initiative, Thailand 4.0, with an aim to transform Thailand into value-based economy will translate into higher demands for IT related services, which the Company has various of services to accommodate future needs.

Another way that the Company aims to boost its market shares is to expand new product offerings. The existing platforms will allow the Company to create new products, reaching larger market demands and, hence, market shares. The new products that the Company studies includes Cloud Solution services. With the completion of data center, the company can package product to better suit customer needs. For example, the Company can collaborate with existing System Integration (SI) and Telecom Provider companies to bring their IT infrastructure and Cloud services into the Company's data center facilities to deliver the best services to their customers.

The Company understands the dynamic nature of digital market and stays on guard for any changes in technologies (i.e. Big Data, and Internet of Things - IoT) in order to attract new market demand and supply.

#### 2) Implement digital platforms within WHA group to upgrade facilities and enhance business values

The Company plans to implement digital platforms across other business hubs in order for these hubs to install new technologies such as automations and Internet of Things (IoT) into their infrastructures and facilities. These technologies will not only enhance operation efficiency, but also increase value of the assets by attracting innovation-prone industries.

#### 3) Expand the digital infrastructure and solution along with the rapid movement of technology by offering to CLMV region

In the meantime, the Company also studies opportunity to expand operations overseas by following footstep of other business hubs. The target locations under the Company's radar being Cambodia, Laos, Myanmar, and Vietnam (CLMV) markets as studies have shown that such market has a high growth potential in digital platform services because the demand for IT related services outpace the available digital infrastructures. The oversea experiences and facilities from other business hubs will allow the digital platform hub to reduce some risks associating with oversea investments.

## Target Customers

### 1) Customers in WHA Group's Core Business

More than 1,000 customers in all main business hub of WHA Group. The Company expands to serve in digital platform which the company would focus to customer in group of medium and large business size such as Automotive Industry, Logistics Industry, Electronics Industry etc. in order to meet the increasing demand for digital services. In addition, the trend of using the technology in the production process to enhance the customer's business operation which it is rapid growth and technological change in this time. However, the government has promoted investment in the country by focusing to develop the Eastern Economic Corridor (EEC) has been promoted. The EEC has supported the investment in 10 target industries which is a business innovation and IT services is the necessary key for running a business. Therefore, the Company have continually improved our digital services capabilities in order to serve our target customers in the future.

### 2) Customers in WHA's collaborative System Integration

The Company plans to grow with its partners by providing a full range of support services such as the provision of data center services to its integrated System Integrator (SI), Managed Service and Business Process Outsourcing (BPO) customers. To provide full service to customers. This enables customers to efficiently manage their resources.

### 3) Customers in international country and CLMV market.

The Company has realized to foresee the business opportunity growth in international country especially in Cambodia, Laos, Myanmar, Vietnam and Indonesia as WHA Group has started expanding its presence abroad. For example, the Logistic Hub is building a warehouse and factory for rent in Indonesia. In addition, there are plans to further develop the industrial estates in Vietnam. As a result, the Company foresee this opportunities to expand its digital services to cover the customer in these countries which they have high demand.

## Product or Service Procurement



### 1 Logistics Business

Land is the major cost of the Company's business. The Company has set out the following policy on land acquisition:

#### Land Procurement

The Company's policy is to acquire land when needed rather than holding the land bank without development for long period of time. Land acquisition is made in accordance with the investment plan to match specific needs of customers (Built-to-Suit) and to reduce interest obligations incurred from acquisition and accumulation of a large number of lands with no potential projects. However, the Company may consider acquiring larger piece of land if the land is connected to the existing projects which can be developed for expansion for tenants who clearly express their interest in expansion of the leasable area in the future.

The Company acquires land from the owners directly or by leasing land from the Company's partners or by purchasing land through agents. In this respect, the Company usually selects land plots in at least two locations to allow the Company to have bargaining power and to acquire the land at the preferred location at a good price.

#### The Company's criteria for land acquisition are as follows:

- Location of the land must be connected to a road network according the requirement and the need of tenants and it must be in a strategic location for logistics business near a port or in a zone entitled to privileges from the Board of Investment (BOI) which will also meet the need of other and new tenants once existing lease agreement expires.
- Land price must not be too high for both freehold and leasehold land. Land must generate a competitive monthly lease for the Company.
- Land must be of an appropriate size for first development as well as for expansion of future projects



of tenants. It should also be flexible in terms of suitability for the need of new tenants.

The Company's land management team studies, analyze, retain and update land data so that the Company has data on location and land with potential for development of new projects and the Company can evaluate and set a strategy for acquisition and budget required accurately. Such data will be transferred to Finance Department for financial planning for the most appropriate and the most economical capital sourcing for land acquisition.

### Selection of Construction Contractor

The Company divides selection of construction contractors into two categories based on type of projects as follows:

1. Contractor selection for Built-to-Suit project: The Group of the Companies sends an invitation to bid to construction companies and makes preliminary agreement on pricing before proposing the price to customers. However, not all decisions for selections are made by the Company. Tenants may want to select a construction company themselves or it has already been nominated.

2. Contractor selection for Ready-Built Warehouse Project: The Company invites all bids from construction companies, negotiate and select construction companies based on the procedure and the criteria set out by the Company.

Since the Company selects a contractor regularly, the process for contractor selection and the evaluation process has been established in the light of transparency, fairness and in accordance with a good corporate governance, details are as followed:

### Procedure for the selection of the construction company

- Send out the requirement and the Terms of Reference (TOR) to construction companies listed in the pre-approved list. For new construction companies, their qualification and project history will be thoroughly verified.
- Consider bidders' proposal for both technical aspect and pricing aspect.

- Make selection by the selection committee.
- Enter into a contract with the selected construction company, most of which are turnkey contract, which includes project design, sourcing of construction materials and construction agreement. The construction agreement will clearly indicate labor cost and cost of raw materials.

### Criteria and policy for selecting construction company

- The Company specifies and verifies construction companies in the pre-approved list while promoting fair, transparent and open competition by providing detailed requirements and scope of work in advance to at least two construction companies for bidding.
- Factors used for consideration and selection of construction companies are past projects, quality upon hand over, construction time, offered price and after-sale service.
- Selection of a construction company must be approved in accordance with the approval authority and the regulations of the Company.
- Contracts are reviewed by an expert legal advisor.
- There is a segregation of duties for contract execution, inspection for hand over and account recording.
  - Contracts will be executed by the authorized directors of the Company.
  - The Company's construction management team is responsible for inspection for hand over. They will inspect completed projects and provide a monthly progress report to the management. Inspection for hand over includes quality inspection and progress inspection against the terms and conditions in the contract.
  - Finance & Accounting Department verifies all documents and makes a record and payment upon due as specified in the contract after the project management team has inspected and received the project.
- The Company establishes guidelines for relevant units, for example, Guideline on Selection of Construction Companies, Operation Guideline for Project Management Team. All units must comply with the guidelines and the specified work process.

## Environmental Impact

The Company's policy on construction of warehouse, distribution center and factory buildings is based on good practice and strict control with a focus on construction process that minimizes impact on the environment. The Company also promotes and encourages preservation and energy saving. Before the tenants commence their operation, the Company will glance at their credibility, company profile, products and financial statements.

The Company also specifies in the lease agreement entered between the Company and a tenant who stores hazardous substances that the tenant must strictly comply with the regulations on environment preservation so that the Company's business does not have negative impact on the environment. Based on such practice, the Company has never breached any environmental law or had any environmental dispute.



## 2 Industrial Development Business

Land is the major cost for the industrial estate development. The Company has set up land procurement policy, details are as followed:

### Land Procurement

WHAID Group purchase lands from local owners directly or from allies of by considering from the location of the project with connection to a road network, near a port or in a zone entitled to privileges from the Board of Investment (BOI) with affordable term condition. Land price must not be too high in order to develop in industrial estate and sell off the clients with sufficient profit margin and to be competitive in the market. Additionally, land must be accumulated into a large land plot in order to gain the benefit from economy of scale.

The project must be a nearby water source to drain wastewater and the land size shall be appropriate for development. Land soil is another crucial factor, it must have adequate strength to support the fundamental work of the structural buildings.

## Environmental Impact

WHA ID's industrial estates provides wastewater treatment system, waste disposal system and public utility system with standard in accordance with the specification defined by Industrial Estate Authority of Thailand and approved by Office of Natural Resources and Environmental Policy and Planning. WHA ID's industrial estates have been complied with all relevant laws and regulations.



## 3 Utilities & Power Business

Raw water and fuel for electricity energy generation are important raw materials in doing business for the service on utility and energy with the policy on procuring raw materials of the various types as follows:

### Providing of raw water

The business providing service on utilities (operated by WHAUP company group) is the business that needs to have sufficient raw water source for service to the customer, operator and/or lessee of the industrial estate. Moreover, it is for production of industrial water for sale to customers in the industrial estates by the WHAUP company group shall provide raw water from the three sources for servicing are:

(1) Eastern Water Resources Development & Management PCL ("EASTW") is the company that is granted a large concession in the eastern region, which provides the service covering the areas of Chonburi, Rayong and Chachoengsao provinces.

(2) Royal Irrigation Department is buying raw water from the Irrigation Department via WHA Saraburi, Industrial Land Co., Ltd. which is a company in the WHAID group.

(3) WHA Industrial Development group such as water from the natural wells in the WHA Industrial Development area, which is prepared for the objective of preventing water shortages of the operators inside the area, and has the objective to drain water and prevent from flood problems inside the industrial estate.

## Procurement of fuels

The business on providing the energy service (operated by WHAUP group) with the energy generated from conventional power plant and the renewable power plant. The fuels used in the power production can be divided into two types as follows:

(1) Fuels with the cost from buying or procuring

### ● Coal

Signing the contract for coal supply and transport agreements with a large contractual party of Indonesia to procure and transport of bituminous coal from Indonesia to Ket Co-One power plant as a fuel for power generation in accordance with the process specified in the electricity purchase/sale agreements.

### ● Natural gas

The purchase/sale contracts were signed with Petroleum Authority of Thailand (PTT) for 25 years for Gold IPP Power Plant, Gulf JP NLL Power Plant, NLL, B. Grim Power Plant (WHA) 1, Gulf VTP Power Plant, Gulf TS 1 power plant, Gulf TS 2 Power Plant, Gulf TS 3 Power Plant, Gulf TS 4 Power Plant and Gulf JP NLL 2 Power Plant.

(2) Fuel without cost from buying or procuring

### ● Water

It is the main ingredient in power generation of the hydropower plant, with the water acquired from the natural sources, and no cost from purchasing or procurement. However, the water volume in each year may be varied depending on the weather and rainwater volume during the season.

### ● Sunshine

Sunshine is the important ingredient in the power generation by the solar power plant. The sunshine derived from the natural source at no cost to harvest. However, the volume and intensity of the sunshine each period may be uncertain and cannot be predicted with accuracy, depending on the season and the weather condition each duration.

## Impact on the environment

In the production and distribution of water for industry and wastewater management, the company has given priority on the impact to the environment that may occur in the process, e.g., sediment and water that has passed through the treatment process. It shall abide by the rules and procedures on operation strictly with the implementation for control and management of the impact on the environment as follows:

(1) Sediment There is hiring an operator who has skills on disposal of it and licensed in accordance to the law to take the sediment for burying.

(2) Treated water shall be inspected on the quality before being released into the natural water source, which it shall have the quality to comply with the relevant law and requirements. Moreover, the WHAID group also has invested to install the modern equipment to inspect the water quality continuously, e.g., the online monitoring system (EMC2 system) for the engineer can inspect the quality and efficiency of the wastewater management system closely. Moreover, there is management of water integration by recycling for optimization.

Furthermore, since WHAUP has been certified on ISO 14000:2004, which is involved with the conservation of the environment by complying with the strict standards. In the past WHAUP has never had a dispute or filed a lawsuit related to creating an impact on the environment, nor has been admonished or penalized by a state agency pertinent to the law that WHAUP has to abide by whatsoever.



## 4 Digital Platform Business

-None-

## Backlog Projects



### 1 Logistics Business

As of 31 December 2020, the Group of Companies has the following projects under construction and having not recognized revenue.

Location	Company	Leasable area (sq.m.)	Project Status	Project Progress (% of Completion)	Expected completion and revenue recognition
1 Laemchabang	WHA Venture Holding Co., Ltd.	24,310	Under development	90%	Q1 / 2021
2 Bangna - Trad KM.7	WHA Venture Holding Co., Ltd.	24,238	Completed	100%	Q1 / 2021
3 Bangna-Trad KM. 23	WHA KPN Alliance Co., Ltd.	3,155	Under development	10%	Q4 / 2021
4 Bangna-Trad KM. 23	WHA KPN Alliance Co., Ltd.	3,155	Under development	10%	Q4 / 2021
5 Bangna - Trad KM.23 Project 3	WHA Corporation PCL	30,030	Under development	80%	Q2 / 2021
6 WHA Rayong Industrial Land (WHA RIL)	CENTRAL WHA Alliance Co.,Ltd.	30,208	Under development	10%	Q3 / 2021
7 Wangnoi KM.63	CENTRAL WHA Alliance Co.,Ltd.	9,929	Under development	10%	Q3 / 2021



### 2 Industrial Development Business

As of 31 December 2020, the Group of Companies has backlog in 6 locations totaling 358 rais.

Location	Company	Leasable area (sq.m.)	Project Status	Project Progress (% of Completion)	Expected completion and revenue recognition
1 WHA Eastern Seaboard Industrial Estate 1 (WHA ESIE 1)	WHA Eastern Seaboard Industrial Estate Co., Ltd.	39	Completed	100%	2021
2 WHA Eastern Seaboard Industrial Estate 2 (WHA ESIE 2)	WHA Industrial Development PCL	187	Completed	100%	2021
3 WHA Chonburi Industrial Estate 2 (WHA CIE 2)	WHA Industrial Development PCL	21	Completed	100%	2021
4 WHA Rayong Industrial Land (WHA RIL)	WHA Rayong Industrial Land Co., Ltd.	36	Completed	100%	2021
5 Eastern Seaboard Industrial Estate (Rayong) (ESIE)	Eastern Seaboard Industrial Estate (Rayong) Co., Ltd.	3	Completed	100%	2021
6 WHA Industrial Zone Nghe An, Vietnam	WHA Industrial Zone Nghe An Joint Stock Company	72	Completed	100%	2021



### 3 Utilities & Power Business

-None-



### 4 Digital Platform Business

-None-



## RISK FACTORS

### 1. Overall Risks from Business Operation

#### 1.1 Risks from Changes in Economy, Domestic Politics, and other Macro Environment Factors

As many of the Company's customers are international companies, the economic changes in both the national and the global levels have an effect on the Company's customers and revenue. Unfavorable changes might delay customers' investment plan. For instance, the COVID pandemic and resulting travel restrictions have affected land sales in Thailand in 2020.

Nevertheless, Thailand remains attractive to foreign investors who want to invest in South East Asia due to the labor quality and the acceptable wage rate in comparison to those in European countries, the United States, and other Asian countries. Moreover, manufacturers located in China tend to move parts of their production to Thailand or Vietnam due to the trade tensions between US and China. This has a positive impact on the Company. Thai infrastructures and public utilities are also of high quality. The Thai Government has supporting policies for the Eastern Economic Corridor (EEC) to attract foreign investments. The incentives proposed under the Thailand Board of Investment are among the most competitive in the region. For instance, foreign companies can have access to free-hold land under BOI and IEAT. Even in the time of economic and political uncertainties, the Company's solid business model has enabled to deliver satisfactory financial performance. The Company does not have to rely solely on one business, or one country, as the constant revenue from the rental service and the utility service and potential revenue from Vietnam help balance the revenue structure.



#### 1.2 Risk from interest rate fluctuations

The business operations of the company requires high investment. The current portion of long-term loans from financial institutions at the end of 2020 are approximately THB 9,603. mm., and a partial loan charged with a floating interest rate. Therefore, if the interest rate in the market has adjusted higher the company would have a burden on paying higher interest that can impact our profit to be reduced.

However, the interest rates of most of the loans from financial institutions are currently below the Minimum Lending Rate (MLR) determines by each institution. In addition, the financing plan for project development of the Company does not rely solely on the loans from financial institutions as the Company also has other financial sources, especially through the stock market and the sale of assets to trust, which would be the key financial sources for the future investments. Since the Company is listed on the Stock Exchange of Thailand, it is able to raise funds from the capital market. In 2018, 2019 and 2020, the Group of Companies issued debentures worth THB 11,800 mm, THB 5,700 mm, and THB 7,100 mm, respectively, with fixed interest rates to lower the risk from the interest rate fluctuation.



### 1.3 Risk from investment in the future project

The company has a plan on expanding its investment continuously both inside and outside of the industrial estate and the industrial-operating zones domestically and internationally. The development and investment in the new projects of our group of companies can have a risk on the investment plan that do not follow the projection and the plans as projected or not receiving a return as expected (e.g. there is a delay from a factory construction and a procurement of raw materials, a change in the foreign regulations, the foreign political uncertainty and the risk from the fluctuation in exchange rate and the interest rate, etc.). When such the incidents happen may affect the operating results and the financial status of the company group significantly.

In order to reduce such risks the company has considered selecting the investment project with the Equity Internal Rate of Return at the suitable level and make a feasibility study, including the Sensitivity Analysis in detail. Moreover, if it is a joint venture, the company has a policy to choose a joint venture partner carefully by considering from the knowledge, capability, experience, skills, financial status and historical performance of the partner as well.

## 2. Risk from Logistics and Industrial Properties

### 2.1 Risk from Competition from Industrial Estate Developers and Other Developers

At present, the industrial estate developers and other developers have constructed the factory and warehouse the same as our company. However, most of the developers in the industrial estate business would sell and lease the Ready-Built factories, and would limit the service to their own estate, while our company aims to develop the quality projects designed in response to the Built-to-Suit and the custom made for the customer. Moreover, the company also uses the benefit from the skills on the project design of the Built-to-Suit model based on the high skills to develop the project so-called the Warehouse Farm. It is to provide the service of the Built-to-Suit type to support the need of some main

customers with the particular characteristics. For instance, the area is reserved for an expansion of the future, and the Ready-Built Warehouse to support the customer-based new group. It also responded to the market demand promptly, but still maintained the policy on finding the location that is a strategic point of transportation and distribution as well as the consistency with a demand of the customers. It can be seen that the company has responded to the demand of the customers that is rather different from its competitors in the market.

At present, there are few high-quality Built-to-Suit providers, due to the obstacle on entering the market of this type is high, and is difficult to succeed. This service requires the expertise and detail orientation to understand the complicated requirements of each client, and requires high investment. It requires understanding of the location and the ability to procure and invest in the land that responds the demand of the customer jointly with that of the company. It includes the experience, flexibility and patience in a joint design and development of the product considering the maximum benefit of the customer. Moreover, the past success must be built on confidence of the lessees, who mostly come from the transnational companies with the high-standard measures of selection. Moreover, the company also has a policy to promote the continuous learning development and continuously improve the quality of the warehouse and our service to be better all the time.

### 2.2 Risk of No Tenant in the Developing Projects and Risk of No Renewal in the Existing Projects

The Company's rental business includes the Built-to-Suit service, in which a contract is signed prior to the construction, and the Ready-Built service.

For the Built-to-Suit service, a lease agreement is signed prior to the construction and mostly is long-term lease, so the risk of the company from no tenant is at the low level. Moreover, the project in this type mostly the tenants tend to renew the contract due to such the project has the starting point from the finding of the location between the company and the tenant, including the company gives priority on the design, construction and service to ensure the maximum benefits for the tenants and the maximum satisfaction and confidence in the Company. However, the cost on relocation for a

new place is rather high, and then the risk of the company from the main tenants decided not to renew the contract is at the low level. At the end of 2020 most of the tenants of the groups (e.g., Central Group, DKSH, Thai Beverage and Hitachi, etc.) other than renewing the old lease, also there were an expansion of the leasing area with our group continuously. These groups of the tenants mostly have started to lease in the Ready-Built type with the company first, and then expanded the leased area and switched it to the Built-to-Suit warehouse type later on.

Moreover, if the tenant decides not to renew the lease term, the company can bring the project although it is the Built-to-Suit type to adjust the details to be corresponded to the need of a new tenant. Meanwhile, the advantage on the location, quality construction and system work, including understanding and the in-depth knowledge of the company in the design and supervision of the construction make the company confident on finding a new tenant can be achieved within the suitable time. Moreover, the company still has time on planning to find a new tenant reasonably, but it shall abide by the conditions in the lease that states the tenant has to give a notice a minimum of 3-12 months in advance.

For the Ready-Built Warehouses/Factories, there might be risk of unoccupancy because the projects are developed before the lease agreement is signed, but the company has developed such the project in response to the need of some type of the tenant who wants to use the building promptly, including the management of the cost of construction and the use of a new area for optimization. Unless being severely affected by the external environment factors, the Ready-Built clients would renew the contracts because of the quality of the properties which are satisfying and acceptable to the tenants. In case a tenant doesn't renew the contract, the Company is able to find a new tenant in a short time. The Company focuses on the location of the projects, which makes the Company confident in finding new tenants promptly. The Company also focuses on the design and quality of the structure of the projects and maintains the high standard, resulting in high interest from the prospective tenants.

## 2.3 Risks on Overdue Rental Payment under Lease Agreements

The risk arising from overdue rental payment under lease agreements may happen in the case the customer is negatively impacted from the economics and the industrial sector or by the operations that affects their financial status and, thus, their ability to pay rent. The Company may be affected by a drop in rental revenue as it has an effect on the financial liquidity.

Nonetheless, the company expects such impact is not significant due to the main customer group is the leading companies with financial stability at the high level. Moreover, the Company requires tenants to place cash deposit and/ or a bank guarantee as security against payment of rental and service fee. It's stipulated in the lease agreements for Built-to-Suit projects that in the event of early termination by the tenants, the tenants must pay the compensation of the amount equal to the total rental charges for the remaining period.

## 2.4 Risk from the Reliance on Few Contractors

The core business of the Company includes developing projects for rent and sale, whereby the Company would hire contractors under turnkey contracts for the construction in accordance with the designs agreed by the clients. The Company has a process of selecting well-known contractors having the qualifications specified by the Company and putting them in the short list. However, B.S.Y. Construction Co., Ltd. is the contractor that won the auctions for almost every project, especially the Ready-Built one. The contractor possesses the qualification according to the selection criteria in terms of the quality, construction cost, expertise and experience, capability to deliver the projects on time as well as after sale service. For the Built-to-Suit projects, the tenants are also involved in the contractor selection process. Therefore, the Company is having the risk of relying on B.S.Y. Construction Co., Ltd. For the development of the Company' projects.

However, the Company does not have a policy to hire only B.S.Y. Construction Co., Ltd. and always seek cooperation with other contractors of high standard. The process to select contractors is carried out in a systematic and transparent manner through the bidding process, except the Built-to-Suit projects, in which the tenants or the existing tenants would specify the contractor.

The Company's business is made up with different elements, for example, the source of funds, expertise in selecting locations, design and layout planning, and good relationship with tenants. It's the capability of the Company to develop high quality projects without depending on a single contractor. The Company integrates the elements and builds a close cooperation with the clients, contractors and state agencies concerned. B.S.Y. Construction Co., Ltd. has engaged in the construction business and been widely recognized in the market for more than 20 years. It does not intend to engage in the same business as that of the Company. In addition, the executive members of B.S.Y. Construction Co., Ltd. are not related to those of the Company. The Company regards it as a good business partner.

In addition, the Company has signed a Memorandum of Understanding (MOU) with B.S.Y. Construction Co., Ltd. on 22 March 2012 to determine the collaboration between the two parties by specifying the framework of product development in terms of quality and price with the intention to allow the tenants to efficiently compete with their competitors. Such agreement also entails the application of knowledge in the development of products, technical data and/or relevant know-how that are beneficial for the construction of warehouses, distribution centers, or factories, which have been registered to the joint ownership of the Company and B.S.Y. Construction Co., Ltd. Moreover, B.S.Y. Construction Co., Ltd. has agreed to bid in a Built-to-Suit project upon the request from the Company. B.S.Y. Construction Co., Ltd. has also agreed not to disclose the technical data and knowledge developed with the Company, or to use it in the projects of the Company's competitors, or to agree on a similar agreement with the Company competitors without consent from the Company. On the other hand, the Company does not have the obligation to hire a specific contractor. Therefore, the Company may hire any contractors apart from B.S.Y. Contractor Co., Ltd. The

Company, thus, may work with other contractors by applying the jointly-developed knowledge in accordance with the standard determined by the Company to ensure the maximum benefits for the Company and the tenants without breaching any provisions in the MoU.

## 2.5 Risk from the Land Procurement Policy for the Development of Future Projects

As for the real estate development business for rental and service income, the company has a policy on purchasing the land, which is focused on finding the land with potential and can be developed promptly or in the near future. Therefore, the Company does not have a policy to purchase land without development plans or if it's uncertain whether there would be tenants or not. However, since the increased competition, it has intensified the competition for buying or leasing the land in the good location among the developers. It may cause the company to have a risk from the land prices are higher, or the company cannot buy the land in the required location under the desirable cost. The Company may have to bear the higher cost of project development or may have to abandon the investment plan because the return on the investment may not be in accordance with the criteria specified by the Company.

Nonetheless, the company has planned on a survey and purchase of a land to be consistent with its project development continuously. As it has envisaged, a land bank without a development plan to support it, or no clarity that who is the tenant or is inconsistent with its business plan, can create a problem on financial liquidity to the company. Thus, the company has aimed to purchase a land in the amount that is consistent with the company's business plan, which a project can be developed immediately or in the near future, or being a land that is planned jointly with a customer for their extended project. There is also a policy in the investment on the leasehold land for some plots considering a feasibility study of the return on the investment as priority. It helps the company can procure the land with potential to develop the project in the agreed location jointly with the tenant better than the land bank like other developers. It also has the flexibility to support an expansion of the tenant's business and can control the cost of the land to be at the suitable level.

## 2.6 Risk of revenue fluctuation from selling properties to REIT for property investment purposes

The Company's main sources of income are property rental, services and sales of properties. Income from properties sales is mainly sales to REIT which required approval from REIT's unit holders. In addition, the Companies is a unit holder with no right to vote as the Company is considered a related party on this behalf. Therefore, any year time that the Company does not have any property sales activity to a REIT or property sales plan is delayed, total income and profit can be fluctuated.

During 2018, 2019 and 2020, the Company recorded income from sales of properties to REITs including share of profit from joint ventures from sales of properties to REITs for THB 3,280 mm, THB 1,800 mm, and THB 2,370 mm, respectively. (During 2016, the Company has set up a new investment trust namely, Hemaraj Leasehold Real Estate Investment Trust "HREIT") There is indeed possibility of risks for the Company selling of properties to REIT if the REITs delay their new asset acquisition due to insufficient fund raising. However, the Company monetized the properties to REITs which are consider as Investment Grade from Credit Rating, resulting, increase REIT's loan capacity from normally maximum loan at 35% of total asset value to 60% of total asset value. As a result, REIT will have a lower cost of fund, and increase investment return to the unit holders which makes REIT investment more interesting. The Company expects continuation of selling more properties to REIT. Moreover, the Company will consider selling properties to other potential parties such as tenants of existing projects or other investors, etc.

## 2.7 Risk from the Competition with the property fund and REIT

The main revenue of the property fund and REIT derives from the lease of properties in which the property fund and REIT invested, which are similar to those developed by the Company. The Company is responsible for the lease management of those properties. Therefore, there is a risk of the conflict of interest between the Company and the property fund or REIT, in the case that both the Company and the property fund or REIT have vacant areas that are located in nearby location and meet the tenants' requirements at the same time and the risk of the current tenants relocating to the conflict of interest party's area.

However, normally the tenant who wants a project area shall decide from their need as priority with the selecting criteria, e.g. the location, size, specific characteristics and the time frame of using the area. Moreover, the possibility that the existing tenants for Built- to-Suit properties not renewing the lease term is rather low because those lease terms are long-term agreements, and the tenants have invested in the installation of equipment and local labor, resulting in high relocation cost.

Nonetheless, in the case there is a competition between the company and the property fund or REIT, the competition would be transparent in accordance with the arm-length basis. The management team of the Company, in the capacity of both the property developers and the property manager of the property fund and REIT, has the intention to ensure that the Company, the property fund, and REIT would grow together sustainably.



## 2.8 Risk from the Expansion to the Office Building Leasing Business

The company has expanded its business to office building leasing business by starting from the first project on Bang Na – Trat Road, which it has built in accordance with the requirements of the tenant, and from purchasing of the SJ Infinite I (formerly Equinox) office building. The Company intends to increase the proportion of recurring income and alleviate the risk of relying on a single business. However, the purchase of the SJ Infinite I building has affected the Company's financial situation and created a short-term risk because it's a new building so the Company is receiving small amount of incomes from the tenants who have moved in while bearing the costs and expenses that have incurred since the date of the acquisition of the building, for example, the depreciation cost, which must be recognized in the accounting in full. In addition, there is a risk that the tenants would relocate to other places as there is huge supply of office buildings in Vibhavadi area.

Nonetheless, the overall office building market in such the area has improved continuously due to the high demand to use that area. While the demand for the good quality office building was still in short supply and insufficient to meet the demand at present. Moreover, some demand also comes from the tenants of the other office buildings for an increased area, but the old office building was not sufficient to satisfy it. As the SJ Infinite I office building was a new one with good quality and flexibility on negotiations for the rent, there were companies interested in relocating to the new and quality building with the little difference in rent. So SJ Infinite I office building had the continuous growth all along. At the end of 2018, 2019 and 2020 had the average leasing rates of about 93, 87 and 81 percent respectively of the entire leasing area.

In addition, in November 2015, the Company sold two buildings to WHABT, which has recently been established to invest in commercial projects, whereby the Company is holding 15 percent of the WHABT's shares. Such transfer of business helps reduce the risks and increase the liquidity and the proportion of incurring income of the Company.

## 2.9 Risk from natural disasters and accidents

An occurrence of a natural disaster and accident may cause damage to the property of the company, including may cause loss to life and property of the employees working in its various projects. It includes most of the projects have been leased to the customers in the business that stored goods of the type that can easily be damaged by a flood, e.g. medicine, medical supplies, consumer and consumption goods, etc. It may also pose a risk toward the business of the tenant or the customer of the company, if there is an incident of a natural disaster, especially a flood, which can affect significantly on the business operations of the company.

In the past the company has been aware of the possibility of these risks, it has given priority on choosing the project location, and providing the suitable security service. Moreover, it provides a design of the project roads to be on a higher ground than the main public road in front of the project, or by about 30 – 50 cm higher than the highest flood water level in the last 30 years in that particular location (depending which is higher). The project design has the building ground which is raised higher than the project road level by about 0.8 – 1.5 m. Furthermore, the various project buildings have been designed to be able to build flood embankments at the level of about 2 meters high from the building floor level. None of the Company's projects suffered severe damage from the flood disaster in October 2011 including the warehouses in the Bangpa-In Industrial Estate in Ayutthaya, which was severely damaged by the flood. The damage assessment report reflects that there was no substantial damage to the properties and no loss of rental revenue as the tenants continued to pay rents and didn't express an intention to relocate the warehouses or terminate the contracts. The projects for rent of the Company are scattered in different locations so the risks from location are diversified. Nevertheless, the Company has applied for all-risk insurance covering all kinds of damage caused by natural disaster and accidents for every project. After the 2011 flood, the insurance company has determined the limit of the compensation for damage caused by flood for each project based on the project's location.



As a result, the Company would be responsible for any repair costs of the damage caused by flood if the value of the damage exceeds the compensation limit determined by the insurance company. However, the Company is confident that it has proper plans and preventive measures to deal with floods. Therefore, there is little chance that the damage from floods in any projects would exceed the compensation limit.

### **3. Risk from the Industrial Estate Development Business**

#### **3.1 Risk from the Reliance on the Clients in Automotive and Petrochemical Industries**

The company has a risk from relying on the customers in the petrochemical and automotive industrial groups. The company has a petrochemical (71) and automotive (276) industrial groups, totaling 347 companies out of the total of 844 customers, or 41% of the entire customers. If this group of clients decide to decrease or delay investment, the sale of land and other related revenue may be affected.

The company has prevented the risk and the impacts from such the factors by planning on marketing to penetrate the diverse target groups, not only the petrochemical or automotive groups, so it did not depend on one industry too much. All the 10 industrial estates and the industrial zones of the company in Thailand have penetrated the diverse targets, e.g., electronics, energy, steel, construction materials, logistics and food, etc. The Company has also regularly monitored and analyzed the proportion of the investment in different industries in the country before adjusting the strategies accordingly. In addition, the Eastern Economic Corridor (EEC), which plays an important role under Thailand 4.0 roadmap by upgrading the eastern corridor to become “World-Class Economic Zone”, showed significant progress in 2020. EEC is anticipated to attract investments for super cluster and the target industries that spread across different industries. As a result, the Company is expected to be a beneficiary of such development from having large availability of sellable lands in both developed and developing industrial estates, which are located in the EEC areas. Combining such benefit with the expansion to develop an industrial estate in Vietnam, the Company will be able to enhance business opportunities and also diversify customer concentration.

### **3.2 Risk from Floods**

With reference to the floods in several areas of the country in the past, especially during the rainy season of 2011, have caused damage to many business sectors and undermined the confidence of the prospective investors and the existing investors planning to expand their businesses in the same areas. The investors have turned to giving priority to the selection of the project location to avoiding and reducing the risk due to a flood even more.

Nonetheless, in the consideration of the location suitability of the project, the company has considered multiple factors, including on readiness of the infrastructures, e.g., road, electricity system, size of the project area that can support the development, including the risk of flooding. At present the company has nine industrial estates and industrial operating zones in the eastern region or the eastern seaboard, where all of which located on a high ground. It can reduce the risk and prevent from an outside flood. In addition, the projects have been designed on the construction to collect rainwater in a retention pond. Moreover, the rainwater drainage inside the project can drain the rainwater effectively during heavy rains. Meanwhile, another project in the Saraburi WHA operating zone is situated in the Central region basin zone may have a risk due to a flood in the case of the overflowing from the northern region, and rainwater drainage from the dam in large volume. Nevertheless, the company has been aware of such risk factors, so it has assigned the experts to study the physical environment of the surrounding areas by building a model using the past heavy rains statistics. It is to compare the capability of the existing flood-preventing system, and the Company has also improved and strengthened the earth dykes to prevent outside water from flooding the area. Furthermore, the Company has upgraded the rainwater drainage in the operating area that is the bottleneck as well as setting the working level of each rainwater pump to work automatically at the different levels. It is to help in the collection and draining of rainwater to retention ponds faster. It is to reduce the risk of the overflow of water in the drainage channel, especially during the rainy season or the monsoon season. In addition, the measuring instruments are installed in the water channel at the important points, and linking to the central control center of the operating zone to help forecasting the trend of the water levels and can

respond it in time. Furthermore, it has inspected and maintained the systems and instruments and machines regularly to be able to work effectively at all time.

Since the internal and external areas of the project have a constant change; the project industrial estate and the various industrial zones have provided an inspection and evaluation of the area conditions using a drone before and after the rainy season. It is to ensure that the various systems can be function effectively at all time. Moreover, the company has planned in advance on the measures to prevent from unexpected events of the rainstorm and there is a working team to monitor it on site 24 hours.

### 3.3 Risk from drought

In 2019 the rain volume accumulated in the important dams and reservoirs of the country were below the average level, so the water cost volume in 2020 was lower than the criteria. It created the risk on water shortages in almost all areas across the county. As a result, it created clear impacts from the beginning until the mid of the year 2020, especially in the eastern region of Chon Buri, Rayong and Saraburi Provinces, where the industrial estates of our company located, as it had a chance to be impacted as such. Nevertheless, the public and private sectors including the company, has planned to deal with it and implemented the remedial measures on the drought problems continuously. So the operators in the industrial estates and the industrial zones, including the investors were confident and may be affected the least. The project has adopted the preventive measures in accordance with the specified plans. It includes implementing additional measures, for instance seeking a nearby water resource to supplement it; excavating a well in the company area to store additional water, etc. It could reduce the risk from water shortages and can allocate sufficient water for the need in case of drought in the later years.

Moreover, the project industrial estates and the industrial zones in the eastern region or the eastern seaboard, situated in the area that is close to the large reservoirs, e.g., Dok Krai Reservoir, Nong Pla Lai Reservoir and Klong Yai Reservoir, with the combined capacities of the three reservoirs are as much as 275 million cubic meters. However, in order to build stability on the volume and meeting the future demand, the East Water Public Company Limited. has planned to put up a water pipeline

network to connect and divert water from Prasae Reservoir to Klong Yai Reservoir and Nong Pla Lai Reservoir. It is to increase the stability and security on water management in the eastern region, including providing water from other water sources. It shall be sufficient for the need of the various regions. Meanwhile, on the part of the company and its group of companies have defined additional measures, which have been implemented in 2020, e.g. the installation of buoys and pumps to increase the ability to draw water from the reservoirs of the company at the lowest level in case of crisis. More water recycling, including considering to invest in the construction of an additional reclamation system to treat the wastewater through the process on improving the water quality and distribute to the area operators. Nonetheless, it is for reducing the raw water use, and recycling the wastewater, which is considered as a valuable resource, etc. Moreover, in 2021 the company has planned to improve the old reservoirs by dredging them to increase the water storing to full capacity, etc.

### 3.4 Risk from an accident, fire and chemical spill

The company set priority to the possible risks from the accidents, e.g., a fire, chemical spill and traffic that may happen inside the area of the project industrial estates and the industrial zones. Meanwhile, the company has provided a pipeline for fire-extinguishing water in accordance with the NFPA (National Fire Protection Agency) covering the area of the project completely. Also it has provided necessary fire trucks with the materials/equipment together with the safety officers who have been trained and stationed in the area throughout 24 hours to respond to the various incidents promptly. Moreover, it has prepared a map to respond to the emergencies in the various situations as appropriate on each vulnerable area. It also provides training with the operators and the governmental agencies in the area periodically. So, it makes the project ready on resources, materials/equipment, personnel and method on remedy of the situations in time. Then, it can reduce the impact and loss from an accident in a limited time at each of the industrial estate and the industrial zone. The Company also has installed CCTV at the entrance/exit area, the risky points and the connections of the incoming signal to the central operating control room to monitor the area continuously.



## 4. Risk from Utilities and Power Business

### 4.1 Risk relating to customer concentration

The Company's core customers in the water business mainly consist of operators in petrochemical business, power generation business and automobile business in industrial estates and industrial lands, accounting for 40.1 percent, 23.1 percent and 11.7 percent, respectively, of the Company's total revenue from the water business for 2020. In addition, the 10 largest customers of the Company mainly consist of operators in the petrochemical business and power generation business, accounting for 58.2 percent and 43.4 percent of the Company's total revenue for 2019 and 2020, respectively. A decline or slowdown in the business expansion or investment conditions of these industrial sectors and large customers may reduce their demand for water services and other public utilities which may materially affect the results of operations of the Company.

The Company realizes the risk and consequences from that Factor. In order to pull down the risk 1) the Company monitors customer's water usage closely 2) Queries and revise water usage plan for those customers consistently and 3) to sustainably reduce the possible consequences, the Company set policies and operating plans to offer more variety of products to better serve customer demand such as specific industrial water or reverse osmosis (RO) to focus on more groups of customers as well as plan for customers outside the industrial estates such as sub-district administrative organization, etc. in the important economic area.

### 4.2 Risk relating to reliance on the major suppliers for raw water procurement

The Company operates its utility service business by producing and distributing industrial water to operators in industrial estates and industrial lands in which the raw water is the key raw material for its operation. The cost of raw water represented approximately 69.3 percent of the total cost of the Company. Currently, the Company mainly procures raw water from three (3) major suppliers, i.e. (1) Eastern Water Resources Development and Management Public Company Limited (East Water) which is a large concessionaire granted by the Royal Irrigation

Department (RID) having service area in Chonburi, Rayong and Chachoengsao provinces, (2) RID and (3) the WHAID Group (from WHAID Group's internal reservoir of natural water) and their supply volume accounts for 78.8 percent, 11.6 percent and 9.6 percent, respectively. Further, the WHAID Group acted as an intermediary for East Water and RID in the Company's water procurement process. However, the Company is able to directly procure raw water from East Water and RID.

If East Water, RID or the WHAID Group is unable to supply raw water to the Company in the quantity required and at the agreed time, due to raw water supply shortage or significantly increases in the selling price of raw water, this may have a material adverse effect on the Company's financial condition, results of operations and prospects.

In the past decade, the Company has planned to reduce risks of having few major suppliers of raw water and/or distributors of raw water by 1) the Company keeps updates on natural raw water resources and plan to build water reservoirs in some industrial estates as appropriate 2) plans to explore natural raw water resources in addition to the resources currently use 3) plans for Wastewater Reclamation (as of December 2020, company has access to around 30,200 cu.m. per day of recycled water through the wastewater reclamation projects in WHAIEs). 4) the Company also follows up and coordinates with customers constantly to promptly plan for sufficient water usage and distribution as well as coordinates with raw water distributors and find protection and modification solutions constantly. With those mentioned preventive measures that have been performed, the Company is confident that there is sufficient and quality raw water resources for water supply business.

### 4.3 Utilities business and Power business

#### Investment risk relating to the Company's investments in businesses over which the Company has no control

Currently, the Company has made investments in the water business and power business by holding equity in various utilities or energy companies. Revenue from the utilities business and power business of the Company are derived from investments in companies engaging in water business and power business, which are considered as associates of the Company, and accordingly the

Company have power to control those entities, and the management of their businesses through boards of directors. Moreover, although the major shareholders of these companies have expertise in those businesses, the Company is subject to the risk of investment in such business. The Company received revenue from the investments of such water business or power business in forms of share of profit from investments in associates and joint ventures, and dividends. The Company manages such risk by selecting joint venture partners who have high expertise and are experienced when investing in any associated companies.

#### **4.4 Investment risk relating to the Company's investments in businesses located in foreign countries**

Based on the Company's investment in water and power projects in foreign countries, it is susceptible to the change within factors, namely economic, political, social conditions, legal framework and exchange rate fluctuations, belong to the countries that the investment has been made. Additionally, human resource are among the risks which may negatively influence the company's revenue.

To alleviate the mentioned risks, the company examines the credential of the country where the investee located as well as regularly studies and reviews the risks associated with projects in foreign countries. It also continually follows up their operating performance in order to manage the risks that may arise. In term of human resource, the Company provides human resource training for the projects development in those countries and place additional employee recruitment whose position will reduce the risk arose from the fact that the Company cannot directly monitor operation of the invested companies.

#### **4.5 Risk relating to an ability of the Company to increase public utilities price in the industrial estates**

Section 14 of the Industrial Estate Authority of Thailand Act, B.E.2522 (as amended) states that "the IEAT has the power to determine the selling price, rental fee and hire purchase fee of real property and movable property, the maintenance fee of public facilities and other fees in relation to public services provided in

industrial estates, taking into account reasonableness in terms of business." Therefore, the power to announce and increase the price of public utilities such as industrial water price and management services price of central wastewater treatment ponds in industrial estates lies solely with the IEAT. The Company cannot charge for public utilities at a higher rate than the rates specified by IEAT. Therefore, there is a risk that the IEAT may not grant approval if the Company seeks to increase the price of public utilities to meet the changing costs or to reflect the market condition. It is also notable that no requirements have been imposed on the Company to seek prior approval of the change of public utility prices collected in the industrial lands.

#### **4.6 Risk relating to the deterioration and damage of the water production and distribution System**

The Company's industrial water production and distribution system and wastewater treatment system may deteriorate in a usage life or be damaged during the course of operations, and if the repair is not completed in a timely manner, this may directly obstruct the production and distribution process of industrial water or interrupt the wastewater treatment system. In addition to impacting the Company's profitability and cash flow, this may cause the Company fails to fulfill its obligations under the Right Lease Agreement with the WHAID Group and agreements with Company's customers and may therefore also materially affect the Company's results of operations.

To reduce the mentioned risk, the Company keeps checking on all systems constantly and arranges maintenance plans of water providing and distribution system for industrial purposes appropriately. The purpose of maintenance plan is to focus on maintenance of dilapidated or damaged parts and increase performances for effective usage of water providing and distribution system for industrial purposes. In case when it is needed to temporary halt water providing and distribution system for repair and maintenance, the Company will inform customers in industrial estates beforehand and arrange spare water resources until the main water providing & distribution system will be completely fixed. Apart from this, the Company also prepares property insurance with insurance companies to responsible any damage of any circumstance.

#### 4.7 Risk relating to severe accident, drought, natural catastrophe and epidemic

Natural catastrophes (such as drought, flood, storm, fire and earthquake, epidemic and severe accident) are beyond the Company's control. An occurrence of a drought, natural catastrophe or severe accident may affect the Company's results of operations and severely damage the Company's operating assets. The impact of those circumstances may affect the industrial and commercial operators in industrial estates and industrial lands where the Company is operating, which could also have an effect on the Company's revenue and results of operations.

The Company is aware of the possibility of such risk, which is why it puts attention on the selection of location and the proper security system. The road in every project is higher than the public road in front of the projects or the highest water level during the floods in the past 30 years in the locality. The Company has applied for all-risk insurance covering all kinds of damage caused by natural disaster and accidents for every project. However, the Company is confident that it has proper plans and preventive measures to deal with floods. Therefore, there is little chance that damage from floods in any projects would exceed the compensation limit.

During the risk of drought, other than measures of the public and private sectors through agencies being appointed to supervise water, such as Water War Room, where the company is a part of the team, the Company establishes several internal measures for responding to drought as follows;

1. Wastewater Reclamation for recycling waste water to use as industrial water
2. Alternative Raw Water Resources: The Company has considered the water sources from potential local or private agencies to supplement the water supply for providing services to industrial customers
3. Wastewater Reuse by using treated wastewater in any activities, such as watering plants, construction etc.

According to such measures and cooperation, the Company is able to significantly minimize the risk of drought possibly affecting customers.

Beside the seasonal environmental conditions as mentioned above, there was an pandemic Covid-19 in 2020. The Company has closely monitored and assessed

the situations related to the pandemic that may has significant influence of its business operation since the beginning of the pandemic, where early case was detected in China. The company has proven the effectiveness of the BCP – Business continuity plan to handing the situation without any significant impact, in which the plan has been prepared since 2018.

Firstly, the Company uses VDO conference and land-line call to replace face-to-face meetings with foreign customers. As the pandemic situation reached higher risk level and Thailand recorded its first COVID-19 case, the Company started to implement the measure as planned to protect employees against the recurring pandemic as well as to reduce adverse effect that may impede the operation. The measures include Work From Home policy where a certain number of employees are allowed to work at the office whereas the rest will work at their home. The implementation of Work From Home policy requires the Company to have adequate number of working laptop available to the employees as well as to have Work From Home manual for each department. These ensure efficiency of work and safeguard the employees. The employees, who are strictly required to work on-site, may work at additional working sites which are dispersed across locations. The policy divides employees into 2 groups, to control an extent over which an employees may have direct contact with the infected person. First group will work on-site and Second group will work at home. Apart from working manual, the Company also write a manual which guide employees to be safe against the COVID-19, which are in line the measure encouraged by WHO, CDC and other health entities. The example of safeguard measures include regular spray of disinfectant liquid across the working spaces and temperature check of both employees and visitors. In addition, the Company has adopt Financial Sensitivity Analysis to conduct a careful analysis on its financial position and assess the possible adverse effects on financial position that may rise as the pandemic become more intensified. However, the Company's performance has been impeded by recurring COVID-19.

#### 4.8 Risk relating to a shortage of fuels

In the operation of natural gas and coal-fired power plants, natural gas and coals particularly constitute the key costs of operating activities. If there is a shortage of these natural gas or coals or a supplier is unable to



provide a required quantity of natural gas or coals to the power plant of the Company's associates, which in each case is an uncontrollable event of the power plants, then the relevant power plants are likely to breach its obligations under the power purchase agreement it has entered into with EGAT or under electric power transmission or a steam supply agreements with their industrial customers. Therefore, a shortage of fuels may have a material and adverse effect on the profit sharing, financial condition and operating results of the Company.

However, GHECO-ONE Co., Ltd., the largest equity investment has already signed the contract to purchase coal in advance to prevent the risk of partial shortage of fuel.

#### **4.9 Changes to the IEAT's laws, rules and regulations and other applicable laws which are relevant to the business operation of the Company**

The Company's industrial water business and power business are governed by the IEAT's laws, rules and regulations and other applicable laws which may be interpreted differently in the future.

The Company is unable to anticipate any guidelines on the regulator's exercise of power to supervise water business under the relevant laws. The Company to the risk that there is a material change in applicable laws, rules and regulations. In addition, the national policy on public utilities and power is subject to change based on the policy and administrative system announced by each government. A change in the national policy on public utilities and power as well as an issue of new rules and regulations, e.g. a policy on alternative

energy, may adversely affect the Company's investment and business expansion, including its business operations, revenue, financial condition, results of operations and business prospects.

## **5. Risk on the management**

### **5.1 Risk from Dependence on Staff with High Expertise**

The business of the company depends on the knowledge and capability of the personnel, who must play the role and duty of important responsibility for each section, for instance, setting business strategy, marketing and price setting, procurement of land or project management, etc. A risk due to the shortages of high expertise and qualified personnel is regarded as a risk to the company. The personnel are considered to be the main factor to drive the organization to success; therefore, it is necessary to manage it effectively. It starts from recruitment and selection of qualified personnel with the suitable qualifications for the company. Training and development of the employees continuously are to increase their knowledge and skills on the various fields that are necessary for the operations based on the position and duty of each employee. To keep morale and spirits up; suitable and fair compensation as well as fringe benefits; a review on the improvement of the working process and the job system to be ready all the time are to prevent from the risk of the lack of knowledgeable, experienced and skilled personnel in the technical and specific fields. It also provides a collection of the specific knowledge and expands to its project knowledge management later.



