Taiwan Cement Corporation and Subsidiaries

Consolidated Financial Statements for the Years Ended December 31, 2019 and 2018 and Independent Auditors' Report

DECLARATION OF CONSOLIDATION OF FINANCIAL STATEMENTS OF AFFILIATES

The entities that are required to be included in the combined financial statements of affiliates as of and for the year ended December 31, 2019 under the Criteria Governing the Preparation of Affiliation Reports, Consolidated Business Reports and Consolidated Financial Statements of Affiliated Enterprises are all the same as those included in the consolidated financial statements prepared in conformity with the International Financial Reporting Standard 10 “Consolidated Financial Statements”. In addition, relevant information required to be disclosed in the combined financial statements has all been disclosed in the consolidated financial statements of parent and subsidiary companies. Consequently, Taiwan Cement Corporation and its subsidiaries did not prepare a separate set of combined financial statements of affiliates.

Very truly yours,

TAIWAN CEMENT CORPORATION

AN-PING CHANG
Chairman

March 20, 2020

勤業眾信
勤業眾信聯合會計師事務所
11073 台北市信義區松仁路100號20樓

Deloitte & Touche
20F, Taipei Nan Shan Plaza
No. 100, Songren Rd.,
Xinyi Dist., Taipei 11073, Taiwan

Tel :+886 (2) 2725-9988
Fax:+886 (2) 4051-6888
www.deloitte.com.tw

INDEPENDENT AUDITORS' REPORT

The Board of Directors and Shareholders
Taiwan Cement Corporation

Opinion

We have audited the accompanying consolidated financial statements of Taiwan Cement Corporation and its subsidiaries (collectively referred to as the "Group"), which comprise the consolidated balance sheets as of December 31, 2019 and 2018, and the consolidated statements of comprehensive income, changes in equity and cash flows for the years then ended, and the notes to the consolidated financial statements, including a summary of significant accounting policies (collectively referred to as the "consolidated financial statements").

In our opinion, the accompanying consolidated financial statements present fairly, in all material respects, the consolidated financial position of the Group as of December 31, 2019 and 2018, and its consolidated financial performance and its consolidated cash flows for the years then ended in accordance with the Regulations Governing the Preparation of Financial Reports by Securities Issuers, and International Financial Reporting Standards (IFRS), International Accounting Standards (IAS), IFRIC Interpretations (IFRIC), and SIC Interpretations (SIC) endorsed and issued into effect by the Financial Supervisory Commission of the Republic of China.

Basis for Opinion

We conducted our audits in accordance with the Regulations Governing Auditing and Attestation of Financial Statements by Certified Public Accountants and auditing standards generally accepted in the Republic of China. Our responsibilities under those standards are further described in the Auditors' Responsibilities for the Audit of the Consolidated Financial Statements section of our report. We are independent of the Group in accordance with The Norm of Professional Ethics for Certified Public Accountant of the Republic of China, and we have fulfilled our other ethical responsibilities in accordance with these requirements. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

Key Audit Matters

Key audit matters are those matters that, in our professional judgment, were of most significance in our audit of the consolidated financial statements for the year ended December 31, 2019. These matters were addressed in the context of our audit of the consolidated financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters.

The description of the key audit matter of the Group's consolidated financial statements for the year ended December 31, 2019 is as follows:

Revenue Recognition of Cement Sales

The Group is mainly engaged in the production and sale of various cement and cement products. Revenue from the sale of cement fluctuates frequently due to changes in raw material prices, market supply and demand and the economic environment; in addition, related revenue is recognized at the point in time when the customer collects the cement and all the risks and rewards of the product have been transferred to the customer. Therefore, the validity of revenue recognition of cement sales is considered a key audit matter for the year ended December 31, 2019. Our main audit procedures performed in respect of the aforesaid key audit matter include understanding and testing the design and operating effectiveness of the internal controls related to the revenue from cement sales, and random inspection of the contracts, factory orders and delivery documents from the sales details and testing the collection information of the samples before the end of the reporting period, in order to verify the validity of revenue recognition of cement sales.

Other Matter

We have also audited the parent company only financial statements of Taiwan Cement Corporation as of and for the years ended December 31, 2019 and 2018 on which we have issued an unmodified opinion.

Responsibilities of Management and Those Charged with Governance for the Consolidated Financial Statements

Management is responsible for the preparation and fair presentation of the consolidated financial statements in accordance with the Regulations Governing the Preparation of Financial Reports by Securities Issuers and International Financial Reporting Standards (IFRS), International Accounting Standards (IAS), IFRIC Interpretations (IFRIC), and SIC Interpretations (SIC) endorsed and issued into effect by the Financial Supervisory Commission of the Republic of China, and for such internal control as management determines is necessary to enable the preparation of consolidated financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the consolidated financial statements, management is responsible for assessing the Group'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 management either intends to liquidate the Group or to cease operations, or has no realistic alternative but to do so.

Those charged with governance, including the audit committee, are responsible for overseeing the Group's financial reporting process.

Auditors' Responsibilities for the Audit of the Consolidated Financial Statements

Our objectives are to obtain reasonable assurance about whether the consolidated financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditors' report that includes our opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with the auditing standards generally accepted in the Republic of China 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 financial statements.

As part of an audit in accordance with the auditing standards generally accepted in the Republic of China, we exercise professional judgment and maintain professional skepticism throughout the audit. We also:

1. Identify and assess the risks of material misstatement of the consolidated 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 our 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.

2. 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 internal control.

3. Evaluate the appropriateness of accounting policies used and the reasonableness of accounting estimates and related disclosures made by management.

4. Conclude on the appropriateness of management's 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 ability to continue as a going concern. If we conclude that a material uncertainty exists, we are required to draw attention in our auditors' report to the related disclosures in the consolidated financial statements or, if such disclosures are inadequate, to modify our opinion. Our conclusions are based on the audit evidence obtained up to the date of our auditors' report. However, future events or conditions may cause the Group to cease to continue as a going concern.

5. Evaluate the overall presentation, structure and content of the consolidated financial statements, including the disclosures, and whether the consolidated financial statements represent the underlying transactions and events in a manner that achieves fair presentation.

6. Obtain sufficient and 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. We are responsible for the direction, supervision, and performance of the group audit. We remain solely responsible for our audit opinion.

We communicate with those charged with governance regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal control that we identify during our audit.

We also provide those charged with governance with a statement that we 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 our independence, and where applicable, related safeguards.

From the matters communicated with those charged with governance, we determine those matters that were of most significance in the audit of the consolidated financial statements for the year ended December 31, 2019 and are therefore the key audit matters. We describe these matters in our auditors' report unless law or regulation precludes public disclosure about the matter or when, in extremely rare circumstances, we determine that a matter should not be communicated in our report because the adverse consequences of doing so would reasonably be expected to outweigh the public interest benefits of such communication.

The engagement partners on the audit resulting in this independent auditors' report are Ya-Ling Wong and Chih-Ming Shao.

Ya-Ling Wong

Chih-ming, Shao

Deloitte & Touche
Taipei, Taiwan
Republic of China

March 20, 2020

<u>*Notice to Readers*</u>

The accompanying consolidated financial statements are intended only to present the consolidated financial position, financial performance and cash flows in accordance with accounting principles and practices generally accepted in the Republic of China and not those of any other jurisdictions. The standards, procedures and practices to audit such consolidated financial statements are those generally applied in the Republic of China.

For the convenience of readers, the independent auditors' report and the accompanying consolidated financial statements have been translated into English from the original Chinese version prepared and used in the Republic of China. If there is any conflict between the English version and the original Chinese version or any difference in the interpretation of the two versions, the Chinese-language independent auditors' report and consolidated financial statements shall prevail.

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED BALANCE SHEETS
DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars)

	2019		2018	
ASSETS	**Amount**	**%**	**Amount**	**%**
CURRENT ASSETS				
Cash and cash equivalents (Notes 4 and 6)	$ 53,572,620	15	$ 48,507,889	14
Financial assets at fair value through profit or loss (Notes 4, 7 and 30)	502,005	-	549,838	-
Financial assets at fair value through other comprehensive income (Notes 4, 8, 30 and 32)	7,180,745	2	6,334,259	2
Financial assets at amortized cost (Notes 4, 6, 30 and 32)	4,745,911	1	2,664,157	1
Notes receivable (Notes 4 and 9)	31,258,167	9	29,748,544	9
Accounts receivable (Notes 4, 9, 10 and 32)	8,838,553	2	8,216,174	2
Notes and accounts receivable from related parties (Notes 4 and 31)	300,000	-	271,618	-
Other receivables (Notes 4 and 25)	913,545	-	955,814	-
Inventories (Notes 4 and 11)	8,132,977	2	9,464,303	3
Prepayments (Note 18)	1,790,795	1	3,034,021	1
Other current assets (Notes 13 and 31)	910,672	-	634,078	-
Total current assets	118,145,990	32	110,380,695	32
NON-CURRENT ASSETS				
Financial assets at fair value through other comprehensive income (Notes 4, 8, 30 and 32)	36,120,339	10	25,792,169	8
Financial assets at amortized cost (Notes 4, 30 and 32)	984,716	-	470,199	-
Investments accounted for by using the equity method (Notes 4, 13 and 32)	47,631,870	13	46,247,974	13
Property, plant and equipment (Notes 4, 14, 24 and 32)	89,881,319	24	91,093,825	26
Right-of-use assets (Notes 4, 15, 18, 24 and 31)	12,734,286	4	-	-
Investment properties (Notes 4, 16, 24 and 32)	6,322,209	2	6,344,460	2
Intangible assets (Notes 4, 17 and 24)	19,656,118	5	20,427,352	6
Prepayments for property, plant and equipment (Note 14)	2,992,315	1	2,624,195	1
Long-term lease receivables (Notes 4, 10 and 32)	-	-	30,951,796	9
Long-term finance lease receivables (Notes 4 and 10)	29,253,336	8	-	-
Net defined benefit asset (Notes 4 and 22)	1,434,342	-	999,648	-
Long-term prepayments for leases (Note 18)	-	-	6,584,246	2
Other non-current assets (Notes 4 and 25)	2,325,545	1	2,168,559	1
Total non-current assets	249,336,395	68	233,704,423	68
TOTAL	$ 367,482,385	100	$ 344,085,118	100
LIABILITIES AND EQUITY				
CURRENT LIABILITIES				
Short-term loans (Notes 19, 28 and 32)	$ 30,445,048	8	$ 26,226,051	8
Short-term bills payable (Note 19)	5,875,398	2	7,402,214	2
Financial liabilities at fair value through profit or loss (Notes 4, 7, 20 and 30)	-	-	139,460	-
Contract liabilities	5,041,554	1	5,114,644	2
Notes and accounts payable (Note 31)	7,427,013	2	7,808,921	2
Other payables (Notes 21, 31 and 33)	11,225,404	3	11,683,170	3
Current income tax liabilities (Notes 4 and 25)	4,443,343	1	4,090,640	1
Lease liabilities (Notes 4 and 15)	416,346	-	-	-
Long-term loans - current portion (Notes 19, 28 and 32)	1,624,138	1	1,923,945	1
Other current liabilities	34,499	-	114,799	-
Total current liabilities	66,532,743	18	64,503,844	19
NON-CURRENT LIABILITIES				
Bonds payable (Notes 4 and 20)	35,699,778	10	22,777,693	7
Long-term loans (Notes 19, 28 and 32)	30,553,035	8	24,631,973	7
Lease liabilities (Notes 4 and 15)	2,073,806	1	-	-
Deferred income tax liabilities (Notes 4 and 25)	11,588,934	3	11,326,154	3
Long-term bills payable (Note 19)	11,800,966	3	22,476,880	7
Net defined benefit liabilities (Notes 4 and 22)	97,401	-	210,515	-
Other non-current liabilities	673,855	-	778,603	-
Total non-current liabilities	92,487,775	25	82,201,818	24
Total liabilities	159,020,518	43	146,705,662	43
EQUITY ATTRIBUTABLE TO SHAREHOLDERS OF THE PARENT (Notes 4, 23 and 27)				
Share capital	56,656,192	15	53,080,599	15
Capital surplus	48,015,947	13	47,836,241	14
Retained earnings	65,626,033	18	61,588,761	18
Others	23,734,855	7	19,038,454	6
Treasury shares	(348,959)	-	(2,545)	-
Equity attributable to shareholders of the parent	193,684,068	53	181,541,510	53
NON-CONTROLLING INTERESTS (Notes 23 and 27)	14,777,799	4	15,837,946	4
Total equity	208,461,867	57	197,379,456	57
TOTAL	$ 367,482,385	100	$ 344,085,118	100

The accompanying notes are an integral part of the consolidated financial statements.

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME
FOR THE YEARS ENDED DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars, Except Earnings Per Share)

	2019		2018	
	Amount	**%**	**Amount**	**%**
OPERATING REVENUE (Notes 4 and 31)	$ 122,783,014	100	$ 124,594,602	100
OPERATING COSTS (Notes 4, 11, 24 and 31)	86,872,759	71	91,003,063	73
GROSS PROFIT	35,910,255	29	33,591,539	27
OPERATING EXPENSES (Notes 24 and 31)				
Marketing	1,013,114	-	901,611	1
General and administrative	4,699,672	4	4,485,361	4
Research and development	40,748	-	23,666	-
Total operating expenses	5,753,534	4	5,410,638	5
INCOME FROM OPERATIONS	30,156,721	25	28,180,901	22
NON-OPERATING INCOME AND EXPENSES				
Share of profit of associates and joint ventures (Notes 4 and 13)	2,509,388	2	2,263,413	2
Interest income (Note 4)	815,805	1	584,482	-
Dividend income (Note 4)	1,448,451	1	1,326,142	1
Other income (Note 24)	1,256,575	1	884,648	1
Finance costs (Notes 4 and 24)	(2,199,118)	(2)	(2,460,302)	(2)
Net loss on disposal of property, plant and equipment	(162,793)	-	(78,190)	-
Other expenses (Note 24)	(401,427)	-	(174,405)	-
Foreign exchange gains (losses), net	(15,399)	-	48,764	-
Impairment loss recognized on non-financial assets (Note 14)	(774,784)	(1)	(31,032)	-
Total non-operating income and expenses	2,476,698	2	2,363,520	2
INCOME BEFORE INCOME TAX	32,633,419	27	30,544,421	24
INCOME TAX EXPENSE (Notes 4 and 25)	7,178,329	6	7,900,350	6
NET INCOME	25,455,090	21	22,644,071	18

(Continued)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME
FOR THE YEARS ENDED DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars, Except Earnings Per Share)

	2019		2018	
	Amount	**%**	**Amount**	**%**
OTHER COMPREHENSIVE INCOME (LOSS) (Note 4)				
Items that will not be reclassified subsequently to profit or loss:				
Remeasurement of defined benefit plan (Note 22)	$ 402,890	-	$ 93,286	-
Unrealized gain on investments in equity instruments at fair value through other comprehensive income (Note 23)	11,208,989	9	1,420,706	1
Share of other comprehensive income (loss) of associates and joint ventures (Note 23)	163,201	-	(168,150)	-
Income tax expense related to items that will not be reclassified subsequently to profit or loss (Note 25)	(80,567)	-	(26,091)	-
	11,694,513	9	1,319,751	1
Items that may be reclassified subsequently to profit or loss:				
Exchange differences on translating foreign operations (Note 23)	(4,792,103)	(4)	(3,973,489)	(3)
Share of other comprehensive loss of associates and joint ventures accounted for using the equity method (Note 23)	(1,877,651)	(1)	(284,799)	-
Income tax expense related to items that may be reclassified subsequently to profit or loss (Note 25)	-	-	1,861	-
	(6,669,754)	(5)	(4,256,427)	(3)
Other comprehensive income (loss) for the year, net of income tax	5,024,759	4	(2,936,676)	(2)
TOTAL COMPREHENSIVE INCOME FOR THE YEAR	$ 30,479,849	25	$ 19,707,395	16
NET INCOME ATTRIBUTABLE TO:				
Shareholders of the parent	$ 24,211,081	20	$ 21,180,821	17
Non-controlling interests	1,244,009	1	1,463,250	1
	$ 25,455,090	21	$ 22,644,071	18
TOTAL COMPREHENSIVE INCOME (LOSS) ATTRIBUTABLE TO:				
Shareholders of the parent	$ 29,178,084	24	$ 18,245,179	15
Non-controlling interests	1,301,765	1	1,462,216	1
	$ 30,479,849	25	$ 19,707,395	16

(Continued)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME
FOR THE YEARS ENDED DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars, Except Earnings Per Share)

	Income Attributable to Shareholders of the Parent	
	2019	**2018**
EARNINGS PER SHARE (Note 26)		
Basic earnings per share	$4.43	$4.08
Diluted earnings per share	$4.25	$4.08

The accompanying notes are an integral part of the consolidated financial statements. (Concluded)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CHANGES IN EQUITY
FOR THE YEARS ENDED DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars)

	Equity Attributable to Shareholders of the Parent														
	Share Capital			Retained Earnings			Others							
	Ordinary Shares	Preferred Shares	Capital Surplus	Legal Reserve	Special Reserve	Unappropriated Earnings	Total	Exchange Difference on Translating Foreign Operations	Unrealized Gain/Loss from Available-for-sale Financial Assets	Unrealized Gain on Financial Assets at Fair Value Through Other Comprehensive Income	Gain on Hedging Instruments	Treasury Shares	Total	Non-controlling Interests	Total Equity
BALANCE AT JANUARY 1, 2018	$ 42,465,090	$ -	$ 25,739,065	$ 14,025,109	$ 13,049,635	$ 21,944,766	$ 49,019,510	$ (790,475)	$ 19,915,014	$ -	$ -	$ -	$ 136,348,204	$ 16,299,012	$ 152,647,216
Adjustment on initial application of IFRS 9	-	-	-	-	-	654,005	654,005	-	(19,915,014)	24,158,871	-	-	4,897,862	16,365	4,914,227
BALANCE AT JANUARY 1, 2018 AFTER THE IMPACT OF RETROSPECTIVE APPLICATION OF IFRS 9	42,465,090	-	25,739,065	14,025,109	13,049,635	22,598,771	49,673,515	(790,475)	-	24,158,871	-	-	141,246,066	16,315,377	157,561,443
Appropriation of 2017 earnings															
Legal reserve	-	-	-	759,425	-	(759,425)	-	-	-	-	-	-	-	-	-
Cash dividends distributed by the Corporation	-	-	-	-	-	(6,360,764)	(6,360,764)	-	-	-	-	-	(6,360,764)	-	(6,360,764)
Share dividends distributed by the Corporation	4,240,509	-	-	-	-	(4,240,509)	(4,240,509)	-	-	-	-	-	-	-	-
Cash dividends distributed by subsidiaries	-	-	-	-	-	-	-	-	-	-	-	-	-	(2,175,906)	(2,175,906)
Net income for the year ended December 31, 2018	-	-	-	-	-	21,180,821	21,180,821	-	-	-	-	-	21,180,821	1,463,250	22,644,071
Other comprehensive income (loss) for the year ended December 31, 2018, net of income tax	-	-	-	-	-	73,268	73,268	(4,246,746)	-	1,236,727	1,109	-	(2,935,642)	(1,034)	(2,936,676)
Total comprehensive income (loss) for the year ended December 31, 2018	-	-	-	-	-	21,254,089	21,254,089	(4,246,746)	-	1,236,727	1,109	-	18,245,179	1,462,216	19,707,395
Issuance of global depositary shares	4,375,000	-	12,339,355	-	-	-	-	-	-	-	-	-	16,714,355	-	16,714,355
Issuance of preference shares	-	2,000,000	7,973,907	-	-	-	-	-	-	-	-	-	9,973,907	-	9,973,907
Organization restructuring	-	-	-	-	-	(58,513)	(58,513)	-	-	-	-	-	(58,513)	(49,150)	(107,663)
Difference between consideration and the carrying amount of subsidiaries' net assets during actual acquisitions or disposals	-	-	466,755	-	-	-	-	-	-	-	-	-	466,755	285,387	752,142
Changes in ownership interests of subsidiaries	-	-	41	-	-	-	-	-	-	-	-	-	41	22	63
Changes in capital surplus from investments in associates and joint ventures accounted for using the equity method	-	-	(459)	-	-	(89)	(89)	-	-	-	-	-	(548)	-	(548)
Disposals of investments in equity instruments at fair value through other comprehensive income	-	-	-	-	-	1,321,032	1,321,032	-	-	(1,321,032)	-	-	-	-	-
Reversal of special reserve recognized from asset disposals	-	-	-	-	(573)	573	-	-	-	-	-	-	-	-	-
Equity components of issuance of convertible bonds	-	-	1,308,070	-	-	-	-	-	-	-	-	-	1,308,070	-	1,308,070
Buy-back of treasury shares	-	-	-	-	-	-	-	-	-	-	-	(218,166)	(218,166)	-	(218,166)
Compensation costs of treasury shares transferred to employees	-	-	45,448	-	-	-	-	-	-	-	-	-	45,448	-	45,448
Treasury shares transfer to employees	-	-	(35,941)	-	-	-	-	-	-	-	-	215,621	179,680	-	179,680
BALANCE AT DECEMBER 31, 2018	51,080,599	2,000,000	47,836,241	14,784,534	13,049,062	33,755,165	61,588,761	(5,037,221)	-	24,074,566	1,109	(2,545)	181,541,510	15,837,946	197,379,456
Appropriation of 2018 earnings															
Legal reserve	-	-	-	2,118,082	-	(2,118,082)	-	-	-	-	-	-	-	-	-
Cash dividends distributed by the Corporation	-	-	-	-	-	(16,856,367)	(16,856,367)	-	-	-	-	-	(16,856,367)	-	(16,856,367)
Preferred share dividends distributed by the Corporation	-	-	-	-	-	(18,219)	(18,219)	-	-	-	-	-	(18,219)	-	(18,219)
Share dividends distributed by the Corporation	3,575,593	-	-	-	-	(3,575,593)	(3,575,593)	-	-	-	-	-	-	-	-
Cash dividends distributed by subsidiaries	-	-	-	-	-	-	-	-	-	-	-	-	-	(2,219,308)	(2,219,308)
Net income for the year ended December 31, 2019	-	-	-	-	-	24,211,081	24,211,081	-	-	-	-	-	24,211,081	1,244,009	25,455,090
Other comprehensive income (loss) for the year ended December 31, 2019, net of income tax	-	-	-	-	-	276,370	276,370	(6,623,040)	-	11,320,550	(6,877)	-	4,967,003	57,756	5,024,759
Total comprehensive income (loss) for the year ended December 31, 2019	-	-	-	-	-	24,487,451	24,487,451	(6,623,040)	-	11,320,550	(6,877)	-	29,178,084	1,301,765	30,479,849
Difference between consideration and the carrying amount of subsidiaries' net assets during actual acquisitions or disposals	-	-	29	-	-	-	-	-	-	-	-	-	29	(146,476)	(146,447)
Changes in capital surplus from investments in associates and joint ventures accounted for using the equity method	-	-	179,275	-	-	-	-	-	-	-	-	-	179,275	26	179,301
Basis adjustment for gain on hedging instruments	-	-	-	-	-	-	-	-	-	-	5,768	-	5,768	3,846	9,614
Compensation costs of treasury shares transferred to employees	-	-	826	-	-	-	-	-	-	-	-	-	826	-	826
Treasury shares transfer to employees	-	-	(424)	-	-	-	-	-	-	-	-	2,545	2,121	-	2,121
Buy-back of treasury shares	-	-	-	-	-	-	-	-	-	-	-	(348,959)	(348,959)	-	(348,959)
BALANCE AT DECEMBER 31, 2019	$ 54,656,192	$ 2,000,000	$ 48,015,947	$ 16,902,616	$ 13,049,062	$ 35,674,355	$ 65,626,033	$ (11,660,261)	$ -	$ 35,395,116	$ -	$ (348,959)	$ 193,684,068	$ 14,777,799	$ 208,461,867

The accompanying notes are an integral part of the consolidated financial statements.

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CASH FLOWS
FOR THE YEARS ENDED DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars)

	2019	2018
CASH FLOWS FROM OPERATING ACTIVITIES		
Income before income tax	$ 32,633,419	$ 30,544,421
Adjustments for:		
Depreciation expense	6,909,487	6,129,527
Amortization expense	430,278	387,194
Net gain on fair value changes of financial assets and liabilities at fair value through profit or loss	(179,256)	(19,306)
Finance costs	2,199,118	2,460,302
Interest income	(815,805)	(584,482)
Dividend income	(1,448,451)	(1,326,142)
Share-based compensation	826	45,448
Share of profit of associates and joint ventures	(2,509,388)	(2,263,413)
Loss on disposal of property, plant and equipment, net	162,793	78,190
Loss on disposal of investment properties	-	16,642
Gain on disposal of investments, net	(181,349)	-
Impairment loss recognized on non-financial assets	774,784	31,032
(Reversal of) write-downs of inventories	(36,520)	82,954
Unrealized loss (gain) on foreign exchange, net	(142,906)	240,681
Others	-	229,352
Changes in operating assets and liabilities:		
Financial assets mandatorily classified as at fair value through profit or loss	87,629	(10,517)
Notes receivable	(2,605,525)	(10,376,722)
Accounts receivable	(647,799)	(1,147,369)
Notes and accounts receivable from related parties	(31,332)	(40,768)
Other receivables	(406,220)	(138,518)
Inventories	1,217,372	(1,298,491)
Prepayments	1,001,688	(56,930)
Other current assets	58,080	(90,635)
Contract liabilities	(51,772)	598,875
Notes and accounts payable	(195,057)	88,650
Other payables	(692,642)	2,970,433
Other current liabilities	(80,244)	(34,006)
Net defined benefit liability	(144,918)	(9,907)
Cash generated from operations	35,306,290	26,506,495
Income tax paid	(6,435,021)	(4,355,775)
Net cash generated from operating activities	28,871,269	22,150,720

(Continued)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CASH FLOWS
FOR THE YEARS ENDED DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars)

	2019	2018
CASH FLOWS FROM INVESTING ACTIVITIES		
Purchases of financial assets at fair value through other comprehensive income	$ -	$ (292,469)
Proceeds from disposal of financial assets at fair value through other comprehensive income	4,584	1,333
Purchases of financial assets at amortized cost	(2,766,430)	(1,567,977)
Acquisition of investments accounted for by using the equity method	(1,284,750)	(33,485,490)
Disposal of investments accounted for by using the equity method	41,116	-
Proceeds from the return of capital upon investees' capital reduction of investees measured by using the equity method	-	10,884
Payments for property, plant and equipment	(8,201,795)	(4,317,919)
Proceeds from disposal of property, plant and equipment	522,037	389,942
Payments for intangible assets	(106,261)	(54,885)
Payments for right-of-use assets	(4,122,514)	-
Disposal of right-of-use assets	4,690	-
Decrease in long-term finance lease receivables	1,698,460	1,473,788
Decrease (increase) in other non-current assets	(237,937)	292,444
Increase in prepayments for leases	-	(158,408)
Interest received	852,229	538,327
Dividends received	2,472,266	1,598,131
Net cash used in investing activities	(11,124,305)	(35,572,299)
CASH FLOWS FROM FINANCING ACTIVITIES		
Increase in short-term loans	4,364,712	5,760,814
Issuance of bonds payable	12,562,200	24,223,847
Increase in long-term loans	14,459,444	16,244,617
Repayments of long-term loans	(8,747,894)	(48,536,395)
Increase (decrease) in long-term bills payable	(10,675,914)	22,476,880
Decrease in short-term bills payable	(1,526,816)	(589,203)
Repayment of the principal portion of lease liabilities	(437,093)	-
Increase (decrease) in other non-current liabilities	(103,829)	166,171
Cash dividends paid	(19,093,894)	(8,536,670)
Issuance of shares for cash	-	26,688,262
Treasury shares transfer to employees	2,121	179,680
Payment for buy-back of treasury shares	(348,959)	(218,166)
Acquisitions of subsidiaries	(1,017)	(170,899)
Partial disposals of interests in subsidiaries without a loss of control	-	788,539
Interest paid	(2,102,028)	(2,249,022)
Changes in non-controlling equity interest	7,621	-
Net cash generated from (used in) financing activities	(11,641,346)	36,228,455
EFFECTS OF EXCHANGE RATE CHANGES ON CASH AND CASH EQUIVALENTS	(1,040,887)	(630,205)

(Continued)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CASH FLOWS
FOR THE YEARS ENDED DECEMBER 31, 2019 AND 2018
(In Thousands of New Taiwan Dollars)

	2019	2018
NET INCREASE IN CASH AND CASH EQUIVALENTS	$ 5,064,731	22,176,671
CASH AND CASH EQUIVALENTS AT THE BEGINNING OF THE YEAR	48,507,889	26,331,218
CASH AND CASH EQUIVALENTS AT THE END OF THE YEAR	$ 53,572,620	$ 48,507,889

The accompanying notes are an integral part of the consolidated financial statements. (Concluded)

1. GENERAL INFORMATION

Taiwan Cement Corporation (the "Corporation") was incorporated in 1946 and was restructured as a company limited by shares in 1951, which was jointly operated by the Ministry of Economics Resource Committee and the Taiwan Provincial Government. In 1954, the Corporation privatized as a result of the Taiwan government's land reform program, land-to-the-tiller policy. The Corporation engages in the manufacture and marketing of cement, cement-related products and ready-mixed concrete. The Corporation's shares have been listed on the Taiwan Stock Exchange since February 1962.

The consolidated financial statements of the Corporation and its subsidiaries, collectively referred to as the "Group", are presented in New Taiwan dollars, the functional currency of the Corporation.

2. APPROVAL OF FINANCIAL STATEMENTS

The consolidated financial statements were approved by the Corporation's board of directors on March 20, 2020.

3. APPLICATION OF NEW, AMENDED AND REVISED STANDARDS AND INTERPRETATIONS

a. Initial application of the amendments to the Regulations Governing the Preparation of Financial Reports by Securities Issuers and the International Financial Reporting Standards (IFRS), International Accounting Standards (IAS), Interpretations of IFRS (IFRIC), and Interpretations of IAS (SIC) (collectively, the "IFRSs") endorsed and issued into effect by the FSC

   Except for the following, the initial application of the amendments to the Regulations Governing the Preparation of Financial Reports by Securities Issuers and the IFRSs endorsed and issued into effect by the FSC would not have any material impact on the Group's accounting policies:

   IFRS 16 "Leases"

   IFRS 16 provides a comprehensive model for the identification of lease arrangements and their treatment in the financial statements of both lessee and lessor. It supersedes IAS 17 "Leases", IFRIC 4 "Determining whether an Arrangement contains a Lease", and a number of related interpretations. Refer to Note 4 for information relating to the relevant accounting policies.

   Definition of a lease

   The Group elects to apply the guidance of IFRS 16 in determining whether contracts are, or contain, a lease only to contracts entered into (or changed) on or after January 1, 2019. Contracts identified as containing a lease under IAS 17 and IFRIC 4 are not reassessed and are accounted for in accordance with the transitional provisions under IFRS 16.

The Group as lessee

The Group recognizes right-of-use assets and lease liabilities for all leases on the consolidated balance sheets except for those whose payments under low-value asset and short-term leases are recognized as expenses on a straight-line basis. On the consolidated statements of comprehensive income, the Group presents the depreciation expense charged on right-of-use assets separately from the interest expense accrued on lease liabilities; interest is computed using the effective interest method. On the consolidated statements of cash flows, cash payments for the principal portion of lease liabilities are classified within financing activities; cash payments for the interest portion are classified within financing activities. Prior to the application of IFRS 16, payments under operating lease contracts were recognized as expenses on a straight-line basis. Prepaid lease payments for land use rights in China were recognized as prepayments for leases. Cash flows for operating leases were classified within operating activities on the consolidated statements of cash flows. Leased assets and finance lease payables were recognized on the consolidated balance sheets for contracts classified as finance leases.

The Group elected to apply IFRS 16 retrospectively with the cumulative effect of the initial application of this standard recognized in retained earnings on January 1, 2019. Comparative information was not restated.

Lease liabilities were recognized on January 1, 2019 for leases previously classified as operating leases under IAS 17. Lease liabilities were measured at the present value of the remaining lease payments, discounted using the lessee's incremental borrowing rate on January 1, 2019. Right-of-use assets are measured at either an amount equal to the lease liabilities, adjusted by the amount of any prepaid or accrued lease payments, or their carrying amount as if IFRS 16 had been applied since the commencement date, but discounted using the aforementioned incremental borrowing rate. The Group applies IAS 36 to all right-of-use assets.

The Group also applies the following practical expedients:

1) The Group applies a single discount rate to a portfolio of leases with reasonably similar characteristics to measure lease liabilities.

2) The Group accounts for those leases for which the lease term ends on or before December 31, 2019 as short-term leases.

3) The Group excludes initial direct costs from the measurement of right-of-use assets on January 1, 2019.

4) The Group uses hindsight, such as in determining lease terms, to measure lease liabilities.

For leases previously classified as finance leases under IAS 17, the carrying amounts of right-of-use assets and lease liabilities on January 1, 2019 were determined as at the carrying amounts of the respective leased assets and finance lease payables on December 31, 2018.

The lessee’s weighted average incremental borrowing rate applied to lease liabilities recognized on January 1, 2019 was 1.9%. The difference between the (i) lease liabilities recognized and (ii) operating lease commitments disclosed under IAS 17 on December 31, 2018 is explained as follows:

The future minimum lease payments of non-cancellable operating lease commitments on December 31, 2018	$ 3,609,135
Less: Recognition exemption for short-term leases	(364,039)
Less: Recognition exemption for leases of low-value assets	(852)
Undiscounted amounts on January 1, 2019	$ 3,244,244
Discounted amounts using the incremental borrowing rate and lease liabilities recognized on January 1, 2019	$ 2,657,935

The Group as lessor

The Group does not make any adjustments for leases in which it is a lessor, and it accounts for those leases with the application of IFRS 16 starting from January 1, 2019.

