

JX Holdings IR Materials

1. Second Medium-Term Management Plan (FY2013-2015)
and Long-Term Vision (FY2020)

Become a world's leading integrated energy, resources and materials business group
-Start a leap forward-

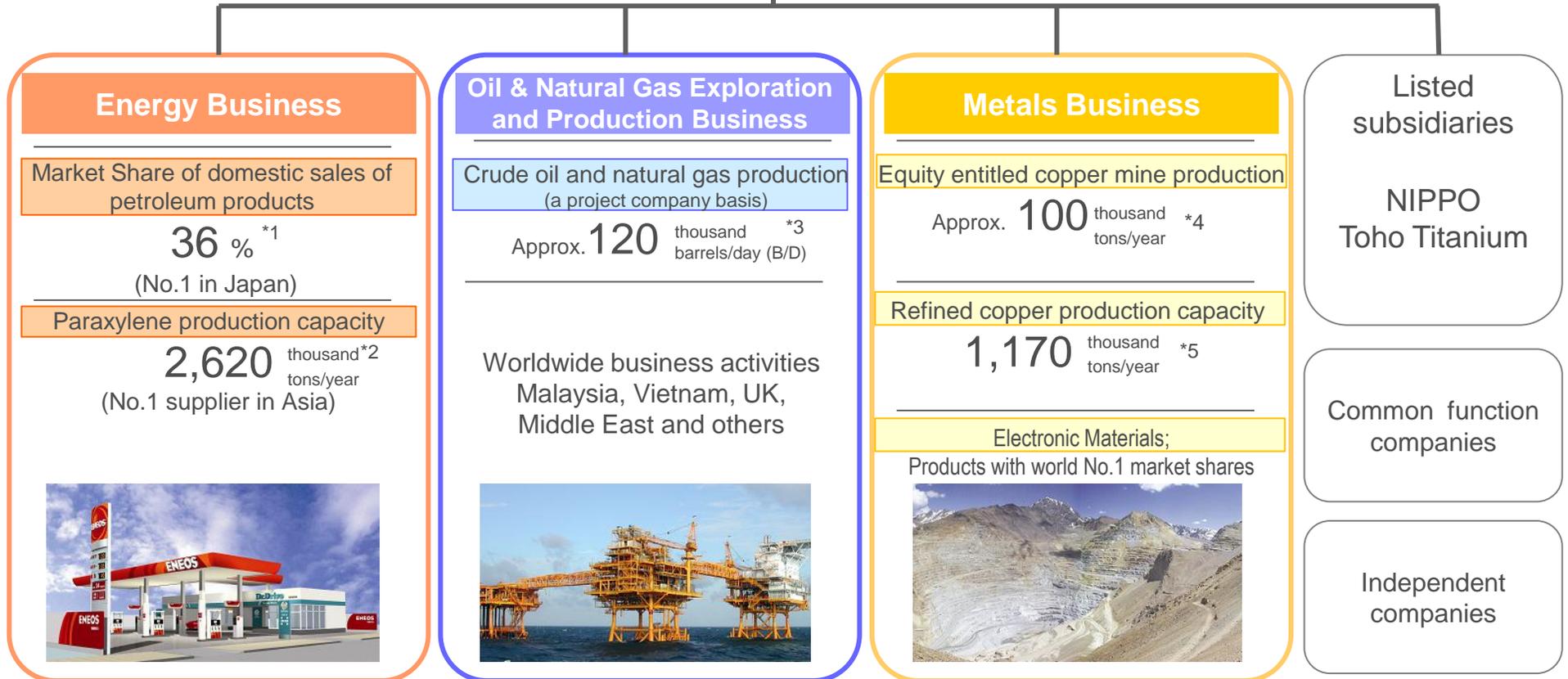
November, 2013



Businesses Summary of JX Group



JX Holdings, Inc.



*1 FY 2012 actual

*2 As of Mar. 2013

*3 Crude Oil Equivalent (Average daily production from Jan. to Dec. 2012)

*4 Production from Jan. to Dec 2012

*5 Pan Pacific Copper(66.0% equity stake) ; 610 thousand tons/year + LS-Nikko Copper(39.9% equity stake) ;560 thousand tons/year (As of Mar. 2013)

1. Summary of 1st Medium-Term Management Plan (FY2010-2012)	3 - 5
2. Outline of 2nd Medium-Term Management Plan(FY2013-2015)	6 - 14
3. Strategy and Action Plan by Segments in 2nd Medium-Term Management Plan	
Energy Business	15 - 16
Oil & Natural Gas Exploration and Production Business	17 - 18
Metals Business	19 - 20
4. Long-Term Vision (FY2020)	21 - 24
5. Supplementary Information	25 - 30

1. Summary of 1st Medium-Term Management Plan



Policy 1 : Dramatical Transformation in Petroleum Refining & Marketing Business

✓ Capacity Reduction Plan

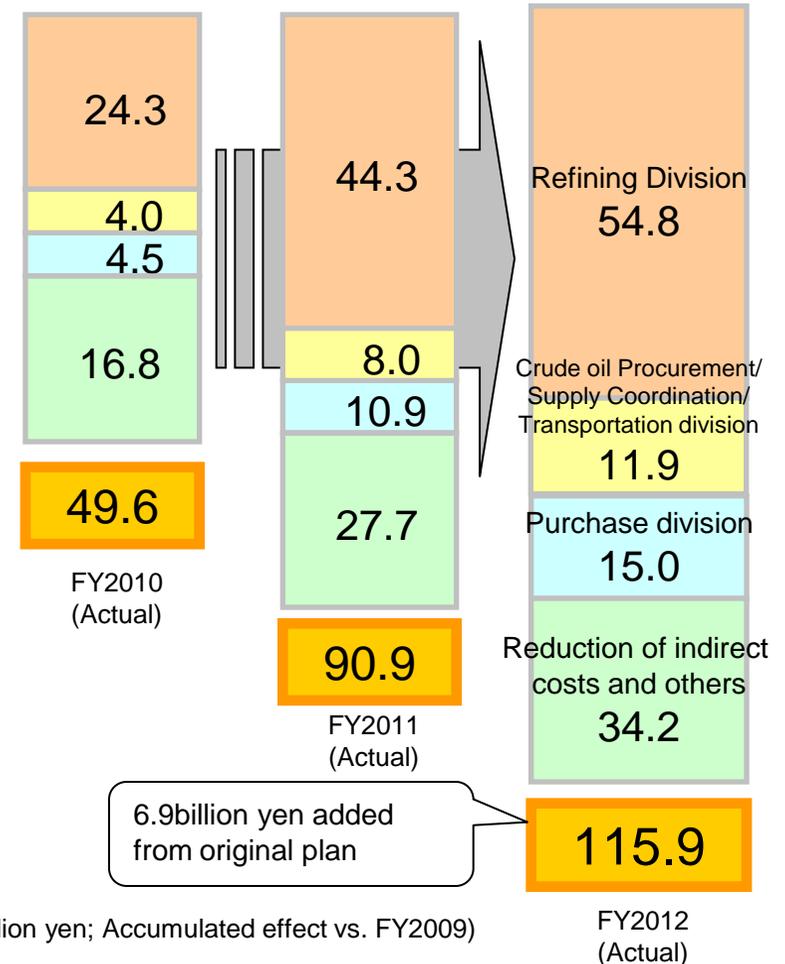
(JX)
2008.Dec. 2014.Apr.
1,790 ⇒ 1,210 thousand BD

(Ref. Japan Total)
2008.Dec. 2014.Apr.
4,830 ⇒ 3,720 thousand BD

	Refinery	Due Date	Reduction Capacity	Completion
STEP1	Toyama	March, 2009	(60) thousand B/D	<input checked="" type="checkbox"/>
	Kashima	May, 2010	(21)	<input checked="" type="checkbox"/>
	Oita	May, 2010	(24)	<input checked="" type="checkbox"/>
	Mizushima	June, 2010	(110)	<input checked="" type="checkbox"/>
	Osaka	October, 2010	(115) Convert to exportation refinery	<input checked="" type="checkbox"/>
	Negishi	October, 2010	(70)	<input checked="" type="checkbox"/>
Subtotal			(400)	
STEP 2	Muroran	March, 2014	(180)	<input type="checkbox"/>
Total			(580)	

Corresponded to Sophistication of Energy Supply Structure Act

✓ Integration Synergies and Enhanced Efficiency of Refineries



1. Summary of 1st Medium-Term Management Plan

Policy 2 : Allocate Management Resources to Highly Profitable Operations on a Priority Basis