# GENERAL AND OTHER MATERIAL INFORMATION

## General Information

### 1) The Company

#### Company Name

WHA Corporation Public Company Limited

#### Nature of Business

##### 1. Logistics Business

- 1.1 Real Estate development for rental and service income
- 1.2 Real Estate development for sale
- 1.3 Real Estate investment and management
- 1.4 Real Estate investment trust management

##### 2. Industrial Development Business

##### 3. Utilities & Power Business

- 3.1 Utilities service
- 3.2 Power service

##### 4. Digital Platform Business

- 4.1 Data Center service
- 4.2 Fiber Optic FTTx service
- 4.3 Managed service

#### Head Office

777 WHA TOWER, 23<sup>rd</sup> - 25<sup>th</sup> Floor, Moo 13, Debaratna Road (Bangna-Trad) KM.7,  
Bang Kaeo, Bang Phli, Samut Prakarn 10540 Thailand

Company Registered Number	:	0107555000082
Telephone	:	0-2753-3750
Facsimile	:	0-2753-2750
Website	:	<a href="http://www.wha-group.com">http://www.wha-group.com</a>

#### Share Capital as at 31 December 2020

Authorised Share Capital	:	THB 1,567,773,018.60
Paid-up Capital	:	THB 1,494,683,467.90
Type of Shares	:	Ordinary Shares
Par Value	:	THB 0.10 per share

## 2) Subsidiaries (Information as at 31 December 2020)

Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Subsidiaries</b>								
1. Warehouse Asia Alliance Company Limited	WAA	Providing rental factories, warehouses and other properties	Thailand	WHA	THB 310.00	THB 310.00	THB 10.00	99.99
2. WHA Alliance Company Limited	ALL	Providing rental factories, warehouses and other properties	Thailand	WHA	THB 260.00	THB 260.00	THB 10.00	99.99
3. WHA Venture Holdings Company Limited	WHAHV	Investing in other companies and rental factories, warehouses and other properties	Thailand	WHA	THB 25,018.61	THB 25,018.61	THB 100.00	99.99
4. WHA Real Estate Management Company Limited	WHARM	Trust manager for investment property	Thailand	WHA	THB 10.00	THB 10.00	THB 100.00	99.99
5. WHA Infonite Company Limited	WHA Infonite	Digital services	Thailand	WHA	THB 400.00	THB 400.00	THB 10.00	97.67
<b>Subsidiaries under WHAVH</b>								
6. WHA Corporation (Hong Kong) Limited	WHAHK	Holding Company	Hong Kong	WHAHV	USD 2.00	USD 2.00	USD 1.00	100.00
7. WHA Industrial Development Public Company Limited	WHA ID	Real estate development	Thailand	WHAHV	THB 6,000.00	THB 3,882.07	THB 0.40	98.54
<b>Subsidiaries under WHAHK</b>								
8. PT WHA (International) Indonesia	WHAINDO	Providing rental factories, warehouses and other properties	Indonesia	WHAHK	USD 2.00	USD 2.00	USD 1.00	99.96





Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Subsidiaries under WHA ID</b>								
9. WHA Eastern Industrial Estate Company Limited	WHA EIE	Industrial estate development	Thailand	WHA ID	THB 400.00	THB 400.00	THB 40.00	99.99
10. Eastern Seaboard Industrial Estate (Rayong) Company Limited	ESIE	Industrial estate development	Thailand	WHA ID	THB 158.00	THB 158.00	THB 10.00	60.00
11. WHA Eastern Seaboard Industrial Estate Company Limited	WHA ESIE	Industrial estate development	Thailand	WHA ID	THB 1,000.00	THB 1,000.00	THB 100.00	99.99
12. WHA Saraburi Industrial Land Company Limited	WHA SIL	Industrial estate development	Thailand	WHA ID	THB 500.00	THB 500.00	THB 100.00	99.99
13. WHA Rayong Industrial Land Company Limited	WHA RIL	Industrial estate development	Thailand	WHA SIL	THB 1,000.00	THB 1,000.00	THB 100.00	99.99
14. WHA Rayong 36 Company Limited	WHA R36	Real estate development	Thailand	WHA ID : 70.01% WHA RIL : 29.99%	THB 1,165.00	THB 1,165.00	THB 10.00	99.99
15. WHA Eastern Seaboard Industrial Estate 4 Company Limited	WHA ESIE 4	Industrial estate development	Thailand	WHA ID	THB 792.80	THB 564.98	THB 10.00	99.99
16. WHA Eastern Pipeline Services Company Limited	WHA EPS	Pipe Rack Rental	Thailand	WHA ID : 74.99% WHA EIE : 25.00%	THB 100.00	THB 100.00	THB 100.00	99.99
17. WHA Industrial Development Engineering Company Limited	WHA IDE	Design and construction supervision service	Thailand	WHA ID	THB 20.00	THB 17.15	THB 10.00	99.99
18. WHA Industrial Building Company Limited	WHA IB	Sale and Lease Factory	Thailand	WHA ID	THB 294.00	THB 294.00	THB 10.00	99.99
19. The Park Residence Company Limited	THE PARK	Real estate developer and service management	Thailand	WHA ID	THB 4.60	THB 4.60	THB 10.00	99.99
20. Eastern Seaboard Property and Marina Services Company Limited	EPM	Real estate development for investment and marina services	Thailand	WHA ID	THB 1.00	THB 1.00	THB 10.00	99.99

Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Subsidiaries under WHA ID</b>								
21. WHA Industrial Development International (BVI) Company Limited	WHA IDIBVI	Holding Company	British Virgin Islands	WHA ID	USD 0.002	USD 0.002	USD 10.00	100.00
22. WHA Industrial Development International Company Limited	WHA IDI	Holding Company	Thailand	WHA ID	THB 723.00	THB 710.74	THB 10.00	99.99
23. WHA Industrial REIT Management Company Limited	WHA IRM	Trust manager for investment property	Thailand	WHA ID	THB 35.00	THB 30.00	THB 10.00	99.99
24. WHA Utilities and Power Public Company Limited	WHAUP	Utilities and Power	Thailand	WHA ID : 70.45% WHA IDISG : 1.14%	THB 3,825.00	THB 3,825.00	THB 1.00	70.00
25. WHA Industrial Development International Limited (Cayman) <i>(The dissolution of the Company completely struck off on 30 September 2020)</i>	WHA II	Holding Company	Cayman Islands	WHA ID	USD 0.05	USD 0.001	USD 1.00	100.00
<b>Subsidiaries under WHA IDI</b>								
26. WHA Industrial Development International (SG) Pte. Ltd.	WHA IDISG	Holding Company	Singapore	WHA IDI	USD 7.39	USD 7.39	USD 1.00	100.00
<b>Subsidiaries under WHA IDISG</b>								
27. WHA Industrial Management Services Vietnam Company Limited	WHA IMSV	General management counseling services	Vietnam	WHA IDISG	VND 5,675	VND 5,675	VND -	100.00
28. WHA Industrial Development (SG) Pte. Ltd.	WHA IDSG	Holding Company	Singapore	WHA IDISG	USD 0.001	USD 0.000001	USD 1.00	100.00
29. WHA Industrial Development 2 (SG) Pte. Ltd.	WHA IDSG 2	Holding Company	Singapore	WHA IDISG	USD 0.000001	USD 0.000001	USD 1.00	100.00





Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Subsidiaries under WHA IDSG</b>								
30. WHA Industrial Zone Nghe An Joint Stock Company	WHA IZ (Nghe An)	Real estate development	Vietnam	WHA IDSG	VND 384,500	VND 384,500	VND 10,000	99.00
<b>Subsidiaries under WHAUP</b>								
31. WHA Energy Company Limited	WHAEG	Holding Company	Thailand	WHAUP	THB 9,178.00	THB 9,178.00	THB 10.00	99.99
32. WHAUP International Company Limited	WUPIN	Holding Company	Thailand	WHAUP	THB 45.00	THB 45.00	THB 5.00	99.99
33. WHA Water Company Limited	WHAWT	Water resources development and management	Thailand	WHAUP	THB 300.00	THB 300.00	THB 10.00	99.99
<b>Subsidiaries under WHAEG</b>								
34. WHA Solar Company Limited	WHASL	Electricity and Power generation	Thailand	WHAEG	THB 350.00	THB 350.00	THB 10.00	99.99
35. WHA Energy 2 Company Limited	WHAET	Holding Company	Thailand	WHAEG	THB 4,250.00	THB 4,250.00	THB 10.00	99.99
<b>Subsidiaries under WUPIN</b>								
36. WHAUP (SG) 1 Pte. Ltd.	WUPS1	Holding Company	Singapore	WUPIN	USD 1.34	USD 1.34	USD 1.00	99.99
<b>Subsidiaries under WUPS1</b>								
37. WHAUP (SG) 2 Pte. Ltd.	WUPS2	Holding Company	Singapore	WUPS1	USD 1.33	USD 1.33	USD 1.00	99.99
38. WHAUP (SG) 2DR Pte. Ltd.	WUPSD	For investment in additional projects in foreign countries in the future	Singapore	WUPS1	USD 0.10	USD 0.10	USD 1.00	100.00
<b>Subsidiaries under WUPS2</b>								
39. WHAUP Nghe An Joint Stock Company	WUPNA	Produce and distribute water for industrials and wasted water management services	Vietnam	WUPS2	VND 29,950.78	VND 29,950.75	VND 10,000.00	99.99

### 3. Joint Ventures (Information as at 31 December 2020)

Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Joint Ventures under WHA</b>								
1. WHA KPN Alliance Company Limited	WHA-KPN	Providing rental factories, warehouses and other properties	Thailand	WHA	THB 768.00	THB 768.00	THB100.00	64.97
2. Central WHA Alliance Company Limited	CENTRAL-WHA	Providing rental factories, warehouses and other properties	Thailand	WHA	THB 650.00	THB 642.50	THB100.00	49.99
3. WHA Daiwa Logistics Property Company Limited	WHA-Daiwa	Providing rental factories, warehouses and other properties	Thailand	WHA	THB 820.00	THB 820.00	THB100.00	50.99
4. WHA-JD Alliance Company Limited	WHA-JD	Development, construction, management and operation of the logistic facilities projects	Thailand	WHA	THB 50.00	THB 50.00	THB100.00	50.99
<b>Joint Ventures under WHA Infonite</b>								
5. Genesis Data Center Company Limited	Genesis	Providing data center	Thailand	WHA Infonite	THB 210.00	THB 210.00	THB100.00	33.33
<b>Joint Ventures under ALL</b>								
6. WHA KW Alliance Company Limited	WHA KW	Development, construction, management and operation of business complex facilities and real estate projects	Thailand	WHA : 49.99% KW : 49.99%	THB 1.00	THB 1.00	THB100.00	49.99
<b>Joint Ventures under WHA ID</b>								
7. WHA Industrial Estate Rayong Company Limited	WHA IER	Real estate development	Thailand	WHA ID : 59.99% IRPC : 49.99%	THB 650.00	THB 162.50	THB 10.00	59.99
8. WHA TUS Company Limited	WHA TUS	To develop and operate an innovation project in Thailand	Thailand	WHA ID : 51% Yunnan Tus : 49%	THB 30.00	THB 10.00	THB 10.00	51.00
9. BIG WHA Industrial Gas Company Limited	BIG WHA	Industrial gas production and pipeline network distribution	Thailand	WHA ID : 49% BIG: 51%	THB 1.00	THB 1.00	THB 10.00	49.00



Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Joint Ventures under WHAUP</b>								
10. Gulf WHA MT Natural Gas Distribution Company Limited	Gulf WHA MT	Natural Gas Distribution	Thailand	WHAUP	THB 454.00	THB 454.00	THB 10.00	35.00
11. WHA Eastern Seaboard NGD 2 Company Limited	WHA NGD2	Natural Gas Distribution	Thailand	Gulf WHA MT	THB 216.00	THB 216.00	THB 10.00	99.99
12. WHA Eastern Seaboard NGD 4 Company Limited	WHA NGD4	Natural Gas Distribution	Thailand	Gulf WHA MT	THB 234.00	THB 234.00	THB 10.00	99.99
<b>Joint Ventures under WHAEG</b>								
13. Eastern Seaboard Clean Energy Company Limited	ESCE	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,039.00	THB 1,017.81	THB 10.00	33.33
14. Chonburi Clean Energy Company Limited	CCE	Generator and distributor of electronic power	Thailand	ESCE	THB 989.00	THB 989.00	THB 10.00	99.99
15. Rayong Clean Energy Company Limited <i>(The dissolution of the Company completely struck off on 14 July 2020)</i>	RCE	Generator and distributor of electronic power	Thailand	ESCE	THB 50.00	THB 12.50	THB 10.00	99.99
16. Glow Hemaraj Wind Company Limited <i>(The dissolution of the Company completely struck off on 1 June 2020)</i>	GHW	Generator and distributor of electronic power	Thailand	ESCE	THB 50.00	THB 12.50	THB 10.00	99.99
17. B.GRIMM Power (WHA) 1 Company Limited	BPWHA-1	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,533.56	THB 1,533.56	THB100.00	25.01
18. Gulf JP NLL Company Limited	Gulf JP NLL	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,384.00	THB 1,384.00	THB 10.00	25.01
19. Gulf VTP Company Limited	Gulf VTP	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,610.00	THB 1,610.00	THB 10.00	25.01

Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Joint Ventures under WHAEG</b>								
20. Gulf TS1 Company Limited	Gulf TS1	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,685.00	THB 1,685.00	THB 10.00	25.01
21. Gulf TS2 Company Limited	Gulf TS2	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,690.00	THB 1,690.00	THB 10.00	25.01
22. Gulf TS3 Company Limited	Gulf TS3	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,520.00	THB 1,520.00	THB 10.00	25.01
23. Gulf TS4 Company Limited	Gulf TS4	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,470.00	THB 1,470.00	THB 10.00	25.01
24. Gulf NLL2 Company Limited	Gulf NLL 2	Generator and distributor of electronic power	Thailand	WHAEG	THB 1,440.00	THB 1,440.00	THB 10.00	25.01
<b>Joint Ventures under WHAET</b>								
25. Gheco-One Company Limited	Gheco-I	Generator and distributor of electronic power	Thailand	WHAET	THB 11,624.00	THB11,624.00	THB 10.00	35.00
26. Houay Ho Thai Company Limited	HHTC	Generator and distributor of electronic power	Thailand	WHAET	THB 422.15	THB 422.15	THB 10.00	51.00
27. Houay Ho Power Company Limited	HHPG	Generator and distributor of electronic power	Lao People's Democratic Republic	HHTC	USD 40.00	USD 40.00	USD 80.00	25.00
28. Glow IPP Company Limited	GIPP	Generator and distributor of electronic power	Thailand	WHAET	THB 2,850.00	THB 2,850.00	THB 10.00	5.00



Company Name	Abbreviation	Nature of Business	Registered in	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (Per Share)	Percentage of shares held by the Company
<b>Joint Ventures under WHASL</b>								
29. WHA Gunkul Green Solar Roof 1 Co., Ltd.	WHA Gunkul 1	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	WHASL	THB 11.50	THB 11.50	THB 10.00	74.99
30. WHA Gunkul Green Solar Roof 3 Co., Ltd.	WHA Gunkul 3	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	WHASL	THB 14.50	THB 14.50	THB 10.00	74.99
31. WHA Gunkul Green Solar Roof 6 Co., Ltd.	WHA Gunkul 6	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	WHASL	THB 14.50	THB 14.50	THB 10.00	74.99
32. WHA Gunkul Green Solar Roof 17 Co., Ltd.	WHA Gunkul 17	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	WHASL	THB 16.00	THB 16.00	THB 10.00	74.99
33. Gulf Solar Company Limited	Gulf Solar	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	WHASL	THB 35.44	THB 35.44	THB 10.00	25.01
34. Gulf Solar BV Company Limited	Gulf Solar BV	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	Gulf Solar	THB 7.66	THB 7.66	THB 10.00	99.99
35. Gulf Solar TS1 Company Limited	Gulf Solar TS1	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	Gulf Solar	THB 7.38	THB 7.38	THB 10.00	99.99
36. Gulf Solar TS2 Company Limited	Gulf Solar TS2	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	Gulf Solar	THB 5.55	THB 5.55	THB 10.00	99.99
37. Gulf Solar KKS Company Limited	Gulf Solar KKS	Producing and distributing electricity by solar photovoltaic rooftop	Thailand	Gulf Solar	THB 14.67	THB 14.67	THB 10.00	99.99
<b>Joint Ventures under WUPSD</b>								
38. Duong River Surface Water Plant Joint Stock Company	SDWTP	Production and distribution of tap water	Vietnam	WUPSD	VND 999,611.00	VND 999,611.00	VND 10,000.00	34.00
39. Cua Lo Water Supply	CUA LO	Production and distribution of tap water	Vietnam	WUPNA	VND 48,269.59	VND 48,269.59	VND 10,000.00	47.31



#### 4. Other Juristic Persons in which the Company holds 10% or more of the shares (Information as at 31 December 2020)

Company Name	Abbreviation	Nature of Business	Location / Tel. / Fax	Shareholder	Registered Capital (mm)	Paid-up Capital (mm)	Par Value (per share)	Type of Shares	Percentage of shares held by the Company
<b>Other Juristic Person in which the Company holds 10% or more of the shares</b>									
1. WHA Premium Growth Freehold and Leasehold Real Estate Investment Trust	WHART	Investment in real estate in the type of warehouses and distribution centers	Location: Kasikorn Bank Building, 6 <sup>th</sup> Floor, 400/22 Phaholyothin Road, Samsen-Nai Subdistrict, Phayathai District, Bangkok 10400 Telephone: 0-2673-3999 Facsimile: 0-2673-3900	WHA	THB 25,742.72	THB 25,059.89	THB 9.0241	Trust Units	15.00
2. WHA Business Complex Freehold and Leasehold Real Estate Investment Trust	WHABT	Investment in real estate in the type of office building	Location: 1 Empire Tower, 32 <sup>nd</sup> Floor, South Sathorn Road, Yannawa Subdistrict, Sathorn District, Bangkok Telephone: 0-2686-6100 Facsimile: 0-2670-0430	WHA	THB 1,922.77	THB 1,922.77	THB 9.5187	Trust Units	15.00
3. Hemaraj Industrial Property and Leasehold Fund	HPF	Investment in real estate	Location: 199 Column Tower, Ground Floor, Ratchadapisek Road, Klongtoey Bangkok Telephone: 0-2649-2000 Facsimile: 0-2649-2233	WHA ID	THB 4,572.16	THB 4,572.16	THB 9.7287	Ordinary Shares	22.95
4. Hemaraj Leasehold Real Estate Trust	HREIT	Investment in real estate	Location: 777 WHA TOWER, 22 <sup>nd</sup> Floor, Unit 2206A, Moo 13, Debaratna Road (Bangna-Trad) KM.7, Bang Kaeo, Bang Phli, Samut Prakarn Telephone: 02-719-9557 Facsimile: 02-719-9553	WHA ID	THB 7,441.23	THB 7,441.23	THB 8.8572	Trust Units	15.00
5. Supernap (Thailand) Company Limited	SNT	Providing data center co-location services	Location: 390/2 WHA Chonburi 2 Industrial Estate, Moo 2, Khaokansong, Sriracha, Chonburi Telephone: 0-3312-5100	WHA Infonite	THB 2,000.00	THB 1,410.00	THB 10.00	Ordinary Shares	15.00



## 5. Reference Persons

### **Thailand Securities Depository Co., Ltd.**

For common share and warrants

**The Stock Exchange of Thailand Building,**

93 Ratchadaphisek Road, Dindaeng Subdistrict, Dindaeng District, Bangkok 10400

Telephone: 0-2009-9999

Facsimile: 0-2009-9991

### **Debenture Registrar**

**The Siam Commercial Bank Public Company Limited**

1060 New Petchaburi Road, Makkasan Subdistrict, Ratchathevee District, Bangkok 10120

Telephone: 0-2256-2323

**The Bank of Ayudhya Public Company Limited**

1222 Rama 3 Road, Bang Phong Phang Subdistrict, Yannawa District, Bangkok 10120

Telephone: 0-2296-5715

### **Auditor**

PricewaterhouseCoopers ABAS Ltd.

15<sup>th</sup> Floor, Bangkok City Tower, 179/74-80 South Sathorn Road, Bangkok 10120

Telephone: 0-2344-1000

Facsimile: 0-2286-5050

### **Legal Advisor**

RL Counsel Co., Ltd.

62/15 Thaniya, Suriyawongse Subdistrict, Bangrak District, Bangkok 10500

Telephone: 0-2235-3339

Facsimile: 0-2235-3076

## Other Material Information

There is no other information which may materially affect investors' decisions.



## CAPITAL STRUCTURE

### THE COMPANY'S SECURITIES

The Company's registered capital as of 31 December 2020 was THB 1,567,773,018.60 and the paid-up capital was also THB 1,494,683,467.90, divided into registered ordinary shares of 15,677,730,186 shares with par value THB 0.10 and paid-up capital of 14,946,834,679 shares.

### SHAREHOLDING STRUCTURE

The shareholders on the shareholders' register as of 27 November 2020 are as follows:

Shareholders	Shares	Percent
1. Group of Mr. Somyos Anantaprayoon and Ms. Jareeporn Jarukornsakul		
• WHA Holding Co., Ltd. <sup>(1)</sup>	493,500,000	3.30
• Ms. Jareeporn Jarukornsakul	3,234,438,569	21.64
<b>Sub-total</b>	<b>3,727,938,569</b>	<b>24.94</b>
2. Ms. Chatchamon Anantaprayoon	1,238,976,105	8.29
3. Thai NVDR Co., Ltd.	704,656,372	4.71
4. Mr. Chaiwat Phupisut	626,872,254	4.19
5. Ms. Supitchaya Phupisut	621,370,000	4.16
6. STATE STREET EUROPE LIMITED	582,025,746	3.89
7. UBS AG SINGAPORE BRANCH	580,851,722	3.89
8. THE BANK OF NEW YORK MELLON	434,282,800	2.91
9. Mr. Niti Osathanugrah	375,238,190	2.51
10. Group of Jarukornsakul		
• Mr. Wutt Jarukornsakul	123,000,000	0.84
• Ms. Jaruwan Jarukornsakul	18,241,150	0.12
• Mr. Anuwat Jarukornsakul	10,470,000	0.07
• Ms. Patsanan Jarukornsakul	10,245,000	0.07
• Ms. Wannakan Jarukornsakul	8,100,000	0.05
• Ms. Malee Jarukornsakul	7,451,500	0.02
• Mr. Chaichana Jarukornsakul	450,088	0.00
• Mr. Chaitawat Jarukornsakul	12,145	0.00
<b>Sub-total</b>	<b>177,969,833</b>	<b>1.19</b>
Total Top Ten Shareholders	9,070,181,641	60.68
Other Minority Shareholders	5,876,653,038	39.32
<b>Grand total</b>	<b>14,946,834,679</b>	<b>100.00</b>

**Remark** \* Mr. Somyos Anantaprayoon passed away on 9 February 2018.

WHA Holding Co., Ltd. is a holding company. as of 31 December 2020, it has a registered capital of THB 5,000,000 being 1,000,000 ordinary shares at a par value of THB 5 per share. The shareholders are listed as follows:

Shareholder	No. of Shares	%
Mr. Somyos Anantaprayoon	500,000	50.00
Ms. Jareeporn Jarukornsakul	499,999	50.00
Ms. Jaruwan Jarukornsakul	1	0.00
<b>Total</b>	<b>1,000,000</b>	<b>100.00</b>

## OTHER SECURITIES

### 1) Debentures – WHA Corporation Public Company Limited

As of 31 December 2020, WHA Corporation Public Company Limited has THB 18,342.20 mm of outstanding debentures. The details are as follows:

Issue	Amount (THB mm)	Interest rate (% p.a.)	Tenure (year)	Maturity date
WHA217A	600.00	4.70	7.01	31 July 2021
WHA247A	280.00	5.00	10.01	31 July 2024
WHA219A	1,500.00	4.00	5.00	16 September 2021
WHA214A	1,900.00	2.39	3.00	27 April 2021
WHA234A	1,100.00	2.87	5.00	27 April 2023
WHA224A	454.20	3.48	3.50	19 April 2022
WHA230A	328.00	3.74	5.00	19 October 2023
WHA250A	2,380.00	4.03	7.01	19 October 2025
WHA224B	2,100.00	2.95	3.00	24 April 2022
WHA244A	1,000.00	3.40	5.01	24 April 2024
WHA264A	400.00	3.69	7.01	24 April 2026
WHA226A	200.00	2.75	3.01	30 June 2022
WHA226B	2,000.00	2.75	3.00	30 June 2022
WHA237A	2,050.00	3.30	3.00	3 July 2023
WHA247B	1,450.00	3.75	4.00	3 July 2024
WHA257A	500.00	4.20	5.00	3 July 2025
WHA239A	100.00	2.80	3.00	11 September 2023
<b>Total</b>	<b>18,342.20</b>			

### 2) Debentures – WHA Industrial Development Public Company Limited

As of 31 December 2020, WHA Industrial Development Public Company Limited has THB 2,000 mm. of outstanding debentures. The details are as follows:

Issue	Amount (THB mm)	Interest rate (% p.a.)	Tenure (year)	Maturity date
HEMRAJ217A	2,000.00	5.65	9.01	12 July 2021
<b>Total</b>	<b>2,000.00</b>			

**Note :** The Company repaid callable bond (HEMRAJ 231A, HEMRAJ 252A, HEMRAJ 222A before its maturity).

### 3) Debentures – WHA Utilities and Power Public Company Limited

As of 31 December 2020, WHA Utilities and Power Public Company Limited has THB 8,000 mm of outstanding debentures. The details are as follows:

Issue	Amount (THB mm)	Interest rate (% p.a.)	Tenure (year)	Maturity date
WHAUP216A	2,390.00	2.65	3.00	26 June 2021
WHAUP236A	1,290.00	3.17	5.00	26 June 2023
WHAUP256A	1,320.00	3.66	7.01	26 June 2025
WHAUP302A	1,500.00	3.25	10.01	21 February 2030
WHAUP22DA	1,500.00	2.28	2.83	21 December 2022
<b>Total</b>	<b>8,000.00</b>			

### 4) Bill of Exchange – WHA Corporation Public Company Limited

As of 31 December 2020, WHA Corporation Public Company Limited has THB 650 mm of outstanding bill of exchange. The details are as follows:

Bill of Exchange	Amount (THB mm)	Tenure (days)	Maturity date
WHA21323A	650.00	92	23 March 2021
<b>Total</b>	<b>650.00</b>		

### 5) Bill of Exchange – WHA Industrial Development Public Company Limited

- No outstanding Bill of Exchange-

### 6) Bill of Exchange – WHA Utilities and Power Public Company Limited

- No outstanding Bill of Exchange-

### 7) Warrants

- No outstanding Warrants -





## DIVIDEND POLICY

### The Company dividend policy

The Company has a policy to pay out dividends at not less than 40.0% of its net profits stated on the Company financial statements after deduction of the corporate income tax and legal reserve each year. The Company considers dividend payment based on factors that deem to be the most beneficial to the shareholders such as the Company's performance and financial status, investment plans in each period as deemed reasonable or appropriate by the Board of Directors. The dividend payment shall not have significant impact on the Company's normal operation. The resolution of the Board of Directors on dividend payment has to be proposed to the shareholders for approval, except payment of the interim dividends where the Board of Directors has its authority to approve and then report the same to the next shareholders' meeting.

### Subsidiaries dividend policy

The Company's subsidiaries have a policy to pay out dividends at not less than 20.0% of its net profits stated on the company financial statements after deduction of the corporate income tax and legal reserve each year. Nevertheless, The Company's subsidiaries also consider dividend payment based on factors that deem to be the most beneficial to the shareholders such as the subsidiaries performance and financial status, investment plans in each period as deemed reasonable or appropriate by its Board of Directors. The dividend payment shall not have significant impact on the Company's normal operation. The resolution of the Board of Directors on dividend payment has to be proposed to the shareholders for approval.





# MANAGEMENT STRUCTURE

## THE BOARD OF DIRECTORS AND SUB-COMMITTEES

The Company's management structure consists of the Board of Directors and five Sub-Committees namely:

- 1) Board of Directors
- 2) Executives Committee
- 3) Audit Committee
- 4) Risk Management Committee
- 5) Corporate Governance Committee
- 6) Nomination and Remuneration Committee

### 1) BOARD OF DIRECTORS

As of 31 December 2020, the Company's Board of Directors of 12 directors as follows:

Name	Position
1. Ms. Jareeporn Jarukornsakul	Chairman of the Board of Directors
2. Mr. David Richard Nardone	Vice Chairman of the Board of Directors
3. Mr. Vivat Jiratikarnsakul	Director
4. Mr. Krailuck Asawachatroj	Director
5. Mr. Jakrit Chaisanit	Director
6. Mr. Narong Kritchanchai	Director
7. Mr. Somsak Boonchoyruengchai	Director
8. Mrs. Anchalee Chavanich	Independent Director
9. Lt. Gen. Prachya Chalermwat, Ph. D.	Independent Director
10. Dr. Apichai Boontheerawara	Independent Director
11. Dr. Somsak Pratomsrimek	Independent Director
12. Dr. Kritsana Sukboonytasatit	Independent Director

The Company Secretary is Mr. Sirisak Kijraksa.

#### Authorized Directors

"The Directors who have authority to sign for binding the Company are Ms. Jareeporn Jarukornsakul jointly sign with any one of Mr. Jakrit Chaisanit or Mr. Narong Kritchanchai or Mr. Krailuck Asawachatroj or Mr. Somsak Boonchoyruengchai, altogether 2 persons, with the Company's seal affixed."

#### Scope of Authorities and Responsibilities of the Board of Directors

1. To perform their duties and Corporate Governance in compliance with laws, rules, regulations or notification of the Securities and Exchange Commission of Thailand, the Capital Market Supervisory Board, and the Stock Exchange of Thailand that relate to the Company's objectives, the Articles of Association, the

resolutions of the Board of Directors and the resolutions of the shareholders' meeting with their accountabilities, carefulness, and integrity.

2. To set up the vision, strategy, direction, policies, goals, plans, budgets, management structure and authorization of the Company and subsidiaries, which are presented by the administration of the Company, and will supervise the performance of management, committees or any other persons assigned by the Company to ensure compliance with the policies for the best interests of the Company and its shareholders.

3. To monitor the Executive and operation of the Executive Committee, Chief Executive Officer, the Executive, or any persons who take responsibilities and such duties in accordance with the Company's policies determined by the Board of Directors.

4. To constantly follow up the Company's performance to be in compliance with the operating plan and budget of the Company.

5. To procure the Company and its subsidiaries to apply appropriate and efficient accounting systems, and to provide internal control and internal audit systems.

6. To arrange the preparation of balance sheet and income statements at the end of the Company's fiscal year and certify such statements in order to propose to the shareholders at the annual general shareholders' meeting for their approval.

7. To consider and approve the selection and appointment of the Company's auditor, and the appropriate audit fee proposed by the Audit Committee prior to propose to the shareholders at the annual general shareholders' meeting for approval.

8. To prepare policy in relation to good corporate governance principle in writing and efficiently apply such policy to ensure that the Company be fairly responsible to all relevant group of persons.

9. To consider and approve the appointment of person who has qualification and is not prohibited under the Public Limited Company Act, B.E. 2535 (as amended), the Securities Exchange Act, B.E. 2535 (as amended), including other relevant notifications, regulations and/or rules to substitute a vacancy in the Board of Directors for reasons other than the termination of the term of office, and to consider and approve the appointment of the director to replace the one retiring by rotation, and determine the director's remunerations as proposed by the Remuneration and Nomination Committee in order to propose the shareholders in the annual general shareholders' meeting for approval.

10. To appoint sub-committee such as the Audit Committee, the Executive Committee, the Corporate Governance Committee, the Remuneration and Nomination Committee, the Risk Management Committee, or other committee, including determining their duties and authorities in order to support the Board of Directors' management.

11. To determine and change the director's name who has authority to sign for binding the Company.

12. To consider and appoint the Executive as defined by the Securities and Exchange Commission or the Capital Market Supervisory Board, and the Company Secretary, including determining their remuneration.

13. To seek profession opinions from external organizations if necessary for making appropriate decision.

14. To support the Company's Directors and

Executive to attend any seminars held by Thai Institute of Directors on the program of Duties and Responsibilities of the Directors and the Executive.

15. To approve loan to such companies that have a business relationship with the Company as shareholders, or companies relating to commercial business or other companies in the amount that exceeds the Executive Committee's authority.

16. To approve investment and divestment of common shares and/or other securities in amount that exceeds the Executive Committee's authority.

17. To purpose to the Company's shareholders on the Company's capital increase or decrease, and the change in par value of shares, Memorandum of Associations, Article of Associations, and/or Objectives.

18. To approve the Company's establishment, merger or liquidation.

19. To delegate the management, executives, and employees of related companies to explain, give an opinion, attend a meeting or delivery documents as it deemed appropriate.

20. To consult experts, or Company's advisor, or hire external consultant or expert where it deemed appropriate by the Company's expenses.

The assignment of authorities and responsibilities of the Board of Directors shall not cause the Board of Directors or the sub-authorized person to be entitled to approve the transaction where itself or a person who has a conflict of interest (as defined in the Notification of the Securities and Exchange Commission or the Notification of the Capital Market Supervisory Board) may have interests or other types of benefit or conflict of interests with the Company or its subsidiaries, except the transaction was approved in compliance with the policy and principle approved by the shareholders meeting or the Board of Directors' meeting.

21. To approve the interim dividend payment to shareholders.

22. To establish and monitor efficient Anti-Corruption system, ensure the executive team awareness and attention to the Anti-Corruption scheme, embed organizational Anti-Corruption culture and the board of directors will comply with the Anti-Corruption measures and punish when non-compliance occurs.

23. To appoint the Company Secretary to support the directors to perform their duties in accordance with related laws and regulations.

24. To set the goals and evaluate the performance of the Chief Executive Officer.

## Roles and Responsibilities of the Chairman of the Board of Directors

1. The Chairman is responsible as the Board's leader and as the Chairman of Board's meeting as well as in shareholders' meeting.

2. In case of equality of vote, the Chairman shall have a casting vote in the Board meeting.

The Company's Chairman of the Board is not an independent director, since the Company believes that the Chairman is qualified with knowledge, skill, and experiences in order to lead the Company to gain the most advantages and success.

## 2) EXECUTIVE COMMITTEE

As of 31 December 2020, the Executive Committee consisted of 8 members as follows:

Name	Position
1. Ms. Jareeporn Jarukornsakul	Chairman of the Executive Committee
2. Mr. David Richard Nardone	Executive Committee Member
3. Mr. Vivat Jiratikarnsakul	Executive Committee Member
4. Mr. Krailuck Asawachatroj	Executive Committee Member
5. Mr. Jakrit Chaisanit	Executive Committee Member
6. Mr. Narong Kritchanhai	Executive Committee Member
7. Mr. Somsak Boonchoyruengchai	Executive Committee Member
8. Mr. Natthapatt Tanboon-ek	Executive Committee Member

### Scope of Authorities and Responsibilities of the Executive Committee

1. To consider and prepare policies, strategies, goals and business plans, financial targets and annual budget of the Company which are appropriately considered and should be proposed to the board of directors. If situations have changed, the Executive committee shall consider the approved budget appropriately.

2. To give opinion, advice and consider to approve the matters relating to the Company's normal business operation under the amount or annual budget approved by the Board, and to approve the variance of not exceeding 5% of the amount or annual budget approved by the Board of Directors or to perform any activities assigned by the Board of Directors.

3. To consider and approve specific matters or operations within the following amount:

(a) To approve the execution, investment, termination, or divestment of the Company's project for the value not exceeding THB 1,500 mm per project.

(b) To approve the determination of loans, B/E, P/N and their terms and conditions, with the value of note exceeding THB 1,000 mm per time.

(c) To approve the asset mortgage for being collateral of borrowing for the amount not exceeding to THB 1,000 mm per time.

(d) To approve the determination of Bank Guarantees and their terms and conditions, with the value of note exceeding THB 1,500 mm per time.

(e) To approve the payment to settle a legal dispute for the amount not exceeding THB 50 mm per time.

(f) To approve the hiring of a consultant, or third party expert in the amount of not exceeding THB 20 mm per time.

(g) To approve advertising expenses. Entertainment expenses, social, sports and scholarship donations, gift expense in the amount not exceeding THB 5 mm per time.

4. To approve investment or expenses, including advertising expenses. Entertainment expenses, social, sports and scholarship donations, gift expense in excess of the annual budget or limit as approved by the Board in the amount of not exceeding THB 10 mm per time.

5. To approve open and/or close of bank accounts, enter into other financial products; e.g. IRS, derivatives, Money Market, as well as to approve changes

to the terms and conditions of the debentures, such as the borrowing period, interest rate.

6. To appoint or terminate the Company's Executive or employee at the level of Department Director upwards (excluding Chief Executive and C-Level Officer), including to determine their compensation.

7. To consider, screen and monitor the Company's operation to comply with the policy, business

strategy, goals, business plans, financial targets and budgets approved by the board of directors for efficiency and effectiveness.

8. To implement and conduct the Company's business as assigned by the Board of Directors.

9. Set the organizational structure and management policy, consider and monitor the succession plans, manpower plans, and evaluation of performance of the executive members.

### 3) AUDIT COMMITTEE

As of 31 December 2020, the Audit Committee consisted of 4 members as follows:

Name	Position
1. Mrs. Anchalee Chavanich	Chairman of the Audit Committee
2. Dr. Apichai Boontheerawara	Audit Committee Member
3. Dr. Somsak Pratomsrimek	Audit Committee Member
4. Dr. Kritsana Sukboonytasatit	Audit Committee Member

The secretary of the Audit Committee is Ms. Sureeporn Settajinda, Director of Internal Audit Office.

All 4 Audit Committee members have knowledge and experience in financial statement audit, and is a certified public accountant having accounting and finance expertise.

#### Scope of Authorities and Responsibilities of the Audit Committee

1. To ensure that the Company's financial statements are accurate and adequately disclosed.

2. To ensure that the Company and Subsidiary Companies implement internal controls and internal audit systems that are appropriate and effective. In case of necessity, the Audit Committee shall hire specialists for suggestion assembled in consideration, the company is responsible for the costs incurred, including the overall performance evaluation and the independence of the internal audit unit, while giving consent regarding appointment, transfer, and termination of employment of the head of the internal audit or any other unit responsible for internal audit, and participate in the meeting with head of the internal audit or other unit responsible for internal audit without the Management at least 1 time per year.

3. To ensure that the Company complies with the law governing securities and exchange, regulations of the SET, and the laws applicable to the Company's business.

4. To consider selecting, nominating, and appointing an independent person to act as an auditor of the Company including to propose the remuneration and termination of such auditor, and attend meetings with the auditor without the management's presence at least once a year.

5. To consider related party transactions or transactions with likely conflicts of interest and ensure that they are conducted in accordance with the law and regulations of the SET and ensure that such transactions are reasonable and in the best interest of the Company.

6. To prepare a report relating to the performance of the Audit committee disclosed in the Company's annual report. Such report must be signed by the chairman of the Audit committee and shall contain the following information:

(1) The opinion on the accuracy, completeness, and reliability of the Company's financial reports.

(2) The opinion on the sufficiency of the internal control of the Company.



(3) The opinion on compliance with the Securities and Exchange laws and regulations of the Stock Market of Thailand, or other law relating to the Company's business.

(4) The opinion on appropriateness of the auditor.

(5) The opinion on the transactions that may have conflict of interest.

(6) The number of the Audit Committee's meeting and the meeting attending of each Audit Committee member.

(7) The overall opinion or remark that the Audit Committee obtained from performing its duties according to the charter.

(8) Other transactions as deemed that shareholders and general investors should be informed under the scope of duties and responsibilities assigned by the Board of Directors.

7. In performing the Audit committee's duties, if a transaction or action which may materially affect the Company's financial status and performance is found or suspected to occur and to get whistle blowing, the Audit committee shall report to the board of directors of the Company in order to remedy such affect within a period that the Audit committee deems appropriate. Such transaction or action is as follows:

(1) A transaction having a conflict of interest.

(2) A fraud or irregularity or major defect on the internal control system.

(3) Violation of the Securities and Exchange laws, regulations of the Stock Exchange of Thailand, or law relating to the Company's business.

If the Board of Directors or the Executives do not remedy within the above period, any of the Audit Committee member may report that there is such above mentioned transaction or action to the Securities and Exchange Commission and the Stock Exchange of Thailand;

8. To consider and propose to amend the scope of duty, authority and responsibility of the Audit committee as it deems appropriate.

9. To perform any other acts assigned by the board of directors, with the consent of the Audit committee.

10. Support whistle-blowing and report procedures from employees regarding the suspicious misconduct related to the Financial Statement, including other fraud by means of the independent investigation process and appropriate follow-up procedures.

11. Review the Company's Article of Association and Performance at least once a year.

12. In performing the aforementioned duties, the Audit Committee is directly responsible to the Board of Directors, and the Board of Directors is responsible for the Company's performance to the third parties.

The Audit Committee is responsible for overseeing, the Management is responsible for the preparation of the Company's Financial Statements, and the External Auditor has the duty to review such Financial Statements. The Audit Committee and the Board of Directors are jointly acknowledged that the Management, the Internal Auditor, and the External Auditor have sufficient resources and time, as well as knowledge of accounting, auditing, internal control systems, and the process of preparing the Financial Statements. However, the role of the Audit Committee does not provide any guarantee in the Financial Statement that the Company provides to the Shareholders and other persons.

The Board of Directors is authorized to amend the definition of the qualifications of the independent directors, the scope of duties and responsibilities of the Audit Committee, in order to comply with the rules and regulations of the Securities and Exchange Commission, Capital Market Supervisory Board, and/or other related laws.

13. In addition, the duties and responsibilities of the Audit Committee shall be covered to its subsidiary in which it holds more than 50% of Company's voting shares which not included to WHA Utilities and Power Public Company Limited and its subsidiary company.



## 4) RISK MANAGEMENT COMMITTEE

As of 31 December 2020, the Risk Management Committee consisted of following 4 members as follows:

Name	Position
1. Ms. Jareeporn Jarukornsakul	Chairman of Risk Management Committee
2. Lt. Gen. Prachya Chalermwat, Ph. D.	Risk Management Committee Member
2. Dr. Somsak Pratomsrimek	Risk Management Committee Member
3. Dr. Kritsana Sukboonytasatit	Risk Management Committee Member

### Scope of Authorities and Responsibilities of Risk Management Committee

1. Set risk management policy, process, and scope of risk management including business continuity management to review and revise at least once a year to ensure consistency and appropriateness to the business overview.

2. Review Risk Profile, level of Risk Appetite, and Risk Tolerance.

3. Acknowledge, consider, and provide suggestions on Risk Management Report, process and risk management policy including residual risk management to ensure the adequacy and appropriateness of Risk Management.

4. Oversee and support the Company's Risk Management to success, suggest for risk prevention and method to reduce the risk to an acceptable level, monitor the Company's risk management as well as the Company's significant risk management plan and report the monitored results to the Board of Directors.

In order of other factors or important circumstance that may affect the Company significantly, such circumstance needs to be reported to the Board of Directors for immediate consideration.

5. Coordinate with the Audit Committee regarding risk information and internal containment for the Audit Committee to consider and approve the internal auditing plan for reasonable credibility that the Company has an appropriate internal containment for risk management including the risk management system to adjust as appropriate and ensure practice throughout the Company.

6. Provide advice to the management and risk management working team regarding the Company's risk management including promoting and support improvement, development, and internal risk management mechanism continuously to raise the risk management culture in every sector with an authority to enforce the following matters:

1) Encourage the Executive or related personnel to inform regarding the risk management, internal control, and business continuity management in writing or verbal and propose to the Risk Management Committee as appropriate.

2) Review the Company's risk management plan to ensure the operation has met the objective and be measured appropriately including suggestion to the risk management committee for further improvement.

3) Instruct the related personnel the orders to carry out the instructions or execute such order as appropriate as provided in the Charter or other special instructions according to the Board of Directors.

7. In addition, the duties and responsibilities of the Risk Management Committee shall be covered to its subsidiary in which it holds more than 50% of Company's voting shares which not included to WHA Utilities and Power Public Company Limited and its subsidiary company.

Risk Management Committee shall comprise at least 3 members. The term of office of each Risk Management Committee member is three (3) years from the date of appointment in accordance with the Board of Directors' term of office. Members of the Risk Management Committee who retire by rotation are eligible for reappointment.

## 5) CORPORATE GOVERNANCE COMMITTEE

As of 31 December 2020, the Corporate Governance Committee consisted of 3 members as follows.

Name	Position
1. Mr. Somsak Boonchoyruengchai	Chairman of the Corporate Governance Committee
2. Mr. Jakrit Chaisanit	Corporate Governance Committee Member
3. Mr. Narong Kritchanhai	Corporate Governance Committee Member

### Scope of Authorities and Responsibilities of the Corporate Governance Committee

1. To consider, review and revise the policy on Corporate Governance and propose the same to the Board of Directors for consideration and approval. This policy is to be prepared in writing and adopted as guidelines for good practice.

2. To consider, review and revise the Code of Conduct and to prepare it in writing.

3. To set and plan the policy on Corporate Social Responsibility.

4. To act as representative of the Company in communicating and conducting activities regarding the corporate governance with the management, officers and outside organizations.

5. To monitor, review and improve the performance to be in accordance with the designated plan and to prepare summary reports for the board of directors.

6. To consider, review and revise the Anti-Corruption Policy. Provide suggestions on performance review and assessment related to the Anti-Corruption Policy. The Anti-Corruption Policy will be in writing and used as best practice.

7. In addition, the duties and responsibilities of the Corporate Governance Committee shall be covered to its subsidiary in which it holds more than 50% of Company's voting shares which not included to WHA Utilities and Power Public Company Limited and its subsidiary company.

The Corporate Governance Committee shall comprise at least 3 members. The term of office of each Corporate Governance Committee member is three (3) years from the date of appointment in accordance with the Board of Directors' term of office. Members of the Corporate Governance Committee who retire by rotation are eligible for reappointment.

## 6) NOMINATION AND REMUNERATION COMMITTEE

As of 31 December 2020, the Nomination and Remuneration Committee consisted of 3 members as follows:

Name	Position
1. Dr. Apichai Boontheerawara	Chairman of the Nomination and Remuneration Committee
2. Ms. Jareeporn Jarukornsakul	Nomination and Remuneration Committee Member
3. Dr. Kritsana Sukboonytasatit	Nomination and Remuneration Committee Member

### Scope of Authorities and Responsibilities of the Nomination and Remuneration Committee

1. To consider structure, size and component of the board of directors of the Company to be appropriate to the organization and in line with changing circumstances.

2. To consider the rules for nomination of directors, chief executive officer as well as nominating and screening qualified persons to serve as directors or chief executive officer for approval by the board of directors.

3. To give opportunity to the minority shareholders with sufficient period of time to nominate a list of persons to be nominated as directors prior to the shareholders' meeting.

4. To have the succeeding plan for the chief executive officer and top management by constant review.

5. To consider strategy and policy on human resource to be in line with the business operation of the Company.

6. To propose rules and guideline for fixing the remuneration of directors, committee, senior management which are clear, fair and appropriate in accordance with their responsibility and propose them to the board of directors for consideration.

7. To improve the policy and structure on management of remuneration of the directors of the Company, the committee, top management to be consistent with the labor market condition at that time for further proposing it to the board of directors for consideration.

8. In addition, the duties and responsibilities of the Nomination and Remuneration Committee shall be covered to its subsidiary in which it holds

more than 50% of Company's voting shares which not included to WHA Utilities and Power Public Company Limited and its subsidiary company.

The Nomination and Remuneration Committee shall comprise at least 3 member. The term of office of each Nomination and Remuneration Committee member is three (3) years from the date of appointment in accordance with the Board of Directors' term of office. Members of the Nomination and Remuneration Committee who retire by rotation are eligible for reappointment. At least one-third of those directors and Chairman of Nomination and Remuneration Committee must be independent directors.

## EXECUTIVES

At present, the Company's executives consists of 8 persons as follows:

Name	Position
1. Ms. Jareeporn Jarukornsakul	Chairman of the Executive Committee / Chief Executive Officer / Acting Chief Technology Officer
2. Mr. David Richard Nardone	Executive Committee Member
3. Mr. Vivat Jiratikarnsakul	Executive Committee Member
4. Mr. Krailuck Asawachatroj	Executive Committee Member / Chief Strategic Officer
5. Mr. Jakrit Chaisanit	Executive Committee Member / Chief Operating Officer
6. Mr. Narong Kritchanhai	Executive Committee Member / Chief Legal Officer
7. Mr. Somsak Boonchoyruengchai	Executive Committee Member / Chief Accounting Officer
8. Mr. Natthapatt Tanboon-ek	Executive Committee Member / Chief Financial Officer

### Scope of authorities and duties of Chief Executive Officer

1. To supervise the Company's overall operation to be in accordance with the business objectives of the Company and those assigned from the Board of Directors.

2. To provide strategies and business plans to be proposed to the Board of Directors and implement to achieve the goal specified in the strategies and business plans approved by the Board of Directors.

3. To take actions and perform duties as assigned by the Board of Directors and as per the policies of the Board of Directors.