The impact on assets and liabilities as of January 1, 2019 from the initial application of IFRS 16 is set out as follows:

	As Originally Stated on January 1, 2019	**Adjustments Arising from Initial Application**	**Restated on January 1, 2019**
Lease receivables - non-current	$ 30,951,796	$ (30,951,796)	$ -
Finance lease receivables - non-current	-	30,951,796	30,951,796
Prepayments	3,034,021	(228,483)	2,805,538
Other current assets	634,078	(23,118)	610,960
Prepayments for leases - non-current	6,584,246	(6,584,246)	-
Right-of-use assets	-	9,493,782	9,493,782
Total effect on assets	$ 41,204,141	$ 2,657,935	$ 43,862,076
Lease liabilities - current	$ -	$ 338,183	$ 338,183
Lease liabilities - non-current	-	2,319,752	2,319,752
Total effect on liabilities	$ -	$ 2,657,935	$ 2,657,935

b. The IFRSs endorsed by the FSC for application starting 2020

New IFRSs	**Effective Date Announced by IASB (Note 1)**
Amendments to IFRS 3 “Definition of a Business”	January 1, 2020 (Note 2)
Amendments to IFRS 9, IAS 39 and IFRS7 “Interest Rate Benchmark Reform”	January 1, 2020 (Note 3)
Amendments to IAS 1 and IAS 8 “Definition of Material”	January 1, 2020 (Note 4)

Note 1: Unless stated otherwise, the above New IFRSs are effective for annual periods beginning on or after their respective effective dates.

Note 2: The Group shall apply these amendments to business combinations for which the acquisition date is on or after the beginning of the first annual reporting period beginning on or after January 1, 2020 and to asset acquisitions that occur on or after the beginning of that period.

Note 3: The Group shall apply these amendments prospectively for annual reporting periods beginning on or after January 1, 2020.

Note 4: The Group shall apply these amendments prospectively for annual reporting periods beginning on or after January 1, 2020.

Except for the above impact, as of the date the consolidated financial statements were authorized for issue, the Group is continuously assessing the possible impact that the application of other standards and interpretations will have on the Group's financial position and financial performance and will disclose the relevant impact when the assessment is completed.

c. The New IFRSs issued by IASB but not yet endorsed and issued into effect by FSC

New IFRSs	Effective Date Issued by IASB (Note)
Amendments to IFRS 10 and IAS 28 "Sale or Contribution of Assets between An Investor and Its Associate or Joint Venture"	To be determined by IASB
IFRS 17 "Insurance Contracts"	January 1, 2021
Amendments to IAS 1 "Classification of Liabilities as Current or Non-Current"	January 1, 2022

Note: Unless stated otherwise, the above New IFRSs are effective for annual periods beginning on or after their respective effective dates.

Amendments to IAS 1 "Classification of Liabilities as Current or Non-Current"

The amendments clarify that for a liability to be classified as non-current, the Group shall assess whether it has the right at the end of the reporting period to defer settlement of the liability for at least twelve months after the reporting period. If such rights are in existence at the end of the reporting period, the liability is classified as non-current regardless of whether the Group will exercise that right. The amendments also clarify that, if the right to defer settlement is subject to compliance with specified terms, the Group must comply with those terms at the end of the reporting period even if the lender does not test compliance until a later date.

The amendments stipulate that, for the purpose of liability classification, the aforementioned settlement refers to a transfer of cash, other economic resources or the Group's own equity instruments to the counterparty that results in the extinguishment of the liability. However, if the terms of a liability that could, at the option of the counterparty, result in its settlement by a transfer of the Group's own equity instruments, and if such option is recognized separately as equity in accordance with IAS 32: Financial Instruments: Presentation, the aforementioned terms would not affect the classification of the liability.

Except for the above impact, as of the date the consolidated financial statements were authorized for issue, the Group is continuously assessing the possible impact that the application of other standards and interpretations will have on the Group's financial position and financial performance and will disclose the relevant impact when the assessment is completed.

4. SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

a. Statement of compliance

The consolidated financial statements have been prepared in accordance with the Regulations Governing the Preparation of Financial Reports by Securities Issuers.

b. Basis of preparation

The consolidated financial statements have been prepared on the historical cost basis except for financial instruments which are measured at fair value and the net defined benefit liability (asset) which is measured at the present value of the defined benefit obligation less the fair value of the plan assets.

The fair value measurements, which are grouped into Levels 1 to 3 on the basis of the degree to which the fair value measurement inputs are observable and the significance of the inputs to the fair value measurement in its entirety, are described as follows:

1) Level 1 inputs are quoted prices (unadjusted) in active markets for identical assets or liabilities;

2) Level 2 inputs are inputs other than quoted prices included within Level 1 that are observable for an asset or liability, either directly (i.e. as prices) or indirectly (i.e. derived from prices); and

3) Level 3 inputs are unobservable inputs on an asset or liability.

c. Classification of current and non-current assets and liabilities

Current assets include:

1) Assets held primarily for the purpose of trading;

2) Assets expected to be realized within 12 months after the reporting period; and

3) Cash and cash equivalents, unless an asset is restricted from being exchanged or used to settle a liability for at least 12 months after the reporting period.

Current liabilities include:

1) Liabilities held primarily for the purpose of trading;

2) Liabilities due to be settled within 12 months after the reporting period; and

3) Liabilities for which the Group does not have an unconditional right to defer settlement for at least 12 months after the reporting period.

Assets and liabilities that are not classified as current are classified as non-current.

The Group engages in the construction business, which has an operating cycle of over 1 year. The normal operating cycle applies when considering the classification of the Group’s construction-related assets and liabilities.

d. Basis of consolidation

The consolidated financial statements incorporate the financial statements of the Corporation and the entities controlled by the Corporation.

Income and expenses of subsidiaries acquired or disposed of during the period are included in the consolidated statement of profit or loss and other comprehensive income from the effective dates of acquisitions or up to the effective dates of disposals, as appropriate.

When necessary, adjustments are made to the financial statements of subsidiaries to bring their accounting policies into line with those used by the Group.

All intra-group transactions, balances, income and expenses are eliminated in full upon consolidation. Total comprehensive income of subsidiaries is attributed to the owners of the Corporation and to the non-controlling interests even if this results in the non-controlling interests having a deficit balance.

Changes in the Group’s ownership interests in subsidiaries that do not result in the Group losing control over the subsidiaries are accounted for as equity transactions. The carrying amounts of the Group’s interests and the non-controlling interests are adjusted to reflect the changes in their relative interests in the subsidiaries. Any difference between the amount by which the non-controlling interests are adjusted and the fair value of the consideration paid or received is recognized directly in equity and attributed to the owners of the Corporation.

When the Group loses control of a subsidiary, a gain or loss is recognized in profit or loss and is calculated as the difference between (i) the aggregate of the fair value of the consideration received and any investment retained in the former subsidiary at its fair value at the date when control is lost and (ii) the assets (including any goodwill) and liabilities and any non-controlling interests of the former subsidiary at their carrying amounts at the date when control is lost. The Group accounts for all amounts recognized in other comprehensive income in relation to that subsidiary on the same basis as would be required had the Group had directly disposed of the related assets or liabilities.

The fair value of any investment retained in the former subsidiary at the date when control is lost is regarded as the cost on initial recognition of an investment in an associate.

Refer to Table 8: Information on investees for the detailed information on subsidiaries (including the percentages of ownership and main businesses.

e. Business combinations

Acquisitions of businesses are accounted for by using the acquisition method. Acquisition-related costs are generally recognized in profit or loss as they are incurred.

Goodwill is measured as the excess of the sum of the consideration transferred, the amount of any non-controlling interests in the acquiree, and the fair value of the acquirer’s previously held equity interests in the acquiree over the net of the acquisition-date amounts of the identifiable assets acquired and the liabilities assumed.

For each business combination, the Group measures the non-controlling interests at either fair value or the share in the recognized amounts of the acquiree’s identifiable net assets. Non-controlling interests that are present ownership interests and entitle their holders to a proportionate share of the entity’s net assets, in the event of liquidation, may be initially measured at the non-controlling interests’ proportionate share of the recognized amounts of the acquiree’s identifiable net assets. The choice of the measurement basis is made on a transaction-by-transaction basis. Other types of non-controlling interests are measured at fair value.

When a business combination is achieved in stages, the Group’s previously held equity interest in an acquiree is remeasured to fair value at the acquisition date, and the resulting gain or loss is recognized in profit or loss. Amounts arising from interests in the acquiree prior to the acquisition date that have previously been recognized in other comprehensive income are recognized on the same basis as would be required if those interests were directly disposed of by the Group.

If the initial accounting for a business combination is incomplete by the end of the reporting period in which the combination occurs, the Group reports provisional amounts for the items for which the accounting is incomplete. Those provisional amounts are adjusted retrospectively during the measurement period or additional assets or liabilities are recognized to reflect new information obtained about facts and circumstances that existed as of the acquisition date that, if known, would have affected the amounts recognized as of that date.

f. Foreign currencies

In preparing the financial statements of each individual group entity, transactions in currencies other than the entity's functional currency (i.e. foreign currencies) are recognized at the rates of exchange prevailing at the dates of the transactions.

At the end of each reporting period, monetary items denominated in foreign currencies are retranslated at the rates prevailing at that date. Exchange differences on monetary items arising from settlement or translation are recognized in profit or loss in the period except for exchange differences on transactions entered into in order to hedge certain foreign currency risks.

Non-monetary items measured at fair value that are denominated in foreign currencies are retranslated at the rates prevailing at the date when the fair value was determined. Exchange differences arising from the retranslation of non-monetary items are included in profit or loss for the period except for exchange differences arising from the retranslation of non-monetary items in respect of which gains and losses are recognized directly in other comprehensive income, and in which case, the exchange differences are also recognized directly in other comprehensive income.

Non-monetary items that are measured at historical cost in a foreign currency are not retranslated.

For the purpose of presenting consolidated financial statements, the functional currencies of the Corporation and the group entities (including subsidiaries and associates in other countries that use currencies that are different from the currency of the Corporation) are translated into the presentation currency, the New Taiwan dollar, as follows: Assets and liabilities are translated at the exchange rates prevailing at the end of the reporting period; income and expense items are translated at the average exchange rates for the period. The resulting currency translation differences are recognized in other comprehensive income (attributed to the owners of the Corporation and non-controlling interests as appropriate).

On the disposal of a foreign operation (i.e. a disposal of the Group's entire interest in a foreign operation, or a disposal involving the loss of control over a subsidiary that includes a foreign operation, or a partial disposal of an interest in a joint arrangement or an associate that includes a foreign operation of which the retained interest becomes a financial asset), all of the exchange differences accumulated in equity in respect of that operation are reclassified to profit or loss.

In relation to a partial disposal of a subsidiary that does not result in the Group losing control over the subsidiary, the proportionate share of accumulated exchange differences is re-attributed to non-controlling interests of the subsidiary and is not recognized in profit or loss. For all other partial disposals, the proportionate share of the accumulated exchange differences recognized in other comprehensive income is reclassified to profit or loss.

Goodwill and fair value adjustments on identifiable assets and liabilities acquired arising from the acquisition of a foreign operation are treated as assets and liabilities of the foreign operation and translated at the rate of exchange prevailing at the end of each reporting period. Exchange differences arising are recognized in other comprehensive income.

g. Inventories

Inventories consist of raw materials, supplies, finished goods and work in process and are stated at the lower of cost or net realizable value. Inventory write-downs are made by item, except where it may be appropriate to group similar or related items. The net realizable value is the estimated selling price of inventories less all estimated costs of completion and costs necessary to make the sale. Inventories are recorded at the weighted-average cost on the end of reporting period.

h. Investments in associates and joint ventures

An associate is an entity over which the Group has significant influence and that is neither a subsidiary nor an interest in a joint venture. A joint venture is a joint arrangement whereby the Group and other parties that have joint control of the arrangement have rights to the net assets of the arrangement.

The Group uses the equity method to account for its investments in associates and joint ventures.

Under the equity method, investments in an associate and joint venture are initially recognized at cost and adjusted thereafter to recognize the Group's share of the profit or loss and other comprehensive income of the associate and joint venture. The Group also recognizes the changes in the Group's share of the equity of associates and joint ventures.

Any excess of the cost of an acquisition over the Group's share of the net fair value of the identifiable assets and liabilities of an associate or a joint venture at the date of acquisition is recognized as goodwill, which is included within the carrying amount of the investment and is not amortized. Any excess of the Group's share of the net fair value of the identifiable assets and liabilities over the cost of the acquisition, after reassessment, is recognized immediately in profit or loss.

When the Group subscribes for additional new shares of an associate and joint venture at a percentage different from its existing ownership percentage, the resulting carrying amount of the investment differs from the amount of the Group's proportionate interest in that associate and joint venture. The Group records such a difference as an adjustment to investments, with the corresponding amount charged or credited to capital surplus - changes in the Group's share of equity of associates and joint ventures. If the Group's ownership interest is reduced due to its additional subscription of the new shares of the associate and joint venture, the proportionate amount of the gains or losses previously recognized in other comprehensive income in relation to that associate and joint venture is reclassified to profit or loss on the same basis as would be required had the investee had directly disposed of the related assets or liabilities. When the adjustment should be debited to capital surplus, but the capital surplus recognized from investments accounted for by using the equity method is insufficient, the shortage is debited to retained earnings.

When the Group's share of losses of an associate and a joint venture equals or exceeds its interest in that associate and joint venture (which includes any carrying amount of the investment accounted for by using the equity method and long-term interests that, in substance, form part of the Group's net investment in the associate and joint venture), the Group discontinues recognizing its share of further losses. Additional losses and liabilities are recognized only to the extent that the Group has incurred legal obligations, or constructive obligations, or made payments on behalf of that associate and joint venture.

The entire carrying amount of an investment (including goodwill) is tested for impairment as a single asset by comparing its recoverable amount with its carrying amount. Any impairment loss recognized forms part of the carrying amount of the investment. Any reversal of that impairment loss is recognized to the extent that the recoverable amount of the investment subsequently increases.

The Group discontinues the use of the equity method from the date on which its investment ceases to be an associate and a joint venture. Any retained investment is measured at fair value at that date, and the fair value is regarded as the investment's fair value on its initial recognition as a financial asset. The difference between the previous carrying amount of the associate and joint venture attributable to the retained interest and its fair value is included in the determination of the gain or loss on disposal of the associate and the joint venture. The Group accounts for all amounts previously recognized in other comprehensive income in relation to that associate and joint venture on the same basis as would be required had that associate had directly disposed of the related assets or liabilities. If an investment in an associate becomes an investment in a joint venture or an investment in a joint venture becomes an investment in an associate, the Group continues to apply the equity method and does not remeasure the retained interest.

When a group entity transacts with its associate and joint venture, profits and losses resulting from the transactions with the associate and joint venture are recognized in the Group' consolidated financial statements only to the extent that interests in the associate and the joint venture are not related to the Group.

i. Property, plant and equipment

Property, plant and equipment are initially measured at cost and subsequently measured at cost less accumulated depreciation and accumulated impairment loss.

Property, plant and equipment in the course of construction are carried at cost less any recognized impairment loss. Cost includes professional fees and borrowing costs eligible for capitalization. Such assets are depreciated and classified to the appropriate categories of property, plant and equipment when completed and ready for their intended use.

Freehold land is not depreciated.

Depreciation of property, plant and equipment (including assets held under finance leases) is recognized using the straight-line method. Each significant part is depreciated separately. If a lease term is shorter than the assets' useful lives, such assets are depreciated over the lease term. The estimated useful lives, residual values and depreciation methods are reviewed at the end of each reporting period, with the effect of any changes in the estimates accounted for on a prospective basis.

On derecognition of an item of property, plant and equipment, the difference between the sales proceeds and the carrying amount of the asset is recognized in profit or loss.

j. Investment properties

Investment properties are properties held to earn rentals or for capital appreciation and land held for a currently undetermined future use.

Investment properties are measured initially at cost, including transaction costs. Subsequent to initial recognition, investment properties are measured at cost less accumulated depreciation and accumulated impairment loss. Depreciation is recognized using the straight-line method.

On derecognition of an investment property, the difference between the net disposal proceeds and the carrying amount of the asset is included in profit or loss.

k. Goodwill

Goodwill arising from the acquisition of a business is measured at cost as established at the date of the acquisition of the business less accumulated impairment loss.

For the purposes of impairment testing, goodwill is allocated to each of the Group's cash-generating units or groups of cash-generating units (referred to as "cash-generating units") that is expected to benefit from the synergies of the combination.

A cash-generating unit to which goodwill has been allocated is tested for impairment annually or more frequently when there is an indication that the unit may be impaired by comparing its carrying amount, including the attributed goodwill, with its recoverable amount. However, if the goodwill allocated to a cash-generating unit or groups of cash-generating units was acquired in a business combination during the current annual period, that unit shall be tested for impairment before the end of the current annual period. If the recoverable amount of the cash-generating unit or groups of cash-generating units is less than its carrying amount, the impairment loss is allocated first to reduce the carrying amount of any goodwill allocated to the unit and then to the other assets of the unit pro rata based on the carrying amount of each asset in the unit. Any impairment loss is recognized directly in profit or loss. An impairment loss recognized for goodwill is not reversed in subsequent periods.

If goodwill has been allocated to a cash-generating unit and the entity disposes of an operation within that unit, the goodwill associated with the operation that is disposed of is included in the carrying amount of the operation when determining the gain or loss on disposal and is measured on the basis of the relative values of the operation disposed of and the portion of the cash-generating unit retained.

l. Intangible assets

1) Intangible assets acquired separately

Intangible assets with finite useful lives that are acquired separately are initially measured at cost and subsequently measured at cost less accumulated amortization and accumulated impairment loss. Amortization is recognized on a straight-line basis. The estimated useful lives, residual values, and amortization methods are reviewed at the end of each reporting period, with the effect of any changes in the estimates accounted for on a prospective basis. Intangible assets with indefinite useful lives that are acquired separately are measured at cost less accumulated impairment loss.

When the Group has a right to charge for usage of concession infrastructure (as a consideration for providing construction services in a service concession arrangement), it is initially recognized as an intangible asset at its fair value. The intangible asset is subsequently measured at cost less accumulated amortization and any accumulated impairment loss.

2) Intangible assets acquired in a business combination

Intangible assets acquired in a business combination and recognized separately from goodwill are initially recognized at their fair value at the acquisition date. Subsequent to initial recognition, they are measured on the same basis as intangible assets that are acquired separately.

3) Derecognition of intangible assets

On derecognition of an intangible asset, the difference between the net disposal proceeds and the carrying amount of the asset is recognized in profit or loss.

m. Impairment of tangible and intangible assets other than goodwill

At the end of each reporting period, the Group reviews the carrying amounts of its tangible and intangible assets, excluding goodwill, to determine whether there is any indication that those assets have suffered any impairment loss. If any such indication exists, the recoverable amount of the asset is estimated in order to determine the extent of the impairment loss. When it is not possible to estimate the recoverable amount of an individual asset, the Group estimates the recoverable amount of the cash-generating unit to which the asset belongs. Group assets are allocated to the smallest group of cash-generating units on a reasonable and consistent basis of allocation.

Intangible assets not yet available for use are tested for impairment at least annually and whenever there is an indication that the assets may be impaired.

The recoverable amount is the higher of fair value less costs to sell and value in use. If the recoverable amount of an asset or cash-generating unit is estimated to be less than its carrying amount, the carrying amount of the asset or cash-generating unit is reduced to its recoverable amount, with the resulting impairment loss recognized in profit or loss.

When an impairment loss is subsequently reversed, the carrying amount of an asset or cash-generating unit is increased to the revised estimate of its recoverable amount, but only to the extent of the carrying amount (less amortization expenses or depreciation expenses) that would have been determined had no impairment loss been recognized for the asset or cash-generating unit in prior years. A reversal of an impairment loss is recognized in profit or loss.

n. Non-current assets held for sale

Non-current assets are classified as held for sale if their carrying amounts will be recovered principally through a sale transaction rather than through continuing use. This condition is regarded as met only when the sale is highly probable and the non-current asset is available for immediate sale in its present condition. To meet the criteria for the sale being highly probable, the appropriate level of management must be committed to the sale, which should be expected to qualify for recognition as a completed sale within 1 year from the date of classification.

When a sale plan would result in a loss of control of a subsidiary, all of the assets and liabilities of that subsidiary are classified as held for sale, regardless of whether the Group will retain a non-controlling interest in that subsidiary after the sale.

When the Group is committed to a sale plan involving the disposal of an investment or a portion of an investment in an associate or a joint venture, only the investment or the portion of the investment that will be disposed of is classified as held for sale when the classification criteria are met, and the Group discontinues the use of the equity method in relation to the portion that is classified as held for sale. Any retained portion of an investment in an associate or a joint venture that has not been classified as held for sale continues to be accounted for by using the equity method. If the Group ceases to have significant influence or joint control over the investment after the disposal takes place, the Group accounts for any retained interest that has not been classified as held for sale in accordance with the accounting policies for financial instruments.

Non-current assets classified as held for sale are measured at the lower of their previous carrying amount and fair value less costs to sell. Recognition of depreciation of those assets would cease.

When a subsidiary, joint venture, associate, or a portion of an interest in a joint venture or an associate previously classified as held for sale no longer meets the criteria to be so classified, it is measured at the carrying amount that would have been recognized had such interests not been classified as held for sale. The consolidated financial statements for the periods since classification as held for sale are amended accordingly.

o. Financial instruments

Financial assets and financial liabilities are recognized when a group entity becomes a party to the contractual provisions of the instruments.

Financial assets and financial liabilities are initially measured at fair value. Transaction costs that are directly attributable to the acquisition or issuance of financial assets and financial liabilities (other than financial assets and financial liabilities at FVTPL) are added to or deducted from the fair value of the financial assets or financial liabilities, as appropriate, on initial recognition. Transaction costs directly attributable to the acquisition of financial assets or financial liabilities at FVTPL are recognized immediately in profit or loss.

1) Financial assets

   All regular way purchases or sales of financial assets are recognized and derecognized on a trade date basis.

   a) Measurement categories

      Financial assets are classified into the following categories: Financial assets at FVTPL, financial assets at amortized cost and investments in equity instruments at FVTOCI.

      i. Financial assets at FVTPL

         Financial assets are classified as at FVTPL when the financial assets are mandatorily classified as at FVTPL. Financial assets mandatorily classified as at FVTPL include investments in equity instruments which are not designated as at FVTOCI.

         Financial assets at FVTPL are subsequently measured at fair value, with any gains or losses arising on their remeasurement recognized in other gains or losses. Fair value is determined in the manner described in Note 30.

      ii. Financial assets at amortized cost

         Financial assets that meet the following conditions are subsequently measured at amortized cost:

         i) The financial asset is held within a business model whose objective is to hold financial assets in order to collect contractual cash flows; and

         ii) The contractual terms of the financial asset give rise on specified dates to cash flows that are solely payments of principal and interest on the principal amount outstanding.

         Subsequent to initial recognition, financial assets at amortized cost, including cash and cash equivalents, trade receivables at amortized cost, are measured at amortized cost, which equals the gross carrying amount determined using the effective interest method less any impairment loss. Exchange differences are recognized in profit or loss.

         Interest income is calculated by applying the effective interest rate to the gross carrying amount of such a financial asset, except for:

         i) Purchased or originated credit impaired financial assets, for which interest income is calculated by applying the credit-adjusted effective interest rate to the amortized cost of such financial assets; and

         ii) Financial assets that are not credit impaired on purchase or origination but have subsequently become credit impaired, for which interest income is calculated by applying the effective interest rate to the amortized cost of such financial assets in subsequent reporting periods.

A financial asset is credit impaired when one or more of the following events have occurred:

i) Significant financial difficulty of the issuer or the borrower;

ii) Breach of contract, such as a default;

iii) It is becoming probable that the borrower will enter bankruptcy or undergo a financial reorganization; or

iv) The disappearance of an active market for that financial asset because of financial difficulties

Cash equivalents include time deposits and bonds issued under repurchase agreements with original maturities within 3 months from the date of acquisition, which are highly liquid, readily convertible to a known amount of cash and are subject to an insignificant risk of changes in value. These cash equivalents are held for the purpose of meeting short-term cash commitments.

iii. Investments in equity instruments at FVTOCI

On initial recognition, the Group may make an irrevocable election to designate investments in equity instruments as at FVTOCI. Designation as at FVTOCI is not permitted if the equity investment is held for trading or if it is contingent consideration recognized by an acquirer in a business combination.

Investments in equity instruments at FVTOCI are subsequently measured at fair value with gains and losses arising from changes in fair value recognized in other comprehensive income and accumulated in other equity. The cumulative gain or loss will not be reclassified to profit or loss on disposal of the equity investments; instead, it will be transferred to retained earnings.

Dividends on these investments in equity instruments are recognized in profit or loss when the Group’s right to receive the dividends is established, unless the dividends clearly represent a recovery of part of the cost of the investment.

b) Impairment of financial assets

The Group recognizes a loss allowance for expected credit losses on financial assets at amortized cost (including trade receivables), lease receivables, as well as contract assets.

The Group always recognizes lifetime expected credit losses (ECLs) for trade receivables and lease receivables. For all other financial instruments, the Group recognizes lifetime ECLs when there has been a significant increase in credit risk since initial recognition. If, on the other hand, the credit risk on a financial instrument has not increased significantly since initial recognition, the Group measures the loss allowance for that financial instrument at an amount equal to 12-month ECLs.

Expected credit losses reflect the weighted average of credit losses with the respective risks of default occurring as the weights. Lifetime ECLs represent the expected credit losses that will result from all possible default events over the expected life of a financial instrument. In contrast, 12-month ECLs represent the portion of lifetime ECLs that is expected to result from default events on a financial instrument that are possible within 12 months after the reporting date.

For internal credit risk management purposes, not considering the collateral held, the Group determines that a financial asset is in default when internal or external information show that the debtor is unlikely to pay its creditors, unless there is reasonable and corroborative information to support a more lagged default criterion.

The impairment loss of all financial assets is recognized in profit or loss by a reduction in their carrying amounts through a loss allowance account.

c) Derecognition of financial assets

The Group derecognizes a financial asset only when the contractual rights to the cash flows from the asset expire or when it transfers the financial asset and substantially all the risks and rewards of ownership of the asset to another party.

On derecognition of a financial asset at amortized cost in its entirety, the difference between the asset's carrying amount and the sum of the consideration received and receivable is recognized in profit or loss. On derecognition of an investment in an equity instrument at FVTOCI, the difference between the asset's carrying amount and the sum of the consideration received and receivable is recognized in profit or loss, and the cumulative gain or loss which had been recognized in other comprehensive income is transferred directly to retained earnings, without recycling through profit or loss.

2) Equity instruments

Debt and equity instruments issued by the Group are classified as either financial liabilities or as equity in accordance with the substance of the contractual arrangements and the definitions of a financial liability and an equity instrument.

Equity instruments issued by the Group are recognized at the proceeds received, net of direct issue costs.

The repurchase of the Corporation's own equity instruments is recognized in and deducted directly from equity. No gain or loss is recognized in profit or loss on the purchase, sale, issuance or cancellation of the Corporation's own equity instruments.

3) Financial liabilities

a) Subsequent measurement

Except for financial liabilities at FVTPL, all financial liabilities are measured at amortized cost using the effective interest method.

Financial liabilities are classified as at FVTPL when any such financial liability is either held for trading or is designated as at FVTPL.

Financial liabilities at FVTPL are stated at fair value, with any gains or losses arising on remeasurement recognized in other gains or losses. Fair value is determined in the manner described in Note 30.

A financial liability may be designated as at FVTPL upon initial recognition when doing so results in more relevant information and if:

i. Such designation eliminates or significantly reduces a measurement or recognition inconsistency that would otherwise arise; or

ii. The financial liability forms part of a group of financial assets or financial liabilities or both, which is managed and has performance evaluated on a fair value basis, in accordance with the Group's documented risk management or investment strategy, and information about the grouping is provided internally on that basis; or

iii. The contract contains one or more embedded derivatives so that the entire combined contract (asset or liability) can be designated as at FVTPL.

For a financial liability designated as at FVTPL, the amount of changes in fair value attributable to changes in the credit risk of the liability is presented in other comprehensive income and will not be subsequently reclassified to profit or loss. The remaining amount of changes in the fair value of that liability is presented in profit or loss. The gain or loss accumulated in other comprehensive income will be transferred to retained earnings when the financial liabilities are derecognized. If this accounting treatment related to credit risk would create or enlarge an accounting mismatch, all changes in the fair value of the liability are presented in profit or loss.

b) Derecognition of financial liabilities

The difference between the carrying amount of the financial liability derecognized and the consideration paid, including any non-cash assets transferred or liabilities assumed, is recognized in other gains or losses.

4) Convertible bonds

The component parts of compound instruments (i.e. convertible bonds) issued by the Group are classified separately as financial liabilities and equity in accordance with the substance of the contractual arrangements and the definitions of a financial liability and an equity instrument.

On initial recognition, the fair value of the liability component is estimated using the prevailing market interest rate for similar non-convertible instruments. This amount is recorded as a liability on an amortized cost basis using the effective interest method until extinguished upon conversion or upon the instrument's maturity date. Any embedded derivative liability is measured at fair value.

The conversion option classified as equity is determined by deducting the amount of the liability component from the fair value of the compound instrument as a whole. This is recognized and included in equity, net of income tax effects, and is not subsequently remeasured. In addition, the conversion option classified as equity will remain in equity until the conversion option is exercised; in which case, the balance recognized in equity will be transferred to capital surplus - share premiums. When the conversion option remains unexercised at maturity, the balance recognized in equity will be transferred to capital surplus - share premiums.

Transaction costs that relate to the issuance of the convertible notes are allocated to the liability and equity components in proportion to the allocation of the gross proceeds. Transaction costs relating to the equity component are recognized directly in equity. Transaction costs relating to the liability component are included in the carrying amount of the liability component.

5) Derivative financial instruments

The Group enters into derivative financial instruments to manage its exposure to foreign exchange rate risks, including foreign exchange forward contracts.

Derivatives are initially recognized at fair value at the date the derivative contracts are entered into and are subsequently remeasured to their fair value at the end of each reporting period. The resulting gain or loss is recognized in profit or loss immediately unless the derivative is designated and effective as a hedging instrument and in which event the timing of the recognition in profit or loss depends on the nature of the hedging relationship. When the fair value of a derivative financial instrument is positive, the derivative is recognized as a financial asset; when the fair value of a derivative financial instrument is negative, the derivative is recognized as a financial liability.

p. Hedge accounting

The effects of changes in the fair value of derivatives that are designated and qualified as cash flow hedges are recognized in other comprehensive income. The gains or losses relating to the ineffective portion is recognized immediately in profit or loss.

The associated gains or losses that were recognized in other comprehensive income are reclassified from equity to profit or loss as a reclassification adjustment in the line item relating to the hedged item in the same period when the hedged item affects profit or loss. If a hedge of a forecast transaction subsequently results in the recognition of a non-financial asset or a non-financial liability, the associated gains and losses that were recognized in other comprehensive income are removed from equity and are included in the initial cost of the non-financial asset or non-financial liability.

q. Revenue recognition

The Group identifies contracts with customers, allocates the transaction price to the performance obligations and recognizes revenue when performance obligations are satisfied.

1) Revenue from the sale of goods is recognized when the goods are delivered to the customer’s-specific location and the ownership of the goods is transferred to customer.

2) Service income is recognized by reference to the stage of completion of the contract or when services are provided. Freight revenue is recognized by reference to the proportion of the actual voyage dats to the voyage period.

3) Revenue from electric power is calculated according to the actual volume of electric power sold and the energy rate.

r. Leasing

<u>2019</u>

At the inception of a contract, the Group assesses whether the contract is, or contains, a lease.

For a contract that contains a lease component and non-lease components, the Group allocates the consideration in the contract to each component on the basis of the relative stand-alone price and accounts for each component separately.

1) The Group as lessor

Leases are classified as finance leases whenever the terms of a lease transfer substantially all the risks and rewards of ownership to the lessee. All other leases are classified as operating leases.

Under finance leases, the lease payments comprise in-substance fixed payments, variable lease payments which depend on an index or a rate, 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 a lease if the lease term reflects such termination, less any lease incentives payable. The net investment in a lease is measured at (a) the present value of the sum of the lease payments receivable by a lessor and any unguaranteed residual value accrued to the lessor plus (b) initial direct costs and is presented as a finance lease receivable. Finance lease income is allocated to the relevant accounting periods so as to reflect a constant, periodic rate of return on the Group's net investment outstanding in respect of leases.

Lease payments less any lease incentives payable from operating leases are recognized as income on a straight-line basis over the terms of the relevant leases. Initial direct costs incurred in obtaining operating leases are added to the carrying amounts of the underlying assets and recognized as expenses on a straight-line basis over the lease terms.

Variable lease payments that do not depend on an index or a rate are recognized as income in the periods in which they are incurred.

2) The Group as lessee

The Group recognizes right-of-use assets and lease liabilities for all leases at the commencement date of a lease, except for short-term leases and low-value asset leases accounted for applying a recognition exemption where lease payments are recognized as expenses on a straight-line basis over the lease terms.

Right-of-use assets are initially measured at cost, which comprises the initial measurement of lease liabilities adjusted for lease payments made at or before the commencement date, plus any initial direct costs incurred and an estimate of costs needed to restore the underlying assets, and less any lease incentives received. Right-of-use assets are subsequently measured at cost less accumulated depreciation and impairment losses and adjusted for any remeasurement of the lease liabilities. Right-of-use assets are presented on a separate line in the consolidated balance sheets.

Right-of-use assets are depreciated using the straight-line method from the commencement dates to the earlier of the end of the useful lives of the right-of-use assets or the end of the lease terms.

Lease liabilities are initially measured at the present value of the lease payments, which comprise fixed payments, in-substance fixed payments, and variable lease payments which depend on an index or a rate. The lease payments are discounted using the interest rate implicit in a lease, if that rate can be readily determined. If that rate cannot be readily determined, the Group uses the lessee's incremental borrowing rate.

Subsequently, lease liabilities are measured at amortized cost using the effective interest method, with interest expense recognized over the lease terms. When there is a change in a lease term or a change in future lease payments resulting from a change in an index or a rate used to determine those payments, the Group remeasures the lease liabilities with a corresponding adjustment to the right-of-use-assets. However, if the carrying amount of the right-of-use assets is reduced to zero, any remaining amount of the remeasurement is recognized in profit or loss. Lease liabilities are presented on a separate line in the consolidated balance sheets.

Variable lease payments that do not depend on an index or a rate are recognized as expenses in the periods in which they are incurred.

2018

Leases are classified as finance leases whenever the terms of a lease transfer substantially all the risks and rewards of ownership to the lessee. All other leases are classified as operating leases. The lease component of all electric power selling contracts identified in accordance with IFRIC 4 "Determining Whether an Arrangement Contains a Lease" is classified as a finance lease.