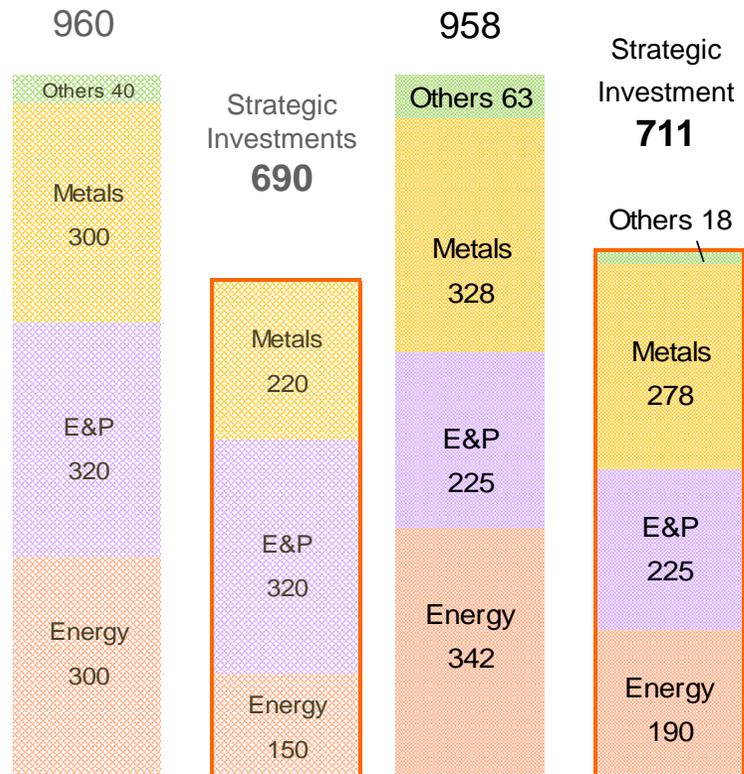


1st Mid-Term Mgt. Plan(2010-2012) CAPEX

Unit : billion yen

Original Plan

Actual



<Main contents of strategic investments>

Energy

- Establishing the most-competitive structure for petroleum refining and marketing in domestic market
 - Restructuring and strengthening network of service station
 - LNG Terminal (Mizushima, Hachinohe, Kushiro)
- Strengthening overseas business operations, focusing on Asia
 - Paraxylene and lubricant base oil projects in Korea
 - Expansion of lubricants business (Indonesia, Vietnam etc.)
 - Acquisition of coking coal interests in Canada

E&P

- Exploration : Acquisition of large operator projects
(Malaysia deepwater block R offshore Sabah, Qatar block A)
- Development : Papua New Guinea LNG project
- Resource acquisitions : Assets purchase in UK

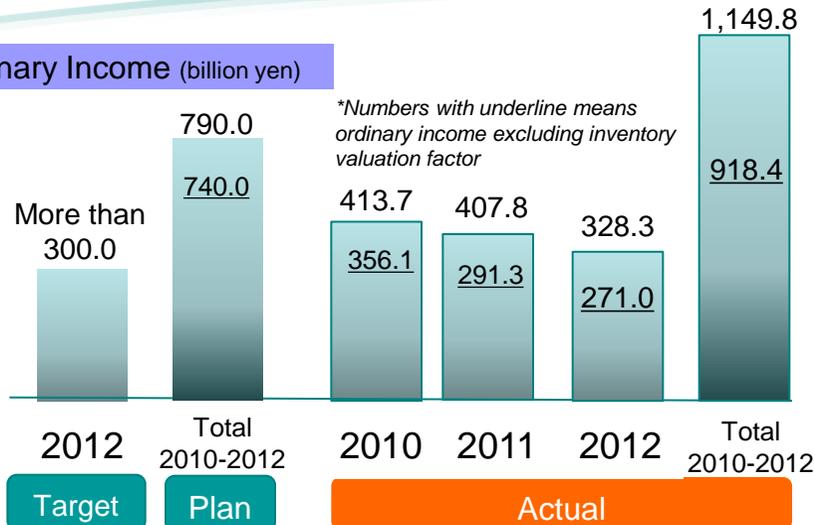
Metals

- Establishing highly profitable and well-balanced business structure between resources development and smelting and refining business
 - Expansion of Caserones Copper Mine.
 - Acquisition of Frontera exploration interests (Chile and Argentina)
- Improving profitability of electric materials satisfying high-growth automobile components market needs
 - Expansion of Cathode materials capacity for lithium-ion batteries
 - Construction of Kakegawa Works, integrated manufacturing process of connectors.



Review of Target

Ordinary Income (billion yen)

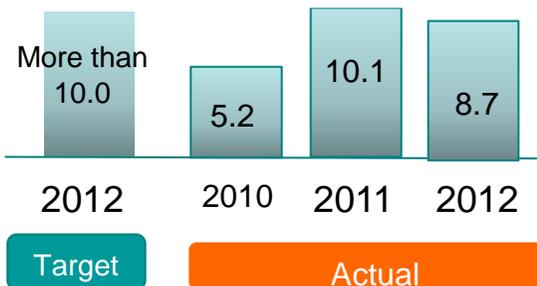


Realized a business structure generating 300 billion yen of ordinary income continuously

- Improvement of domestic petroleum margin
- Profit growth in upstream business benefited from high crude and copper prices

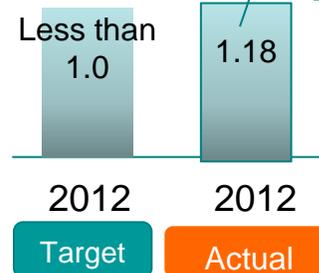
ROE(%)

**Excluding negative goodwill of merger regarding FY2010*



Built a base for realizing 10% of ROE continuously despite effect of positive inventory valuation

Net D/E Ratio



Target unaccomplished because of earthquake related restoration expenses and working capital increase due to crude and copper price rise

Increased cash out

- Earthquake related restoration expenses: 100billion yen
- Working capital increase: 700 billion yen

Factors of working capital increase

FY2012		
	Plan	Actual
Crude Oil (\$/bbl)	80	109
Copper (¢ /lb)	280	356

Business Environment

★ Domestic Environment

- Population decrease and deindustrialization hold economic growth low
- Structural decline of petroleum products demand continues
- Reformulation of energy policy by Japanese government progresses

★ Worldwide Environment

- Emerging countries lead growth, globalization and Information Technology proceeds
- Demand of energy, resources, materials expands mainly in Asia
- Resources and energy prices stay high, but volatile.
- Shale gas and oil revolution makes progress.
- Concerns over global environmental problems increase, and movement to low-carbon and recycling-oriented society progresses



Uncertainty of business environment increases around energy, resources and materials business.



Basic Policy

On the premise of establishment both of proper governance backed with thorough compliance and CSR implement structure

Profitability

- Securing stable profitability in existing business by realizing overwhelming competitiveness through continuous restructuring and stable operation
- Realizing return from invested projects

⇒P10

Growth

- Allocating management resources to highly profitable and developing operations on priority basis

⇒P12

Flexibility

- Structuring stronger balance sheet corresponding to business environmental change

⇒P13

Realizing high profit and high ROE continuously

Strengthening risk tolerance

Maximize group corporate value

Become a world's leading integrated energy, resources and materials business group