4. To give orders, issue regulations, make announcement and record in order to perform the work to be in accordance with the policies.

5. To approve and/or grant power for doing juristic acts binding the Company for normal transactions of the

Company, including transactions the Chief Executive Officer is authorized from the Board of Directors to take action as well as any transactions not directly binding the Company's assets.

6. To coordinate with the executives and employees to perform in accordance with the policies and business direction given by the Board of Directors.

7. To seek for business opportunity on banking investment, securities, investment, business consultant, financial and accounting consultant, investment consultant, and new business to increase revenue to the Company and employees.

8. To consider taking the Company's rights and properties to create obligations with persons, companies, partnerships, shops or financial institutions for proposing to the Board of Director for approval.

9. To approve payment of expenditure for normal operation in the amount approved by the Board of Directors.

10. To approve investment in equity instruments and securities for the Company's account in the amount approved by the Board of Directors.

11. To approve in principle of investment for business expansion as well as joint investment with other business operator and propose to the Board of Directors for approval in the next meeting.

12. To approve payment for significant investment set forth in the annual budget or those approved in principle by the Board of Directors.

13. To take care of working of employees to be in accordance with the policies, regulations, and the Good Corporate Governance.

14. To support development of employees' knowledge and capacity to enhance the organization's capability;

15. To appoint consultant necessary to the Company's operation.

16. To approve related transactions being on an arm-length basis such as sale and purchase goods at market price, service fees at the normal rate and giving credit terms similar to general customers, etc. under to the policies approved by the Board of Directors.

17. To appoint, transfer, or terminate employees in the level not requiring approval from the Executives Committee.

18. To perform other work as assigned by the Board of Directors on a case by case basis. The Chief Executive Officer does not have authority to approve related transactions not being on an arm-length basis, transactions of acquisition and disposition of the Company's major assets, and/or the transactions with the Company and its subsidiaries in which the Chief Executive Officer or a person possibly conflict having interest and having conflict of interest in any nature, except for transactions being on an arm-length basis where the policies and conditions are provided and approval is granted in accordance with the policies and conditions approved by the Board of Directors and endorsed by the shareholders for entering into related transactions and transactions acquisition and disposition of major assets of the Company or its subsidiaries to be in accordance with the rules and regulations of the Stock Exchange of Thailand.

The Chief Executive Officer has authority to approve spending in specific cases or actions in the amounts as follows:

(a) Approval of investment fund in an amount of not exceeding THB 210,000,000 per project.

- Approval on purchase of raw land in an amount of not exceeding THB 10,000,000 on each occasion.

- Approval on hiring contractors for the objectives of constructing warehouses or factories in an amount of not exceeding THB 200,000,000 on each occasion.

(b) Approval on purchase of construction materials and others for constructing warehouses or factories in an amount of not exceeding THB 50,000,000 on each occasion.

(c) Approval of payment of contractors' remuneration and creditors of construction materials in an amount of not exceeding THB 200,000,000 on each occasion.

(d) Approval of loans to be expense on normal business operation, marketing, purchase, investment in assets in an amount of not exceeding THB 200,000,000 on each occasion.

## CORPORATE SECRETARY

Mr. Sirisak Kijraksa as company secretary, effective from 13 May 2016. His qualified and experienced and he used to be a company secretary of WHA Industrial Development Public Company Limited. He also has good knowledge and understanding of the business which is capable to advise accurately and appropriately to the Board of Directors of duties and responsibilities.

### Scope of authorities and duties of the Corporate Secretary

1. To provide preliminary suggestion to directors in respect of laws, rules and regulations.

2. To provide advice on holding of shareholders' meeting in accordance with laws, regulations and guideline and prepare an invitation notice for shareholders' meeting.

3. To record minutes of shareholders' meeting and directors' meeting and follow up compliance with shareholders' meeting and board of directors' meeting.

4. To prepare and safe-keep the following documents:



- (a) The register of director.
- (b) The invitation of meetings of the Board of Directors, minutes of meetings of the Board of Directors and the Company's annual report.
- (c) The invitation of meetings of shareholders and minutes of meetings of shareholders.
- 5. To safe-keep reports of conflicts of interest reported by the directors or the executives.
- 6. To procure disclosure of information and information memorandum to the public in accordance with laws and regulations.
- 7. To perform other acts as specified by of the Capital Market Supervisory Board.

## DIRECTOR AND EXECUTIVE REMUNERATIONS

### 1) Remuneration in Cash

#### Director Remuneration

The 2020 Annual General Meeting, held on 13 July 2020, resolved to approve the remuneration for the directors as follows;

1. The emoluments of company director

Position	Amount
Chairman of the Board of Director	250,000 per year*
Director	200,000 per year*

*\*To pay monthly*

2. The meeting allowances by pay only the director attend the meeting.

Position	Meeting allowances
Chairman of the Board of Directors	40,000 Baht per time
Chairman of the Audit Committee	35,000 Baht per time
Director	30,000 Baht per time

3. Sub-Committees meeting allowance by pay only the director attend the meeting.

Position	Meeting allowances
Chairman of Sub-Committees	25,000 Baht per time
Sub-Committees Member	15,000 Baht per time

4. Bonus at the rate of 0.17 percent of the total income of the Consolidated Financial Statement and Share of Profit of Associates and Joint Ventures for the year ended 31 December 2020.

5. Other Benefit  
-None-

The details of the meeting attendance and remuneration of all directors and sub-committees members are summarized as following:

Name	Meeting Attendance/Number of Meeting in year 2020					
	Board of Directors	Executive Committee	Audit Committee	Risk Management Committee	Corporate Governance Committee	Nomination & Remuneration Committee
Ms. Jareeporn Jarukornsakul	10/10	-	12/12	5/5	-	4/4
Mr. David Richard Nardone	10/10	-	12/12	-	-	-
Mr. Vivat Jiratikarnsakul	10/10	-	12/12	-	-	-
Mr. Krailuck Asawachatroj	10/10	-	12/12	-	-	-
Mr. Jakrit Chaisanit	10/10	-	12/12	-	4/4	-
Mr. Narong Kritchanhai	10/10	-	12/12	-	4/4	-
Mr. Somsak Boonchoyruengchai	10/10	-	12/12	-	4/4	-
Dr. Pichit Akrathit*	5/5*	2/2*	-	-	-	-
Mrs. Anchalee Chavanich**	4/4**	2/2**	-	-	-	-
Lt. Gen. Prachya Chalerawat Ph. D.***	4/4***	-	-	2/2***	-	-
Dr. Apichai Boontheerawara	10/10	5/5	-	-	-	4/4
Dr. Somsak Pratomsrimek	10/10	5/5	-	5/5	-	-
Dr. Kritsana Sukboonyatasatit	10/10	5/5	-	5/5	-	4/4
Mr. Natthapatt Tanboon-ek****	-	-	3/3****	-	-	-

**Noted** \* Dr. Pichit Akrathit resigned from the position of Independent Director and Chairman of the Audit Committee member on 2 June 2020.

\*\* Mrs. Anchalee Chavanich was appointed as Independent Director and Chairman of the Audit Committee member on 22 June 2020.

\*\*\* Lt. Gen. Dr. Prachya Chalerawat was appointed as Independent Director and Risk Management Committee member on 22 June 2020.

\*\*\*\* Mr. Natthapatt Tanboon-ek was appointed as Executive Committee member on 1 September 2020.

Unit : THB Thousand

Name	Directors' Remuneration for year 2020								Total
	Position Allowance	Meeting Allowance						Bonus	
		Board of Directors	Audit Committee	Executive Committee	Risk Management Committee	Corporate Governance Committee	Nomination & Remuneration Committee		
Ms. Jareeporn Jarukornsakul	250.0	400.0	-	300.0	125.0	-	60.0	1,600.8	2,735.8
Mr. David Richard Nardone	200.0	300.0	-	180.0	-	-	-	1,427.7	2,107.7
Mr. Vivat Jiratikarnsakul	200.0	300.0	-	180.0	-	-	-	1,427.7	2,107.7
Mr. Krailuck Asawachatroj	200.0	300.0	-	180.0	-	-	-	1,427.7	2,107.7
Mr. Jakrit Chaisanit	200.0	300.0	-	180.0	-	60.0	-	1,427.7	2,167.7
Mr. Narong Kritchanchai	200.0	300.0	-	180.0	-	60.0	-	1,427.7	2,167.7
Mr. Somsak Boonchoyruengchai	200.0	270.0	-	165.0	-	100.0	-	1,427.7	2,162.7
Dr. Pichit Akrathit*	83.8	175.0	50.0	-	-	-	-	-	308.8
Mrs. Anchalee Chavanich**	104.4	140.0	50.0	-	-	-	-	769.5	1,063.9
Lt. Gen Prachya Chalermwat, Ph. D.***	104.4	120.0	75.0	-	30.0	-	-	769.5	1,023.9
Dr. Apichai Boontheerawara	200.0	300.0	75.0	-	-	-	75.0	1,427.7	2,102.7
Dr. Somsak Pratomsrimek	200.0	300.0	75.0	-	-	-	-	1,427.7	2,077.7
Dr. Kritsana Sukboonytasatit	200.0	300.0	75.0	-	75.0	-	75.0	1,427.7	2,137.7
Mr. Natthapatt Tanboon-ek****	-	-	-	60.0	-	-	-	-	60.0
Total	2,342.7	3,505.0	325.5	1,425.0	305.0	220.0	220.0	15,990.0	24,332.7

**Noted** \* Dr. Pichit Akrathit resigned from the position of Independent Director and Chairman of the Audit Committee member on 2 June 2020.

\*\* Mrs. Anchalee Chavanich was appointed as Independent Director and Chairman of the Audit Committee member on 22 June 2020.

\*\*\* Lt. Gen. Dr. Prachya Chalerawat was appointed as Independent Director and Risk Management Committee member on 22 June 2020

\*\*\*\* Mr. Natthapatt Tanboon-ek was appointed as Executive Committee member on 1 September 2020.

## Executive Remuneration

In 2020, the Company paid remuneration to 8 executives as salary and bonus in total amount of approximately THB 58.20 mm. as table below:

	2020 Amount (THB mm.)
Salary	45.14
Bonus	13.06

## 2) Other Remunerations

The Company has provident fund program in which the Company contributes the amount of 4 - 10% of salary. In 2020, the Company contributed into the provident fund for 8 Executives of the Company in the amount of THB 3.27 mm.

## EMPLOYEES

### Number of Employees

As of 31 December 2020, the Company had 117 employees which those can be divided as follows.

The Company	No. of Employees
Executives	4
Business Development Department	12
Building Development Department	10
Maintenance Department	24
Operation Department	16
Procurement Department	3
Accounting Department	17
Internal Audit	2
Corporate Finance and IR Department	8
Human Resources Department	6
Legal Departments	6
Land Department	2
IT Department	3
Office of CEO	7
<b>Total</b>	<b>117</b>

### Material labor dispute during the past 3 years

- None -

## Remuneration of Employees (excluding executive)

Officers of the Company receive remuneration in form of, among others, salary, bonus, overtime wage, provident fund allowance, social security allowance and compensation fund allowance. Officers also receive other welfares, such as annual public holidays, maternity leave, ordination leave, medical allowance and funeral assistance. The details of Personnel Remuneration which contributed in cash for 2020 were as follows;

Remuneration	Amount (THB mm.)
Salary	89.22
Bonus	18.93
Provident Fund Contribution	4.88
Social Security Contribution	0.77
Compensation Fund Allowance	0.02
Overtime	0.72
<b>Total</b>	<b>114.54</b>

### Policy on development of employees

The key vision of WHA group aims to be the learning and sustainability organization by enabling the various theoretical knowledge brought to the innovative working environment. The initial vision is also the pillar of every employee to develop themselves in respect of to be the knower, fully capability, innovative ideas and keeping up the trend timely so as to be responsible for their duties efficiently as well as driving the business in a sustainable way forward.

The development roadmap is under the umbrella of the Human Resources Department in collaboration with Chulalongkorn University and Expert Training Institutions to uniquely customize the curriculum for the top to the middle executives in order to sharpen the Leadership Competency and the Readiness of Business Challenges Acumen.

The array of development models is consisted of the various theoretical frameworks, executions, on- the- job training concepts including the innovative activities to brighten the future leader. Last but not least, the mentioned above are the concept tailored for the leaders and officers are able to collaboratively design their development plans. The average of employees' training hour of the company in 2020 is 23 hours/person.

### Investment Policy in Subsidiaries, Associated Companies, Property Fund and Real Estate Investment Trust

The Group of Companies has the policy of investment in the companies that engage the same business as the core business and related business of the Group of Companies, such as industrial estate business, real estate business, utility business, power business, and renewable energy business, to increase the earnings and competitiveness for the Group of the Companies.

However, in management of the subsidiaries and associated companies, the Group of Companies will appoint the representative from the Group of Companies to be involved as the director of those companies in appropriate proportion for governing the operations of the subsidiaries and associated companies to be in line the proper direction and create maximum benefit to the Group of Companies.

In addition, the Group of Companies also has the policy of investment in real estate business through Property Fund and Real Estate Investment Trust in the proportion of not more than 20% of total investment units or unit trusts (as the case may be) to generate steady dividend income annually. Nevertheless, the investment in Property Fund and Real Estate Investment Trust will depend on the requirement for investment and fundraising amount from sales of assets to Property Fund and Real Estate Investment Trust during such period. Therefore, the investment in Property Fund and Real Estate Investment Trust may be different from the determined investment policy. Moreover, the Company has no control and no participation in determining the policy of Property Fund and Real Estate Investment Trust.



The Company is aware of operating its businesses with responsibility and fairness, therefore, the Company realizes an importance of good corporate governance and management which will help to increase the competitiveness and management efficiency, with emphasizing in the promotion of sustainable growth. This will create the long term additional value for the Company, shareholders and all stakeholders. In this regard, the corporate governance will supervise the business operation of the Company to be transparency and auditable. The Company has established a Good Corporate Governance Policy with propose that the directors, executives and employees adhere such policy as guidelines for perform their responsibility. The Good Corporate Governance Policy of the Company shall be annually reviewed by the Corporate Governance Committee in order to ensure the compliance with the laws, good practice, business operation, economical environment, and changed society.

### 1. Good Corporate Governance Policy

The Good Corporate Governance Policy of the Company includes;

#### 1.1 Rights of the Shareholders

The Company takes as a priority the right of shareholders to complete and accurate information in a timely and fair manner to support their decision-making. The Board of Directors, therefore, sets the policy as follows.

(1) The Company shall send a notice of shareholders' meeting together with sufficient data in supporting documents on various agendas with objectives, reasons and opinion of the Board of Directors on each of the agenda so that the shareholders will have the opportunity to study the full information at least 30 days in advance. In case the shareholders cannot attend the meeting by themselves, the Company allows the shareholders to appoint an independent director or any person as a proxy to attend the meeting by using the proxy form as enclosed in the notice. The shareholders

can also download the proxy form from the Company's website.

(2) The Company has the policy to fairly facilitate all shareholders and institutional investors in exercising their rights in attending the shareholders' meeting in terms of an appropriate venue, timing, and uncomplicated voting method.

(3) In shareholders' meeting, agenda items will be considered and voted in order as specified in the notice without change of material information. Shareholders are given equal opportunity to review the Company's business performance, make enquiries, and present their views and suggestions. Directors and relevant management will attend the shareholders' meeting to answer questions raised in the meeting.

(4) To increase channels for shareholders to access information through the website of the Company on which the information and details are uploaded. In particular, the notice for shareholders' meeting will be disseminated at least 30 days in advance so that the shareholders can conveniently and fully download information and agenda.

(5) The Company has the policy that directors, top management and the auditor will attend the shareholders' meeting to provide answers and acknowledge opinions from the shareholders.

(6) Recording the minutes of shareholders' meeting will be made in full, on time and transparently. Material questions and opinion will be recorded in the minutes so that the shareholders will be able to review. In addition, the Company will upload the minutes of shareholders' meeting in the Company's website for shareholders' consideration. The Company will submit the minutes of shareholders' meeting to the Stock Exchange of Thailand within 14 days from the date of shareholders' meeting.

(7) To facilitate shareholders to receive the dividends by transfer to the bank account (in case of dividend payment) for convenience of shareholders in receipt of dividend on time and to prevent cheque from being damaged, lost or delayed.



(8) The Company has the policy to give an opportunity to shareholders to propose agenda and/or submit questions on the agenda in advance in order that the shareholders will gain ultimate benefits from the meeting as well as to fully preserve the rights of shareholders. This can be done via email or facsimile to the Company Secretary.

(9) The Nomination and Remuneration Committee will consider the scope of works, responsibility, completion of work and business performance as well as other factors including remuneration of directors of other companies in the same industry for determination of the remuneration of directors. The Nomination and Remuneration Committee will firstly consider the remuneration of the Board of Directors prior to submission to the Board of Directors for further approval.

## 1.2 The Equitable Treatment of Shareholders

The Company shall treat shareholders equally. Therefore, the Board of Directors has the following policy.

(1) The Company shall send the invitation of meeting together with supporting information to the shareholders at least 21 days in advance in order to give an opportunity to the shareholders to fully study information prior to the shareholders' meeting date.

(2) The voting right in the shareholders' meeting shall be in accordance with a number of shares held by shareholders. One share will have one vote. In addition, the Company allows the shareholders who attend the meeting after the commencement of the meeting to vote for agenda being considered for agenda which are under consideration and has not been voted, and the vote of such shareholders will be included in the quorum.

(3) With regard to the agenda item on the directors to replace those who resign by rotation, the Company has the policy to give an opportunity to the shareholders to vote on each individual director. This means that the shareholders will have the opportunity to truly select the directors of their choice and preference. The Company will enclose the details of the nominated directors enough for shareholders' consideration.

(4) The Company will allow a shareholder who holds shares representing not less than 0.5% of the paid-up capital for not less than 12 months consecutively to propose via the email or facsimile to the Company

Secretary agenda items the annual shareholders' meeting and nominate a qualified person to serve as a director.

(5) The Company will set the preventive measures on insider trading of related persons which means the Board of Directors, top management and officers in the division which may be involved in the Company's information (including their spouse and minor child).

(6) The Company will set the policy on conflict of interest on the basis that decision making of personnel at all levels will be made to the ultimate benefit of the Company and it shall be the duty of all personnel to avoid any financial involvement and/or relationships with third parties which may result in the Company's loss of benefit or cause the conflict of interest or prevent any effective performance of duty. The related persons or connected persons shall inform the Company of relationship or connected transactions and shall not participate in decision making and shall have no authority to approve such transactions. The approval on such transactions shall be in accordance with principle and have no more special terms and conditions than those of ordinary case.

(7) To facilitate the shareholders who cannot attend the meeting by themselves by allowing the shareholders to give a proxy to any person or permit at least 1 independent director to attend the meeting and notify the name of such independent director in the notice of meeting.

(8) To treat shareholders equally, no matter whether they are major shareholders or minority shareholders, or they are Thai or foreigners.

## 1.3 Conflict of Interest

The Company realizes the importance of transparency when considering matters taking into account the benefit of the Company. Therefore, the Company gives high priority to prevention of any transactions that could turn into conflict of interest, connected transactions, or related transactions, and imposes a policy for this purpose with material details as follows.

(1) The management and the officers shall strictly comply with the Code of Conduct to earn trust of all stakeholders and disclose the information for understanding to all officers of the Company.

(2) Directors and the management shall inform the Company of relationships or connected transactions which may cause the potential conflict of interest.

(3) Connected transactions shall be submitted to the Audit Committee for consideration prior to submission to the Board of Directors for further approval in accordance with the good corporate governance. Compliance with the rules prescribed by the SET and the Office of the SEC shall be monitored.

## 1.4 Roles of Stakeholders

The Company recognizes and is aware of the rights of all stakeholders, whether they are insider stakeholders, i.e. employees, shareholders, or outsider stakeholders, i.e. customers, partners, creditors, competitors, public section or agencies as well as nearby communities as the Company earns the support from stakeholders which enhances the competitiveness and profitability and it is deemed as a long-term value to the Company. The Company set the following policy:

### (1) Policy on treatment to Employees

The Company realizes that officers are key factors to achieve the Company's target. The Company has policy to treat all employees fairly in respect of opportunity, remuneration, appointment as well as development of potential. To this ends, the Company has the following practices:

- 1) To treat employees with politeness and respect by taking into account the individualism.
- 2) To give employees the fair remuneration, set up provident fund for employees and provide welfare.
- 3) To preserve the work environment with safety to life and assets of employees.
- 4) To appoint, promote or demote, give bonus and penalize employees at good faith and on a basis of their knowledge, capability and appropriateness of such employees.
- 5) To give extensive and constant opportunity in respect of knowledge management and competency to officers to develop the employees' capability to empower officer to their full potential with professionalism.

6) To acknowledge views and suggestions which are based on employees' professional knowledge.

7) To strictly comply with relevant laws and regulations governing employees.

8) To treat fairly and appropriately with employees' remuneration by considering employees' knowledge, competency, qualification, appropriateness of performance, individual performance evaluation based on Balanced Scorecard, survey result of labor market in a way that is seen as internally fair and externally competitive, as well as company's performance from each year earning profits.

### (2) Policy and Treatment to Shareholders

The Company recognizes that the shareholders are the owner of business and the Company has the duty to enhance a long-term shareholders' value as follows:

- 1) to perform fiduciary duty and make decision in accordance with professional principles with due care and fairness to both of major and minority shareholders to the ultimate benefit of overall shareholders.
- 2) to constantly and fully present the report on the Company's status, business performance, financial status, accounting and other reports
- 3) to prohibit the exploitation of benefit to themselves or third parties by using of the Company's information which is not disclosed to the public or do any acts and things which may cause the conflict of interest with the Company

### (3) Policy and Treatment to Customers

The Company recognized the importance of customers and set the policy to treat customers as follows:

- 1) to serve customers with politeness, eagerness and readiness to provide service with sincerity and willingness and care, take care of customers as closed cousin, and provide services on timely, accurate and reliable basis
- 2) to keep confidential the customers' information and not to use for its own benefits or related persons unduly

3) to give accurate, sufficient and timely information to customers on services of the Company to customers without exaggerate advertisement which may mislead customers regarding qualities or conditions of the Company's services

4) to provide suggestions on the Company's services to the best benefit of customers.

#### **(4) Policy and Treatment to Partners and/or Creditors**

The Company has the policy to officers to treat customers and/or creditors fairly and at good faith without taking advantage over competitors by taking into account the Company's ultimate benefit and mutual fair treatment to avoid situation which may cause the conflict of interest. Negotiation for settlement will be conducted on the basis of business relationship under the following practice:

1) not to claim or receive or pay any benefits in bad faith to partners and/or creditors

2) in case that there is any information that the claim, receipt or payment of any benefits was not made in good faith, details must be disclosed to partners and/or creditors and the problem shall be settled fairly and timely

3) to strictly comply with conditions as agreed upon. In case of non-compliance with any agreements, creditors shall be informed in advance to jointly find the solution.

#### **(5) Policy and Treatment to Competitors**

The Company has the policy to treat competitors without breaching the confidentiality or knowing the confidentiality of competitors with fraud and set the following policy:

1) to follow the rules on competition

2) not to seek confidentiality of competitors by bad faith or inappropriate means.

3) not to destroy competitors' reputation by malicious accusation.

#### **(6) Policy and Treatment to Societies/Communities**

The Company has the policy on the undertaking business which renders benefits to the economy, environment, society and adheres to the principle of

being a good citizen. The Company fully complies with laws and participates in activities that will promote or enhance the quality of life of societies, communities, and responsibility towards the environment.

Furthermore, the Company has allocated the budget from the Company's income annually to support activities that will benefit societies, communities, and the environment as appropriate. In 2019, the Company donated the money to support education, educational equipment, and other necessary things and gave lunches to students of the school located in the area that the Company invested in. In addition, the Company held activities in its organization to support and cultivate the consciousness of all level officers in sharing, such as activities to receive old calendars to support Foundation for the Blind in Thailand for bringing them to be used as the media for teaching to the blind and activity to give a donation to temple.

In this regard, the Company is in the process of preparing the sustainability report on the social responsibility of the Company in which it is separated from the annual report.

#### **(7) Policy on Safety, Healthcare, and Work Environment**

The Company recognizes the importance on preserving good work environment to ensure safety to life and assets of the employees by strictly complying with labor law, such as maintenance of the buildings and condition of the office equipment. The provision of necessary medical care services, setting rule on wearing of safety equipment on construction site as well as creating the awareness to all level officers on value and importance of constant workout. The Company arranges the healthcare welfare to officers as appropriate, such as sport activity on every Tuesday and Thursday and annual health checkup.

The Company has conducted the occupational safety, health and work environmental policies as follows:

1) Complying with laws and regulations regarding the occupational safety, health and work environment.

2) Prevent accidents, hazards and work-related illnesses from the Company's operation.

3) Reduce accidents, hazards and work-related illnesses.

4) Continuously improve the occupational safety, health and work environment of the Company.

The statistics of accident from work (In case of absence and non-absence) for the year 2020 are as follows:

List	Number
Number of fatal injuries	0 Time
Number of absences from work	0 Day
Number of injured person or death from work	0 Person

## (8) Environment Policy

The Company has the policy to support activities to promote quality, health and environment as well as work environment with safety to life and assets of officers. In addition, the Company realizes on giving knowledge and training to officers on environment and efficient use of resources, such as recycle of paper with one page used, recycle of files and campaign on electricity turn-off during lunch, using ladder instead of elevator, maintenance of equipment for readiness to use and for good safety and work environment and for enhancement of work efficiency of employees in organization.

The Company requires its employees to strictly adhere and perform their works in compliance with the relevant rules, regulations, laws, policies, requirements and standards on quality, safety, occupational health and environment. Also, the Company has acknowledged its employees about the procedure and various precautions for the accuracy way of practice in order to mitigate health, property and environment hazards, and has seriously and continuously developed, reviewed and amended the participation in society responsibility in terms of safety, occupational health and environment, by preparing the annual training plan to educate its employees about laws, environmental management procedure, both internal and external training, where the training courses are the Policy on Environmental Management System, the Creation of Environmental and Safety Awareness, the Indication of Nature of Environmental Problem, and the environmental laws

In addition, various companies in WHA Group had implemented the ISO 14001:2004, ISO 9001:2008, and CSR DIW, which was under the supervision of the Department of Industrial Works, in its all work procedures, in order to allow stakeholders to obtain the utmost quality of products and services with environmental friendly, which is a part of CSR activities.

## (9) Intellectual Property Policy

The Company has the clear policy not to infringe the intellectual properties, irrespective of copyright, patent, trademark, trade secret and other intellectual properties prescribed by law, such as infringement of computer software. All computer software must be investigated and downloaded by the information technology division to prevent illegal usage of software.

## (10) Policy on Legal Compliance and Human Rights

The Company has policy against any infringement of human rights in all respects to be consistent with the society under the rule of laws. Citizen has the freedom right under the law. The practice of the Company is as follows:

1) The Company respects and treats all stakeholders with fairness, on the principle of human dignity, without discrimination on origin, citizen, sex, age, skin color, religion, body condition, status, family and promotes monitoring of treatment in accordance with terms on human rights in the Company.

2) To act against any human trade, use of child labor with age under those prescribed by law and not to do any transactions with manufacturer or service provider who does as such.

3) To support and respect human right by reviewing and controlling the business transaction of the Company with third parties not to promote or support the violation of human right and not to violate the staff's right protected by law.

## (11) Policy on Fraud and Anti-Corruption

The Company has conducted the policy on fraud and anti-corruption as follows:

1) To set the appropriate check and balance structure among procurement division, accounting

division, management division and audit division to prevent misuse of authorities.

2) To train officers on knowledge, policy and practice on anti-corruption of the Company.

3) To support and cooperate with public sector organization and regulatory authorities as well as all sectors in the Thai society with the aim to reduce corruption and enhancement of country development.

4) To prohibit director, executive and officers from any forms of direct or indirect corruption, i.e. receipt of gift, giving gift, wining and dining, donation and any other benefits to themselves from partners of the Company.

The Company has committed to operate its business with transparency, business ethics, and good corporate governance principles. Moreover, in the year 2017, the Company has joined the signing of the announcement of the Private Sector Collective Action Coalition Against Corruption (THAI CAC). In the year 2019, the Board of Directors Meeting No. 7/2019 held on 8 November 2019, passed a resolution to revise the policies and practices of anti-corruption regularly to allow all directors, executives, and staff to have a knowledge and understanding of corruption and aware of its own duties and responsibilities. As a result, such knowledge can be applied as a guideline and allows individuals to report the wrongdoing (Whistleblower).

The Board of Directors of the Company has promoted and supported the dissemination of the handbook on Anti-Corruption Policies and Guidelines through various communication channels of the Group with the aim to develop competitiveness and reduce corruption in both public and private sectors.

The Company has the channel for employees and interested persons to inform, suggest or complain in case of corruption or any acts which is not in compliance with the Company's rules or illegal actions which leads to the improvement of training, management and investigation as follows:

- (a) Company's Website  
www.wha-group.com
- (b) Suggestion Box  
Human Resources Department
- (c) Email to Chief Executive  
ceo\_office@wha-group.com Officer
- (d) Email to Audit Committee  
auditcommittee@wha-group.com

#### Measures to protect the Whistleblowers

The Company has established a mechanism for protection of whistleblower who has engaged in monitoring benefit of the Company, by having a policy on not to downgrade, punish, or cause a negative impact on its employee who refuses corruption, even if such action would make the Company to lose any business opportunity..

### 1.5 Disclosure of Information and Transparency

The Board of Directors has the policy to accurately, fully, sufficiently, constantly and timely disclose financial information memorandum and others on business and the Company's performance which reflects the financial condition and performance of the Company including the future business of the Company.

The Board of Directors has strong intention to supervise to strictly and transparently comply with laws, regulations and rules in relation to information disclosure and distribute the information via the Company's website, SET's disclosure media in order that shareholders and relevant persons will receive the information of the Company and will adjust it to be in line with the applicable guideline of SET and SEC.

The Company has assigned Investor Relation to communicate with investors, shareholders as well as institutional investors and minority shareholders (Investor Relations Department Tel 02-753-3750 or info@wha-group.com). The Company will regularly hold the Meeting (Opportunity Day) at Securities Building every quarter for analysis of business performance and disclose information of the organization and financial information and general information to investors, securities analysts, credit rating agencies and relevant governmental authorities via various channels, such as reporting to SET, SEC and website of the Company. Moreover, the Company recognizes the importance to regularly disclose the information in order that the shareholders continually receive information via the Company's website. The information thereof will be constantly updated, such as vision, mission, financial statements, public relation news, annual report, corporate structure, management, shareholding structure and major shareholders.

In addition, the Company realizes the importance of financial statements which truly reflect the financial status and performance of the Company on the basis



that the accounting information must be correct, complete and sufficient per the generally accepted accounting principles. The Company will disclose information regarding each of directors as well as roles and duties of the Board of Directors and the committees of the Company in the Annual Report (Form 56-2) and Annual Report (Form 56-1) and will disclose remuneration of directors and top executive in Annual Report (Form 56-2) and Form on Annual Information Disclosure (Form 56-1).

## 1.6 Responsibility of Board of Directors and Committees

### (1) Structure of Board of Directors

As of 31 December 2020, the Board of Directors of the Company comprises 12 persons as follows.

- 1) Directors who are executives numbering 7 persons
- 2) Directors who are not executives numbering 5 persons inclusive of 4 members of the audit committee.

Although the Chairman of the Board of Directors is the Chairman of the Executive Committee, the consideration on material issues will be screened by the Executive Committee and, if it exceeds the authority of the Executive Committee, it will be submitted to the Board of Directors. In addition, the company also provided the scope of authorities of Board of Directors, committees and Chief Executive Officer in writing to set the clear scope of works and responsibilities of Committees which reflects the transparency and due care in making decisions.

### (2) Roles, Duties and Responsibilities of the Board of Directors

The Board of Directors has the duty to perform in accordance with law, objectives, articles of association and resolution of shareholders' meeting by performing the fiduciary duty and duty of care to the benefit of shareholders and stakeholders in long term and short term to ensure that the Company operates the business in the direction that maximizes the benefit of shareholders

and stakeholders.

In the year 2020, the Board of Directors has considered and revised the procurement of the preparation of vision, mission, target, policy, direction, approve the strategic plans, work plans and annual budget of the year 2021 of the Company. The Board of Directors will share opinions to ensure mutual understanding of the overall the business prior to giving approval and shall follow up the management to meet target by adhering to the approved budget.

### (3) Nomination of Directors

Nomination and Remuneration Committee is responsible for director nomination by considering qualifications based on the Public Company Limited Act B.E. 2535 and Regulations of SET regarding the experiences, appropriateness, and skill as director. The criteria of director nomination are follows:

- 1) The nominated director shall have knowledge, competency and experience of company business including professional and specific skill, education, age and gender
- 2) The nominated director shall have leadership, vision, ethic, good attitude to company as well as time to devote themselves to company
- 3) The nominated director shall not be in Black list from any organization including the securities and exchange commission or have been sentenced to any crime
- 4) In case of independent director, the nominated director shall be qualified with independent director qualification
- 5) To consider any other qualifications based on Board's structure and component and company's direction through transparent nomination process to build trust with shareholders

The directors are selected with qualifications, knowledge, ability in various skills and experience to perform the duty efficiently based on the Board Skill Matrix to bring the maximum benefit to the Company and Shareholders.

Director's Name	Education and Experiences													
	Accounting	Finance	Economics	Strategy	Engineering	Industries	Business Operation	Business Management	International Trading	Corporate Governance	Legal	Information Technology	Risk Management	Auditing/ Internal Audit
1. Ms. Jareeporn Jarukornsakul	✓	✓	✓	✓	✓	✓	✓	✓		✓		✓	✓	
2. Mr. David Richard Nardone	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
3. Mr. Vivat Jiratikarnsakul				✓	✓	✓	✓	✓		✓			✓	
4. Mr. Krailuck Asawachatroj	✓	✓	✓	✓	✓				✓	✓	✓	✓	✓	✓
5. Mr. Jakrit Chaisanit					✓									
6. Mr. Narong Kritchanhai											✓			
7. Mr. Somsak Boonchoyruengchai	✓						✓			✓	✓		✓	
8. Mrs. Anchalee Chavanich		✓	✓	✓	✓	✓	✓	✓	✓	✓			✓	✓
9. Lt. Gen. Dr. Prachya Chalermwat				✓	✓					✓		✓	✓	
10. Dr. Apichai Boontharawara	✓	✓	✓	✓			✓	✓	✓	✓			✓	✓
11. Dr. Somsak Pratomsrimek	✓									✓			✓	✓
12. Dr. Kritsana Sukboonyasatit	✓	✓		✓	✓	✓		✓	✓				✓	✓
<b>Total</b>	<b>7</b>	<b>6</b>	<b>5</b>	<b>7</b>	<b>8</b>	<b>6</b>	<b>6</b>	<b>6</b>	<b>6</b>	<b>8</b>	<b>4</b>	<b>4</b>	<b>10</b>	<b>5</b>

After nomination process, the Nomination and Remuneration Committee shall propose the nominated director to Board Meeting for appointment as required by law. In case of the appointment shall be approved by shareholder meeting, the Board of Director shall propose nominated person to shareholder meeting for approval.

The Company has prescribed qualification of independent director who have well knowledge in Finance, Economic, Accounting, public administration and other field of businesses suitable as standard factors to safeguard benefit of the shareholders and others. Additionally, to have qualification according to such prescribed in regulation of SET and SEC which the Company's Independent Director's Definition as follow:

1) holding share not exceeding 0.5% of paid up capital of the company, subsidiaries, associates or related companies or juristic persons with potential conflict of interest including also share held by related persons.

2) uninvolved in management, not being an employee, staff, consultant earning permanent salary in the company or the company's management, its subsidiaries, associates, related companies or other persons with potential conflict of interest except in the case that such interests finished at least 2 years prior to the appointment date.

3) shall have no blood relationship or relationship through legal registration in the forms of parents, spouse, siblings and children, or children's spouses with executive directors, management, controllers, or major shareholders of the company or its subsidiaries of executive directors, management, controllers, or the persons who are nominated for an executive position or executives of the company or its subsidiaries.

4) not holding business relationship with the company, principal company, subsidiary companies, affiliated companies, major shareowner, or person holding controlling power of the company, which may hinder the

exertion of his/her independent discretion, and not being or having ever been a shareowner, with significant implication, or person holding controlling power of the person holding business relationship with the company, principal company, subsidiary companies, affiliated companies, major shareowner, or person holding controlling power of the company, unless having vacated from said tenure for not less than two years before appointment as an independent director.

Business relationship as in first paragraph shall include the normal course of trading transaction for business undertaking, lease or grant of lease of immovable asset, transactions relating to asset or service, or grant or receipt of financial assistance through acceptance or grant of loans, guaranty, grant of asset as guaranty for loans, including other similar behavior, thus making the person applying for permission or a contract party liable to payment of debt to another party, from 3 percent of net tangible assets of the person applying for permission, or from Baht 20 million or over, whichever is lower. The calculation of debt burdens as referred to above shall comply with the valuation of connected transaction in compliance with the notification of the Capital Market Supervisory Board on the criteria of the connected transaction, with the respective differences having been considered (*mutatis mutandis*). However, the consideration of the said debt burdens shall include the debt burden incurred within one year before having business relationship with the same person.

5) shall not be or used to be auditors of the company, its subsidiaries, joint venture companies, the major shareholders or the company's executives. The Independent Directors shall not be major shareholders, executives or business partners of juristic person under the management of the auditor of the company, its subsidiaries, joint venture companies, major shareholders or the company's executives except when such activities finished at least 2 years prior to the appointment date.

6) shall not work or used to work in a profession that included law and financial consultant services and asset appraising, which receives service fees of over 2 million baht per year from the company, its subsidiaries and joint venture companies or major shareholders or the company's executives. In the case that the profession is registered as a person juristic, this rule covers the case of being the major shareholder, executives, or business partner of that professional service, except such services ended at least 2 years prior to the appointment date.

7) not being the director who is appointed to safeguard benefit of the company director, major shareholder or shareholder who is related to the major shareholder of the company.

8) Must not have any other characteristics that may obstruct his/her ability to give independent opinion on the Company's operation.

9) Independent directors can serve as directors of the Company for a period of no more than 9 consecutive years.

10) At least 1 independent director shall be a female.

#### **(4) Meeting of Board of Directors**

Regular attendance of meetings of the Board of Directors is an important duty of the directors to acknowledge and participate in decision making on business undertaking of the Company. In each year, there will be at least 7 meetings of Board of Directors. At each meeting, the agenda will be clearly prepared in advance. A special meeting of Board of Directors may be held to consider urgent matters.

For the Board of the Directors' Meeting, the document for the said Meeting shall be distributed to the Directors for acknowledgement and consideration in advance 7 days before the said Meeting occurs. However, in an urgent case being importance for protecting the right and benefit of the Company, the notification may be made by other methods and the meeting date may be determined in shorten than such specified time. In case of an electronic conference, the invitation letter may be delivered via electronic means.

In case of electronic conference, the notice must be clearly clarified that the Meeting is via electronic conference and also be clarified what source of the electronic each directors use to attend the Meeting.

Top executives of the Company may attend the Board of Directors' meetings to give information which may be useful and directly take policy from the Board of Directors. The Company also has the policy that the non-executive directors will have a meeting at least once a year. It is intended that the non-executive directors have the opportunity to meet with one another to discuss issues of their interest without attendance by the executive or management.

For this year, non-executive directors held total 3 meetings without management team.

In determining the agenda for Board of Directors, Executive Committee will consider issues which will be the agenda in the Board of Directors' meetings. All executive directors are able to propose any agenda and independently and freely give an opinion, and the Company Secretary will prepare such issue to be the agenda of the Board of Directors' meetings and prepare notice of Board of Directors' meetings. The approval in the Board of Directors' meetings will be made by majority votes and one director has one vote. The director having any conflict of interest will not attend the meeting or refrain from voting on such agenda.

The Board of Directors promotes and encourages that not less than two-thirds out of total number of the directors shall presence in the meeting at the voting time.

For the date of quarterly Board of Directors Meeting, it will be determined in advance for the whole year. Apart from the yearly-determined meeting date, the Company may hold the Board of Director Meeting to consider various business operations as necessary, including holding an urgent meeting as well.

After the end of the meetings, the Company Secretary will prepare the minutes of the Board of Directors and submit the same to the Chairman to sign and will propose it to next Board of Directors' meeting for certification. The directors may give their opinions on revision of the minutes of the Board of Directors' meetings in order that the details of the minutes will be accurate as much as possible.

The certified minutes of the meetings will be systematically kept as secret in electronic form for ease of searching.

## **(5) Orientation of New Directors**

In performing duty of director, the director must understand the nature of business of the Company. Therefore, in case of change of directorship, the Company will arrange the orientation for a new director to have him/her understand the nature and guideline on business operation as a whole and will give the material information memorandum and corporate governance guideline necessary for performance by director of the duty. The Company Secretary will coordinate for such orientation.

## **(6) Policy on Restriction on Number of Companies and Number of Terms of Director**

The Company has the policy for its directors to serve as director in other listed companies at no more

than 5 companies without exception. All directors currently serve as director of no more than 5 listed companies.

Moreover, the Company has the policy that Chief Executive Officer shall not be a director in other companies in the same or similar nature of business, except for the associated companies and/or subsidiaries and/or affiliated company, to ensure that there will be no conflict of interest.

## **(7) Evaluation of Performance of Board of Directors**

The Company has prepare the annual self-evaluation for the Board of Director and sub-committee as collective body and individually, and CEO, to jointly consider and conclude the performance for reviewing operation, problems and obstacles and seeking solutions. The Company set the guideline for evaluation of the Board of Directors as a whole pursuant to the evaluation guideline of the SET. The result of the evaluation will play an important role in developing the efficient performance of duty of the Board of Director. The evaluation form outlines the following topics.

- 1) Satisfaction regarding the following:
  - (1) Result of performance of the Board of Directors as a whole,
  - (2) Result of business operation of the Company, and
  - (3) Proceeding with solving the problem by the management.
- 2) Understanding on
  - (1) Role and Duty
  - (2) Company's Business and
  - (3) Company's Strategy
- 3) Good relationships between the Board of Directors and Management
- 4) Efficiency of subsidiary and committees
- 5) Sufficient and appropriate time allocation by the Board of Directors to consider the following issues:
  - (1) Policy and direction of the Company
  - (2) Business performance of the Company
  - (3) Solution in case of non-achievement
- 6) Preparation by the Board of Directors to attend the meeting
- 7) Independence of the Board of Directors in expressing the opinion
- 8) Neutral opinion of the Board of Directors
- 9) Opportunity and support given by the

Chairman to every director to independently express his opinion

10) Opinion of the Board of Directors on investors' confidence to the Board of Directors

11) Acceptability among officers on corporate governance practice of the Company

The Company Secretary will provide the evaluation form to directors at the end of each year and will collect and report the summary to the Board of Directors for further consideration and discussion annually.

**For the overall performance of the Board of Directors for the year 2020 are as follows:**

Directors Assessment	Average score	Criteria
Report on Self-Assessment of Board of Directors as a whole	97	Excellent
Report on Self-Assessment of sub-committee as a whole		
• Executives Committee	99	Excellent
• Audit Committee	99	Excellent
• Nomination and Remuneration Committee	96	Excellent
• Risk Management Committee	98	Excellent
• Corporate Governance Committee	98	Excellent
Report on Self-Assessment of Board of Directors and Committee Member on an individual basis	98	Excellent

#### **(8) Evaluation of the Chief Executive Officer**

The Company assigned the Nomination and Remuneration Committee to evaluate the performance of the Chief Executive Officer annually and report to the Board of Directors for approval. Moreover, the Company has set criteria for the performance evaluation of the Chief Executive into various topics, including leadership, strategy formulation, strategy implementation, financial planning and performance relation with the personnel and succession, knowledge on product and services, and characteristic.

The evaluation result will be taken to determine to increase the rate of salary of the Chief Executive Officer and propose to the Board of Directors for approval. The Company has the policy to determine the remuneration of Chief Executive Officer based on the current performance (short-term) and the performance according to the long-term strategy in order to lay the foundation for future growth to reach the same standard as the companies in the same industry under the clear and transparency criteria.

#### **(9) Succession Plan**

The Company recognizes the importance of succession plan. The Company, therefore, prepared the succession plan to cover significant positions by selecting qualified persons to serve in such positions and arranging the training for readiness to serve such positions in the future and ensure that the Company will have knowledgeable and capable executive to succeed such significant positions in the future.

#### **(10) Risk Management**

The Company assigned the Risk Management Committee to be in charge of setting up risk management working team comprising the Company executives to jointly discuss and regularly evaluate the risk in the organization for inside and outside risks and set risk management measures. Working group will monitor the risks as identified with support from various divisions and report the result to Risk Management Committee for acknowledgement. Risk Management Committee will,



subsequently, evaluate the efficiency in respect of risk management and report it to the Board of Directors at least once a year to identify the weakness and to adjust the policy with more efficiency.

The Company has established the Risk Management Policies as follows:

1) The Company operates its business under the concept of Acceptable Risk to achieve the Company's objective and to respond the need of stakeholders. In this regard, the Company has provided the Risk Management Manual as guidelines for the interested person.

2) Risk Management Committee has the responsibility to construct policies, risk management framework, business continuity planning, review the result of the Company's risk assessment and report to the Board of Directors.

3) Risk Management Working team has the responsibility to specify the risk factors, collect the risk factors from the relevant business units, review and update the efficiency of the risk response procedure, promote the risk management culture in the Company and report to the Risk Management Committee.

4) Employees have the responsibility to specify the risk factors and prepare the risk assessment table of their business unit, specify the risk index, prepare the list of risk factors that comply with the Company's Risk Management process and report to the Risk Management Committee.

5) All Business Units, agencies, executive and employees have the duty to comply with the Risk Management Policy, Risk Management Framework, Company's Risk Management process including report and review the result of risk management.

## 1.7 Promoting of knowledge to Directors, Audit Committee Member, Executive, Company Secretary and Employees

(1) The Company provides a policy to support Directors, Audit Committee Member, Executive, Company Secretary and employees to participate training relating to governance system, business ethics. In order to improve working continually, especially, directors and company secretary so as to promote them to participate in training courses from IOD.

(2) The Company provides the director manual as to support new director to perform his/her duties effectively.

(3) The Company promotes to conduct the executive development plan, which CEO shall report such plan to Board of Director annually.

(4) In case that CEO or high level executive could not perform his duties or retiring and mitigation of risk and impact for business continuity. The Company provides training and development plan to executive so as to gain profound and experience, and readiness for working.

### Training and Development of Directors for the year 2020

No.	Name	Training program for the year 2020
1.	Ms. Jareeporn Jarukornsakul	Role of Chairman Program (RCP) 46/2020, IOD
2.	Dr. Apichai Boontharawara	Strategic Board Master Program (SBM) 9/2020, IOD
3.	Lt. Gen. Prachya Chalermwat, Ph. D.	Strategic Board Master Program (SBM) 9/2020, IOD

## 1.8 Code of Conducts

The Company has developed the Code of Business Ethics. As the guideline for the board, management and officers to understand the ethical measures that companies use in conducting business. The Company will follow frequently the Code of Business Conduct in compliance with the Code of Business Ethics. In addition, the Company's Code of Business Ethics has been published through the Company's website as well.

## 1.9 Director's Remuneration

The Nomination and Remuneration Committee will consider remuneration for Board and sub-committee before propose to annual shareholder meeting for approval. The remuneration is in line with the market, industry, and information from the Stock Exchange of Thailand. For the remuneration of senior management and the Managing Director is the Executive Committee's authority of. Taking into account the internal rate, employment in the market labor, work effectiveness, performance, including the necessity of hiring to the Company. The aforementioned conditions are an appropriate complement to attract and retain qualified employees for the benefit of the Company.

## 2. SUB-Committees

The Board of Directors set up the committees to perform the specific duties and to propose matters to the Board of Directors to consider or acknowledge and provided for the qualifications and scope of duties of committees as follows:

### 2.1 Executive Committee

Executive Committee consists of a group of persons of not less than 3 who are authorized by the Board of Directors to screen the business plan and budget the Company prior to submission to the Board of Directors and will coordinate with the management in undertaking the ordinary course of business in accordance with business plan and budget the Company.

### 2.2 Audit Committee

Audit Committee consists of 4 independent directors. All of them have the knowledge, understanding and experience. At least one member of the Committee must have accounting knowledge, expertise and experience. The Audit Committee will ensure that the Company has accurate and sufficient financial statements and appropriate and efficient internal control system. The Audit Committee has scheduled the meeting at least 4 times a year.

## 2.3 Risk Management Committee

Risk Management Committee consists of 4 persons with scope of authorities to study, review and evaluate associated risks and trend which may affect organization as well as inside and outsider risks of the Company and set the risk management policy and propose it to the Board of Directors. The Risk Management Committee has scheduled the meeting at least 4 times a year.

## 2.4 Corporate Governance Committee

Corporate Governance Committee consists of 3 persons with scope of works to review, revise corporate governance policy to be proposed to the Board of Directors for consideration. The corporate government policy will be in line with the guidelines of the SET and SEC. The Risk Management Committee has scheduled the meeting at least 4 times a year.

## 2.5 Nomination and Remuneration Committee

Nomination and Remuneration Committee consists of 3 members with scope of authorities and responsibilities to nominate qualified persons to serve as directors and top executives and propose them to the Board of Directors or shareholders' meeting (as the case maybe) as well as proposing principles and guidelines to clearly, fairly and appropriately fix remuneration for directors, committee members and top executives in line with their responsibilities, to the Board of Directors for consideration. Nomination and Remuneration Committee has scheduled a meeting at least 4 times a year.

