

Summary of Consolidated Financial Results for the Six Months Ended September 30, 2018 [Japanese GAAP]

October 30, 2018

Company Name : NGK INSULATORS, LTD.
Stock Exchange Listings : Tokyo and Nagoya

Listing Code : 5333

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Date of the Filing of Securities Report "Shihanki Hokokusho" (Scheduled) : November 6, 2018
Date of Dividend Payment (Scheduled) : December 7, 2018

Availability of supplementary explanatory materials prepared for financial results : Available

Briefing session on financial results to be held : Yes (for securities analysts and institutional investors)

(All yen amounts are rounded down to the nearest million.)

1. Consolidated Financial Results for the Six Months Ended September 30, 2018 (from April 1, 2018 to September 30, 2018)

(1) Consolidated Operating Results

(Percentage figures represent increase (decrease) from previous period.)

	Net sales		Net sales Operating income		Ordinary income		Profit attributable to owners of parent	
	Millions of yen	%	Millions of yen	%	Millions of yen	%	Millions of yen	%
Six months ended September 30, 2018	228,163	3.8	35,733	(0.4)	34,234	0.1	24,705	24.8
Six months ended September 30, 2017	219,754	13.1	35,874	4.7	34,212	5.7	19,792	(8.9)

(Note) Comprehensive income : Six months ended September 30, 2018 32,002 million yen (16.1)% : Six months ended September 30, 2017 38,151 million yen -%

	Profit per share	Diluted profit per share
	Yen	Yen
Six months ended September 30, 2018	76.78	76.66
Six months ended September 30, 2017	61.53	61.42

(2) Consolidated Financial Position

	Total assets	Total net assets	Ratio of net worth to total assets
	Millions of yen	Millions of yen	%
September 30, 2018	867,467	498,175	56.0
March 31, 2018	826,243	472,863	55.8

(Reference) Net worth : As of September 30, 2018 486,046 million yen : As of March 31, 2018 460,983 million yen

2. Dividend Payment

2. Dividend i dyment		Cash dividends per share						
	First quarter-end	Second quarter-end	Third quarter-end	Year-end	Total (Full-year)			
	Yen	Yen	Yen	Yen	Yen			
Year ended March 31, 2018	-	21.00	-	23.00	44.00			
Year ending March 31, 2019	-	25.00						
Year ending March 31, 2019 (forecast)			-	25.00	50.00			

(Note) Revision of cash dividend forecast during this period : None

3. Forecasts of Consolidated Financial Results for the Fiscal Year Ending March 31, 2019

(Percentage figures represent increase (decrease) from previous period.)

	Net sales		Operating income		·		Profit attributab owners of par		Profit per share
	Millions of yen	%	Millions of yen	%	Millions of yen	%	Millions of yen	%	Yen
Year ending March 31, 2019	470,000	4.2	70,000	(0.0)	68,000	(3.7)	44,000	(4.0)	136.74

(Note) Revision of forecasts of consolidated financial results during this period : Yes

Notes

- Significant changes in subsidiaries during this period (changes in specified subsidiaries, "tokutei kogaisha" defined in the "Cabinet Office
 Ordinance on Disclosure of Corporate Information, etc.", involving a change of the scope of consolidation during this period): Yes
 New company (), Exclusion 1 company (NGK INSULATORS SUZHOU CO., LTD.)
- (2) Application of special accounting methods for preparing quarterly consolidated financial statements: None
- (3) Changes in accounting policies, accounting estimates or retrospective restatements

i. Changes due to revisions of accounting standards : Yes
 ii. Changes in accounting policies other than the above (i) : None
 iii. Changes in accounting estimates : None
 iv. Retrospective restatement : None

(Note) For details, please refer to "2. Consolidated Financial Statements and Notes (3) Notes to Consolidated Financial Statements (Changes in Accounting Policy)" on page 7 of the Appendix.