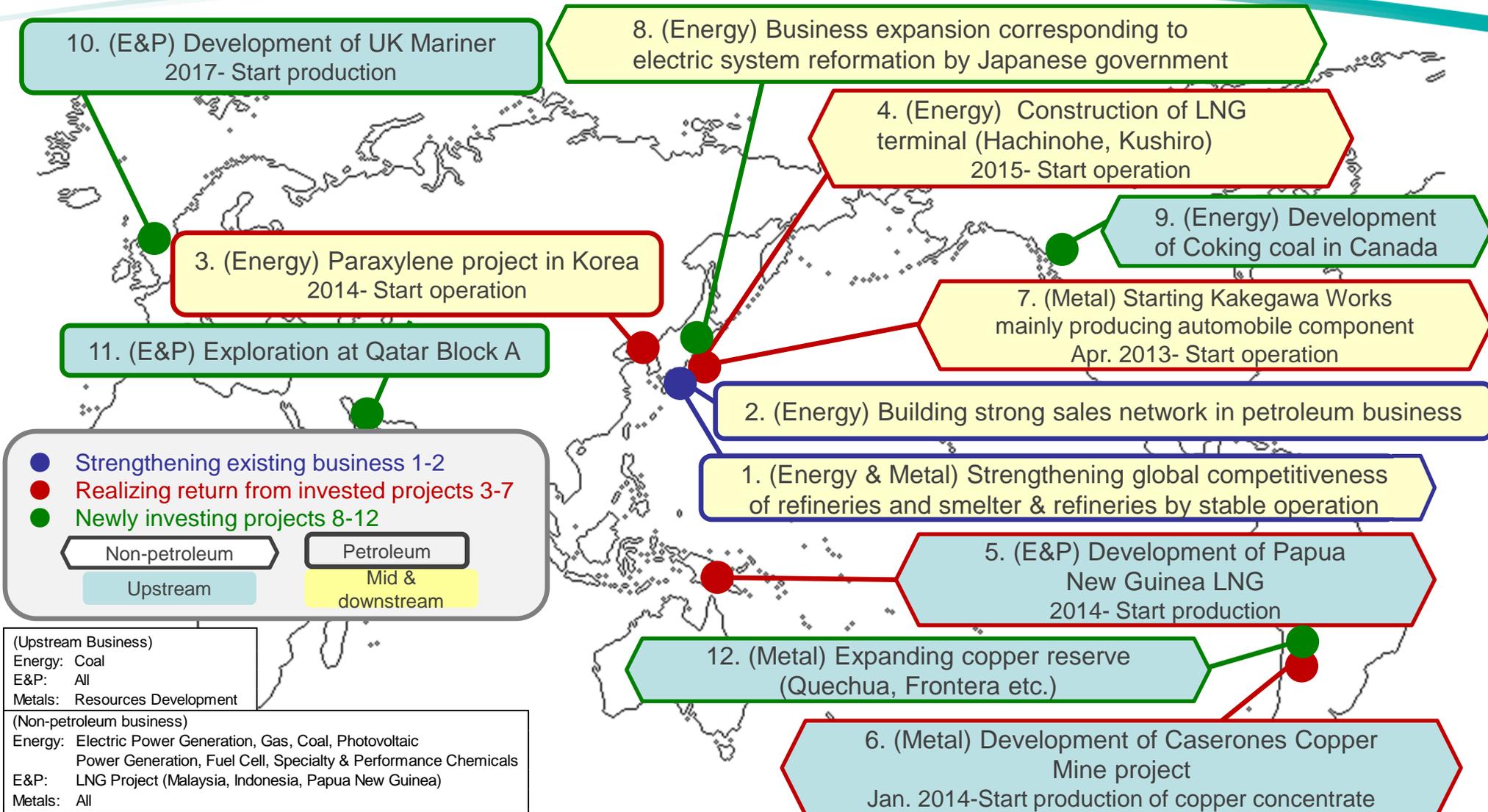


Key Factors and Targets

Key Factors (FY2015)	Exchange Rate	90 yen/\$	
	Crude Price(Dubai spot)	110 \$/bbl	
	Copper Price(LME)	360 ¢/lb	
Target	2 nd Mid-Term Mgt. Plan		(Reference) 1 st Mid-Term Mgt. Plan
	Ordinary Income	400 billion yen or more (FY2015)	300 billion yen or more (FY2012)
	ROE	10% or higher (FY2015)	10% or higher (FY2012)
	Net D/E Ratio	0.9 times or lower (FY2015)	1.0 times or lower (FY2012)
	CAPEX (plan)	1,300 + α billion yen (FY2013-2015 total)	960 billion yen (FY2010-2012 total)
*Utilizing “α” for additional strategic investment project corresponding to business environmental change			



Highlight of Major Projects



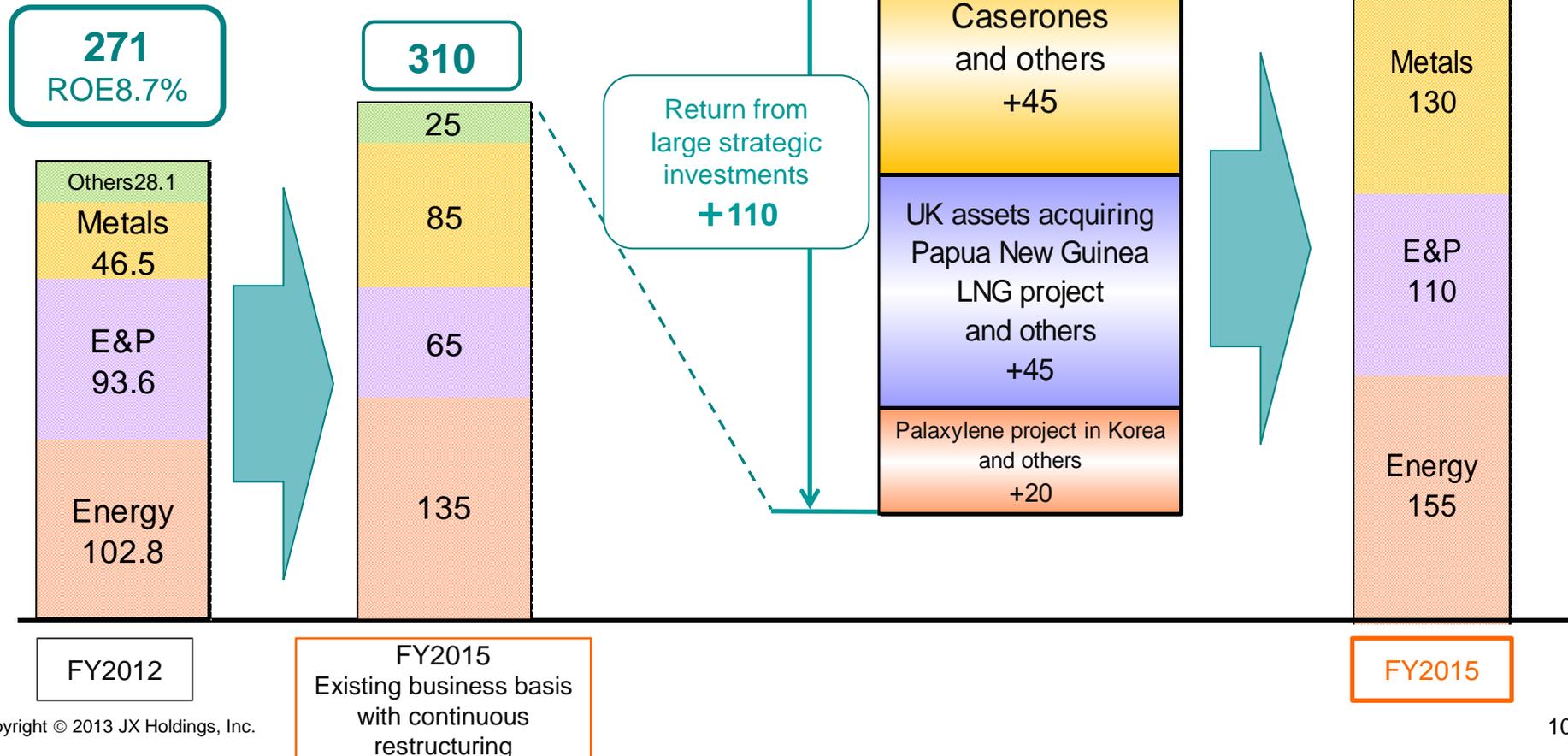


Earnings Plan (Ordinary Income Excluding Inventory Valuation Factor) (Unit : billion yen)

Securing stable profitability in existing business by realizing overwhelming competitiveness through continuous restructuring

Realizing return from strategic investment for business expansion

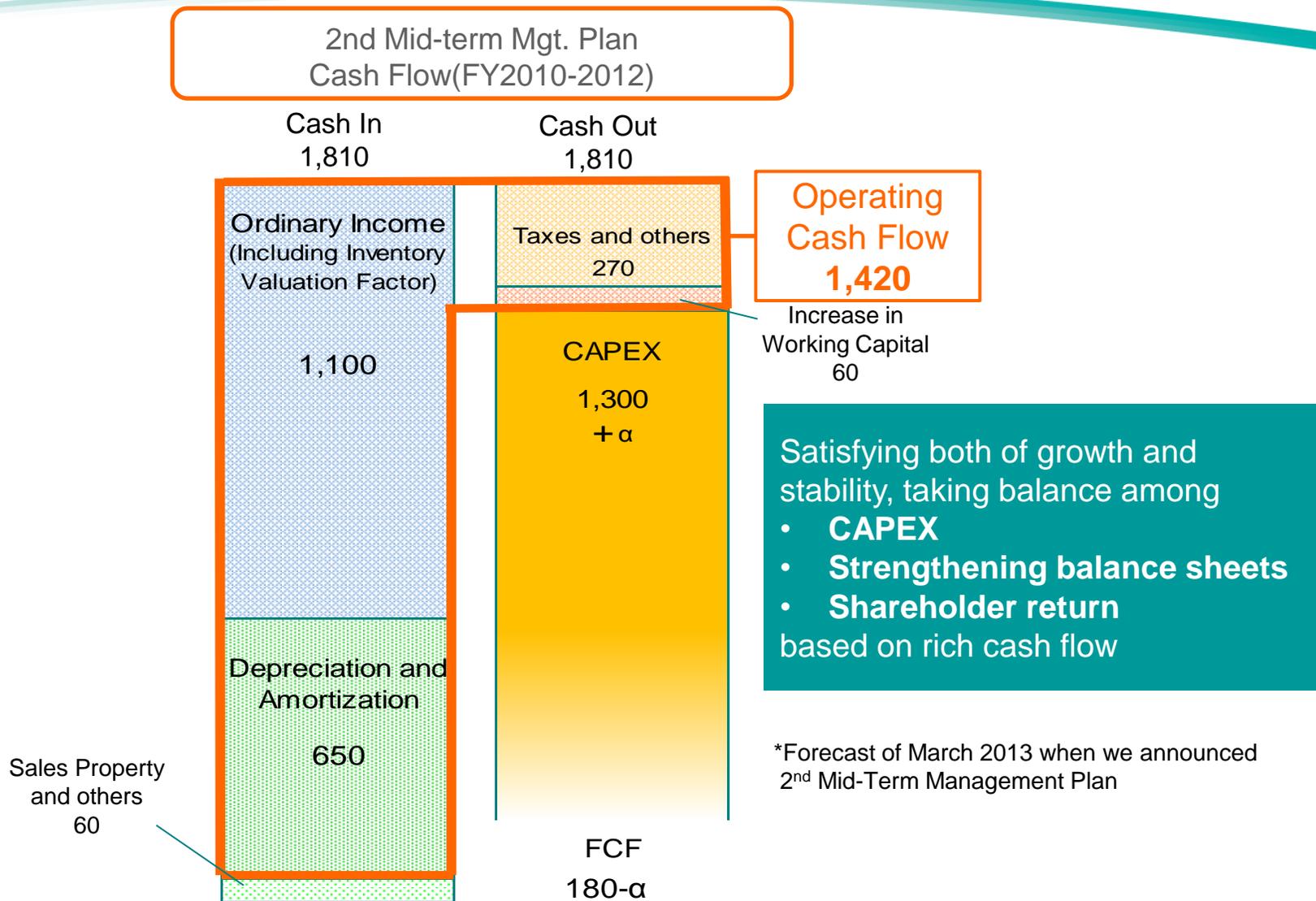
420
ROE more than 10%





Cash Flow Plan (FY2013-2015 total)