## 2.6 Company Secretary

The Board of Directors appointed Mr. Sirisak Kijraksa as the Company Secretary with scope of works to assist in preparing agenda of meetings and preparing notice of meeting, to take care of holding the Board of Directors' meetings and shareholders' meetings and keep documents as required by law and to arrange directors and the Company to fully and transparently disclose information memorandum. The Company Secretary is a person whom the Board of Directors is of the opinion that he is qualified to serve as the Company Secretary.

### 3. Nomination of Directors and Top Executives

Nomination and Remuneration Committee consists of 3 members with the scope of authorities and responsibilities to nominate qualified persons to serve as directors and top executives and propose them to the Board of Directors or shareholders' meeting (as the case maybe) as well as proposing principles and guidelines to clearly, fairly and appropriately fix remuneration for directors, committee members and top executives in line with their responsibilities, to the Board of Directors for consideration.

The appointment of new director shall be complied with Public Company Limited Act. The criteria of director nomination are follows:

1) The nominated director shall have knowledge, competency and experience of company business including professional and specific skill, education, age and gender.

2) The nominated director shall have leadership, vision, ethic, good attitude to company as well as time to devote themselves to company.

3) The nominated director shall not be in Black list from any organization including the Securities and Exchange Commission or have been sentenced to any crime.

4) In case of independent director, the nominated director shall be qualified with independent director qualification.

5) To consider any other qualifications based on Board's structure and component and company's direction through transparent nomination process to build trust with shareholders.

After nomination process, the Nomination and Remuneration Committee shall propose the nominated director to Board Meeting for appointment as required by law. In case of the appointment shall be approved by shareholder meeting. The Board shall be proposed to shareholder meeting for approval.

The Company has prescribed qualification of independent director who have well knowledge in Finance, Economic, Accounting, public administration and other field of businesses suitable as standard factors to

safeguard benefit of the shareholders and others. Additionally, to have qualification according to such prescribed in regulation of SET and SEC.

### 4. Supervision of the subsidiaries and associated companies' operations

From 2015, the Company has prescribed the rules and guidelines requiring that nomination of persons to be the director in the subsidiaries and associated companies and the exercise of voting right at their shareholders' meetings require approval of the Board of Directors except for the following cases:

(1) Agenda items required to be adopted by the shareholders' meeting in accordance with the joint venture agreement to which the Company is a party.

(2) Following regular agenda in the annual general meetings where the executive committee may consider on casting the vote:

- To certify the minutes of the previous shareholders' meeting
- To consider and approve the report of the board of directors and performance of the past year
- To consider and approve the financial statement for the year.
- To consider and approve the allocation of net profits for the legal reserve fund and payment of dividends
- To elect new directors to replace the directors who are due to retire by rotation
- To appoint the auditor for the year

In the case of the subsidiaries, the Company prescribes the rules stipulating that the persons appointed by the Company accurately and fully comply with the rules for execution of connected transactions, acquisition and disposal of assets, or execution of any other material transactions, and that they apply the rules related to disclosure of information and execution of the said transactions in the same manner as applying the Company's rules. They shall supervise the subsidiaries to ensure that they keep information and accounting records in such a way that makes it possible for the Company to verify and collect them in a timely manner for preparing financial statements.

## 5. Use of Insider Information

The Board of Directors recognizes the importance of good corporate governance and for transparency and prevention of conflict of interest arising from use of insider information of the Company which has not been disclosed to the public, the Company set following policy:

1) Give knowledge to directors, executive and persons with position of accounting manager or financing manager or higher position on the duty to prepare and submit the report on holding of securities, their spouse and minor children to the Office of the SEC under Section 59 and penalty under Section 275 of the Securities and Exchange Act B.E. 2535.

2) Arrange directors or persons with position of accounting manager or financing manager or higher position to prepare and submit every report on holding of securities through Company Secretary prior to filing with the Office of the SEC. The report shall be prepared and filed within 30 days from appointment date of directors, executive, or within 3 business days from the date on which securities is purchased, sold, transferred or received the transfer of such securities, and quarterly report to the Board of Directors' Meeting for acknowledgment.

3) Arrange directors or persons with position of accounting manager or financing manager or higher position to acknowledge the material inside information

which affects the change of securities price and refrain from sale and purchase of securities of the Company during the period prior to disclosure of financial statement or financial status of the Company until such information has been disclosed to the public. The Company will inform in writing directors, executive including persons with position of accounting manager or financing manager or higher position to refrain from sale and purchase of securities of the Company. Such informing shall be made at least 30 days in advance prior to disclosure of information to the public and shall wait for at least 24 hours after disclosure of information to the public. The disclosure of material information to other persons is prohibited.

4) Disciplinary action will apply in case of breach of duty on using of insider information for personal benefit. It may be done by issuance of warning letter, deduction of wage, temporary suspension of work without payment, or termination of employment to the extent permitted by law, taking into account the intention and seriousness of such violation.

### The Security Holding of the Company's Directors

The Corporate Secretary collects the Security Holding of the Company's Directors including spouses or cohabiting couple and non-sui juris children proposing to the Board of Directors' Meeting quarterly.

The Summary of the Security Holding of the Company's Directors as of 2020 below:

List of Name	Type of Securities	Securities Holding		
		As of 31 Dec 2019	Increase / Decrease during the year	As of 31 Dec 2020
1. Ms. Jareeporn Jarukornsakul	Common shares	3,332,187,542	149,001,027	3,481,188,569
	Warrant	29,948,537	(29,948,537)	-
	Futures Contract	-	-	-
	Spouse /who live and cohabit together as husband and wife	322,205,135	(322,205,135)	-
	Warrant	-	-	-
	and/or underage children / juristic person which holding more than 30% of shares	-	-	-
2. Mr. David Richard Nardone	Common shares	-	-	-
	Warrant	-	-	-
	Futures contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	Warrant	-	-	-
	and/or underage children	-	-	-
3. Mr. Vivat Jiratikarnsakul	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	Warrant	-	-	-
	and/or underage children	-	-	-
4. Mr. Krailuck Asawachatroj	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	Warrant	-	-	-
	and/or underage children	-	-	-
5. Mr. Jakrit Chaisanit	Common shares	70,000,000	-	70,000,000
	Warrant	1,000,000	(1,000,000)	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	Warrant	-	-	-
	and/or underage children	-	-	-



List of Name	Type of Securities	Securities Holding		
		As of 31 Dec 2019	Increase / Decrease during the year	As of 31 Dec 2020
6. Mr. Narong Kritchanhai	Common shares	-	-	-
	Warrant	-	-	-
	Futures contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-
7. Mr. Somsak Boonchoyruengchai	Common shares	2,060,310	-	2,060,310
	Warrant	23,557	(23,557)	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-
8. Mrs. Anchalee Chavanich	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-
9. Lt. Gen. Prachya Chalermwat, Ph. D.	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-
10. Dr. Apichai Boontharawara	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-

List of Name	Type of Securities	Securities Holding		
		As of 31 Dec 2019	Increase / Decrease during the year	As of 31 Dec 2020
11. Dr. Somsak Pratomsrimek	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-
12. Dr. Kritsana Sukboonyasatit	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-
13. Mr. Natthapatt Tanboon-ek	Common shares	-	-	-
	Warrant	-	-	-
	Futures Contract	-	-	-
	Spouse / who live and cohabit together as husband and wife	-	-	-
	and/or underage children	-	-	-
	Futures Contract	-	-	-

## 6. Auditor's Fee

In 2020, the Company and its subsidiaries appointed PricewaterhouseCoopers ABAS Ltd. to be the auditing firm and Mr. Chanchai Chaiprasit, Certified Public Accountant (CPA) Registration No. 3760, to review and give an opinion on financial statements of the Company and its subsidiaries. Mr. Chanchai Chaiprasit graduated Bachelor's degree in Accounting and Higher Graduate Diploma in Auditing from Thammasat University, and LL.B Law from Chulalongkorn University. He has experienced in auditing for both listed company and limited company covering various industries such as logistics, energy, hospitality and leisure, real estate and construction, and etc. Also, obtained numerous training and certificates. Including such auditor is independent and being an

auditor approved by the Securities and Exchange Commission. He has certified financial statements of the Company and its subsidiaries for 5 years (since 2016).

In 2020, the Company and its subsidiaries paid compensation to the auditors and the audit firm as per following details.

### 6.1 Audit Fee

The Company and its subsidiaries paid the auditors and the audit firm, PricewaterhouseCoopers ABAS Ltd., amounted to THB 18.69 mm.

### 6.2

## Non-Audit Fees

-none-

## 7. The Conduct follow by Corporate Governance

According to the results of the Corporate Governance Report of Thai Listed Companies 2020: CGR 2020, the overall score of the Company are in the “excellent” level and the score has increased compared to the previous year.

The Board of Directors is aware of the roles and duties in complying with the principles of good corporate governance (Corporate Governance Code: CG Code 2017) for listed Companies of the Securities and Exchange Commission (“SEC”). Moreover, the Board of Directors has considered and reviewed the CG Code to implement to the business of the Company. For any issues that can be improved from last year, the Corporate Governance Committee also provides suggestions to the Board of Directors for further improvement.

For any issues that the Company unable to apply the guidelines in accordance with the principles of good

corporate governance for listed Companies in 2017, the reasons are as follows:

**Code of Conduct 3.1. The Board of Directors shall be responsible for establishing and reviewing the appropriateness of the structure of the Board of Directors in terms of size, composition and proportion of the independent directors to achieve the Company’s objective.**

However, even though the current structure of the Board of Directors, Chairman of the Board of Directors and Chief Executive Officer is held by the same person, The Company has clearly separated the scope of duties and responsibilities of the Board of Directors and Chief Executive Officer.

In year 2020, the proportion of an independent director is 42 percent. In this year, however, the Nomination and Remuneration Committee has proposed 3 independent directors to the Board of Directors’ Meeting to nominate those persons to the 2021 Annual General Meeting of Shareholders for appointing in replacement of the directors retired in April 2021.

Therefore, it is expected that the proportion of an independent director in the Board of Directors structure for year 2021 will be increased to 60 percent, which is higher than the criteria of the Corporate Governance Code of the SEC Office.



# CORPORATE SOCIAL RESPONSIBILITIES: CSR

## 1. Overall Policies

The Group of Companies has specified its operational policies on Corporate Social Responsibilities (CSR) towards the society, community, and environment in a sustainable manner through the process of disclosing “CSR In-Process” information that the Company is currently operating and organizing “CSR After-Process” activities, whereby the Company communicates through its annual reports, Code of Conduct, website, brochures, and newsletters, etc. Thus, the stakeholders will get the information of the Company’s vision, mission, and strategies about CSR towards the society and environment. The company has involved its CSR concepts into their business operations, both newly developed or current cooperative activities.

In 2016, WHA Group initiated the “Clean Water for Planet” project to improve water quality, while remaining focused on CSR activities that involve its primary businesses including industrial estates, utilities and energy, and property development. Since water is of utmost importance, it is necessary to raise awareness on the preservation of this natural resource. Daily life is greatly affected by the availability and quality of water. Through effective management, people living in neighboring communities can have access to clean and safe water.



After the launch of “Clean Water for Planet” as part of WHA’s Corporate CSR projects, WHA Group signed in 2016 an MoU with Chulalongkorn University on wastewater management and wastewater treatment engineering project, for knowledge exchange. The MoU aims to support the development and training of future engineers by combining their classroom learning with practical experience in a real industrial environment at WHA’s industrial estates. The ultimate goal is to help enhance the efficiency of wastewater management and treatment techniques in Thailand.

In 2017, students from the Department of Environmental Engineering, Faculty of Engineering, Chulalongkorn University, underwent training for wastewater management at WHA Saraburi Industrial Land (WHA SIL). The aim of this hands-on program was to encourage future engineers to reinforce what they learn in the classroom with practical experience in a real industrial environment under the supervision of WHA Group’s experts.

### **Collaboration between WHA Group, Chulalongkorn University and Laem Chabang Municipality**

The MoU was jointly signed by WHA Group, Chulalongkorn University’s Faculty of Engineering and Laem Chabang Municipality to exchange knowledge for practical training courses on wastewater management and treatment to the administration and staff of the Municipality of Laem Chabang. This MoU is under the “Clean Water for Planet” project which aims to provide knowledge on wastewater management to the society.

### **Collaboration between WHA Group and Pluak Daeng Sub-district**

The company also signed an MoU with Pluak Daeng Sub-District Administrative Organization (“Pluak Daeng”) in Rayong Province, for collaboration in the field of wastewater treatment. As part of WHA Group’s “Clean Water for Planet” CSR initiative, this MoU agreement covers the construction of an eco-friendly wastewater treatment system, including a Constructed Wetland in Pluak Daeng. It also involves management of the treatment system and staff training.

In 2019, WHA Corporation PCL (WHA Group) announced the completion and delivery of a wastewater management and treatment facility for the Pluak Daeng Sub-district Administrative Organization in Rayong Province. The new facility, located close to Eastern Seaboard Industrial Estate (Rayong) (ESIE) in Pluak Daeng, has a capacity of 400 cubic meters per day, consisting of a Constructed Wetland that involves a natural technology using plants and microorganisms. The new wastewater management and treatment system was first inspired by the efforts and projects of H.M. King Bhumibol Adulyadej the Great to treat wastewater biologically.

For this project, WHA provided the engineering and financing for the Constructed Wetland. With the facility now in place, the Group will shoulder the expenses for the operation system and the engineering team to run it for one year. It will follow up on the system’s progress, share accumulated knowledge and experience, and help train additional Pluak Daeng Administrative Office staff in order to motivate others to follow suit.

Since the beginning of the current COVID-19 pandemic in 2020, WHA Group has been supporting hospitals to make sure the medical front liners are well protected. WHA has been reaching out to different neighboring communities to make sure that the people stay safe. The company is committed to contribute meaningfully to help those in need during the challenging times.

### **WHA Group, WHA Chairman and Dr. Somyos Anantaprayoon Foundation Donate 10M to Fight COVID-19**

In April 2020, WHA Group made a 10 million baht donation to Siriraj Hospital and Ramathibodi Hospital to help those impacted the most by the COVID-19 crisis. Among the most affected are medical staff who work tirelessly around the clock to save lives.

Two donations were made to Siriraj Hospital’s Faculty of Medicine. Four million baht from Ms. Jareeporn Jarukornsakul, and one million baht from the Dr. Somyos Anantaprayoon Foundation went to the Siriraj Soo Pai Covid Fund for much-needed medical supplies to treat COVID-19 patients.



In addition, two donations were handed over to Ramathibodi Hospital's Faculty of Medicine, and Ramathibodi Foundation. Four million baht from WHA Group, and one million baht from the Dr Somyos Anantaprayoon Foundation, were used to purchase ventilators and ECMO machines to support patients with severe respiratory conditions.

## WHA Group Sponsors "CU-RoboCovid" to Help Doctors and Nurses Treat Patients with COVID-19

WHA Group sponsored two "CU-RoboCovid", created by the Faculty of Engineering, Chulalongkorn University. The "Pinto" robots, to be used at hospitals nationwide, assist doctors and nurses in their task to detect and treat COVID-19 cases, while reducing the risk of infection.

## WHA E-Job Market

In 2020, WHA launched "WHA E-Job Market" an online platform that matches its customers' recruitment needs with the qualifications of job seekers. As the COVID-19 situation impacted a number of industries and affected many of their employees, the platform creates a win-win situation for all, by matching customers' HR needs with job seekers' expectations.

The E-Job Market program is easily accessible through the company's website. It enables job seekers, especially those from the neighboring communities, to match their qualifications and skills with the needs of companies in WHA logistics facilities and industrial estates.

WHA Group has also continued its CSR activities in education, society and environment.

**Education:** The company conducted several projects including donations to improve local schools, youth scholarships, Adopt-A-School program, skill training activities via Art Camp at Hometown, Art Camp for Teachers, Drawing Contest, Art Camp Trip, English Boot Camp, Industrial Skill Training for Secondary School Students (for extended schools), Dual Vocational Training and WHA Industrial Skill Cooperation Academy. These projects aim to develop human resources and enhance labor skills to meet the growing demand of Thailand's industries.

**Social Care:** WHA Group supports Mobile Medical Units that provide free medical check-ups, vaccinations, eye glasses and support to senior residents in neighboring communities to encourage them to take care of their health and live a better life. It also helps the youth by promoting sports through football competitions in its industrial estates and sponsorships of local soccer teams such as the Chonburi Football Club, the Rayong Football Club and Pluak Daeng-Rayong United and Bankhai United.

In light of COVID-19, the company handed over 1,000 Personal Protective Equipment (PPE) suits to Ramathibodi Hospital for distribution to hospitals nationwide. In addition, over 5,000 KN-95 masks were also given to various provincial health administrations and hospitals in Rayong, Chonburi, Chanthaburi, and across the country to ensure that medical staff members are properly protected from the virus. A substantial amount of money also went to help and feed front liners who bravely and selflessly performed their duties.

Food donations, consisting of nutritious food packs and freshly-cooked meals were also arranged through a giving back program called "We Care for Nong Kae" for the province of Saraburi to relieve the impact of COVID-19 on vulnerable residents of the nearby communities.

## WHA's PAN GAN

In 2020, WHA Group launched WHA PAN GAN, an online marketplace to promote and sell homemade products and homegrown specialties made by residents of 9 of WHA industrial estates in Chonburi and Rayong.

The website, [pangan.wha-industrialestate.com/en/home](http://pangan.wha-industrialestate.com/en/home) aims to link sellers with shoppers, by offering a showcase of products in different categories ranging from handmade crafts and traditional medicines to local food items and homemade delicacies. Initiated by WHA Group, the project aims to support the EEC's New Cities and Communities Development Plan.

**Environment:** The company is committed to manage their operations in an eco-friendly environment integrating factories, warehouses and facilities with nature and the local communities, in accordance with global standards.

The company aims to incorporate CSR into any business, including the development of distribution centers, warehouses, and industrial estates, and services for public utility systems and real estate, such as implementing the policy of changing equipment in office buildings and warehouses to preserve the environment and reduce expenses in the long-term to create optimal benefits for the community and customers of the Group of Companies. Moreover, the Group of Companies also uses Public Participation 1 (PP1) and Public Participation 2 (PP2) policies, in which the Company meets with leaders of the communities nearby its industrial estates, to let the Company learn about the real needs of each community on the specific areas of help and support that each community requires. Since the communities' needs in each time duration varies, the Group of Companies meets regularly with the communities, whereby these said policies will respond to and help the communities continuously and specifically by addressing the real needs of the communities.

After starting the development of each project, the Group of Companies will ask the stakeholders' opinions regarding the project, namely the communities and related state agencies, at least once a year. Furthermore, the Group of Companies sets up a procedure to listen to complaints from the communities or stakeholders through detailed series of steps and channels to gather various feedback or complaints precisely.

Regarding its business operations or development of industrial estates, the Group of Companies has been focusing to incorporate CSR into the said processes, whereby the Group of Companies has used the ISO 14001:2015, ISO 9001:2015, and CSR DIW systems, which are under control of Department of Industrial Works, in all business operational processes in order to let stakeholders receive products and services that are of the highest quality and are environmentally-friendly.

In 2020, WHA Industrial Estates received six Eco Industrial Town Awards at the recent ECO Innovation Forum 2020 co-hosted by Industrial Estate Authority of Thailand, Department of Industrial Works, Federation of Thai Industries and Water and Environment Institute for Sustainability. WHA Eastern Seaboard Industrial Estate 1

(WHA ESIE 1), WHA Chonburi Industrial Estate 1 (WHA CIE 1), WHA Chonburi Industrial Estate 2 (WHA CIE 2), and Eastern Seaboard Industrial Estate (Rayong) were awarded the distinction in the Eco-Champion category while WHA Eastern Industrial Estate (Map Ta Phut) won the award in the Eco Excellence level. In addition, Eastern Seaboard Industrial Estate (Rayong) also received the special Eco Industrial Town 4.0 Award in the Smart Water category for the first time accepted the awards that recognize the company's longstanding commitment to sustainable environmental principles and water management practices for green industrial estates.

In addition, WHA Industrial Development PLC (WHA ID) bagged the 2020 AMCHAM CSR Excellence (ACE) Recognition Award, "Platinum Level", during the annual award ceremony organized by the American Chamber of Commerce in Thailand (AMCHAM).

WHA ID received this distinguished AMCHAM CSR Excellence Award for its over 20 year-commitment in initiating CSR projects to improve the lives of people in the community in the areas of environment, education and healthcare. As this is WHA Group's eleventh consecutive year to receive this award, the company was given a "Platinum" recognition status for its long-term efforts to support Thailand's sustainable development.

Throughout the course of its business operations, the Group of Companies has always been fully aware of the importance in the development of society and environment alongside with business development. The Group of Companies has specified policies that will initiate various projects that will be beneficial to the society continuously. Hence, the Group of Companies has defined 8 policies about "Corporate Social Responsibilities" as follows;

## **(1) Fair Business Operation**

Transparency in business undertaking is always the Group of Companies' priority, emphasizing prevention of transaction that could lead to conflict of interest. The company also imposes policies on employees to treat business partners, creditors, shareholders and customers fairly and without taking advantage in accordance with the Group of Companies' corporate governance policy.

## **(2) Anti-corruption Policy**

The Company has established the policy on anti-corruption which covers all impossible risks from corruption. In 2019, the Company reviewed and revised the Anti-Corruption Policy and Practice (Amended No. 2), which was considered by the Corporate Governance Committee and was further proposed to the Board of Directors' Meeting for approval and enforcement on 8 February 2020. This is to allow the Board of Directors, Management and all employees to be aware on an importance of anti-corruption and to adhere the same in performing their responsibility. The said policy has also been implemented to the Company's subsidiary, associated company. Also, its business partner and supplier are requested for cooperation to comply to this anti-corruption policy. In this regard, the Company had expressed its intention to be the member of Thai Private Sector Collective Action Against Corruption (Thai CAC) which hosted by the Thai Institute of Director together with the Thai Chamber of Commerce, the International Chamber of Commerce, the Thai Listed Companies Association, and the Thai Bankers' Association, where the Company was certified by the Thai CAC on 18 August 2020 and was recertified in 2020.

## **(3) Human Right**

The Group of Companies has in place human right policies and policies to counter violation of human rights in all circumstances. These policies are included in legal compliance and human right policies and guidelines section of the Group of Companies corporate governance principles.

## **(4) Fair Labor Treatment**

The Group of Companies gives equal opportunity to employees of all races, languages and genders. Every step in providing services is undertaken with honesty and transparency. The Group of Companies also strictly complies with the labor laws. This policy is provided in the section of employment treatment and guidelines and the employee safety and hygiene policies of the corporate governance principles.

## **(5) Consumer Responsibility**

The Group of Companies establishes the policy that focuses on doing business and treating customers

(also considered consumers) with honesty, adhering to the terms under contracts made with the customers and in compliance with the standards set by law. It has a policy to provide accurate and complete information on use of warehouse building to customers as well as emphasizing keeping of customer data and information. The Group of Companies implements the policy on customer treatment and includes it in the customer policies and treatment section of its corporate governance principles.

## **(6) Environment**

The Group of Companies establishes the policy that supports activities that will promote quality of life, occupational hygiene and environment as well as maintaining work environment in such a way to ensure safety of employee health and property. Such policy is provided in the environmental policy section of the Group of Companies' corporate governance principles.

## **(7) Community and Social Development**

The Group of Companies has the policy to support social activities on various occasions aiming at maximizing social and community benefit so as to help and promote sustainable quality of life of the youth and Thai society.

## **(8) Innovation and Innovation Dissemination**

The Group of Companies has the policy that always focuses on design innovation of environmental friendly warehouses, ranging from energy saving, production of solar energy to environment care. It also implements the policy to educate customers and related agencies about and exchange knowledge of the use of building.

# **2. Operations and Report Preparation**

## **(1) Operations**

In the operations process, the Group of Companies has planned and implemented the works, whereby the Group of Companies has created the Code of Conduct to become a tool for the committees, directors, and employees to fully aware of the business ethics that the Group of Companies has used to operate the business for thorough implementation.

## Risk Assessment

The committee places great importance about risk management by specifying the Group of Companies to assess risk factors in its business operations regularly, including analyzing the impact that may occur from the risks, creating defensive measures or risk reduction, and report to the risk management committee and the Company committee consistently.

Moreover, the Group of Companies has incorporated its risk assessment policy into business operations, especially in the Company's product development. The Group of Companies continuously studies and assesses its products and services that could have a potential impact on customers, such as the project to improve rainwater drainage system in the WHA Saraburi Industrial Land. The objective of this project is to improve the rainwater drainage and the flood protection system inside the estate to prevent and minimize the impact to clients in WHA Saraburi Industrial Land. WHA has engaged a consulting engineer to survey, analyze, and assess the risks, and propose recommendations to improve the rainwater drainage and the flood protection system. After the study result, WHA has adopted the measures suggested and set up a team to ensure constant follow-up, examination and maintenance of the systems, and to record data that could help reduce risks of flooding and other disasters at the industrial land efficiently.

## Procedures Definition

The Group of Companies also emphasizes on operation and procedure, defining the procedure guidelines, controlling the inspection, operating according to international standards, and preserving the environment for stakeholders, such as:

The Group of Companies focuses on innovation in designing warehouses that are environmentally-friendly to increase product efficiency and reduce energy consumption, such as designing warehouses that can utilize more natural lighting to reduce electricity usage inside the buildings and designing warehouses by considering the air circulation from outdoor to indoor, which will help lower the temperature inside the building. In addition, the Group of Companies also manages the sewerage system inside the warehouses before releasing into wastewater pipe that will always work with maximum

efficiency.

In the development of industrial estates, the company set up the Environmental Monitoring and Control Center (E:mc^2) at Eastern Seaboard Industrial Estate (Rayong) (WHA ESIE), WHA Eastern Seaboard Industrial Estates and WHA Chonburi Industrial Estates through a collaboration with the Industrial Estate Authority of Thailand. The center offers real-time processing of environmental reports, with highly reliable and accountable methodology and transparency policy. They are also equipped with an automated water quality monitoring system and serve as center to gather complaints through its website, whereby various communities can inspect all the time.

The Group of Companies initiated and has sold the solar PV rooftop energy to Metropolitan Electricity Authority and Provincial Electricity Authority since 2014. This project not only supports the energy conservation under the green energy concept but also provides utmost benefit to the customers as the solar cell will function as the heat insulator for roof of warehouses. Accordingly, the customers are able to preserve the goods quality and save the energy.

In addition, the Group of Companies also plans to prevent pollution in the long-term, since it foresees the importance in preventing pollution that may occur from the Company's business operations. The Group of Companies has specified long-term preventive measures against pollution, in which the preventive measures were generated from the Environment Impact Assessment (EIA) in various areas since prior to the start of operations, in order to expand perspectives and connect all impacts that occurred from business operations. These are then used to develop measures to prevent and reduce impact to the environment, and measures to monitor quality of the environment, whereby these various measures will cover all activities and effects that may happen from the project. However, consent from stakeholders and the Office of Natural Resources and Environmental Policy and Planning shall be received first, in order to start the operations. Moreover, WHA has applied the ISO 14001 Environmental Management System to manage its industrial estates, including a process for analyzing environmental issues. This system also helps outline objectives and appropriate procedures to significantly prevent environmental issues. Furthermore, the system

also includes monitoring of various processes and using the results to evaluate in environmental management.

The Group of Companies used measures in accordance to EIA as tools to control pollution that are created in the project, by which both the project and plants must conform to the EIA of each project. Examples of preventive measures against pollution include wastewater quality standards, criteria to release pollutants from plant chimneys, and measures for industrial waste management. In the case of emergency that can create pollution, the project has emergency plan and personnel to react to particular emergency situations, as well as restoration measures to bring the environment back to its normal conditions at the earliest.

### Communication with Personnel and Employees

The Group of Companies supports the work performance development of employees continuously and provides confidence in the quality of working life for employees, in order to build relationship with the organization. Apart from this, the Group of Companies also places importance to every employees regardless of which unit or department they are working in by creating good and safe working environment, paying remuneration that are suitable with the work, allow generous benefits, and source innovation and new technologies to support working alongside with environment preservation, such as;

- The Group of Companies has replaced the conventional HID bulbs with T5 and/or LED lights. They save 2-3 time energy despite higher cost and they last longer.
- The Group of Companies has implemented the royal project of the constructed wetland wastewater treatment system to use in its operations, then train the employees who are responsible for the environmental conservation of the Group of Companies and apply and transfer knowledge to people in the communities to create further value inside their communities.
- The Group of Companies encourages employees to save energy and resources, for instance, turning off lights, air conditioners and electrical equipment during lunch time, reuse of the other side of paper, replacing 80-gram office paper with 70-gram office paper, printing only necessary documents, etc.

- The Group of Companies also encourages its employees to take part in community projects by participating in CSR activities, such as annual school contributions around the company's industrial estates, involving 69 schools and more than 18,700 students. Furthermore, the Group of Companies also helped communities during drought situations, in which the Group of Companies' Safety department is the key unit in providing water to various communities that face the drought crisis, or aiding communities during emergency periods. Moreover, the Group of Companies supports every employee to participate in tree-planting activities to preserve the environment inside the industrial estates and surrounding communities.

In addition, the Group of Companies has specified guidelines in communicating with employees in both formats of employee handbook and Code of Conduct while encouraged employees to anti-corruption, respect other people's rights, value intellectual properties and human rights.

### Monitoring

The Group of Companies promotes corporate transparency in every aspects of company operation, including all the CSR activities. All the projects have been closely investigated by the Group of Companies' executives and the Company's directors, from the budget proposal, the operation, to the end of the project, showcased the transparency of the company without any fraud.

## (2) Report Preparation Process

The Group of Companies is committed to publishing Corporate Social Responsibility report on its CSR activities that the Company is currently operating, considering all stakeholders, both internal and external, including shareholders, employees, customers, creditors, suppliers and competitors, environment and society, and government agencies.

Regarding the procedure or process of developing the industrial estates, the Group of Companies is required to issue regular reports according to the Environmental Impact Assessment (EIA) rules and submit these reports every 6 months to the Office of Natural Resources and Environmental Policy Planning, Ministry of Natural Resources and Environment.





### 3. Business Effect on CSR

In 2020, the Group of Companies emphasizes undertaking of business that supports and does not adversely affect society and environment. It has never been subject to investigation or challenged by any related government authorities into environmental matters or any acts that could affect the environment. However, the Group of Companies has defined measures to deal with environmental complaints, as follows:

- 1) In case of compliant request, the company will assemble related information and conduct a primary investigation
- 2) Once the investigation is completed, if the case is groundless, a detailed explanation will be provided through appropriate communication channels.
- 3) If the case is accurate and factual, but not related to the company, the complainant will be notified and a further investigation into the real cause will be launched
- 4) If the case is not related to the company, a meeting of the stakeholders shall be called in order to determine the causes and effects, and look for preventive measures and solutions. Results will be communicated to the complainant through appropriate communication channels.

### 4. CSR After-Process activities

a. The Group of Companies believes that children are key social foundation. Good education in parallel with cultivation of ethics and morality will help communities and society exist in a sustainable way. For this reason, the Group of Companies decided to initiate the campaign, “WHA Campaign to Motivate Children and Youth Morality” aimed to support education to the community and underprivileged youth. To do so, the Company has allocate a part of its income as a budget to give scholarship to schools in the community, build libraries and donate teaching and learning equipment to needy schools, etc. The Group of Companies is determined to pursue the said campaign.

Among the notable CSR activities is “Adopt a School”, a collaboration between The Group of Companies and The American Chamber of Commerce in Thailand (AMCHAM), initiated in 2005. The “Teacher Fellowship Program” is one of the projects created to prevent a shortage of teachers in Rayong and Chonburi areas. Since 2020, the Group of Companies continues to solely support the program.

Moreover, the Group of Companies, in cooperation with private companies in WHA industrial estates and other partners, has been holding its annual outreach project to support education for the youth for 23 consecutive years.



In 2020, the Group of Companies organized CSR activities as follows:

Under WHA’s Mobile Medical Unit initiative, the Group of Companies distributed care packs and donated 90 sets of medical supplies and 1 wheelchair to senior residents in the Tasith sub-district, Rayong Province. Basic supplies were also given to the community residents to encourage them to take care of their health and live a better life.





WHA Group headed to Chumchon Chaophraya Municipality in Rayong to deliver 400 doses of the influenza vaccine to help protect the community members from the virus.



Since 2009, the Group of Companies has organized an annual CSR project for students through Art Camp. The objective is to develop the students' interest in arts, so they can use their creativity and imagination in a positive way. Since the first workshop, the Art Camp has continuously provided basic principles and knowledge to help enhance students' skills in arts. To date, 7,168 students have participated in the WHA Art Camp. The Group of Companies also initiated the "Art Camp for Teachers" program, with the aim to equip primary teachers with basic knowledge of art, so they can apply what they learned in their teaching. To date, the program has benefited 293 teachers who are able to impart knowledge of art to students.

b. The company is always aware that the preservation of religion and inheritance of moral traditions have importance that is no less than activities in other areas. In order to build sustainable development for the organization, society, and surrounding communities, the Group of Companies thus created a policy to promote various activities that are supportive of Buddhism religion and cultural arts, such as merit-making during important religious days, ceremony of presenting robes to Buddhist

monks at the end of Buddhist Lent, as well as supporting in terms of budget for restoration of religious places.

c. The Group of Companies has placed importance with every group of stakeholders and consider it as a policy to aid others when emergency situations occur to various organizations, being the public or private sectors, as well as providing support in terms of manpower and finance to operate various charitable activities as appropriate.





## ANTI-CORRUPTION

WHA Corporation Public Company Limited and subsidiaries (“WHA Group”) adhere to its business operations in accordance with the guidance on compliance with the law and regulations related to the business operations both domestically and overseas. It has a policy of promoting good corporate governance continuously by focusing on doing business in accordance with the principles of integrity, ethics and responsibility to the Environment, Social and Governance (ESG). The administration is transparent considering the stakeholders with the potential in the competition and can create the compensation in the long run, which shall lead to sustainable organization.

Meanwhile, the Company ratified the declaration of the intentional alliance of the Thai Private Sector Collective Action Against Corruption (Thai CAC) and certified the Thai CAC in 2017. The CAC certificate has the life of three years, and to be expired in August 2020. The Company has filed a document to renew the CAC certificate with the Thai CAC on 15 March 2020. The result appears that the Company has recertification CAC from Thai CAC with its renewal for another three years from 30 June 2020 to 29 June 2023.

Moreover, the Corporate Governance Committee has realized the importance of the Code of Conduct, the

Corporate Governance Policy and Anti-Corruption of the Company as usual. Moreover, it shall review such the policy annually. In 2020 the Corporate Governance Committee approved to present the updated Code of Conduct with the Board of Directors, in the Board of Directors Meeting No. 7/2020 on 11 August 2020. It resolved to approve the Code of Conduct, the updated version No. 3 on 11 August 2020. It aims for the directors, the executives and all of its employees in WHA Group to have knowledge and understanding on the Code of Conduct. They can have realization on the duties and responsibilities that can apply the guidelines involved with the Code of Conduct and practices. It includes whistle blowing as well as having the process on the follow-up and management to have its compliance plus its Code of Conduct and practices review regularly.

The Board of Directors has encouraged and promoted to disseminate the manual on the policy and practical guidance via the various communication channels of its WHA Group. It also provides training for knowledge, and to announce this intention to the third party and the stakeholders. The aim is to develop their capability in competitiveness and raising the level of the country development by Anti-Corruption in the public and private sectors further.

## ANTI-CORRUPTION POLICY



### NO GIFT POLICY

WHA Group ask for your cooperation from all departments for collaborate in campaigning “No Gift Policy” from stakeholders during the New Year 2021 to comply with the Business Policy with honesty and transparency, and preventing Anti-Corruption. WHA Group hoped that there will be cooperation from all departments and thank you.





# INTERNAL CONTROL AND RISK MANAGEMENT

## Internal control

The Company has realized the importance of the arrangements to have the internal audit continuously by focusing on having the internal audit sufficiently and suitably with the business operations. It is to increase the efficiency on the operations, taking care of the property, as well as to have the accounting system and a financial report with the precision and reliability. It has complied with the law, rules and regulations involved with its business operations. However, the board of directors has assigned the audit committee to audit and assess the sufficiency of the internal control annually. This includes the compliance with the principles on good governance for transparency and prevention of a conflict of interest.

### 1. Opinion of the Audit Committee on the Internal Control within the Company

With reference to the scope of power of the audit committee that is assigned by the board of directors in the audit of the Company to have the internal control and internal audit that was suitable and effective. The audit committee has assessed the sufficiency of the internal control of the Company for 2020 by using the assessment of sufficiency of the internal control in accordance with the guidance of the SEC, which covers the various components in five parts. They are the control environment, risk assessment, control activities, information & communication and the monitoring activities. Meanwhile, the audit committee deems that the Company has abided by the guidelines on the internal control that the SEC has designated. The measures are designated the internal control on the importance that involved with the operations, risk management, supervision and monitoring of the management and the board of directors sufficiently.

### 2. Opinion of of the Board of Directors on the Internal Control of the Company.

No difference from the opinion of the audit committee and the auditor, and no remark on the internal control whatsoever.

### 3. Head of the Internal Audit

Regarding the internal audit, the Company has developed an internal audit office to perform the duty for 2020 under the supervision of the audit committee. It appointed Ms. Sureeporn Settajinda to serve as the head of the internal audit of the Company. The audit committee has considered the qualifications of Ms. Sureeporn Settajinda, and deemed to be suitable for the responsibility of the duty. It was due to the independence and familiarity with the business and industries that have the same characteristics as the Company. She has equipped with skills and experience in internal audit, good governance, risk assessment, and internal control.

Moreover, the consideration and approval, appointment, removal and transfer of the tenure of the head of the internal audit of the Company may be approved (or agreed) by the audit committee.

Furthermore, the Company appointed Pricewaterhouse Coopers ABAS Co., Ltd. as the auditor of the Company and its subsidiaries. Moreover, the Company and its subsidiaries for 2020 in the audit of the accounting of the Company and its subsidiaries, evaluated the internal control on the accounting according to the generally accepted accounting principles. The auditor reported to the audit committee that no comment from the accounting audit for 2020.

## Risk management

The Company assigned the Risk Management Committee to be in charge of setting up risk management working team comprising the Company executives to jointly discuss and regularly evaluate the risk in the organization both internal and external risk factors including strategic risks, business operation risks, financial risks, compliance risks and emerging risks. The working team also analyses related risk factors; assess in terms of impact and likelihood; and set risk mitigation plan and related risk owners. The risk working team will monitor the risks as identified with support from various divisions and report the result to Risk Management Committee for acknowledgement. Risk Management Committee will, subsequently, evaluate the effectiveness of risk management and report it to the Board of Directors at least four times a year to closely monitor and ensure that the Company maintain the risk level to be within

risk appetite (acceptable risk level) and achieve the defined objectives and goals of the Company

The Company focused on emerging risks, such as digital transformation and climate change, which were considered risks of significance and were likely to materialize in the future. In preparation, the risk management working group has formulated mitigation plans for those risks.

Moreover, the Company emphasized on the important of readiness for the dynamic circumstance influenced by changes in economic, political, legal, natural disasters and regulations of environmental and safety. The Company's Business Continuity Plan (BCP) and Crisis response have been developed for preparing against potential risks and critical situations which ensuring continuity of major business process without interruption during emergencies, and mitigation damage and adverse effects suffered.







# REPORT OF THE AUDIT COMMITTEE

## TO THE SHAREHOLDERS

WHA CORPORATION PUBLIC COMPANY LIMITED

Audit Committee Consists of 4 independent qualified members, namely, Mrs. Anchalee Chavanich, Chairman of the Audit Committee, Mr. Apichai Bunthirawara, Mrs. Krisana Sukbunsathit and Mr. Somsak Pratomsrimek is the Audit Committee. All members of the Committee have sufficient knowledge and experience in reviewing the reliability of financial reports.

In the year 2020, there were 5 meetings of the Committee, with attendance detailed below:

- Mrs. Anchalee Chavanich (appointed as Chairman of the Audit Committee since 22 June 2020) 3 times
- Mr. Pichit Akarathit (resigned from the position of Chairman of the Audit Committee since 2 June 2020) 2 times
- Mr. Apichai Bunthirawara 5 times
- Mrs. Krisana Sukbunsathit 5 times
- Mr. Somsak Pratomsrimek 5 times

The Audit Committee discussed with the management, the internal auditors, and the auditor, as well as requesting information from the management in line with responsibilities and gave independent opinion and suggestions. The Committee regularly reported its performance to the Board every quarter, totaling 4 times. Resolution of those meetings as concluded on the following matters:

### Accuracy, completeness and reliability of the financial reports

The Audit Committee has reviewed quarterly and annual financial reports, significant accounting policies, sufficiency of information disclosure, including jointly considered the audit plan, methods and identified issues with the management and the auditor. The Committee also meeting with the auditor twice without participation of the management to discuss about the independence of performing the audit task. The Committee viewed that the company's financial reports were prepared in compliance with the Thai Financial Reporting Standards (TFRS) set by the Federation of Accounting Professions,

accuracy, relevance with decision making, and faithful representation, as well as the accounting policies that were properly selected to reflect the Company's operating performance and financial position.

### The adequacy of internal controls, risk management and good corporate governance

The Audit Committee has reviewed the reports of the internal auditor and the auditor regarding the assessment of internal control systems, risk management, and good corporate governance, giving opinions for improvement of operations, as well as reviewing internal processes regarding receiving clues and complaints. The Committee also revised the Audit Committee Charter to strengthen efficiency in good corporate governance.

The Committee has given importance to the complaint handling process that is an important mechanism in the process of anti-corruption and corruption. In addition, the Committee acknowledges the detailed Anti-corruption policies and practices, refrain from giving, charity donation, as well as providing knowledge on the related matters throughout the organization.

The Committee is of the opinion that the company's internal control system's sufficiency and appropriateness in accordance with the COSO Framework and the CG Code.

The Committee has reviewed the annual internal audit work plan prepared by using the Risk-Based Audit Plan, which focuses on the identified risks that might highly affect the business. The audit plan has to emphasizing and aligning with the digital transformation strategy initiated by the group. The Committee has regular meetings with the management of the Internal Audit Office without management. The Committee had the opinion that the Internal Audit Office has performed the work of the internal audit independently and is suitable for the nature of the business.

## Compliance with the Securities and Exchange laws, regulations of the Stock Exchange of Thailand, and laws related to the Company's business

The Audit Committee has reviewed the compliance with the Securities and Exchange Act, regulations of the Stock Exchange of Thailand, and laws related to the real estate and the industrial estates businesses, which are considered the core businesses of the company, as well as assessing the Management's compliance with the relevant legal requirements. The Committee viewed that the company has complied with the securities and exchange Act, Regulations of the Stock Exchange of Thailand, and laws related to the company's business properly.

## Transactions which may cause conflict of interests

The Audit Committee paid significant attention on considering the transactions that might cause conflict of interest in order to comply with the regulations of the Stock Exchange of Thailand, as well as the relevant accounting standard in every quarter. The Committee assigned the internal auditors to review the compliance and reported to the Committee, including evaluated the connected transactions as disclosed in the auditor's notes in the financial statements in every quarter. The Committee had the opinion that the connected transactions considered were the transactions in normal business having commercially ordinary conditions that were reasonable, fair and of optimized benefit to the company.

## Appropriateness, selection, and appointment of the auditor

The Audit Committee evaluated the independence and performance of the auditor for the year 2020 and it concluded that the performance in overall was at the satisfied level with sufficient independence.

In considering the selection and appointment of the auditor for the year 2021, the company has compared the audit fee last year, on selection and appointment of the audit for 2021, the Committee considered the

performance, scope of service, and volume of transactions compared with the audit fee in 2021 proposed by the auditor, and agreed to propose to the Board of Directors' meeting and the annual general shareholders' meeting to appoint Mr. Chanchai Chaiprasit, Certified Public Accountant No. 3760, or Mr. Paiboon Tunkoon, Certified Public Accountant No. 4298, or Mr. Boonrueng Lerdwiseswit, Certified Public Accountant No. 6552, on behalf of PricewaterhouseCoopers ABAS Ltd. to be the auditor of the Company and its subsidiaries for 2021. The audit fee totaling THB 13,521,000.

## Overall opinion and remark of The Audit Committee

The Audit Committee evaluated self-performance by evaluating the committee as a whole in 2020 in 2 parts;

- 1) the overall performance of the Committee, and
- 2) the specific performance of the Committee in the 7 areas, i.e. 1) reviewing for the completeness and sufficiency of the Company's financial reports; 2) reviewing for the company's compliance with the relevant laws and regulations; 3) reviewing for efficiency and effectiveness of the Company's internal controls and internal audit; 4) considering the connected transactions; 5) selecting and nominating the internal auditor; 6) selecting and nominating the external auditor; and 7) Monitoring the appropriate complaints handling process.

The Audit Committee has the overall opinion that the Committee has performed the duties and responsibilities specified in the Charter approved by the Board adequately and sufficiently. With due competence, care, prudence, and sufficient independence to benefit stakeholders equally.

On behalf of Audit Committee

Mrs. Anchalee Chavanich  
Chairman of the Audit Committee

## CONNECTED TRANSACTION

### 1. Connected transactions of the Company and its subsidiaries with persons who may have conflict of interests in 2020

Person/Entity who may have conflict of interests	Relationship	Characteristic of Connected Transaction	Transaction Amount (THB Thousand)		Necessity and Appropriateness of Transaction	Audit Committee's opinion
			For the fiscal year ended of 31 Dec 2020			
• S&J Holding Co., Ltd.	• Having common major shareholder with the Company, where: • Ms. Jareeporn Jarukomsakul holds 42.50% of shares in S&J Holding Co., Ltd • Having common director with the Company, namely Ms. Jareeporn Jarukomsakul	• Office-service-fee charged to the Company and its subsidiaries.	11,903.86		• The Company acquired the service for use of building space owned by S&J Holding Co., Ltd. as an office under the 3-year service agreement commencing from 1 January 2018 to 31 December 2020 at the rate of THB 845,868.65 per month (excluding VAT). This amount was charged for the service area of 2,796.26 square meters at the service charged rate of THB 302.50 per square meter. Such rate was comparable to the rental rate for the area nearby.	• It was deemed appropriate to enter into the transaction in order to support the Company businesses. The service fee in 2020 was comparable to the market rate.
		• Accrued expense	957.1			
					• WHA Real Estate Management Co., Ltd. acquired the service for use of building space from S&J Holding Co., Ltd. as office under the service agreement for 3 years from 1 January 2018 to 31 December 2020 at a rate of THB 34,799.60 per month (excluding VAT). This amount was charged for the service area of 115.04 square meters at the service charged rate of THB 302.50 per square meter. This rate is comparable to the rate charged to area nearby.	

Person/Entity who may have conflict of interests	Relationship	Characteristic of Connected Transaction	Transaction Amount (THB Thousand)		Necessity and Appropriateness of Transaction	Audit Committee's opinion
			For the fiscal year ended of 31 Dec 2020			
					<ul style="list-style-type: none"><li>WHA Infonite Co., Ltd. acquired the service for use of building space from S&amp;J Holding Co., Ltd. as office under the service agreement from 1 January 2018 to 31 December 2020 at a rate of THB 111,320 per month (excluding VAT). This amount was charged for the service area of 368 square meters at the service charged rate of THB 302.50 per square meter. This rate is comparable to the rate charged to area nearby.</li></ul>	
<ul style="list-style-type: none"><li>RL Counsel Co., Ltd.</li></ul>	<ul style="list-style-type: none"><li>Mr. Narong Kritchanchai is the director and executive of the Company (has been appointed as an executive since 24 February 2016)</li><li>Mr. Narong Kritchanchai holds 33.3% of the shares in RL Counsel Co., Ltd. (as of 31 December 2020), and is the director of RL Counsel Co., Ltd.</li></ul>	<ul style="list-style-type: none"><li>Legal counselor fee for the Company and its subsidiaries</li><li>Accrued expenses</li></ul>	7,045.93	1,576.42	<ul style="list-style-type: none"><li>Due to substantial amount of complicated legal transactions of the Company and its subsidiaries which require specialized lawyers; however, with just a few legal officers in the Company along with the limited experience and expertise, the Company and its subsidiaries have engaged the external legal consultant for mutually providing legal advice with the legal officers of the Company and its subsidiaries on various matters, as well as to review documents and agreements relating to their business operation. The legal counselor fee charged was in the range of not exceed THB 5,000 per hour (in 2020) which was not higher than the market rate.</li><li>It was deemed appropriate to enter into the transaction in order to support the Company and its subsidiaries' business and the transaction complied with the normal business practice.</li><li>The fee and its commercial terms and conditions were reasonable.</li><li>The fee was comparable to and did not exceed the market rate.</li></ul>	

## 2. Necessity and Rationality of the Connected Transactions

The Audit Committee's meeting No. 1/2021 held on 5 February 2021 has considered the connected transactions for the fiscal year ended 31 December 2020, together with the information interviewed from the management of the Company and its subsidiaries, persons and entities who may have conflict of interests for the fiscal year ended 31 December 2020 as well as the review of the auditor's notes to financial statements. It has viewed that the connected transactions of the Company and its subsidiaries with persons or entities who may have conflict of interests for the fiscal year ended on 31 December 2020 were reasonable and was for the ultimate benefit of the Company. In addition, such connected transactions were in accordance with the normal business terms and practices and were conducted as normal business operation of the Company where there was no transfer of benefit between the Company and persons or entities who may have conflict of interests. They were also conducted in same manner as the normal person would have done with its counterparty in the same circumstance at an arm's length basis without influence from a party who might be a person having conflict of interests (Arm's Length Basis).