- (4) Number of shares outstanding (Common Shares)
 - i. Number of shares outstanding at period end including treasury stocks
 - ii. Number of treasury stocks at period end
 - iii. Average number of shares outstanding over period

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September 30, 2018	327,560,196 shares	March 31, 2018	327,560,196 shares
September 30, 2018	5,786,396 shares	March 31, 2018	5,794,181 Shares
September 30, 2018	321,769,369 shares	September 30, 2017	321,667,967 shares

^{*}These quarterly financial statements are not subject to the quarterly review procedure of certified public accountant or audit firm

* Explanation of appropriate use of results forecasts and other notes

This document contains forward-looking statements that are based on information and certain assumption NGK INSULATORS, LTD. ("NGK") has acquired and deemed reasonable as of the time of the release and NGK does not guarantee the achievement of them. Actual future results and trends may differ materially from those in the forecasts due to a variety of factors.



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1. Qualitative Information on Quarterly Financial Statements

(1) Explanation of Business Results

During the first six months of the fiscal year ended September 30, 2018, the Japanese economy continued to recover moderately due to improvements in the employment and income environments. Overseas, the economies of the U.S., European states and other developed countries continued to recover while the Chinese economy decelerated as reflected in its slower pace of growth.

The NGK Group experienced weak shipments of insulators to overseas markets in the Power Business Segment on top of a decline in domestic demand. In the Ceramics Business Segment, shipments of SiC-based diesel particulate filters (DPF) dropped in conjunction with the lower ratio of diesel passenger cars in Europe. On the other hand, the distribution volumes of gasoline particulate filters (GPF) and sensors for gasoline passenger cars increased, due to the tightening of emission regulations in Europe. In the Electronics Business Segment, demand for package products was sluggish on the backdrop of stagnant capital investments for mobile phone base stations in China. Meanwhile, demand for bonded wafers for SAW filters and piezoceramics actuators for HDD increased. In the Process Technology Business Segment, the distribution volume of products for semiconductor manufacturing equipment heightened in response to the trend toward multi-layered semiconductors and their microfabrication.

As a result of the above, consolidated net sales for the six months ended September 30, 2018 increased 3.8% year on year to ¥228,163 million. In terms of earnings, despite increased net sales, R&D and depreciation costs among others increased, causing operating income to decrease 0.4% year on year to ¥35,733 million while ordinary income was comparable to the result of a year earlier at ¥34,234 million. Profit attributable to owners of the parent increased 24.8% year on year to ¥24,705 million since the tax burden was reduced in connection with the completion of liquidation of an overseas subsidiary resolved in the year ended March 2014.

By segment, the Power Business Segment posted ¥24,200 million in net sales, a decrease of 11.1% year on year, and an operating loss of ¥3,119 million, compared to an operating loss of ¥2,109 million in the same period of the previous year. In the Ceramics Business Segment, net sales increased by 3.5% year on year to ¥122,630 million and operating income decreased by 0.3% year on year to ¥28,860 million. In the Electronics Business Segment, net sales increased by 1.3% year on year to ¥30,257 million and an operating income was ¥311 million, an increase of ¥281 million from the previous year. In the Process Technology Business Segment, net sales increased by 15.2% year on year to ¥52,492 million and operating income increased by 7.6% year on year to ¥9,676 million.

From the beginning of fiscal year ending March 31, 2019, following organizational changes, the segment classification of the NGK Group has been changed from the "Power Business Segment," "Ceramics Business Segment," and "Electronics Business Segment," to the "Power Business Segment," "Ceramics Business Segment," "Electronics Business Segment," and "Process Technology Business Segment." Figures in each business segment for the previous fiscal year have been restated to reflect the change in segment classification to facilitate year-on-year comparisons of business performance.

(2) Explanation of Financial Position

As of September 30, 2018, total assets were ¥867,467 million, an increase of ¥41,224 million from the previous fiscal year-end. This was mainly due to increases of tangible assets and inventories. Total liabilities increased by ¥15,912 million from the previous fiscal year-end to ¥369,292 million. This was mainly due to an increase in bonds payable. Total net assets stood at ¥498,175 million, or ¥25,312 million higher than the previous fiscal year-end, due to increases in retained earnings and foreign currency translation adjustment.