(Unit : billion yen)

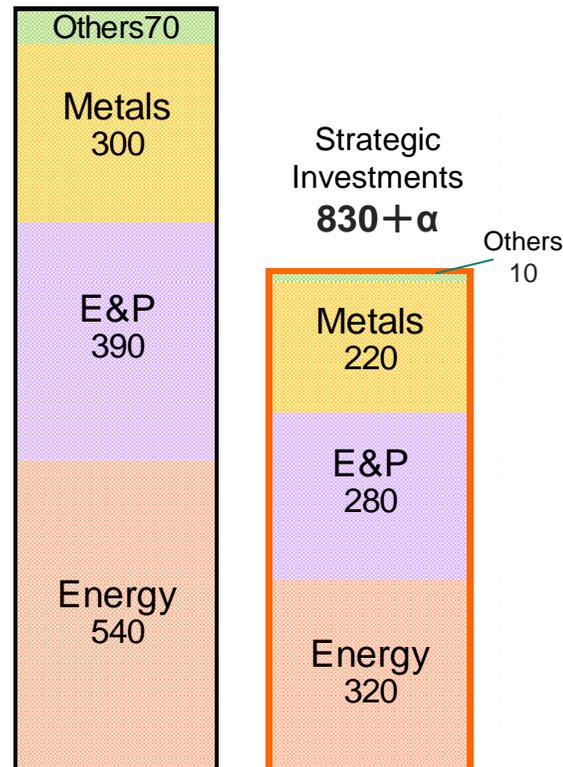


CAPEX Plan (FY2013-2015)

(Unit : billion yen)

2nd Mid-Term Mgt. Plan (2013-2015) CAPEX

1,300+α



<Main contents of strategic investments>

Energy

- Petroleum Refining and Marketing :
 - Energy saving in refineries
 - Utilization of bottom oil (Install of SDA)
 - Muroran refinery(Convert to chemical factory)
 - Building strong sales network
- Electricity : Investment on Electric power facility (Using SDA pitch)
- Gas : Construction of LNG terminal (Hachinohe, Kushiro)
- Coal : Development of coking coal in Canada
- Basic Chemical Products : Paraxylene project in Korea
- Lubricants : Base oil project in Korea
- Specialty & Performance Chemical Products : Functional Chemicals

E&P

- Exploration :
 - Qatar block A
- Development :
 - UK Mariner
 - Papua New Guinea LNG
- Resource acquisition : Severely select and execute

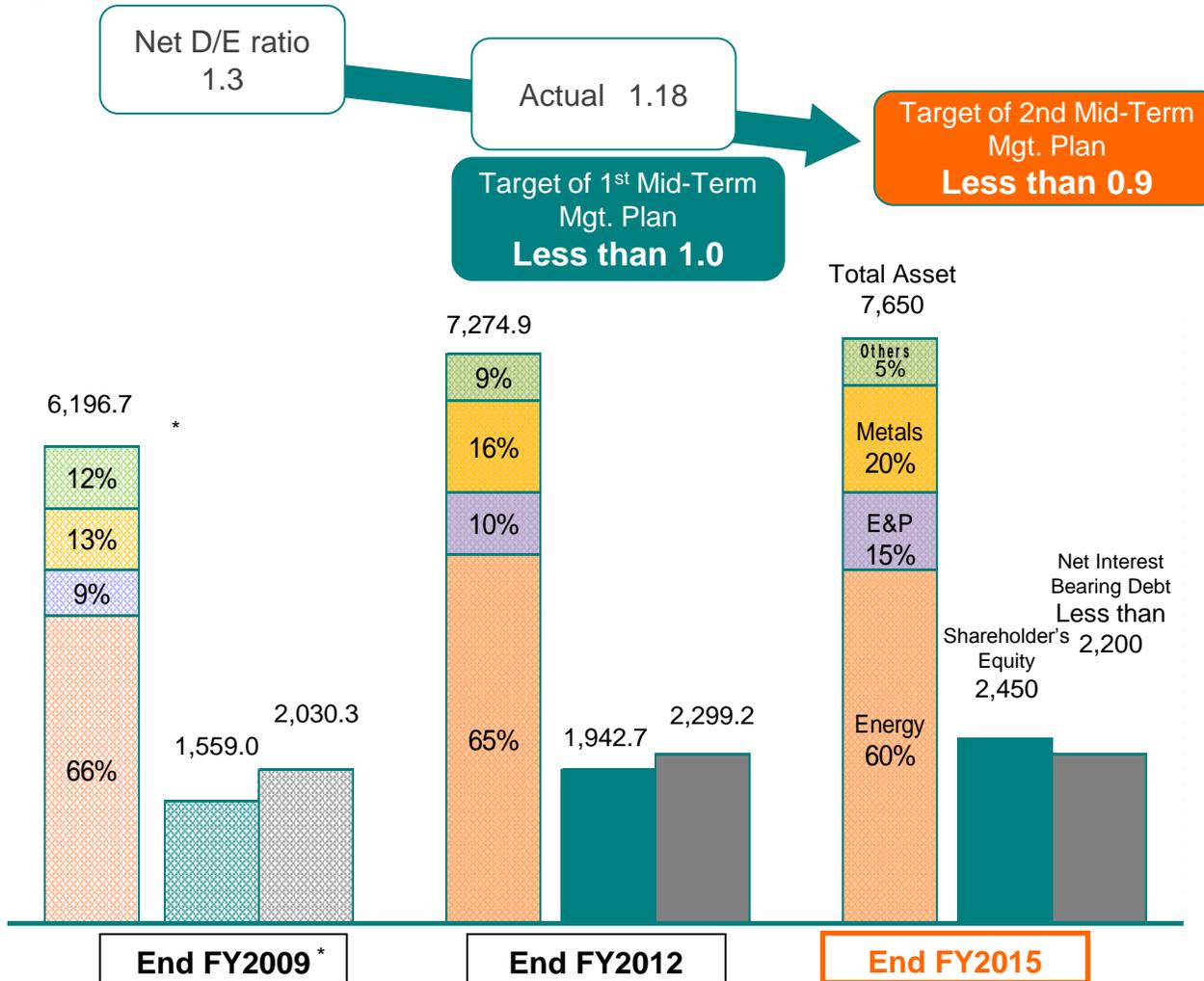
E&P

- Resource Development :
 - Development of Caserones
 - Proceeding exploration and FS of Quechua, Frontera, and others
- Electronic Materials, Recycling & Environmental Services :
 - Enhancing overseas business



Reinforcement of Financial Base

(Unit : billion yen)



Business Portfolio	Business Environment
Risk asset ratio increase (Upstream business asset)	Increase of uncertainty

Required stronger financial base with risk tolerance

Net D/E Ratio
Less than 0.9 times by FY2015

*Asset segment ratio, as of Sep.2010



Shareholder Return Policy

Basic Shareholder Return Policy

Redistribute profits by reflecting consolidated business results while striving to maintain stable dividends

Indication of Shareholder Return for 2nd Medium-Term Management Plan Period

Based on the basic policy, during the 2nd medium-term management plan period (FY2013-2015), we will strive to maintain dividends of 16 yen per share per annum, while considering shareholder return in view of such factors as business results, investment plans and financial position for each term.