## 3. Policy and Procedure for Approval of the Connected Transactions

The Meeting of the Board of Directors No. 1/2012 held on 25 May 2012 set the policy and procedures for entering into connected transactions to ensure transparency of the transactions between persons or juristic persons who may have the conflict of interests and to protect the benefits of the Company. The policy and procedure can be summarized as follows.

The connected transactions or related transactions of the Company and its subsidiaries were to be in compliance with the principle of the SEC Act and the notifications of the Capital Market Supervisory Board No. TorJor. 21/2551 Re: Rules for Entering into Related Party Transactions and the Notification of the Securities and Exchange Commission Re: Disclosure of information and Other Acts of Listed Companies Concerning to the Connected Transactions including other relevant regulations of the SEC and the SET as well as to be in compliance with the disclosure of the connected transactions in the auditor's notes in the financial statement audited by the Company's auditor and in the annual registration statement (56-1).

For the case of the connected transactions of the Company and its subsidiaries with persons or entities who

have conflict of interests or may have a conflict of interest in the future, the Audit Committee shall opine on the necessity for entering into the transaction and the appropriateness of transaction price by taking into account the conditions to be in compliance with the normal business operation in the industry and to compare with the third party's or the market price. If the Audit Committee does not have expertise to determine the potential connected transactions, the Company will arrange for an independent advisor or the Company's auditor to opine on such connected transactions for consideration of the Board of Directors, the Audit Committee, or the shareholders, as the case may be. To such extent, the director who has a conflict of interest shall not have a right to vote on such transaction. The connected transactions shall be disclosed in the notes to the financial statements audited or reviewed by the Company's auditor.

## 4. Policy or Tendency for Connected Transaction in the Future

The Company may enter into connected transactions in the future as deemed appropriate by complying with the Securities and Exchange Commission Acts, rules, notification, order or requirements of the Securities and Exchange Commission and the Stock Exchange of Thailand, as well as accounting standards Re: disclosure of information in relation to related persons or activities as prescribed by the Federation of Accounting Professions.

In the case where the transaction normally occurs and will continually occur in the future, the Company sets the criteria and guidelines to be in accordance with the normal business by referring to the appropriate, fair, reasonable and transparent prices and conditions, and then proposes to the Audit Committee to consider and approve such criteria and guidelines.

However, to enter into connected transactions, the Company will assign the Audit Committee to opine for the appropriateness of such transactions. If the Audit Committee has no expertise on considering such connected transactions, the Company will arrange for an expertise who have specialized knowledge and proficiency on the transaction such as independent auditor or asset appraiser to opine on the connected transactions. Those comments of the Audit Committee or the experts will be considered by the Board of Directors or the shareholders, as the case may be, to ensure that such transactions will not be migrated or transferred of benefit between the Company and its shareholders, but will be for the ultimate benefit of all shareholders.





# MANAGEMENT DISCUSSION AND ANALYSIS (MD&A)

## MACROECONOMIC & COMPANY OVERVIEW

### Thailand Economic 2020 and 2021 Outlook

According to the Office of National Economic and Social Development Council (NESDB), Thai GDP in 2020 had minus 6.1% from the decrease of export value, private consumption and investment value of 6.6%, 1.0% and 4.8%, respectively which was mainly from the COVID-19 pandemic having impact to Thai and World Economy.

In 2021, Thai economy is expected to expand 2.5%-3.5% from (i) the recovery of the World Economy and the global trade volume; (ii) the government stimulus measures; (iii) the rebound of domestic demand; and (iv) the unusually low base effect in 2020.

### Thailand 2020 Investment and Foreign Direct Investment Applications

The Thailand Board of Investment (BOI) announced that in 2020, there was a total of 1,717 applications for investment promotion, representing a combined investment value of THB 481,150 mm, decreased by 30% YoY from last year applications having investment value of THB 691,390 mm. However, the 2019 filed applications was included the investment in High-Speed Rail linked 3 airports project having project value of THB 162,320 mm including the coronavirus outbreak affecting to the number of applications from foreign significantly. Regarding to Foreign Direct Investment (FDI), there were 907 project applications filed in 2020 worth a total investment value of THB 213,162 mm, decreased by 54% YoY. The FDI were led by Japanese companies, which topped the ranking both in terms of the number and value of applications, followed by an investment from China and the US in the third place.

Applications for projects in the target industries, sectors with strategic importance for the country's economic development, amounted to THB 230,740 mm, accounting for 48% of the total value of BOI applications.

The top five sectors by value were: 1) Electrical Appliances and Electronics, 2) Agriculture and Food Processing, 3) Automotive and Parts, 4) Petrochemicals and Chemicals and 5) Biotechnology. Furthermore, the medical sector has posted a noticeable increase of the value of applications that grew 165% from 2019 to THB 22,290 mm in 2020.

### Company Overview

Despite the COVID-19 pandemic and the uncertainties in 2020, the Company showed excellent performance. The Logistics business experienced strong growth, driven by E-Commerce and demand for premium distribution center and warehouse facilities in Thailand, approximately 130,600 occupied sqm were added in 2020 with an additional 112,000 sqm of lucrative short-term contracts. While COVID-19 pandemic had an adverse impact and caused a slowdown on industrial land sales in Thailand due to temporary travel restrictions, industrial land customer enquiries have been resilient, with Thailand's economic fundamentals and investment attractiveness remaining solid. In Vietnam, large FDI inflows led to significant industrial land sales at the Company's industrial zone in Nghe An province, where the Company is pushing the construction of remaining 2,100 rai of Phase 1B and expediting the approval process of Phase 2 and Phase 3, covering additional 4,700 rai of land area. During the last quarter, the Company signed a collaboration agreement with the local government of



Thanh Hoa province to develop two industrial zones - (1) WHA Smart Technology Industrial Zone – Thanh Hoa, and (2) WHA Northern Industrial Zone – Thanh Hoa, with a combined land area of 7,500 rai. This marked another successful milestone for WHA Group’s overseas business.

For Utilities business, the COVID-19 pandemic and the drought situation during the first half of 2020 caused a decrease of water demand. However, during the second half of the year after the situation recovery, water demand increased from the automotive customers and the new projects of petrochemical operators. In additions, the Company already extended its utilities portfolio to cover high-value products and innovative water offerings that include Thailand’s biggest Reclamation Water and Demineralized Water plant. Even though water sale volume in Vietnam has gradually improved during the last quarter that showed highest demand, delay project construction has led to additional shared losses apart from recorded amortization expense that reflects the acquisition of SDWTP project. Total 2020 volume of utilities sales and under management is 113.5 million cubic meters, increasing 3.7% from previous year. Domestic sales contributed 95.5 million cubic meters while Vietnam achieved 18.0 million cubic meters.

For Power business, the Company recorded lower share of profit in 2020, due to a decrease in share of profit from investment in GHECO-One coal-fired power plant. Despite of lower revenue, GHECO-One still

generated strong cashflow as debt services declined correspondingly with Availability Payment. On the contrary, the Company recorded higher revenue from power business in 2020 since the Company secured a great number of new solar projects both rooftop, carpark, farm and floating. The Company signed additional 9 Solar PPA contracts of 19 MW and commercialized additional 30.5 MW. The Company ended its 2020 with power capacity at 590 equity MW

Digital Platform, the Company committed to develop and offer new services and innovative digital products to respond to increasing and more sophisticated customer demand. In 2020, the Company implemented and already provided FTTx services within WHA Group’s 10 industrial estates. It also collaborated with major telecommunication players to conduct 5G network planning and 5G solutions in WHA industrial estates.

In 2020, the Company had successfully 2 asset monetization in WHART and HREIT. WHART raised capital for the fifth time to invest in 3 mega logistics centers with a total area of 128,789 sqm. Similarly, HREIT increased its capital for the second time to invest in 48,127 sqm of factory and warehouse rental spaces. Furthermore, the company moves to WHA Tower, its new headquarters located on Debaratna Road (Bangna Trad) KM 7. The 25-storey Grade A office building offers gross area of 52,000 sqm and leasable area of 25,000 sqm. Office spaces are now available for rent.



## FINANCIAL ANALYSIS

During 2020, the Company had the total revenue and share of profit and net profit of THB 9,406.6 mm and THB 2,523.7 mm, respectively. If excluding FX impact and extra items, the Company had the normalized total revenue and share of profit and normalized net profit of THB 9,376.0 mm and THB 2,542.6 mm, respectively. The details are as follows:

### FINANCIAL PERFORMANCE

Consolidated Financial Statements	2019	2020	Change YoY
	THB mm	THB mm	%
Total Revenue and Share of Profit	13,385.8	9,406.6	(29.7%)
Total Cost	6,400.8	3,841.3	(40.0%)
Gross Profit	6,007.9	4,281.8	(28.7%)
Net Profit	3,229.3	2,523.7	(21.8%)
Normalized Total Revenue <sup>/1</sup>	10,898.8	9,376.0	(14.0%)
Normalized Net Profit <sup>/3</sup>	2,765.7	2,542.6	(8.1%)

<sup>/1</sup> Normalized Total Revenue = Total Revenue excluding FX impact, Extra item and Deferred Revenue Item

<sup>/2</sup> Normalized Net Profit = Net Profit excluding FX impact, Extra item, TFRS9&16 impact and Deferred Revenue Item

Deferred Revenue Item = Deferred revenue from assets monetization to WHABT in 2015 which recognized in the first quarter of 2019 as a result of accounting standard adjustment (TFRS 15)

## KEY HIGHLIGHTS

- Total Revenue and Share of Profit and Net Profit for 2020 were THB 9,406.6 mm and THB 2,523.7 mm, respectively. This statutory figure consists of the normal business operation and FX impacts, which was almost all unrealized gain/loss. In addition, the Company's Normalized Total Revenue and Share of Profit and Normalized Net Profit stood at THB 9,376.0 mm and THB 2,542.6 mm, respectively.

- Normalized Rental Revenue during 2020 increased by 23.0% to THB 1,157.1 mm, compared to the same period of previous year, which was mainly due to increase in lettable area for both logistics and industrial properties.

- Revenue from sale of investment properties during 2020 increased by 32.1% to THB 2,048.1 mm, compared to the same period of last year. In 2020, the Company had successfully 2 assets monetization to both WHART and HREIT, whereas, in 2019, the Company had only asset monetization to WHART.

- Revenue from Land Business and Sale of Properties for 2020 was THB 1,883.9 mm, decreased by 46.3%, compared to the same period of last year, which was mainly from temporary international travel restriction from COVID-19 pandemic. As a result, the customers could not transfer the land; however, the Company still receives strong interests for our industrial estates from the number of potential customers, especially from China, Japan and US manufacturers as a result of production line relocation from China to Southeast Asia countries. Furthermore, the fundamental of Thailand as the regional production hub remains strong, but also reflected the potential and strength of WHA Group's industrial estates, which can fully support the needs of both local and international customers. Also, the Company had the revenue from right of ways of THB 396.9 mm during this year.

- Utilities Income during 2020 decreased by 9.5%, compared to the same period of last year, which was from decrease in domestic utilities sale volume approx. 10.0% as a result of the COVID-19 pandemic and the drought situation.

- Normalized Share of Profit from Investment in Power Associates and Joint Ventures for 2020 was THB 940.4 mm which decreased by 32.0%, compared to the same period of last year. The decrease in Normalized Share of Profit from Investment in Power Associates and Joint Ventures was mainly due to the reduction of AP from Gheco-1 according to PPA, lower coal price, higher corporate income tax and planned maintenance shutdown of 4 SPPs in 2020.

- Finance Cost increased to THB 1,112.3 mm which increased by 12.8%, compared to the same period of last year due to the accounting impact of early redemption of bond. If excluding such an impact, the finance cost increased by 1.8%. However, the Company's weighted average cost of fund decreased by 0.37% (decreasing from 3.41% at the end of 2019 to 3.04% at the end of 2020).

- All in all, the Company had Net Profit and Normalized Net Profit during 2020 at THB 2,523.7 mm and THB 2,542.6 mm, respectively and decreased by 21.8% and 8.1%, respectively, compared to the same period of previous year

## PERFORMANCE BY BUSINESS

### Rental Properties Business

	2019	2020	Change YoY
	THB mm	THB mm	%
<b>Rental and Service</b>			
Rental Revenue	991.3	1,157.1	16.7%
Normalized Rental Revenue <sup>/1</sup>	940.7	1,157.1	23.0%
Gross Profit	587.7	805.5	37.1%
Gross Profit Margin	59.3%	69.6%	
GPM before adjustment with PPA <sup>/2</sup>	59.5%	69.7%	
<b>Sale of Investment Properties</b>			
Revenue from Investment Properties <sup>/3</sup>	1,550.7	2,048.1	32.1%
Gross Profit	563.1	847.4	50.5%
Gross Profit Margin	36.3%	41.4%	
Share of Profit from Investment Properties	239.8	320.5	33.6%

<sup>/1</sup> Excluding rental and service income from WHABT

<sup>/2</sup> Excluding accounting impact of Purchase Price Allocation (PPA)

<sup>/3</sup> Excluding Deferred Revenue Item

## 1. Rental and Service Income

- **Rental and service income from warehouses, distribution centers, factories and structural work** during 2020 was THB 1,157.1 mm which increased by 16.7%, from the same period of previous year. The normalized rental and service income for 2020 increased by 23.0%, compared to the same period of previous year, which was mainly due to increase in lettable area for both logistics and industrial properties. Besides, in 2020, there were new 5 logistics facilities having lettable area approx. 130,000 sqm.

- **Gross profit margin from rental and service of warehouses, distribution centers, factories and structural work** during 2020 was 69.6%, which increased from the same period of previous year because of the higher number of lettable area and cost efficiency management.

## 2. Sale of Investment Properties

- **Revenue from sale of investment properties** during 2020 stood at THB 2,048.1 mm which increased by 32.1%, compared to the same period of last year; consisting of revenue from asset monetization to WHART of THB 982.3 mm and revenue from asset monetization to HREIT of THB 1,065.9 mm.

- **Gross profit margin from sale of investment properties** during 2020 was 41.4%, increased from 36.3% in 2019. Because, in 2020, the Company had successfully assets monetization to both WHART and HREIT, whereas, in 2019, there was only asset monetization to WHART.

- **Share of profit from sale of investment properties** during 2020 was THB 320.5 mm, increased by 33.6%, compared to the same period of previous year from the monetization of JV assets.

### Industrial Development Business

	2019	2020	Change YoY
	THB mm	THB mm	%
Revenue	3,505.0	1,883.9	(46.3%)
Gross Profit	1,777.2	1,029.6	(42.1%)
Gross Profit Margin	50.7%	54.7%	
GPM before adjustment with PPA/1	55.3%	56.0%	

<sup>/1</sup> Excluding accounting impact from Purchase Price Allocation (PPA)

**Revenue from land business and sale of properties** during 2020 was THB 1,883.9 mm, decreased by 46.3%, compared to the same period of last year, which was mainly from international travel restriction from the COVID-19 pandemic. As a result, the customers could not transfer the land; however, the potential customers still receive the strong interests for our industrial estates, especially, China, Japan and US manufacturers as a result of production line relocation from China to Southeast Asia countries. The fundamental of Thailand as the regional production hub remains strong, but also reflected the potential and strength of WHA

Group's industrial estates, which fully support both local and international customers' requirements. Also, the Company had the revenue from right of ways of THB 396.9 mm during this year.

**Gross profit margin from land business and sale of properties** during 2020 stood at 54.7% which increased from the same period of last year due to the revenue recognition of right of ways. However, if excluding such revenue, the gross profit margin was at 42.5% in 2020 which decreased from last year from the revenue recognition of land sale in Vietnam having a lower gross profit margin.



## Utilities & Power Business

	2019	2020	Change YoY
	THB mm	THB mm	%
Revenue	2,258.7	2,043.2	(9.5%)
Gross Profit	954.8	721.8	(24.4%)
Gross Profit Margin	42.3%	35.3%	
GPM before adjustment with PPA/1	45.3%	38.7%	
Share of Profit from Investments in Utilities Associates	(13.5)	(151.3)	(1,023.4%)
<b>Share of Profit from Investments in Power Associates</b>	<b>1,780.5</b>	<b>978.5</b>	<b>(45.0%)</b>
- Normalized Share of Profit from Investments in Power Associates <sup>/2</sup>	1,383.1	940.4	(32.0%)
- FX Gain (Loss)	337.5	38.1	(88.7%)
- Extra Item	60.0	-	(100.0%)

<sup>/1</sup> Excluding accounting impact of Purchase Price Allocation (PPA)

<sup>/2</sup> Excluding Gain (Loss) from FX and Extra item

**Utilities income** during 2020 was THB 2,043.2 mm, which decreased by 9.5%, compared to the same period of previous year, which was mainly from lower excessive charge including lower sale volume approx. 10.0% as a result of COVID-19 pandemic and drought situation.

**Gross profit margin from utilities income** during 2020 was at 35.3%. This gross margin had accounted for the fair value adjustment of the acquired business according to the accounting standards under WHA level. However, the genuine gross margin in 2020 was at 38.7% decreasing from the same period of previous year due to decrease of revenue from lower excessive charge and recorded depreciation costs of new projects.

**Share of Profit from Investments in Associates from Utility Business** during 2020 was THB (151.3) mm due to the share of loss from SDWTP, resulting from start to record depreciation, lower sale volume and the delay

in the construction of pipeline expansion to connection points of water distributors due to the lockdown measurement in Vietnam during COVID-19 pandemic and accounting impact from fair value adjustment of the acquired business.

**Normalized Share of Profit from Investments in Associates from Power Business and Joint Ventures** during 2020 was THB 940.4 mm, which decreased by 32.0%, compared to the same period of last year. If including the FX impact, which is mostly unrealized gain/loss, share of profit from power associates and joint ventures stood at THB 978.5 mm. The decrease in normalized share of profit from power associates and joint ventures was mainly due to the reduction of AP from Gheco-1 according to PPA, lower coal price, higher corporate income tax and planned maintenance shutdown of 4 SPPs in 2020.

## Other Income

	2019	2020	Change YoY
	THB mm	THB mm	%
Dividend and management income	540.7	527.4	(2.5%)
Others	436.4	359.2	(17.7%)
Total other income	977.1	886.7	(9.3%)
Normalized others <sup>/1</sup>	436.4	366.7	(16.0%)
Normalized total other income <sup>/1</sup>	977.1	894.1	(8.5%)

<sup>/1</sup> Excluding FX impact

Normalized other income during 2020 stood at THB 894.1 mm which decreased by 8.5% from the same period of previous year, which was mainly from:

**Dividend and management income** during 2020 was THB 527.4 mm, decreased by 2.5% from the same period of previous year due to decrease of dividend income from Glow IPP.

**Normalized other income** comprised of interest income, gain from sale of short-term investments and other income totaling THB 366.7 mm during 2020, decreased by 16.0% from the same period of 2019.

## Expense Analysis

	2019	2020	Change YoY
	THB mm	THB mm	%
Selling expense	325.6	145.2	(55.4%)
Administrative expense	1,405.2	1,150.1	(18.2%)
Finance costs	986.4	1,112.3	12.8%
<b>Total expense</b>	<b>2,717.2</b>	<b>2,407.7</b>	<b>(11.4%)</b>
Normalized finance costs	1,092.3	1,112.3	1.8%

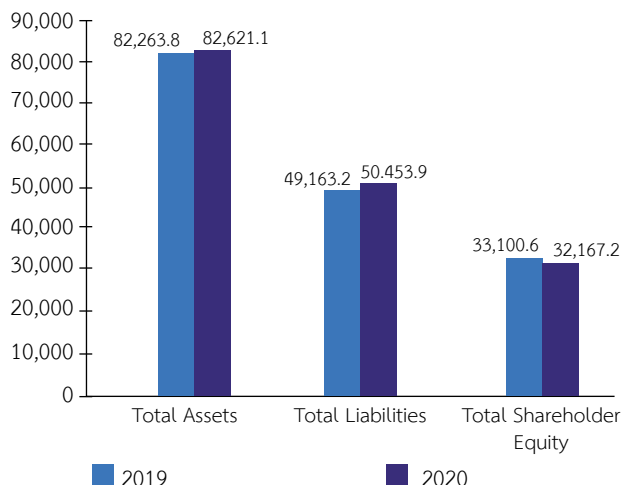
- **Selling expense** during 2020 was THB 145.2 mm, which decreased by 55.4%, compared to the same period of last year, mainly from lower number of land transfer.

- **Administrative expense** during 2020 was THB 1,150.1 mm, which decreased by 18.2%, compared to the same period of last year, which was mainly from cost efficiency management.

- **Finance costs** during 2020 was THB 1,112.3 mm which increased by 12.8% compared to the same period of previous year due to the accounting impact of early redemption of bond. If excluding such an impact, the normalized finance costs increased by 1.8%. However, the Company's weighted average cost of fund decreased by 0.37% (decreasing from 3.41% at the end of 2019 to 3.04% at the end of 2020).

## FINANCIAL POSITION

The changes in Consolidated Balance Sheet as of



31 December 2020 are summarized as follows.

### Assets

As of 31 December 2020, the Company had total assets of THB 82,621.1 mm, increasing by THB 357.3 mm from THB 82,263.8 mm as of 31 December 2019. The main reasons are as follows:

1. Increase in investment properties (net) of THB 1,647.0 mm, from continuously developed new projects.
2. Increase in properties, plants and equipment (net) of THB 1,202.8 mm, mainly from the increase in equipment related to solar rooftop business and investment of reclaimed water project.
3. Decrease in investment in associates of THB 1,967.5 mm, mainly from the adoption of new accounting standard (TFRS 9), reflecting to the mark-to-market of financial instruments in associates of power business.

4. Decrease in investment in available-for-sale of THB 1,288.0 mm, due to decrease in investment value of REITs from market price change.

### Liabilities

As of 31 December 2020, the Company had total liabilities of THB 50,453.9 mm, which increased by THB 1,290.7 mm from THB 49,163.2 mm as of 31 December 2019. Some increase was from bank loan drawdown in order to preserve for the money market fluctuation during COVID-19. Besides, the Company had interest bearing debt of THB 41,253.7 mm, which increased by THB 2,029.4 mm from THB 39,224.3 mm. However, the weighted average cost of fund of the Company decreased by 0.37% (decreasing from 3.41% as of ended 2019 to 3.04% as of ended 2020).

During 2020, the Company had utilized additional short-term and long-term facilities, accounting for THB 6,998.9 mm and had bond repayment of THB 4,937.8 mm. As a result, interest bearing debt of the Company increased by THB 2,029.4 mm, mainly from the capital expenditure of new projects together with the Company's liquidity management.

### Shareholder's equity

As of 31 December 2020, the Company had total shareholder's equity of THB 32,167.2 mm, which decreased by THB 993.4 mm from THB 33,100.6 mm as of 31 December 2019, mainly from decrease in market price of WHART, HREIT and WHABT together with the adoption of new accounting standard (TFRS 9), reflecting to the mark-to-market of financial instruments in associates.

### Unit Price and Investment Value of REITs

	Unit Price (THB)		Increase/(Decrease)
	Ended 2019 31 Dec 2019	Ended 2020 31 Dec 2020	of investment value (THB mm)
WHART	17.4	13.3	(1,571.2)
HREIT	8.8	7.7	(121.2)
WHABT	9.7	8.6	(33.3)
<b>Total</b>			<b>(1,725.7)</b>

## KEY FINANCIAL RATIOS

	2019	2020
Gross Profit Margin (%)	38.8%	44.4%
Net Profit Margin (%)	24.1%	26.8%
D/E Ratio (times)	1.5	1.6
Net IBD to Equity (times)	1.2	1.3
Average Collection Period (day)	26.0	30.8
Actual Tax Rate (%)	7.1%	9.3%

### Credit Term

	2019	2020	Increase/(Decrease)	%
Collection Period (days)	26.0	30.8	4.8	11.4%

**Collection period** during 2020 was 30.8 days which increased 4.8 days or 18.4%, compared to the same period of last year. Whereas such figure was in line with credit terms provided to our clients, which is 0-45 days depending on type of business. The increase was mainly from COVID-19 pandemic. However, the Company still collected the money from our customers as usual.

## Corporate Income Tax

For 2020, the Company had earnings before tax at THB 3,157.7 mm, and corporate income tax expenses at THB 292.9 mm. The effective tax rate increased from 7.1% last year to 9.3%. Comparing to corporate income tax at 20%, the effective tax rate is lower due to BOI tax privilege from some project investments, share of profit recognition on after tax basis, and the different tax calculation method between accounting basis and tax basis.

## Key factors affecting the business operation or future financial position

In 2021, the Company has set up its strategic direction and performance relating to 4 business hubs as follows:

### 1. Logistics Hub

Even though the Coronavirus pandemic continues to affect both domestic and overseas economic, the Company still expects that Logistics business will continue to grow. Especially during the pandemic of the COVID-19 where most people are unable to travel easily, on the other hand, people still have to consume for living resulting in the growth of the E-Commerce business as well as various logistic businesses. This Growth leads the logistic services even more important in the period of time. Therefore, the Company determines to develop the potential in the logistics business both quality and application of innovation in business in order to meet the various needs from customers and also supports the growth of the E-Commerce business which has grown significantly as mentioned above. Moreover, the Company has foreseen an opportunity of logistics properties development and management in overseas, particular in ASEAN such as Vietnam which has the significant economic growth.

The Company has a plan to gradually develop five additional large distribution center projects, totaling an area of approximately 400,000 square meters, with a focus on the development of a Smart Warehouse, which plans to bring 5G technology and Robotics integrating into warehouses operation. In 2021, the Company has set a target to have more space from new contracts and/or new projects of 175,000 square meters as well as a target for short-term lease contracts that generate a higher return with approximate leasable areas of 50,000 square meters. Regarding the asset monetization into the REITs, the Company set a target the sale process will be completed within the Q4/2021.

Moreover, the Company inaugurates WHA Tower, its new headquarters located on Debaratna Road (Bangna Trad) KM 7. The 25-storey Grade A office building offers over 52,000 square meters of high-end office space for WHA employees and customers, and other tenants attracted by its convenient location and accessibility, its future-ready technology, and Asia-Pacific Property award-winning commercial high-rise architectural design.

## 2. Industrial Development Hub

The COVID-19 vaccination in many countries around the world is one of the key factors of Industrial sector recovery in 2021, whether the manufacturing sector and foreign investment. In addition, continue of the conflict of trade war between the United States and the People's Republic of China is the catalyst of relocation of production bases from China to the ASEAN region, especially Thailand. In the area of the EEC Special Economic Development Zone, which has the potential to be developed with readiness in transportation, logistics, infrastructure, resources providing and the connections with other economic centers in the country drives the growth of the company's business. In addition, strong potential of the Company's industrial estate covering the various demands of customers lead the significant growth of the Company's business standing at the leader in industrial estate development industry in Thailand. The Company anticipates that the relocation of production base from China will continue as well as labor and production costs in China have been increasing, therefore, the company prepared to capture the opportunities. In 2021, WHA Rayong 36 is ready to welcome investors, while pre-construction work will continue for 3 upcoming projects, specifically the expansion phase of WHA Eastern Seaboard Industrial Estate 4 (641 rai) and WHA Industrial Estate Rayong (2,152 rai) in Rayong, as well as WHA Saraburi Industrial Land 2 (1,907 rai) in Saraburi. The Company has been developed in various technologies using for the industrial estate business to support the industry of the future supporting the industry of the future as well as covering various needs from customers under the concept of "Smart Eco Industrial Estates" reinforces its leadership in the industrial estate business.

In 2021, the Company will accelerate necessary pre-construction work at WHA Industrial Zone Nghe An for the remaining of Phase 1 and additional Phases 2 and 3, that will total 7,800 rai upon completion. Preparatory steps will be undertaken at the 2 new Thanh Hoa projects of 7,500 rai, WHA Smart Technology Industrial Zone Thanh Hoa and WHA Northern Industrial Zone Thanh Hoa, with construction expected to start in 2022-2023.

As a result of sustained customer development activities, 2021 total land sales are targeted to reach 1,000 rai.

## 3. Utilities & Power Hub

### 3.1 Utilities

The Company continues to set a growth target for utility services both inside and outside industrial estates. For the utility services in industrial estates, the Company plan to increase the sale water volume to customers in the Company's existing industrial estate as well as newly-launched industrial estates in accordance with the Company's business expansion plan of domestic industrial estate and the supporting factors from the EEC as aforementioned. The Company has also enhanced water production processes and created valued added to the products via Wastewater Reclamation Technology with the production capacity of 11.02 million cubic meters per year, such as using reverse osmosis technology (R.O.) integrated into the water production process, including the extension to use Demineralized Water production technology with production capacity of 4.40 million cubic meters per year including the use of various innovations to enhance the efficiency of the service which add value to the water products.

Moreover, as the expansion of the investment in water business in Vietnam, the Company has planned to expand the utilities services in the industrial estates in Vietnam according to the company's industrial estate development plan as well as the expansion of water distribution outside the industrial estates area. Currently, In Vietnam, where it owns equity stakes in 2 water companies, the Company will continue to explore new projects as well as M&A opportunities.



In 2021, the Company set forth the goal of selling raw water, tap water, industrial water including the waste water management system of 153 million cubic meters which increased from 114 million cubic meter in previous year.

### 3.2 Power

In terms of the power business, the Company has set a goal to increase its power generation in equity megawatts to 650 megawatts within the year 2021, which increased from 590 megawatts as compared to the previous year. This result from the increasing in solar rooftop in the industrial estates and logistics centers as well as the use of customers' factory roof in the Company's industrial estates which were completed and commenced for the commercial operations (COD). The Company set the target to enlarge its customer portfolio with the development of renewable energy solutions, in particular solar rooftop projects for industrial customers with target signed contracts of 30 MW. The Company will progress initiatives involving new technologies including the testing of peer-to-peer energy trading system with a view to implement as soon as satisfactory

In addition, the Company also set a plan to develop and adopt the technology to enhance the

Company's power businesses such as using Smart Microgrid and Peer to Peer Energy trading scheme.

## 4. Digital Platform Hub

The Company remains committed to develop the services and present new digital innovations to cover the needs of customers. By 2021, the Company plans to expand the service related to fiber optic cable network connection (FTTx) covering all the group's industrial estates. As well as shifting the level of service in the Data Center, including having plans to utilize investments technology using 5G technology to support the growth amid digital transformation of the Company so as to each business hub achieve the target as planned.

Hence, the Company has set up annual strategic direction and targets in consistence with the Company's strategic plan which has been regularly reviewed every year, including the project feasibility study and consideration by the Board of Directors and management team who possess knowledge, expertise and experience in relation to the operation, however, theses, various external factors such as economic and political factors, government policies, overview of money market and capital markets, might inevitably affect the business operation and future performance of the Company.





## REPORT OF THE BOARD OF DIRECTORS' RESPONSIBILITY TO THE FINANCIAL STATEMENTS

The Board of Directors of the Company has responsibility in preparing the financial statements of the Company in order to represent the Company's financial status and performance for the year 2020 in accordance with the Public Company Act B.E. 2535.

The Board of Directors emphasized on its duties and responsibilities as the directors of a listed company on the Stock Exchange of Thailand to control the business in accordance with the good corporate governance. The Board of Directors was responsible for the financial statements to be accurate, complete, transparent and appropriate to maintain the Company's assets, prevent from fraud and abnormalities, as well as in accordance with generally accepted accounting principles for the interests of shareholders and investors in acknowledging correct and reasonable information of the Company's financial status and performance.

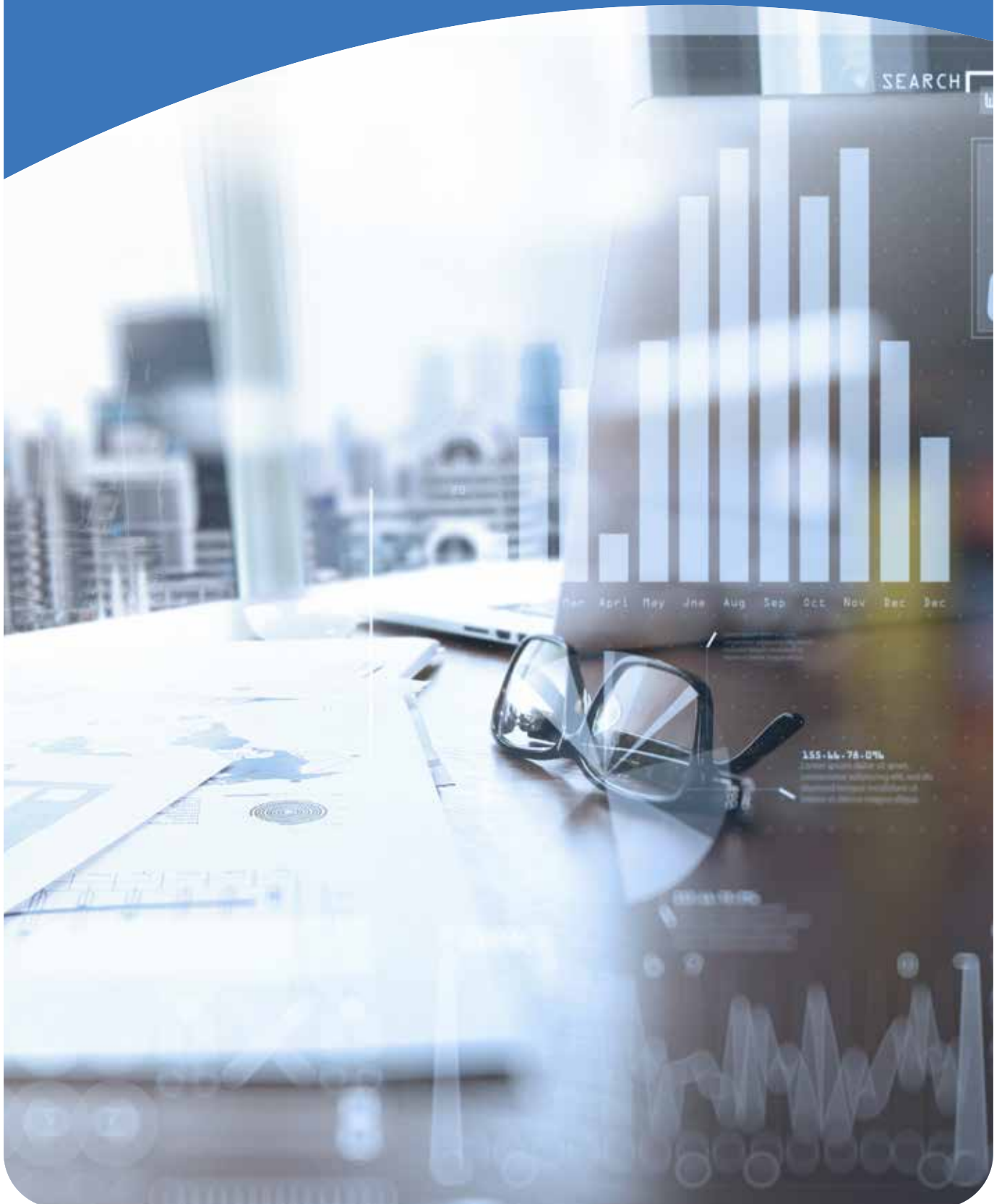
The Board of Directors views that the consolidated financial statements of WHA Corporation Public Company Limited and its subsidiaries for the year 2020 jointly reviewed by the Audit Committee in collaboration with the Management and the auditor, PricewaterhouseCoopers ABAS Limited, were presented in a complete and reliable in compliance with the generally accepted accounting principles and all governing rules and regulations, with appropriate and consistent accounting policies and adequate information disclosure.

**Ms. Jareeporn Jarukornsakul**  
Chairman of the Board of Directors





# Auditor's Report and **Financial Statements**





# Independent Auditor's Report

To the Shareholders of WHA Corporation Public Company Limited

## My opinion

In my opinion, the consolidated financial statements and the separate financial statements present fairly, in all material respects, the consolidated financial position of WHA Corporation Public Company Limited (the Company) and its subsidiaries (the Group) and separate financial position of the Company as at 31 December 2020, and its consolidated and separate financial performance and its consolidated and separate cash flows for the year then ended in accordance with Thai Financial Reporting Standards (TFRS).

## What I have audited

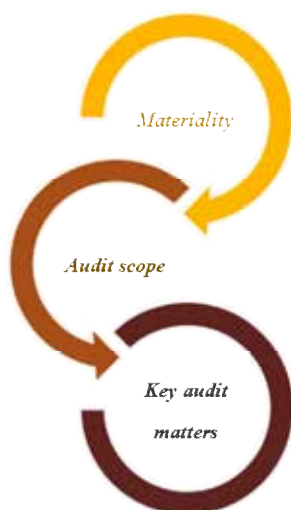
The consolidated financial statements and the separate financial statements comprise:

- the consolidated and separate statements of financial position as at 31 December 2020;
- the consolidated and separate statements of comprehensive income for the year then ended;
- the consolidated and separate statements of changes in equity for the year then ended;
- the consolidated and separate statements of cash flows for the year then ended; and
- the notes to the consolidated and separate financial statements, which include significant accounting policies and other explanatory information.

## Basis for opinion

I conducted my audit in accordance with Thai Standards on Auditing (TSAs). My responsibilities under those standards are further described in the Auditor's responsibilities for the audit of the consolidated and separate financial statements section of my report. I am independent of the Group and the Company in accordance with the Code of Ethics for Professional Accountants issued by the Federation of Accounting Professions that are relevant to my audit of the consolidated and separate financial statements, and I have fulfilled my other ethical responsibilities in accordance with these requirements. I believe that the audit evidence I have obtained is sufficient and appropriate to provide a basis for my opinion.

## My audit approach - overview



### Materiality

Overall group materiality: Baht 140 million which represents approximately 5% of Group's profit before tax.

### Audit scope

I conduct with audit work of the consolidated financial statements by focusing on the significant components which account for 95% of the Group's profit before tax and 97% of the Group's total assets.

### Key audit matters

I identified goodwill impairment assessment as key audit matters:

### Materiality

The scope of my audit was influenced by my application of materiality. An audit is designed to obtain reasonable assurance whether the consolidated financial statements are free from material misstatement. Misstatements may arise due to fraud or error. They are considered material if individually or in aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of the consolidated financial statements.

Based on my professional judgement, I determined certain quantitative thresholds for materiality, including the overall group materiality for the consolidated financial statements as a whole as set out in the table below. These, together with qualitative considerations, helped me to determine the scope of my audit and the nature, timing and extent of my audit procedures and to evaluate the effect of misstatements, both individually and in aggregate on the financial statements as a whole.

<b>Overall group materiality</b>	Baht 140 million
<b>How I determined it</b>	5% of Group's profit before tax
<b>Rationale for the materiality benchmark applied</b>	I chose profit before tax as the critical measure because, in my view, it is the measure against which the performance of the Group is most commonly assessed. The 5% benchmark is a generally accepted auditing practice and there were no significant unusual elements that merited adjustments to this benchmark.

I agreed with the audit committee that I would report to them misstatements identified during my audit above Baht 14 million.



## Audit scope

I tailored the scope of my audit in order to perform sufficient work to enable me to provide an opinion on the Group's consolidated financial statements as a whole, taking into account the structure of the Group, the accounting processes and controls, and the industry in which the Group operates.

## Key audit matters

Key audit matters are those matters that, in my professional judgement, were of most significance in my audit of the consolidated and separate financial statements of the current period. I determine one key audit matter: Goodwill impairment assessment. The matter was addressed in the context of my audit of the consolidated and separate financial statements as a whole, and in forming my opinion thereon, and I do not provide a separate opinion on the matter.

Key audit matter	How my audit addressed the key audit matter
<p><b>Goodwill impairment assessment</b></p> <p>Refer to Note 7 'Critical accounting estimates and judgements' and Note 17 'Goodwill' to the financial statements. As at 31 December 2020, the Group had goodwill of Baht 17,575 million.</p> <p>The Group's goodwill arose from past acquisitions of real estate, power and water businesses. The Group is required to test for goodwill impairment annually in accordance with the requirements of the Thai Financial Reporting Standards.</p> <p>I focussed on the goodwill impairment assessment because the goodwill balance is material to the financial statements. The Group's management uses its judgement and future projections to determine the recoverable amount for the cash-generating units, which includes goodwill.</p> <p>The recoverable amount is based on the fair value less costs of disposal determined using the present value method. The key assumptions used to estimate the future net cash flow discounted to net present value are the gross margin, growth rate and discount rate.</p> <p>From the impairment assessment this year, the Group's management concluded that there was no impairment of goodwill because the recoverable amount was higher than the carrying amount.</p>	<p>My audit procedures included:</p> <ul style="list-style-type: none"><li>• understanding and assessing how the Group's management forecasted future cash flow</li><li>• comparing cash flow projections with approved budgets and business plans set by the Group's management, and reviewing other supporting evidence from the management on future operation plans</li><li>• challenging the reasonableness of management's key assumptions used in cash flow projections, such as its future business plans, projected future gross margin, growth rate and discount rate using the weighted average cost of capital method (WACC), and taking into account the sensitivity of these assumptions with regards to the recoverable amount, and</li><li>• testing the mathematical accuracy of estimated key figures based on the above assumptions and using them to calculate the recoverable amount, then comparing it with the carrying value.</li></ul> <p>Based on these audit procedures, I found that the goodwill impairment assessment was reasonable and consistent with the supporting evidences.</p>

## Other information

The directors are responsible for the other information. The other information comprises the information included in the annual report, but does not include the consolidated and separate financial statements and my auditor's report thereon. The annual report is expected to be made available to me after the date of this auditor's report.

My opinion on the consolidated and separate financial statements does not cover the other information and I will not express any form of assurance conclusion thereon.

In connection with my audit of the consolidated and separate financial statements, my responsibility is to read the other information identified above when it becomes available and, in doing so, consider whether the other information is materially inconsistent with the consolidated and separate financial statements or my knowledge obtained in the audit, or otherwise appears to be materially misstated.

When I read the annual report, if I conclude that there is a material misstatement therein, I am required to communicate the matter to the audit committee.

## Responsibilities of the directors for the consolidated and separate financial statements

The directors are responsible for the preparation and fair presentation of the consolidated and separate financial statements in accordance with TFRS, and for such internal control as the directors determine is necessary to enable the preparation of consolidated and separate financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the consolidated and separate financial statements, the directors are responsible for assessing the Group's and the Company's ability to continue as a going concern, disclosing, as applicable, matters related to going concern and using the going concern basis of accounting unless the directors either intend to liquidate the Group and the Company or to cease operations, or has no realistic alternative but to do so.

The audit committee assists the directors in discharging their responsibilities for overseeing the Group's and the Company's financial reporting process.

## Auditor's responsibilities for the audit of the consolidated and separate financial statements

My objectives are to obtain reasonable assurance about whether the consolidated and separate financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes my opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with TSAs will always detect a material misstatement when it exists. Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of these consolidated and separate financial statements.

As part of an audit in accordance with TSAs, I exercise professional judgement and maintain professional scepticism throughout the audit. I also:

- Identify and assess the risks of material misstatement of the consolidated and separate financial statements, whether due to fraud or error, design and perform audit procedures responsive to those risks, and obtain audit evidence that is sufficient and appropriate to provide a basis for my opinion. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control.
- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Group's and the Company's internal control.

- Evaluate the appropriateness of accounting policies used and the reasonableness of accounting estimates and related disclosures made by the directors.
- Conclude on the appropriateness of the directors' use of the going concern basis of accounting and, based on the audit evidence obtained, whether a material uncertainty exists related to events or conditions that may cast significant doubt on the Group's and the Company's ability to continue as a going concern. If I conclude that a material uncertainty exists, I am required to draw attention in my auditor's report to the related disclosures in the consolidated and separate financial statements or, if such disclosures are inadequate, to modify my opinion. My conclusions are based on the audit evidence obtained up to the date of my auditor's report. However, future events or conditions may cause the Group and the Company to cease to continue as a going concern.
- Evaluate the overall presentation, structure and content of the consolidated and separate financial statements, including the disclosures, and whether the consolidated and separate financial statements represent the underlying transactions and events in a manner that achieves fair presentation.
- Obtain sufficient appropriate audit evidence regarding the financial information of the entities or business activities within the Group to express an opinion on the consolidated financial statements. I am responsible for the direction, supervision and performance of the group audit. I remain solely responsible for my audit opinion.

I communicate with the audit committee regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal control that I identify during my audit.

I also provide the audit committee with a statement that I have complied with relevant ethical requirements regarding independence, and to communicate with them all relationships and other matters that may reasonably be thought to bear on my independence, and where applicable, related safeguards.

From the matters communicated with the audit committee, I determine those matters that were of most significance in the audit of the consolidated and separate financial statements of the current period and are therefore the key audit matters. I describe these matters in my auditor's report unless law or regulation precludes public disclosure about the matter or when, in extremely rare circumstances, I determine that a matter should not be communicated in my report because the adverse consequences of doing so would reasonably be expected to outweigh the public interest benefits of such communication.

PricewaterhouseCoopers ABAS Ltd.

**Chanchai Chaiprasit**

Certified Public Accountant (Thailand) No. 3760

Bangkok

25 February 2021

## Statements of Financial Position

### WHA Corporation Public Company Limited

As at 31 December 2020

		Consolidated financial statements		Separate financial statements	
		2020	2019	2020	2019
	Notes	Baht	Baht	Baht	Baht
<b>Assets</b>					
<b>Current assets</b>					
Cash and cash equivalents	9	3,794,448,274	2,680,759,857	469,097,257	867,539,934
Short-term investments		-	247,139,641	-	212,057,400
Trade and other receivables, net	10	460,565,242	920,844,308	226,669,087	237,335,130
Short-term loans to related parties	33	39,500,000	283,490,552	8,240,500,000	8,001,150,000
Financial assets measured at amortised cost		695,276	-	-	-
Real estate development costs	12	12,626,076,066	12,788,565,570	-	-
Other current assets		440,732,694	440,650,247	69,215,589	77,136,975
<b>Total current assets</b>		<b>17,362,017,552</b>	<b>17,361,450,175</b>	<b>9,005,481,933</b>	<b>9,395,219,439</b>
<b>Non-current assets</b>					
Financial assets measured at fair value through profit or loss	11	714,000,171	-	-	-
Long-term loans to related parties	33	248,490,552	-	-	-
Financial assets measured at fair value through other comprehensive income	11	6,600,367,148	-	5,635,941,676	-
Available-for-sale investments		-	7,888,354,491	-	6,960,460,043
Investments in associates	13	13,508,526,946	15,475,998,867	-	-
Investments in subsidiaries	14	-	-	26,317,683,307	26,317,590,807
Interests in joint ventures	13	2,613,524,573	2,405,534,065	966,078,998	1,014,808,998
Other long-term investments, net		-	555,340,519	-	-
Investment properties, net	15	11,969,908,501	10,322,948,323	4,676,109,267	2,768,250,543
Property, plant and equipment, net	16	6,561,499,001	5,358,743,048	463,098,196	173,685,931
Intangible assets, net		4,118,659,963	4,118,659,963	-	-
Goodwill	17	17,575,045,652	17,575,045,652	-	-
Deferred income tax assets	18	184,137,758	116,590,082	-	-
Other non-current assets		1,164,930,543	1,085,165,671	50,256,006	59,834,934
<b>Total non-current assets</b>		<b>65,259,090,808</b>	<b>64,902,380,681</b>	<b>38,109,167,450</b>	<b>37,294,631,256</b>
<b>Total assets</b>		<b>82,621,108,360</b>	<b>82,263,830,856</b>	<b>47,114,649,383</b>	<b>46,689,850,695</b>

The accompanying notes are an integral part of this interim financial information.

## Statements of Financial Position

### WHA Corporation Public Company Limited

As at 31 December 2020

	Notes	Consolidated financial statements		Separate financial statements	
		2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Liabilities and equity</b>					
<b>Current liabilities</b>					
Short-term loans	19	1,946,862,888	4,410,819,143	1,946,862,888	2,645,819,143
Trade and other payables	20	2,576,622,422	3,361,704,447	1,050,690,135	1,200,598,412
Current portion of long-term loans	19	1,369,230,251	124,729,533	999,447,639	-
Current portion of debentures	21	8,404,852,012	9,534,908,490	3,999,168,755	5,536,530,961
Current portion of deferred revenue	22	91,153,410	90,721,022	31,953,097	36,971,363
Short-term loans from related parties	19	-	-	915,400,000	698,400,000
Income tax payable		98,150,468	129,897,848	-	-
Current portion of lease liabilities		72,414,881	-	3,177,238	-
Other current liabilities		147,891,660	184,340,732	59,210,045	87,701,205
<b>Total current liabilities</b>		<b>14,707,177,992</b>	<b>17,837,121,215</b>	<b>9,005,909,797</b>	<b>10,206,021,084</b>
<b>Non-current liabilities</b>					
Long-term loans	19	9,602,982,354	1,374,343,972	2,500,000,000	-
Debentures	21	19,929,740,333	23,779,475,392	14,325,654,123	14,229,603,659
Deferred revenue	22	2,641,464,022	2,447,391,667	558,321,870	583,567,270
Lease liabilities		299,777,409	-	38,036,891	-
Deferred income tax liabilities	18	2,822,250,985	3,083,725,993	133,338,621	475,722,925
Deposits from long-term lease agreement		207,202,028	216,068,275	35,354,893	17,282,134
Employee benefit obligations	23	158,458,824	150,638,378	52,801,726	44,322,897
Other non-current liabilities		84,887,925	274,484,783	-	923,721
<b>Total non-current liabilities</b>		<b>35,746,763,880</b>	<b>31,326,128,460</b>	<b>17,643,508,124</b>	<b>15,351,422,606</b>
<b>Total liabilities</b>		<b>50,453,941,872</b>	<b>49,163,249,675</b>	<b>26,649,417,921</b>	<b>25,557,443,690</b>

The accompanying notes are an integral part of this interim financial information.