1) The Group as lessor

Amounts due from lessees under finance leases are recognized as receivables at the amount of the Group's net investment in the leases. Finance lease income is allocated to accounting periods so as to reflect a constant periodic rate of return on the Group's net investment outstanding in respect of the leases.

Rental income from operating leases is recognized on a straight-line basis over the term of the relevant lease.

2) The Group as lessee

Assets held under finance leases are initially recognized as assets of the Group at their fair value at the inception of the lease or, if lower, at the present value of the minimum lease payments. The corresponding liability to the lessor is included in the consolidated balance sheet as a finance lease obligation.

Finance expenses implicit in lease payments for each period are recognized immediately in profit or loss, unless they are directly attributable to qualifying assets, and in which case they are capitalized.

Operating lease payments are recognized as expenses on a straight-line basis over the related lease terms.

s. Borrowing costs

Borrowing costs directly attributable to the acquisition, construction or production of qualifying assets are added to the cost of those assets, until such time as the assets are substantially ready for their intended use or sale.

Investment income earned on the temporary investment of specific borrowings pending their expenditure on qualifying assets is deducted from the borrowing costs eligible for capitalization.

Other than that which is stated above, all other borrowing costs are recognized in profit or loss in the year in which they are incurred.

t. Government grants

Government grants are not recognized until there is reasonable assurance that the Group will comply with the conditions attached to them and that the grants will be received. Government grants that are receivable as compensation for expenses or losses already incurred or for the purpose of giving immediate financial support to the Group with no future related costs are recognized in profit or loss in the period in which they become receivable. Relevant grants of an asset are recognized as deferred revenue or a reduction of the asset's cost on a straight-line basis.

u. Employee benefits

1) Short-term employee benefits

Liabilities recognized in respect of short-term employee benefits are measured at the undiscounted amount of the benefits expected to be paid in exchange for the related services.

2) Retirement benefits

Payments to defined contribution retirement benefit plans are recognized as an expense when employees have rendered services entitling them to the contributions.

Defined benefit costs (including service costs, net interest and remeasurement) under the defined benefit retirement benefit plans are determined using the projected unit credit method. Service costs and net interest on the net defined benefit liability (asset) are recognized as an employee benefits expense in the period in which they occur. Remeasurement, comprising actuarial gains and losses and the return on plan assets (excluding interest), is recognized in other comprehensive income in the period in which it occurs. Remeasurement recognized in other comprehensive income is reflected immediately in retained earnings and will not be reclassified to profit or loss.

The net defined benefit liability (asset) represents the actual deficit (surplus) in the Group's defined benefit plan. Any surplus resulting from this calculation is limited to the present value of any refunds from the plan or reductions in future contributions to the plan.

3) Other long-term employee benefits

Other long-term employee benefits are accounted for in the same way as the accounting required for a defined benefit plan except that remeasurement is recognized in profit or loss.

v. Share-based payment arrangements

The fair value at the grant date of the equity-settled share-based payments is expensed on a straight-line basis over the vesting period, based on the Group's best estimates of the number of shares or options that are expected to ultimately vest, with a corresponding increase in capital surplus - employee share options. It is recognized as an expense in full at the grant date if vested immediately. The grant date of issued ordinary shares for cash which are reserved for employees and treasury shares transferred to employees is the date on which the number of shares that the employees have purchased is confirmed.

w. Taxation

Income tax expense represents the sum of the tax currently payable and deferred tax.

1) Current tax

According to the Income Tax Law, an additional tax on unappropriated earnings is provided for in the year the shareholders approve to retain earnings.

Adjustments of prior years' tax liabilities are added to or deducted from the current year's tax provision.

2) Deferred tax

Deferred tax is recognized on temporary differences between the consolidated financial statement carrying amounts of assets and liabilities and the corresponding tax bases used in the computation of taxable profit.

Deferred tax liabilities are generally recognized for all taxable temporary differences. Deferred tax assets are generally recognized for all deductible temporary differences, unused loss carryforwards and unused tax credits for research and development expenditures to the extent that it is probable that taxable profits will be available against which those deductible temporary differences can be utilized.

Deferred tax liabilities are recognized for taxable temporary differences associated with investments in subsidiaries, associates and joint ventures, except where the Group is able to control the reversal of the temporary difference and it is probable that the temporary difference will not reverse in the foreseeable future. For deferred tax assets arising from deductible temporary differences associated with such investments and equity, the interests are only recognized to the extent that it is probable that there will be sufficient taxable profits against which to utilize the benefits of the temporary differences and they are expected to reverse in the foreseeable future.

The carrying amount of deferred tax assets is reviewed at the end of each reporting period and reduced to the extent that it is no longer probable that sufficient taxable profits will be available to allow all or part of the assets to be recovered. A previously unrecognized deferred tax asset is also reviewed at the end of each reporting period and recognized to the to the extent that it has become probable that future taxable profit will allow the deferred tax asset to be recovered.

Deferred tax liabilities and assets are measured at the tax rates that are expected to apply in the year in which the liabilities are settled or the assets are realized, based on tax rates and tax laws that have been enacted or substantively enacted by the end of the reporting period. The measurement of deferred tax liabilities and assets reflects the tax consequences that would follow from the manner in which the Group expects, at the end of the reporting period, to recover or settle the carrying amount of its assets and liabilities.

3) Current and deferred taxes for the year

Current and deferred taxes are recognized in profit or loss, except when they relate to items that are recognized in other comprehensive income or directly in equity, and in which case, the current and deferred taxes are also recognized in other comprehensive income or directly in equity. Where current tax or deferred tax arises from the initial accounting for a business combination, the tax effect is included in the accounting for the business combination.

5. CRITICAL ACCOUNTING JUDGMENTS AND KEY SOURCES OF ESTIMATION UNCERTAINTY

In the application of the Group’s accounting policies, management is required to make judgments, estimations and assumptions about the carrying amounts of assets and liabilities that are not readily apparent from other sources. The estimates and associated assumptions are based on historical experience and other factors that are considered relevant. Actual results may differ from these estimates.

The estimates and underlying assumptions are reviewed on an ongoing basis. Revisions to accounting estimates are recognized in the period in which the estimates are revised if the revision affects only that period or in the period of the revision and future periods if the revision affects both current and future periods.

a. Impairment loss of goodwill

Determining whether goodwill is impaired requires an estimation of the value in use of the cash-generating units to which goodwill has been allocated. The calculation of the value in use requires management to estimate the future cash flows expected to arise from the cash-generating unit and a suitable discount rate in order to calculate the present value. Where the actual future cash flows are less than expected, a material impairment loss may arise.

b. Impairment loss of property, plant and equipment

The impairment loss of property, plant and equipment in relation to production was based on the recoverable amounts of those assets, which is the higher of their fair value less costs of disposal and their value in use. Any changes in the market prices or future cash flows will affect the recoverable amounts of those assets and may lead to the recognition of additional impairment losses or the reversal of impairment losses.

6. CASH AND CASH EQUIVALENTS

	December 31	
	2019	**2018**
Cash on hand	$ 8,219	$ 9,364
Checking accounts and demand deposits	25,276,394	21,245,130
Cash equivalents		
Time deposits with original maturities of less than 3 months	26,459,579	26,914,519
Bonds with repurchase agreements	1,828,428	338,876
	$ 53,572,620	$ 48,507,889

The market rate intervals of cash in banks and bonds with repurchase agreements at the end of the reporting period were as follows:

	December 31	
	2019	**2018**
Cash in banks	0.01%-4.40%	0.01%-3.00%
Bonds with repurchase agreements	0.45%-0.60%	0.31%-2.90%

As of December 31, 2019 and 2018, time deposits with original maturities of more than 3 months were $3,992,904 thousand and $2,382,467 thousand, respectively, which are classified as financial assets at amortized cost - current.

7. FINANCIAL INSTRUMENTS AT FVTPL

	December 31	
	2019	**2018**
Financial assets at FVTPL - current		
Financial assets mandatorily classified as at FVTPL		
Derivative instruments (not under hedge accounting)		
Redemption options and put options of convertible bonds	$ 1,235	$ -
Non-derivative financial assets		
Domestic listed shares	228,588	220,787
Domestic emerging market shares	96,909	85,780
Mutual funds	175,273	243,271
	$ 502,005	$ 549,838
Financial liabilities at FVTPL - current		
Financial liabilities held for trading		
Derivative instruments (not under hedge accounting)		
Redemption options and put options of convertible bonds	$ -	$ 139,460

8. FINANCIAL ASSETS AT FVTOCI (INVESTMENTS IN EQUITY INSTRUMENTS)

	December 31	
	2019	2018
Current		
Domestic investments		
Listed shares	$ 7,126,288	$ 6,282,884
Convertible preference shares	54,457	51,375
	$ 7,180,745	$ 6,334,259
Non-current		
Domestic investments		
Unlisted shares	$ 6,971,622	$ 5,865,710
Foreign investments		
Listed shares	29,148,717	19,926,459
	$ 36,120,339	$ 25,792,169

For the year ended December 31, 2018, the Group paid $673,918 thousand and $3,060,365 thousand to acquire shares of E-ONE Moli Energy Corporation and International CSRC Investment Holdings Co., Ltd., respectively, and increased the Group's percentage of ownership from 15.1% to 29.9% and 12.5% to 19.2%, respectively. With a significant impact on the investee, the original investments previously recognized as financial assets at FVTOCI were considered as disposed of and reclassified to investments accounted for by using the equity method. In 2018, the Group paid $51,375 thousand to acquire convertible preference shares of O-Bank Co., Ltd.

Refer to Note 32 for information relating to investments in equity instruments at FVTOCI pledged as collateral for credit accommodations.

9. NOTES AND ACCOUNTS RECEIVABLE

	December 31	
	2019	2018
Notes receivable	$ 31,268,890	$ 29,759,920
Accounts receivable	8,933,767	8,255,737
Less: Allowance for impairment loss	(105,937)	(50,939)
	$ 40,096,720	$ 37,964,718

The Group recognizes allowance for impairment loss on account receivable on the basis of individual customers for which credit losses have actually taken place. Moreover, the Group separates all customers into different segments based on their risk and determines their expected credit loss rate by reference to past default experience with the counterparties and on analysis of their current financial positions. The Group recognizes an allowance for impairment loss of 100% against past due receivables which have indication of impairment.

The Group writes off an account receivable when there is information indicating that the debtor is experiencing severe financial difficulty and there is no realistic prospect of recovery of the receivable. For accounts receivables that have been written off, the Group continues to engage in enforcement activity to attempt to recover the receivables which are due. Where recoveries are made, these are recognized in profit or loss.

The aging analysis of receivables was as follows:

	December 31	
	2019	**2018**
Up to 90 days	$ 24,505,536	$ 23,527,413
91-180 days	14,550,796	12,394,387
181-365 days	1,029,401	2,009,676
Over 365 days	10,987	33,242
	$ 40,096,720	$ 37,964,718

The above aging schedule was based on the number of days past due from the invoice date.

The movements of the allowance for doubtful notes and accounts receivable were as follows:

	For the Year Ended December 31	
	2019	**2018**
Balance at January 1	$ 50,939	$ 142,242
Add: Net remeasurement of loss allowance	58,292	(35,088)
Less: Amounts written off	(2,323)	(56,163)
Foreign exchange translation gains and losses	(971)	(52)
Balance at December 31, 2019	$ 105,937	$ 50,939

10. FINANCE LEASE RECEIVABLES

2019

	December 31, 2019
Undiscounted lease payments	
Year 1	$ 5,106,298
Year 2	5,457,252
Year 3	5,550,758
Year 4	5,578,575
Year 5	6,127,364
Year 6 onwards	21,296,031
	49,116,278
Less: Unearned finance income	18,116,604
Less: Accumulated impairment	47,878
Net investment in leases presented as finance lease receivables	$ 30,951,796

(Continued)

	December 31, 2019
Current (included in accounts receivable)	$ 1,698,460
Non-current	29,253,336
	$ 30,951,796

(Concluded)

2018

	December 31, 2018
Undiscounted lease payments	
Not later than 1 year	$ 5,040,945
Later than 1 year and not later than 5 years	21,692,882
Later than 5 years	27,423,395
	54,157,222
Less: Unearned finance income	21,683,760
Less: Accumulated impairment	47,878
Present value of minimum lease payments	$ 32,425,584
Current (included in accounts receivable)	$ 1,473,788
Non-current	30,951,796
	$ 32,425,584

The contract for the sale of electric power which the Group entered into is classified as a finance lease arrangement because of the guaranteed power generation periods; and the lease term is 25 years. The interest rate inherent in the lease, which is approximately 11.18%, was fixed at the contract date for the entire lease term.

For the amounts of property, plant and equipment (reclassified as lease receivables in 2018 and finance lease receivables in 2019 after transitioning to IFRS) pledged as collateral for bank borrowings, refer to Note 32.

11. INVENTORIES

	December 31	
	2019	2018
Finished goods	$ 2,147,190	$ 2,624,617
Work in process	1,324,205	1,322,979
Raw materials	4,661,582	5,516,707
	$ 8,132,977	$ 9,464,303

The cost of inventories recognized as cost of goods sold for the years ended December 31, 2019 and 2018 was $79,733,532 thousand and $84,741,088 thousand, respectively.

The cost of goods sold included inventory write-downs (gain on reversal of inventory write-downs) which were as follows:

	For the Year Ended December 31	
	2019	2018
Inventory write-downs (gain on reversal of inventory write-downs)	$ (36,520)	$ 82,954

Previous write-downs were reversed because slow moving inventories were removed.

12. SUBSIDIARIES

a. Subsidiaries included in consolidated financial statements

The consolidated financial statements include subsidiaries which are as follows:

			Proportion of Ownership (%) December 31		
Investor	Investee	Main Business	2019	2018	Remark
Taiwan Cement Corporation	Taiwan Transport & Storage Corporation	Warehousing, transportation and sale of sand and gravel	83.9	83.9	
	TCC Investment Corporation	Investment	100.0	100.0	
	Kuan-Ho Refractories Industry Corporation	Production and sale of refractory materials	95.3	95.3	
	Hong Kong Cement Manufacturing Co., Ltd. (“HKCMCL”)	Investment holding	84.7	84.7	
	Ta-Ho Maritime Corporation	Marine transportation	64.8	64.8	
	Taiwan Cement Engineering Corporation	Engineering services	99.0	99.0	
	TCC Green Energy Corporation	Renewable energy generation	100.0	100.0	4)
	TCC Chemical Corporation	Leasing property and energy technology services	100.0	100.0	5)
	TCC Information Systems Corporation	Information software design	99.4	99.4	
	Taiwan Prosperity Chemical Corporation	Processing and sale of chemical material	40.0	40.0	2) 8)
	Tung Chen Mineral Corporation	Afforestation and sale of limestone	99.5	99.5	
	Jin Chang Minerals Corporation	Afforestation and sale of limestone	100.0	100.0	
	Hoping Industrial Port Corporation	Hoping Industrial Port management	100.0	100.0	
	TCC International Ltd. (“TCCI”)	Investment holding	100.0	100.0	9)
	TCCMOLI Holdings (Singapore) Pte. Ltd. (TCCMOLI)	Investment holding	100.0	-	7)
	Ho-Ping Power Company	Thermal power generation	59.5	59.5	
	Ta-Ho Taitung Environment Co., Ltd.	Waste collection and treatment	-	100.0	3)
	HPC Power Services Corporation	Business consulting	60.0	60.0	
	E.G.C. Cement Corporation	Sale of cement	50.6	50.6	
	Feng Sheng Enterprise Company Limited	Sale of ready-mixed concrete	45.4	45.4	8)
	Trans Philippines Mineral Corp. (“TPMC”)	Mining excavation	40.0	40.0	8)
	Taicorn Minerals Corp. (“TMC”)	Mining excavation	72.7	72.7	
	Ta-Ho RSEA Environment Co., Ltd.	Waste collection and treatment	66.6	66.6	
	Ho Sheng Mining Co., Ltd.	Mining excavation	100.0	100.0	
	TCC International Holdings Limited (“TCCIH”)	Investment	38.3	38.3	9)
	Taiwan Cement (Dutch) Holdings B.V.	Investment	100.0	100.0	12)

(Continued)

Investor	Investee	Main Business	Proportion of Ownership (%) December 31 2019	2018	Remark
Taiwan Transport & Storage Corporation	E.G.C. Cement Corporation	Sale of cement	49.4	49.4	2)
	Ta-Ho Maritime Corporation	Marine transportation	29.2	29.2	1) 2)
	Tai-Jie Transport & Storage Corporation (TJ Transport Corporation)	Transportation	100.0	-	7)
TCC Investment Corporation	Union Cement Traders Inc.	Import and export trading	100.0	100.0	
	Ho-Ping Power Company	Thermal power generation	0.5	0.5	
	Taiwan Prosperity Chemical Corporation	Processing and sale of chemical material	0.2	0.2	2) 8)
	Ta-Ho Maritime Corporation	Marine transportation	-	-	
HKCMCL	TCC Development Ltd.	Property leasing	100.0	100.0	
Ta-Ho Maritime Corporation	Ta-Ho Maritime Holdings Ltd.	Investment	100.0	100.0	
Taiwan Cement Engineering Corporation	TCEC (Yingde) Machinery Co., Ltd.	Production and sale of cement machinery and assembly work	-	100.0	10)
TCC Information Systems Corporation	Taicem Information (Samoa) Pte., Ltd.	Investment	100.0	100.0	
Hoping Industrial Port Corporation	Taiwan Prosperity Chemical Corporation	Processing and sale of chemical material	2.3	2.3	8)
TCCI	TCCIH	Investment holding	61.7	61.7	9)
TPMC	TMC	Mining excavation	18.2	18.2	
Union Cement Traders Inc.	Taiwan Transport & Storage Corporation	Warehousing, transportation and sale of sand and gravel	0.7	0.7	
Ho-Ping Power Company	Ho-Ping Renewable Energy Company	Renewable energy generation	100.0	100.0	6)
TCC Green Energy Corporation	Chang-Wang Wind Power Co., Ltd	Renewable energy generation	100.0	100.0	7)
	TCC Nan-Chung Green Energy Corporation	Renewable energy generation	100.0	100.0	7)
	TCC Kao-Cheng Green Energy Corporation	Renewable energy generation	100.0	100.0	7)
	TCC Chang-Ho Green Energy Corporation	Renewable energy generation	100.0	100.0	7)
	TCC Chia-Chien Green Energy Corporation	Renewable energy generation	100.0	100.0	7)
	TCC Yun-Kai Green Energy Corporation	Renewable energy generation	100.0	100.0	7)
	TCC Lien-Hsin Green Energy Corporation	Renewable energy generation	100.0	100.0	7)
	TCC Ping-Chih Green Energy Corporation (PTGE)	Renewable energy generation	100.0	-	7)
Ta-Ho Maritime Holdings Ltd.	Ta-Ho Maritime (Hong Kong) Limited	Marine transportation	100.0	100.0	
	THC International S.A.	Marine transportation	100.0	100.0	2)
	Chi Ho Maritime S.A.	Marine transportation	-	100.0	3)
	Sheng Ho Maritime S.A.	Marine transportation	-	100.0	3)
	Ta-Ho Maritime (Singapore) Pte. Ltd.	Marine transportation	100.0	100.0	
Taicem Information (Samoa) Pte., Ltd.	Fuzhou TCC Information Technology Co., Ltd.	Software product and equipment maintenance	100.0	100.0	
Ta-Ho Maritime (Hong Kong) Limited	Da Tong (Guigang) International Logistics Co., Ltd.	Logistics and transportation	100.0	100.0	
Da Tong (Guigang) International Logistics Co., Ltd.	Da Tong (Ying De) Logistics Co., Ltd.	Logistics and transportation	100.0	100.0	
	Guigang Da-Ho Shipping Co., Ltd.	Marine transportation	100.0	100.0	
TCCIH	Chia Hsin Cement Greater China Holding Corporation	Investment holding	100.0	100.0	
	Upper Value Investment Limited	Investment holding	100.0	100.0	
	Upper Value Investments Ltd. ("UPPV")	Investment holding	100.0	100.0	
	TCC Hong Kong Cement (BVI) Holdings Ltd.	Investment holding	100.0	100.0	
	Ulexite Investments Ltd.	Investment holding	100.0	100.0	
Upper Value Investment Limited	Prime York Ltd.	Investment holding	100.0	100.0	
	Prosperity Minerals (International) Limited	Investment holding	100.0	100.0	

(Continued)

Investor	Investee	Main Business	Proportion of Ownership (%) December 31 2019	2018	Remark
TCC Hong Kong Cement (BVI) Holdings Ltd.	TCC Hong Kong Cement Development Ltd.	Investment holding	100.0	100.0	
	TCC Hong Kong Cement ("QHC") Ltd.	Investment holding	100.0	100.0	
	TCC Hong Kong Cement (Yargoon) Ltd.	Investment holding	100.0	100.0	
	TCC Hong Kong Cement ("HKC") Ltd.	Investment holding	100.0	100.0	
	TCC Hong Kong Cement (Philippines) Ltd.	Investment holding	100.0	100.0	
	TCC Hong Kong Cement (International) Ltd.	Investment holding	100.0	100.0	
	Hong Kong Cement Company Limited ("HKCCL")	Sale of cement	100.0	100.0	
TCC Hong Kong Cement (QHC) Ltd.	Chiefolk Company Ltd.	Investment holding	70.0	70.0	
Chiefolk Company Ltd.	TCC International (Liuzhou) Ltd.	Investment holding	100.0	100.0	
TCC International (Liuzhou) Ltd.	TCC Liuzhou Company Ltd.	Investment holding	100.0	100.0	
TCC Liuzhou Company Ltd.	TCC Liuzhou Construction Materials Co., Ltd.	Manufacturing and sale of slag powder	60.0	60.0	
TCC Hong Kong Cement (Philippines) Ltd.	TCC Cement Corporation	Cement processing services	100.0	100.0	
TCC Hong Kong Cement (International) Ltd.	TCC International (Hong Kong) Co., Ltd. ("TCCI (HK)")	Investment holding	100.0	100.0	
TCCI (HK)	TCC Guigang Mining Industrial Company Limited	Mining excavation	52.5	52.5	
	Jiangsu TCC Investment Co., Ltd.	Investment holding	100.0	100.0	
	Jingyang Industrial Limited	Investment holding	100.0	100.0	
	TCC International (Guangxi) Ltd.	Investment holding	100.0	100.0	
	TCC Shaoguan Cement Co., Ltd.	Manufacturing and sale of cement	100.0	100.0	
	TCC Yingde Mining Industrial Company Limited	Mining excavation	48.9	48.9	
	TCC Yingde Cement Co., Ltd.	Manufacturing and sale of cement	100.0	100.0	
	TCC Jiangsu Mining Industrial Company Limited	Mining excavation	100.0	100.0	
	TCC Fuzhou Yangyu Port Co., Ltd.	Service of port facility	100.0	100.0	
	TCC (Dong Guan) Cement Company Ltd.	Manufacturing and sale of cement	100.0	100.0	
	TCC Fuzhou Cement Co., Ltd.	Manufacturing and sale of cement	100.0	100.0	
	TCC Huaihua Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
	Anhui King Bridge Cement Co., Ltd.	Manufacturing and sale of cement	-	60.0	11)
Jiangsu TCC Investment Co., Ltd.	Jurong TCC Cement Co., Ltd.	Manufacturing and sale of cement	21.5	21.5	
Jingyang Industrial Limited	Jurong TCC Cement Co., Ltd.	Manufacturing and sale of cement	78.5	78.5	
TCC International (Guangxi) Ltd.	TCC (Guigang) Cement Ltd.	Manufacturing and sale of cement	100.0	100.0	
TCC (Guigang) Cement Ltd.	TCC Huaying Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
	TCC Guigang Mining Industrial Company Limited	Mining excavation	47.5	47.5	
	Guigang TCC DongYuan Environmental Technology Company Limited	Hazardous waste treatment	95.2	95.2	13)
TCC Yingde Cement Co., Ltd.	TCC Yingde Mining Industrial Company Limited	Mining excavation	34.8	34.8	
	Scitus Luzhou Concrete Co., Ltd.	Sale of ready-mixed concrete	25.0	25.0	
	Scitus Luzhou Cement Co., Ltd.	Manufacturing and sale of cement	10.0	10.0	
	Scitus Naxi Cement Co., Ltd.	Manufacturing and sale of cement	10.0	10.0	
	Scitus Hejiang Cement Co., Ltd.	Manufacturing and sale of cement	10.0	10.0	

(Continued)

Investor	Investee	Main Business	Proportion of Ownership (%) December 31 2019	2018	Remark
	Bejing TCC Environmental Technology Co., Ltd.	Technology development, enterprise management and sales	100.0	-	7)
	TCC (Hangzhou) Environmental Protection Technology Co., Ltd.	Environmental protection, cement and enterprise management consulting	100.0	-	7)
TCC Jiangsu Mining Industrial Company Limited	TCC Yingde Mining Industrial Company Limited	Mining excavation	16.3	16.3	
TCC Huaihua Cement Company Limited	TCC Jingzhou Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
	TCC Huaihua Concrete Company Limited	Sale of ready-mixed concrete	100.0	100.0	
Ulexite Investments Ltd.	HKC Investments Ltd.	Investment holding	-	100.0	3)
UPPV	Wayly Holdings Limited.	Investment holding	100.0	100.0	
	TCC International (China) Company Limited	Investment holding	100.0	100.0	
	Kong On Cement Holdings Ltd.	Investment holding	65.0	65.0	
	Mega East Ltd.	Investment holding	100.0	100.0	
	Prosperity Minerals (China) Limited.	Investment holding	100.0	100.0	
	Sure Kit Ltd.	Investment holding	100.0	100.0	
	Hensford Ltd.	Investment holding	100.0	100.0	
	Kiton Ltd.	Investment holding	100.0	100.0	
	Prosperity Cement Investment Ltd.	Investment holding	100.0	100.0	
	Scitus Cement (China) Holdings Ltd. (“Scitus Holdings”)	Investment holding	100.0	100.0	
Wayly Holdings Ltd.	Guizhou Kaili Rui An Jian Cai Co., Ltd.	Manufacturing and sale of cement	100.0	100.0	
TCC International (China) Co., Ltd.	TCC New (Hangzhou) Management Company Limited	Operation management	100.0	100.0	
Kong On Cement Holdings Ltd.	Guizhou Kong On Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
Mega East Ltd.	TCC Guangan Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
Sure Kit Ltd.	TCC Chongqing Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
Hensford Ltd.	TCC Anshun Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
Kiton Ltd.	TCC Liaoning Cement Company Limited	Manufacturing and sale of cement	100.0	100.0	
Prosperity Cement Investment Ltd.	Yingde Dragon Mountain Cement Co, Ltd.	Manufacturing and sale of cement	100.0	100.0	
TCC Anshun Cement Company Limited	Anshun Xin Tai Construction Materials Company Limited	Filtering of sand and gravel and sale of ready-mixed concrete	100.0	100.0	
TCC New (Hangzhou) Management Company Limited	Kaili TCC Environment Technology Co., Ltd	Waste collection and treatment	100.0	-	7)
Scitus Holdings	Scitus Cement (China) Operating Co., Limited.	Investment holding	100.0	100.0	
	Hexagon XIV Holdings Limited	Investment holding	100.0	100.0	
	Hexagon XIII Holdings Limited	Investment holding	100.0	100.0	
	Hexagon IX Holdings Limited	Investment holding	100.0	100.0	
	Hexagon VIII Holdings Limited	Investment holding	100.0	100.0	
	Hexagon V Holdings Limited	Investment holding	100.0	100.0	
	Hexagon IV Holdings Limited	Investment holding	100.0	100.0	
	Hexagon III Holdings Limited	Investment holding	100.0	100.0	
	Hexagon II Holdings Limited	Investment holding	100.0	100.0	
	Hexagon Holdings Limited	Investment holding	100.0	100.0	
Hexagon IX Holdings Ltd.	Scitus Hejiang Cement Co., Ltd.	Manufacturing and sale of cement	90.0	90.0	
Hexagon IV Holdings Ltd.	Scitus Luzhou Cement Co., Ltd.	Manufacturing and sale of cement	90.0	90.0	
Hexagon III Holdings Ltd.	Scitus Naxi Cement Co., Ltd.	Manufacturing and sale of cement	90.0	90.0	
Hexagon XIV Holdings Ltd.	Scitus Luzhou Concrete Co., Ltd.	Sales of ready-mixed concrete	75.0	75.0	
Scitus Luzhou Cement Co., Ltd.	TCC Jiuyuan (Xuyong) Environmental Technology Co., Ltd.	Technology development, enterprise management and sales	55.0	-	7)

(Concluded)

Remarks:

1) Refer to Note 27 for information on the related acquisition transaction.

2) Taiwan Cement Corporation and TCC Investment Corporation successively disposed of part of their joint ownership in Taiwan Prosperity Chemical Corporation in 2018. Taiwan Transport & Storage Corporation successively acquired part of the shares of Ta-Ho Maritime Corporation and E.G.C. Cement Corporation in 2018, and Ta-Ho Maritime Corporation in 2019. In July 2019, the board of directors of Ta-Ho Maritime Holdings resolved to increase its capital investment in THC International S.A.

3) Ho Swen Construction Material Co., Ltd., Chi Ho Maritime S.A. and Sheng Ho Maritime S.A. had completed liquidation in December 2018, August 2019 and September 2019, respectively. HKC Investments Ltd. and Ta-Ho Taitung Environment Co., Ltd. were in the process of liquidation in December 2019.

4) Tunwoo Company Limited changed its name to TCC Green Energy Corporation in March 2018, and changed its main business to renewable energy generation.

5) For the purpose of streamlining its investment structure, the Group's board of directors approved the merger of Kuan-Ho Construction & Development Corporation and TCC Chemical Corporation, with the latter as the surviving company. The effective date of the merger was January 1, 2018.

6) Ho-Ping Renewable Energy Company was established in April 2018 and was included in the consolidated financial statements since then.

7) TCC Chia-Chien Green Energy Corporation, TCC Yun-Kai Green Energy Corporation, TCC Lien-Hsin Green, TCC Kao-Cheng Green Energy Corporation, TCC Nan-Chung Green Energy Corporation, TCC Chang-Ho Green Energy Corporation and Chang-Wang Wind Power Co., Ltd. were established in 2018. TCC Ping-Chih Green Energy Corporation, Beijing TCC Environmental Technology Co., Ltd., TCC (Hangzhou) Environmental Protection Technology Co., Ltd., Kaili TCC Environment Technology Co., Ltd, TCCMOLI, TJ Transport Corporation and TCC Jiuyuan (Xuyong) Environmental Technology Co., Ltd were established in 2019.

8) Although the Group's percentages of ownership in Taiwan Prosperity Chemical Corporation, Feng Sheng Enterprise Company and TPMC were less than 50%, the Group still has control over those entities. Thus, Taiwan Prosperity Chemical Corporation, Feng Sheng Enterprise Company and TPMC are considered as subsidiaries of the Group.

9) Taiwan Cement Corporation increased its investment in the capital of TCCI and TCCIH in 2018, but TCCI did not simultaneously increase its investment in the capital of TCCIH. Thus, Taiwan Cement Corporation's percentage of ownership in TCCIH increased to 38.3%, and TCCI's percentages of ownership in TCCIH decreased to 61.7%.

10) Taiwan Cement Engineering Corporation originally indirectly owned 100% of the shares in TCEC (Yingde) Machine Co., Ltd. through TCEC Corporation. However, the Brunei Darussalam government announced on December 22, 2016 that all international companies have to wind up their businesses. Therefore, Taiwan Cement Engineering Corporation ended up having changed its ownership of TCEC (Yingde) Machine Co., Ltd., from indirect to direct ownership and TCEC (Yingde) Machine Co., Ltd. was further cancelled in the end of 2019.

11) Anhui King Bridge Cement Co., Ltd was dissolved and cancelled during the three months ended March 31, 2019.

12) Its board of directors resolved to establish Taiwan Cement (Dutch) Holdings B.V. in October 2018, which established the joint venture, Cimpor Global Holdings B.V. (formerly known as Dutch OYAK TCC Holdings B.V.), with Ordu Yardimlasma Kurumuwhich. The Group obtained 40% interest in the joint venture through cash injection and indirectly acquired the cement investment projects in areas such as Turkey.

13) The Group setup TCC (Guigang) Dung Yuan Green Energy Corporation by means of joint venture in June 2018, the group hold 40% of interests of which, in October 2018, The board of directors of TCC (Guigang) Cement Limited approved the $116 million that was initially financed to TCC (Guigang) Dung Yuan Green Corporation and converted it to share capital, and the holding rate of interests increased to 95.2%.

b. Details of subsidiaries with material non-controlling interests

	Proportion of Ownership and Voting Rights Held by Non-controlling Interests	
	December 31	
Name of Subsidiary	**2019**	**2018**
Taiwan Prosperity Chemical Corporation	57.5%	57.5%
Ho-Ping Power Company	40.0%	40.0%

See Table following the Notes to Consolidated Financial Statements for the information on the places of incorporation and principal businesses.

The summarized financial information below represents amounts before intragroup eliminations.