Reference) Dividend from FY2010-2013

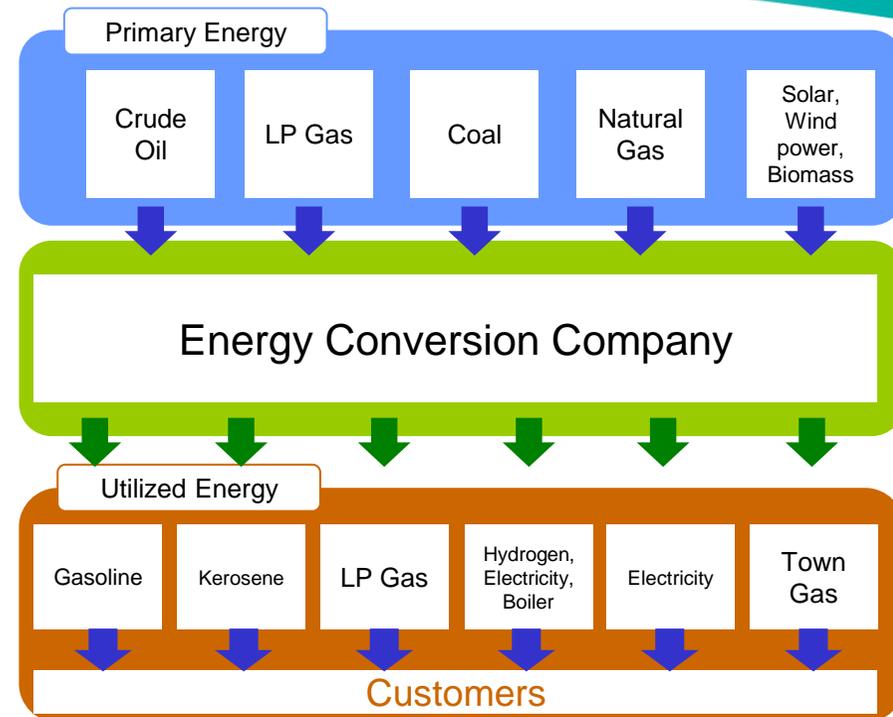
	2010	2011	2012	2013 (forecast)
Dividend (yen/share)	15.5	16.0	16.0	16.0

Petroleum Refining & Marketing/Energy Conversion

Business Environment	Domestic petroleum demand decline and competition with import products continue
Basic Strategy	Strengthening profitability of refining & marketing
<ul style="list-style-type: none"> ➤ Strengthening global competitiveness of refineries <ul style="list-style-type: none"> • Safe and Stable operation • Cost reduction (Energy saving, Utilizing for bottom oil) • Conversion to chemical factory ➤ Establishing strong supply chain <ul style="list-style-type: none"> • Building strong sales network • Improving brand value (Introduce new Dr. Drive brand, Card strategy, etc.) 	

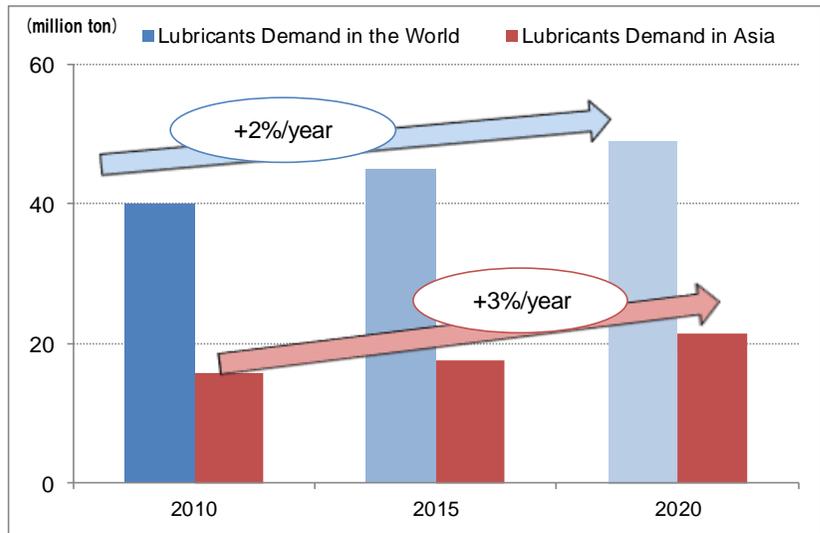
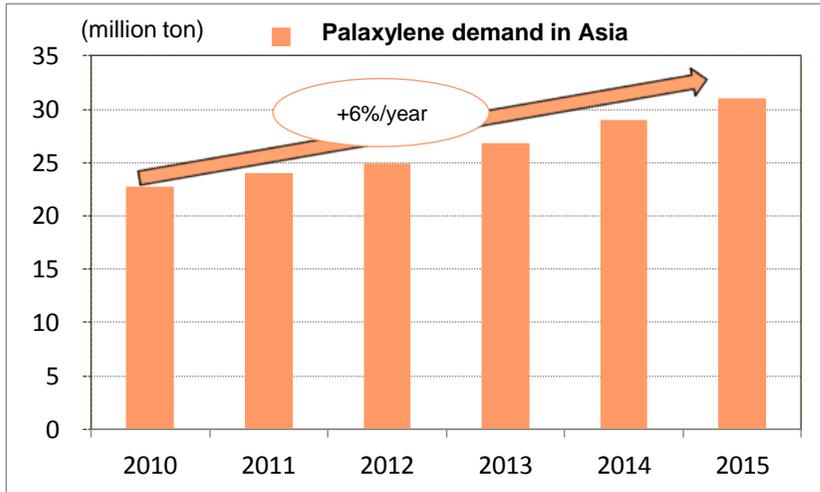
Business Environment	Reformation of energy policy by Japanese government progress
Basic Strategy	Enhancing business as an energy conversion company

- Electricity : Business expansion corresponding to electric system reformation by Japanese government
- Gas : Construction of LNG terminal (Hachinohe & Kushiro) starting operation in 2015 (Enhancing providing base, Acquiring new demand)
- Coal : Development of coking coal in Canada , Increasing domestic sales
- Solar, Fuel Cell : Mega solar project, fuel cell business (Challenge for realizing a society with independent and distributed energy system)
- Hydrogen : Bring forward demonstration test of providing infrastructure





Basic Chemicals/Lubricants/Specialty & Performance Chemicals



Business Environment	Energy and materials market continues to expand centering in Asia
Basic Strategy	Establishing presence in overseas market
<ul style="list-style-type: none"> ➤ Basic Chemicals <ul style="list-style-type: none"> • Palaxylene project in Korea (Starting operation in 2014) (Providing capacity of JX Group : 2,620 → 3,120 thousand ton) • Corresponding to business environmental change in olefins and aromatics ➤ Lubricants <ul style="list-style-type: none"> • Enhancing business with base oil project in Korea • Strengthening production and marketing network overseas 	
Business Environment	Demand of high value-added products increases in emerging countries
Basic Strategy	Acquiring demand of high value-added products based on original technology
<ul style="list-style-type: none"> ➤ Specialty and Performance Chemicals <ul style="list-style-type: none"> • Expanding overseas production network • Increasing sales volume of cell incubation and others 	

Expanding Reserves and Production Volume Mainly through Exploration



Business Environment

- Crude oil and natural gas demand increases firmly centered on emerging countries.
- Resources and energy prices stay high but volatile.
- Competition for natural resources escalates.
- Development technologies become more challenging.

Basic Strategy 1

Expanding reserves and production volume mainly through exploration

Toward production volume of 200 thousand BD in 2020

- Shifting developing projects to production and projects before FID to developing

(On developing)

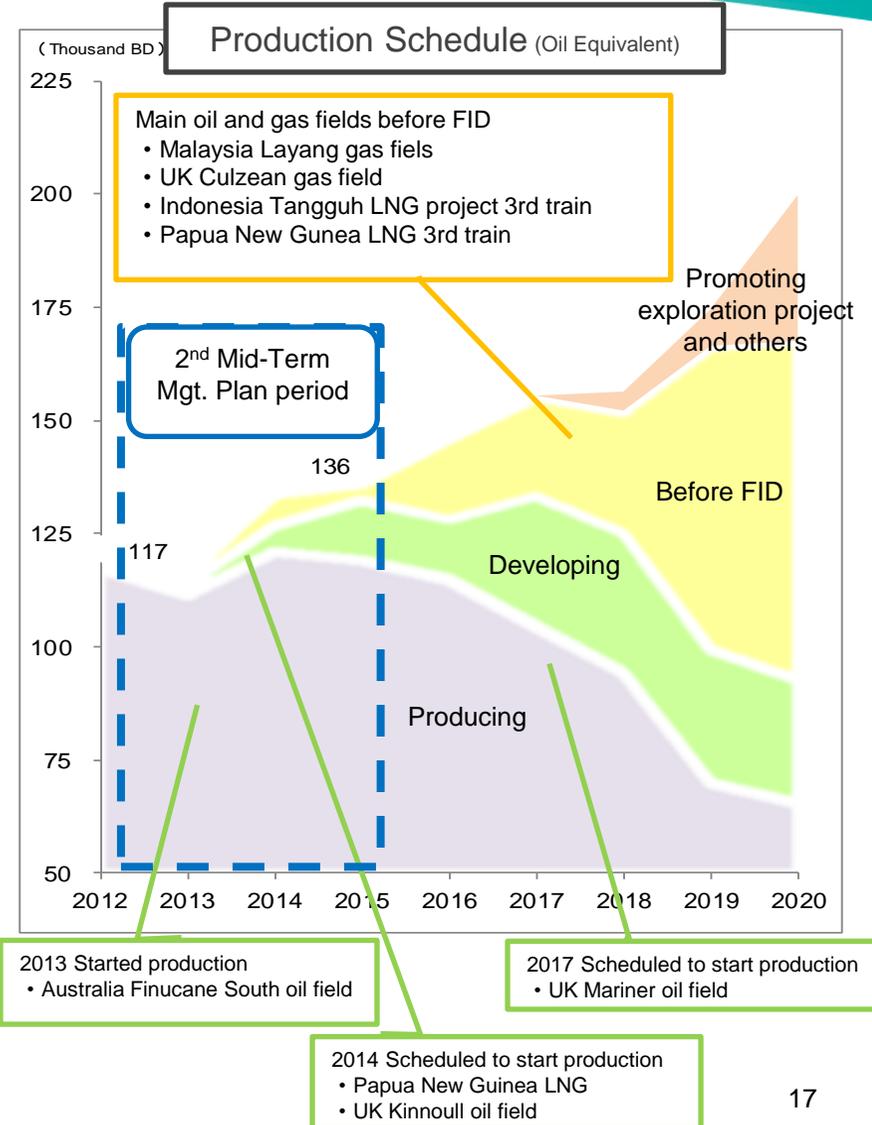
- Papua New Guinea LNG project
- UK Mariner oil field