(3) Explanation of Forward-looking Statements including Forecasts for Consolidated Financial Statements

With regard to the financial forecasts for the full year ending March 31, 2019, both net sales and profits are expected to fall short of the previous forecasts due to the following factors. Although on the foreign exchange market the yen maintained a weaker tone compared to the previous assumption (USD 1/JPY 105, EUR 1/JPY125), in the Ceramics Business Segment, shipments of SiC-based diesel particulate filters (DPF) are decreasing in conjunction with the lower ratio of diesel passenger cars in Europe. Additionally, in the Power Business Segment, demand for insulators remains weak in Japan and abroad.

The consolidated financial results forecasts for the second half of the fiscal year assume that the yen trades at ¥110 to the U.S. dollar and ¥130 to the euro. (Average exchange rates during the period: ¥110 to the U.S. dollar and ¥130 to the euro)

Forecasts of consolidated financial results for the fiscal year ending March 31, 2019

(Millions of yen)

April1, 2018 - March 31, 2019	Net sales	Operating income	Ordinary income	Profit attributable to owners of parent	Profit per share (yen)
Previous forecast (A)	500,000	77,000	76,500	52,000	161.61
Revised forecast (B)	470,000	70,000	68,000	44,000	136.74
Change (B-A)	(30,000)	(7,000)	(8,500)	(8,000)	-
Change (%)	(6.0)	(9.1)	(11.1)	(15.4)	-
For Reference : Results from previous year (the year ended March 31, 2018)	451,125	70,026	70,615	45,814	142.42

Above financial results forecasts are based on information that are currently available and actual results may differ materially from those in the forecasts due to various factors.



2. Consolidated Financial Statements and Notes

(1) Consolidated Balance Sheet

(Millions of yen)

	As of September 30, 2018	As of March 31, 2018
Assets		
Current assets		
Cash and bank deposits	125,098	133,928
Notes and accounts receivable trade	97,624	104,029
Securities	73,481	68,428
Inventories	147,021	130,816
Other	19,806	18,855
Allowance for doubtful accounts	(129)	(123
Total current assets	462,902	455,93
Non-current assets		
Tangible assets		
Buildings and structures	87,788	76,33
Machinery and vehicles	133,830	123,16
Other	84,160	70,60
Total tangible assets	305,779	270,10
Intangible assets	3,902	3,65
Investments and other assets		
Investment securities	74,000	74,64
Other	21,031	22,04
Allowance for doubtful accounts	(148)	(145
Total investments and other assets	94,882	96,54
Total non-current assets	404,565	370,30
Total assets	867,467	826,243



(Millions of yen)

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	As of September 30, 2018	As of March 31, 2018
Liabilities		
Current liabilities		
Notes and accounts payable trade	45,896	46,55
Short-term borrowings	7,622	5,96
Current portion of long-term borrowings	10,392	10,57
Income taxes payable	※ 1 10,935	※ 1 16,50
Provision for NAS battery safety measures	2,209	2,56
Provision for loss related to competition law	1,353	1,17
Other	47,348	43,56
Total current liabilities	125,759	126,89
Long-term liabilities		
Bonds payable	25,000	10,00
Long-term borrowings	186,715	185,03
Net defined benefit liability	20,942	20,90
Other	10,875	10,53
Total long-term liabilities	243,533	226,48
Total liabilities	369,292	353,38
Net assets		
Shareholders' equity		
Common stock	69,849	69,84
Capital surplus	71,946	71,94
Retained earnings	340,567	322,62
Treasury stock	(12,136)	(12,153
Total shareholders' equity	470,225	452,26
Accumulated other comprehensive income		
Unrealized gain on available-for-sale securities	25,927	24,65
Deferred gain (loss) on derivatives under hedge accounting	10	(3.
Foreign currency translation adjustments	(2,919)	(7,990
Defined retirement benefit plans	(7,197)	(7,919
Total accumulated other comprehensive income	15,820	8,71
Stock acquisition rights	935	85
Non-controlling interests	11,192	11,02
Total net assets	498,175	472,86
Total liabilities and net assets	867,467	826,24