Taiwan Prosperity Chemical Corporation

	December 31	
	2019	**2018**
Current assets	$ 3,888,222	$ 5,434,627
Non-current assets	4,669,893	6,079,902
Current liabilities	(2,903,186)	(4,138,703)
Non-current liabilities	(4,009,869)	(3,842,504)
Equity	$ 1,645,060	$ 3,533,242
Equity attributable to:		
Owners of Taiwan Prosperity Chemical Corporation	$ 699,344	$ 1,502,047
Non-controlling interests of Taiwan Prosperity Chemical Corporation	945,716	2,031,195
	$ 1,645,060	$ 3,533,242
Operating revenue	$ 10,370,301	$ 15,166,053
Profit (loss) for the year	$ (2,013,070)	$ 332,064
Other comprehensive income (loss) for the year	124,888	(16,614)
Total comprehensive income (loss) for the year	$ (1,888,182)	$ 315,450

(Continued)

	December 31	
	2019	2018
Profit (loss) attributable to:		
Owners of Taiwan Prosperity Chemical Corporation	$ (855,793)	$ 161,640
Non-controlling interests of Taiwan Prosperity Chemical Corporation	(1,157,277)	170,424
	$ (2,013,070)	$ 332,064
Total comprehensive income (loss) attributable to:		
Owners of Taiwan Prosperity Chemical Corporation	$ (802,703)	$ 133,965
Non-controlling interests of Taiwan Prosperity Chemical Corporation	(1,085,479)	181,485
	$ (1,888,182)	$ 315,450
Net cash inflow (outflow) from:		
Operating activities	$ (410,005)	$ 476,933
Investing activities	(187,293)	1,468
Financing activities	(714,919)	465,913
Net cash inflow (outflow)	$ (1,312,217)	$ 944,314

Ho-Ping Power Company

	December 31	
	2019	2018
Current assets	$ 7,962,055	$ 7,115,395
Non-current assets	29,913,098	31,537,715
Current liabilities	(5,278,137)	(6,627,608)
Non-current liabilities	(3,388,757)	(3,353,289)
Equity	$ 29,208,259	$ 28,672,213
Equity attributable to:		
Owners of Ho-Ping Power Company	$ 17,521,488	$ 17,199,861
Non-controlling interests of Ho-Ping Power Company	11,686,771	11,472,352
	$ 29,208,259	$ 28,672,213

	For the Year Ended December 31	
	2019	2018
Operating revenue	$ 14,402,352	$ 12,777,360
Profit for the year	$ 5,535,574	$ 2,390,778
Other comprehensive income (loss) for the year	(9,142)	(132)
Total comprehensive income for the year	$ 5,526,432	$ 2,390,646

(Continued)

	For the Year Ended December 31	
	2019	2018
Profit attributable to:		
Owners of Ho-Ping Power Company	$ 3,321,344	$ 1,434,468
Non-controlling interests of Ho-Ping Power Company	2,214,230	956,310
	$ 5,535,574	$ 2,390,778
Total comprehensive income attributable to:		
Owners of Ho-Ping Power Company	$ 3,315,859	$ 1,434,388
Non-controlling interests of Ho-Ping Power Company	2,210,573	956,258
	$ 5,526,432	$ 2,390,646
Net cash inflow from:		
Operating activities	$ 7,836,324	$ 4,019,768
Investing activities	(45,939)	(114,722)
Financing activities	(7,065,521)	(3,627,325)
Net cash inflow	$ 724,864	$ 277,721
Dividends paid to non-controlling interests of Ho-Ping Power Company	$ 2,000,000	$ 2,000,000

13. INVESTMENTS ACCOUNTED FOR BY USING THE EQUITY METHOD

	December 31	
	2019	2018
Investments in associates	$ 47,631,870	$ 46,247,974

	December 31	
	2019	2018
Material associates		
Cimpor Global Holdings B.V.	$ 27,832,897	$ 29,071,244
Individually immaterial associates		
International CSRC Investment Holdings Co., Ltd.	6,286,309	6,196,876
Prosperity Conch Cement Company Limited	5,813,901	4,744,772
TCC Recycle Energy Technology Company	1,806,253	-
CCC USA Corporation	1,724,538	1,625,444
Yunnan Kungang & K. Wah Cement Construction Materials Co., Ltd.	1,700,788	1,664,696
Baoshan Kungang & K. Wah Cement Construction Materials Co., Ltd.	1,117,517	876,910
ONYX Ta-Ho Environmental Services Co., Ltd.	818,277	786,226
Sichuan Taichang Building Material Group Company Limited	184,793	47,692
Hong Kong Concrete Co., Ltd.	179,471	217,105
Quon Hing Concrete Co., Ltd.	160,245	283,508
Synpac Ltd.	6,881	6,991
E-ONE moli energy corp.	-	635,495
Shih Hsin Storage & Transportation Co., Ltd.	-	46,369
Chia Huan Tung Cement Corporation	-	44,646
	$ 47,631,870	$ 46,247,974

For the amounts of the Group's investments accounted for using the equity method provided as loan guarantees, refer to Note 32.

a. Material associates

	Proportion of Ownership December 31	
	2019	2018
Cimpor Global Holdings B.V.	40.0%	40.0%

For information on the nature of activities, principal place of business and country of incorporation of Cimpor Global Holdings B.V. and other investees, refer to Table 8.

Cimpor Global Holdings B.V (formerly known as Dutch OYAK TCC Holdings B.V.) is a joint venture company established by Taiwan Cement Dutch and Ordu Yardimlasma Kurumu in November 2018, and the Group obtained 40% of the equity of the joint venture company to indirectly acquire the cement investment projects in areas such as Turkey. On December 31, 2018, the acquisition price allocation report and adjustments of the transaction price had not been completed, but these were subsequently completed at the end of October 2019, and the transaction price increased by $222,626 thousand (included in other payables to related parties). Considering that the depreciation and amortization amounts of the fair value of identifiable assets were not significant, the financial statements for the previous period were not restated.

The financial information of material associates, which reflected the adjustments made when adopting the equity method of accounting, was summarized as follows:

Cimpor Global Holdings B.V.

	December 31	
	2019	2018
Current assets	$ 16,806,980	$ 37,295,117
Non-current assets	64,433,834	3,5469,096
Current liabilities	(11,714,622)	(11,451,405)
Non-current liabilities	(14,600,541)	(2,430,560)
Non-controlling equity	(9,735,582)	(11,862,945)
Equity attributable to the Parent company	$ 45,190,069	$ 47,019,303
Proportion of the Group's ownership	40%	40%
Equity attributable to the Group	$ 18,076,028	$ 18,807,721
Goodwill	9,756,869	10,263,523
Carrying amount	$ 27,832,897	$ 29,071,244

	For the Year Ended December 31	
	2019	2018
Operating revenue	$ 17,136,039	$ 1,044,209
Net income (loss) for the year	$ 348,035	$ (167,984)
Other comprehensive income (loss)	(647,263)	42,924
Total comprehensive income (loss) for the year	$ (299,228)	$ (125,060)

b. Aggregate information of individually immaterial associates

	Proportion of Ownership	
	December 31	
	2019	2018
International CSRC Investment Holdings Co., Ltd. (Note 1)	19.2%	19.2%
Prosperity Conch Cement Company Limited	25.0%	25.0%
TCC Recycle Energy Technology Company (Note 2)	29.7%	-
CCC USA Corporation (Note 3)	33.3%	33.3%
Yunnan Kungang & K. Wah Cement Construction Materials Co., Ltd.	30.0%	30.0%
BaoShen & K. Wah Cement Construction Materials Co., Ltd.	30.0%	30.0%
ONYX Ta-Ho Environmental Services Co., Ltd.	50.0%	50.0%
Sichuan Taichang Building Material Group Company Limited	30.0%	30.0%
Hong Kong Concrete Co., Ltd.	31.5%	31.5%
Quon Hing Concrete Co., Ltd.	50.0%	50.0%
Synpac Ltd.	25.0%	25.0%
E-ONE Moli Energy Corporation (Notes 1 and 2)	-	29.9%
Shih Hsin Storage & Transportation Co., Ltd. (Note 4)	-	18.9%
Chia Huan Tung Cement Corporation (Note 5)	-	33.8%

	For the Year Ended December 31	
	2019	2018
The Group's share of:		
Net income for the year	$ 2,517,673	$ 2,330,607
Other comprehensive loss	(82,548)	(438,785)
Total comprehensive income for the year	$ 2,435,125	$ 1,891,822

Note 1: During the year ended December 31, 2018, the Group paid $673,918 thousand and $3,060,365 thousand to acquire the additional shares of E-ONE Moli Energy Corporation and International CSRC Investment Holdings Co., Ltd., respectively, and the Group's percentage of ownership in the aforementioned investees subsequently increased from 15.1% to 29.9% and from 12.5% to 19.2%, respectively. After the increase in shareholding proportions of the aforementioned investees, the Group assessed that they have significant influence over the investees and reclassified them as investments accounted for using the equity method. The Group paid $943,391 thousand to acquire the additional shares of E-ONE Moli Energy Corporation in January 2019, and its percentage of ownership decreased from 29.9% to 28.1% because the Group did not subscribe for new shares issued by its investee based on its percentage of ownership interest. The Group entered into a share swap with TCC Recycle Energy Technology Company; refer to Note 2 for the details.

Note 2: The Group invested $1,000 thousand for the establishment of TCC Recycling Energy Company in June 2019. TCC Recycle Energy Technology Company increased its capital in August 2019. As the Group invested $340,200 thousand, which was based on its percentage of ownership, its percentage of ownership decreased from 100% to 28.8%. In August 2019, the board of directors of both TCC Recycle Energy Technology Company and E-ONE Moli Energy Corp. resolved to enter into a share swap agreement according to the Business Mergers and Acquisitions Act, under which TCC Recycle Energy Technology Company shall issue preferred shares A which are to be converted into ordinary shares of E-ONE Moli Energy Corp. at the ratio of 1:1. In the fourth quarter of 2019, the Group chose to fully convert the ordinary shares of E-ONE Moli Energy Corp. into the preferred shares A of TCC Recycling Energy Company with a book value of $1,541,505 thousand, and converted them into ordinary shares at the ratio of 1:1 in accordance with the terms and conditions for the issuance of preferred shares. Thus, the Group's percentage of ownership in TCC Recycling Energy Company increased from 28.8% to 29.7%.

Note 3: The Group paid $802,438 thousand to acquire the shares of CCC USA Corp in 2018.

Note 4: The Group's percentage of ownership in Shih Hsin Storage & Transportation Co., Ltd. is less than 20%; however, the Group has significant influence over the latter and therefore accounts for the investment by using the equity method. Shih Hsin Storage & Transportation Co., Ltd. was liquidated at the end of 2019 and the liquidation refund of $41,191 thousand has been received. In addition, $1,813 thousand was included in other receivables - related parties.

Note 5: In May 2019, HKC Investments Ltd. transferred the equity of Chia Huan Tung Cement Corporation amounting to $25,002 thousand to Union Cement Traders Inc. Chia Huan Tung Cement Corporation was in the process of liquidation as at the end of 2019, and $38,088 thousand has been included in other receivables - related parties.

The investments accounted for by using the equity method and the share of profit or loss and other comprehensive income of those investments for the years ended December 31, 2019 and 2018 were based on the associates' audited financial statements for the same years then ended except Yunnan Kungang & K. Wah Cement Construction Materials Co., Ltd. and Baoshan Kungang & K. Wah Cement Construction Materials Co., Ltd. The Group considered that there would be no significant adjustments if such financial statements were to be audited.

14. PROPERTY, PLANT AND EQUIPMENT

	Land	Buildings	Machinery and Equipment	Miscellaneous Equipment	Property in Construction	Total
Cost						
Balance at January 1, 2018	$ 20,665,029	$ 50,587,364	$ 98,082,294	$ 12,142,556	$ 4,402,613	$ 185,879,856
Additions	8,000	125,603	381,605	2,011,212	1,516,506	4,042,926
Disposals	-	(397,580)	(4,280,347)	(1,483,511)	-	(6,161,438)
Reclassification	(7,780)	37,133	547,220	7,584	(558,411)	25,746
Effects of exchange rate changes	-	(735,344)	(1,222,385)	43,143	(64,066)	(1,978,652)
Balance at December 31, 2018	$ 20,665,249	$ 49,617,176	$ 93,508,387	$ 12,720,984	$ 5,296,642	$ 181,808,438
Accumulated depreciation and impairment						
Balance at January 1, 2018	$ 274,188	$ 15,829,125	$ 64,476,095	$ 10,507,380	$ 83,664	$ 91,170,452
Disposals	-	(247,758)	(4,058,526)	(1,387,022)	-	(5,693,306)
Depreciation expenses	-	1,398,469	4,097,581	610,592	-	6,106,642
Impairment losses	-	21,310	4,062	-	-	25,372
Reclassification	-	(4,837)	104,491	(104,491)	-	(4,837)
Effects of exchange rate changes	-	(210,058)	(688,181)	10,488	(1,959)	(889,710)
Balance at December 31, 2018	$ 274,188	$ 16,786,251	$ 63,935,522	$ 9,636,947	$ 81,705	$ 90,714,613
Carrying amounts at December 31, 2018	$ 20,391,061	$ 32,830,925	$ 29,572,865	$ 3,084,037	$ 5,214,937	$ 91,093,825

(Continued)

	Land	Buildings	Machinery and Equipment	Miscellaneous Equipment	Property in Construction	Total
Cost						
Balance at January 1, 2019	$ 20,665,249	$ 49,617,176	$ 93,508,387	$ 12,720,984	$ 5,296,642	$ 181,808,438
Additions	11,277	119,256	1,079,643	4,530,745	2,486,059	8,226,980
Disposals	-	(283,142)	(551,950)	(2,329,013)	(25,402)	(3,189,507)
Reclassification	-	193,802	798,928	161,848	(1,111,047)	43,531
Effects of exchange rate changes	-	(1,185,594)	(1,915,847)	(152,765)	(129,873)	(3,384,079)
Balance at December 31, 2019	$ 20,676,526	$ 48,461,498	$ 92,919,161	$ 14,931,799	$ 6,516,379	$ 183,505,363
Accumulated depreciation and impairment						
Balance at January 1, 2019	$ 274,188	$ 16,786,251	$ 63,935,522	$ 9,636,947	$ 81,705	$ 90,714,613
Disposals	-	(69,083)	(400,424)	(2,035,170)	-	(2,504,677)
Depreciation expenses	-	1,449,595	4,467,167	273,275	-	6,190,037
Impairment losses	-	55,914	580,062	138,808	-	774,784
Reclassification	-	778	650	(1,428)	-	-
Effects of exchange rate changes	-	(364,671)	(1,134,445)	(48,689)	(2,908)	(1,550,713)
Balance at December 31, 2019	$ 274,188	$ 17,858,784	$ 67,448,532	$ 7,963,743	$ 78,797	$ 93,624,044
Carrying amounts at December 31, 2019	$ 20,402,338	$ 30,602,714	$ 25,470,629	$ 6,968,056	$ 6,437,582	$ 89,881,319

(Concluded)

For the years ended December 31, 2019 and 2018, the Group recognized impairment losses of $774,784 thousand and $25,372 thousand, respectively, after assessing that the recoverable amounts of part of its property, plant and equipment were lower than their carrying amounts due to factors such as idling as a result of decrease in market demand or natural disasters.

The above items of property, plant and equipment are depreciated on a straight-line basis over their estimated useful lives as follows:

Buildings	
Main buildings	30-60 years
Main plants	16-50 years
Storage units	10-50 years
Others	20-50 years
Machinery and equipment	2-28 years
Miscellaneous equipment	2-20 years

Property, plant and equipment pledged as collateral for bank borrowings are set out in Note 32.

Acquisitions of property, plant and equipment included non-cash items and were reconciled as follows:

	For the Year Ended December 31	
	2019	2018
Acquisitions of property, plant and equipment	$ 8,226,980	$ 4,042,926
Increase (decrease) in prepayments for equipment	446,845	(275,719)
Decrease (increase) in payables for equipment	(472,030)	550,712
	$ 8,201,795	$ 4,317,919

15. LEASE ARRANGEMENTS - 2019

a. Right-of-use assets

	December 31, 2019
Carrying amounts	
Land (Note)	$ 11,704,843
Buildings	808,408
Machinery	172,103
Other	48,932
	$ 12,734,286

Note: The Group applied IFRS 16 "Lease" since 2019 and recognized prepaid lease payments for land use rights of lands located in China under right-of-use assets.

	For the Year Ended December 31, 2019
Additions to right-of-use assets	$ 4,122,514
Depreciation charge for right-of-use assets	
Land	$ 426,081
Buildings	161,092
Machinery	92,275
Other	18,059
	$ 697,507

b. Lease liabilities

	December 31, 2019
Carrying amounts	
Current	$ 416,346
Non-current	$ 2,073,806

Range of discount rate for lease liabilities was as follows:

	December 31, 2019
Land	1.79%-4.90%
Buildings	1.79%-4.75%
Machinery	1.21%-2.00%
Other	1.76%-4.75%

c. Important tenancy activities and terms

The Group leases certain land and buildings for use as plants and offices. The Group does not have bargain purchase options to acquire the leased premises at the end of the lease terms.

d. Other lease information

	For the Year Ended December 31, 2019
Expenses relating to short-term leases	$ 1,208,205
Expenses relating to low-value asset leases	$ 622
Expenses relating to variable lease payments not included in the measurement of lease liabilities	$ 203,057
Total cash outflow for leases	$ (1,657,786)

The Group leases certain assets which qualify as short-term leases and low-value asset leases. The Group has elected to apply the recognition exemption and thus, did not recognize right-of-use assets and lease liabilities for these leases.

16. INVESTMENT PROPERTIES

	Land	Buildings	Total
Cost			
Balance at January 1, 2018	$ 6,799,051	$ 1,417,773	$ 8,216,824
Disposals	-	(64,284)	(64,284)
Reclassification	7,780	8,284	16,064
Effects of exchange rate changes	-	777	777
Balance at December 31, 2018	$ 6,806,831	$ 1,362,550	$ 8,169,381
Accumulated depreciation and impairment			
Balance at January 1, 2018	$ 1,081,587	$ 760,317	$ 1,841,904
Depreciation expenses	-	22,885	22,885
Disposals	-	(47,642)	(47,642)
Reclassification	-	7,518	7,518
Effects of exchange rate changes	-	256	256
Balance at December 31, 2018	$ 1,081,587	$ 743,334	$ 1,824,921
Carrying amounts at December 31, 2018	$ 5,725,244	$ 619,216	$ 6,344,460
Cost			
Balance at January 1, 2019	$ 6,806,831	$ 1,362,550	$ 8,169,381
Effects of exchange rate changes	-	(491)	(491)
Balance at December 31, 2019	$ 6,806,831	$ 1,362,059	$ 8,168,890

(Continued)

	Land	Buildings	Total
Accumulated depreciation and impairment			
Balance at January 1, 2019	$ 1,081,587	$ 743,334	$ 1,824,921
Depreciation expenses	-	21,943	21,943
Effects of exchange rate changes	-	(183)	(183)
Balance at December 31, 2019	$ 1,081,587	$ 765,094	$ 1,846,681
Carrying amounts at December 31, 2019	$ 5,725,244	$ 596,965	$ 6,322,209

(Concluded)

The buildings of the investment properties are depreciated over their estimated useful lives of 50 years, using the straight-line method.

The fair values of the investment properties were determined by independent qualified professional valuers or the Group’s management using market prices of similar properties. As of December 31, 2019 and 2018, the fair values of investment properties were $14,859,809 thousand and $14,865,003 thousand, respectively.

The investment properties pledged as collateral for bank borrowings are set out in Note 32.

17. INTANGIBLE ASSETS

	Goodwill	Operational Concession	Mining Rights	Others	Total
Cost					
Balance at January 1, 2018	$ 12,032,957	$ 7,681,476	$ 3,215,101	$ 1,189,793	$ 24,119,327
Acquired through business combinations	221,802	-	-	-	221,802
Additions	-	-	49,403	5,482	54,885
Effects of exchange rate changes	(266,414)	-	(65,405)	(766)	(332,585)
Balance at December 31, 2018	$ 11,988,345	$ 7,681,476	$ 3,199,099	$ 1,194,509	$ 24,063,429
Accumulated amortization and impairment					
Balance at January 1, 2018	$ 156,000	$ 906,666	$ 1,210,061	$ 993,976	$ 3,266,703
Amortization expenses	-	151,111	168,235	67,848	387,194
Impairment losses	-	-	5,660	-	5,660
Effects of exchange rate changes	-	-	(25,329)	1,849	(23,480)
Balance at December 31, 2018	$ 156,000	$ 1,057,777	$ 1,358,627	$ 1,063,673	$ 3,636,077
Carrying amounts at December 31, 2018	$ 11,832,345	$ 6,623,699	$ 1,840,472	$ 130,836	$ 20,427,352
Cost					
Balance at January 1, 2019	$ 11,988,345	$ 7,681,476	$ 3,199,099	$ 1,194,509	$ 24,063,429
Additions	-	-	95,248	11,013	106,261
Effects of exchange rate changes	(384,835)	-	(109,738)	(14,528)	(509,101)
Balance at December 31, 2019	$ 11,603,510	$ 7,681,476	$ 3,184,609	$ 1,190,994	$ 23,660,589
Accumulated amortization and impairment					
Balance at January 1, 2019	$ 156,000	$ 1,057,777	$ 1,358,627	$ 1,063,673	$ 3,636,077
Amortization expenses	-	151,111	220,988	58,179	430,278
Effects of exchange rate changes	-	-	(49,671)	(12,213)	(61,884)
Balance at December 31, 2019	$ 156,000	$ 1,208,888	$ 1,529,944	$ 1,109,639	$ 4,004,471
Carrying amounts at December 31, 2019	$ 11,447,510	$ 6,472,588	$ 1,654,665	$ 81,355	$ 19,656,118

The above items of intangible assets with finite useful lives are amortized on a straight-line basis over their useful lives as follows:

Operational concession	50 years
Mining rights	30-50 years
Others	3-17 years

18. PREPAYMENTS FOR LEASES - 2018

	December 31, 2018
Current (included in prepayments)	$ 250,309
Non-current	6,584,246
	$ 6,834,555

The above prepayments for leases were mainly for land use rights in China. The Group applied IFRS 16 "Leases" since 2019 and reclassified prepayments for leases to right-of-use assets. Refer to Note 15 for more information.

19. BORROWINGS

a. Short-term loans

	December 31	
	2019	2018
Secured borrowings		
Bank loans	$ 150,000	$ 100,000
Unsecured borrowings		
Bank loans - unsecured	29,899,542	26,126,051
Bank loans - letters of credit	395,506	-
	30,295,048	26,126,051
	$ 30,445,048	$ 26,226,051
Interest rate	0.82%-4.35%	0.80%-4.57%

b. Short-term bills payable

	December 31	
	2019	2018
Commercial paper	$ 5,880,000	$ 7,410,000
Less: Unamortized discount on bills payable	4,602	7,786
	$ 5,875,398	$ 7,402,214
Interest rate	0.96%-1.24%	0.90%-1.24%

c. Long-term loans and long-term bills payable

	December 31	
	2019	2018
Secured borrowings	$ 4,112,790	$ 3,767,073
Unsecured borrowings	28,064,383	22,788,845
	32,177,173	26,555,918
Long-term bills payable	11,828,000	22,500,000
Less: Discount on long-term bills payable	27,034	23,120
	11,800,966	22,476,880
	43,978,139	49,032,798
Less: Current portions	1,624,138	1,923,945
	$ 42,354,001	$ 47,108,853
Interest rate - long-term bank loans	1.40%-2.90%	1.29%-3.99%
Interest rate - long-term bills payable	1.32%-1.50%	1.25%-1.31%

Long-term loans consist of unsecured borrowings, secured borrowings and earmarked loans. The principals of long-term unsecured and secured borrowings are due in September 2025, and the interests are paid monthly. The principals of earmarked loans are due in December 2025, and the interests are paid monthly or quarterly.

The long-term bills payable is a commercial promissory note signed in 2018 with the banking group for a five-year period, which will be repaid at the expiration of the contract.

According to the joint credit agreement, if the subsidiary Taiwan Prosperity Chemical Corporation is unable to meet the financial ratio restrictions based on the financial data in the semi-annual or annual financial reports, the Company should improve its financial ratios within 6 months from the announcement date of the semi-annual or annual financial report. Any improvement within the aforementioned period would not be deemed as violating the financial commitments. The Company violated the above financial ratio restrictions in 2019, but improved its financial ratios within the grace period stipulated in the agreement. Therefore, the long-term bank loan were not reclassified as current liabilities on December 31, 2019. In addition to the above, the Group did not violate financial covenants of long-term bank loans and long-term bills payable.

Except as stated above, the Group did not violate the financial covenants of other long-term loans and long-term bills payable.

20. BONDS PAYABLE

	December 31	
	2019	2018
Domestic unsecured bonds	$ 24,600,000	$ 12,000,000
Less: Discount on bonds payable	55,240	23,156
	24,544,760	11,976,844
Overseas unsecured convertible bonds	12,663,477	12,663,477
Less: Discount on bonds payable	1,508,459	1,862,628
	11,155,018	10,800,849
	$ 35,699,778	$ 22,777,693

a. Domestic unsecured bonds

The Corporation issued domestic unsecured bonds at face value in the amount of $12,000,000 thousand on June 21, 2018, with a fixed coupon rate of 1.7% per annum. The bonds have a maturity period of 15 years, and a one-time repayment of principal should be made in full on June 21, 2033 and with interest paid annually.

The Corporation issued domestic unsecured bonds at face value in the amount of $12,600,000 thousand on June 14, 2019, with a fixed coupon rate of 0.85% per annum. The bonds have a maturity period of 5 years, and a one-time repayment of principal should be made in full on June 14, 2024 and with interest paid annually.

b. Overseas unsecured convertible bonds

In June 2018, the Corporation's board of directors resolved to issue overseas unsecured convertible bonds for the first time. This proposal was approved and became effective under the letter issued by the FSC dated July 25, 2018 (Ref. No. Jin-Guan-Zheng-Fa-Zi 10703258532). The bonds which durations are 5 years were listed on the Singapore Stock Exchange on December 10, 2018. This zero-coupon overseas convertible bonds have a face value of US$400,000 thousand.

Bondholders may request the Corporation to convert the bonds into the Corporation's ordinary shares at NT$41 per share at any time within the period from the following day after three months from the issuance date to 10 days prior to maturity. The conversion price after the issuance of convertible corporate bonds will be adjusted according to the anti-dilution clause of the 2018 1st Overseas Unsecured Convertible Bonds Issuance and Conversion Rules of the Corporation. The conversion price has been adjusted from NT$41 per share to NT$35.49 per share since August 19, 2019, i.e. the ex-dividend date. Bondholders can request the Corporation to convert the bonds at the fixed exchange rate of US$1: NT$30.878, which is to be divided by the conversion price per share on the conversion date.

The convertible bonds contain both liability and equity components. The equity component was presented in equity under the heading of capital surplus - options. The effective interest rate of the liability component was 3.27% per annum on initial recognition.

	December 31, 2019
Proceeds from issuance (less transaction costs of $103,353 thousand)	$ 12,247,847
Redemption of option derivatives (accounting for financial liabilities measured at FVTPL) and transaction costs	(159,222)
Equity component (less transaction costs allocated to the equity component of $11,038 thousand)	(1,308,070)
Liability component at the date of issue (less transaction costs allocated to the liability component of $90,971 thousand)	10,780,555
Interest charged at an effective interest rate of 3.27%	20,294
Liability component at December 31, 2018	10,800,849
Interest charged at an effective interest rate of 3.27%	354,169
Liability component at December 31, 2019	$ 11,155,018

21. OTHER PAYABLES

	December 31	
	2019	2018
Salaries and bonuses payable	$ 2,622,388	$ 2,824,501
Taxes payable	1,332,528	2,555,872
Deposits and retention money	988,210	1,178,230
Payables for equipment	940,080	478,370
Payables for electricity	422,941	382,476
Freight payables	388,269	485,067
Interest payable	248,728	287,911
Payables to related parties (Note 31)	234,793	6,892
Fines payable	-	132,000
Others	4,047,467	3,351,851
	$ 11,225,404	$ 11,683,170

22. RETIREMENT BENEFIT PLANS

a. Defined contribution plans

The Corporation and its subsidiaries in the Republic of China adopted a pension plan under the Labor Pension Act (LPA), which is a state-managed defined contribution plan. Under the LPA, an entity makes monthly contributions to employees' individual pension accounts at 6% of monthly salaries and wages.

The employees of the Corporation's subsidiaries in China are members of a state-managed retirement benefit plan operated by the government of China. These subsidiaries are required to contribute a specified percentage of payroll costs to the retirement benefit scheme to fund the benefits. The only obligation of the Group with respect to the retirement benefit plan is to make the specified contributions.

b. Defined benefit plan

The defined benefit plan adopted by the Corporation and its subsidiaries in the Republic of China, which is in accordance with the Labor Standards Law, is operated by the government. Pension benefits are calculated on the basis of the length of service and average monthly salaries of the 6 months before retirement. The Group contributes amounts equal to a specified percentage of total monthly salaries and wages to a pension fund administered by the pension fund monitoring committee. Pension contributions are deposited in the Bank of Taiwan in the committee's name. The pension fund is managed by the Bureau of Labor Funds, Ministry of Labor ("the Bureau"); the Group has no right to influence the investment policy and strategy.

The amounts included in the consolidated balance sheets in respect of the Group's defined benefit plan were as follows:

	December 31	
	2019	2018
Present value of defined benefit obligation	$ (1,109,834)	$ (1,114,251)
Fair value of plan assets	2,446,775	1,903,384
	$ 1,336,941	$ 789,133

(Continued)

	December 31	
	2019	2018
Net defined benefit asset	$ 1,434,342	$ 999,648
Net defined benefit liability	$ 97,401	$ 210,515

(Concluded)

Movements in net defined benefit asset were as follows:

	Present Value of Defined Benefit Obligation	Fair Value of the Plan Assets	Net Defined Benefit Asset
Balance at January 1, 2018	$ (1,125,032)	$ 1,810,972	$ 685,940
Service costs			
Current service costs	(10,418)	-	(10,418)
Net interest income (expense)	(12,730)	20,448	7,718
Recognized in profit or loss	(23,148)	20,448	(2,700)
Remeasurement			
Return on plan assets (excluding amounts included in net interest)	-	123,125	123,125
Actuarial loss - changes in demographic assumptions	(7,439)	-	(7,439)
Actuarial loss - changes in financial assumptions	(12,266)	-	(12,266)
Actuarial loss - experience adjustments	(10,134)	-	(10,134)
Recognized in other comprehensive income (loss)	(29,839)	123,125	93,286
Contributions from the employer	-	12,607	12,607
Benefits paid	63,768	(63,768)	-
Balance at December 31, 2018	(1,114,251)	1,903,384	789,133
Service costs			
Current service costs	(6,890)	-	(6,890)
Net interest income (expense)	(11,212)	19,087	7,875
Recognized in profit or loss	(18,102)	19,087	985
Remeasurement			
Return on plan assets (excluding amounts included in net interest)	-	451,400	451,400
Actuarial loss - changes in demographic assumptions	(967)	-	(967)
Actuarial loss - changes in financial assumptions	(31,822)	-	(31,822)
Actuarial loss - experience adjustments	(15,721)		(15,721)
Recognized in other comprehensive income (loss)	(48,510)	451,400	402,890
Contributions from the employer	-	143,905	143,905
Benefits paid	71,001	(71,001)	-
Others	28	-	28
Balance at December 31, 2019	$ (1,109,834)	$ 2,446,775	$ 1,336,941

Through the defined benefit plan under the Labor Standards Law, the Group is exposed to the following risks:

1) Investment risk: The plan assets are invested in domestic and foreign equity and debt securities, bank deposits, etc. The investment is conducted at the discretion of the Bureau or under the mandated management. However, in accordance with relevant regulations, the return generated by plan assets should not be below the interest rate for a 2-year time deposit with local banks.

2) Interest risk: A decrease in the government bond interest rate will increase the present value of the defined benefit obligation; however, this will be partially offset by an increase in the return on the plan's debt investments.

3) Salary risk: The present value of the defined benefit obligation is calculated by reference to the future salaries of plan participants. As such, an increase in the salaries of the plan participants will increase the present value of the defined benefit obligation.

The actuarial valuations of the present value of the defined benefit obligation were carried out by qualified actuaries. The significant assumptions used for the purposes of the actuarial valuations were as follows:

	December 31	
	2019	**2018**
Discount rates	0.63%-0.88%	0.88%-1.25%
Long-term average rates of salary increase	1.50%-2.25%	1.50%-2.25%

If possible reasonable change in each of the significant actuarial assumptions will occur and all other assumptions will remain constant, the present value of the defined benefit obligation would increase (decrease) as follows:

	December 31	
	2019	**2018**
Discount rates		
0.25% increase	$ (22,965)	$ (24,189)
0.25% decrease	$ 23,716	$ 25,012
Expected rates of salary increase		
0.25% increase	$ 22,955	$ 24,290
0.25% decrease	$ (22,346)	$ (23,614)

The sensitivity analysis presented above may not be representative of the actual changes in the present value of the defined benefit obligation as it is unlikely that the changes in assumptions would occur in isolation of one another as some of the assumptions may be correlated.

	December 31	
	2019	**2018**
The expected contributions to the plan for the next year	$ 12,600	$ 13,121
The average duration of the defined benefit obligation	7-13 years	7-14 years

23. EQUITY

a. Share capital

Ordinary shares

	December 31	
	2019	2018
Number of shares authorized (in thousands)	7,000,000	7,000,000
Shares authorized	$ 70,000,000	$ 70,000,000
Number of shares issued and fully paid (in thousands)	5,465,619	5,108,060
Shares issued	$ 54,656,192	$ 51,080,599

A holder of issued ordinary shares with par value of NT$10 is entitled to the proportional rights to vote and to dividends. The authorized shares including ordinary shares and preference shares contain 60,000 thousand units retained for the exercise of employee share options.

The Corporation passed the resolution to distribute share dividends of $3,575,593 thousand and $4,240,509 thousand in the shareholders' meetings in June 2019 and June 2018, respectively, which were declared effective by the FSC. The subscription base dates were August 19, 2019 and August 1, 2018, respectively, as determined by the board of directors.

The Corporation's board of directors resolved to issue ordinary shares in the form of global depositary shares for the purpose of investing in overseas subsidiaries and to repay borrowings. The transaction was approved by the FSC under letter No. 10703258531 which was issued on July 25, 2018. The Corporation issued 87,500 units at US$6.27 per share on the Luxembourg Stock Exchange, which amounted to a total of US$548,625 thousand in August 2018. One global depositary share represents 5 ordinary shares, and the total global depositary shares represent 437,500 thousand ordinary shares. All outstanding global depositary shares were converted into ordinary shares as of December 31, 2018.

b. Preference shares

In June 2018, the Corporation's board of directors resolved to increase cash capital by issuing preference shares for the second time, which was approved by the FSC under letter dated July 25, 2018 (Ref. No. Jin-Guan-Zheng-Fa-Zi 1070325853), and the record date of capital increase was determined as of December 13, 2018, it was expected to issue 200,000 thousand shares having a face value of $10 per share at the issue price of NT$50 per share, with 3.5% coupon per annum (based on a five-year term 0.9375% IRS interest rate + 2.5625% fixed interest rate). Five-year term IRS interest rate will be reset on the next business day of the expiry of the five-year period from the date of issue and every five years thereafter. The shareholders of the second preference shares do not have the right to vote and to elect in the shareholders meeting but can be elected as directors. The Corporation has full discretion on the dividend distribution of the second preference shares. If there is no surplus or insufficient surplus to pay the preference share dividends upon the end of current fiscal year, the Corporation's resolution to cancel the distribution of preference share dividends will not constitute an event of default or a termination event in a contract. Preference share dividends are non-accumulative, and dividends that are not distributed or distributed in excess are not accumulated in the future year with deferred annual repayment. There is no maturity of the Corporation's second preference shares, but the Corporation may recover whole or part of the second preference shares at the actual issue price from the day following the five-year period from the issue date. The preference shares may not be converted to ordinary shares, and the preference shareholders do not have the rights to require the Corporation to redeem the preference shares they hold.

c. Capital surplus

	December 31	
	2019	**2018**
May be used to offset a deficit, distributed as cash dividends, or transferred to share capital (1)		
Issuance of shares	$ 44,176,367	$ 44,176,367
Conversion of bonds	1,520,632	1,520,632
Difference between consideration and the carrying amount of subsidiaries' net assets during actual acquisitions or disposals	466,784	466,755
Treasury share transactions	204,127	203,725
Donations	31,537	31,537
May only be used to offset a deficit (2)		
Changes in percentage of ownership interests in subsidiaries	116,238	116,238
Forfeited share options	10,695	10,695
Dividends distributed by subsidiaries not yet received by shareholders	2,161	2,161
May not be used for any purpose		
Equity component of convertible bonds payable	1,308,070	1,308,070
Changes in interests in associates accounted for by using equity method	179,336	61
	$ 48,015,947	$ 47,836,241

1) Such capital surplus may be used to offset a deficit; in addition, when the Corporation has no deficit, such capital surplus may be distributed as cash dividends or transferred to share capital (limited to a certain percentage of the Corporation's capital surplus and once a year).