(Before FID)

- UK Culzean gas field
- Indonesia Tangguh LNG project 3rd train

- Promoting large exploration operator projects (Investing 90billion yen in 3years)

- Malaysia : Block SK333, Deepwater Block R offshore Sabah
- Qatar : Block A



Focusing on Core Business Area and Technology/Restructuring Business Portfolio

Basic Strategy 2

Establishing superiority by focusing core business area and technology

Aiming to secure independence and increase access to business chance by allocating management resources to core and core candidate countries and accumulating technology through operator projects

Core Area

- Core countries: Malaysia, Vietnam, UK
 - Continuing exploration, development and resource acquisition utilizing knowledge and relationship with national petroleum companies etc.
- Core candidates : UAE/Qatar, Myanmar, Australia
 - To be developed as core countries acquiring business chance aiming for operatorship and strengthening business base

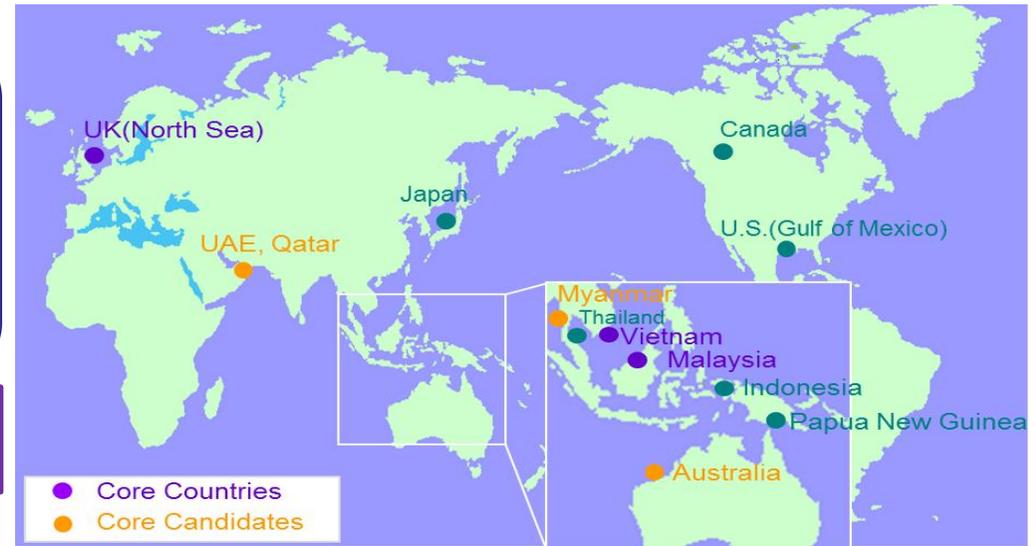
Core Technology

- Deepwater
 - Malaysia Deepwater Block R offshore Sabah
 - UK West of Shetland offshore
- Enhanced Oil Recovery
 - Vietnam Rang Dong Oil Field HCG-EOR
- Tight Oil, Tight Gas
 - Qatar Block A

Basic Strategy 3

Restructuring business portfolio responding to business environmental change

Rearranging asset portfolio timely

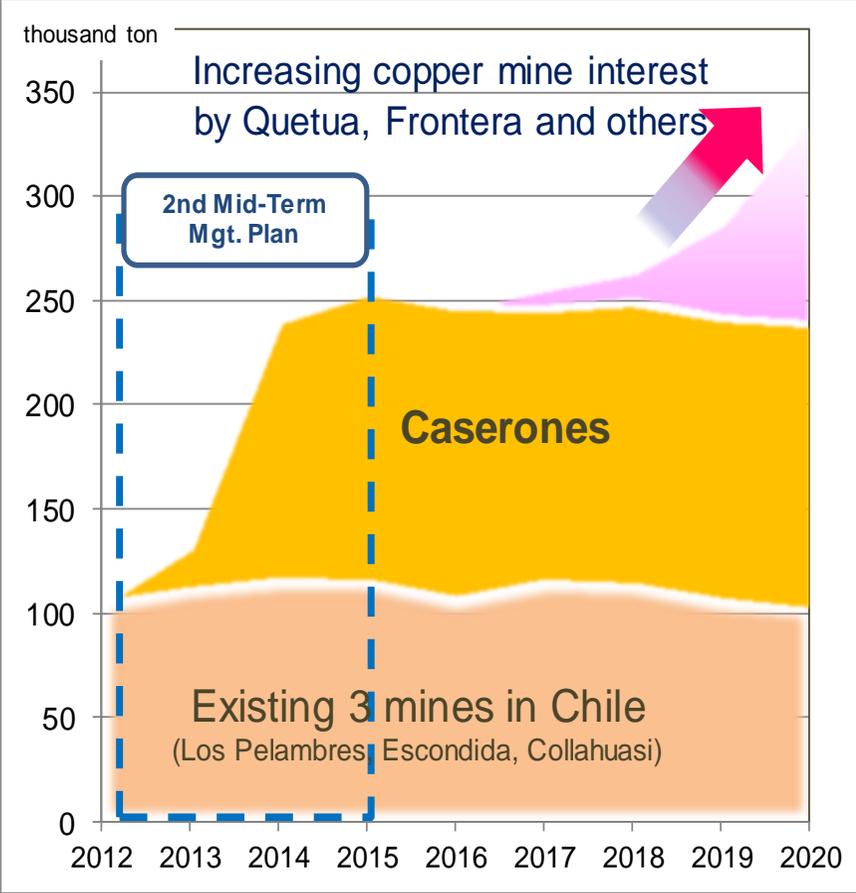




Resource Development

Business Environment	<ul style="list-style-type: none"> Copper demand increases centered on Asia. Copper price stays at high level 																																																																																				
Basic Strategy	Establishing highly profitable structure by enhancing copper mine interest																																																																																				
<ul style="list-style-type: none"> Aiming 350 thousand ton per year of copper mine interest <ul style="list-style-type: none"> Caserones : Jan. 2014 - Start production of copper concentrate Reconsidering Quechua (Peru) development Promoting exploring Frontera(Chile/Argentina) 																																																																																					
<table border="1"> <thead> <tr> <th></th> <th>2006</th> <th>07</th> <th>08</th> <th>09</th> <th>10</th> <th>11</th> <th>12</th> <th>13</th> <th>14</th> <th>15</th> <th>16</th> </tr> </thead> <tbody> <tr> <td>Caserones</td> <td></td> <td>●</td> <td>●</td> <td></td> <td>●</td> <td></td> <td></td> <td></td> <td>→</td> <td></td> <td></td> </tr> <tr> <td></td> <td></td> <td>Acquired interest</td> <td>Started FS</td> <td></td> <td>FID</td> <td></td> <td></td> <td></td> <td>Start production</td> <td></td> <td>Untill 2040</td> </tr> <tr> <td>Quechua</td> <td></td> <td>●</td> <td></td> <td>●</td> <td></td> <td>→</td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td></td> <td></td> <td>Acquired interest</td> <td></td> <td>Started FS</td> <td></td> <td>Finished FS</td> <td></td> <td></td> <td></td> <td>(Considering development)</td> <td></td> </tr> <tr> <td>Frontera</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>●</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>Acquired interest</td> <td></td> <td></td> <td>(Additional exploring)</td> <td></td> </tr> </tbody> </table>			2006	07	08	09	10	11	12	13	14	15	16	Caserones		●	●		●				→					Acquired interest	Started FS		FID				Start production		Untill 2040	Quechua		●		●		→								Acquired interest		Started FS		Finished FS				(Considering development)		Frontera							●												Acquired interest			(Additional exploring)	
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Business Environment	Capital intensification and oligopolization of resource developers proceeds more challenging technology and funds for mine development																																																																																				
Basic Strategy	Acquiring mining interest utilizing original technology																																																																																				
<ul style="list-style-type: none"> Developing next-generation smelting technology <ul style="list-style-type: none"> Nikko Chloride Process (N-Chlo Process): Studying applying outcome of pilot plant in Australia to gold concentrate Bio mining :Continuing study at Radomiro Tomic copper mine in Chile 																																																																																					

Copper mine interest





Smelting & Refining

Business Environment Drastic improvement of TC/RC is hardly expected though mine development proceeds.