(2) Consolidated Statement of Income and Consolidated Statement of Comprehensive Income Consolidated Statement of Income

(Millions of yen)

		(ivillions of yen)
	Six months ended September 30, 2018	Six months ended September 30, 2017
Net sales	228,163	219,75
Cost of sales	156,717	150,96
Gross profit	71,445	68,78
Selling, general and administrative expenses	35,711	32,91
Operating income	35,733	35,87
Non-operating income		
Interest income	362	30
Dividend income	650	98
Foreign exchange gain	495	
Other	391	1,59
Total non-operating income	1,900	2,87
Non-operating expenses		
Interest expense	1,342	1,14
Equity in loss of unconsolidated subsidiaries and associated companies	622	91
Foreign exchange loss	-	14
Loss on valuation of derivatives	738	66
Loss on liquidation of subsidiaries and affiliates	388	1,45
Other	305	20
Total non-operating expense	3,398	4,53
Ordinary income	34,234	34,21
Extraordinary income		
Gain on sales of fixed assets	37	3
Gain on sales of investment securities	35	
Total extraordinary income	73	3
Extraordinary loss		
Loss on sales and disposals of fixed assets	234	46
Impairment loss	1,462	2,46
Provision of reserve for loss related to competition law	178	1,07
Total extraordinary loss	1,875	3,99
Income before income taxes and non-controlling interests	32,433	30,25
Income taxes - current	6,779	8,14
Income taxes - deferred	902	2,03
Income taxes - total	7,682	10,18
Profit	24,750	20,07
Profit attributable to non-controlling interests	45	28
Profit attributable to owners of parent	24,705	19,79



Consolidated Statement of Comprehensive Income

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	Six months ended September 30, 2018	Six months ended September 30, 2017
Profit	24,750	20,075
Other comprehensive income		
Unrealized gain on available-for-sale securities	1,271	3,560
Deferred gain (loss) on derivatives under hedge accounting	43	(43
Foreign currency translation adjustments	5,376	13,58
Defined retirement benefit plans	681	1,03
Share of other comprehensive income (loss) of associates accounted for by using the equity method	(120)	(64
Total other comprehensive income	7,252	18,075
Comprehensive income	32,002	38,15
Comprehensive income attributable to:		
Owners of parent	31,808	37,48
Non-controlling interests	193	66-



(3) Notes to Consolidated Financial Statements

(Note on the Assumption as a Going Concern)

Not applicable

(Significant Changes in Stockholder's Equity)

Not applicable

(Changes in Accounting Policy)

The NGK Group's subsidiaries reporting under IFRS have applied IFRS 15 "Revenue from Contracts with Customers" from the beginning of fiscal year ending March 31, 2019.

The impact of this change on profit or loss for the six months ended September 30, 2018 is insignificant.

The Group has adopted the approach of recognizing the cumulative effect of applying this standard at the date of initial application as permitted by transitional method of IFRS 15.

(Additional Information)

(Adoption of "ASBJ Guidance No. 28 Implementation Guidance on Tax Effect Accounting")

Effective from the beginning of fiscal year ending March 31, 2019, NGK adopted the "ASBJ Guidance No. 28 Implementation Guidance on Tax Effect Accounting". Accordingly, deferred tax assets were classified as Investments and other assets and deferred tax liabilities were classified as Long-term liabilities.

(Action filed for the revocation of correction and correction for the subsequent fiscal years based on transfer pricing taxation)

With respect to transactions between NGK and its Polish subsidiary from the fiscal year ended March 31, 2007 through the fiscal year ended March 31, 2010, NGK received a correction based on transfer pricing taxation issued by the Nagoya Regional Taxation Bureau in March 2012. While NGK made a payment of approximately ¥6.2 billion in tax penalties including local taxes, it filed a complaint. NGK later requested the Nagoya National Tax Tribunal to carry out an administrative review, and on June 24, 2016, received a written verdict, which partially rescinded the correction. However, it went only so far as to refund approximately ¥0.1 billion of corporation taxes and local taxes, etc. Believing that cancellation should be made in the full amount, NGK filed an action for revocation of the correction with the Tokyo District Court on December 20, 2016.