2) Such capital surplus arises from the effect of changes in ownership interest in a subsidiary resulting from equity transactions, other than actual disposals or acquisitions, or from changes in capital surplus of subsidiaries accounted for by using the equity method.

d. Retained earnings and dividend policy

Under the dividend policy as set in the amended Articles, where the Corporation made profit in a fiscal year, the profit shall be first utilized for paying taxes, offsetting losses of previous years, setting aside as a legal reserve 10% of the remaining profit, setting aside or reversing a special reserve in accordance with the laws and regulations, and then any remaining profit together with any undistributed retained earnings shall be used by the Corporation's board of directors as the basis for proposing a distribution plan, which should be resolved in the shareholders' general meeting for the distribution of dividends and bonuses to shareholders. For the policies on the distribution of employees' compensation and remuneration of directors, refer to Note 24(c): Net Income - employees' compensation and remuneration of directors.

In addition to the capital-intensive, mature and stable production and marketing of cement and cement-related products, the Corporation aggressively pursues diversification. For the development of diversified investments or other important capital budgeting plans, the Corporation decided that the payout ratio of cash dividend is to be at least 20% of the total dividends to be distributed to ordinary shareholders; the rest will be paid in share dividends.

Items referred to under Rule No. 1010012865, Rule No. 1010047490 and Rule No. 1030006415 issued by the FSC and the directive titled "Questions and Answers for Special Reserves Appropriated Following Adoption of IFRSs" should be appropriated to or reversed from a special reserve by the Corporation.

An appropriation of earnings to the legal reserve shall be made until the legal reserve equals the Corporation's share capital. The legal reserve may be used to offset deficits. If the Corporation has no deficit and the legal reserve has exceeded 25% of the Corporation's share capital, the excess may be transferred to capital or distributed in cash.

The appropriations of earnings for 2018 and 2017 approved in the shareholders' general meetings in June 2019 and 2018, respectively, were as follows:

	Appropriation of Earnings For the Year Ended December 31		Dividends Per Share (NT$) For the Year Ended December 31	
	2018	2017	2018	2017
Legal reserve	$ 2,118,082	$ 759,425		
Cash dividends on preference shares	18,219	-	$ 0.09	$ -
Cash dividends on ordinary shares	16,856,367	6,360,764	$ 3.30(Note)	$ 1.50
Share dividends on ordinary shares	3,575,593	4,240,509	$ 0.70(Note)	$ 1.00

Note: The number of ordinary shares outstanding was affected by the Corporation's purchase of treasury shares which has not been transferred to employees. Therefore, the cash dividend was adjusted to $3.31 and the share dividend was adjusted to $0.70.

The appropriation of earnings for 2019 had been proposed by the Corporation's board of directors on March 20, 2020. The appropriation and dividends per share were as follows:

	Appropriation of Earnings	Dividends Per Share (NT$)
Legal reserve	$ 2,448,745	
Dividends on preference shares	350,000	$ 1.75
Cash dividends on ordinary shares	13,644,048	$ 2.50
Share dividends on ordinary shares	2,728,810	$ 0.50

The appropriation of earnings for 2019 is subject to be approved by shareholder's general meeting in June 2020.

e. Special reserve

The Corporation appropriated to special reserve the amounts that were the same as the unrealized revaluation increment and cumulative translation adjustments transferred to retained earnings at the first-time adoption of IFRSs, which were $10,454,422 thousand and $2,709,369 thousand, respectively.

The special reserve appropriated at the first-time adoption of IFRSs relating to investment in properties other than land may be reversed according to the period of use. The special reserve relating to land may be reversed upon disposal or reclassification, and such special reserve of $0 thousand and $573 thousand was reversed for the years ended December 31, 2019 and 2018, respectively. The special reserve appropriated, due to currency translation adjustments for financial statements of foreign operations (including subsidiaries), shall be reversed based on the Corporation's disposal percentage, and all of the special reserve shall be reversed when the Corporation loses significant influence. There was no reversal for the years ended December 31, 2019 and 2018.

f. Other equity items

1) Exchange differences on translating the financial statements of foreign operations

	For the Year Ended December 31	
	2019	2018
Balance at January 1	$ (5,037,221)	$ (790,475)
Effect of changes in tax rate	-	1,861
Recognized during the year		
Exchange differences on translating foreign operations	(4,745,389)	(3,963,808)
Share of exchange differences of associates and joint ventures accounted for by using the equity method	(1,877,651)	(284,799)
Balance at December 31	$ (11,660,261)	$ (5,037,221)

2) Unrealized gain (loss) on financial assets at FVTOCI

	For the Year Ended December 31	
	2019	2018
Balance at January 1	$ 24,074,566	$ 24,158,871
Recognized during the year		
Unrealized gain - equity instruments	11,090,117	1,409,941
Share from associates accounted for using the equity method	230,433	(173,214)
Cumulative loss on disposal of equity instruments transferred to retained earnings	-	(1,321,032)
Other comprehensive income (loss) recognized in the year	11,320,550	(84,305)
Balance at December 31	$ 35,395,116	$ (24,074,566)

3) Cash flow hedges

	For the Year Ended December 31	
	2019	2018
Balance at January 1	$ 1,109	$ -
Loss on changes in the fair value of hedging instruments		
Exchange rate risk - spot exchange rate	(5,768)	-
Share of cash flow hedges of subsidiaries accounted for by using the equity method	(1,109)	1,109
Transferred to initial carrying amount of hedged items	5,768	-
Balance at December 31	$ -	$ 1,109

g. Non-controlling interests

	For the Year Ended December 31	
	2019	2018
Balance at January 1	$ 15,837,946	$ 16,315,377
Net income	1,244,009	1,463,250
Other comprehensive income in the period		
Effect of changes in tax rate	-	1,029
Exchange differences arising on translation of foreign operations	(46,714)	(9,681)
Unrealized gain on financial assets at FVTOCI	118,872	10,765
Loss on changes in fair value of hedging instruments	(3,846)	-
Remeasurement of defined benefit plan	(10,556)	(3,147)
Transferred to the initial carrying amount of hedged items	3,846	-
Changes in ownership interests of subsidiaries	26	22
Disposal or acquisitions of non-controlling interests in subsidiaries	(146,476)	285,387
Dividends paid by subsidiaries	(2,219,308)	(2,175,906)
Others	-	(49,150)
Balance at December 31	$ 14,777,799	$ 15,837,946

h. Treasury shares

(In Thousands of Shares)

	For the Year Ended December 31	
	2019	2018
Number of shares at January 1	70	-
Increase during the period	8,000	6,000
Transferred to employees	(70)	(5,930)
Number of shares at December 31	8,000	70

In February 2018, the Corporation's board of directors had resolved to buy back 6,000 thousand treasury shares for transferring to the employees, and they were fully executed in the same month. The average buy-back price per share was $36.36 per share, and the record date of employees' subscription for the shares was September 10, 2018. The Corporation had transferred 5,930 thousand shares to employees at the price of $30.3 per share as of December 31, 2018. The Corporation has transferred 70 thousand shares to employees at the price of $30.3 per share from January 1 to December 31, 2019. The record date of employees' subscription for the shares was April 29, 2019. The Corporation had recognized the compensation costs of $826 thousand on the grant date and recognized capital surplus - treasury shares transaction of $402 thousand on the payment date. In May 2019, the Corporation's board of directors resolved to buy back 10,000 thousand treasury shares. The Corporation had repurchased 8,000 thousand shares as of the end of July 2019. To maintain shareholders' equity and in consideration of the employees' willingness to subscribe for the shares, as of July 2019, the repurchase of the shares was not yet complete, and the average repurchase price was $43.62, and the shares will be transferred to employees.

Under the Securities Exchange Act, the Corporation shall neither pledge treasury shares nor exercise shareholder's rights on these shares, such as rights to dividends and to vote.

24. NET INCOME

Net income includes the following items:

a. Depreciation and amortization

	For the Year Ended December 31	
	2019	2018
An analysis of depreciation by account		
Property, plant and equipment	$ 6,190,037	$ 6,106,642
Right-of-use assets	697,507	-
Investment properties	21,943	22,885
	$ 6,909,487	$ 6,129,527
An analysis of depreciation by function		
Operating costs	$ 6,474,642	$ 5,800,458
Operating expenses	433,989	326,120
Non-operating expenses	856	2,949
	$ 6,909,487	$ 6,129,527
An analysis of amortization of intangible assets by function		
Operating costs	$ 379,676	$ 335,904
Operating expenses	50,602	51,290
	$ 430,278	$ 387,194

b. Employee benefits expense

	For the Year Ended December 31	
	2019	2018
Retirement benefit plans		
Defined contribution plans	$ 406,288	$ 371,336
Defined benefit plan	(985)	2,700
	405,303	374,036
Share-based payments		
Equity-settled	826	45,448
Other employee benefits	6,511,952	6,397,495
Total of employee benefits expense	$ 6,918,081	$ 6,816,979
An analysis of employee benefits expense by function		
Operating costs	$ 5,086,005	$ 4,903,918
Operating expenses	1,832,076	1,913,061
	$ 6,918,081	$ 6,816,979

c. Employees' compensation and remuneration of directors

The Corporation accrued employees' compensation and remuneration of directors at the rates of 0.01%-3% and no higher than 1%, respectively, of net profit before income tax, employees' compensation, and remuneration of directors. The total amount of employees' compensation and remuneration of directors for the years ended December 31, 2019 and 2018, which was approved by the Corporation's board of directors in March 2020 and March 2019 as follows:

	For the Year Ended December 31	
	2019	**2018**
Employees' compensation	$ 86,409	$ 68,236
Remuneration of directors	245,432	215,088

For the year ended December 31, 2019, if there is a change in the amounts after the annual consolidated financial statements are authorized for issue, the differences are recorded as a change in the accounting estimate.

There was no difference between the actual amounts of employees' compensation and remuneration of directors paid and the amounts recognized in the consolidated financial statements for the years ended December 31, 2018 and 2017.

Information on the employees' compensation and remuneration of directors resolved by the Corporation's board of directors will be available at the Market Observation Post System website of the Taiwan Stock Exchange.

d. Finance costs

	For the Year Ended December 31	
	2019	**2018**
Interest on bank borrowings	$ 1,219,949	$ 2,184,331
Interest on corporate bonds	616,160	128,722
Interest on lease liabilities	43,430	-
Other finance costs	319,579	147,249
	$ 2,199,118	$ 2,460,302

Information about capitalized interest was as follows:

	For the Year Ended December 31	
	2019	**2018**
Capitalization amount of interest	$ 7,370	$ 9,633
Capitalization rate of interest	1.05%-1.10%	0.94%-1.79%

e. Other income

	For the Year Ended December 31	
	2019	2018
Government grants	$ 207,856	$ 142,075
Service fees of endorsement and warranty	30,284	77,952
Net gain on disposal of investment	181,349	-
Others	837,086	664,621
	$ 1,256,575	$ 884,648

f. Other expenses

	For the Year Ended December 31	
	2019	2018
Loss on work stoppages	$ 131,561	$ 147,687
Others	269,866	26,718
	$ 401,427	$ 174,405

25. INCOME TAX

a. Major components of tax expense recognized in profit or loss

	For the Year Ended December 31	
	2019	2018
Current tax		
In respect of the current year	$ 7,055,361	$ 6,773,548
Income tax on unappropriated earnings	16,129	3,158
Adjustments for prior years	(296,503)	24,101
	6,774,987	6,800,807
Deferred tax		
In respect of the current period	403,342	467,272
Effect of change of tax rate	-	632,271
	403,342	1,099,543
Income tax expense recognized in profit or loss	$ 7,178,329	$ 7,900,350

A reconciliation of income before income tax and income tax expense recognized in profit or loss was as follows:

	For the Year Ended December 31	
	2019	2018
Income before income tax	$ 32,633,419	$ 30,544,421
Income tax expense at the statutory rate	$ 6,526,683	$ 6,108,884
Non-deductible expenses in determining taxable income	325,050	704,875
Tax-exempt income	(1,083,539)	(881,159)
Difference payable of basic tax	-	53,440
Unrecognized loss carryforwards and deductible temporary differences	555,622	391,076
Effect of changes of tax rate	-	632,271
Loss carryforwards utilized in the current year	(140,118)	(535,427)
Effects of different tax rate of subsidiaries operating in other jurisdictions	1,072,218	1,071,806
Income tax on unappropriated earnings	16,129	3,158
Adjustments for prior years	(296,503)	24,101
Others	202,787	327,325
Income tax expense recognized in profit or loss	$ 7,178,329	$ 7,900,350

The Income Tax Act in the Republic of China ("ROC") was amended in 2018, and the corporate income tax rate was adjusted from 17% to 20%. The effect of the change in tax rate on deferred tax expenses to be recognized in profit or loss is recognized in full in the period in which the change in the tax rate occurs. In addition, the rate of the corporate surtax applicable to the 2018 unappropriated earnings has been reduced from 10% to 5%. The applicable tax rate used by subsidiaries in China is 25%, and the tax rates used by other entities operating in other jurisdictions are based on the tax laws in those jurisdictions.

In July 2019, the President of the ROC approved the announcement of the amendments to the Statute of Industrial Innovation, which stipulated that the amounts of unappropriated earnings in 2018 and thereafter that are reinvested in certain assets or technologies above a specific amount are allowed as deduction when computing the income tax on unappropriated earnings. The Group has already deducted the amount of capital expenditure from the unappropriated earnings in 2018 that was reinvested when calculating the tax on unappropriated earnings for the year ended December 2019.

b. Income tax recognized in other comprehensive income

	For the Year Ended December 31	
	2019	2018
Deferred tax		
Effect of changes of tax rate	$ -	$ 7,761
Deferred tax in the current year		
Remeasurement on defined benefit plan	80,567	18,658
Difference of translation of foreign operations	-	(2,189)
	$ 80,567	$ 24,230

c. Current tax assets and liabilities

	December 31 2019	December 31 2018
Current tax assets		
Tax refund receivable (included in other receivables)	$ 83,747	$ 59,484
Current tax liabilities		
Current income tax liabilities	$ 4,443,343	$ 4,090,640

d. Deferred income tax assets and liabilities

The movements of deferred income tax assets (included in other non-current assets) and deferred income tax liabilities were as follows:

For the year ended December 31, 2019

	Opening Balance	Recognized in Profit or Loss	Recognized in Other Comprehensive Income	Others	Closing Balance
Deferred income tax assets					
Loss carryforwards	$ 206,168	$ 482	$ -	$ -	$ 206,650
Allowance for impaired receivables	16,778	(11,364)	-	45	5,459
Defined benefit plan	47,100	(21,372)	3,681	-	29,409
Inventories	116,351	8,079	-	(2,277)	122,153
Others	322,215	(50,057)	-	(4,766)	267,392
	$ 708,612	$ (74,232)	$ 3681	$ (6,998)	$ 631,063
Deferred income tax liabilities					
Land value increment tax	$ 5,092,973	$ -	$ -	$ -	$ 5,092,973
Finance leases	3,308,698	(54,795)	-	-	3,253,903
Property, plant and equipment	1,305,545	112,094	-	(34,562)	1,383,077
Retained earnings from foreign subsidiaries	1,435,161	263,377	-	(116,016)	1,582,522
Defined benefit plan	176,920	3,171	84,248	-	264,339
Others	6,857	5,263	-	-	12,120
	$ 11,326,154	$ 329,110	$ 84,248	$ (150,578)	$ 11,588,934

For the year ended December 31, 2018

	Opening Balance	Recognized in Profit or Loss	Recognized in Other Comprehensive Income	Others	Closing Balance
Deferred income tax assets					
Loss carryforwards	$ 293,535	$ (87,439)	$ -	$ 72	$ 206,168
Allowance for impaired receivables	27,442	(10,454)	-	(210)	16,778
Defined benefit plan	50,336	(6,805)	3,569	-	47,100
Inventories	124,950	(7,256)	-	(1,343)	116,351
Others	331,838	(3,919)	-	(5,704)	322,215
	$ 828,101	$ (115,873)	$ 3,569	$ (7,185)	$ 708,612
Deferred income tax liabilities					
Land value increment tax	$ 5,092,973	$ -	$ -	$ -	$ 5,092,973
Finance leases	2,774,966	533,732	-	-	3,308,698
Property, plant and equipment	1,284,634	42,363	-	(21,452)	1,305,545
Retained earnings from foreign subsidiaries	1,103,010	395,651	(1,861)	(61,639)	1,435,161
Defined benefit plan	133,435	13,825	29,660	-	176,920
Others	8,758	(1,901)	-	-	6,857
	$ 10,397,776	$ 983,670	$ 27,799	$ (83,091)	$ 11,326,154

e. Unrecognized deferred income tax assets in respect of loss carryforwards

	December 31	
	2019	**2018**
Loss carryforwards		
Expire in 2019	$ -	$ 865,273
Expire in 2020	695,628	943,916
Expire in 2021	912,336	927,744
Expire in 2022	576,744	940,752
Expire in 2023	879,616	874,482
Expire in 2024	585,895	539,929
Expire in 2025	1,355,332	1,398,105
Expire in 2026	44,891	71,204
Expire in 2027	796,124	796,124
Expire in 2028	10,004	10,004
Expire in 2029	1,203,804	-
	$ 7,060,374	$ 7,367,533

f. Unused loss carryforwards information

Loss carryforwards as of December 31, 2019 were comprised of:

Unused Amount	**Expiry Year**
$ 695,628	2020
912,336	2021
576,744	2022
879,616	2023
585,895	2024
1,980,414	2025
437,641	2026
796,124	2027
10,004	2028
1,219,224	2029
$ 8,093,626	

g. Unrecognized deferred income tax liabilities in respect of investments

As of December 31, 2019 and 2018, the taxable temporary differences in respect of investments in subsidiaries and associates for which no deferred income tax liabilities have been recognized were $67,415,446 thousand and $47,597,152 thousand, respectively.

h. Income tax assessments

The information of income tax assessments for the Group is as follows:

Year	Name of Group Entity
2017	Taiwan Cement Corporation, Ta-Ho RSEA Environment Co., Ltd., Ho Sheng Mining Co., Ltd., TCC Investment Corporation, Union Cement Traders Inc., TCC Information Systems Corporation, Taiwan Cement Engineering Corporation, Taiwan Prosperity Chemical Corporation, Tung Chen Mineral Corporation, Jin Chang Minerals Corporation, Hoping Industrial Port Corporation, HPC Power Service Corporation, Ho-Ping Power Company, Ta-Ho Maritime Corporation, E.G.C. Cement Corporation, Feng Sheng Enterprise Company, TCC Green Energy Corporation, Kuan-Ho Refractories Industry Corporation, Taiwan Transport & Storage Corporation
2016	TCC Chemical Corporation

26. EARNINGS PER SHARE

Unit: NT$ Per Share

	For the Year Ended December 31	
	2019	2018
Basic earnings per share	$ 4.43	$ 4.08
Diluted earnings per share	$ 4.25	$ 4.08

The weighted average number of shares outstanding used in the earnings per share computation was adjusted retrospectively for the issuance of bonus shares on August 19, 2019. The basic and diluted earnings per share adjusted retrospectively for the year ended December 31, 2018 were as follows:

Unit: NT$ Per Share

	Before Retrospective Adjustment	After Retrospective Adjustment
Basic earnings per share	$ 4.37	$ 4.08
Diluted earnings per share	$ 4.37	$ 4.08

The earnings and weighted average number of ordinary shares outstanding in the computation of earnings per share were as follows:

	For the Year Ended December 31	
	2019	2018
Net income (Note)	$ 24,192,862	$ 21,180,821
Effect of potentially dilutive ordinary shares:		
Interest on convertible bonds	227,570	-
Earnings used in the computation of diluted earnings per share	$ 24,420,432	$ 21,180,821

(Continued)

	For the Year Ended December 31	
	2019	2018
Number of shares (in thousands)		
Weighted average number of ordinary shares in computation of basic earnings per share	5,461,212	5,188,788
Effect of potentially dilutive ordinary shares:		
Employees' compensation	2,368	2,129
Convertible bonds	281,315	-
Weighted average number of ordinary shares used in the computation of diluted earnings per share	5,744,895	5,190,917

(Concluded)

Note: Preference share dividend of $18,219 thousand was deducted.

If the Corporation offered to settle compensation paid to employees in cash or shares, the Corporation assumed the entire amount of the compensation or bonus will be settled in shares, and the resulting potential shares were included in the weighted average number of shares outstanding used in the computation of diluted earnings per share, as the effect is dilutive. Such dilutive effect of the potential shares is included in the computation of diluted earnings per share until the number of shares to be distributed to employees is resolved in the following year.

27. EQUITY TRANSACTIONS WITH NON-CONTROLLING INTERESTS

For the year ended December 31, 2019

During 2019, the Group acquired a portion of the shares of Ta-Ho Maritime Corporation, and the proportion of ownership was 94%.

Acquirer	Taiwan Transport and Storage Corporation
Acquiree	**Ta-Ho Maritime Corporation**
Cash consideration paid	$ (1,017)
The proportionate share of subsidiaries' net assets carrying amount transferred from non-controlling interests	1,046
Differences arising from equity transactions	$ 29

Acquirer	Taiwan Transport and Storage Corporation
Acquiree	**Ta-Ho Maritime Corporation**
Line items adjusted for equity transactions	
Capital surplus - difference between the consideration and the carrying amount of subsidiaries' net assets during actual acquisitions or disposals	$ 29

The above transactions were accounted for as equity transactions since there was no change in the Group's control over these subsidiaries.

For the year ended December 31, 2018

For the year ended December 31, 2018, the Group acquired a portion of the shares of Ta-Ho Maritime Corporation and E.G.C. Cement Corporation, and increased its proportionate ownership interests from 92.3% to 94% and 95% to 100%, respectively. For the year ended December 31, 2018, the Group disposed of a portion of the shares of Taiwan Prosperity Chemical Corporation, and decreased its proportionate ownership interests from 52.5% to 42.5%.

Investor	Taiwan Transport and Storage Corporation		Taiwan Cement Corporation Taiwan	TCC Investment Corporation Taiwan	
Investee	**Ta-Ho Maritime Corporation**	**E.G.C. Cement Corporation**	**Prosperity Chemical Corporation**	**Prosperity Chemical Corporation**	**Total**
Cash consideration (paid) received	$ (53,278)	$ (9,958)	$ 787,369	$ 1,170	$ 725,303
The proportionate share of subsidiaries' net assets' carrying amount transferred from (to) non-controlling interests	53,483	10,044	(321,659)	(416)	(258,548)
Differences arising from equity transactions	$ 205	$ 86	$ 465,710	$ 754	$ 466,755

Investor	Taiwan Transport and Storage Corporation		Taiwan Cement Corporation Taiwan	TCC Investment Corporation Taiwan	
Investee	Ta-Ho Maritime Corporation	E.G.C. Cement Corporation	Prosperity Chemical Corporation	Prosperity Chemical Corporation	Total
Line items adjusted for equity transactions					
Capital surplus - difference between the consideration and the carrying amount of subsidiaries' net assets during actual acquisitions or disposals	$ 205	$ 86	$ 465,710	$ 754	$ 466,755

The above transactions were accounted for as equity transactions since there was no change in the Group's control over these subsidiaries.

For the purpose of streamlining its investment structure, the Corporation's board of directors approved the merger with Kuan-Ho Construction & Development Corporation and TCC Chemical Corporation with TCC Chemical Corporation as the surviving company on January 1, 2018. Since the merger is considered as a group reorganization, the carrying amount method is taken as the applicable accounting policy.

Acquirer	TCC Chemical Corporation
Acquiree	Kuan-Ho Construction & Development
Cash consideration paid	$ (107,663)
The proportionate share of subsidiaries' net assets carrying amount transferred from non-controlling interests	49,150
Differences arising from equity transactions	$ (58,513)

Acquirer	TCC Chemical Corporation
Acquiree	Kuan-Ho Construction & Development
Line items adjusted for equity transactions	
Retained earnings	$ (58,513)

28. CASH FLOWS INFORMATION

Changes in liabilities arising from financing activities:

For the year ended December 31, 2019

	Opening Balance	Cash Flows	Effect of Exchange Rate	Closing Balance
Short-term borrowings	$ 26,226,051	$ 4,364,712	$ (145,715)	$ 30,445,048
Long-term borrowings (including expired within a year)	26,555,918	5,711,550	(90,295)	32,177,173
	$ 52,781,969	$ 10,076,262	$ (236,010)	$ 62,622,221

For the year ended December 31, 2018

	Opening Balance	Cash Flows	Effect of Exchange Rate	Closing Balance
Short-term borrowings	$ 20,314,112	$ 5,760,814	$ 151,125	$ 26,226,051
Long-term borrowings (including expired within a year)	57,405,210	(32,291,778)	1,442,486	26,555,918
	$ 77,719,322	$ (26,530,964)	$ 1,593,611	$ 52,781,969

29. CAPITAL MANAGEMENT

The Group needs to maintain sufficient capital to fulfill the Group's requirements of business expansion and construction. Therefore, the capital management of the Group shall focus on a comprehensive operational plan to ensure sound profitability and financial structure so as to fulfill the mid- and long-term demand of working capital, capital expenditures, debts repayment and dividend distributions.

30. FINANCIAL INSTRUMENTS

a. Fair value of financial instruments not measured at fair value

December 31, 2019

	Carrying Amount	Fair Value			
		Level 1	Level 2	Level 3	Total
Financial liabilities					
Financial liabilities at amortized cost					
Convertible bonds payable	$ 11,155,018	$ -	$ -	$ 11,695,351	$ 11,695,351

December 31, 2018

	Carrying Amount	Fair Value			
		Level 1	Level 2	Level 3	Total
Financial liabilities					
Financial liabilities at amortized cost					
Convertible bonds payable	$ 10,800,849	$ -	$ -	$ 10,904,874	$ 10,904,874

b. Fair value of financial instruments measured at fair value on a recurring basis

1) Fair value hierarchy

December 31, 2019

	Level 1	Level 2	Level 3	Total
Financial assets mandatorily classified as at FVTPL				
Derivatives-put options and redemption options of convertible bond payables	$ -	$ -	$ 1,235	$ 1,235
Domestic listed shares	228,588	-	-	228,588
Domestic emerging market shares	96,909	-	-	96,909
Mutual funds	175,273	-	-	175,273
	$ 500,770	$ -	$ 1,235	$ 502,005
Financial assets at FVTOCI				
Equity instrument investment				
Domestic listed shares	$ 7,126,288	$ -	$ -	$ 7,126,288
Foreign listed shares	29,148,717	-	-	29,148,717
Domestic unlisted shares	-	-	6,971,622	6,971,622
Convertible preference shares	54,457	-	-	54,457
	$ 36,329,462	$ -	$ 6,971,622	$ 43,301,084

December 31, 2018

	Level 1	Level 2	Level 3	Total
Financial assets mandatorily classified as at FVTPL				
Domestic listed shares	$ 220,787	$ -	$ -	$ 220,787
Domestic emerging market shares	85,780	-	-	85,780
Mutual funds	243,271	-	-	243,271
	$ 549,838	$ -	$ -	$ 549,838
Financial assets at FVTOCI				
Equity instrument investment				
Domestic listed shares	$ 6,282,884	$ -	$ -	$ 6,282,884
Foreign listed shares	19,926,459	-	-	19,926,459
Domestic unlisted shares	-	-	5,865,710	5,865,710
Convertible preference shares	-	-	51,375	51,375
	$ 26,209,343	$ -	$ 5,917,085	$ 32,126,428
Financial liabilities at FVTPL				
Derivatives-put options and redemption options of convertible bonds payables	$ -	$ -	$ 139,460	$ 139,460

There were no transfers between Levels 1 and 2 in the current and prior periods.

2) Reconciliation of Level 3 fair value measurements of financial instruments

	For the Year Ended December 31, 2019
Financial assets at FVTOCI	
Equity instrument investment	
Balance at January 1, 2019	$ 5,917,085
Convertible preference shares transferred from Level 3 to Level 1 due to listing	(54,457)
Recognized in other comprehensive income	1,113,577
Disposal	(4,583)
Balance at December 31, 2019	$ 6,971,622
Financial assets at FVTPL	
Derivative instrument investment	
Balance at January 1, 2019 (included in Financial liabilities at FVTPL)	$ (139,460)
Recognized in income	140,695
Balance at December 31, 2019	$ 1,235

	For the Year Ended December 31, 2018
Financial assets at FVTOCI	
Equity instruments	
Balance at January 1, 2018	$ 5,497,046
Additions	292,469
Disposals	(1,333)
Recognized in other comprehensive income	393,185
Reclassification	(264,562)
Effect of exchange rate	280
Balance at December 31, 2018	$ 5,917,085
Financial assets at FVTPL	
Derivative instruments	
Balance at January 1, 2018 (included in Financial liabilities at FVTPL)	$ -
Additions	(159,222)
Recognized in income	19,762
Balance at December 31, 2018	$ (139,460)

3) Valuation techniques and inputs applied for Level 3 fair value measurement

There were no quoted prices in active markets for put options and redemption options of ECB issued by the Corporation. Hence, the fair values of options are determined using the binomial option pricing model where the unobservable input is historical volatility. An increase in historical volatility used in isolation would result in an increase in the fair value. The historical volatility used was 14.67% and 29.22% on December 31, 2019 and 2018.

The Group measures the fair value of its investments on domestic and foreign unlisted shares by using the asset-based approach, the market approach, and the dividend discount model.

Under the asset-based approach, the total value of an investment is based on the fair value of its assets and liabilities. The significant unobservable inputs used are listed in the table below.

	December 31	
	2019	**2018**
Comprehensive discount for lack of marketability and non-controlling interests	10%	10%

If the inputs to the valuation model were changed to reflect reasonably possible alternative assumptions while all the other variables were held constant, the fair value of the shares would increase (decrease) as follows:

	December 31	
	2019	**2018**
Comprehensive discount for lack of marketability and non-controlling interests		
1% increase	$ (25,400)	$ (20,260)
1% decrease	$ 25,400	$ 20,260

The market approach involves comparing a target company with companies that have similar business models in the open market, similar selling prices of similar items, or similar past share prices to that of the target company. The significant unobservable inputs used are listed in the table below.

	December 31	
	2019	**2018**
Discount for lack of marketability	20%-30%	20%-30%

If the inputs to the valuation model were changed to reflect reasonably possible alternative assumptions while all the other variables were held constant, the fair value of the shares would increase (decrease) as follows:

	December 31	
	2019	**2018**
Discount for lack of marketability		
1% increase	$ (3,818)	$ (4,810)
1% decrease	$ 3,818	$ 4,810

The dividend discount model values a target company based on its stability of dividend payments in the past.

	December 31	
	2019	**2018**
Discount rate	6.9%	7.9%
Dividend growth rate	1.4%	1.7%
Discount for lack of marketability	10.0%	10.0%

If the inputs to the valuation model were changed to reflect reasonably possible alternative assumptions while all the other variables were held constant, the fair value of the shares would increase (decrease) as follows:

	December 31	
	2019	2018
Discount for lack of marketability		
1% increase	$ (48,487)	$ (39,745)
1% decrease	$ 48,487	$ 39,745

c. Categories of financial instruments

	December 31	
	2019	2018
Financial assets		
Financial assets at FVTPL		
Mandatorily classified financial assets at FVTPL	$ 502,005	$ 549,838
Financial assets measured at amortized cost (1)	130,255,654	121,810,291
Financial assets at FVTOCI		
Equity instrument investment	43,301,084	32,126,428
Financial liabilities		
Financial liabilities at FVTPL		
Held for trade	-	139,460
Financial liabilities measured at amortized cost (2)	134,650,780	124,930,847

1) The balances include loans and receivables measured at amortized cost, which comprise cash and cash equivalents, notes and accounts receivable, other receivables, other receivables-related parties (included in current assets), long-term finance lease receivables and finance lease receivables.

2) The balances include financial liabilities measured at amortized cost, which comprise short-term loans, short-term bills payables, notes and accounts payables, other payables (including related parties), bonds payable, long-term loans (including current portion), and long-term notes payable.

d. Financial risk management objectives and policies

The risk control and hedging strategy performed by the Group were affected by operation environments, and the Group adopted appropriate risk controls and hedging strategies according to its nature of business and risk diversification principles. These risks include market risk, credit risk and liquidity risk.

The Group sought to minimize the effects of these risks by using derivative financial instruments to hedge risk exposures. The Group did not enter into or trade financial instruments for speculation.

1) Market risk

The Group's financial instruments were mainly comprised of mutual funds and listed shares, and these investments were subject to fluctuations in market prices. The Group has periodically evaluated the investment's performance, and no significant market risk was anticipated.

The Group entered into foreign exchange forward contracts to manage exposure to exchange rate fluctuations, including foreign currency risks of foreign-currency assets and liabilities and price fluctuation risks of forecasted transactions. Since the gain or loss generated from exchange rate fluctuations was mostly offset by the gains or losses of hedged items, the market price risk is expected to be insignificant.

a) Foreign currency risk

The foreign financial assets and liabilities were exposed to risk of foreign currency fluctuations. To lower foreign currency risk, the Group has established control mechanisms to immediately monitor it foreign currency position and exchange rate fluctuations.