Basic Strategy **Establish business structure that has world top-class cost competitiveness**

- Safe and stable operation
- Improving smelting margin
 - Improving production efficiency using copper concentrate from Caserones.
 - Using high margin materials.
 - Starting 2 operation of 2nd copper concentrate and sulfuric acid careers.

Electronic Materials

Business Environment Electronic materials demand increases in cutting-edge IT, automobile, medical fields etc.

Basic Strategy **Securing world's top share in each product market**

- Realizing early monetization of integrated connector production business (2013.4 Kakegawa Works start operation) and cathode materials business for lithium-ion batteries
- Improving profitability by developing new fields and materials
 - Ultra-thin electro-deposited copper foil, High-functional precision rolled products, Sputtering target for OELD, Sputtering targets for next generation LSIs, Materials for ray sensor

Recycling & Environmental Services

Business Environment Demand for related materials and resource recycling expands in line with growing concerns for eco social needs

Basic Strategy **Building international resource recycling business with environmental-friendly zero emission system**

- Enhancing collecting ability of recycled materials overseas : Development to US market
- Enhancing new business : Recycling lythium-ion batteries. Detoxication of materials containing a little PCB
- Consolidating production site metal by metal and cost reduction

4. Long-Term Vision

Become a World's Leading Integrated Energy, Resources and Materials Business Group



Group mission statement

JX Group will contribute to the development of a sustainable economy and society through innovation in the areas of energy, resources and materials

Target of JX Group (2020)

Become a world's leading integrated energy, resources and materials business group

1. Corporate group holding competitive businesses evaluated by global standards
2. Well-balanced businesses portfolio
petroleum and non-petroleum, upstream and mid & downstream businesses

JX Group Values

Our actions will respect the **EARTH**

Ethics

Advanced ideas

Relationship with society

Trustworthy products/services

Harmony with the environment

Target of JX Group (2020)

1. Corporate group holding competitive business evaluated by global standards

Energy

Become a “Energy Conversion Company” providing energy stably and efficiently

- Generating stable profitability in refining & marketing
 - Establishing competitive supply chain (Refining, logistics, marketing)
- Establishing integrated energy supply structure
 - Electricity, Gas, Coal, Solar, Fuel Cell, Hydrogen
- Enhancing business in growing market
 - Basic Chemicals, Lubricants, Specialty & Performance Chemicals

Oil and Natural Gas E&P

Become a sustainably growing E&P company mainly through operatorship

- Toward production volume of 200 thousand B/D
- Utilize worldwide human resources and knowledge efficiently
- More than 100% of reserve replacement ratio

Metals

Become a global resources and materials company centered on copper

- Aiming 350 thousand ton per year of copper mine interest
- Establish smelting & refining business structure that has world top-class cost competitiveness
- Securing world’s top share in each electronic material market
- Building domestic resource recycling system and developing overseas business

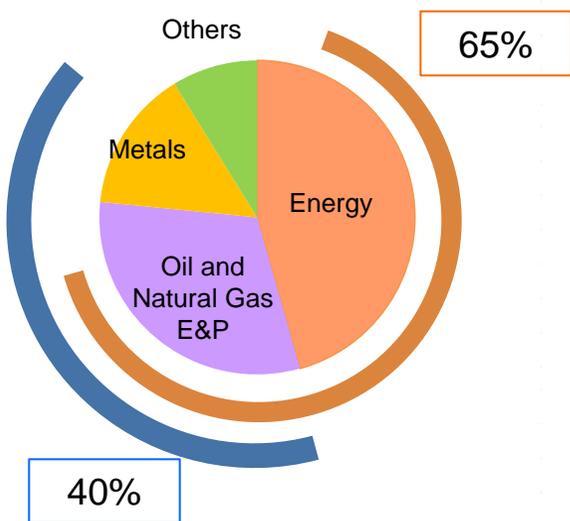


Target of JX Group (2020)

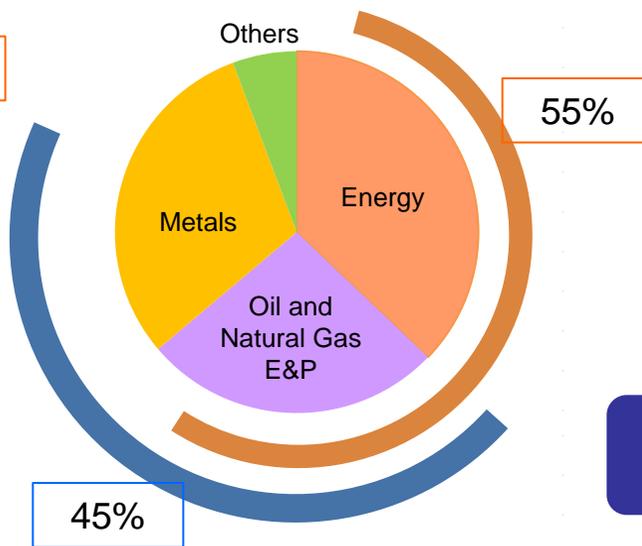
2. Well-balanced business portfolio petroleum and non-petroleum, upstream and mid & downstream business

Balance of ordinary income
excl. inventory valuation

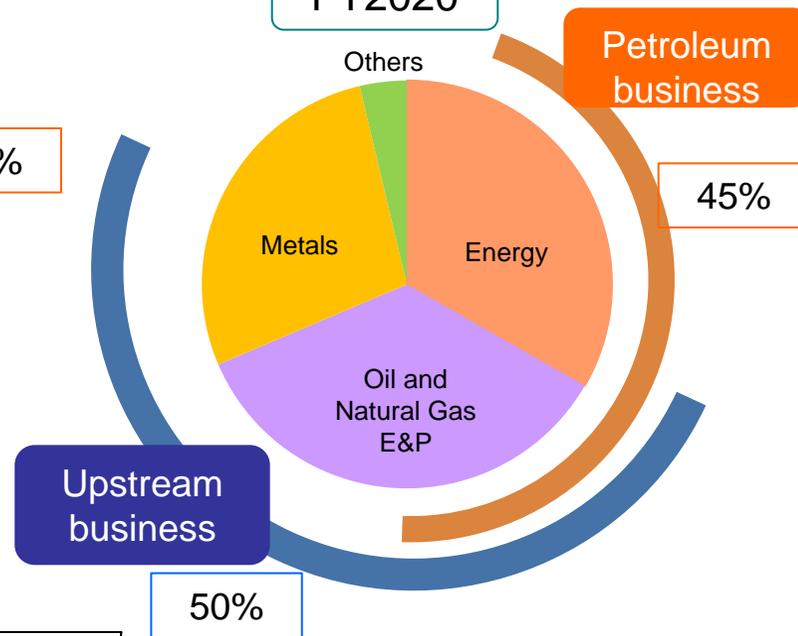
FY2012



FY2015



FY2020



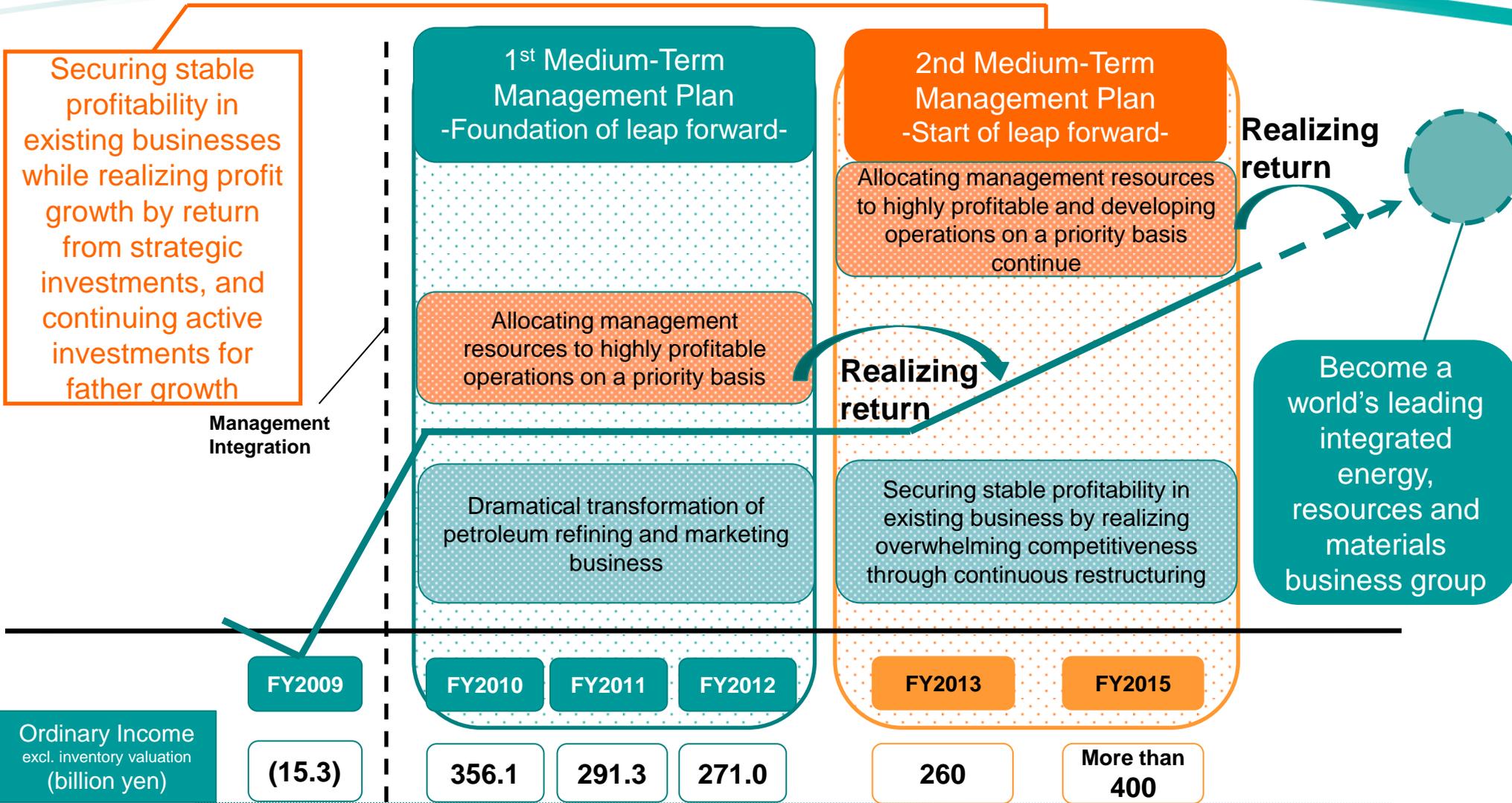
(Upstream Business)
Energy: Coal
E&P: All
Metals: Resources Development