## Statements of Financial Position

### WHA Corporation Public Company Limited

As at 31 December 2020

	Notes	Consolidated financial statements		Separate financial statements	
		2020	2019	2020	2019
		Baht	Baht	Baht	Baht
Liabilities and equity (Continued)					
Equity					
Share capital	24				
Authorised share capital					
Ordinary shares, 15,677,730,186 shares of par Baht 0.10 each		1,567,773,019	1,567,773,019	1,567,773,019	1,567,773,019
Issued and paid-up share capital					
Ordinary shares, 14,946,834,679 shares of paid-up Baht 0.10 each		1,494,683,468		1,494,683,468	
Ordinary shares, 14,709,098,452 shares of paid-up Baht 0.10 each			1,470,909,845		1,470,909,845
Share premium on ordinary shares	24	15,266,493,181	13,933,982,782	15,266,493,181	13,933,982,782
Warrants	25	-	543,677,824	-	543,677,824
Capital surplus from share swap		172,861,100	172,861,100	202,175,962	202,175,962
Retained earnings					
Appropriated - legal reserve		156,777,302	156,777,302	156,777,302	156,777,302
Unappropriated		8,916,505,414	7,594,468,019	2,539,367,090	2,646,038,084
Other components of equity		2,797,865,689	5,604,954,365	805,734,459	2,178,845,206
Equity attributable to owners of the parent		28,805,186,154	29,477,631,237	20,465,231,462	21,132,407,005
Non-controlling interests		3,361,980,334	3,622,949,944	-	-
Total equity		32,167,166,488	33,100,581,181	20,465,231,462	21,132,407,005
Total liabilities and equity		82,621,108,360	82,263,830,856	47,114,649,383	46,689,850,695

The accompanying notes are an integral part of this interim financial information.

## Statements of Comprehensive income

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Notes	Consolidated financial statements		Separate financial statements	
		2020 Baht	2019 Baht	2020 Baht	2019 Baht
Revenues from leases and services		1,841,904,754	1,658,270,133	125,585,494	249,041,643
Revenues from sales of real estate		3,535,165,860	7,156,371,696	-	2,950,175,774
Revenues from sales		1,537,234,593	1,648,363,009	-	-
Costs of leases and services		(841,275,405)	(802,293,832)	(65,630,499)	(119,496,714)
Costs of sales of real estate		(2,055,069,566)	(4,654,519,116)	-	(2,446,151,548)
Costs of sales		(944,935,329)	(943,992,125)	-	-
<b>Gross profit</b>		<b>3,073,024,907</b>	<b>4,062,199,765</b>	<b>59,954,995</b>	<b>633,569,155</b>
Other income		1,283,574,414	977,110,343	2,205,435,904	2,443,282,128
Selling expenses		(145,247,992)	(325,609,346)	-	-
Administrative expenses		(1,158,743,461)	(1,405,234,821)	(272,026,941)	(401,236,310)
Net impairment losses on financial assets		8,606,307	-	(1,798,324)	-
Finance costs	28	(1,112,285,440)	(986,383,371)	(757,813,487)	(751,435,340)
Share of profit from associates and joint ventures		1,208,764,062	1,945,693,061	-	-
<b>Profit before income tax</b>		<b>3,157,692,797</b>	<b>4,267,775,631</b>	<b>1,233,752,147</b>	<b>1,924,179,633</b>
Income tax	30	(292,929,163)	(305,062,398)	840,046	(67,502,696)
<b>Profit for the year</b>		<b>2,864,763,634</b>	<b>3,962,713,233</b>	<b>1,234,592,193</b>	<b>1,856,676,937</b>
<b>Other comprehensive income</b>					
Items that will not be reclassified subsequently to profit or loss					
Changes in fair value of equity investments at fair value through other comprehensive income	11	(1,829,836,070)	-	(1,715,804,593)	-
Remeasurements of employee benefit obligations		-	38,579,881	-	12,922,189
Income tax relating to items that will not be reclassified subsequently to profit or loss	30	365,967,214	(7,715,976)	343,160,919	(2,584,438)
Total items that will not be reclassified subsequently to profit or loss		(1,463,868,856)	30,863,905	(1,372,643,674)	10,337,751

The accompanying notes are an integral part of this interim financial information.

# Statements of Comprehensive income

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Notes	Consolidated financial statements		Separate financial statements	
		2020 Baht	2019 Baht	2020 Baht	2019 Baht
Items that will be reclassified subsequently to profit or loss					
Change in value of investments		-	2,376,142,864	-	2,152,075,113
Currency translation differences		(20,403,038)	(79,398,255)	-	-
Share of other comprehensive income of associates and joint ventures accounted for using the equity method		(159,220,542)	(12,418,877)	-	-
Income tax relating to items that will be reclassified subsequently to profit or loss	30	-	(475,228,573)	-	(430,415,023)
Total items that will be reclassified subsequently to profit or loss		(179,623,580)	1,809,097,159	-	1,721,660,090
<b>Other comprehensive income (expense) for the year, net of tax</b>		(1,643,492,436)	1,839,961,064	(1,372,643,674)	1,731,997,841
<b>Total comprehensive income (expense) for the year</b>		1,221,271,198	5,802,674,297	(138,051,481)	3,588,674,778
<b>Profit attributable to:</b>					
Owners of the parent		2,523,749,930	3,229,253,657	1,234,592,193	1,856,676,937
Non-controlling interests		341,013,704	733,459,576	-	-
		2,864,763,634	3,962,713,233	1,234,592,193	1,856,676,937
<b>Total comprehensive income (expense) attributable to:</b>					
Owners of the parent		937,475,856	5,076,869,725	(138,051,481)	3,588,674,778
Non-controlling interests		283,795,342	725,804,572	-	-
		1,221,271,198	5,802,674,297	(138,051,481)	3,588,674,778
<b>Earnings per share</b>	31				
Basic earnings per share		0.1689	0.2220	0.0826	0.1276
Diluted earnings per share		0.1689	0.2192	0.0826	0.1260

The accompanying notes are an integral part of this interim financial information.

# Statements of Changes in Equity

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

Consolidated financial statements																			
		Attributable to owners of the parent																	
Notes		Other components of equity																	
		Retained earnings										Re-measurements of				Share of other		Change	
		Issued and paid-up share capital	Share premium on ordinary shares	Warrants	Capital surplus from share swap	Appropriated - legal reserve	Unappropriated	Investments	Currency translation	Re-measurements of employee benefit obligations	at fair value through other comprehensive income	Measurement of equity investments	Income of comprehensive associates and joint ventures	Income of subsidiaries	Change in parent's ownership interests	Share of other comprehensive income	Share of other comprehensive income	Share of other comprehensive income	Share of other comprehensive income
		Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht
	<b>Opening balance 2019</b>	1,433,426,717	12,438,534,575	795,398,351	172,861,100	156,777,302	8,471,392,437	291,196,570	(90,974,382)	6,298,087	-	-	(17,579,956)	3,568,397,978	27,225,728,779	3,785,364,071	31,014,092,850		
	Retrospective adjustments from changes in accounting policy	-	-	-	-	-	(1,708,596,544)	-	-	-	-	-	-	-	(1,708,596,544)	(338,107,168)	(2,046,703,712)		
	<b>Balance after adjustment</b>	1,433,426,717	12,438,534,575	795,398,351	172,861,100	156,777,302	6,762,795,893	291,196,570	(90,974,382)	6,298,087	-	-	(17,579,956)	3,568,397,978	25,517,132,235	3,450,256,903	28,967,389,138		
	Capital increase from warrant conversion	37,483,128	1,495,448,207	(251,720,827)	-	-	-	-	-	-	-	-	-	-	1,281,210,808	-	1,281,210,808		
26	Dividend paid	-	-	-	-	-	(2,397,581,531)	-	-	-	-	-	-	-	(2,397,581,531)	-	(2,397,581,531)		
	Subsidiary's capital increase	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	Subsidiary's capital decrease	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	Dividend paid from subsidiaries	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	to non-controlling interests	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	Total comprehensive income	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	(expense) for the year	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	<b>Closing balance 2019</b>	1,470,909,845	13,933,982,782	543,677,824	172,861,100	156,777,302	7,594,468,019	2,189,504,442	(162,794,681)	35,993,188	-	-	(26,146,562)	3,568,397,978	29,477,631,237	3,622,949,944	33,100,581,181		
	Retrospective adjustments from changes in accounting policy	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
4	<b>Balance after adjustment</b>	1,470,909,845	13,933,982,782	543,677,824	172,861,100	156,777,302	7,740,952,387	(2,189,504,442)	(162,794,681)	35,993,188	-	-	(26,146,562)	3,568,397,978	28,826,219,337	(324,953,359)	(976,365,259)		
	Capital increase from warrant conversion	23,773,623	948,485,971	(159,653,396)	-	-	-	-	-	-	-	-	-	-	812,606,198	-	812,606,198		
24, 25	Warrant expiration	-	384,024,428	(384,024,428)	-	-	-	-	-	-	-	-	-	-	-	-	-		
26	Dividend paid	-	-	-	-	-	(1,348,196,903)	-	-	-	-	-	-	-	(1,348,196,903)	-	(1,348,196,903)		
	Change in parent's ownership interest in subsidiaries	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	Dividend paid from subsidiaries	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	to non-controlling interests	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	Total comprehensive income	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	(expense) for the year	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
	<b>Closing balance 2020</b>	1,494,683,468	15,266,493,181	-	172,861,100	156,777,302	8,916,505,414	-	(17,106,667)	35,993,188	-	-	(106,627,159)	-	937,475,856	283,795,342	1,221,271,198		
		-	-	-	-	-	-	-	(179,901,348)	-	-	-	(929,343,633)	3,145,479,644	28,805,186,154	3,361,980,334	32,167,166,488		

The accompanying notes are an integral part of this financial statements.

# Statements of Changes in Equity

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

Separate financial statements												
Notes	Issued and paid-up share capital	Share premium on ordinary shares	Warrants	Capital surplus from share swap	Retained earnings		Investments	Re-measurements of employee benefit obligations		Measurement of equity investments at fair value through other comprehensive income		Total equity
					Appropriated - legal reserve	Unappropriated		Baht	Baht	Baht	Baht	
	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht	Baht
<b>Opening balance 2019</b>	1,433,426,717	12,438,534,575	795,398,351	202,175,962	156,777,302	3,186,942,678	453,429,398	(6,582,033)	-	-	-	18,660,102,950
Capital increase from warrant conversion	37,483,128	1,495,448,207	(251,720,527)	-	-	-	-	-	-	-	-	1,281,210,808
Dividend paid	-	-	-	-	-	(2,397,581,531)	-	-	-	-	-	(2,397,581,531)
Total comprehensive income for the year	-	-	-	-	-	1,856,676,937	1,721,660,090	10,337,751	-	-	-	3,588,674,778
<b>Closing balance 2019</b>	1,470,909,845	13,933,982,782	543,677,824	202,175,962	156,777,302	2,646,038,084	2,175,089,488	3,755,718	-	-	-	21,132,407,005
Retrospective adjustments from changes in accounting policy	4	-	-	-	-	6,933,716	(2,175,089,488)	-	-	2,174,622,415	-	6,466,643
<b>Balance after adjustment</b>	1,470,909,845	13,933,982,782	543,677,824	202,175,962	156,777,302	2,652,971,800	-	3,755,718	-	2,174,622,415	-	21,138,873,648
Capital increase from warrant conversion	24, 25	23,773,623	948,485,971	-	-	-	-	-	-	-	-	812,606,198
Warrant expiration	24, 25	-	384,024,428	-	-	-	-	-	-	-	-	-
Dividend paid	26	-	-	-	-	(1,348,196,903)	-	-	-	-	-	(1,348,196,903)
Total comprehensive income (expense) for the year	-	-	-	-	-	1,234,592,193	-	-	-	(1,372,643,674)	-	(138,051,481)
<b>Closing balance 2020</b>	1,494,683,468	15,266,493,181	-	202,175,962	156,777,302	2,539,367,090	-	3,755,718	-	801,978,741	-	20,465,231,462

The accompanying notes are an integral part of this financial statements.



## Statements of Cash Flows

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Notes	Consolidated		Separate	
		financial statements		financial statements	
		2020	2019	2020	2019
		Baht	Baht	Baht	Baht
<b>Cash flows from operating activities</b>					
Profit before income tax		3,157,692,797	4,267,775,631	1,233,752,147	1,924,179,633
Adjustments for :					
Net impairment losses on financial assets		(8,778,492)	3,891,611	1,798,324	-
Depreciation	15, 16	579,475,123	444,321,454	37,635,664	44,462,434
Amortisation		12,844,177	15,386,568	1,411,562	1,642,198
Gain from short-term investments disposal		(590,144)	(13,612,091)	(717,121)	(12,454,000)
Gain from available-for-sale investments disposal		-	(7,625)	-	-
Gain from investment properties disposal		(953,239,352)	(787,226,223)	-	(504,024,226)
Gain from property, plant and equipment disposal		(28,922,071)	(3,627,948)	(2,234,139)	-
Amortisation of other long-term investments		-	13,872,688	-	-
Unrealised gain on exchange rate		(671,945)	-	-	-
Employee benefit obligations	23	27,572,336	49,097,425	8,478,829	15,632,807
Interest income		(34,575,120)	(76,206,653)	(307,801,794)	(230,693,648)
Dividend income		(407,616,175)	(402,306,099)	(1,875,964,316)	(1,952,002,636)
Finance costs	28	1,112,285,440	986,383,371	757,813,487	751,435,340
Share of profit from associates and joint ventures		(1,208,764,062)	(1,945,693,061)	-	-
Changes in operating assets and liabilities :					
Trade and other receivables		(100,192,799)	17,077,177	5,844,820	1,321,021
Real estate development costs		65,724,975	202,183,660	-	-
Other current assets		(38,282,551)	(72,604,222)	(30,131,071)	(1,962,160)
Other non-current assets		(52,205,620)	86,747,608	1,943,417	(1,187,021)
Trade and other payables		(213,277,086)	(76,378,889)	(15,235,314)	44,195,379
Deferred revenue		(82,506,033)	(142,958,976)	(30,263,666)	(18,692,957)
Other current liabilities		(36,449,069)	68,867,323	(28,491,161)	62,004,756
Deposits from long-term lease agreement		(8,866,246)	25,020,487	18,072,759	(8,798,728)
Paid of employee benefit		(333,413)	(232,209)	-	-
Other non-current liabilities		(704,256)	(161,208,587)	(625,823)	(96,574,627)
Cash generated from operation		1,779,620,414	2,498,562,420	(224,713,396)	18,483,565
Interest received		29,981,238	71,271,831	308,515,872	49,088,938
Interest paid		(1,327,355,406)	(1,372,044,979)	(721,357,051)	(709,862,206)
Dividend received		2,407,556,015	1,214,822,502	1,875,964,316	1,952,002,636
Income tax refund received		85,427,399	66,742,322	74,112,403	55,125,610
Income tax paid		(349,270,558)	(301,370,625)	(36,059,944)	(36,417,403)
Net cash receipts from operating activities		2,625,959,102	2,177,983,471	1,276,462,200	1,328,421,140

The accompanying notes are an integral part of this interim financial information.

## Statements of Cash Flows

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Consolidated		Separate	
	financial statements		financial statements	
	2020	2019	2020	2019
Notes	Baht	Baht	Baht	Baht
<b>Cash flows from investing activities</b>				
Payments of short-term investments acquisition	(441,040,016)	(6,540,010,232)	(385,000,000)	(5,890,000,000)
Proceeds from short-term investments disposal	688,072,378	7,112,809,529	597,774,521	6,448,607,809
Payments of short-term loans to related parties	(45,500,000)	(230,490,552)	(4,925,500,000)	(4,788,500,000)
Proceeds from short-term loans to related parties	6,000,000	801,550,500	4,686,150,000	609,250,000
Proceeds from long-term loans to related parties	35,000,000	-	-	-
Payments of available-for-sale investments acquisition	(560,830,636)	(767,166,036)	(410,268,136)	(767,166,036)
Proceeds from capital reduction of available-for-sale investments	18,981,908	37,632,528	18,981,908	35,250,587
Proceeds from available-for-sale investments disposal	-	8,900	-	-
Payments of investments in associates	-	(2,525,362,094)	-	-
Proceeds from capital reduction of investments in associates	13,162,226	-	-	-
Payments of investments in subsidiaries	-	-	(92,500)	-
Payments of interests in joint ventures	(51,749,900)	(324,949,991)	-	(6,374,998)
Proceeds from capital reduction of investments in joint venture	48,730,000	230,016,000	48,730,000	230,016,000
Payments of other long-term investments acquisition	-	(88,500,000)	-	-
Payments of investment properties acquisition	(2,078,772,691)	(2,706,381,007)	(1,251,658,047)	(246,953,928)
Interest paid to capitalise for investment properties	(22,753,399)	(35,476,269)	(20,179,087)	(3,559,412)
Proceeds from investment properties disposal	2,374,971,847	1,707,084,490	-	1,059,533,149
Payments of land deposit	(188,727,600)	(126,841,350)	-	-
Payments of property, plant and equipment acquisition	(1,282,708,282)	(1,040,613,192)	(236,269,952)	(53,395,554)
Interest paid to capitalise for property, plant and equipment	(3,674,896)	(965,065)	(3,674,895)	(965,064)
Proceeds from property, plant and equipment disposal	32,470,258	7,655,686	2,319,620	-
Payments of sold properties' income tax	(69,977,809)	(42,261,000)	-	(37,695,000)
Net cash payments from investing activities	(1,528,346,612)	(4,532,259,155)	(1,878,686,568)	(3,411,952,447)

The accompanying notes are an integral part of this interim financial information.

## Statements of Cash Flows

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

		Consolidated		Separate	
		financial statements		financial statements	
		2020	2019	2020	2019
		Baht	Baht	Baht	Baht
<b>Cash flows from financing activities</b>					
Proceeds from short-term loans	19	12,778,937,284	12,022,343,179	8,788,937,284	8,331,343,179
Repayments of short-term loans	19	(15,255,000,000)	(9,256,000,000)	(9,500,000,000)	(7,030,000,000)
Proceeds from short-term loans from related parties	19	-	-	217,000,000	25,500,000
Proceeds from long-term loans	19	10,700,000,000	1,500,000,000	3,500,000,000	-
Payments of long-term loans fee	19	(4,100,000)	(1,000,000)	(1,000,000)	-
Repayments of long-term loans	19	(1,225,000,000)	-	-	-
Proceed from debentures	21	7,100,000,000	5,700,000,000	4,100,000,000	5,700,000,000
Payments of issuance debentures	21	(14,569,603)	(7,039,480)	(10,776,453)	(7,039,480)
Repayments of debentures	21	(12,037,800,000)	(6,993,000,000)	(5,537,800,000)	(3,855,000,000)
Payments on lease liabilities		(84,664,633)	-	(12,919,202)	-
Proceed from warrant conversion		796,965	1,897,671,932	796,965	1,897,671,932
Proceeds from interest rate swap contracts		47,890,000	-	7,740,000	-
Dividend paid	26	(1,733,285,686)	(2,867,517,810)	(1,348,196,903)	(2,397,581,531)
Proceeds from non-controlling interests		-	15	-	-
Payments to non-controlling interests		(255,826,027)	(80,000,000)	-	-
Net cash receipts from financing activities		17,378,300	1,915,457,836	203,781,691	2,664,894,100
<b>Net increase (decrease) in cash and cash equivalents</b>					
Cash and cash equivalents at the beginning of the period		2,680,759,857	3,172,220,811	867,539,934	286,177,141
Exchange rate effect on cash and cash equivalents		(1,302,373)	(52,643,106)	-	-
<b>Cash and cash equivalents at the end of the period</b>		<b>3,794,448,274</b>	<b>2,680,759,857</b>	<b>469,097,257</b>	<b>867,539,934</b>
<b>Non-cash transactions</b>					
Unpaid investments in associates		-	242,915,209	-	-
Account payables from investment properties acquisition		730,779,907	306,867,943	679,163,832	92,805,240
Account payables from property, plant and equipment acquisition		271,771,067	145,398,720	95,548,001	17,911,319
Lease assets and liabilities		65,037,262	-	19,166,167	-
Dividend payable		16,074,121	14,259,004	-	-

The accompanying notes are an integral part of this interim financial information.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 1 General information

WHA Corporation Public Company Limited (“the Company”) is a public limited company which is listed on the Stock Exchange of Thailand and is incorporated and resident in Thailand. The address of the Company’s registered office is as follows:

1121 Moo.3 Theparak Road, Theparak, A.Mueang Samut Prakarn, Samut Prakarn 10270.

The principal business operations of the Company and subsidiaries (together “the Group”) are engaging in providing rent and sale of lands, buildings, factories, warehouses, and other properties, developing and managing properties in industrial estates and industrial zones, providing public utilities, facilities and other related services, providing digital services, data center, Internet connection and other IT services.

These consolidated and separate financial statements were authorised for issue by the Board of Directors on 25 February 2021.

### 2 Accounting policies

The consolidated and separate financial statements have been prepared in accordance with Thai Financial Reporting Standards (“TFRS”) and the financial reporting requirements issued under the Securities and Exchange Act.

The consolidated and separate financial statements have been prepared under the historical cost convention except as disclosed in the accounting policies below.

The preparation of financial statements in conformity with TFRS requires management to use certain critical accounting estimates and to exercise its judgement in applying the Group’s accounting policies. The areas involving a higher degree of judgement or complexity, or areas that are more likely to be materially adjusted due to changes in estimates and assumptions are disclosed in Note 7.

An English version of the consolidated and separate financial statements have been prepared from the statutory financial statements that are in the Thai language. In the event of a conflict or a difference in interpretation between the two languages, the Thai language statutory financial statements shall prevail.

### 3 New and amended financial reporting standards

#### 3.1 New and amended financial reporting standards that are effective for accounting period beginning on or after 1 January 2020 and have significant impacts to the Group

##### *Financial instruments*

The new financial standards related to financial instruments are as follows:

TAS 32	Financial instruments: Presentation
TFRS 7	Financial instruments: Disclosures
TFRS 9	Financial instruments
TFRIC 16	Hedges of a net investment in a foreign operation
TFRIC 19	Extinguishing financial liabilities with equity instruments

The new financial reporting standards related to financial instruments introduce new classification and measurement requirements for financial instruments as well as provide derecognition guidance on financial assets and financial liabilities. The new guidance also provides an option for the Group to apply hedge accounting to reduce accounting mismatch between hedged item and hedging instrument. In addition, the new rule provides detailed guidance on financial instruments issued by the Group whether it is a liability or an equity. Among other things, they require extensive disclosure on financial instruments and related risks.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

The new classification requirements of financial assets require the Group to assess both i) business model for holding the financial assets; and ii) cash flow characteristics of the asset whether the contractual cash flows represent solely payments of principal and interest (SPPI). The classification affects the financial assets' measurement. The new guidance requires assessment of impairment of financial assets as well as contract assets and recognition of expected credit loss from initial recognition.

On 1 January 2020, the Group has adopted the financial reporting standards related to financial instruments in its financial statements. The impact from the first-time adoption has been disclosed in Note 4.

### *Thai Financial Reporting Standard no.16 (TFRS 16), Leases*

Where the Group is a lessee, TFRS 16, Leases will result in almost all leases being recognised on the balance sheet as the distinction between operating and finance leases is removed. A right-of-use asset and a lease liability will be recognised, with exception on short-term and low-value leases.

On 1 January 2020, the Group has adopted the new lease standard in its financial statements. The impact from the first-time adoption has been disclosed in Note 4.

### **3.2 New and amended financial reporting standards that are effective for accounting period beginning or after 1 January 2021 and 1 January 2022 and have significant impacts to the Group**

The Group has not early adopted the new and amended Thai Financial Reporting Standards which are effective on 1 January 2021 and 1 January 2022. The Group's management is currently assessing the impact of adoption of these standards.

## **4 Impacts from initial application of the new and revised financial reporting standards**

This note explains the impact of the adoption of TAS 32 Financial Instruments: Presentation, TFRS 7 Financial Instruments: Disclosure, TFRS 9 Financial Instruments and TFRS 16 Leases on the Group's consolidated financial statements and the Company's separate financial statements. The new accounting policies applied from 1 January 2020 were disclosed in Note 5.

The Group and the Company have adopted those accounting policies from 1 January 2020 by applying the modified retrospective approach. The comparative figures have not been restated. The reclassifications and the adjustments arising from the changes in accounting policies were therefore recognised in the statement of financial position as at 1 January 2020.



# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

The impact of first-time adoption of new financial reporting standards on the consolidated and separate statements of financial position are as follows:

	Consolidated financial statements			
	As at 31 December 2019 Baht	Adjustments Baht	Reclassifications Baht	As at 1 January 2020 Baht
<b>Assets</b>				
<b>Current assets</b>				
Financial assets measured at fair value through profit or loss	-	-	236,482,234	236,482,234
Short-term investment	247,139,641	-	(247,139,641)	-
Trade and other receivables, net	920,844,308	(4,450,790)	-	916,393,518
Derivative assets	-	47,879,298	-	47,879,298
Financial assets measured at amortised cost	-	-	10,657,407	10,657,407
<b>Non-current assets</b>				
Financial assets measured at fair value through profit or loss	-	158,659,652	555,340,519	714,000,171
Financial assets measured at fair value through other comprehensive income	-	-	7,888,354,491	7,888,354,491
Available-for-sale investments	7,888,354,491	-	(7,888,354,491)	-
Investments in associates	15,475,998,867	(1,137,957,026)	-	14,338,041,841
Interests in joint ventures	2,405,534,065	(78,762)	-	2,405,455,303
Other long-term investments, net	555,340,519	-	(555,340,519)	-
Investment properties, net	10,322,948,323	55,867,276	169,834,059	10,548,649,658
Property, plant and equipment, net	5,358,743,048	109,545,949	-	5,468,288,997
Other non-current assets	1,085,165,671	-	(169,834,059)	915,331,612
<b>Total assets</b>	<b>44,260,068,933</b>	<b>(770,534,403)</b>	<b>-</b>	<b>43,489,534,530</b>
<b>Liabilities and equity</b>				
<b>Current liabilities</b>				
Trade and other payables	3,361,704,447	-	(32,739,469)	3,328,964,978
Current portion of lease liabilities	-	46,387,412	32,739,469	79,126,881
<b>Non-current liabilities</b>				
Lease liabilities	-	123,845,511	188,892,604	312,738,115
Deferred income tax liabilities	3,083,725,993	40,417,631	-	3,124,143,624
Other non-current liabilities	274,484,783	(4,819,698)	(188,892,604)	80,772,481
<b>Total liabilities</b>	<b>6,719,915,223</b>	<b>205,830,856</b>	<b>-</b>	<b>6,925,746,079</b>
<b>Equity</b>				
Unappropriated retained earnings	7,594,468,019	146,484,368	-	7,740,952,387
Other components of equity	5,604,954,365	(797,896,268)	-	4,807,058,097
Non-controlling interests	3,622,949,944	(324,953,359)	-	3,297,996,585
<b>Total equity</b>	<b>16,822,372,328</b>	<b>(976,365,259)</b>	<b>-</b>	<b>15,846,007,069</b>
<b>Total liabilities and equity</b>	<b>23,542,287,551</b>	<b>(770,534,403)</b>	<b>-</b>	<b>22,771,753,148</b>

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements			
	As at 31 December 2019 Baht	Adjustments Baht	Reclassifications Baht	As at 1 January 2020 Baht
<b>Assets</b>				
<b>Current assets</b>				
Financial assets measured at fair value through profit or loss	-	-	212,057,400	212,057,400
Short-term investment	212,057,400	-	(212,057,400)	-
Trade and other receivables, net	237,335,130	(2,308,821)	-	235,026,309
Derivative assets	-	10,392,125	-	10,392,125
<b>Non-current assets</b>				
Financial assets measured at fair value through other comprehensive income	-	-	6,960,460,043	6,960,460,043
Available-for-sale investments	6,960,460,043	-	(6,960,460,043)	-
Investment properties, net	2,768,250,543	18,735,386	9,714,603	2,796,700,532
Property, plant and equipment, net	173,685,931	14,577,993	-	188,263,924
Other non-current assets	59,834,934	-	(9,714,603)	50,120,331
<b>Total assets</b>	<b>10,411,623,981</b>	<b>41,396,683</b>	<b>-</b>	<b>10,453,020,664</b>
<b>Liabilities and equity</b>				
<b>Current liabilities</b>				
Trade and other payables	1,200,598,412	-	(844,503)	1,199,753,909
Current portion of lease liabilities	-	11,785,584	844,503	12,630,087
<b>Non-current liabilities</b>				
Lease liabilities	-	22,039,177	297,897	22,337,074
Deferred income tax liabilities	475,722,925	1,616,661	-	477,339,586
Other non-current liabilities	923,721	(511,382)	(297,897)	114,442
<b>Total liabilities</b>	<b>1,677,245,058</b>	<b>34,930,040</b>	<b>-</b>	<b>1,712,175,098</b>
<b>Equity</b>				
Unappropriated retained earnings	2,646,038,084	6,933,716	-	2,652,971,800
Other components of equity	2,178,845,206	(467,073)	-	2,178,378,133
<b>Total equity</b>	<b>4,824,883,290</b>	<b>6,466,643</b>	<b>-</b>	<b>4,831,349,933</b>
<b>Total liabilities and equity</b>	<b>6,502,128,348</b>	<b>41,396,683</b>	<b>-</b>	<b>6,543,525,031</b>

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 4.1 Financial instruments

The impact of these changes on the unappropriated retained earnings and equity of the Group and the Company as at 1 January 2020 are as follows:

	Consolidated financial statements				
	Retained earnings Baht	Measurement of short-term investments and available-for-sale investments Baht	Measurement of equity investments at fair value through other comprehensive income Baht	Share of other comprehensive income of associates and joint ventures Baht	Non- controlling interests Baht
<b>Balance as at 31 December 2019</b>	7,594,468,019	2,189,504,442	-	(26,146,562)	3,622,949,944
Reclassifications from short-term investments to investments at fair value through profit or loss (FVPL) (a)	1,326,356	(1,326,356)	-	-	-
Reclassifications from available-for-sale investments to investments at fair value through other comprehensive income (FVOCI) (c)	-	(2,188,178,086)	2,188,178,086	-	-
Reclassifications from other long-term investments to investments at fair value through profit or loss (FVPL) (d)	137,712,585	-	-	-	20,947,067
Increase in provision for trade receivables (f)	(4,075,449)	-	-	-	(375,341)
Fair value adjustments on derivatives (e)	47,879,298	-	-	-	-
Investments in associates	-	-	-	(796,569,912)	(341,387,114)
Interests in joint ventures	(55,133)	-	-	-	(23,629)
Increase in deferred tax liabilities related to the above adjustments	(36,303,289)	-	-	-	(4,114,342)
<b>Balance as at 1 January 2020 - TFRS 9 adoption</b>	<b>7,740,952,387</b>	<b>-</b>	<b>2,188,178,086</b>	<b>(822,716,474)</b>	<b>3,297,996,585</b>

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements		
	Retained earnings Baht	Measurement of short-term investments and available-for-sale investments Baht	Measurement of equity investments at fair value through other comprehensive income Baht
<b>Balance as at 31 December 2019</b>	2,646,038,084	2,175,089,488	-
Reclassifications from short-term investments to investments at fair value through profit or loss (FVPL) (a)	467,073	(467,073)	-
Reclassifications from available-for-sale investments to investments at fair value through other comprehensive income (FVOCI) (c)	-	(2,174,622,415)	2,174,622,415
Increase in provision for trade receivables (g)	(2,308,821)	-	-
Fair value adjustments on derivatives (e)	10,392,125	-	-
Increase in deferred tax liabilities related to the above adjustments	(1,616,661)	-	-
<b>Balance as at 1 January 2020 - TFRS 9 adoption</b>	2,652,971,800	-	2,174,622,415

On 1 January 2020 (the date of initial application), the management has assessed which business models apply to the financial assets and financial liabilities, and has classified its financial instruments into the appropriate TFRS 9 categories as follows.

	Consolidated financial statements					
	Short-term investments Baht	Available-for-sale investments Baht	Other long-term investments Baht	FVPL Baht	FVOCI Baht	Amortised cost Baht
<b>Balance as at 31 December 2019</b>	247,139,641	7,888,354,491	555,340,519	-	-	-
Reclassifications from short-term investments to investments at fair value through profit or loss (FVPL) (a)	(236,482,234)	-	-	236,482,234	-	-
Reclassifications from short-term investments to investments at amortised cost (b)	(10,657,407)	-	-	-	-	10,657,407
Reclassifications from available-for-sale investments to investments at fair value through other comprehensive income (FVOCI) (c)	-	(7,888,354,491)	-	-	7,888,354,491	-
Reclassifications from other long-term investments to investments at fair value through profit or loss (FVPL) (d)	-	-	(555,340,519)	555,340,519	-	-
Fair value adjustments on derivatives (e)	-	-	-	47,879,298	-	-
Fair value adjustments on financial assets	-	-	-	158,659,652	-	-
<b>Balance as at 1 January 2020 - TFRS 9 adoption</b>	-	-	-	998,361,703	7,888,354,491	10,657,407

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements			
	Short-term investments Baht	Available-for-sale investments Baht	FVPL Baht	FVOCI Baht
<b>Balance as at 31 December 2019</b>	212,057,400	6,960,460,043	-	-
Reclassifications from short-term investments to investments at fair value through profit or loss (FVPL) (a)	(212,057,400)	-	212,057,400	-
Reclassifications from available-for-sale investments to investments at fair value through other comprehensive income (FVOCI) (c)	-	(6,960,460,043)	-	6,960,460,043
Fair value adjustments on derivatives (e)	-	-	10,392,125	-
<b>Balance as at 1 January 2020</b>				
- TFRS 9 adoption	-	-	222,449,525	6,960,460,043

*(a) Investments in debt mutual fund*

Investments in debt mutual fund are classified as financial assets measured at fair value through profit or loss and recognised corresponding adjustments to retained earnings as at 1 January 2020.

*(b) Fixed deposits*

Fixed deposits with maturities of 3 to 12 months are classified as financial assets measured at amortised cost.

*(c) Real Estate Investment Trust (REIT)*

Real Estate Investment Trust (REIT) investment in Thailand's, the Group applies the TFAC's clarification announced on 25 June 2020. The announcement requires the Group to classify the aforementioned investments as investments in equity instruments. Those investments are measured at fair value through other comprehensive income.

*(d) Unquoted equity investments*

Unquoted equity investments which were classified as other long-term investments and presented at cost, are reclassified to financial assets measured at fair value through profit or loss and recognised corresponding adjustments to retained earnings as at 1 January 2020.

*(e) Derivatives and hedging activities*

The Group recognised derivative in the statements of financial position at fair value and recognised corresponding adjustments to retained earnings as at 1 January 2020, unless hedges accounting is applied. Gain or loss on derivatives under hedge accounting relating to effective portion are recognised to other components of equity while gain or loss of ineffective portion are recognised to retained earnings.



## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### (f) Other financial instruments

Other financial instruments did not change in measurement method which measured at amortised cost. On 1 January 2020 (the date of initial application) the carrying amounts of financial assets and financial liabilities were as follows.

	Consolidated financial statements Baht	Separate financial statements Baht
<b>Assets</b>		
<b>Current assets</b>		
Cash and cash equivalents	2,680,759,857	867,539,934
Trade and other receivables	881,914,261	228,418,729
Short-term loans to related parties	283,490,552	8,001,150,000
<b>Non-current assets</b>		
Contract assets	106,942,471	15,119,625
Deposit paid	4,641,546	-
Guarantee	7,703,306	-
<b>Liabilities</b>		
<b>Current liabilities</b>		
Short-term loans	4,410,819,143	2,645,819,143
Trade and other payables	2,250,911,018	1,120,986,447
Current portion of long-term loans	124,729,533	-
Current portion of debentures	9,534,908,490	5,536,530,961
Short-term loans from related parties	-	698,400,000
<b>Non-current liabilities</b>		
Long-term loans	1,374,343,972	-
Debentures	23,779,475,392	14,229,603,659
Deposits from long-term lease agreement	216,068,275	17,282,134

#### (g) Impairment of financial assets

The Group and the Company have following financial assets that are subject to the expected credit loss model:

- Cash and cash equivalents
- Trade and other receivables
- Loans to related parties

The Group was required to revise its impairment methodology under TFRS 9. The impact of the change in impairment methodology on the Group's and the Company's retained earnings at 1 January 2020.

While cash and cash equivalents and loans to related parties are subject to the new impairment requirement, the identified impact was immaterial.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### Trade receivables

The Group applies the simplified approach in measuring expected credit losses, which uses a lifetime expected loss allowance for all trade receivables.

To measure the expected credit losses, trade receivables have been grouped based on shared credit risk characteristics and the days past due. The expected loss rates are based on the historical payment profiles of sales, the corresponding historical credit losses experienced as well as forward-looking information that may affect the ability of the customers to settle the receivables.

As at 1 January 2020, the Group and the Company recognised additional loss allowance for trade receivables of Baht 4,450,790 and Baht 2,308,821, respectively.

The Group chose to apply the temporary measures to relieve the impact from COVID-19 announced by TFAC for the reporting periods ended between 1 January 2020 and 31 December 2020 by excluding forward-looking information in assessing the expected credit loss under the simplified approach of trade receivables. The expected credit loss for trade receivables were assessed based on historical credit loss together with the management's judgement in estimating the expected credit loss.

The loss allowance for trade receivables as at 1 January 2020 was determined as follows:

	Consolidated financial statements		Separate financial statements	
	Trade receivables and amounts due from related parties Baht	Loss allowance Baht	Trade receivables and amounts due from related parties Baht	Loss allowance Baht
Not yet due	756,152,249	(403,164)	217,034,142	-
Overdue				
Within 3 months	23,327,742	(1,203,989)	1,407,431	(59,363)
3 - 6 months	8,899,797	(2,275,915)	7,026,409	(409,083)
6 - 12 months	5,646,927	(3,985,315)	1,771,546	(103,379)
Over 12 months	33,648,875	(23,779,849)	2,124,623	(1,736,996)
<b>Total</b>	<b>827,675,590</b>	<b>(31,648,232)</b>	<b>229,364,151</b>	<b>(2,308,821)</b>

## 4.2 Leases

The Group recognised lease liabilities in relation to leases which had previously been classified as 'operating leases' under the principles of TAS 17 Leases. These liabilities were measured at the present value of the remaining lease payments, discounted using the lessee's incremental borrowing rate as at 1 January 2020. The weighted average lessee's incremental borrowing rate applied to the lease liabilities on 1 January 2020 was 1.88% - 4.50% per annum.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Consolidated financial statements Baht	Separate financial statements Baht
Operating lease commitments disclosed as at 31 December 2019	263,623,779	67,726,113
(Less): discounted using the lessee's incremental borrowing rate of at the date of initial application	(23,306,562)	(11,500,243)
Add: finance lease liabilities recognised as at 31 December 2019	221,632,073	1,142,400
(Less): short-term leases recognised on a straight-line basis as expense	(105,304,722)	-
(Less): low-value leases recognised on a straight-line basis as expense	(2,880)	-
(Less): contracts reassessed as service agreements	-	(43,319,558)
Add: adjustments as a result of a different treatment of extension and termination options	35,223,308	20,918,449
<b>Lease liabilities as at 1 January 2020</b>	<b>391,864,996</b>	<b>34,967,161</b>
Current lease liabilities	79,126,881	12,630,087
Non-current lease liabilities	312,738,115	22,337,074

The right-of use assets were measured at the amount equal to the lease liability, adjusted by the amount of any prepaid or accrued lease payments relating to that lease recognised in the statement of financial position as at 31 December 2019.

The Group has used the following practical expedients permitted by the standard:

- the use of a single discount rate to a portfolio of leases with reasonably similar characteristics
- the accounting for operating leases with a remaining lease term of less than 12 months as at 1 January 2020 as short-term leases
- the exclusion of initial direct costs for the measurement of the right-of-use asset at the date of initial application
- the use of hindsight in determining the lease term where the contract contains options to extend or terminate the lease, and
- elect not to reassess whether a contract is, or contains a lease as defined under TFRS 16 at the date of initial application but relied on its assessment made applying TAS 17 and TFRIC 4 Determining whether an Arrangement contains a Lease.

## 5 Accounting policies

### 5.1 Principles of consolidated and equity accounting

#### *Subsidiaries*

Subsidiaries are all entities over which the Group has control. The Group controls an entity when the Group is exposed to, or has rights to, variable returns from its involvement with the entity and has the ability to affect those returns through its power over the entity. Subsidiaries are consolidated from the date on which control is transferred to the Group until the date that control ceases.

In the separate financial statements, investments in subsidiaries are accounted for using cost method.

#### *Associates*

Associates are all entities over which the Group has significant influence but not control or joint control. Investments in associates are accounted for using the equity method of accounting.

In the separate financial statements, investments in associates are accounted for using cost method.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### *Joint arrangements*

Investments in joint arrangements are classified as either joint operations or joint ventures depending on the contractual rights and obligations of each investor, rather than the legal structure of the joint arrangements.

A joint venture is a joint arrangement whereby the Group has rights to the net assets of the arrangement. Interests in joint ventures are accounted for using the equity method.

In the separate financial statements, investments in joint ventures are accounted for using cost method.

### *Equity method*

The investment is initially recognised at cost which is consideration paid and directly attributable costs.

The Group's subsequently recognises shares of its associates and joint ventures' profits or losses and other comprehensive income in the profit or loss and other comprehensive income, respectively. The subsequent cumulative movements are adjusted against the carrying amount of the investment.

When the Group's share of losses in associates and joint ventures equals or exceeds its interest in the associates and joint ventures, the Group does not recognise further losses, unless it has incurred obligations or made payments on behalf of the associates and joint ventures.

### *Changes in ownership interests*

The Group treats transactions with non-controlling interests that do not result in a loss of control as transactions with equity owners of the Group. A difference between the amount of the adjustment to non-controlling interests to reflect their relative interest in the subsidiary and any consideration paid or received is recognised within equity.

If the ownership interest in associates and joint ventures is reduced but significant influence and joint control is retained, only a proportionate share of the amounts previously recognised in other comprehensive income is reclassified to profit or loss where appropriate. Profit or loss from reduce of the ownership interest in associates and joint ventures is recognise in profit or loss.

When the Group losses control, joint control or significant influence over investments, any retained interest in the investment is remeasured to its fair value, with the change in carrying amount recognised in profit or loss. The fair value becomes the initial carrying amount of the retained interest which is reclassified to investment in an associate, or a joint venture or a financial asset accordingly.

### *Intercompany transactions on consolidation*

Intra-group transactions, balances and unrealised gains on transactions are eliminated. Unrealised gains on transactions between the Group and its associates and joint ventures are eliminated to the extent of the Group's interest in the associates and joint ventures. Unrealised losses are also eliminated in the same manner unless the transaction provides evidence of an impairment of the asset transferred.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 5.2 Foreign currency translation

#### *Functional and presentation currency*

The financial statements are presented in Thai Baht, which is the Group's and the Company's functional and presentation currency.

#### *Transactions and balances*

Foreign currency transactions are translated into the functional currency using the exchange rates prevailing at the dates of the transactions or the date of revaluation where items are re-measured. Foreign exchange gains and losses resulting from the settlement of such transactions and from the translation at year-end exchange rates of monetary assets and liabilities denominated in foreign currencies are recognised in the profit or loss.

Any exchange component of gains and losses on a non-monetary item that recognised in profit or loss, or other comprehensive income is recognised following the recognition of a gain or loss on the non-monetary item.

#### *Group companies*

The operational results and financial position of the Group's entities (none of which has the currency of a hyper-inflationary economy) that have a different functional currency from the Group's presentation currency are translated into the presentation currency as follows.

- Assets and liabilities are translated at the closing rate at the date of respective statement of financial position;
- Income and expenses for statement of comprehensive income are translated at average exchange rates; and
- All resulting exchange differences are recognised in other comprehensive income.

### 5.3 Cash and cash equivalents

In the statements of cash flows, cash and cash equivalents includes cash on hand, deposits held at call, short-term highly liquid investments with maturities of three months or less from acquisition date and bank overdrafts.

In the statements of financial position, bank overdrafts are shown in current liabilities.

### 5.4 Trade accounts receivable

Trade receivables are amounts due from customers for goods sold or service performed in the ordinary course of business.

Trade receivables are recognised initially at the amount of consideration that is unconditional unless they contain significant financing components, they are recognised at fair value. The Group holds the trade receivables with the objective to collect the contractual cash flows and therefore measures them subsequently at amortised cost.

### 5.5 Real estate development costs

Real estate development costs are stated at the lower of cost and net realisable value. Real estate development costs comprise land costs, development costs, pre-fabricated factory costs, condominium construction costs, and finance costs on borrowings for projects development, pre-fabricated factory, condominium construction, land deposits and advances for construction costs. These costs are transferred to cost of sales when revenue from sales is recognised.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 5.6 Financial asset

For the year ended 31 December 2020

#### *Classification*

From 1 January 2020, the Group classifies its debt instrument financial assets in the following measurement categories depending on i) business model for managing the asset and ii) the cash flow characteristics of the asset whether they represent solely payments of principal and interest (SPPI).

- those to be measured subsequently at fair value (either through other comprehensive income or through profit or loss); and
- those to be measured at amortised cost.

The Group reclassifies debt investments when and only when its business model for managing those assets changes.

For investments in equity instruments, the Group has an irrevocable election at the time of initial recognition to account for the equity investment at fair value through profit or loss (FVPL) or at fair value through other comprehensive income (FVOCI) except those that are held for trading, they are measured at FVPL.

#### *Recognition and derecognition*

Regular way purchases, acquires and sales of financial assets are recognised on trade-date, the date on which the Group commits to purchase or sell the asset. Financial assets are derecognised when the rights to receive cash flows from the financial assets have expired or have been transferred and the Group has transferred substantially all the risks and rewards of ownership.

#### *Measurement*

At initial recognition, the Group measures a financial asset at its fair value plus, in the case of a financial asset not at FVPL, transaction costs that are directly attributable to the acquisition of the financial asset. Transaction costs of financial assets carried at FVPL are expensed in profit or loss.

Financial assets with embedded derivatives are considered in their entirety when determining whether the cash flows are solely payment of principal and interest. (SPPI)

#### *Debt instruments*

Subsequent measurement of debt instruments depends on the Group's business model for managing the asset and the cash flow characteristics of the financial assets. There are three measurement categories into which the Group classifies its debt instruments:

- **Amortised cost:** Financial assets that are held for collection of contractual cash flows where those cash flows represent solely payments of principal and interest are measured at amortised cost. Interest income from these financial assets is included in other income using the effective interest rate method. Any gain or loss arising on derecognition is recognised directly in profit or loss and presented in other gains/(losses) together with foreign exchange gains and losses. Impairment losses are presented as a separate line item in the statement of comprehensive income.
- **FVOCI:** Financial assets that are held for i) collection of contractual cash flows; and ii) for selling the financial assets, where the assets' cash flows represent solely payments of principal and interest, are measured at FVOCI. Movements in the carrying amount are taken through other comprehensive income (OCI), except for the recognition of impairment gains or losses, interest income using the effective interest method, and foreign exchange gains and losses which are recognised in profit or loss. When the financial assets is derecognised, the cumulative gain or loss previously recognised in OCI is reclassified from equity to profit or loss and recognised in other gains/(losses). Interest income is included in other income. Impairment expenses are presented separately in the statement of comprehensive income.
- **FVPL:** Financial assets that do not meet the criteria for amortised cost or FVOCI are measured at FVPL. A gain or loss on a debt investment that is subsequently measured at FVPL is recognised in profit or loss and presented net within other gains/(losses) in the period in which it arises.



# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### *Equity instruments*

The Group measures all equity investments at fair value. Where the Group has elected to present fair value gains and losses on equity instruments in OCI, there is no subsequent reclassification of fair value gains and losses to profit or loss following the derecognition of the investment. Dividends from such investments continue to be recognised in profit or loss as other income when the right to receive payments is established.

Changes in the fair value of financial assets at FVPL are recognised in other gains/(losses) in the statement of comprehensive income

Impairment losses (and reversal of impairment losses) on equity investments are reported together with changes in fair value.

The Group presents its investments in Real Estate Investment Trust units established and registered in Thailand as equity investments and measures them at FVOCI following the TFAC's clarification, "Interpretation of investments in Property Fund unit trusts, Real Estate Investment Trust units, Infrastructure Fund units, and Infrastructure Trust units established and registered in Thailand" dated 25 June 2020. The trust is required to distribute benefits of not less than 90% of its adjusted net profit.

The Group chose to apply the temporary measures to relieve the impact from COVID-19 announced by TFAC for the reporting periods ended between 1 January 2020 and 31 December 2020 by measuring the fair value of its unquoted equity investments at the end of the reporting period at the same amount as the investments' fair value on 1 January 2020 (the date of initial application of TFRS 9). As a result, the equity investments measured at FVPL as at 31 December 2020 was presented at their fair value as at 1 January 2020. No gain or loss from changes in fair value was recognised.

### *Derivatives and hedging activities*

The Group recognised derivative in the statements of financial position at fair value unless hedges accounting is applied. Gain or loss on derivatives under hedge accounting relating to effective portion are recognised to other components of equity while gain or loss of ineffective portion are recognised to statement of comprehensive income.