To maximize the hedging effectiveness, the Group matched up the conditions of derivative instruments with those in the contracts of hedged items.

The carrying amounts of the significant monetary assets and liabilities not denominated in functional currency (including those eliminated on consolidation) at the end of the reporting period are set out in Note 34.

The Group was mainly exposed to the USD.

The following table details the Group's sensitivity to a 1% increase and decrease in the functional currency against the relevant foreign currencies. The sensitivity analysis included only outstanding foreign currency denominated monetary items and adjusts their translation at the end of the reporting period for a 1% change in foreign currency rates. A positive number below indicates an increase in after-tax profit or equity associated with the NTD/RMB/HKD strengthening 1%against the relevant currency.

	USD Impact		HKD Impact	
	For the Year Ended December 31		For the Year Ended December 31	
	2019	2018	2019	2018
NTD	$ (10,034)	$ (22,798)	$ -	$ -
RMB	$ (9,835)	$ (4,403)	$ (433)	$ (3,857)
HKD	$ 41,219	$ 75,681	$ -	$ -

b) Interest rate risk

The carrying amount of the Group's financial assets and financial liabilities with exposure to interest rates at the end of the reporting period were as follows:

	December 31	
	2019	2018
Cash flow interest rate risk		
Financial assets	$ 25,276,394	$ 21,245,130
Financial liabilities	62,622,221	52,781,969

The interest risk was evaluated based on the position of financial assets and liabilities. The sensitivity analysis below was determined based on the Group's floating interest rate financial assets and liabilities at the end of the reporting period, and a 50 basis point increase or decrease was used, representing management's assessment of reasonably possible change in interest rates. The fair values of fixed interest rate financial assets and liabilities will change due to variances in market interest rates; the future cash flows of floating interest rate financial assets and financial liabilities will change due to variances in effective interest rates, which vary with market interest rates.

For the Group's position of floating interest rate financial assets, if interest rates had been 50 basis points higher/lower, the cash inflows from floating interest rate financial assets for the years ended December 31, 2019 and 2018 would increase/decrease by $101,106 thousand and $84,981 thousand, respectively.

For the Group's position of floating interest rate financial liabilities, if interest rates had been 50 basis points higher/lower, the cash outflows from floating interest rate financial liabilities for the years ended December 31, 2019 and 2018 would increase/decrease by $250,489 thousand and $211,128 thousand, respectively.

c) Other price risk

The Group was exposed to equity price risk through its investments in listed shares and emerging market shares. Equity investments are held for strategic rather than trading purposes. The Group does not actively trade these investments. Sensitivity analyses were used for evaluating the exposure to equity price risks.

The sensitively analyses were based on the exposure of equity price at the end of reporting period. If equity instruments/commodity prices of financial assets at FVTPL had been 5% higher/lower, profit or loss for the years ended December 31, 2019 and 2018 would increase/decrease by $25,039 thousand and $15,328 thousand, respectively. If equity instruments/commodity prices of financial assets at FVTOCI had been 5% higher/lower, other comprehensive income (loss) for the years ended December 31, 2019 and 2018 would increase/decrease by $2,165,054 thousand and $1,606,321 thousand, respectively.

2) Credit risk

Potential impacts on financial assets would occur if the Group's counterparties breach financial instrument contracts, including impacts to the concentration of credit risk, components contractual amounts and other receivables.

As at the end of the reporting period, the Group's maximum exposure to credit risk, which would cause a financial loss to the Group due to the failure of counterparties to discharge an obligation, could arise from the carrying amounts of the respective recognized financial assets as stated in the balance sheets.

The Group transacted with a large number of customers from various industries and geographical locations.

The Group continuously assesses the operations and financial positions of customers and monitors the collectability of accounts receivable. The Group also required credit enhancements by bank guarantees or collateral for certain customers or in certain geographical locations.

The credit risk on liquid funds and derivatives was limited because the counterparties are banks with high credit ratings which were assigned by international credit-rating agencies.

3) Liquidity risk

The Group manages liquidity risk by monitoring and maintaining a level of cash and cash equivalents deemed adequate to finance the Group's operations and mitigate the effects of fluctuations in cash flows. In addition, management monitors the utilization of bank facilities and ensures compliance with loan covenants. As of December 31, 2019 and 2018, the amount of unused financing facilities was $98,765,259 thousand and $86,267,583 thousand, respectively.

The following table details the Group's remaining contractual maturity for its non-derivative financial liabilities with agreed repayment periods. The table has been drawn up based on the undiscounted cash flows of financial liabilities from the earliest date on which the Group can be required to pay. The table included both interest and principal cash flows. Specifically, bank loans with a repayment on demand clause were included in the earliest time band regardless of the probability of the banks choosing to exercise their rights. The maturity dates for other non-derivative financial liabilities were based on the agreed upon repayment dates.

December 31, 2019

	On Demand or Less than 1 Month	1-3 Months	3 Months to 1 Year	1-5 Years	5+ Years
Non-derivative financial liabilities					
Non-interest bearing	$ 966,652	$ 15,118,369	$ 2,799,568	$ 109,817	$ 23,954
Lease liabilities	91,020	95,040	460,629	1,640,600	2,399,840
Variable interest rate liabilities	3,074,409	23,788,546	5,919,211	31,587,662	443
Fixed interest rate liabilities	-	5,880,000	311,100	38,335,877	13,836,000
	$ 4,132,081	$ 44,881,955	$ 9,490,508	$ 71,673,956	$ 16,260,237

Additional information about the maturity analysis for lease liabilities after eliminating transactions in the Group:

	Less than 1 Year	1-5 Years	5-10 Years	10-15 Years	15-20 Years	20+ Years
Lease liabilities	$ 646,689	$ 1,640,600	$ 2,399,840	$ -	$ -	$ -

December 31, 2018

	On Demand or Less than 1 Month	1-3 Months	3 Months to 1 Year	1-5 Years	5+ Years
Non-derivative financial liabilities					
Non-interest bearing	$ 1,766,327	$ 14,583,921	$ 1,925,461	$ 44,177	$ 21,504
Variable interest rate liabilities	13,576,888	11,553,847	3,755,077	25,393,791	724,696
Fixed interest rate liabilities	2,100,000	5,310,000	204,000	22,850,000	27,169,477
	$ 17,443,215	$ 31,447,768	$ 5,884,538	$ 48,287,968	$ 27,915,677

e. Transfers of financial assets

The Group transferred a portion of its banker's acceptance bills in mainland China to some of its suppliers in order to settle the trade payables to these suppliers. As the Group had transferred substantially all risks and rewards relating to these bills receivable, it derecognized the full carrying amount of the bills receivable and the associated trade payables. However, if the derecognized bills receivable are not paid at maturity, the suppliers have the right to request that the Group pays the unsettled balance; therefore, the Group still has continuing involvement in these bills receivable.

The maximum exposure to loss from the Group's continuing involvement in the derecognized bills receivable is equal to the face values of the transferred but unsettled bills receivable, and as of December 31, 2019 and December 31, 2018, the face values of these unsettled bills receivable were $1,916,934 thousand and, $2,906,763 thousand, respectively. The unsettled bills receivable will be due in 10 months and 9 months, after December 31, 2019 and December 31, 2018, respectively. Taking into consideration the credit risk of these derecognized bills receivable, the Group estimates that the fair values of its continuing involvement are not significant.

During 2019 and 2018, the Group did not recognized gains or losses upon the transfer of the banker's acceptance bills. No gains or losses were recognized from the continuing involvement, both during the period or cumulatively.

31. TRANSACTIONS WITH RELATED PARTIES

Balances and transactions between the Corporation and its subsidiaries, which are related parties of the Corporation, have been eliminated on consolidation and are not disclosed in this note. Details of transactions between the Group and other related parties are as follows:

a. Name of the related parties and relationship

Related Party	Relationship with the Group
Onyx Ta-Ho Waste Clearance Co., Ltd.	Subsidiary of associates
OYAK Cement Portugal S.A.	Subsidiary of associates
ONYX Ta-Ho Environmental Services Co., Ltd.	Associates
Shih Hsin Storage & Transportation Co., Ltd.	Associates
Quon Hing Concrete Co., Ltd. (Quon Hing Concrete)	Associates
Prosperity Conch Cement Company Limited	Associates
Yunnan Kungang & K. Wah Cement Construction Materials Co., Ltd.	Associates
Baoshan Kungang & K. Wah Cement Construction Marterials Co., Ltd.	Associates
Hong Kong Concrete Co., Ltd.	Associates
E-ONE Moli Energy Corporation	Associates
International CSRC Investment Holdings Co., Ltd.	Associates
TCC Recycle Energy Technology Company	Associates
Cimpor Global Holding B.V.(Former name: Dutch OYAK TCC Holding B.V.)	Associates
Chia Hsin R.M.C. Corp. (Chia Hsin R.M.C.)	Management personnel in substance
The Koo Foundation	Management personnel in substance
Chia Hsin Cement Corporation (Chia Hsin Cement)	Management personnel in substance
L'Hotel de Chine Corporation	Management personnel in substance
FDC International Hotels Corporation	Management personnel in substance
Chia Hsin Property Management and Development Corp.	Management personnel in substance
Goldsun Development & Construction Co., Ltd. (Glodsun Development & Construction)	Investors with significant influence over the Group
China Hi-Ment Corporation (China Hi-Ment)	The Group acts as key management personnel
Rong Gong Enterprise Co.	The Group acts as key management personnel
O-Bank Co., Ltd.	The Group acts as key management personnel
Pan Asia Corp.	The Group acts as key management personnel

(Continued)

Related Party	Relationship with the Group
Ta-Ho Taitung Environment Co., Ltd. (Ta-Ho Taitung Environment)	The Group acts as key management personnel
Chinatrust Investment Co., Ltd.	Same key management personnel
Consolidated Resource Company	Same key management personnel
CSRC China (Maanshan) Corporation	Same key management personnel
CSRC China (Anshan) Corporation	Same key management personnel
Chienten Temple	Same key management personnel
He Feng Investment Co., Ltd. (dissolved and closed in March 2019)	Same key management personnel
China (Chongqing) Corporation	Same key management personnel
Dr. Cecilla Koo Botanic Conservation and Environmental Protection Foundation	Same key management personnel
Continental Carbon India Ltd.	Same key management personnel
Linyuan Advanced Materials Technology Co., Ltd.	Same key management personnel
Fortune Quality investment Limited	Same key management personnel
Hualien County Ho-Ping Culture and Art Foundation	Same key management personnel
Sing Cheng Investment Co., Ltd.	Same key management personnel
Circular Commitment Company	Same key management personnel

(Concluded)

b. Operating transactions

	For the Year Ended December 31	
	2019	2018
Sales		
Management personnel in substance	$ 480,709	$ 516,859
Associates	469,015	437,139
The Group acts as key management personnel	212,002	197,581
Same key management personnel	165,703	51,032
Investors with significant influence over the Group	148,286	81,973
	$ 1,475,715	$ 1,284,584
Purchases of goods and operating expenses		
The Group acts as key management personnel	$ 649,038	$ 523,764
Same key management personnel	142,308	40,552
Associates	109,227	200,084
Others	69,641	87,265
	$ 970,214	$ 851,665

Notes receivable and accounts receivable from related parties as of December 31, 2019 and 2018 were as follows:

	December 31	
	2019	2018
Associates		
Quon Hing Concrete	$ 73,503	$ 34,651
Others	23,733	18,406
	97,236	53,057
Management personnel in substance		
Chia Hsin Cement	83,580	112,833
Others	2,361	8,577
	85,941	121,410
The Group acts as key management personnel		
China Hi-Ment	46,702	42,627
Others	22,407	515
	69,109	43,142
Investors with significant influence over the Group		
Goldsun Development & Construction	31,978	40,887
Same key management personnel	15,736	13,122
	$ 300,000	$ 271,618

Accounts payables from related parties (included in notes and accounts payable) as of December 31, 2019 and 2018 were as follows:

	December 31	
	2019	2018
The Group acts as key management personnel	$ 141,757	$ 164,614
Associates	11,536	10,720
Same key management personnel	7,056	13,949
Others	2,067	5,837
	$ 162,416	$ 195,120

The price and terms of the above transactions were similar to those for third parties. Rentals of lease contracts with related parties were based on market prices and the payment terms were determined at arm’s length.

c. Other receivables from related parties (included in other current assets)

	December 31	
	2019	2018
The Group acts as key management personnel		
Ta-Ho Taitung Environment	$ 341,280	$ -
Others	4	-
	341,284	-
Associates	46,205	20,633
Others	1,317	3,467
	$ 388,806	$ 24,100

Other receivables from related parties included dividend receivables and interest receivables.

d. Acquisitions of property, plant and equipment

	Purchase Price	
	For the Year Ended December 31	
	2019	2018
Management personnel in substance		
Chia Hsin R.M.C.	$ -	$ 25,000

e. Endorsements and guarantees

Endorsements and guarantees provided by the Group

	December 31	
	2019	2018
Subsidiary of associates - OYAK Cement Portugal S.A.		
Amount endorsed	$ 2,998,000	$ 3,071,500
Amount utilized	-	-
	$ 2,998,000	$ 3,071,500

f. Other payables to related parties (included in other payables)

	December 31	
	2019	2018
Associates	$ 231,765	$ 4,073
Management personnel in substance	3,028	2,819
	$ 234,793	$ 6,892

The interest expenses on the borrowings of loans from Cimpor Global Holdings B.V. were $22,754 thousand for the year ended December 31, 2019, and related expenses had been repaid by December 31, 2019.

g. Lease arrangements

	December 31	
Related Party Category	2019	2018
Acquisition of right-of-use assets		
Management personnel in substance	$ 51,767	$ -

		December 31	
Line Item	**Related Party Category**	2019	2018
Lease liabilities	Management personnel in substance	$ 39,177	$ -

Related Party Category	For the Year Ended December 31 2019	2018
Interest expense		
Management personnel in substance	$ 432	$ -

The rental prices for lease contracts between the Group and related parties were based on market prices and the terms of payment were based on general terms.

h. Compensation of key management personnel

The compensation of directors and other key management personnel for the years ended December 31, 2019 and 2018 were as follows:

	For the Year Ended December 31 2019	2018
Short-term employee benefits	$ 574,537	$ 398,430
Post-employment benefits	5,649	14,765
Share-based payment	826	-
	$ 581,012	$ 413,195

32. ASSETS PLEDGED AS COLLATERAL OR FOR SECURITY

The following assets were pledged or mortgaged as collateral for certain short-term loans, long-term loans, performance bonds and other credit accommodations:

	December 31 2019	2018
Financial assets at FVTOCI (including current and non-current portion)	$ 320,460	$ 251,090
Property, plant and equipment	3,684,804	4,146,933
Investment accounted for using the equity method	60,730	75,332
Investment properties	861,127	876,670
Finance lease receivables (included in current and non-current portion)	-	14,623,834
Pledged bank deposits (included in financial assets measured at amortized cost)		
Current	753,007	281,690
Non-current	984,716	470,199
	$ 6,664,844	$ 20,725,748

33. SIGNIFICANT CONTINGENT LIABILITIES AND UNRECOGNIZED COMMITMENTS

a. The balances of the letters of credit for purchase of raw material were as follows:

Name	December 31 2019	December 31 2018
The Corporation	$ 155,377	$ 388,405
Taiwan Prosperity Chemical Corporation	1,391,129	1,452,453
Ho-Ping Power Company	1,142,682	921,843

b. The amounts of letters of guarantee issued by the banks for the Group are as follows:

Name	December 31 2019	December 31 2018
The Corporation	$ 22,120	$ 22,120
Ho-Ping Power Company	1,148,000	1,148,000
Taiwan Prosperity Chemical Corporation	144,085	249,490
TCCI (Group)	1,175,222	248,924
Taiwan Transport & Storage Corporation	28,150	28,150

c. Ta-Ho RSEA Environment Co., Ltd.

Company Name	Ta-Ho RSEA Environment Co., Ltd.
Factual Background	In respect of the termination of the “Build-Own-Operate Agreement for Waste Incineration Plant” (the “BOO Agreement”) entered into by and between Ta-Ho RSEA Environment Co., Ltd. and the Yunlin County Government, the arbitration award decided that Yunlin County Government shall pay Ta-Ho RSEA Environment Co., Ltd. $1.5 billion before November 30, 2008 as a Phase I payment and the remainder as a Phase II payment in the aggregate amount of about $1.44 billion (including $1,387,000 thousand, US$1,706 thousand and JPY307 thousand) before June 30, 2009, and Ta-Ho RSEA Environment Co., Ltd. shall transfer the assets under the BOO Agreement to the Yunlin County Government at the same time.
Amount in Dispute (NT$)	About $2.94 billion
Commencement Date of Litigation	The arbitration award was rendered on October 1, 2008.
Parties	Ta-Ho RSEA Environment Co., Ltd. and the Yunlin County Government
Status	Ta-Ho RSEA Environment Co., Ltd. has applied for compulsory enforcement for the total payment awarded by the arbitration and, thus far, has received the principal together with the interest in the amount of about $3,540,000 thousand (tax included). As for the dispute over the interest of about $270,000 thousand between Ta-Ho RSEA Environment Co., Ltd and Yunlin County Government, the Supreme Court ruled to dismiss Ta-Ho RSEA Environment Co., Ltd.’s re-appeal on February 17, 2020, stating that the above interest in the dispute shall not be included in the distribution of compensation, which concluded the compulsory enforcement proceedings. Ta-Ho RSEA Environment Co., Ltd. will discuss with the lawyers the advantages for further actions.

Company Name	Ta-Ho RSEA Environment Co., Ltd.
Factual background	According to Article 10.5 of the “Build-Own-Operate Agreement for Waste Incineration Plant” (the “BOO Agreement”) entered into between Ta-Ho RSEA Environment Co., Ltd. and the Yunlin County Government, in the event that the BOO Agreement is terminated due to an event attributable to the Yunlin County Government, the assets of the Linnei Factory shall be transferred to the Yunlin County Government. However, the Yunlin County Government has consistently refused to receive the assets of the Linnei Factory. Ta-Ho RSEA Environment Co., Ltd. has therefore managed Linnei Incinerator for and on behalf of the Yunlin County Government since the termination of the BOO Agreement on October 31, 2006. The management expenses amounted to $137,524 thousand as of December 31, 2017, and amounted to $23,703 thousand from January 1, 2018 to December 31, 2019. The total amount is $161,227 thousand. The payment award rendered under the arbitration between Ta-Ho RSEA Environment Co., Ltd. and the Yunlin County Government is around $2.9 billion excluding business tax. After the arbitration award, the Revenue Service Bureau of the Yunlin County advised that the income derived from the award was subject to business tax, which amounted to $165,591 thousand.
Amount in dispute (NT$)	About $326 million.
Commencement date of litigation	Arbitration request has been applied on February 15, 2019.
Parties	Ta-Ho RSEA Environment Co., Ltd. and the Yunlin County Government
Status	Arbitral Tribunal had been established on May 22, 2019. On November 12, 2019, the third hearing was held and the case is now under review.

d. Ho-Ping Power Company

Company Name	Ho-Ping Power Company
Factual Background	The Fair Trade Commission fined Ho-Ping Power Company $1.35 billion for an alleged violation of Article 14 of the Fair Trade Act.
Amount in Dispute (NT$)	$1.35 billion
Commencement Date of Litigation	March 2013
Parties	Ho-Ping Power Company and the Fair Trade Commission
Status	The Fair Trade Commission made a second administrative disposition in November 2013, which reduced the amount of the fine imposed on Ho-Ping Power Company to $1,320,000 thousand. On June 30, 2015, the Supreme Administrative Court overruled the original judgment in favor of Ho-Ping Power Company and remanded the case for retrial to the Taipei High Administrative Court. On May 25, 2017, the Taipei High Administrative Court ruled in favor of Ho-Ping Power Company by holding that "the original disposition and decision of administrative appeal, which determined that Ho-Ping Power Company committed concerted action, shall be dismissed." On the appeal part of the participant Taiwan Power Company, the Supreme Administrative Court made the ruling of "Appeal Rejection" on September 6, 2018 (Ref. No. 107 Nian-Du-Cai-Zi-Di 1380). In the case of another appellant (the Fair Trade Commission), the Supreme Administrative Court overruled the original judgment by rendering the judgment (Ref. No. 107 Nian-Du-Pan-Zi 550) on the same day, and remanded the case to the Taipei High Administrative Court for retrial. The case is currently under review by the Taipei High Administrative Court (Ref. No. 107 Nian-Du-Su-Geng-Er-Zi 116). In accordance with the accounting conservatism principle, Ho-Ping Power Company recognized relevant losses in 2012 and paid the total fine as of December 31, 2019. The outstanding fine was recognized by Ho-Ping Power Company under other payables of $132,000 thousand as of December 31, 2018.

Company Name	Ho-Ping Power Company
Factual Background	Taiwan Power Company filed a lawsuit against Ho-Ping Power Company at the Taipei High Administrative Court claiming for its losses of at least $5.2 billion plus interest, which was then expanded to $10.76 billion, and filed another civil litigation at the Taipei District Court claiming for $5.5 billion.
Amount in Dispute (NT$)	About $16 billion in total
Commencement Date of Litigation	September 2015
Parties	Ho-Ping Power Company and Taiwan Power Company
Status	1) There are 2 outstanding litigations against Taiwan Power Company: a) In September 2015, Ho-Ping Power Company received an administrative pleading submitted by Taiwan Power Company to the Taipei High Administrative Court, which was transferred to the Taiwan Taipei District Court in February 2017, and Taiwan Power Company expanded the claim amount to $10.76 billion. The Taiwan Taipei District Court has dismissed the plaintiff's (Taiwan Power Company) complaint on October 30, 2019 and Taiwan Power Company has filed an appeal subsequently which was accepted by the Taiwan High Court. This dispute is under review by the Taiwan High Court b) In November 2015, Ho-Ping Power Company received a complaint of civil litigation brought by Taiwan Power Company at the Taiwan Taipei District Court based on the same ground of the aforementioned administrative litigation. The case is currently under review by the Taipei District Court. The result of the judgment mentioned in the preceding paragraph has been reported to the court for considerations. 2) Given such situations, Ho-Ping Power Company considered the chance of losing the litigations is remote and, therefore, it did not recognize relevant losses.

e. The board of directors of Ta-Ho Maritime Corporation has resolved to purchase three bulk carriers from Sumitomo Corporation on September 11, 2019, the aggregate purchase amount is US$100,200 thousand, among which US$10,020 thousand was paid as of the issuance date of this report.

f. The board of directors of TCC (Hangzhou) Environment Co., Ltd. has resolved to outsource the construction of RMB128,000 on November 12, 2019, and signed the contract on November 22, 2019. As of December 31, 2019, it has not been executed.

34. SIGNIFICANT ASSETS AND LIABILITIES DENOMINATED IN FOREIGN CURRENCIES

The following information was aggregated by the foreign currencies other than functional currencies of the group entities and the exchange rates between foreign currencies and respective functional currencies were disclosed. The significant assets and liabilities denominated in foreign currencies were as follows:

December 31, 2019

	Foreign Currencies (In Thousands)	Exchange Rate	Carrying Amount (In Thousands)
Financial assets			
Monetary items			
USD	$ 72,698	29.980 (USD:NTD)	$ 2,179,486
USD	41,001	6.955 (USD:RMB)	1,229,349
USD	28,284	7.790 (USD:HKD)	848,072
HKD	206,605	0.893 (HKD:RMB)	749,930
			$ 5,006,837
Non-monetary items			
USD	81,522	6.955 (USD:RMB)	$ 2,444,028
EUR	828,607	33.590 (EUR:NTD)	27,832,897
			$ 30,276,925
Financial liabilities			
Monetary items			
USD	30,862	29.980 (USD:NTD)	$ 925,251
USD	200,122	7.790 (USD:HKD)	6,000,400
HKD	180,770	0.893 (HKD:RMB)	695,784
			$ 7,621,435

December 31, 2018

	Foreign Currencies (In Thousands)	Exchange Rate	Carrying Amount (In Thousands)
Financial assets			
Monetary items			
USD	$ 124,083	30.715 (USD:NTD)	$ 3,811,209
USD	17,928	6.868 (USD:RMB)	550,421
USD	20,572	7.830 (USD:HKD)	631,584
HKD	254,650	0.877 (HKD:RMB)	998,483
			$ 5,991,697
Non-monetary items			
EUR	825,888	35.200 (EUR:NTD)	$ 29,071,244

(Continued)

	Foreign Currencies (In Thousands)	Exchange Rate	Carrying Amount (In Thousands)
Financial liabilities			
Monetary items			
USD	31,302	30.715 (USD:NTD)	$ 961,432
USD	328,705	7.830 (USD:HKD)	10,091,720
HKD	131,678	0.877 (HKD:RMB)	516,308
			$ 11,569,460

(Concluded)

The realized and unrealized foreign exchange gains and losses were net losses of $(15,399) thousand and net gains of $48,764 thousand for the years ended December 31, 2019 and 2018, respectively. It is impractical to disclose net foreign exchange gains (losses) by each significant foreign currency due to the variety of foreign currency transactions and functional currencies of the group entities.

35. SEPARATELY DISCLOSED ITEMS

a. Information about significant transactions and investees

1) Financing provided to others (Table 1)

2) Endorsements/guarantees provided (Table 2)

3) Marketable securities held (excluding investment in subsidiaries, associates and joint ventures) (Table 3)

4) Marketable securities acquired or disposed of at costs or prices of at least NT$300 million or 20% of the share capital (Table 4)

5) Acquisitions of individual real estate at costs of at least NT$300 million or 20% of the share capital (Table 5)

6) Disposals of individual real estate at prices of at least NT$300 million or 20% of the share capital (None)

7) Total purchases from or sales to related parties amounting to at least NT$100 million or 20% of the share capital (Table 6)

8) Receivables from related parties amounting to at least NT$100 million or 20% of the share capital (Table 7)

9) Trading in derivative instruments (Notes 7, 20 and 30)

10) Intercompany relationships and significant intercompany transactions (Table 10)

11) Information on investees (Table 8)

b. Information on investments in mainland China (Table 9)

1) Information on any investee company in mainland China, showing the name, principal business activities, paid-in capital, method of investment, inward and outward remittance of funds, ownership percentage, net income of investees, investment income or loss, carrying amount of the investment at the end of the year, repatriations of investment income, and limit on the amount of investment in the mainland China area.

2) Any of the following significant transactions with investee companies in mainland China, either directly or indirectly through a third party, and their prices, payment terms, and unrealized gains or losses:

a) The amount and percentage of purchases and the balance and percentage of the related payables at the end of the year.

b) The amount and percentage of sales and the balance and percentage of the related receivables at the end of the year.

c) The amount of property transactions and the amount of the resultant gains or losses.

d) The balance of negotiable instrument endorsements or guarantees or pledges of collateral at the end of the year and the purposes.

e) The highest balance during the year, the end of year balance, the interest rate range, and total current year interest with respect to financing of funds.

f) Other transactions that have a material effect on the profit or loss for the year or on the financial position, such as the rendering or receipt of services.

36. SEGMENT INFORMATION

Information reported to the chief operating decision maker for the purpose of resource allocation and assessment of segment performance focuses on the types of segment. Specifically, the Group's reportable segments under IFRS 8 "Operating Segments" were as follows:

a. Cement segment - production, processing and sale of cement goods

b. Chemical engineering segment - production, processing and sale of chemical raw materials

c. Electricity segment - thermal power generation

d. Other segments - land and marine transportation
- production and sale of refractory materials
- others

The Group uses the profit from operations as the measure for segment income and the basis of performance assessment. There was no material difference between the accounting policies of the operating segments and the accounting policies described in Note 4.

a. Segments revenue and results

	Segment Revenue		Segment Income	
	For the Year Ended December 31		For the Year Ended December 31	
	2019	2018	2019	2018
Cement segment	$ 94,034,107	$ 92,541,640	$ 23,187,626	$ 23,061,797
Chemical engineering segment	10,370,301	15,280,144	(1,190,414)	471,534
Electricity segment	14,462,245	12,784,465	7,963,687	4,420,459
Other segments	3,916,361	3,988,353	441,254	442,199
	$ 122,783,014	$ 124,594,602	30,402,153	28,395,989
Share of profits of associates and joint ventures			2,509,388	2,263,413
Dividend income			1,448,451	1,326,142
Interest income			815,805	584,482
Loss on disposal of property			(162,793)	(78,190)
Impairment loss recognized on non-financial assets			(774,784)	(31,032)
Administrative costs and director's remuneration			(245,432)	(215,088)
Finance costs			(2,199,118)	(2,460,302)
Foreign exchange losses, net			(15,399)	48,764
Net gain on financial assets and liabilities at fair value through profit and loss			179,256	19,306
Other income and expenses, net			675,892	690,937
Income before income tax			$ 32,633,419	$ 30,544,421

Segment income represented profit before tax earned by each segment without allocation of central administration costs, director's remuneration, share of profits of associates and joint ventures, dividend income, interest income, loss on disposal of property, impairment loss recognized on non-financial assets, finance costs, foreign exchange gains and losses, net gain on financial assets and liabilities at fair value through profit and loss and income tax expense.

b. Geographical information

The Group's revenue from external customers by location of operations and information about its non-current assets by location of assets are detailed below.

	Revenue from External Customers		Non-current Assets	
	For the Year Ended December 31		December 31	
	2019	2018	2019	2018
Taiwan	$ 49,351,277	$ 49,982,370	$ 61,987,820	$ 56,929,127
Asia	73,431,737	74,612,232	72,338,311	71,818,823
	$ 122,783,014	$ 124,594,602	$ 134,326,131	$ 128,747,950

Non-current assets exclude financial instruments, deferred income tax assets, and net defined benefit asset.

c. Information about major customers

The only single customer who contributed 10% or more to the Group's revenue was as follows:

	For the Year Ended December 31	
	2019	**2018**
Taiwan Power Company	$ 14,402,352	$ 12,777,360

37. SIGNIFICANT EVENTS AFTER THE REPORTING PERIOD

a. The Corporation passed the resolution to issue unsecured bonds in the board of directors' meeting in February 2020, and the total issuance amount will not exceed $30 billion. The unsecured bonds will be issued in one or several installments subject to the market conditions.

b. On March 20, 2020, the Corporation has resolved to purchase its ordinary shares at a price between NT$25.90 and NT$61.95 per share and with $495,600 thousand as the upper limit of the total amount of shares to be repurchased from the centralized securities trading market. The Corporation expects to repurchase 8,000 thousand shares.

c. For the purpose of improving the PH air quality and reducing air pollution, the board of directors of the Group's subsidiary Ho-Ping Power Company, has resolved to contract out the air pollution improvement equipment project for Unit 2 with a total investment amount of approximately $1.858 billion on January 21, 2020.

d. On March 20, 2020, the boards of directors of the Corporation and the subsidiary, TCC (Guigang) Cement Limited have resolved that TCC (Guigang) Cement Limited will invest to set up a new Mainland China subsidiary in Hangzhou Jiande for overseas investment in order to cooperate with the group's global layout plan. The total investment is expected to be RMB1.75 billion.