While NGK believes that it could still take a considerable amount of time before judgment is passed on the claim, on June 23, 2017 NGK received a correction notice based on transfer pricing taxation for the fiscal year ended March 31, 2011 through the fiscal year ended March 31, 2015. Accordingly, based on the premise that NGK would be subject to the said correction for the fiscal year ended March 31, 2016 and the fiscal year ended March 31, 2017 as well, ¥8.5 billion in tax penalties for fiscal years from March 31, 2011 through March 31, 2015, and estimated tax amounts for the fiscal year ended March 31, 2016 and the fiscal year ended March 31, 2017 were added and factored into the financial statements for the fiscal year ended March 31, 2017. In addition, estimated tax amounts for the fiscal years subsequent to March, 2018 were recognized to the financial statement as necessary.

(Other Notes)

(Consolidated Balance Sheet)

★1. Income taxes payable

With respect to transactions between NGK and its Polish subsidiary, NGK received a correction notice based on transfer pricing taxation on June 23, 2017. Therefore, the amount includes estimated tax amounts based on the premise that NGK would be subject to the said correction for the fiscal years subsequent to March, 2016.

2. Contingent liabilities

The NGK Group is subject to an international investigation on the situation of competition. Since the receiving of a subpoena by a U.S. subsidiary of NGK from the U.S. Department of Justice (DOJ) in 2011, NGK has cooperated in the investigation concerning ceramic substrates for catalytic converters including establishing the Independent Committee in 2012. In September, 2015, NGK entered into a Plea Agreement with DOJ, agreeing to pay a fine of US\$65.3 million based on charges that it violated U.S. laws including the antitrust law in connection with some transactions for ceramic substrates for catalytic converters, and paid the total amount in November 2015. We have entered into negotiations for compensation for damages with the relevant customers. In addition to some customers requiring monetary compensation, civil lawsuits (class action) have also been filed.

In consideration of such progresses, the NGK Group made an estimate of potential losses, and recognized the estimated amount as of the end of six months ended September 30, 2018, as "provision for loss related to competition law," however, additional losses may arise with the emergence of new facts. Overall details of the investigation and negotiations are not disclosed because they may put the NGK Group at a disadvantage.



(Segment Information)

(1) Six months ended September 30, 2018 (from April 1, 2018 to September 30, 2018)

(Millions of yen)

	Business Segment				Elimination		
	Power	Ceramics	Electronics	Process Technology	Total	or Adjustment	Consolidated
Sales							
Sales to customers	24,177	122,628	30,257	51,100	228,163	-	228,163
Intersegment sales	22	2	-	1,392	1,416	(1,416)	-
Total sales	24,200	122,630	30,257	52,492	229,580	(1,416)	228,163
Operating income (loss)	(3,119)	28,860	311	9,676	35,729	4	35,733

(Notes) Elimination or adjustment of operating income (loss) is an adjustment of intersegment transactions.

(2) Six months ended September 30, 2017 (from April 1, 2017 to September 30, 2017)

(Millions of yen)

	Business Segment					Elimination	
	Power	Ceramics	Electronics	Process Technology	Total	or Adjustment	Consolidated
Sales							
Sales to customers	27,216	118,491	29,864	44,180	219,754	-	219,754
Intersegment sales	14	5	-	1,404	1,423	(1,423)	-
Total sales	27,230	118,497	29,864	45,585	221,178	(1,423)	219,754
Operating income (loss)	(2,109)	28,960	29	8,990	35,870	4	35,874

(Notes) Elimination or adjustment of operating income (loss) is an adjustment of intersegment transactions.

(3) Changes in Segments

From the beginning of fiscal year ending March 31, 2019, following organizational changes, the segment classification of the NGK Group has been changed from the "Power Business Segment," "Ceramics Business Segment," and "Electronics Business Segment" to the "Power Business Segment," "Ceramics Business Segment," and "Process Technology Business Segment." Figures in each business segment for the previous fiscal year have been restated to reflect the change in segment classification to facilitate year-on-year comparisons of business performance.