(Non-petroleum business)
Energy: Electric Power Generation, Gas, Coal, Photovoltaic Power Generation, Fuel Cell, Specialty & Performance Chemicals
E&P: LNG Project (Malaysia, Indonesia, Papua New Guinea)
Metals: All

4. Long-Term Vision



Position of 2nd Medium-Term Management Plan in Long-Term Vision



A thick, teal-colored curved line that starts on the left side of the slide, rises to a peak in the middle, and then descends towards the right side.

➤ Supplementary Data

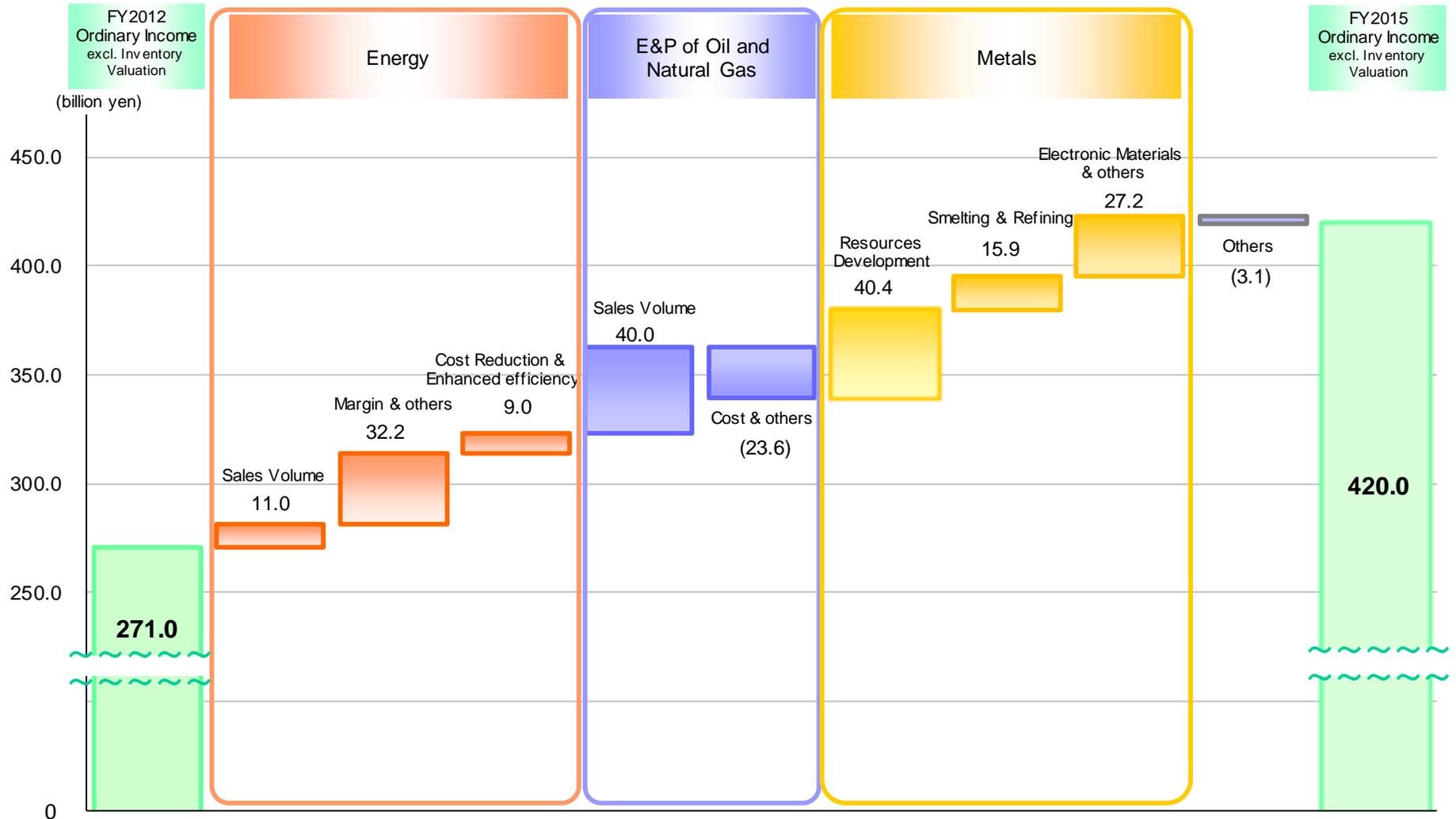
Ordinary Income excl. Inventory Valuation



(JPY billion)	FY2012	FY2015
<u>Ordinary Income excl. Inventory Valuation</u>	271.0	420.0
<u>Energy</u>	102.8	155.0
Petroleum Products	56.1	100.0
Petrochemicals	46.7	55.0
<u>Oil and Natural Gas E&P</u>	93.6	110.0
<u>Metals</u>	46.5	130.0
Resources Development	26.6	67.0
Smelting & Refining	11.1	27.0
Electronic Materials	6.3	21.0
Recycling & Environmental Services	2.5	11.0
Titanium (Shifted to Metals from 2013)		4.0
<u>Others</u>	28.1	25.0



FY2015(Forecast)vsFY2012(Forecast) Changes in Ordinary Income



Key Factors



		FY2012	FY2015
All segments	Exchange rate [Yen/\$]	83	90
Energy	Crude oil price [Dubai] [\$/\$B]	109	110
	Paraxylene spread [ACP] (vs. Dubai crude oil price of previous month) [\$/\$ton]	715	680
Oil and Natural Gas E&P	Sales volume <Crude oil equivalent> [1,000 bbl/day]	117	136
	Crude oil price [Brent] [Jan.-Dec.] [\$/\$B]	109	110
Metals	Copper price [LME] [Jan.-Dec.] [¢/\$lb]	361	360
	Equity entitled copper mine production [1,000 tons/period, year]	105	250
	PPC refined copper sales [1,000 tons/period, year]	551	610
	TRCF*1 sales [1,000 km/month]	2.7	3.7
	Precision rolled products sales [1,000 tons/month]	3.3	4.0
	Gold recovery volume by Recycling & Environmental Services [tons/period, year]	5.8	7.4

*1 Treated Rolled Copper Foil

Sensitivity Analysis(FY2015 Basis)

■ Key Factors (FY2015)

Exchange Rate:90Yen/\$

Crude Oil FOB:110\$/bbl
(Dubai Spot)

Copper Price:360¢/lb

■ Sensitivity analysis for FY2015 ordinary income

Key factors	Appreciation	Segment	(JPY Billion) Impact
Exchange Rate	+1 Yen/\$ yen depreciation	Energy (In-house Fuel costs rise, margin improvement in petrochemicals)	0.0
		Oil and Natural Gas E&P	2.0
		Metals (Margin improvement, FX rate)	1.5
		Subtotal	3.5
		Inventory valuation gain	7.5
		Total	11.0
Crude Oil FOB (Dubai spot)	+1\$/bbl	Energy (In-house Fuel costs rise)	(1.5)
		Oil and Natural Gas E&P	2.0
		Subtotal	0.5
		Inventory valuation gain	5.5
		Total	6.0
Copper Price (LME)	+10¢/lb	Metals	4.5
		Total	4.5



Cautionary Statement Regarding Forward-Looking Statements

This notice contains certain forward-looking statements, however, actual results may differ materially from those reflected in any forward-looking statement, due to various factors, including but not limited to, the following:

- (1) macroeconomic conditions and changes in the competitive environment in the energy, resources and materials industries;
- (2) changes in laws and regulations; and
- (3) risks related to litigation and other legal proceedings.