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

FINANCINGS PROVIDED TO OTHERS
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

No.	Lender	Borrower	Financial Statement Account	Related Parties	Highest Balance for the Period	Ending Balance	Actual Borrowing Amount	Interest Rate (%)	Nature of Financing	Business Transaction Amount	Reason for Short-term Financing	Allowance for Impairment Loss	Collateral		Financing Limit for Each Borrower (Note 1)	Aggregate Financing Limit (Note 1)	Note
													Item	Value			
1	Taiwan Transport & Storage Corporation	Tai-Jie Transport & Storage Corporation	Other receivables - related parties	Yes	$ 100,000	$ 100,000	$ 91,000	1.51	The need for short-term financing	$ -	Operating capital	$ -		$ -	$ 937,844	$ 937,844	
		TCC Chemical Corporation	Other receivables - related parties	Yes	300,000	300,000	300,000	1.51	The need for short-term financing	-	Operating capital	-		-	937,844	937,844	
2	TCC Investment Corporation	Jin Chang Minerals Corporation	Other receivables - related parties	Yes	330,000	330,000	330,000	1.58	The need for short-term financing	-	Operating capital	-		-	1,780,671	1,780,671	
3	Taiwan Cement Engineering Corporation	TCC Chemical Corporation	Other receivables - related parties	Yes	200,000	200,000	200,000	1.54	The need for short-term financing	-	Operating capital	-		-	300,323	300,323	
4	TCC Green Energy Corporation	TCC Kao-Cheng Green Energy Corporation	Other receivables - related parties	Yes	5,000	-	-	-	The need for short-term financing	-	Operating capital	-		-	1,245,151	1,245,151	
		TCC LIEN-HSIN Green Energy Corporation	Other receivables - related parties	Yes	5,000	-	-	-	The need for short-term financing	-	Operating capital	-		-	1,245,151	1,245,151	
5	TCCI	TCCIH	Other receivables - related parties	Yes	3,792,000	3,597,600	1,648,900	3.09	The need for short-term financing	-	Operating capital	-		-	103,716,200	207,432,400	
6	Yingde Dragon Mountain Cement Co., Ltd.	TCC Yingde Cement Co., Ltd.	Other receivables - related parties	Yes	945,552	862,176	-	-	The need for short-term financing	-	Operating capital	-		-	15,187,762	30,375,524	
		TCC Liaoning Cement Company Limited	Other receivables - related parties	Yes	1,074,509	982,881	982,881	3.05	The need for short-term financing	-	Operating capital	-		-	15,187,762	30,375,524	
7	TCC (Guigang) Cement Ltd.	TCC Huaying Cement Company Limited	Other receivables - related parties	Yes	1,357,275	1,241,533	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		Scitus Luzhou Concrete Co., Ltd.	Other receivables - related parties	Yes	94,255	86,218	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		Guizhou Kong On Cement Company Limited	Other receivables - related parties	Yes	306,329	280,207	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		TCC Anshun Cement Company Limited	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		TCC Yingde Cement Co., Ltd.	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		Scitus Naxi Cement Co., Ltd.	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		TCC Huaihua Cement Company Limited	Other receivables - related parties	Yes	942,552	862,176	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		Scitus Luzhou Cement Co., Ltd.	Other receivables - related parties	Yes	1,319,573	1,207,046	-	-	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
		TCC Jingzhou Cement Company Limited	Other receivables - related parties	Yes	706,914	646,632	387,979	3.48	The need for short-term financing	-	Operating capital	-		-	25,421,520	50,843,040	
8	TCC Yingde Cement Co., Ltd.	TCC (Hangzhou) Environmental Protection Technology Co., Ltd.	Other receivables - related parties	Yes	1,295,364	1,224,290	1,224,290	3.48	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		TCC Jingzhou Cement Company Limited	Other receivables - related parties	Yes	235,638	215,544	-	-	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		Scitus Naxi Cement Co., Ltd.	Other receivables - related parties	Yes	235,638	215,544	-	-	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		TCC (Dong Guan) Cement Company Limited	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		TCC Chongqing Cement Company Limited.	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		Guizhou Kaili Rui An Jian Cai Co., Ltd.	Other receivables - related parties	Yes	706,914	646,632	-	-	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		Scitus Luzhou Cement Co., Ltd.	Other receivables - related parties	Yes	848,297	775,958	-	-	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	

(Continued)

No.	Lender	Borrower	Financial Statement Account	Related Parties	Highest Balance for the Period	Ending Balance	Actual Borrowing Amount	Interest Rate (%)	Nature of Financing	Business Transaction Amount	Reason for Short-term Financing	Allowance for Impairment Loss	Collateral Item	Collateral Value	Financing Limit for Each Borrower (Note 1)	Aggregate Financing Limit (Note 1)	Note
		TCC Anshun Cement Company Limited	Other receivables - related parties	Yes	$ 942,552	$ 862,176	$ -	-	The need for short-term financing	$ -	Operating capital	$ -		$ -	$ 25,127,335	$ 50,254,670	
		TCC Guangan Cement Company Limited	Other receivables - related parties	Yes	942,552	862,176	-	-	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		TCC Huaihua Cement Company Limited	Other receivables - related parties	Yes	942,552	862,176	43,109	3.48	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		Guizhou Kong On Cement Company Limited	Other receivables - related parties	Yes	471,276	431,088	133,637	3.48	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		TCC Liaoning Cement Company Limited.	Other receivables - related parties	Yes	235,638	215,544	172,435	3.48	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
		TCC Shaoguan Cement Co., Ltd.	Other receivables - related parties	Yes	349,170	319,395	319,395	3.48	The need for short-term financing	-	Operating capital	-		-	25,127,335	50,254,670	
9	TCC Fuzhou Cement Co., Ltd.	Guizhou Kaili Rui An Jian Cai Co., Ltd.	Other receivables - related parties	Yes	235,638	215,544	-	-	The need for short-term financing	-	Operating capital	-		-	943,877	2,831,631	
		TCC New (Hangzhou) Management Company Limited.	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	943,877	2,831,631	
		TCC Liaoning Cement Company Limited.	Other receivables - related parties	Yes	329,893	301,762	129,326	3.48	The need for short-term financing	-	Operating capital	-		-	943,877	2,831,631	
10	TCCIH	TCC Yingde Cement Co., Ltd.	Other receivables - related parties	Yes	251,205	237,067	237,067	-	The need for short-term financing	-	Operating capital	-		-	128,873,427	257,746,854	
11	Prime York Ltd.	Upper Value Investment Limited	Other receivables - related parties	Yes	205,428	196,299	196,299	-	The need for short-term financing	-	Operating capital	-		-	3,016,104	6,032,208	
12	Jurong TCC Cement Co., Ltd.	TCC Yingde Cement Co., Ltd.	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		TCC Guangan Cemen Company Limited	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		Scitus Luzhou Cement Co., Ltd.	Other receivables - related parties	Yes	706,914	646,632	-	-	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		TCC Anshun Cement Company Limited	Other receivables - related parties	Yes	942,552	862,176	-	-	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		TCC Chongqing Cement Company Limited	Other receivables - related parties	Yes	942,552	862,176	-	-	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		TCC Huaihua Concrete Company Limited	Other receivables - related parties	Yes	141,383	129,326	34,487	3.48	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		Guizhou Kong On Cement Company Limited	Other receivables - related parties	Yes	329,893	301,762	94,839	3.48	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		TCC Liaoning Cement Company Limited	Other receivables - related parties	Yes	329,893	301,762	280,207	3.48	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
		TCC Huaihua Cement Company Limited	Other receivables - related parties	Yes	1,413,828	1,293,264	1,228,601	3.48	The need for short-term financing	-	Operating capital	-		-	14,285,599	28,571,198	
13	TCC Anshun Cement Company Limited.	Anshun Xin Tai Construction Materials Company Limited	Other receivables - related parties	Yes	94,255	86,218	-	-	The need for short-term financing	-	Operating capital	-		-	7,442,985	14,885,970	
		Guizhou Kaili Rui An Jian Cai Co., Ltd.	Other receivables - related parties	Yes	141,383	129,326	-	-	The need for short-term financing	-	Operating capital	-		-	7,442,985	14,885,970	
		Scitus Luzhou Cement Co., Ltd.	Other receivables - related parties	Yes	141,383	129,326	-	-	The need for short-term financing	-	Operating capital	-		-	7,442,985	14,885,970	
		Scitus Luzhou Concrete Co., Ltd.	Other receivables - related parties	Yes	141,383	129,326	-	-	The need for short-term financing	-	Operating capital	-		-	7,442,985	14,885,970	
		TCC Chongqing Cement Company Limited	Other receivables - related parties	Yes	942,552	862,176	-	-	The need for short-term financing	-	Operating capital	-		-	7,442,985	14,885,970	
		Guizhou Kong On Cement Company Limited	Other receivables - related parties	Yes	282,766	258,653	237,098	3.48	The need for short-term financing	-	Operating capital	-		-	7,442,985	14,885,970	
		TCC Huaihua Cement Company Limited	Other receivables - related parties	Yes	706,914	646,632	646,632	3.48	The need for short-term financing	-	Operating capital	-		-	7,442,985	14,885,970	
14	TCC Guangan Cement Co., Ltd.	Guizhou Kaili Rui An Jian Cai Co., Ltd.	Other receivables - related parties	Yes	94,255	86,218	-	-	The need for short-term financing	-	Operating capital	-		-	4,742,171	9,484,342	
		TCC Huaying Cement Company Limited	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	4,742,171	9,484,342	
		Scitus Luzhou Cement Co., Ltd.	Other receivables - related parties	Yes	141,383	129,326	86,218	3.48	The need for short-term financing	-	Operating capital	-		-	4,742,171	9,484,342	

(Continued)

No.	Lender	Borrower	Financial Statement Account	Related Parties	Highest Balance for the Period	Ending Balance	Actual Borrowing Amount	Interest Rate (%)	Nature of Financing	Business Transaction Amount	Reason for Short-term Financing	Allowance for Impairment Loss	Collateral		Financing Limit for Each Borrower (Note 1)	Aggregate Financing Limit (Note 1)	Note
													Item	Value			
15	TCCI Development Ltd	TCCIH	Other receivables - related parties	Yes	$ 292,073	$ 280,977	$ 280,977	2.23	The need for short-term financing	$ -	Operating capital	$ -		$ -	$ 644,250	$ 644,250	
16	Wayly Holdings Ltd.	Guizhou Kaili Rui An Jian Cai Co., Ltd.	Other receivables - related parties	Yes	63,167	60,360	60,360	-	The need for short-term financing	-	Operating capital	-		-	3,771,331	7,542,662	
17	TCC Chongqing Cement Company Limited.	TCC Jingzhou Cement Company Limited	Other receivables - related parties	Yes	94,255	86,218	-	-	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
		TCC Huaying Cement Company Limited	Other receivables - related parties	Yes	117,819	107,772	-	-	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
		Guizhou Kong On Cement Company Limited	Other receivables - related parties	Yes	141,383	129,326	-	-	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
		Guizhou Kaili Rui An Jian Cai Co., Ltd.	Other receivables - related parties	Yes	235,638	215,544	-	-	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
		Scitus Luzhou Cement Co., Ltd.	Other receivables - related parties	Yes	235,638	215,544	-	-	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
		TCC Guangan Cement Company Limited	Other receivables - related parties	Yes	471,276	431,088	-	-	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
		Scitus Naxi Cement Co., Ltd.	Other receivables - related parties	Yes	141,383	129,326	43,109	3.48	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
		TCC Huaihua Cement Company Limited	Other receivables - related parties	Yes	706,914	646,632	529,807	3.48	The need for short-term financing	-	Operating capital	-		-	8,158,740	16,317,480	
18	TCC New (Hangzhou) Management Company Limited.	Scitus Luzhou Concrete Co., Ltd.	Other receivables - related parties	Yes	37,702	34,487	-	-	The need for short-term financing	-	Operating capital	-		-	519,600	1,039,200	
		Scitus Luzhou Cement Co., Ltd.	Other receivables - related parties	Yes	292,191	267,275	181,057	3.48	The need for short-term financing	-	Operating capital	-		-	519,600	1,039,200	
		Scitus Naxi Cement Co., Ltd.	Other receivables - related parties	Yes	259,202	237,098	189,679	3.48	The need for short-term financing	-	Operating capital	-		-	519,600	1,039,200	
19	Prosperity Minerals (China) Limited	TCC New (Hangzhou) Management Company Limited.	Other receivables - related parties	Yes	375,827	343,779	343,779	-	The need for short-term financing	-	Operating capital	-		-	934,136	1,868,272	
20	Da Tong (Guigang) International Logistics Co., Ltd.	Guigang Da-Ho Shipping Co., Ltd.	Other receivables - related parties	Yes	141,383	129,326	-	-	The need for short-term financing	-	Operating capital	-		-	621,455	1,242,911	
21	Ta-Ho Taitung Environment Co., Ltd.	Onyx Ta-Ho Energy Recovery Co., Ltd	Other receivables - related parties	Yes	118,800	-	-	-	The need for short-term financing	-	Operating capital	-		-	136,512	136,512	
22	Hong Kong Cement Co. Ltd	TCCIH	Other receivables - related parties	Yes	514,209	496,649	496,649	2.16	The need for short-term financing	-	Operating capital	-		-	876,765	1,753,530	
23	Guizhou Kaili Rui An Jian Cai Co., Ltd.	Kaili TCC Environment Technology Co., Ltd.	Other receivables - related parties	Yes	172,435	172,435	-	-	The need for short-term financing	-	Operating capital	-		-	3,722,084	7,444,168	
		Scitus Naxi Cement Co., Ltd.	Other receivables - related parties	Yes	141,383	129,326	86,218	3.48	The need for short-term financing	-	Operating capital	-		-	3,722,084	7,444,168	
24	TCC Huaihua Cement Company Limited	TCC Jingzhou Cement Company Limited	Other receivables - related parties	Yes	94,255	86,218	-	-	The need for short-term financing	-	Operating capital	-		-	2,879,697	5,759,394	
25	Scitus Luzhou Cement Co., Ltd.	Guizhou Kaili Rui An Jian Cai Co., Ltd.	Other receivables - related parties	Yes	94,255	86,218	-	-	The need for short-term financing	-	Operating capital	-		-	2,874,737	5,749,474	

Note 1: "Financing Limits for Each Borrower" and "Aggregate Financing Limits":

a. For Taiwan Cement Corporation, financing limits are as follows:

1) Where a business relationship exists, the individual financing limits were the total transaction amounts with the borrower and 20% of Taiwan Cement Corporation's net equity in the recent year.
2) Where there is a need for a short-term financing facility, the individual financing limits were 20% of Taiwan Cement Corporation's net equity as stated in its latest financial statements.
3) For the above items a and b, the aggregate financing limits were 40% of Taiwan Cement Corporation's net equity as stated in its latest financial statements.

b. The restrictions above in paragraph A, subparagraphs b and c shall not apply to inter-company loans of funds between foreign companies of which Taiwan Cement Corporation holds, directly or indirectly, 100% of the voting shares. The aggregate and individual financing limits for the companies were 200% and 100%, respectively, of the net equity of each company as stated in their respective latest financial statements. In addition, the aggregate and individual financing limits for TCC International Ltd. were 200% and 100%, respectively, of its net equity as stated in its latest financial statements. The aggregate and individual financing limits for TCC Fuzhou Cement Co., Ltd. were 300% and 100%, respectively, of its net equity as stated in its latest financial statements. The aggregate and individual financing limits for TCC New (Hangzhou) Management Co., Ltd. were 600% and 300%, respectively, of its net equity as stated in its latest financial statements. The aggregate and individual financing limits for Prosperity Minerals (China) Ltd. were 400% and 200%, respectively, of its net equity as stated in its latest financial statements.

Note 2: All intercompany transactions have been eliminated upon consolidation.

(Concluded)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

ENDORSEMENTS/GUARANTEES PROVIDED
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

No.	Endorser/Guarantor	Endorsee/Guarantee		Limits on Endorsement/ Guarantee Given on Behalf of Each Party (Note 1)	Maximum Amount Endorsed/ Guaranteed During the Period	Outstanding Endorsement/ Guarantee at the End of the Period	Actual Borrowing Amount	Amount Endorsed/ Guaranteed by Collaterals	Ratio of Accumulated Endorsement/ Guarantee to Net Equity in Latest Financial Statements (%)	Aggregate Endorsement/ Guarantee Limit (Note 2)	Endorsement/ Guarantee Given by Parent on Behalf of Subsidiaries	Endorsement/ Guarantee Given by Subsidiaries on Behalf of Parent	Endorsement/ Guarantee Given on Behalf of Companies in Mainland China	Note
		Name	Relationship (Note 3)											
0	Taiwan Cement Corporation	Jin Chang Minerals Corporation	b	$ 96,842,034	$ 68,848	$ 68,848	$ 39,814	$ 39,814	0.04	$ 193,684,068	Y	N	N	
		Ho Sheng Mining Co., Ltd.	b	96,842,034	99,884	99,884	99,884	99,884	0.05	193,684,068	Y	N	N	
		Union Cement Traders Inc.	b	96,842,034	1,420,000	1,420,000	900,000	-	0.73	193,684,068	Y	N	N	
		TCC Chemical Corporation	b	96,842,034	1,499,117	1,499,117	499,117	-	0.77	193,684,068	Y	N	N	
		TCC Investment Corporation	b	96,842,034	2,570,000	2,570,000	1,840,000	-	1.33	193,684,068	Y	N	N	
		TCCI	b	96,842,034	29,735,600	28,211,180	2,038,640	-	14.57	193,684,068	Y	N	N	
		OYAK CEMENT PORTUGAL S.A.	f	96,842,034	3,160,000	2,998,000	-	-	1.55	193,684,068	N	N	N	
1	Ho Sheng Mining Co., Ltd.	Taiwan Cement Corporation	c	711,398	137,462	137,462	137,462	-	57.97	711,398	N	Y	N	
2	TCC Green Energy Corporation	TCC Chemical Corporation	a	3,112,879	6,117	6,117	6,117	-	0.20	3,112,879	N	N	N	
3	TCCIH	Scitus Luzhou Cement Co., Ltd.	b	64,436,714	948,000	-	-	-	-	128,873,427	Y	N	Y	
		TCC Fuzhou Cement Co., Ltd.	b	64,436,714	1,245,803	1,149,240	-	-	0.89	128,873,427	Y	N	Y	
		TCC Anshun Cement Company Limited	b	64,436,714	706,914	646,632	-	-	0.50	128,873,427	Y	N	Y	
		TCC Liaoning Cement Company Limited	b	64,436,714	943,914	871,482	-	-	0.68	128,873,427	Y	N	Y	
		Guizhou Kong On Cement Company Limited	b	64,436,714	319,160	302,798	-	-	0.23	128,873,427	Y	N	Y	
		TCC Guangan Cement Company Ltd.	b	64,436,714	12,109,041	8,187,912	2,028,891	-	6.35	128,873,427	Y	N	Y	
		TCC Chongqing Cement Company Limited	b	64,436,714	1,913,571	1,779,408	-	-	1.38	128,873,427	Y	N	Y	
		Guizhou Kaili Rui An Jian Cai Co., Ltd.	b	64,436,714	632,000	599,600	-	-	0.47	128,873,427	Y	N	Y	
		Jurong TCC Cement Co., Ltd.	b	64,436,714	3,436,309	2,790,730	-	-	2.17	128,873,427	Y	N	Y	
		TCC Yingde Cement Co., Ltd.	b	64,436,714	2,774,372	2,257,332	-	-	1.75	128,873,427	Y	N	Y	

Note 1: Limits on endorsement/guarantee given on behalf of each party were as follows:

a. 1) For endorsements/guarantees given by Taiwan Cement Corporation due to business transactions, the amount of endorsement/guarantee should not exceed 50% of the business transaction amounts in the previous year.
2). Except for i, the aggregate endorsements/guarantees given by Taiwan Cement Corporation should not exceed the net equity in its latest financial statements; for individual companies, it should not exceed 50% of the net equity in its latest financial statements.

b. Ho Sheng Mining Co., Ltd. is guaranteed by land use lease agreements.

c. Jin Chang Minerals Corporation is guaranteed by deposit contracts.

Note 2: Aggregate endorsement/guarantee limit was 300% of its net equity in its latest financial statements for Ho Sheng Mining Co., Ltd., and the limit for other the endorsers/guarantors was the net equity in their respective latest financial statements.

(Continued)

Note 3: Relationship between the endorser/guarantor and the endorsee/guarantee is classified as follows:

a. Having a business relationship.
b. The endorser/guarantor directly or indirectly owns more than 50% of the ordinary shares of the endorsee/guarantee.
c. The endorsee/guarantee directly or indirectly owns more than 50% of the ordinary shares of the endorser/guarantor.
d. Company in which the public company directly or indirectly holds 90% or more of the voting shares may make endorsements/guarantees for each other.
e. Where a public company fulfills its contractual obligations by providing mutual endorsements/guarantees for another company in the same industry or joint builders for purposes of undertaking a construction project.
f. Due to joint venture, all shareholders provide endorsements/guarantees to the endorsee/guarantee in proportion to its ownership.
g. Where companies in the same industry provide among themselves joint and several securities for a performance guarantee of a sales contract for pre-construction homes pursuant to the Consumer Protection Act for each other.

(Concluded)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

MARKETABLE SECURITIES HELD
DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

Holding Company Name	Type and Name of Marketable Securities	Relationship with the Holding Company	Financial Statement Account	December 31, 2019				Note
				Shares/Units (In Thousands)	Carrying Amount	Percentage of Ownership (%)	Fair Value	
Taiwan Cement Corporation	Ordinary shares							
	Chien Kuo Construction Co., Ltd.	-	FVTPL - current	7,522	$ 80,864	-	$ 80,864	
	Taiwan Television Enterprise, Ltd.	The Corporation serves as supervisor	FVTPL - current	13,573	96,909	-	96,909	
	Chinatrust Financial Holding Co., Ltd.	-	FVTPL - current	3,576	80,094	-	80,094	
	China Hi-Ment Corporation	The Corporation serves as director	FVTOCI - current	30,196	1,518,867	-	1,518,867	
	Taishin Financial Holding Co., Ltd.	-	FVTOCI - current	62,421	905,098	-	905,098	
	CTCI Corporation	-	FVTOCI - current	9,054	344,971	-	344,971	
	Chia Hsin Cement Corporation	Directors	FVTOCI - current	27,419	612,824	-	612,824	
	O-Bank	The Corporation serves as director	FVTOCI - current	29,719	232,105	-	232,105	
	IBT II Venture Capital Corporation	-	FVTOCI - non-current	2,626	14,510	8.3	14,510	
	Rong Gong Enterprise Co.	The Corporation serves as supervisor	FVTOCI - non-current	3,390	14,713	4.0	14,713	
	Chinatrust Investment Co., Ltd.	The Corporation serves as director	FVTOCI - non-current	29,553	1,174,715	9.4	1,174,715	
	Pan Asia Corporation	The Corporation serves as supervisor	FVTOCI - non-current	6,204	8,996	5.4	8,996	
	Taiwan Stock Exchange Corporation	The Corporation serves as director	FVTOCI - non-current	48,282	4,121,823	6.6	4,121,823	
	Excel Corporation	-	FVTOCI - non-current	600	-	9.5	-	
	Preference shares							
	O-Bank	The Corporation serves as director	FVTOCI - current	2,956	31,332	-	31,332	
Taiwan Transport & Storage Corporation	Ordinary shares							
	Chia Hsin Cement Corporation	Director of parent company	FVTOCI - current	8,632	192,915	-	192,915	
TCC Investment Corporation	Ordinary shares							
	O-Bank	The Corporation serves as director	FVTOCI - current	21,934	171,304	-	171,304	21,000 thousand shares were pledged
	Taishin Financial Holding Co., Ltd.	-	FVTOCI - current	11,941	173,138	-	173,138	
	Chia Hsin Cement Corporation	Director of parent company	FVTOCI - current	8,334	186,262	-	186,262	7,000 thousand shares were pledged
	China Conch Venture Holdings Limited	-	FVTOCI - non-current	28,000	3,664,248	-	3,664,248	
	Chinatrust Investment Co., Ltd.	The Corporation serves as director	FVTOCI - non-current	10,884	432,633	3.5	432,633	
	Pan Asia Corporation	The Corporation serves as supervisor	FVTOCI - non-current	1	14	-	14	
	Preference shares							
	O-Bank	The Corporation serves as director	FVTOCI -current	2,182	23,125	-	23,125	
Ta-Ho Maritime Corporation	Ordinary shares							
	Prosperity Dielectrics Co., Ltd.	-	FVTPL - current	951	67,630	-	67,630	
	Chia Hsin Cement Corporation	Director of parent company	FVTOCI - current	25,761	575,764	-	575,764	
	Chinatrust Investment Co., Ltd.	The Corporation serves as director	FVTOCI - non-current	6,612	262,814	2.1	262,814	

(Continued)

Holding Company Name	Type and Name of Marketable Securities	Relationship with the Holding Company	Financial Statement Account	December 31, 2019 Shares/Units (In Thousands)	Carrying Amount	Percentage of Ownership (%)	Fair Value	Note
Taiwan Cement Engineering Corporation	Beneficiary certificates							
	Capital Money Market Fund	-	FVTPL - current	2,930	$ 47,456	-	$ 47,456	
TCC Chemical Corporation	Ordinary shares							
	Taiwan Stock Exchange Corporation	The Corporation serves as director	FVTOCI - non-current	2,757	235,358	-	235,358	
Taiwan Prosperity Chemical Corporation	Ordinary shares							
	Taishin Financial Holding Co., Ltd.	-	FVTOCI - current	78,462	1,137,697	-	1,137,697	
Hoping Industrial Port Corporation	Ordinary shares							
	Chinatrust Investment Co., Ltd.	The Corporation serves as director	FVTOCI - non-current	10,444	415,137	3.3	415,137	
E.G.C. Cement Corporation	Beneficiary certificates							
	Nomura Taiwan Money Market	-	FVTPL - current	4,117	67,437	-	67,437	
	UPAMC James Bond Money Market Fund	-	FVTPL - current	1,503	25,221	-	25,221	
	Tai Shin 1699 Money Market Fund	-	FVTPL - current	2,588	35,159	-	35,159	
	Ordinary shares							
	Feng Yu United Engineering Company	-	FVTPL - current	58	-	0.1	-	
Union Cement Traders Inc.	Ordinary shares							
	Taishin Financial Holding Co., Ltd.	-	FVTOCI - current	27,574	399,818	-	399,818	
	CTCI Corporation	-	FVTOCI - current	13,365	509,219	-	509,219	
	Chia Hsin Cement Corporation	Director of parent company	FVTOCI - current	7,441	166,306	-	166,306	
	Videoland Inc.	-	FVTOCI - non-current	6,437	290,909	5.6	290,909	
TCCI (Group)	Ordinary shares							
	Anhui Conch Cement Co., Ltd.	-	FVTOCI - non-current	116,568	25,484,469	-	25,484,469	
	Yargoon Co., Ltd.	-	FVTOCI - non-current	19	-	12.5	-	

Note 1: Marketable securities in the table refer to shares, bonds, beneficiary certificates and other related securities within the scope of IFRS 9 “Financial Instruments”.

Note 2: See Tables 8 and 9 for the information of investments in subsidiaries, associates and joint ventures.

(Concluded)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

MARKETABLE SECURITIES ACQUIRED OR DISPOSED OF AT COSTS OR PRICES OF AT LEAST NT$300 MILLION OR 20% OF THE SHARE CAPITAL
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

Company Name	Type and Name of Marketable Securities	Financial Statement Account	Counterparty	Relationship	Beginning Balance		Acquisition		Disposal				Other Adjustment (Note 1)	Ending Balance	
					Shares/Units (In Thousands)	Amount	Shares/Units (In Thousands)	Amount	Shares/Units (In Thousands)	Amount	Carrying Amount	Gain/Loss on Disposal (Note 4)		Shares/Units (In Thousands)	Amount
	Shares														
Taiwan Cement Corporation	E-ONE Moli Energy Corporation	Investments accounted for using the equity method	-	Associates	48,127	$ 523,197	50,313	$ 503,133	98,440 (Note 2)	$ -	$ 1,006,394	$ -	$ (19,936)	-	$ -
Taiwan Cement Corporation	TCC Recycle Energy Technology Company	Investments accounted for using the equity method	-	Associates	-	-	117,364	1,347,594 (Note 3)	-	-	-	-	(54,119)	117,364	1,293,475
Taiwan Cement Corporation	Ta-Ho Taitung Environment (Note 4)	Investments accounted for using the equity method	-	The Group acts as key management personnel	37,100	297,188	-	-	37,100	341,280	341,280	-	44,092	-	-
Taiwan Cement Corporation	TCC Green Energy Corporation	Investments accounted for using the equity method	-	Subsidiaries	150,897	1,529,333	170,000	1,700,000 (Note 5)	-	-	-	-	(65,302)	320,899	3,164,031
Ta-Ho Maritime Holdings	THC International S.A.	Investments accounted for using the equity method	-	Subsidiaries	2,010	2,638,664	28,300	874,753 (Note 6)	-	-	-	-	(42,812)	30,310	3,470,605
TCC Green Energy Corporation	Chang-Wang Wind Power Co., Ltd.	Investments accounted for using the equity method	-	Subsidiaries	12,000	119,670	60,000	600,000 (Note 7)	-	-	-	-	(47,128)	72,000	672,542
TCC Green Energy Corporation	TCC Chia-Chien Green Energy Corporation	Investments accounted for using the equity method	-	Subsidiaries	20,200	173,817	55,000	550,000 (Note 7)	-	-	-	-	(15,050)	75,200	708,767

Note 1: Including share of profit or loss of subsidiaries, equity adjustments, etc.

Note 2: The shares of capital reduction handled by E-ONE Moli Energy Corporation.

Note 3: In the fourth quarter of 2019, the Corporation chose to fully convert the ordinary shares of E-ONE Moli Energy Corp. into the preferred shares A of TCC Recycling Energy Company, and converted the preferred shares into ordinary shares at the ratio of 1:1 in accordance with the terms conditions for the issuance of preferred shares.

Note 4: Ta-Ho Taitung Environment were in the process of liquidation in December 2019.

Note 5: In November 2019, Taiwan Cement Corporation increased its investment in the capital of TCC Green Energy Corporation.

Note 6: In July 2019, the board of directors of Ta-Ho Maritime Holdings resolved to increase its capital investment of THC International S.A.

Note 7: TCC Green Energy Corporation successively increased its investment in the capital of Chang-Wang Wind Power Co., Ltd. and TCC Chia-Chien Green Energy Corporation during 2019.

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

ACQUISITION OF INDIVIDUAL REAL ESTATE AT COSTS OF AT LEAST NT$300 MILLION OR 20% OF THE PAID-IN CAPITAL
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

Buyer	Property	Event Date	Transaction Amount	Payment Status	Counterparty	Relationship	Information on Previous Title Transfer If Counterparty Is A Related Party				Pricing Reference	Purpose of Acquisition	Other Terms
							Property Owner	Relationship	Transaction Date	Amount			
Taiwan Cement Corporation	Ready mixed concrete plant and its land in Hsinchu	2019.11.12	$ 421,971	By negotiation and paid in progress	Han-Song Gravel Processing Industrial Corporation Limited and Individual	Neither are related-parties	-	-	-	$ -	Negotiate according to the appraised result made by Great Eastern Real Estate Appraiser Office	Expand operating position	None

Note: Part of the payment for the above transaction was paid in February 2020.

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

TOTAL PURCHASES FROM OR SALES TO RELATED PARTIES AMOUNTING TO AT LEAST NT$100 MILLION OR 20% OF THE SHARE CAPITAL
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

Buyer	Related Party	Relationship	Transaction Details				Abnormal Transaction		Notes/Accounts Receivable (Payable)		Note
			Purchases/Sales	Amount	% of Total	Payment Terms	Unit Price	Payment Terms	Ending Balance	% of Total (Note)	
Taiwan Cement Corporation	Chia Hsin Cement Corporation	Director of the Corporation	Sales	$ (463,073)	(2)	65 days after the day delivery was made	$ -	-	$ 83,580	16	
	Goldsun Development & Construction Co., Ltd.	Investors with significant influence over the Group	Sales	(148,286)	(1)	70 days			31,978	6	
	HKCCL	Subsidiary	Sales	(313,812)	(2)	65 days after the day shipment was made	-	-	63,529	12	(Note 2)
	Feng Shang Enterprise Company Limited	Subsidiary	Sales	(449,485)	(2)	30 days	-	-	123,566	24	(Note 2)
			Purchases	230,190	1	30 days	-	-	(16,121)	(2)	(Note 2)
	TCCIH	Subsidiary	Service revenue	(456,320)	(2)	By contract	-	-	37,079	7	(Note 2)
	Taiwan Transport & Storage Corporation	Subsidiary	Purchases	539,481	3	30 days	-	-	(63,273)	(14)	(Note 2)
	China Hi-Ment Corporation	The Corporation serves as director	Purchases	647,243	4	60 days	-	-	(141,757)	(20)	
			Sales	(134,212)	(1)	60 days	-	-	42,585	8	
	Hoping Industrial Port Corporation	Subsidiary	Purchases	507,458	3	20 days	-	-	(29,017)	(4)	(Note 2)
	Ta-Ho Maritime Corporation	Subsidiary	Purchases	1,414,140	8	30 days	-	-	(264,694)	(37)	(Note 2)
	Kuan-Ho Refractories Industry Corporation	Subsidiary	Purchases	248,324	1	By contract	-	-	(66,986)	(9)	(Note 2)
	E.G.C. Cement Corporation	Subsidiary	Sales	(433,388)	(2)	50 days after the day delivery was made	-	-	99,885	19	(Note 2)
	Jin Chang Minerals Corporation	Subsidiary	Purchases	413,373	2	30 days	-	-	(3,238)	-	(Note 2)
	Ho Sheng Mining Co., Ltd.	Subsidiary	Purchases	587,699	3	30 days	-	-	(102,207)	(14)	(Note 2)
Jin Chang Minerals Corporation	Taiwan Cement Corporation	Parent company	Sales	(413,373)	(100)	30 days	-	-	3,238	100	(Note 2)
Ho Sheng Mining Co., Ltd.	Taiwan Cement Corporation	Parent company	Sales	(587,699)	(91)	30 days	-	-	102,207	99	(Note 2)
Kuan-Ho Refractories Industry Corporation	Taiwan Cement Corporation	Parent company	Sales	(248,324)	(18)	By contract	-	-	66,986	87	(Note 2)
E.G.C. Cement Corporation	Taiwan Cement Corporation	Parent company	Purchases	433,388	100	50 days after the day delivery was made	-	-	(99,885)	(100)	(Note 2)

(Continued)

Buyer	Related Party	Relationship	Transaction Details				Abnormal Transaction		Notes/Accounts Receivable (Payable)		Note
			Purchases/Sales	Amount	% of Total	Payment Terms	Unit Price	Payment Terms	Ending Balance	% of Total (Note)	
Ho-Ping Power Company	Hoping Industrial Port Corporation	The same parent company	Purchases	$ 1,114,272	16	20 days	$ -	-	$ (97,104)	(49)	(Note 2)
	HPC Power Service Corporation	The same parent company	Purchases	472,539	7	By contract	-	-	(95,500)	(49)	(Note 2)
Hoping Industrial Port Corporation	Ho-Ping Power Company	The same parent company	Sales	(1,114,272)	(68)	20 days	-	-	97,104	75	(Note 2)
	Taiwan Cement Corporation	Parent company	Sales	(507,458)	(31)	20 days	-	-	29,017	23	(Note 2)
	Taiwan Transport & Storage Corporation	The same parent company	Purchases	194,833	78	30 days	-	-	(17,363)	(86)	(Note 2)
Feng Shang Enterprise Company Limited	Taiwan Cement Corporation	Parent company	Sales	(230,190)	(8)	30 days	-	-	16,121	100	(Note 2)
			Purchases	449,485	16	30 days	-	-	(123,566)	(100)	(Note 2)
							-				
Taiwan Transport & Storage Corporation	Taiwan Cement Corporation	Parent company	Sales	(539,481)	(40)	30 days	-	-	63,273	53	(Note 2)
	Taiwan Prosperity Chemical Corporation	The same parent company	Sales	(206,997)	(15)	By contract	-	-	23,458	20	(Note 2)
	Hoping Industrial Port Corporation	The same parent company	Sales	(194,833)	(14)	30 days	-	-	17,363	15	(Note 2)
	Linyuan Advanced Materials Technology Co., Ltd.	The same chairman	Sales	(133,365)	(10)	30 days		-	13,385	11	
							-				
Taiwan Prosperity Chemical Corporation	Taiwan Transport & Storage Corporation	The same parent company	Purchases	206,997	2	By contract		-	(23,458)	(30)	(Note 2)
	Linyuan Advanced Materials Technology Co., Ltd.	The same chairman	Purchases	130,308	1	15 days			(7,057)	(1)	
HPC Power Service Corporation	Ho-Ping Power Company	The same parent company	Sales	(472,539)	(100)	By contract	-	-	95,500	100	(Note 2)
Ta-Ho Maritime Corporation	Taiwan Cement Corporation	Parent company	Freight revenue	(1,414,140)	(48)	30 days	-	-	264,694	100	(Note 2)
	THC International S.A	Subsidiary	Rental expense	197,061	8	By negotiation	-	-	(29,506)	(89)	(Note 2)
THC International S.A	Ta-Ho Maritime Corporation	Parent company	Rental revenue	(197,061)	(68)	By negotiation	-	-	29,506	100	(Note 2)
HKCCL	Quon Hing Concrete. Ltd.	Associates	Sales	(297,123)	(58)	By negotiation	-	-	75,336	64	
	Taiwan Cement Corporation	Parent company	Purchases	313,812	85	65 days after the day shipment was made	-	-	(63,529)	(98)	(Note 2)
TCC (Guigang) Cement Ltd.	Guigang Da-Ho Shipping Co., Ltd.	The same ultimate parent company	Purchases	481,798	6	By negotiation	-	-	(176,734)	(39)	(Note 2)
	Da Tong (Guigang) International Logistics Co., Ltd.	The same ultimate parent company	Purchases	475,715	6	By negotiation		-	(131,813)	(29)	(Note 2)
TCC Yingde Cement Co., Ltd.	Guigang Da-Ho Shipping Co., Ltd.	The same ultimate parent company	Purchases	307,411	4	By negotiation	-	-	(113,547)	(7)	(Note 2)

(Continued)

Buyer	Related Party	Relationship	Transaction Details				Abnormal Transaction		Notes/Accounts Receivable (Payable)		Note
			Purchases/Sales	Amount	% of Total	Payment Terms	Unit Price	Payment Terms	Ending Balance	% of Total (Note)	
Da Tong (Guigang) International Logistics Co., Ltd.	TCC (Guigang) Cement Limited	The same ultimate parent company	Freight revenue	$ (475,715)	(94)	By negotiation	$ -	-	$ 131,252	100	(Note 2)
Guigang Da-Ho Shipping Co., Ltd.	TCC (Guigang) Cement Ltd.	The same ultimate parent company	Freight revenue	(481,798)	(35)	By negotiation	-	-	176,734	60	(Note 2)
	TCC Yingde Cement Co., Ltd.	The same ultimate parent company	Freight revenue	(307,411)	(23)	By negotiation	-	-	113,547	38	(Note 2)
TCCIH	Taiwan Cement Corporation	Parent company	Service expense	456,320	100	By contract	-	-	(37,079)	(99)	(Note 2)
Yingde Dragon Mountain Cement Co., Ltd.	Prosperity Conch Cement Company Limited	Associates	Purchases	108,753	2	By negotiation	-	-	(11,792)	(3)	

Note 1: The percentage to total accounts receivable from (payable to) related parties.