### *Impairment*

From 1 January 2020, the Group assesses on a forward looking basis the expected credit loss associated with its debt instruments carried at amortised cost and FVOCI. The impairment methodology applied depends on whether there has been a significant increase in credit risk.

For trade receivables, the Group applies the simplified approach, which requires expected lifetime losses to be recognised from initial recognition of the receivables.

The Group chose to apply the temporary measures to relieve the impact from COVID-19 announced by TFAC for the reporting periods ended between 1 January 2020 and 31 December 2020 by excluding forward-looking information in assessing the expected credit loss under the simplified approach of trade receivables and lease receivables. However, The Group applied historical credit loss adjusted with the management's judgement in estimating the expected credit loss.

For the year ended 31 December 2019

### *Short-term investments*

Short-term investments comprise fixed deposits that have maturity between 3 and 12 months from the date of acquisition which are carried at amortised cost and investments in debt mutual fund which are initially recognised at cost, which are equal to the fair value of consideration paid plus transaction cost and are subsequently measured at fair value. The fair value of investment is based on Net Asset Value (NAV) announced by the Asset Management Company. The unrealised gains and losses of investments are recognised in other comprehensive income.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### *Investments in debt and equity securities*

Investments other than investments in subsidiaries, associates and joint ventures are initially recognised at fair value of consideration paid plus direct transaction cost.

### *Available-for-sale investments*

Available-for-sale investments are subsequently measured at fair value. The unrealised gains and losses of available for sale investments are recognised in other comprehensive income and are subsequently reclassified to profit or loss when the investment is disposed.

### *General investments*

General investments are carried at cost less impairment.

### *Disposal of investments*

On a disposal of an investment, the difference between the net disposal proceeds and the carrying amount (including cumulative changes in fair value recognised in equity) is recognised to the profit or loss. When the Group disposes an investment partially, the carrying amount of the disposed part is determined by the weighted average method.

## **5.7 Non-current assets held-for-sale**

Non-current assets (or disposal groups) are classified as assets held-for-sale when their carrying amount will be recovered principally through a sale transaction and a sale is considered highly probable. They are measured at the lower of the carrying amount and fair value less costs to sell.

In addition, the Group will also classify other assets and liabilities related to assets held for sale which comprise leasehold rights, deferred income from operating lease agreement and other non-current assets as non-current assets held for sale, and long-term loans, interest payable, deposits from long-term lease agreement and deferred expenses from operating lease agreement as liabilities directly associated with assets classified as held for sale since they will be disposed when the assets are sold.

## **5.8 Investment properties**

Group's investment properties are properties held for long-term rental yields or for capital appreciation and are not occupied by the Group, also include properties that are being constructed or developed for future use as investment properties.

Investment property is measured initially at cost, including directly attributable costs and borrowing costs. Subsequently, they are carried at cost less accumulated depreciation and impairment.

Subsequent costs are included in the asset's carrying amount, only when it is probable that future economic benefits associated with the item will flow to the Group capitalised where there is future economic benefits. The carrying amount of the replaced part is derecognised.

Land is not depreciated. Depreciation on other investment properties is calculated using the straight-line method to allocate their costs to their residual values over their estimated useful lives, or the straight-line method over the shorter of the asset's useful life and the lease term, for the right-of-use asset, as follows:

Rights-of-use land	8 - 31 years
Buildings and warehouses	20 - 30 years
Building improvements	5 - 25 years
Utilities systems	10 years

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 5.9 Property, plant and equipment

All other property, plant and equipment are stated at historical cost less accumulated depreciation and impairment losses. Historical cost includes expenditure that is directly attributable to the acquisition of the items.

Subsequent costs are included in the asset's carrying amount, only when it is probable that future economic benefits associated with the item will flow to the Group capitalised where there is future economic benefits. The carrying amount of the replaced part is derecognised.

All other repairs and maintenance are charged to profit or loss when incurred.

Land is not depreciated. Depreciation on other assets is calculated using the straight-line method to allocate their cost to their residual values over their estimated useful lives, or the straight-line method over the shorter of the asset's useful life and the lease term, for the right-of-use asset, as follows:

Building improvements	1 - 30 years
Utilities systems	5 - 25 years
Office equipment	2 - 15 years
Warehouse equipment	5 years
Vehicles	2 - 5 years
Assets for rent	1 - 5 years

The assets' residual values and useful lives are reviewed, and adjusted if appropriate, at the end of each reporting period.

Gains or losses on disposals are determined by comparing the proceeds with the carrying amount and are recognised in profit or loss.

### 5.10 Intangible assets

Exclusive right, which has an indefinite useful life will be no reassessment on the asset value. Amortisation is reassessment on an annual basis, adjusted for impairment, if any.

### 5.11 Goodwill

Goodwill is tested for impairment annually, or more frequently if events or changes in circumstances indicate that it might be impaired, and is carried at cost less accumulated impairment losses.

For the purpose of impairment testing, goodwill is allocated to cash-generating units or groups of cash-generating units that are expected to benefit from the business combination in which the goodwill arose. The units or groups of units are identified at the lowest level at which goodwill is monitored for internal management purposes.

### 5.12 Impairment of assets

Assets are reviewed for impairment whenever there is an indication of impairment. An impairment loss is recognised for the amount by which the carrying amount of the assets exceeds its recoverable amount. The recoverable amount is the higher of an asset's fair value less costs of disposal and value in use.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 5.13 Leases

For the year ended 31 December 2020

#### *Leases - where the Group is the lessee*

Leases are recognised as a right-of-use asset and a corresponding liability at the date at which the leased asset is available for use by the Group. Each lease payment is allocated between the liability and finance cost. The finance cost is charged to profit or loss over the lease period so as to produce a constant periodic rate of interest on the remaining balance of the liability for each period. The right-of-use asset is depreciated over the shorter of the asset's useful life and the lease term on a straight-line basis.

Contracts may contain both lease and non-lease components. The Group allocates the consideration in the contract to the lease and non-lease components based on their relative stand-alone prices. However, for leases of real estate for which the group is a lessee, it has elected not to separate lease and non-lease components and instead accounts for these as a single lease component.

Assets and liabilities arising from a lease are initially measured on a present value basis. Lease liabilities include the net present value of the following lease payments:

- fixed payments (including in-substance fixed payments), less any lease incentives receivable
- variable lease payment that are based on an index or a rate
- amounts expected to be payable by the lessee under residual value guarantees
- the exercise price of a purchase option if the lessee is reasonably certain to exercise that option, and
- payments of penalties for terminating the lease, if the lease term reflects the lessee exercising that option.

Lease payments to be made under reasonably certain extension options are also included in the measurement of the liability.

The lease payments are discounted using the interest rate implicit in the lease. If that rate cannot be determined, the lessee's incremental borrowing rate is used, being the rate that the lessee would have to pay to borrow the funds necessary to obtain an asset of similar value in a similar economic environment with similar terms and conditions.

The group is exposed to potential future increases in variable lease payments based on an index or rate, which are not included in the lease liability until they take effect. When adjustments to lease payments based on an index or rate take effect, the lease liability is reassessed and adjusted against the right-of-use asset.

Right-of-use assets are measured at cost comprising the following:

- the amount of the initial measurement of lease liability
- any lease payments made at or before the commencement date less any lease incentives received
- any initial direct costs, and
- restoration costs.

Right-of-use assets are presented in property, plant and equipment, except right-of-use assets that meet the definition of investment properties which are presented in investment properties in the statement of financial position.

Payments associated with short-term leases and leases of low-value assets are recognised on a straight-line basis as an expense in profit or loss. Short-term leases are leases with a lease term of 12 months or less.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### *Leases - where the Group is the lessor*

When assets are leased out under a finance lease, the present value of the lease payments is recognised as a receivable. The difference between the gross receivable and the present value of the receivable is recognised as unearned finance income. Lease income is recognised over the term of the lease which reflects a constant periodic rate of return. Initial direct costs are included in initial measurement of the finance lease receivable and reduce the amount of income recognised over the lease term.

Rental income under operating leases (net of any incentives given to lessees) is recognised on a straight-line basis over the lease term. Initial direct costs incurred in obtaining an operating lease are added to the carrying amount of the underlying asset and recognised as expense over the lease term on the same basis as lease income. The respective leased assets are included in the statement of financial position based on their nature.

### For the year ended 31 December 2019

### *Leases - where the Group is the lessee*

Payments made under operating leases (net of any incentives received from the lessor) are charged to profit or loss on a straight-line basis over the period of the lease.

At the inception of finance lease, the lower of the fair value of the leased property and the present value of the minimum lease payments is capitalised. Each lease payment is allocated between the liability and finance charges to achieve a constant rate on the liabilities balance outstanding. The corresponding rental obligations is presented net of finance charges. Finance cost is charged to profit or loss over the lease period.

### *Leases - where the Group is the lessor*

When assets are leased out under a finance lease, the present value of the lease payments is recognised as a receivable. The difference between the gross receivable and the present value of the receivable is recognised as unearned finance income. Lease income is recognised over the term of the lease which reflects a constant periodic rate of return. Initial direct costs are included in initial measurement of the finance lease receivable and reduce the amount of income recognised over the lease term.

Rental income under operating leases (net of any incentives given to lessees) is recognised on a straight-line basis over the lease term.

## 5.14 Financial liabilities

### *Classification*

Financial instruments issued by the Group are classified as either financial liabilities or equity securities by considering contractual obligations.

- Where the Group has an unconditional contractual obligation to deliver cash or another financial asset to another entity, it is considered a financial liability unless there is a predetermined or possible settlement for a fixed amount of cash in exchange of a fixed number of the Group's own equity instruments.
- Where the Group has no contractual obligation or has an unconditional right to avoid delivering cash or another financial asset in settlement of the obligation, it is considered an equity instrument.

Borrowings are classified as current liabilities unless the Group has an unconditional right to defer settlement of the liability for at least 12 months after the reporting date.

### *Measurement*

Financial liabilities are initially recognised at fair value and are subsequently measured at amortised cost.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### *Derecognition and modification*

Financial liabilities are derecognised when the obligation specified in the contract is discharged, cancelled, or expired.

Where the terms of a financial liability are renegotiated/modified, the Group assesses whether the renegotiation / modification results in the derecognition of that financial liability. Where the modification results in an extinguishment, the new financial liability is recognised based on fair value of its obligation. The remaining carrying amount of financial liability is derecognised. The difference as well as proceed paid is recognised as other gains/(losses) in profit or loss.

Where the modification does not result in the derecognition of the financial liability, the carrying amount of the financial liability is recalculated as the present value of the renegotiated / modified contractual cash flows discounted at its original effective interest rate. The difference is recognised in other gains/(losses) in profit or loss.

### **5.15 Borrowing costs**

General and specific borrowing costs directly attributable to the acquisition, construction or production of qualifying assets are added to the cost of those assets less investment income earned from those specific borrowings. The capitalisation of borrowing costs is ceased when substantially all the activities necessary to prepare the qualifying asset for its intended use or sale are complete.

Other borrowing costs are expensed in the period in which they are incurred.

### **5.16 Deferred revenue**

Cash received from sales of real estate to Real Estate Investment Trust but was not recognised since the Group entered into agreements to guarantee the minimum rental and service income from sale of real estate with no lessees for a period of 1 to 25 years and guarantee the minimum EBITDA of the relevant projects for a period of 6 to 9 years. Revenue will be recognised based on the present value of the discounted cash flows which pay to the trust.

Cash received from land leasehold right to Real Estate Investment Trust for a lease term of 30 years and renew 30 years, totally 60 years. Revenue will be recognised based on the present value of the monthly revenue installments.

### **5.17 Current and deferred income taxes**

The tax expense for the period comprises current and deferred tax. Tax is recognised in profit or loss, except to the extent that it relates to items recognised in other comprehensive income or directly in equity.

#### *Current tax*

The current income tax is calculated on the basis of the tax laws enacted or substantively enacted at the end of the reporting period. Management periodically evaluates positions taken in tax returns with respect to situations in which applicable tax regulation is subject to interpretation. It establishes provisions where appropriate on the basis of amounts expected to be paid to the tax authorities.



# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### *Deferred income tax*

Deferred income tax is recognised on temporary differences arising from differences between the tax base of assets and liabilities and their carrying amounts in the financial statements. However, deferred income tax is not recognised for temporary differences arise from:

- initial recognition of an asset or liability in a transaction other than a business combination that affects neither accounting nor taxable profit or loss is not recognized
- investments in subsidiaries, associates and joint arrangements where the timing of the reversal of the temporary difference is controlled by the Group and it is probable that the temporary difference will not reverse in the foreseeable future.

Deferred income tax is measured using tax rates of the period in which temporary difference is expected to be reversed, based on tax rates and laws that have been enacted or substantially enacted by the end of the reporting period.

Deferred tax assets are recognised only to the extent that it is probable that future taxable profit will be available against which the temporary differences can be utilised.

Deferred tax assets and liabilities are offset when there is a legally enforceable right to offset current tax assets and liabilities and when the deferred tax balances relate to the same taxation authority. Current tax assets and tax liabilities are offset where the entity has a legally enforceable right to offset and intends either to settle on a net basis, or to realise the asset and settle the liability simultaneously.

## 5.18 Employee benefits

### *Short-term employee benefits*

Liabilities for short-term employee benefits are expected to be settled wholly within 12 months after the end of the period are recognised in respect of employees' service up to the end of the reporting period. They are measured at the amount expected to be paid.

### *Defined contribution plan*

The Group pays contributions to a separate fund. The Group has no further payment obligations once the contributions have been paid. The contributions are recognised as employee benefit expense when they are due.

### *Defined benefit plans*

Amount of retirement benefits is defined by the agreed benefits the employees will receive after the completion of employment. It usually depends on factors such as age, years of service and an employee's latest compensation at retirement.

The defined benefit obligation is calculated by an independent actuary using the projected unit credit method. The present value of the defined benefit obligation is determined by discounting the estimated future cash outflows using market yield of government bonds that matches the terms and currency of the expected cash outflows.

Remeasurement gains and losses are recognised directly to other comprehensive income in the period in which they arise. They are presented as a separate item in statements of changes in equity.

Past-service costs are recognised immediately in profit or loss.

## 5.19 Provisions

Provisions are recognised when the Group has a present legal or constructive obligation as a result of past events; it is probable that an outflow of resources will be required to settle the obligation; and the amount has been reliably estimated.

Provisions are measured at the present value of the expenditures expected to be required to settle the obligation. The increase in the provision due to passage of time is recognised as interest expense.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 5.20 Share capital

Ordinary shares are classified as equity.

Incremental costs directly attributable to the issue of new shares (net of tax) are shown as a deduction in equity.

### 5.21 Revenue recognition

Revenue include all revenues from ordinary business activities. All ancillary income in connection with the delivery of goods and rendering of services in the course of the Group's ordinary activities is also presented as revenue.

Revenue are recorded net of value added tax. They are recognised in accordance with the provision of goods or services, provided that collectibility of the consideration is probable.

Multiple element arrangements involving delivery or provision of multiple products or services are separated into distinct performance obligations. Total transaction price of the bundled contract is allocated to each performance obligation based on their relative standalone selling prices or estimated standalone selling prices. Each performance obligation is recognised as revenue on fulfillment of the obligation to the customer.

#### *Leases and services*

The Group recognised revenues from leases and services contracts with a continuous service provision as revenue on a straight line basis over the contract term, regardless of the payment pattern.

#### *Sales of real estate*

The Group recognises revenues from sales of real estate when control over the property has been transferred to the customer. The properties have generally no alternative use for the Group due to contractual restrictions. However, an enforceable right to payment does not arise until legal title has passed to the customer. Therefore, revenue is recognised at a point in time when the legal title has passed to the customer.

The revenue is measured at the transaction price agreed under the contract. In most cases, the consideration is due when legal title has been transferred. While deferred payment terms may be agreed in rare circumstances, the deferral never exceeds 12 months. The transaction price is therefore not adjusted for the effects of a significant financing component.

#### *Sales of goods*

The Group recognises revenues from sales of goods when the Group sells a product to the customer.

#### *Contract assets and contract liabilities*

A contract asset is recognised where the Group recorded revenue for fulfillment of a contractual performance obligation before the customer paid consideration or before the requirements for billing.

A contract liability is recognised when the customer paid consideration or a receivable from the customer that is due before the Group fulfilled a contractual performance obligation.

For each customer contract, contract liabilities is set off against contract assets.

#### *Payments to customers*

Payments to customers or on behalf of customers to other parties, including credited or subsequent discounts, are recognised as a reduction in revenue unless the payment constitutes consideration of a distinct goods or service from the customer.

#### *Financing components*

The Group does not expect to have any contracts where the period between the transfer of the promised goods or services to the customer and payment by the customer exceeds one year. As a consequence, the Group does not adjust any of the transaction prices for the time value of money.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 5.22 Dividend distribution

Dividend distributed to the Company's shareholders is recognised as a liability when interim dividends are approved by the Board of Directors, and when the annual dividends are approved by the company's shareholders' meeting.

## 6 Financial risk management

### 6.1 Financial risk factors

The Group exposes to a variety of financial risks: market risk (currency risk, fair value risk and price risk), credit risk and liquidity risk. The Group's overall risk management programme focuses on the unpredictability of financial markets and seeks to minimise potential adverse effects on the Group's financial performance. The board of directors provides written principles for overall risk management which is carried out by a central treasury department (the Group treasury), including identification, evaluation and hedge of financial risks in close co-operation with operating units.

#### *Foreign exchange risk*

Since the core business of the Group's associates is production and distribution of electricity with partial sources of loans denominated in foreign currencies, the Group's share of profit from associate is exposed to foreign currency risk from the borrowings. The associates seek to reduce this risk by entering derivative financial instruments to hedge foreign currency exposure when they consider appropriate.

#### *Interest rate risk*

The Group has interest rate risk from borrowings and debentures at fixed and floating interest rates. The Group has no significant interest-bearing assets.

All interest rate derivative transactions are subject to approval by the finance director before execution. The Group uses interest rate swaps as cash flow hedges of future variable borrowings' interest payments. The Group agrees with the other parties to exchange, quarterly, the difference between fixed contract rates and floating rate interest amounts calculated by reference to the agreed notional principal amounts.

#### *Credit risk*

The Group has no significant concentrations of credit risk. The Group has policies in place to ensure that contracts are made with customers who have an appropriate credit history, limiting customers' credit limit as well as obtaining appropriate guarantees from customers. Derivative counterparties and deposits are limited to high credit quality financial institutions. The Group has policies that limit the amount of credit exposure to any one financial institution.

#### *Liquidity risk*

The Group manages sufficient cash and marketable securities, the availability of funding through an adequate amount of committed credit facilities, and the ability to close out market positions.

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The tables below analyse the maturity of financial liabilities grouping based on their contractual maturities as at 31 December 2020. The amounts disclosed are the contractual undiscounted cash flows. Balances due within 12 months equal their carrying balances as the impact of discounting is not significant.

Consolidated financial statements						
	On demand Million Baht	Within 1 year Million Baht	1-5 years Million Baht	Over 5 years Million Baht	Total Million Baht	Carrying amount Million Baht
Short-term loans	-	1,959	-	-	1,959	1,947
Trade and other payables	2,073	-	-	-	2,073	2,073
Long-term loans	-	1,587	9,911	-	11,498	10,972
Debentures	-	9,245	19,599	2,127	30,971	28,335
Lease liabilities	-	85	275	75	435	372
Deposits from long-term lease agreement	1	47	73	86	207	207
<b>Total</b>	<b>2,074</b>	<b>12,923</b>	<b>29,858</b>	<b>2,288</b>	<b>47,143</b>	<b>43,906</b>

Separate financial statements						
	On demand Million Baht	Within 1 year Million Baht	1-5 years Million Baht	Over 5 years Million Baht	Total Million Baht	Carrying amount Million Baht
Short-term loans	-	1,959	-	-	1,959	1,947
Trade and other payables	753	-	-	-	753	753
Short-term loans from related parties	927	-	-	-	927	915
Long-term loans	-	1,025	2,600	-	3,625	3,499
Debentures	-	4,583	15,018	407	20,008	18,325
Lease liabilities	-	4	11	53	68	41
Deposits from long-term lease agreement	1	3	10	21	35	35
<b>Total</b>	<b>1,681</b>	<b>7,574</b>	<b>17,639</b>	<b>481</b>	<b>27,375</b>	<b>25,515</b>

### Capital management

The objectives when managing capital are to safeguard their ability to continue as a going concern, to provide returns for shareholders and benefits for other stakeholders, and maintain an optimal capital structure to reduce the cost of capital.

In order to maintain or adjust the capital structure, the Group may adjust the amount of dividends paid to shareholders, return capital to shareholders, issue new shares or sell assets to reduce debt.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 6.2 Accounting for derivative financial instruments and hedging activities

The Group is a party to derivative financial instruments, which comprise interest rate swap agreements. Such instruments are not recognised in the financial statements on inception.

Any differential to be paid or received on an interest rate swap agreement is recognised as a component of interest revenue or expense when due. Gains and losses on early termination of interest rate swaps or on repayment of the borrowing are recognised in profit or loss.

### 6.3 Fair value

The fair values of the financial assets and liabilities are disclosed in relevant notes.

Fair values are categorised into hierarchy based on inputs used as follows:

- Level 1: The fair value of financial instruments is based on the current bid price / closing price by active markets such as the Stock Exchange of Thailand / the Thai Bond Dealing Centre.
- Level 2: The fair value of financial instruments is determined using significant observable inputs and, as little as possible, entity-specific estimates.
- Level 3: The fair value of financial instruments is not based on observable market data.

## 7 Critical accounting estimates and judgements

Estimates and judgements are continually evaluated and are based on historical experience and other factors, including expectations of future events that are believed to be reasonable under the circumstances.

### *Fair value of certain financial assets and derivatives*

The fair value of financial instruments that are not traded in an active market is determined using valuation techniques. The Group uses judgement to select a variety of methods and make assumptions that are mainly based on market conditions existing at the end of each reporting period. Details of key assumptions used.

### *Goodwill impairment*

The recoverable amounts of cash-generating units have been determined based on value-in-use calculations. The calculations use cash flow projections based on financial budget approved by management covering a five-year period.

Cash flows beyond the five-year period are extrapolated using the estimated growth rates stated in note 17. These growth rates are consistent with forecasts included in industry reports specific to the industry in which each CGU operates.

### *Defined retirement benefit obligations*

The present value of the retirement benefit obligations depends on a number of assumptions. Key assumptions used and impacts from possible changes in key assumptions are disclosed in note 23.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### *Determination of lease terms*

Critical judgement in determining the lease term, the Group considers all facts and circumstances that create an economic incentive to exercise an extension option, or not exercise a termination option. Extension options (or periods after termination options) are only included in the lease term if the lease is reasonably certain to be extended (or not terminated).

For leases of properties, the most relevant factors are historical lease durations, the costs and conditions of leased assets.

Most extension options on offices and vehicles leases have not been included in the lease liability, because the Group considers i) the underlying asset condition and/or ii) insignificant cost to replace the leased assets.

The lease term is reassessed if an option is actually exercised (or not exercised) or the Group becomes obliged to exercise (or not exercise) it. The assessment of reasonable certainty is only revised if a significant event or a significant change in circumstance affecting this assessment occur, and that it is within the control of the Group.

### *Determination of discount rate applied to leases*

The Group determines the incremental borrowing rate as follows:

- Where possible, use recent third-party financing received by the individual lessee as a starting point, adjusting to reflect changes in its financing conditions.
- Make adjustments specific to the lease, e.g. term, country, currency and security.

### *Impairment of financial assets*

The loss allowances for financial assets are based on assumptions about default risk and expected loss rates. The Group uses judgement in making these assumptions and selecting the inputs used in the impairment calculation, based on the Group's past history and existing market conditions, as well as forward-looking estimates at the end of each reporting period.

## 8 Segment information

The Group's strategic steering committee, consisting of Board of Directors, examines the Group's performance both from a product and geographic perspective and has identified 7 reportable segments.

The steering committee primarily uses a measure of segments' revenue and gross margin to assess the performance of the operating segments. However, some assets and liabilities are not allocated to segment because the Group manages centrally.

Revenues from 2 customers (2019: 2 customers) of the domestic real estate business segment are amounting to Baht 1,065.87 million and Baht 1,054.31 million, respectively (2019: Baht 2,102.61 million and Baht 1,617.45 million, respectively).



## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

Incomes and profits information by business segment are as follows:

	2020							
	Domestic				Overseas			
	Real estate business Baht	Power business Baht	Water business Baht	Other business Baht	Real estate business Baht	Water business Baht	Other business Baht	Total Baht
Revenues from leases and services	1,262,026,327	53,890,956	145,656,674	359,162,890	21,167,907	-	-	1,841,904,754
Revenues from sales of real estate	3,138,443,705	-	-	-	396,722,155	-	-	3,535,165,860
Revenues from sales	997,960	-	1,492,172,402	43,892,981	-	171,250	-	1,537,234,593
Total revenues from sales and services	4,401,467,992	53,890,956	1,637,829,076	403,055,871	417,890,062	171,250	-	6,914,305,207
Profit (loss) from operations	997,767,636	17,757,083	495,814,871	188,869,752	100,337,678	59,387,835	(82,295,094)	1,777,639,761
Other income	1,049,225,167	71,815,702	7,442,087	1,537,104	153,482,269	400	71,685	1,283,574,414
Finance costs	(711,080,647)	(214,561,640)	(77,915,733)	(10,599,661)	-	(98,127,759)	-	(1,112,285,440)
Share of profit (loss) from associates and joint ventures	366,203,649	1,009,486,194	-	(7,233,593)	-	(159,692,188)	-	1,208,764,062
Income tax	(205,663,073)	(6,296,227)	(784,302)	(44,655,055)	(30,641,354)	(4,876,330)	(12,822)	(292,929,163)
Profit (loss) for the year	1,496,452,732	878,201,112	424,556,923	127,918,547	223,178,593	(203,308,042)	(82,236,231)	2,864,763,634
Profit attributable to non-controlling interests								(341,013,704)
Profit attributable to owners of the parent								2,523,749,930
Segment depreciation and amortisation	296,702,851	34,073,860	173,941,987	73,329,637	13,408,081	527,898	334,986	592,319,300



# WILLIAMS CORP.

For the year ended 31 December 2020

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## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

Assets and liabilities information by business segment are as following:

	2020						
	Domestic			Overseas			
	Real estate business Baht	Power business Baht	Water business Baht	Other business Baht	Real estate business Baht	Water business Baht	Other business Baht
Non-current assets							
Segment non-current assets	26,329,620,197	14,723,509,325	9,439,962,260	975,206,991	351,843,743	2,403,086,021	1,568,927
Unallocated non-current assets							54,224,797,464
							4,249,788,438
Other assets							
Segment other assets	14,466,625,418	652,716,778	1,563,822,457	165,551,927	687,102,161	17,474,463	85,500,910
Unallocated other assets							17,638,794,114
							6,507,728,344
Total assets							82,621,108,360
Segment liabilities	11,458,223,556	269,527,212	1,388,429,891	542,179,926	100,351,719	2,644,186,006	6,202,621
Unallocated liabilities							16,409,100,931
							34,044,840,941
Total liabilities							50,453,941,872
	2019						
	Domestic			Overseas			
	Real estate business Baht	Power business Baht	Water business Baht	Other business Baht	Real estate business Baht	Water business Baht	Other business Baht
Non-current assets							
Segment non-current assets	24,004,904,260	15,507,764,354	8,859,916,232	910,336,316	605,513,900	2,760,461,450	1,504,463
Unallocated non-current assets							52,650,400,975
							4,247,035,133
Other assets							
Segment other assets	14,337,424,418	1,020,081,200	992,769,922	61,810,163	504,122,968	38,265,047	77,161,848
Unallocated other assets							17,031,635,566
							8,334,759,182
Total assets							82,263,830,856
Segment liabilities	11,058,077,845	234,850,253	1,363,286,003	308,507,809	114,180,722	1,782,052,050	246,532,768
Unallocated liabilities							15,107,487,450
							34,055,762,225
Total liabilities							49,163,249,675

Non-current assets presented above are non-current assets other than financial instruments and deferred tax assets.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 9 Cash and cash equivalents

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Cash on hand	10,281,985	7,761,469	504,214	534,490
Short-term bank deposits	3,784,166,289	2,672,998,388	468,593,043	867,005,444
<b>Total</b>	<b>3,794,448,274</b>	<b>2,680,759,857</b>	<b>469,097,257</b>	<b>867,539,934</b>

The interest rates on deposits are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Percentage	2019 Percentage	2020 Percentage	2019 Percentage
Short-term bank deposits	0.05 - 1.25	0.10 - 1.25	0.05 - 0.45	0.10 - 0.60

### 10 Trade and other receivables

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Trade receivables	278,492,864	232,129,204	5,023,933	14,518,850
Trade receivables - related parties (Note 33)	23,359,435	28,712,861	627,755	332,342
<u>Less</u> Loss allowance (2019: Allowance for doubtful accounts under TAS 101)	(22,869,740)	(27,197,442)	(4,107,145)	-
Trade receivables, net	278,982,559	233,644,623	1,544,543	14,851,192
Other receivables - related parties (Note 33)	1,911,876	566,833,525	213,798,881	214,512,959
Prepaid expenses	68,067,305	31,262,376	10,092,327	6,607,580
Accrued income	94,485,535	67,066,231	45,212	852,662
Others	17,117,967	22,037,553	1,188,124	510,737
<b>Total</b>	<b>460,565,242</b>	<b>920,844,308</b>	<b>226,669,087</b>	<b>237,335,130</b>

Due to the short-term nature of the current receivables, their carrying amount is considered to be the same as their fair value.

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### Impairments of trade receivables

The loss allowance for trade receivables as at 31 December 2020 was determined as follows:

	Consolidated financial statements		Separate financial statements	
	Trade receivables and amounts due from related parties Baht	Loss allowance Baht	Trade receivables and amounts due from related parties Baht	Loss allowance Baht
Within due	236,548,528	(276,383)	841,519	(481)
Overdue				
Up to 3 months	37,080,178	(1,355,492)	321,071	-
3 - 6 months	2,682,396	(311,644)	-	(5,192)
6 - 12 months	4,946,015	(955,374)	-	-
Over 12 months	20,595,182	(19,970,847)	4,489,098	(4,101,472)
<b>Total</b>	<b>301,852,299</b>	<b>(22,869,740)</b>	<b>5,651,688</b>	<b>(4,107,145)</b>

The reconciliations of loss allowance for trade receivables for the year ended 31 December are as follow:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>As at 31 December - calculated under TAS 101</b>	27,197,442	23,305,831	-	-
Amounts restated through opening retained earnings	4,450,790	-	2,308,821	-
Opening loss allowance as at 1 January 2020 - calculated under TFRS 9 (2019: calculated under TAS 101)	31,648,232	23,305,831	2,308,821	-
Increase in loss allowance recognised in profit or loss during the year	(7,089,018)	3,891,611	1,798,324	-
Receivable written off during the year as uncollectible	(1,689,474)	-	-	-
<b>As at 31 December - calculated under TFRS 9 (2019: calculated under TAS 101)</b>	<b>22,869,740</b>	<b>27,197,442</b>	<b>4,107,145</b>	<b>-</b>

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 11 Financial assets and financial liabilities

As at 31 December 2020, classification of the Group's financial assets and financial liabilities are as follows:

	Consolidated financial statements		
	FVPL Baht	FVOCI Baht	Amortised cost Baht
<b>Assets</b>			
<b>Current assets</b>			
Cash and cash equivalents	-	-	3,794,448,274
Trade and other receivables	-	-	370,866,360
Short-term loans to related parties	-	-	39,500,000
Fixed deposit	-	-	695,276
<b>Non-current assets</b>			
Unquoted equity investments	714,000,171	-	-
Real Estate Investment Trust	-	6,600,367,148	-
Long-term loans to related parties	-	-	248,490,552
Contract assets	-	-	116,814,113
Deposit paid	-	-	7,203,629
Guarantee	-	-	6,966,495
<b>Liabilities</b>			
<b>Current liabilities</b>			
Short-term loans	-	-	1,946,862,888
Trade and other payables	-	-	1,649,585,784
Current portion of long-term loans	-	-	1,369,230,251
Current portion of debentures	-	-	8,404,852,012
Current portion of lease liabilities	-	-	72,414,881
<b>Non-current liabilities</b>			
Long-term loans	-	-	9,602,982,354
Debentures	-	-	19,929,740,333
Lease liabilities	-	-	299,777,409
Deposits from long-term lease agreement	-	-	207,202,028



## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements		
	FVPL Baht	FVOCI Baht	Amortised cost Baht
<b>Assets</b>			
<b>Current assets</b>			
Cash and cash equivalents	-	-	469,097,257
Trade and other receivables	-	-	216,576,761
Short-term loans to related parties	-	-	8,240,500,000
<b>Non-current assets</b>			
Real Estate Investment Trust	-	5,635,941,676	-
Contract assets	-	-	16,554,913
<b>Liabilities</b>			
<b>Current liabilities</b>			
Short-term loans	-	-	1,946,862,888
Trade and other payables	-	-	913,512,392
Current portion of long-term loans	-	-	999,447,639
Current portion of debentures	-	-	3,999,168,755
Short-term loans from related parties	-	-	915,400,000
Current portion of lease liabilities	-	-	3,177,238
<b>Non-current liabilities</b>			
Long-term loans	-	-	2,500,000,000
Debentures	-	-	14,325,654,123
Lease liabilities	-	-	38,036,891
Deposits from long-term lease agreement	-	-	35,354,893

Due to the current portion of financial assets and liabilities measured at amortised cost nature of the current assets and current liabilities, their carrying amount is considered to be the same as their fair value. For the non-current financial liabilities, the fair values are disclosed in relevant notes.

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The fair values of Real Estate Investment Trust are based on last quoted bid price by reference to the Stock Exchange of Thailand or Net Asset Value (NAV) announced by the Asset Management Company. The fair values are within level 1 of the fair value hierarchy.

The fair values of unquoted equity investments are within level 3 of the fair value hierarchy.

Management and valuation teams discuss valuation processes and results quarterly.

Fair value of unquoted equity investments is determined using valuation techniques as follows:

- 1) Comparable companies market multiples which is estimated based on public companies' enterprise value that, are in opinion of the Group, in a comparable financial position with the counterparty in the contract.
- 2) Valuation techniques based on Net Asset Value (NAV) which is estimated based on the issuance entities' enterprise value.

The following table summarises the quantitative information about the significant unobservable inputs used in level 3 fair value measurements and relationship of unobservable inputs to fair value.

Consolidated financial statements				
Change in fair value				
Range of inputs	Movement	Increase in inputs	Decrease in inputs	
	Baht			
Adjusted EBITDA	13 - 125 million	1%	Increase by 0.9%	Decrease by 0.9%
Discount for lack of marketability	15%	1%	Decrease by 0.6%	Increase by 0.6%
Adjusted net asset value	Baht 6,575 million	1%	Increase by 0.5%	Decrease by 0.5%

The Group did not have any transfers between levels during the period.

### Amounts recognised in profit or loss and other comprehensive income

Consolidated financial statements				
2020		2019		
Profit or loss	Other comprehensive income	Profit or loss	Other comprehensive income	
Baht	Baht	Baht	Baht	
Gains/(losses) from fair value of equity investments at fair value through other comprehensive income (2019: from available-for-sale investments)	- (1,829,836,070)	-	2,376,211,488	
Gains/(losses) from fair value of debt investments at fair value through profit or loss (2019: from short-term investments)	-	-	(68,624)	
Gains/(losses) on the sale of available-for-sale investments (reclassified AFS reserve in OCI to other gains/(losses))	-	7,625	-	
Dividends from equity investments at FVOCI recognised in other income related to investments held at the end of the reporting period	407,616,175	402,305,980	-	

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements			
	2020		2019	
	Profit or loss Baht	Other comprehensive income Baht	Profit or loss Baht	Other comprehensive income Baht
Gains/(losses) from fair value of equity investments at fair value through other comprehensive income (2019: from available-for-sale investments)	-	(1,715,804,593)	-	2,152,508,313
Gains/(losses) from fair value of debt investments at fair value through profit or loss (2019: from short-term investments)	-	-	-	(433,200)
Dividends from equity investments at FVOCI recognised in other income				
- Related to investments held at the end of the reporting period	280,910,831	-	238,347,532	-

## 12 Real estate development costs

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Opening balance	12,788,565,570	13,364,418,778	-	-
Additions	1,133,594,002	1,855,481,256	-	-
Transfer to investment properties (Note 15)	(271,547,706)	(586,066,749)	-	-
Currency translation differences	(3,921,000)	(19,234,512)	-	-
Recognise as expense	(1,020,614,800)	(1,826,033,203)	-	-
Closing balance	12,626,076,066	12,788,565,570	-	-

The Group transferred real estate development costs to investment property due to change in use.

In year 2019 Real estate development costs of Baht 1,628.51 million have been pledged as securities for credit facilities.

Borrowing costs were capitalised during the year and are included in 'additions' as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Borrowing costs	178,704,176	231,631,712	-	-
Capitalisation rate	4.01%	5.37%	-	-

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 13 Interests in associates and joint ventures

The material investments in associates and joint ventures are as follows:

Entity name	Country of incorporation	Nature of business	% of ownership interest		Consolidated financial statements		Separate financial statements	
					Investment at equity method		Investment at cost method	
			2020 %	2019 %	2020 Million Baht	2019 Million Baht	2020 Million Baht	2019 Million Baht
Material associates:								
GHECO - One Company Limited	Thailand	Power plant operation and sale of electricity	25	25	6,580	7,168	-	-
Duong River Surface Water Plant Joint Stock Company*	Vietnam	Production and distribution of water supply	24	-	2,272	-	-	-
Immaterial associates					4,656	8,308	-	-
<b>Total</b>					<b>13,508</b>	<b>15,476</b>	<b>-</b>	<b>-</b>
Joint ventures:								
Immaterial joint ventures					2,614	2,406	966	1,015
<b>Total</b>					<b>2,614</b>	<b>2,406</b>	<b>966</b>	<b>1,015</b>

\* Considered as material associate since 2020

The Group has contingent liabilities relating to guarantee of associates' loans by ordinary shares of such associates and guarantee of associates' and joint ventures' bank guarantees facilities by subsidiaries which are shareholders of such associates and joint ventures.

On 25 October 2019, the Group acquired ordinary shares of Duong River Surface Water Plant Joint Stock Company, equivalent to 34% ownership interests, and classified as investment in associates. The Group partially paid for share capital and recognised contingent consideration in the amount of Baht 242,915,209.

Contingent consideration is initially recognised at fair value and included as part of the cost of acquisition of an investment in an associate. The Group elects to recognise subsequent changes in the value of contingent consideration applying a cost-based approach by including changes in the contingent consideration as an inclusion or a part of or a reduction of the cost of the investment.

As of 31 December 2019, the measurement of acquired assets and assumed liabilities was not completed. During 2020, the Group adjusted the fair value of assets acquired and liabilities assumed as follows:

	Balance as previously reported Baht	Adjustment Baht	Adjusted balance Baht
<b>Purchase consideration</b>			
Cash paid	2,451,235,290	-	2,451,235,290
Contingent consideration	242,915,209	(242,915,209)	-
<b>Total purchase consideration</b>	<b>2,694,150,499</b>	<b>(242,915,209)</b>	<b>2,451,235,290</b>
<b>Net assets acquired</b>			
Net identifiable assets acquired	1,101,175,442	3,990,947,269	5,092,122,711
Group's share in associates (34%)	374,399,650	1,356,922,072	1,731,321,722
Goodwill	2,319,750,849	(1,599,837,281)	719,913,568
<b>Net assets acquired</b>	<b>2,694,150,499</b>	<b>(242,915,209)</b>	<b>2,451,235,290</b>

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### Summarised financial information for associates

The table below is summarised of financial information for associates that are material to the Group. The financial information is included in associates own financial statements which has been amended to reflect adjustments necessary for the equity method, including adjusting fair value and differences in accounting policy. There is no disclosure of the comparative figures of summarised financial information of Duong River Surface Water Plant Joint Stock Company as they're not material.

	<b>GHECO - One Company Limited</b>		<b>Duong River Surface Water Plant Joint Stock Company</b>
	<b>2020 Baht</b>	<b>2019 Baht</b>	<b>2020 Baht</b>
<i>Summarised of performance</i>			
Revenue	10,340,537,213	10,951,256,418	443,707,663
Profit (Loss) before income tax	668,711,026	1,572,527,921	(478,412,607)
Income tax expense	(28,141,223)	339,890,028	3,654,568
Profit (Loss) for the year	640,569,803	1,912,417,949	(474,758,039)
Other comprehensive income	(133,597,548)	-	10,379,296
Total comprehensive income	506,972,255	1,912,417,949	(464,378,743)
Dividends received from associate	419,858,878	564,287,076	-
<i>Summarised of statement of financial position</i>			
Current assets	6,431,541,781	8,297,964,797	337,395,273
Non-current assets	33,043,954,827	33,335,176,015	10,206,811,359
Current liabilities	(1,867,651,510)	(3,615,946,073)	(318,350,558)
Non-current liabilities	(18,806,586,013)	(17,536,365,886)	(5,632,675,412)
Currency translation differences	-	-	(27,949,606)
Net assets	18,801,259,085	20,480,828,853	4,565,231,056
Group's share in associates (%)	35%	35%	34%
Group's share in associates (Baht)	6,580,135,721	7,167,985,111	1,552,178,559
Goodwill	-	-	719,913,568
Associates carrying amount	6,580,135,721	7,167,985,111	2,272,092,127

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### *Individually immaterial associates and joint ventures*

The table below is the carrying amount of its interests, in aggregate, all individually immaterial associates and joint ventures that are accounted for using equity method.

	2020 Baht	2019 Baht
<b>Aggregate carrying amount of individually immaterial associates</b>	4,656,299,098	8,308,013,756
<b>The Group's share of:</b>		
Profit for the year	672,674,927	1,031,219,648
Other comprehensive income	(113,309,833)	2,591,001
Total comprehensive income	559,365,094	1,033,810,649
<b>Aggregate carrying amount of individually immaterial joint ventures</b>	2,613,524,573	2,405,534,065
<b>The Group's share of:</b>		
Profit for the year	473,307,444	245,127,138
Other comprehensive income	(68,246)	(15,009,878)
Total comprehensive income	473,239,198	230,117,260



# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 14 Investments in subsidiaries

The subsidiaries included in consolidated financial statement. The subsidiaries have only ordinary shares. The proportion of ownership interests held by the Group is equal to voting rights in subsidiaries held by the Group.

The material investments in subsidiaries are as follows:

Entity name	Country of incorporation	Nature of business	Ownership interest held by Company		Ownership interest held by the Group		Ownership interests held by non-controlling interests		Investment at cost method	
			2020 %	2019 %	2020 %	2019 %	2020 %	2019 %	2020 Million Baht	2019 Million Baht
WHA Industrial Development Public Company Limited	Thailand	Industrial estate management	-	-	99	99	1	1	42,982	42,982
WHA Utilities and Power Public Company Limited	Thailand	Sale and service of utilities	-	-	71	69	29	31	2,738	2,677

#### Summarised of financial information of the subsidiaries that have material non-controlling interests

The summary financial information of WHA Utilities and Power Public Company Limited and subsidiaries that has non-controlling interests are significant to the Group are summarised below. The amounts are disclosed for each subsidiary is shown by the amount before the inter-company elimination.

	2020 Baht	2019 Baht
<i>Summarised statement of financial position</i>		
Current assets	2,244,004,374	2,074,267,324
Non-current assets	23,927,610,083	24,344,450,106
Current liabilities	(3,034,234,414)	(6,481,672,521)
Non-current liabilities	(10,980,299,609)	(6,377,777,622)
Net assets	12,157,080,434	13,559,267,287
Non controlling interests	2,527,112,687	3,096,584,724
<i>Summarised statement of comprehensive income</i>		
Revenue	1,697,965,163	1,857,247,846
Profit for the year	812,727,056	2,137,209,051
Other comprehensive income	(170,236,673)	(33,151,551)
Total comprehensive income	642,490,383	2,104,057,500
Profit for the year allocated to non-controlling interests	239,362,230	662,951,215
Total comprehensive income allocated to non-controlling interests	189,224,574	652,667,775
Dividends paid to non-controlling interests	(284,448,551)	(360,694,557)
<i>Summarised statement of cash flow</i>		
Net cash flow from operating activities	1,897,717,133	1,216,171,204
Net cash flow from investing activities	(998,139,669)	(2,894,166,039)
Net cash flow from financing activities	130,140,993	1,601,272,280
<b>Net increase (decrease) in cash and cash equivalents</b>	<b>1,029,718,457</b>	<b>(76,722,555)</b>

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 15 Investment properties

	Consolidated financial statements				Total Baht
	Right-of-use land Baht	Buildings and utilities systems Baht	Building improvement Baht	Construction in progress Baht	
<b>As at 1 January 2019</b>					
Cost	5,568,783,348	4,505,879,229	223,649,130	660,663,740	10,958,975,447
<u>Less</u> Accumulated depreciation	-	(835,570,174)	(47,300,658)	-	(882,870,832)
Net book amount	5,568,783,348	3,670,309,055	176,348,472	660,663,740	10,076,104,615
<b>For the year ended 31 December 2019</b>					
Opening net book amount	5,568,783,348	3,670,309,055	176,348,472	660,663,740	10,076,104,615
Additions	416,315,571	81,500	1,219,719	2,163,908,204	2,581,524,994
Transfers	-	1,557,358,061	172,760,666	(1,730,118,727)	-
Recognise as expense (Note 22)	(550,000,000)	(1,374,580,331)	(13,269,987)	-	(1,937,850,318)
Depreciation charge	-	(120,950,230)	(9,563,670)	-	(130,513,900)
Currency translation differences	(3,214,664)	(2,928,793)	(1,979,832)	-	(8,123,289)
Transfer from real estate development costs (Note 12)	115,291,756	466,151,374	4,623,619	-	586,066,749
Classify to assets held for sale	(25,385,756)	(744,608,562)	(74,266,210)	-	(844,260,528)
Closing net book amount	5,521,790,255	3,450,832,074	255,872,777	1,094,453,217	10,322,948,323
<b>As at 31 December 2019</b>					
Cost	5,521,790,255	3,957,044,212	298,080,976	1,094,453,217	10,871,368,660
<u>Less</u> Accumulated depreciation	-	(506,212,138)	(42,208,199)	-	(548,420,337)
Net book amount	5,521,790,255	3,450,832,074	255,872,777	1,094,453,217	10,322,948,323
<b>Adjustments from new accounting policy (Note 4)</b>					
Cost	229,057,052	-	6,336,176	-	235,393,228
<u>Less</u> Accumulated depreciation	(9,691,893)	-	-	-	(9,691,893)
Net book amount	219,365,159	-	6,336,176	-	225,701,335
<b>As at 1 January 2020</b>					
Cost	5,750,847,307	3,957,044,212	304,417,152	1,094,453,217	11,106,761,888
<u>Less</u> Accumulated depreciation	(9,691,893)	(506,212,138)	(42,208,199)	-	(558,112,230)
Net book amount	5,741,155,414	3,450,832,074	262,208,953	1,094,453,217	10,548,649,658
<b>For the year ended 31 December 2020</b>					
Opening net book amount	5,741,155,414	3,450,832,074	262,208,953	1,094,453,217	10,548,649,658
Additions	690,108,794	17,163,324	-	1,767,240,422	2,474,512,540
Transfers	(3,542,659)	794,152,263	99,065,019	(889,674,623)	-
Transfer from property, plant and equipment (Note 16)	13,986,684	-	-	17,445,390	31,432,074
Depreciation charge	(10,165,253)	(144,683,100)	(17,128,045)	-	(171,976,398)
Currency translation differences	(1,574,443)	(1,291,846)	(910,624)	-	(3,776,913)
Transfer to account receivable finance lease	-	-	(3,354,912)	-	(3,354,912)
Transfer from real estate development costs (Note 12)	159,668,804	109,691,581	2,187,321	-	271,547,706
Classify to assets held for sale	(158,271,763)	(970,120,789)	(48,732,702)	-	(1,177,125,254)
Closing net book amount	6,431,365,578	3,255,743,507	293,335,010	1,989,464,406	11,969,908,501
<b>As at 31 December 2020</b>					
Cost	6,444,588,025	3,884,183,905	352,155,515	1,989,464,406	12,670,391,851
<u>Less</u> Accumulated depreciation	(13,222,447)	(628,440,398)	(58,820,505)	-	(700,483,350)
Net book amount	6,431,365,578	3,255,743,507	293,335,010	1,989,464,406	11,969,908,501

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements				Total Baht
	Right-of-use land Baht	Buildings and utilities systems Baht	Building improvement Baht	Construction in progress Baht	
<b>As at 1 January 2019</b>					
Cost	2,688,529,307	2,546,894,121	110,744,471	60,063,473	5,406,231,372
Less Accumulated depreciation	-	(438,033,330)	(15,848,693)	-	(453,882,023)
Net book amount	2,688,529,307	2,108,860,791	94,895,778	60,063,473	4,952,349,349
<b>For the year ended 31 December 2019</b>					
Opening net book amount	2,688,529,307	2,108,860,791	94,895,778	60,063,473	4,952,349,349
Additions	-	81,500	385,790	252,263,642	252,730,932
Recognise as expense (Note 22)	(550,000,000)	(1,374,580,331)	(13,269,987)	-	(1,937,850,318)
Depreciation charge	-	(36,314,001)	(2,527,092)	-	(38,841,093)
Classify to assets held for sale	-	(413,831,696)	(46,306,631)	-	(460,138,327)
Closing net book amount	2,138,529,307	284,216,263	33,177,858	312,327,115	2,768,250,543
<b>As at 31 December 2019</b>					
Cost	2,138,529,307	311,456,398	37,603,044	312,327,115	2,799,915,864
Less Accumulated depreciation	-	(27,240,135)	(4,425,186)	-	(31,665,321)
Net book amount	2,138,529,307	284,216,263	33,177,858	312,327,115	2,768,250,543
<b>Adjustments from new accounting policy (Note 4)</b>					
Cost	22,807,713	-	6,336,176	-	29,143,889
Less Accumulated depreciation	(693,900)	-	-	-	(693,900)
Net book amount	22,113,813	-	6,336,176	-	28,449,989
<b>As at 1 January 2020</b>					
Cost	2,161,337,020	311,456,398	43,939,220	312,327,115	2,829,059,753
Less Accumulated depreciation	(693,900)	(27,240,135)	(4,425,186)	-	(32,359,221)
Net book amount	2,160,643,120	284,216,263	39,514,034	312,327,115	2,796,700,532
<b>For the year ended 31 December 2020</b>					
Opening net book amount	2,160,643,120	284,216,263	39,514,034	312,327,115	2,796,700,532
Additions	349,495,278	-	-	1,518,268,503	1,867,763,781
Depreciation charge	(5,207,711)	(12,527,665)	(2,051,744)	-	(19,787,120)
Transfers	(2,159,030)	-	-	2,159,030	-
Transfer from property, plant and equipment (Note 16)	13,986,684	-	-	17,445,390	31,432,074
Closing net book amount	2,516,758,341	271,688,598	37,462,290	1,850,200,038	4,676,109,267
<b>As at 31 December 2020</b>					
Cost	2,524,818,982	311,456,398	43,939,220	1,850,200,038	4,730,414,638
Less Accumulated depreciation	(8,060,641)	(39,767,800)	(6,476,930)	-	(54,305,371)
Net book amount	2,516,758,341	271,688,598	37,462,290	1,850,200,038	4,676,109,267

The Group transferred investment properties to property, plant and equipment due to change in use.