Note 2: All intercompany transactions have been eliminated upon consolidation.

(Concluded)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

RECEIVABLES FROM RELATED PARTIES AMOUNTING TO AT LEAST NT$100 MILLION OR 20% OF THE SHARE CAPITAL
DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

Company Name	Related Party	Relationship	Ending Balance	Turnover Rate (%)	Overdue		Amount Received in Subsequent Period	Allowance for Impairment Loss
					Amount	Action Taken		
Ta-Ho Maritime Corporation	Taiwan Cement Corporation (Note 2)	Parent company	$ 264,694	4.4	$ -	-	$ 264,493	$ -
Ho Sheng Mining Co., Ltd.	Taiwan Cement Corporation (Note 2)	Parent company	102,207	8.7	-	-	102,207	-
Guigang Da-Ho Shipping Co., Ltd.	TCC (Guigang) Cement Ltd. (Note 2)	The same ultimate parent company	176,734	4.2	-	-	176,734	-
Da Tong (Guigang) International Logistics Co., Ltd.	TCC (Guigang) Cement Ltd. (Note 2)	The same ultimate parent company	131,252	4.4	-	-	131,252	-
Guigang Da-Ho Shipping Co., Ltd.	TCC Yingde Cement Co., Ltd. (Note 2)	The same ultimate parent company	113,547	3.6	-	-	111,600	-
Taiwan Cement Corporation	Feng Sheng Enterprise Company (Note 2)	Subsidiary	123,566	4.1	-	-	119,443	-
Taiwan Cement Corporation	Ta-Ho Taitung Environment Co., Ltd.	Parent company has significant influence	341,280	(Note 1)	-	-	-	-

Note 1: At the end of December 2019, Ta-Ho Taitung Environment Co., Ltd. was in the process of liquidation, and other receivables from related parties are listed in other current assets.

Note 2: All intercompany transactions have been eliminated upon consolidation.

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

INFORMATION ON INVESTEES
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

Investor Company	Investee Company	Location	Main Businesses and Products	Original Investment Amount December 31, 2019	Original Investment Amount December 31, 2018	As of December 31, 2019 Shares/Units (In Thousands)	%	Carrying Amount	Net Income (Loss) of the Investee	Share of Profit (Loss)	Note
Taiwan Cement Corporation	TCCI	British Virgin Islands	Investment holding	$ 33,774,761	$ 33,774,761	1,100,876	100.00	$ 103,716,200	$ 12,714,156	$ 12,714,156	Note 1
	Ho-Ping Power Company	Taiwan	Thermal power generation	6,037,720	6,037,720	805,940	59.50	17,378,914	5,535,574	3,293,666	Note 1
	Hoping Industrial Port Corporation	Taiwan	Hoping Industrial Port management	3,198,500	3,198,500	319,990	100.00	5,703,414	769,344	769,319	Note 1
	Ta-Ho Maritime Corporation	Taiwan	Marine transportation	528,506	528,506	130,514	64.79	2,575,734	369,852	239,617	Note 1
	Taiwan Prosperity Chemical Corporation	Taiwan	Processing and sale of chemical material	992,173	992,173	116,791	40.00	658,029	(2,013,070)	(805,235)	Note 1
	Taiwan Transport & Storage Corporation	Taiwan	Warehousing, transportation and sale of sand and gravel	90,862	90,862	32,668	83.85	1,965,859	188,977	158,449	Note 1
	TCC Investment Corporation	Taiwan	Investment	190,000	190,000	107,355	100.00	4,451,678	112,619	112,618	Note 1
	Ho Sheng Mining Co., Ltd.	Taiwan	Mining excavation	1,414,358	1,414,358	30,100	100.00	1,181,433	112,015	112,016	Note 1
	CCC USA Corp.	U.S.A.	Rubber raw materials	1,284,421	1,284,421	79	33.33	1,724,538	437,008	145,669	
	Taiwan Cement Engineering Corporation	Taiwan	Engineering services	319,439	319,439	59,593	99.05	732,796	20,400	21,586	Note 1
	ONYX Ta-Ho Environmental Services Co., Ltd.	Taiwan	Waste collection and treatment	72,000	72,000	30,176	50.00	818,277	791,400	395,701	
	Kuan-Ho Refractories Industry Corporation	Taiwan	Production and sale of refractory materials	181,050	181,050	18,105	95.29	450,426	88,233	84,076	Note 1
	Feng Sheng Enterprise Company Limited	Taiwan	Sale of ready-mixed concrete	250,000	250,000	27,261	45.43	362,317	72,874	33,110	Note 1
	TCC Chemical Corporation	Taiwan	Leasing property and energy technology services	1,510,842	1,510,842	240,000	100.00	1,255,735	73,325	270,481	Note 1
	Ta-Ho Taitung Environment Co., Ltd.	Taiwan	Waste collection and treatment	313,187	313,187	-	-	-	44,092	44,092	Liquidation process was in progress
	TCC Information Systems Corporation	Taiwan	Information software design	71,000	71,000	14,904	99.36	238,516	10,734	10,665	Note 1
	Ta-Ho RSEA Environment Co., Ltd.	Taiwan	Waste collection and treatment	666,000	666,000	66,600	66.60	193,848	(9,885)	(6,583)	Note 1
	HKCMCL	Hong Kong	Investment holding	72,005	72,005	38	84.65	378,032	73,785	62,462	Note 1
	TCC Green Energy Corporation	Taiwan	Renewable energy generation	3,146,046	1,446,046	320,899	100.00	3,164,031	(65,302)	(65,302)	Note 1
	Jin Chang Minerals Corporation	Taiwan	Afforestation and sale of limestone	18,042	18,042	1,800	100.00	178,884	40,299	40,299	Note 1
	HPC Power Service Corporation	Taiwan	Business consulting	1,861	1,861	6	60.00	113,640	190,711	114,427	Note 1
	E.G.C. Cement Corporation	Taiwan	Sale of cement	184,359	184,359	8,063	50.64	112,235	24,863	12,592	Note 1
	Synpac Ltd.	British Virgin Islands	Investment	70,367	70,367	2,700	25.00	6,881	237	59	
	Tung Chen Mineral Corporation	Taiwan	Afforestation and sale of limestone	1,989	1,989	20	99.45	1,311	(42)	(41)	Note 1
	TMC	Philippines	Mining excavation	11,880	11,880	120	72.70	-	-	-	Note 1
	TPMC	Philippines	Mining excavation	2,105	2,105	20	40.00	-	-	-	Note 1
	TCCIH	Cayman Islands	Investment holding	40,701,671	40,701,671	2,581,832	38.28	49,332,748	18,186,515	6,961,798	Note 1
	E-ONE Moli Energy Corporation	Taiwan	Manufacture and sale of lithium battery	-	481,811	-	-	-	(425,691)	(18,472)	Note 2
	International CSRC Investment Holdings Co., Ltd.	Taiwan	Investment	3,563,397	3,563,397	153,477	15.59	5,112,794	1,027,770	160,185	
	Taiwan Cement Dutch	Netherlands	Investment holding	29,470,972	29,470,972	831	100.00	27,952,597	(54,395)	(54,395)	Note 1
	TCCMOLI	Singapore	Investment holding	1,239	-	30	100.00	713	193	193	Note 1
	TCC Recycle Energy Technology Company	Taiwan	Manufacturing and sale of batteries, power generation machinery, electronic components, etc.	1,190,225	-	117,364	18.19	1,293,475	(299,195)	(53,661)	Note 2
Taiwan Transport & Storage Corporation	Ta-Ho Maritime Corporation	Taiwan	Marine transportation	301,524	300,507	58,836	29.21	1,161,144	369,852	107,949	Note 1
	E.G.C. Cement Corporation	Taiwan	Sale of cement	136,476	136,476	7,857	49.36	138,760	24,863	12,271	Note 1
	Chia Huan Tung Cement Corporation	Taiwan	Manufacturing and sale of cement-related products	-	87,463	-	-	-	(4,439)	(551)	Liquidation process was in progress
	Tai-Jie Transport & Storage Corporation	Taiwan	Transportation	25,000	-	2,500	100.00	25,874	874	874	Note 1

(Continued)

Investor Company	Investee Company	Location	Main Businesses and Products	Original Investment Amount		As of December 31, 2019			Net Income (Loss) of the Investee	Share of Profit (Loss)	Note
				December 31, 2019	December 31, 2018	Shares/Units (In Thousands)	%	Carrying Amount			
TCC Investment Corporation	Union Cement Traders Inc.	Taiwan	Import and export trading	$ 219.450	$ 219,450	21,945	100.00	$ 856,677	$ 28,768	$ 28,768	Note 1
	Ho-Ping Power Company	Taiwan	Thermal power generation	68,911	68,911	6,773	0.50	142,574	5,535,574	27,678	Note 1
	Taiwan Prosperity Chemical Corporation	Taiwan	Processing and sale of chemical material	10,528	10,528	658	0.23	3,707	(2,013,070)	(4,537)	Note 1
	Ta-Ho Maritime Corporation	Taiwan	Marine transportation	343	343	38	0.02	745	369,852	69	Note 1
	E-ONE Moli Energy Corporation	Taiwan	Manufacture and sale of lithium battery	-	172,648	-	-	-	(425,691)	(6,935)	Note 2
	International CSRC Investment Holdings Co., Ltd.	Taiwan	Investment	388,079	387,920	22,009	2.23	726,789	1,027,770	22,929	
	TCC Recycle Energy Technology Company	Taiwan	Manufacturing and sale of batteries, power generation machinery, electronic components, etc.	312,833	-	31,860	4.94	220,002	(299,195)	(14,435)	Note 2
Ta-Ho Maritime Corporation	Ta-Ho Maritime Holdings Ltd.	Samoa	Investment	325,995	325,995	10,300	100.00	4,272,640	190,974	190,974	Note 1
	Shih Hsin Storage & Transportation Co., Ltd.	Taiwan	Warehousing, transportation and sale of cement	-	30,952	-	-	-	(6,150)	(206)	Liquidation process was in progress
	Chia Huan Tung Cement Corporation	Taiwan	Manufacturing and sale of cement-related products	-	7,943	-	-	-	(4,439)	(51)	Liquidation process was in progress
TCC Information Systems Corporation	Taicem Information (Samoa) Pte., Ltd.	Samoa	Investment	3,042	3,042	2,128	100.00	48,839	(484)	(484)	Note 1
	International CSRC Investment Holdings Co., Ltd.	Taiwan	Investment	49,882	49,882	2,055	0.21	67,920	1,027,770	2,145	
Hoping Industrial Port Corporation	Taiwan Prosperity Chemical Corporation	Taiwan	Processing and sale of chemical material	104,929	104,929	6,675	2.29	37,609	(2,013,070)	(46,021)	Note 1
	E-ONE Moli Energy Corporation	Taiwan	Manufacture and sale of lithium battery	-	60,673	-	-	-	(425,691)	(2,546)	Note 2
	TCC Recycle Energy Technology Company	Taiwan	Manufacturing and sale of batteries, power generation machinery, electronic components, etc.	112,898	-	11,696	1.81	80,762	(299,195)	(5,299)	Note 2
E.G.C. Cement Corporation	Shih Hsin Storage & Transportation Co., Ltd.	Taiwan	Warehousing, transportation and sale of cement	-	110,128	-	-	-	(6,150)	(730)	Liquidation process was in progress
Union Cement Traders Inc.	Shih Hsin Storage & Transportation Co., Ltd.	Taiwan	Warehousing, transportation and sale of cement	-	34,203	-	-	-	(6,150)	(227)	Liquidation process was in progress
	Taiwan Transport & Storage Corporation	Taiwan	Warehousing, transportation and sale of sand and gravel	2,612	2,612	261	0.67	15,723	188,977	1,267	Note 1
	Chia Huan Tung Cement Corporation	Taiwan	Manufacturing and sale of cement-related products	-	2,552	-	-	-	(4,439)	(113)	Liquidation process was in progress
	E-ONE Moli Energy Corporation	Taiwan	Manufacture and sale of lithium battery	-	161,605	-	-	-	(425,691)	(6,683)	Note 2
	International CSRC Investment Holdings Co., Ltd.	Taiwan	Investment	281,806	281,806	11,464	1.16	378,797	1,027,770	11,965	
	TCC Recycle Energy Technology Company	Taiwan	Manufacturing and sale of batteries, power generation machinery, electronic components, etc.	298,046	-	30,703	4.76	212,014	(299,195)	(13,911)	Note 2
Ho-Ping Power Company	Ho-Ping Renewable Energy Company	Taiwan	Renewable energy generation	-	1,000	-	100.00	998	(2)	(2)	Note 1
TCC Green Energy Corporation	TCC Chia-Chien Green Energy Corporation	Taiwan	Renewable energy generation	752,000	202,000	75,200	100.00	708,767	(15,050)	(15,050)	Note 1
	TCC Yun-Kai Green Energy Corporation	Taiwan	Renewable energy generation	25,000	25,000	2,500	100.00	22,572	(310)	(310)	Note 1
	TCC Lien-Shen Green Energy Corporation	Taiwan	Renewable energy generation	12,000	12,000	1,200	100.00	9,090	(277)	(277)	Note 1
	TCC Chang-Ho Green Energy Corporation	Taiwan	Renewable energy generation	5,000	5,000	500	100.00	2,456	(32)	(32)	Note 1
	TCC Kao Cheng Green Energy Corporation	Taiwan	Renewable energy generation	12,000	12,000	1,200	100.00	9,901	(46)	(46)	Note 1

(Continued)

Investor Company	Investee Company	Location	Main Businesses and Products	Original Investment Amount December 31, 2019	Original Investment Amount December 31, 2018	As of December 31, 2019 Shares/Units (In Thousands)	As of December 31, 2019 %	As of December 31, 2019 Carrying Amount	Net Income (Loss) of the Investee	Share of Profit (Loss)	Note
	TCC Nan chung Green Energy Corporation	Taiwan	Renewable energy generation	$ 170,000	$ 20,000	17,000	100.00	$ 167,742	$ (210)	$ (210)	Note 1
	Chang-Wang Wind Power Co., Ltd.	Taiwan	Renewable energy generation	720,000	120,000	72,000	100.00	672,542	(47,128)	(47,128)	Note 1
	TCC Ping-Zhi Green Energy Corporation	Taiwan	Renewable energy generation	2,000	-	200	100.00	1,955	(45)	(45)	Note 1
Ta-Ho Maritime Holdings Ltd.	THC International S.A.	Panama	Marine transportation	908,694	61,737	30,310	100.00	3,470,605	47,105	47,105	Note 1
	Sheng Ho Maritime S.A.	Panama	Marine transportation	-	61,737	-	-	-	39,173	39,173	Note 3
	Ta-Ho Maritime (Hong Kong) Limited	Hong Kong	Marine transportation	152,898	156,647	5,100	100.00	718,111	92,363	92,363	Note 1
	Chi Ho Maritime S.A.	Panama	Marine transportation	-	199,955	-	-	-	8,295	8,295	Note 3
	Ta-Ho Maritime (Singapore) Pte. Ltd.	Singapore	Marine transportation	2,998	3,072	100	100.00	72,791	394	394	Note 1
TCC International Ltd. (Group)	Quon Hing Concrete Co., Ltd.	Hong Kong	Investment holding	171,246	174,449	100	50.00	160,245	(100,293)	(50,146)	
	Chia Huan Tung Cement Corporation	Taiwan	Manufacturing and sale of cement-related products	-	148,554	-	-	-	(4,439)	(786)	Liquidation process was in progress
	Hong Kong Concrete Co., Ltd.	Hong Kong	Cement processing services	26,258	26,749	129	31.50	179,471	35,113	(34,487)	Note 4
Taiwan Cement Dutch	Cimpor Global Holdings B.V.	Netherlands	Holding company	29,380,273	29,152,614	100	40.00	27,832,897	348,035	(8,286)	

Note 1: All intercompany transactions have been eliminated upon consolidation.

Note 2: The Group established TCC Recycling Energy Company with a capital increase of $1,000 thousand in June 2019. As the Group invested $340,200 thousand in TCC Recycle Energy Technology Company during their capital increase in August 2019 not based on its existing ownership percentage, its percentage of ownership decreased from 100% to 28.8%. In August 2019, the board of directors of both TCC Recycle Energy Technology Company and E-ONE Moli Energy Corp. resolved to enter into a share swap agreement according to the Business Mergers and Acquisitions Act, under which TCC Recycle Energy Technology Company shall issue preferred shares A for conversion into the ordinary shares of E-ONE Moli Energy Corp. at the ratio of 1:1. In the fourth quarter of 2019, the Group chose to fully convert the ordinary shares of E-ONE Moli Energy Corp. into the preferred shares A of TCC Recycling Energy Company with a book value of $1,541,505 thousand. The preferred shares were fully converted into ordinary shares at the ratio of 1:1 in accordance with the terms and conditions for the issuance of preferred shares, thus, the Group's percentage of ownership of TCC Recycling Energy Company increased from 28.8% to 29.7%.

Note 3: Sheng Ho Maritime S.A. and Chi Ho Maritime S.A. completed liquidation in August and September 2019, respectively.

Note 4: In May 2019, TCC International Ltd. (Group) transferred shares of Chia Huan Tung Cement Corporation to Union Cement Traders Inc.

(Concluded)

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

INFORMATION ON INVESTMENT IN MAINLAND CHINA
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

A.

Investee Company	Main Businesses and Products	Share Capital	Method of Investment (Note 1)	Accumulated Outward Remittance for Investment from Taiwan as of January 1, 2019 (Note 2)	Investment Flow (Note 2)		Accumulated Outward Remittance for Investment from Taiwan as of December 31, 2019 (Note 2)	Net Income (Loss) of the Investee	% Ownership of Direct or Indirect Investment	Investment Gain (Loss) (Note 3)	Carrying Amoun as of December 31, 2019 (Note 3)	Accumulated Repatriation of Investment Income as of December 31, 2019	Note
					Outflow	Inflow							
Anhui King Bridge Cement Co., Ltd. (Note 5)	Manufacturing and sale of cement	$ 449,700	(a)	$ 152,898	$ -	$ -	$ 152,898	$ -	-	$ -	$ -	$ -	Note 7
TCC Fuzhou Cement Co., Ltd.	Manufacturing and sale of cement	487,175	(a)	275,254	-	-	275,254	66,216	100.00	66,216	943,877	-	Note 7
TCC Fuzhou Yangyu Port Co., Ltd.	Service of port facility	149,900	(a)	84,694	-	-	84,694	(9,587)	100.00	(9,587)	266,799	-	Note 7
TCC Liuzhou Construction Materials Co., Ltd.	Manufacturing and sale of slag powder	404,730	(a)	97,135	-	-	97,135	66,304	42.00	27,848	398,109	-	Note 7
TCC Yingde Cement Co., Ltd.	Manufacturing and sale of cement	7,626,912	(a)	4,765,651	-	-	4,765,651	5,101,724	100.00	5,101,724	25,127,335	-	Note 7
Jurong TCC Cement Co., Ltd.	Manufacturing and sale of cement	6,985,340	(a)	4,077,130	-	-	4,077,130	2,380,758	100.00	2,380,758	14,285,599	-	Note 7
TCC (Guigang) Cement Ltd.	Manufacturing and sale of cement	9,979,619	(a)	7,138,235	-	-	7,138,235	4,224,275	100.00	4,224,275	25,421,520	-	Note 7
Jiangsu TCC Investment Co., Ltd.	Investment	1,499,000	(a)	846,935	-	-	846,935	509,006	100.00	509,006	3,203,386	-	Note 7
Yingde Dragon Mountain Cement Co., Ltd.	Manufacturing and sale of cement	1,843,014	(a)	3,256,821	-	-	3,256,821	2,543,457	100.00	2,543,457	15,187,762	-	Note 7
TCC Liaoning Cement Company Limited	Manufacturing and sale of cement	1,597,155	(a)	1,336,553	-	-	1,336,553	25,153	100.00	25,153	1,648,482	-	Note 7
TCC Anshun Cement Company Limited	Manufacturing and sale of cement	4,601,630	(a)	3,352,543	-	-	3,352,543	187,054	100.00	187,054	7,442,985	-	Note 7
TCC Chongqing Cement Company Limited	Manufacturing and sale of cement	3,537,640	(a)	2,557,934	-	-	2,557,934	1,607,207	100.00	1,607,207	8,158,740	-	Note 7
TCC Guangan Cement Company Limited	Manufacturing and sale of cement	2,308,160	(a)	1,675,743	-	-	1,675,743	975,263	100.00	975,263	4,742,171	-	Note 7
TCC (Dong Guan) Cement Company Limited	Manufacturing and sale of cement	599,600	(a)	338,774	-	-	338,774	11,435	100.00	11,435	322,952	-	Note 7
Guizhou Kong On Cement Company Limited	Manufacturing and sale of cement	608,594	(a)	274,322	-	-	274,322	(34,861)	65.00	(22,659)	495,964	-	Note 7
TCC New (Hangzhou) Management Company Limited.	Operation management	239,840	(a)	135,510	-	-	135,510	(21,522)	100.00	(21,522)	173,200	-	Note 7
Guizhou Kaili Rui An Jian Cai Co., Ltd.	Manufacturing and sale of cement	1,677,488	(a)	1,072,516	-	-	1,072,516	112,473	100.00	112,473	3,722,084	-	Note 7
TCC Shaoguan Cement Co., Ltd.	Manufacturing and sale of cement	1,199,200	(a)	1,068,787	872,418	-	1,941,205	(15,748)	100.00	(15,748)	1,947,356	-	Note 7
TCC Huaying Cement Company Limited	Manufacturing and sale of cement	4,089,233	(a)	3,081,679	-	-	3,081,679	657,388	100.00	657,388	3,604,064	-	Note 7
TCC Huaihua Cement Company Limited (Note 4)	Manufacturing and sale of cement	400,365	(a)	5,641,295	-	-	5,641,295	287,815	100.00	287,815	2,879,697	-	Note 7
TCC Jingzhou Cement Company Limited (Note 4)	Manufacturing and sale of cement	43,050	(a)	-	-	-	-	128,153	100.00	128,153	1,409,887	-	Note 7
TCC Huaihua Concrete Company Limited (Note 4)	Sale of ready-mixed concrete	43,050	(a)	-	-	-	-	300	100.00	300	50,254	-	Note 7
TCC Jiangsu Mining Industrial Company Limited	Mining excavation	119,920	(a)	374,957	-	-	374,957	(788)	100.00	(788)	262,828	-	Note 7
TCC Yingde Mining Industrial Company Limited	Mining excavation	344,770	(a)	271,249	-	-	271,249	12,599	100.00	12,599	450,854	-	Note 7
TCC Guigang Mining Industrial Company Limited	Mining excavation	149,900	(a)	129,473	-	-	129,473	194	100.00	194	367,033	-	Note 7
Scitus Naxi Cement Co., Ltd.	Manufacturing and sale of cement	630,726	(a)	-	-	-	-	180,794	100.00	180,794	486,654	-	Note 7
Scitus Luzhou Cement Co., Ltd.	Manufacturing and sale of cement	1,700,475	(a)	-	-	-	-	467,851	100.00	467,851	2,874,737	-	Note 7
Scitus Hejiang Cement Co., Ltd.	Manufacturing and sale of cement	100,091	(a)	-	-	-	-	(2,113)	100.00	(2,113)	5,029	-	Note 7
Scitus Luzhou Concrete Co., Ltd.	Sale of ready-mixed concrete	107,625	(a)	-	-	-	-	(18,573)	100.00	(18,573)	123,140	-	Note 7
TCEC (Yingde) Machine Co., Ltd. (Notes 5 and 6)	Production and sale of cement machinery and assembly work	16,295	(b)	16,295	-	-	16,295	(992)	100.00	(992)	-	154,926	Note 7
Anshun Xin Tai Construction Materials Company Limited	Filtering of sand and gravel and sale of ready-mixed concrete	64,575	(a)	91,722	-	-	91,722	(1,913)	100.00	(1,913)	62,466	-	Note 7
Fuzhou TCC Information Technology Co., Ltd. (Note 6)	Software product and equipment maintenance	2,998	(a)	2,988	-	-	2,988	4,344	100.00	4,344	11,459	39,372	Note 7
Da Tong (Guigang) International Logistics Co., Ltd (Note 6)	Logistics and transportation	149,900	(a)	-	-	-	-	94,189	100.00	94,189	701,712	-	Note 7

(Continued)

Investee Company	Main Businesses and Products	Share Capital	Method of Investment (Note 1)	Accumulated Outward Remittance for Investment from Taiwan as of January 1, 2019 (Note 2)	Investment Flow (Note 2)		Accumulated Outward Remittance for Investment from Taiwan as of December 31, 2019 (Note 2)	Net Income (Loss) of the Investee	% Ownership of Direct or Indirect Investment	Investment Gain (Loss) (Note 3)	Carrying Amoun as of December 31, 2019 (Note 3)	Accumulated Repatriation of Investment Income as of December 31, 2019	Note
					Outflow	Inflow							
Da Tong (Ying De) Logistics Co., Ltd. (Note 6)	Logistics and transportation	$ 21,525	(a)	$ -	$ -	$ -	$ -	$ 14,279	100.00	$ 14,279	$ 107,746	$ -	Note 7
Guigang Da-Ho Shipping Co., Ltd. (Note 6)	Marine transportation	17,220	(a)	-	-	-	-	62,045	100.00	62,045	381,763	-	Note 7
Prosperity Conch Cement Company Limited	Manufacturing and sale of cement	2,496,900	(a)	2,197,343	-	-	2,197,343	5,126,506	25.00	1,281,626	5,813,901	-	
Yunnan Kungang & K. Wah Cement Construction Materials Co., Ltd.	Manufacturing and sale of cement	3,551,625	(a)	1,432,572	-	-	1,432,572	932,965	30.00	279,890	1,700,788	-	Note 3
Baoshan Kungang & K. Wah Cement Construction Materials Co., Ltd.	Manufacturing and sale of cement	1,776,157	(a)	693,716	-	-	693,716	942,640	30.00	282,792	1,117,517	-	Note 3
Sichuan Taichang Building Material Group Company Limited	Manufacturing and sale of cement	861,000	(a)	346,783	-	-	346,783	479,783	30.00	143,935	184,793	-	
Guangan Xin Tai Construction Materials Company Limited	Manufacturing and sale of concrete aggregate	66,728	(a)	47,343	-	-	47,343	-	50.00	-	-	-	
Guigang TCC DongYuan Environmental Technology Company Limited	Dangerous waste treatment	503,685	(a)	503,685	-	-	503,685	(9,235)	95.20	(8,791)	507,510	-	Note 7
Beijing TCC Environment Technology Co., Ltd.	Technology development, business management and sales	25,830	(a)	-	25,830	-	25,830	(21,152)	100.00	(21,152)	5,558	-	Note 7
TCC (Hangzhou) Environment Technology Limited	Environment, cement, business management consulting	3,013,500	(a)	-	3,013,500	-	3,013,500	(161,410)	100.00	(161,410)	2,862,652	-	Note 7
Kaili TCC Environment Technology Co., Ltd.	Waste collection and treatment	12,915	(a)	-	12,915	-	12,915	(7,065)	100.00	(7,065)	27,704	-	Note 7
TCC Jiuyuan (Xuyong) Environmental Technology Co., Ltd	Technology development, business management and sales	9,471	(a)	-	9,471	-	9,471	(2,211)	55.00	(1,216)	8,316	-	Note 7

Accumulated Investment in Mainland China as of December 31, 2019	Investment Amounts Authorized by Investment Commission, MOEA	Upper Limit on Investment
$71,290,669	$71,966,416	(Note 8)

Note 1: The method of investments were as two follows:

a. investments in mainland China companies were through a company invested and established in a third region.
b. Direct investment in mainland companies.

Note 2: Including outward remittance from offshore subsidiaries.

Note 3: Investment gain (loss) was based on the associates' audited financial statements except Yunnan Kungang & K. Wah Cement Construction Materials Co., Ltd. and Baoshan Kungang & K. Wah Cement Construction Materials Co., Ltd. The Group considers that there would be no significant adjustments if such financial statements were to be audited.

Note 4: As of December 31, 2019, the accumulated outward remittance for investments was a total of those from TCC Huaihua Cement Company Limited, TCC Jingzhou Cement Company Limited and TCC Huaihua Concrete Company Limited.

Note 5: Anhui King Bridge Cement Co., Ltd. and TCEC (Yingde) Machine Co., Ltd. wound up their businesses in 2019, and the procedures for the distribution of the remaining assets are still in progress.

Note 6: Including the amounts attributable to non-controlling interests.

Note 7: All intercompany transactions have been eliminated upon consolidation.

Note 8: The Corporation received a confirmation letter of Operation Headquarter from the Industrial Development Bureau of the MOEA in October 2016 stating that the Corporation is not limited by the restriction on the accumulated percentage or amount of investment in mainland China.

B. See Tables 1, 2, 4, 6 and 10 for the information about significant transactions with investees in the mainland China, either directly or indirectly through a third area.

(Concluded)

TABLE 10

TAIWAN CEMENT CORPORATION AND SUBSIDIARIES

INTERCOMPANY RELATIONSHIPS AND SIGNIFICANT INTERCOMPANY TRANSACTIONS
FOR THE YEAR ENDED DECEMBER 31, 2019
(In Thousands of New Taiwan Dollars)

No.	Investee Company	Counterparty	Relationship (Note 1)	Transactions Details			
				Financial Statement Account	Amount	Payment Terms	% of Total Sales or Assets
0	Taiwan Cement Corporation	E.G.C. Cement Corporation	1	Operating revenue	$ 433,388	50 days after the day delivery was made	0.4
			1	Lease liabilities - non-current	269,388	By contract	0.1
		HKCCL	1	Operating revenue	313,812	65 days after the day delivery was made	0.3
		Feng Sheng Enterprise Company Limited	1	Operating revenue	449,485	30 days	0.4
				Operating costs and expenses	230,190	30 days	0.2
				Accounts receivable from related parties	123,566	30 days	-
		Ta-Ho Maritime Corporation	1	Operating costs and expenses	1,414,140	30 days	1.2
				Payables to related parties	264,694	30 days	0.1
		Taiwan Transport & Storage Corporation	1	Operating costs and expenses	539,481	30 days	0.4
		Hoping Industrial Port Corporation	1	Operating costs and expenses	507,458	20 days	0.4
		Kuan-Ho Refractories Industry Corporation	1	Operating costs and expenses	248,324	By contract	0.2
		TCCIH	1	Operating revenue	456,320	By contract	0.4
		Jin Chang Minerals Corporation	1	Operating costs and expenses	413,373	30 days	0.3
		Ho Sheng Mining Co., Ltd.	1	Operating costs and expenses	587,699	30 days	0.5
				Payables to related parties	102,207	30 days	-
1	Ho-Ping Power Company	Hoping Industrial Port Corporation	3	Operating costs and expenses	1,114,272	20 days	0.9
		HPC Power Service Corporation	3	Operating costs and expenses	472,539	By contract	0.4
2	THC International S.A.	Ta-Ho Maritime Corporation	3	Rent revenue	197,061	By negotiation	0.2
3	TCC Chemical Corporation	Taiwan Prosperity Chemical Corporation	3	Finance lease receivables	1,092,213	By contract	0.3
		Taiwan Transport & Storage Corporation	3	Other payables to related parties	300,000	By contract	0.1
		Taiwan Cement Engineering Corporation	3	Other payables to related parties	200,000	By contract	0.1
4	Taiwan Transport & Storage Corporation	Taiwan Prosperity Chemical Corporation	3	Operating revenue	206,997	By contract	0.2
		Hoping Industrial Port Corporation	3	Operating revenue	194,833	30 days	0.2
5	Jin Chang Minerals Corporation	TCC Investment Corporation	3	Other payables to related parties	330,000	By contract	0.1
6	Da Tong (Guigang) International Logistics Co., Ltd.	TCC (Guigang) Cement Limited	3	Operating revenue	475,715	By negotiation	0.4
			3	Accounts receivable from related parties	131,252	By negotiation	-
7	Guigang Da-Ho Shipping Co., Ltd.	TCC (Guigang) Cement Limited	3	Operating revenue	481,798	By negotiation	0.4
			3	Accounts receivable from related parties	176,734	By negotiation	-
		TCC Yingde Cement Co., Ltd.	3	Operating revenue	307,411	By negotiation	0.3
			3	Accounts receivable from related parties	113,547	By negotiation	-

(Continued)

Note 1: All intercompany transactions have been eliminated upon consolidation. The directional flow of the investment relationship is represented by the following numerals:

a. From parent to subsidiary: 1.
b. From subsidiary to parent: 2.
c. Between subsidiaries: 3.

Note 2: This table includes transactions for amounts over $100 million.

(Concluded)