Borrowing costs were capitalised during the year and are included in 'additions' as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Borrowing costs	22,753,399	35,476,269	20,179,087	3,559,412
Capitalisation rate	3.12% - 3.32%	3.38% - 3.60%	3.12%	3.38%

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The fair values of investment properties are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Investment properties ready to use and used	14,452,989,449	13,116,222,167	3,410,295,538	3,192,299,025
Investment properties under construction	2,358,225,569	1,449,350,324	2,172,865,300	621,005,693
<b>Total</b>	<b>16,811,215,018</b>	<b>14,565,572,491</b>	<b>5,583,160,838</b>	<b>3,813,304,718</b>

The fair values of investment properties are within level 3 of the fair value hierarchy which uses significant unobservable inputs.

The fair values of investment properties ready to use and used were valued using the income method with discounted cash flows expected to be generated in the future to their present value and sales comparison approach by independent professionally qualified valuers who hold a recognised relevant professional qualification and have recent experience in the locations and segments of the investment properties valued. For all investment properties, their current use equates to the highest and best use.

The Company's finance department includes a team that review the valuations performed by the independent valuers for financial reporting purposes. This team reports directly to the chief financial officer (CFO) and the audit committee (AC). Discussions of valuation processes and results are held between the CFO, AC, the valuation team and the independent valuers at least once every year, in line with the Company's yearly reporting dates.

Investment properties under construction were not assessed fair value by independent professionally qualified valuers. Management considered that the fair values of those assets approximated their net book value.

Investment properties which have been pledged as securities for performance bond on lease agreement are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Investment properties	1,531,486,838	1,418,413,740	633,692,116	633,692,116

Amounts recognised in profit and loss that are related to investment properties are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Rental and service income	639,986,251	381,596,972	47,609,474	70,157,466
Direct operating expense that generated rental income	264,811,649	259,199,951	62,293,141	116,824,184
Direct operating expense that did not generate rental income	21,859,908	26,546,435	-	-

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The future aggregate minimum lease income under non-cancellable operating leases are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Not later than 1 year	258,397,306	217,335,109	-	16,223,280
Later than 1 year but not later than 5 years	1,113,415,807	1,231,017,638	-	-
Later than 5 years	2,693,855,476	2,975,315,184	-	-
<b>Total</b>	<b>4,065,668,589</b>	<b>4,423,667,931</b>	<b>-</b>	<b>16,223,280</b>

The Group and the Company has right-of-use assets for the leases of land and building improvement that are classified as investment properties as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Land	396,880,761	-	364,242,349	-
Building improvement	6,081,881	-	6,081,881	-
<b>Total</b>	<b>402,962,642</b>	<b>-</b>	<b>370,324,230</b>	<b>-</b>

During the year 2020, additions to the right-of-use assets that are included in the investment properties in consolidated and separate financial statements were Baht 349,495,278 and Baht 349,495,278, respectively.

Amounts that are related to leases of investment properties are as follows:

	Consolidated financial statements	Separate financial statements
	2020 Baht	2020 Baht
Total cash outflow for leases	333,639,385	327,969,375

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### 16 Property, plant and equipment

	Consolidated financial statements														
	Land		Building improvement		Office equipment and warehouse equipment		Vehicles		Assets for rent		Construction in progress		Total		
	Baht		Baht		Baht		Baht		Baht		Baht		Baht		
As at 1 January 2019															
Cost	88,610,865		679,238,719		5,080,899,265		464,683,068		148,363,718		417,108,298		202,159,525		7,081,063,458
Less Accumulated depreciation	-		(498,710,806)		(1,263,193,444)		(301,160,434)		(120,652,426)		(262,188,063)		-		(2,445,905,173)
Net book amount	88,610,865		180,527,913		3,817,705,821		163,522,634		27,711,292		154,920,235		202,159,525		4,635,158,285
For the year ended 31 December 2019															
Opening net book amount	88,610,865		180,527,913		3,817,705,821		163,522,634		27,711,292		154,920,235		202,159,525		4,635,158,285
Additions	-		10,327,127		10,967,907		19,888,069		14,014,469		3,179,633		983,611,563		1,041,988,768
Transfers	-		29,320,044		349,271,547		23,592,019		616,350		53,435,786		(456,235,746)		-
Disposals	-		(2)		-		(425,867)		(146,064)		(220,806)		(3,582,704)		(4,375,443)
Depreciation charge	-		(27,784,064)		(204,223,139)		(47,802,446)		(10,307,302)		(23,690,603)		-		(313,807,554)
Currency translation differences	-		(15,055)		24		(58,690)		(77,442)		-		(13,248)		(164,411)
Classify to assets held for sale	-		-		-		(56,597)		-		-		-		(56,597)
Closing net book amount	88,610,865		192,375,963		3,973,722,160		158,659,122		31,811,303		187,624,245		725,939,390		5,358,743,048
As at 31 December 2019															
Cost	88,610,865		717,868,876		5,441,138,719		497,450,733		151,813,616		473,171,717		725,939,390		8,095,993,916
Less Accumulated depreciation	-		(525,492,913)		(1,467,416,559)		(338,791,611)		(120,002,313)		(285,547,472)		-		(2,737,250,868)
Net book amount	88,610,865		192,375,963		3,973,722,160		158,659,122		31,811,303		187,624,245		725,939,390		5,358,743,048



## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Consolidated financial statements						
	Land Baht	Building improvement Baht	Utilities system Baht	Office equipment and warehouse equipment Baht	Vehicles Baht	Assets for rent Baht	Construction in progress Baht
							Total Baht
<b>Adjustments from new accounting policy (Note 4)</b>							
Cost	-	65,530,832	-	570,402	42,764,507	680,208	109,545,949
Less Accumulated depreciation	-	-	-	-	-	-	-
Net book amount	-	65,530,832	-	570,402	42,764,507	680,208	109,545,949
<b>As at 1 January 2020</b>							
Cost	88,610,865	783,399,708	5,441,138,719	498,021,135	194,578,123	473,851,925	8,205,539,865
Less Accumulated depreciation	-	(525,492,913)	(1,467,416,559)	(338,791,611)	(120,002,313)	(285,547,472)	(2,737,250,868)
Net book amount	88,610,865	257,906,795	3,973,722,160	159,229,524	74,575,810	188,304,453	5,468,288,997
<b>For the year ended 31 December 2020</b>							
Opening net book amount	88,610,865	257,906,795	3,973,722,160	159,229,524	74,575,810	188,304,453	5,468,288,997
Additions	-	32,475,715	17,251,660	28,343,380	41,741,345	8,242,971	1,558,180,280
Transfers	-	7,210,430	1,234,241,002	14,565,915	3,659,206	12,209,876	(1,271,886,429)
Transfer to investment properties (Note 15)	(13,986,684)	-	-	-	-	-	(31,432,074)
Disposals	-	-	-	(343,581)	(151,292)	(640,934)	(1,135,807)
Depreciation charge	-	(56,040,805)	(246,940,000)	(49,542,388)	(30,870,182)	(24,105,350)	(407,498,725)
Currency translation differences	-	(298,231)	(225,432)	(297,818)	(104,427)	-	(1,231,803)
Classify to other non current assets	-	-	-	-	-	-	(504,187)
Classify to assets held for sale	-	-	(23,167,680)	-	-	-	(23,167,680)
Closing net book amount	74,624,181	241,253,904	4,954,881,710	151,955,032	88,850,460	184,011,016	6,561,499,001
<b>As at 31 December 2020</b>							
Cost	74,624,181	810,053,651	6,669,233,153	539,917,631	220,448,971	492,715,524	9,672,915,809
Less Accumulated depreciation	-	(568,799,747)	(1,714,351,443)	(387,962,599)	(131,598,511)	(308,704,508)	(3,111,416,808)
Net book amount	74,624,181	241,253,904	4,954,881,710	151,955,032	88,850,460	184,011,016	6,561,499,001

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### As at 1 January 2019

Cost	67,591,975	13,443,746	19,114,747	43,114,968	16,156,614	159,422,050
Less Accumulated depreciation	-	(4,400,191)	(14,890,746)	(30,144,584)	-	(49,435,521)
Net book amount	67,591,975	9,043,555	4,224,001	12,970,384	16,156,614	109,986,529

#### For the year ended 31 December 2019

Opening net book amount	67,591,975	9,043,555	4,224,001	12,970,384	16,156,614	109,986,529
Additions	-	-	1,387,247	-	68,337,799	69,725,046
Disposals	-	-	(347,706)	-	-	(347,706)
Depreciation charge	-	(672,188)	(1,679,771)	(3,269,382)	-	(5,621,341)
Classify to assets held for sale	-	-	(56,597)	-	-	(56,597)
Closing net book amount	67,591,975	8,371,367	3,527,174	9,701,002	84,494,413	173,685,931

#### As at 31 December 2019

Cost	67,591,975	13,443,746	18,950,606	43,114,968	84,494,413	227,595,708
Less Accumulated depreciation	-	(5,072,379)	(15,423,432)	(33,413,966)	-	(53,909,777)
Net book amount	67,591,975	8,371,367	3,527,174	9,701,002	84,494,413	173,685,931

Separate financial statements						
Office						
	Land Baht	Building improvement Baht	Office equipment and warehouse equipment Baht	Vehicles Baht	Construction in progress Baht	Total Baht
	67,591,975	13,443,746	19,114,747	43,114,968	16,156,614	159,422,050
	-	(4,400,191)	(14,890,746)	(30,144,584)	-	(49,435,521)
	67,591,975	9,043,555	4,224,001	12,970,384	16,156,614	109,986,529
	67,591,975	9,043,555	4,224,001	12,970,384	16,156,614	109,986,529
	-	-	1,387,247	-	68,337,799	69,725,046
	-	-	(347,706)	-	-	(347,706)
	-	(672,188)	(1,679,771)	(3,269,382)	-	(5,621,341)
	-	-	(56,597)	-	-	(56,597)
	67,591,975	8,371,367	3,527,174	9,701,002	84,494,413	173,685,931
	67,591,975	13,443,746	18,950,606	43,114,968	84,494,413	227,595,708
	-	(5,072,379)	(15,423,432)	(33,413,966)	-	(53,909,777)
	67,591,975	8,371,367	3,527,174	9,701,002	84,494,413	173,685,931

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### Adjustments from new accounting policy (Note 4)

Cost	-	10,047,713	570,402	3,959,878	-	14,577,993
Less Accumulated depreciation	-	-	-	-	-	-
Net book amount	-	10,047,713	570,402	3,959,878	-	14,577,993

#### As at 1 January 2020

Cost	67,591,975	23,491,459	19,521,008	47,074,846	84,494,413	242,173,701
Less Accumulated depreciation	-	(5,072,379)	(15,423,432)	(33,413,966)	-	(53,909,777)
Net book amount	67,591,975	18,419,080	4,097,576	13,660,880	84,494,413	188,263,924

#### For the year ended 31 December 2020

Opening net book amount	67,591,975	18,419,080	4,097,576	13,660,880	84,494,413	188,263,924
Additions	-	-	2,975,588	6,206,688	315,018,095	324,200,371
Disposals	-	-	(85,481)	-	-	(85,481)
Transfer to investment properties (Note 15)	(13,986,684)	-	-	-	(17,445,390)	(31,432,074)
Depreciation charge	-	(10,719,900)	(1,923,856)	(5,204,788)	-	(17,848,544)

Closing net book amount

	53,605,291	7,699,180	5,063,827	14,662,780	382,067,118	463,098,196
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#### As at 31 December 2020

Cost	53,605,291	13,443,746	22,123,924	43,724,393	382,067,118	514,964,472
Less Accumulated depreciation	-	(5,744,566)	(17,060,097)	(29,061,613)	-	(51,866,276)
Net book amount	53,605,291	7,699,180	5,063,827	14,662,780	382,067,118	463,098,196

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The Group and the Company has right-of-use assets for the leases (2019: Finance leases) that are classified as property, plant and equipment as follows:

	Consolidated financial statements		Separate financial statements	
	2020	2019	2020	2019
	Baht	Baht	Baht	Baht
Properties	236,436,610	220,296,479	-	-
Equipment	12,853,868	-	1,494,853	-
Vehicles	57,823,214	2,240,625	9,186,847	2,031,699
<b>Total</b>	<b>307,113,692</b>	<b>222,537,104</b>	<b>10,681,700</b>	<b>2,031,699</b>

During the year 2020, additions to the right-of-use assets that are included in the property, plant and equipment in consolidated and separate financial statements were Baht 53,397,320 and Baht 7,548,938, respectively.

Amounts that are related to leases of property, plant and equipment are as follows:

	Consolidated financial statements	Separate financial statements
	2020	2020
	Baht	Baht
Expense relating to short-term leases	5,398,078	-
Expense relating to leases of low-value assets	3,111,974	494,932
Total cash outflow for leases	37,176,935	14,135,018

## 17 Goodwill

Goodwill is allocated to the Group's cash-generating units (CGUs) identified according to business segment as follows:

	Consolidated financial statements		Separate financial statements	
	2020	2019	2020	2019
	Baht	Baht	Baht	Baht
Synergy	4,245,408,918	4,245,408,918	-	-
Real estate business	9,942,006,923	9,942,006,923	-	-
Power business	2,162,207,653	2,162,207,653	-	-
Water business	1,225,422,158	1,225,422,158	-	-
<b>Total</b>	<b>17,575,045,652</b>	<b>17,575,045,652</b>	<b>-</b>	<b>-</b>

The recoverable amount of a CGU is determined based on fair value less costs of disposal calculations by using a present value techniques that are within level 3 of the fair value hierarchy. These calculations use cash flow projections based on financial budgets approved by management covering a five-year period. Cash flows beyond the five-year period are extrapolated using the estimated growth rates that does not exceed the long-term average growth rate for the business in which the CGU operates.

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The key assumptions used for fair value less costs of disposal calculations are as follows:

	Synergy Percentage	Real estate Percentage	Power Percentage	Water Percentage
Gross margin	36.6	55.0	-	42.9
Growth rate	9.7	14.5	(2.0)	3.7
Discount rate	6.6	6.4	5.4	9.5

Management determined budgeted gross margin based on past performance and its expectations of market development. The weighted average growth rates used are consistent with the forecasts included in industry reports. The discount rates used reflect specific risks relating to the relevant segments.

The recoverable amount will be equal to the carrying amount if the key assumptions used for fair value less costs of disposal changes to be as follows:

	Synergy Percentage	Real estate Percentage	Power Percentage	Water Percentage
Gross margin	33.8	54.0	-	41.8
Growth rate	8.3	14.4	(4.8)	3.6
Discount rate	7.0	6.5	8.3	9.7

## 18 Deferred income tax

The analysis of deferred income tax assets and liabilities is as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Deferred income tax assets:</b>				
to be recovered within 12 months	(12,341,365)	(287,901)	-	-
to be recovered after more than 12 months	196,479,123	116,877,983	-	-
	184,137,758	116,590,082	-	-
<b>Deferred income tax liabilities:</b>				
to be settled within 12 months	(21,743,971)	2,761,600	-	-
to be settled after more than 12 months	(2,800,507,014)	(3,086,487,593)	(133,338,621)	(475,722,925)
	(2,822,250,985)	(3,083,725,993)	(133,338,621)	(475,722,925)
<b>Deferred income tax, net</b>	(2,638,113,227)	(2,967,135,911)	(133,338,621)	(475,722,925)

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The movements in deferred income tax assets and liabilities during the year is as follows:

	Consolidated financial statements									
	Recognised in profit or loss		Recognised in other comprehensive income		Adjustments from changes in accounting policies		Recognised in profit or loss		Recognised in other comprehensive income	
	Opening balance 2019 Baht	2019 Baht	2019 Baht	2019 Baht	2019 Baht	2019 Baht	2019 Baht	2019 Baht	2020 Baht	2020 Baht
<b>Deferred income tax assets</b>										
Net impairment losses on financial assets	4,612,674	789,086	-	-	890,159	(1,780,348)	-	-	4,511,571	-
Available-for-sale investments	35,800,601	-	(40,647,897)	(4,847,296)	-	-	18,713,556	-	13,866,260	-
Investments in foreign entities	-	449,721	-	449,721	-	(449,721)	-	-	-	-
Prepaid expenses	25,314,308	(557,326)	-	24,756,982	-	(5,375,044)	-	-	19,381,938	-
Allowance for impairment of other long-term investments	143,400	-	-	143,400	-	-	-	-	143,400	-
Allowance for impairment of assets	2,033,199	-	-	2,033,199	-	-	-	-	5,401,512	-
Accrued expense	-	7,529,940	-	7,529,940	-	(5,421,784)	-	-	2,108,156	-
Provision for repair and maintenance	1,695,476	(1,076,247)	-	619,229	-	364,565	-	-	983,794	-
Interest paid on loans	37,833,907	986,613	-	38,820,520	-	439,244	-	-	39,259,764	-
Deferred revenue	88,193,714	(33,625,646)	-	54,568,068	-	(210,844)	-	-	54,357,224	-
Lease liability	182,401	(59,929)	-	122,472	-	285,255	-	-	407,727	-
Deposits from long-term lease agreement	1,887,204	(1,795,767)	-	91,437	-	2,014,336	-	-	2,105,773	-
Employee benefit obligations	29,671,563	8,127,535	(7,715,976)	30,083,122	-	2,268,411	-	-	32,351,533	-
Deferred expenses from operating lease agreement	586,559	(586,559)	-	-	-	-	-	-	-	-
Gain/loss from intercompany, net	54,636,742	29,921,851	-	84,558,593	-	(5,273,831)	-	-	79,284,762	-
Gain/loss from investment in associates	-	-	-	-	-	70,255,055	-	-	70,255,055	-
Tax loss carry forward	161,009,782	516,759	-	161,526,541	-	(744,543)	-	-	160,781,998	-
	443,601,530	10,620,031	(48,363,873)	405,857,688	890,159	59,739,064	18,713,556	485,200,467		
<b>Deferred income tax liabilities</b>										
Fair value adjustment from business combination	(1,653,299,337)	17,786,307	-	(1,635,513,030)	-	26,060,130	-	-	(1,609,452,900)	-
Derivative assets	-	-	-	-	(9,575,860)	9,575,860	-	-	-	-
Financial assets measured at fair value through profit or loss	-	-	-	-	(31,731,930)	-	-	-	(31,731,930)	-
Investment	(108,651,960)	-	(434,580,676)	(543,232,636)	-	214,820	347,253,658	(195,764,158)	(1,424,083)	-
Deferred income from operating lease agreement	(9,986,242)	8,562,159	-	(1,424,083)	-	-	-	-	(5,258,649)	-
Bond underwriting	(6,163,895)	1,831,087	-	(4,332,808)	-	(925,841)	-	-	(5,258,649)	-
Deferred revenue from rental	(1,145,960,500)	(42,530,542)	-	(1,188,491,042)	-	(91,190,932)	-	-	(1,279,681,974)	-
	(2,924,061,934)	(14,350,989)	(434,580,676)	(3,372,993,599)	(41,307,790)	(56,265,963)	347,253,658	(3,123,313,694)		
<b>Deferred income tax, net</b>	(2,480,460,404)	(3,730,958)	(482,944,549)	(2,967,135,911)	(40,417,631)	3,473,101	365,967,214	(2,638,113,227)		



## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements							
	Opening balance 2019 Baht	Recognised in profit or loss Baht	Recognised in other comprehensive income Baht	Closing balance 2019 Baht	Adjustments from changes in accounting policies Baht		Recognised in profit or loss Baht	Recognised in other comprehensive income Baht
<b>Deferred income tax assets</b>								
Accrued expense	-	7,481,277	-	7,481,277	-	-	(5,395,031)	-
Net impairment losses on financial assets	-	-	-	-	461,764	-	359,665	-
Lease liability	-	-	-	-	-	-	86,870	-
Deferred revenue	62,549,506	(21,862,129)	-	40,687,377	-	-	(5,209,671)	-
Deposits from long-term lease agreement	1,877,651	(1,877,651)	-	-	-	-	1,230,046	-
Employee benefit obligations	9,967,963	1,481,054	(2,584,438)	8,864,579	-	-	1,695,766	-
Tax loss carry forward	159,897,159	1,010	-	159,898,169	-	-	-	-
	234,292,279	(14,776,439)	(2,584,438)	216,931,402	461,764	(7,232,355)	-	210,160,811
<b>Deferred income tax liabilities</b>								
Derivative assets	-	-	-	-	-	-	-	-
Investments	(113,357,348)	-	(430,415,023)	(543,772,371)	(2,078,425)	-	2,078,425	-
Deferred income from operating lease agreement	(8,562,159)	8,562,159	-	-	-	-	-	-
Bond underwriting	(2,846,896)	206,943	-	(2,639,953)	-	-	(812,769)	-
Deferred revenue from rental	(84,746,644)	(61,495,359)	-	(146,242,003)	-	-	6,806,745	-
	(209,513,047)	(52,726,257)	(430,415,023)	(692,654,327)	(2,078,425)	8,072,401	(343,160,919)	(343,499,432)
<b>Deferred income tax, net</b>	24,779,232	(67,502,696)	(432,999,461)	(475,722,925)	(1,616,661)	840,046	(133,338,621)	(133,338,621)

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

Deferred income tax assets are recognised for tax loss and carry forwards only to the extent that realisation of the related tax benefit through the future taxable profits is probable. The Group did not recognise deferred income tax assets in respect of losses that can be carried forward against future taxable income as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Unused tax loss carry forwards	4,061,420,590	3,633,696,567	430,991,557	91,174,045
Unrecognised deferred income tax	812,284,118	726,739,313	86,198,311	18,234,809
Expired year	2021 - 2025	2020 - 2024	2021 - 2025	2020 - 2024

## 19 Loans

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Current</b>				
Short-term loans	1,946,862,888	4,410,819,143	1,946,862,888	2,645,819,143
Current portion of long term loans	1,369,230,251	124,729,533	999,447,639	-
Short-term loans from related parties (Note 33)	-	-	915,400,000	698,400,000
	3,316,093,139	4,535,548,676	3,861,710,527	3,344,219,143
<b>Non-current</b>				
Long-term loans	9,602,982,354	1,374,343,972	2,500,000,000	-
	9,602,982,354	1,374,343,972	2,500,000,000	-
<b>Total</b>	12,919,075,493	5,909,892,648	6,361,710,527	3,344,219,143

The movements in loans from financing activities during the year are as follows:

	Consolidated financial statements			
	Short-term loans Baht	Short-term loans from related parties Baht	Long-term loans Baht	Total Baht
Opening balance 2019	1,615,980,331	-	-	1,615,980,331
Cash flows	2,766,343,179	-	1,499,000,000	4,265,343,179
Amortisation of front-end fee	28,495,633	-	73,505	28,569,138
Closing balance 2019	4,410,819,143	-	1,499,073,505	5,909,892,648
Cash flows	(2,476,062,716)	-	9,470,900,000	6,994,837,284
Amortisation of front-end fee	12,106,461	-	2,239,100	14,345,561
Closing balance 2020	1,946,862,888	-	10,972,212,605	12,919,075,493

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements			
	Short-term loans Baht	Short-term loans from related parties Baht	Long-term loans Baht	Total Baht
Opening balance 2019	1,315,980,331	672,900,000	-	1,988,880,331
Cash flows	1,301,343,179	25,500,000	-	1,326,843,179
Amortisation of front-end fee	28,495,633	-	-	28,495,633
Closing balance 2019	2,645,819,143	698,400,000	-	3,344,219,143
Cash flows	(711,062,716)	217,000,000	3,499,000,000	3,004,937,284
Amortisation of front-end fee	12,106,461	-	447,639	12,554,100
Closing balance 2020	1,946,862,888	915,400,000	3,499,447,639	6,361,710,527

The carrying amounts and fair values of certain long-term loans are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Carrying amounts	10,972,212,605	1,499,073,505	3,499,447,639	-
Fair values	10,998,352,748	1,499,073,505	3,515,428,417	-

The fair value of current loans equal their carrying amount, as the impact of discounting is not significant.

The fair values are based on discounted cash flows using a discount rate based upon the loan rate of 1.28% to 3.22% and are within level 2 of the fair value hierarchy.

The proportion of loans of the Group and Company which have fixed rates are 37.33% and 45.02% (2019: 61.71% and 100%) of all loans, respectively.

The effective interest rates at the statements of financial position date were as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Percentage	2019 Percentage	2020 Percentage	2019 Percentage
Short-term loans	1.40 - 2.92	1.65 - 2.17	1.40 - 2.92	1.65 - 1.85
Short-term loans from related parties	-	-	0.45	1.25
Long-term loans	1.60 - 3.22	2.87 - 3.51	1.60 - 2.56	-

Maturity of long-term loans is as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Not later than 1 year	1,369,230,251	124,729,533	999,447,639	-
Later than 1 year but not later than 5 years	9,602,982,354	1,374,343,972	2,500,000,000	-
<b>Total</b>	<b>10,972,212,605</b>	<b>1,499,073,505</b>	<b>3,499,447,639</b>	<b>-</b>

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 20 Trade and other payables

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Trade payables	732,742,068	456,452,663	228,760,525	34,812,435
Amounts due to related parties (Note 33)	1,024,192	1,165,277	12,875,202	7,543,856
Other payables	35,802,948	44,226,901	26,186,074	36,881,220
Accrued cost of real estate development	864,125,236	611,823,793	474,738,121	55,294,230
Accrued expenses	351,164,192	567,863,109	169,120,240	165,347,760
Dividend payable	16,074,122	14,259,004	-	-
Retention	102,269,113	126,851,579	73,064,509	24,312,538
Advance received income	471,241,002	441,941,980	64,113,234	54,454,923
Provisions from guarantee	-	7,635,925	-	7,635,925
Others	2,179,549	1,089,484,216	1,832,230	814,315,525
<b>Total</b>	<b>2,576,622,422</b>	<b>3,361,704,447</b>	<b>1,050,690,135</b>	<b>1,200,598,412</b>

### 21 Debentures

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Current portion of debentures	8,404,852,012	9,534,908,490	3,999,168,755	5,536,530,961
Debentures	19,929,740,333	23,779,475,392	14,325,654,123	14,229,603,659
<b>Total</b>	<b>28,334,592,345</b>	<b>33,314,383,882</b>	<b>18,324,822,878</b>	<b>19,766,134,620</b>

The movements in debentures from financing activities during the year are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Opening balance	33,314,383,882	34,764,471,635	19,766,134,620	17,920,099,906
Cash flows	(4,952,369,603)	(1,300,039,480)	(1,448,576,453)	1,837,960,520
Amortisation of bond underwriting	18,568,456	23,185,175	7,264,711	8,074,194
Amortisation of finance costs from business combination	(45,990,390)	(173,233,448)	-	-
<b>Closing balance</b>	<b>28,334,592,345</b>	<b>33,314,383,882</b>	<b>18,324,822,878</b>	<b>19,766,134,620</b>

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

The carrying amounts and fair values of debentures are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Carrying amounts	28,334,592,345	33,314,383,882	18,324,822,878	19,766,134,620
Fair values	28,675,357,098	33,885,485,229	18,646,342,635	20,140,460,663

The fair values of debentures are based on clean price announced by Thai Bond Market Association that are within level 2 of the fair value hierarchy.

The interest rate on all debentures of the Group is fixed rates. The effective interest rates at the statement of financial position date were as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Percentage	2019 Percentage	2020 Percentage	2019 Percentage
Debentures	2.31 - 5.69	2.13 - 5.69	2.43 - 5.02	2.13 - 5.02

Maturity of debentures is as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Not later than 1 year	8,404,852,012	9,534,908,490	3,999,168,755	5,536,530,961
Later than 1 year but not later than 5 years	18,031,910,449	18,174,549,137	13,926,040,614	11,452,545,885
Later than 5 years	1,897,829,884	5,604,926,255	399,613,509	2,777,057,774
	28,334,592,345	33,314,383,882	18,324,822,878	19,766,134,620

## 22 Deferred revenue

The movements of deferred revenue are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Opening balance	2,538,112,689	4,571,542,145	620,538,633	2,529,702,070
Additions	277,433,222	214,607,108	-	214,095,082
Recognise income	(82,925,092)	(2,248,036,564)	(30,263,666)	(2,123,258,519)
Currency translation differences	(3,387)	-	-	-
Closing balance	2,732,617,432	2,538,112,689	590,274,967	620,538,633

On 6 November 2015, the Company sold assets to WHA Business Complex Freehold and Leasehold Real Estate Investment Trust but still undertook in guarantee minimum EBITDA. Their significant risk and reward were not transferred to the buyer, so the Company recorded the transaction as deferred revenue. Then during the period 2019, the Company has reconsidered the remaining guarantee EBITDA and found that existing risk and reward were insignificant. The Company has reversed deferred revenue and investment properties amounting to Baht 2,052.27 million and Baht 1,937.85 million, respectively, to statement of comprehensive income.

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 23 Employee benefit obligations

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Statement of financial position</b>				
Retirement benefits	158,458,824	150,638,378	52,801,726	44,322,897
<b>Profit or loss</b>				
Retirement benefits	27,572,336	49,097,425	8,478,829	15,632,807
<b>Other comprehensive income</b>				
Remeasurements of employee benefit obligations	-	(38,579,881)	-	(12,922,189)

The movement in the defined benefit obligation over the year is as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Opening balance	150,638,378	140,353,043	44,322,897	41,612,279
Current service cost	24,365,428	22,688,076	7,237,761	6,450,616
Past service cost	-	23,595,849	-	8,150,643
Interest cost	3,206,908	2,813,500	1,241,068	1,031,548
	178,210,714	189,450,468	52,801,726	57,245,086
Remeasurements				
(Gain)/loss from change in demographic assumptions	-	(18,735,386)	-	314,896
Gain from change in financial assumptions	-	(10,941,472)	-	(7,438,610)
Experience gain	-	(8,903,023)	-	(5,798,475)
	-	(38,579,881)	-	(12,922,189)
Benefit payments	(19,751,890)	(232,209)	-	-
Closing balance	158,458,824	150,638,378	52,801,726	44,322,897

The significant actuarial assumptions used were as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Percentage	2019 Percentage	2020 Percentage	2019 Percentage
Discount rate	1.86 - 2.95	1.86 - 2.95	2.80	2.80
Future salary increases	5.50 - 6.50	5.50 - 6.50	6.50	6.50
Resignation rate	0.00 - 15.00	0.00 - 15.00	0.00 - 12.00	0.00 - 12.00
Retirement age	55 and 60 years	55 and 60 years	60 years	60 years



## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

Sensitivity analysis for each significant assumption used is as follows:

Consolidated financial statements					
Impact on employee benefit obligations					
Change in assumption	Increase in assumption		Decrease in assumption		
	2020	2019	2020	2019	
Discount rate	1%	Decrease by 3.03% - 12.66%	Decrease by 3.75% - 13.11%	Increase by 3.22% - 15.35%	Increase by 4.02% - 15.95%
Future salary increases	1%	Increase by 4.06% - 16.20%	Increase by 3.84% - 15.69%	Decrease by 3.87% - 13.57%	Decrease by 3.66% - 13.17%
Resignation rate	1%	Decrease by 3.19% - 13.81%	Decrease by 3.96% - 14.30%	Increase by 0.78% - 10.37%	Increase by 1.06% - 11.25%
Separate financial statements					
Impact on employee benefit obligations					
Change in assumption	Increase in assumption		Decrease in assumption		
	2020	2019	2020	2019	
Discount rate	1%	Decrease by 10.81%	Decrease by 11.30%	Increase by 12.71%	Increase by 13.32%
Future salary increases	1%	Increase by 13.63%	Increase by 13.15%	Decrease by 11.76%	Decrease by 11.40%
Resignation rate	1%	Decrease by 11.67%	Decrease by 12.20%	Increase by 4.85%	Increase by 5.02%

The above sensitivity analyses are based on a change in an assumption while holding all other assumptions constant. In practice, this is unlikely to occur, and changes in some of the assumptions may be correlated. When calculating the sensitivity of the employee benefit obligations to significant actuarial assumptions the same method has been applied as when calculating the employee benefit obligations recognised within the statement of financial position.

The methods and types of assumptions used in preparing the sensitivity analysis did not change compared to the previous year.

## 24 Share capital and premium on share capital

	Authorised share capital		Issued and paid-up share capital		Share premium
	Share	Baht	Share	Baht	Baht
Opening balance 2019	15,677,730,186	1,567,773,019	14,334,267,169	1,433,426,717	12,438,534,575
Capital increase from warrant conversion	-	-	374,831,283	37,483,128	1,495,448,207
Closing balance 2019	15,677,730,186	1,567,773,019	14,709,098,452	1,470,909,845	13,933,982,782
Capital increase from warrant conversion	-	-	237,736,227	23,773,623	948,485,971
Warrant expiration	-	-	-	-	384,024,428
Closing balance 2020	15,677,730,186	1,567,773,019	14,946,834,679	1,494,683,468	15,266,493,181

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### 25 Warrant

	2020		2019	
	Unit	Baht	Unit	Baht
Opening balance	79,063,465	543,677,824	115,669,514	795,398,351
Exercise warrant	(23,217,336)	(159,653,396)	(36,606,049)	(251,720,527)
Warrant expiration	(55,846,129)	(384,024,428)	-	-
Closing balance	-	-	79,063,465	543,677,824

The significant conditions of WHA-W1 are as follows:

Selling proportion	:	3 increased ordinary shares for 1 warrant
Exercise price	:	Baht 3.4181 per share (after change warrant)
Exercise rate	:	1 warrant per 10 ordinary shares (after change par value)
Exercise date	:	25 December 2015
Expire date	:	4 March 2020

#### 26 Dividend

At the Company's Board of Directors' meeting on 27 April 2020, the meeting approved an interim dividend at Baht 0.0535 per share amounting to a total of Baht 799.65 million. The Company paid dividend on 25 May 2020.

At the Company's Board of Directors' meeting on 13 November 2020, the meeting approved an interim dividend at Baht 0.0367 per share amounting to a total of Baht 548.55 million. The Company paid dividend on 9 December 2020.

At the Company's shareholders' meeting on 29 April 2019, the meeting approved a dividend at Baht 0.0833 per share amounting to a total of Baht 1,198.80 million. The Company paid dividend on 28 May 2019.

At the Company's Board of Directors Meeting on 8 November 2019, the meeting approved an interim dividend at Baht 0.0815 per share amounting to a total of Baht 1,198.79 million. The Company paid dividend on 6 December 2019.

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### 27 Components of other comprehensive income

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Investments				
Unrealised gains (losses)	907,688,206	2,737,529,649	1,002,590,193	2,718,861,860
Less Reclassification adjustments to profit or loss	-	(7,625)	-	-
	907,688,206	2,737,522,024	1,002,590,193	2,718,861,860
Currency translation	(179,901,348)	(162,794,681)	-	-
Remeasurements of employee benefit obligations	45,048,530	45,048,530	4,694,648	4,694,648
Share of other comprehensive income of associates and joint ventures	(929,343,633)	(26,146,562)	-	-
Total other comprehensive income	(156,508,245)	2,593,629,311	1,007,284,841	2,723,556,508
Income tax relating to components of other comprehensive income	(191,105,710)	(557,072,924)	(201,550,382)	(544,711,302)
<b>Total</b>	<b>(347,613,955)</b>	<b>2,036,556,387</b>	<b>805,734,459</b>	<b>2,178,845,206</b>

#### 28 Finance costs

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Bill of exchange	12,106,461	28,495,634	12,106,461	28,495,634
Loans from financial institutions	206,854,544	26,656,802	120,316,914	11,776,712
Debentures	847,450,369	898,757,686	598,536,144	673,967,738
Short-term loans from related parties	-	-	5,260,135	8,185,947
Finance lease agreements	13,335,975	10,039,760	1,680,884	134,052
Bond underwriting	15,477,063	17,835,642	7,712,351	8,074,194
Others	17,061,028	4,597,847	12,200,598	20,801,063
<b>Total</b>	<b>1,112,285,440</b>	<b>986,383,371</b>	<b>757,813,487</b>	<b>751,435,340</b>

#### 29 Expense by nature

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Employee benefit expense	922,089,193	939,703,344	212,768,029	218,806,324
Depreciation and amortisation	592,319,300	459,708,022	39,047,226	46,104,632
Land rental expense	4,938,975	20,207,484	4,930	870,263
Consulting fee	60,947,267	59,728,337	13,386,094	12,535,712
Cost of real estate development sold	1,309,609,371	1,751,045,409	-	-
Special business tax and land transfer fee	77,737,033	222,008,841	-	-

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### 30 Income tax

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Current income tax	296,402,264	301,331,440	-	-
Deferred income tax (Note 18)	(3,473,101)	3,730,958	(840,046)	67,502,696
<b>Total</b>	<b>292,929,163</b>	<b>305,062,398</b>	<b>(840,046)</b>	<b>67,502,696</b>

The income tax on the Group and Company's profit before tax differs from the theoretical amount that would arise using the basic tax rate as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Profit before income tax	3,157,692,797	4,267,775,631	1,233,752,147	1,924,179,633
<u>Less</u> Profit from promoted activities which exempt from payment of corporate income tax	(691,920,056)	(1,189,892,847)	-	-
Share of profit from associates and joint ventures	(1,208,764,062)	(1,945,693,061)	-	-
	<b>1,257,008,679</b>	<b>1,132,189,723</b>	<b>1,233,752,147</b>	<b>1,924,179,633</b>
Tax calculated at a tax rate of 20%	251,401,736	226,437,945	246,750,429	384,835,927
Tax effects of:				
Income not subject to tax	(42,133,417)	(52,887,348)	(319,010,697)	(342,731,021)
Additional income subject to tax	2,292,529	40,605,065	2,057,788	5,561,612
Expenses not deductible for tax purposes	5,251,394	14,068,592	1,874,693	4,032,488
Additional expenses deductible for tax purposes	(2,240,660)	(5,315,812)	(1,167,562)	(4,071,480)
Difference in overseas tax rate	(17,842,631)	(3,957,406)	-	-
Tax losses for which no deferred income tax asset was recognised	113,884,976	108,259,467	67,963,502	18,234,809
Adjustment in respect of prior year	(17,684,764)	(22,148,105)	691,801	1,640,361
<b>Tax charge</b>	<b>292,929,163</b>	<b>305,062,398</b>	<b>(840,046)</b>	<b>67,502,696</b>

The tax relating to component of other comprehensive income is as follows:

	Consolidated financial statements					
	2020			2019		
	Before tax Baht	Tax Baht	After tax Baht	Before tax Baht	Tax Baht	After tax Baht
Change in value of investments	(1,829,836,070)	365,967,214	(1,463,868,856)	2,376,142,864	(475,228,573)	1,900,914,291
Currency translation differences	(20,403,038)	-	(20,403,038)	(79,398,255)	-	(79,398,255)
Remeasurements of employee benefit obligations	-	-	-	38,579,881	(7,715,976)	30,863,905
Share of other comprehensive income of associates and joint ventures	(159,220,542)	-	(159,220,542)	(12,418,877)	-	(12,418,877)
<b>Total</b>	<b>(2,009,459,650)</b>	<b>365,967,214</b>	<b>(1,643,492,436)</b>	<b>2,322,905,613</b>	<b>(482,944,549)</b>	<b>1,839,961,064</b>

## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

	Separate financial statements					
	2020			2019		
	Before tax Baht	Tax Baht	After tax Baht	Before tax Baht	Tax Baht	After tax Baht
Change in value of investments	(1,715,804,593)	343,160,919	(1,372,643,674)	2,152,075,113	(430,415,023)	1,721,660,090
Remeasurements of employee benefit obligation	-	-	-	12,922,189	(2,584,438)	10,337,751
<b>Total</b>	<b>(1,715,804,593)</b>	<b>343,160,919</b>	<b>(1,372,643,674)</b>	<b>2,164,997,302</b>	<b>(432,999,461)</b>	<b>1,731,997,841</b>

### 31 Earnings per share

	Consolidated financial statements		Separate financial statements	
	2020	2019	2020	2019
Profit attributable to owners of the parent (Baht)	2,523,749,930	3,229,253,657	1,234,592,193	1,856,676,937
Weighted average number of ordinary shares (shares)	14,942,890,222	14,545,890,364	14,942,890,222	14,545,890,364
Number of ordinary shares from warrants (shares)	-	185,570,324	-	185,570,324
Number of dilutive potential ordinary shares (shares)	14,942,890,222	14,731,460,688	14,942,890,222	14,731,460,688
Basic earnings per share (Baht)	0.1689	0.2220	0.0826	0.1276
Diluted earnings per share (Baht)	0.1689	0.2192	0.0826	0.1260

### 32 Derivative financial instruments

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Financial assets</b>				
Interest rate swaps	-	3,101,501	-	1,760,548

The net fair values of derivative financial instruments at the statement of financial position date which are within level 2 of the fair value hierarchy were:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Contracts with positive fair values (Gain)	-	54,671,023	-	10,392,125
Contracts with negative fair values (Loss)	-	(6,791,726)	-	-

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### 33 Related party transactions

Company's major shareholders are WHA Holding Co., Ltd., the Anataprayoons and the Jarukornsakuls in proportion of 34.54%. The remaining 65.46% of the shares are widely held.

Additional information for transactions with related parties are as follows:

#### Transactions

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Subsidiaries</b>				
Management income	-	-	10,319,032	8,938,200
Dividend income	-	-	1,343,460,823	1,666,224,175
Interest income	-	-	301,465,338	215,823,727
Service fee expense	-	-	165,878	3,190,770
Interest expense	-	-	5,260,135	8,185,947
Rental expense	-	-	-	595,083
<b>Associates</b>				
Revenue from water business	200,407,257	213,595,728	-	-
Revenue from leases and services	48,194,842	49,832,134	-	-
Other income	18,764,423	20,096,858	-	-
Commission and management income	14,092,084	19,310,758	-	-
Interest income	-	34,490,451	-	-
<b>Joint ventures</b>				
Revenue from water business	8,233,241	7,394,779	-	-
Revenue from leases and services	6,836,986	13,341,464	-	-
Other income	146,309	1,116,351	-	-
Commission and management income	14,032,393	12,999,846	10,629,055	10,970,040
Dividend income	-	-	251,592,662	47,430,929
Interest income	12,668,846	11,398,141	-	-
<b>Other related parties</b>				
Interest income	167,825	694,411	-	-
Rental expense	417,595	12,199,884	-	10,446,448
Interest expense	134,709	-	102,710	-



## Notes to the Consolidated and Separate Financial Statements

### WHA Corporation Public Company Limited

For the year ended 31 December 2020

#### Outstanding balances

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Receivables</b>				
Subsidiaries	-	-	214,325,198	214,651,203
Associates	22,305,207	591,669,190	-	-
Joint ventures	2,948,778	3,877,196	101,438	194,098
Other related parties	17,326	-	-	-
<b>Total</b>	<b>25,271,311</b>	<b>595,546,386</b>	<b>214,426,636</b>	<b>214,845,301</b>
<b>Payables</b>				
Subsidiaries	-	-	11,970,122	6,637,916
Associates	-	140,224	-	-
Joint ventures	-	861	-	861
Other related parties	1,024,192	1,024,192	905,080	905,079
<b>Total</b>	<b>1,024,192</b>	<b>1,165,277</b>	<b>12,875,202</b>	<b>7,543,856</b>
<b>Lease Liabilities</b>				
Subsidiaries	-	-	1,500,342	-

#### Short-term loans to related parties

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Subsidiaries	-	-	8,240,500,000	8,001,150,000
Joint ventures	5,500,000	283,490,552	-	-
Other related parties	34,000,000	-	-	-
<b>Total</b>	<b>39,500,000</b>	<b>283,490,552</b>	<b>8,240,500,000</b>	<b>8,001,150,000</b>

Short-term loans to related parties can be called at any time and are unsecured. The loans bear interest at 0.60% - 3.30% per annum (2019: 3.55 - 3.73%).

#### Long-term loans to related parties

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Joint venture	248,490,552	-	-	-

Long-term loans to related parties were made on commercial terms and conditions. The loans are due within 8 years and are unsecured. The loans bear interest at MLR minus 1.25% per annum (2019: Nil).

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### Short-term loans from related parties

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Subsidiaries	-	-	915,400,000	698,400,000

Short-term loans from related parties can be called at any time and are unsecured. The loans bear interest at 0.45% per annum (2019: 1.25% per annum).

### Key management compensation

Key management includes directors (executive and non-executive), members of the executive committee. The compensation paid or payable to key management are as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Salaries and other short-term employee benefits	427,541,463	391,067,912	97,994,549	91,337,482
Post-employment benefits	11,632,287	17,046,416	3,656,128	3,305,109
<b>Total</b>	<b>439,173,750</b>	<b>408,114,328</b>	<b>101,650,677</b>	<b>94,642,591</b>

## 34 Commitments and contingencies

### Capital commitments

Capital expenditure contracted but not recognised as liabilities is as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Purchase of land	438,167,050	906,443,400	-	-
Construction of warehouse and office building	484,328,300	1,740,098,249	484,156,380	1,653,021,627
Construction of ready-built factories and public utilities	141,547,368	491,418,386	-	-
<b>Total</b>	<b>1,064,042,718</b>	<b>3,137,960,035</b>	<b>484,156,380</b>	<b>1,653,021,627</b>

# Notes to the Consolidated and Separate Financial Statements

## WHA Corporation Public Company Limited

For the year ended 31 December 2020

### Non-cancellable operating leases - where the Group and Company are the lessees

Commitments for minimum lease payments in relation to non-cancellable operating leases are payable as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
Within 1 year	-	48,031,889	-	3,649,711
Later than 1 year but not later than 5 years	-	96,260,390	-	15,074,881
Later than 5 years	-	119,331,500	-	49,001,521
<b>Total</b>	-	263,623,779	-	67,726,113

### Bank guarantees

Banks have provided guarantees on behalf of the Group and Company as follows:

	Consolidated financial statements		Separate financial statements	
	2020 Baht	2019 Baht	2020 Baht	2019 Baht
<b>Baht currency</b>				
Infrastructure	32,544,597	30,604,494	7,087,530	6,371,330
Industrial Estate Authority of Thailand	346,264,382	499,949,025	128,000	-
Performance bond with power group	114,253,334	175,588,833	-	-
Tax refund before tax audit	519,838,127	449,059,540	125,904,197	55,125,610
Others	156,283,487	157,918,687	39,640,900	5,866,100
<b>Total</b>	1,169,183,927	1,313,120,579	172,760,627	67,363,040
<b>USD currency</b>				
Performance bond with power group	5,561,423	5,500,277	-	-
<b>Total</b>	5,561,423	5,500,277	-	-

### Other guarantees

The Company has guaranteed the hire purchase agreements of its related parties in the total credit line of Baht 185.88 million (2019: Baht 212.26 million).

## 35 Events occurring after the reporting period

On 9 February 2021, the Company issued the debentures No. 1/2021 under the Medium Term Notes Program with the total principal amount of Baht 1,000 Million and has been approved for trading in debt securities market by The Securities and Exchange Commission on 30 March 2020. The issuance of this debenture has already been approved by virtue of the resolution of the 2020 Annual General Meeting (AGM) dated 13 July 2020.

On 9 February 2021, the Group issued the debentures No. 1/2021 under the Medium Term Notes Program with the total principal amount of Baht 700 Million and has been approved for trading in debt securities market by The Securities and Exchange Commission on 7 February 2020. The issuance of this debenture has already been approved by virtue of the resolution of the 2020 Annual General Meeting (AGM) dated 10 July 2020.



**WHA CORPORATION PUBLIC COMPANY LIMITED**  
**ANNUAL REPORT 2020**





**WHA Corporation Public Company Limited**

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