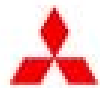


Paper & Printing Machinery Business Operation

June 9, 2009



MITSUBISHI HEAVY INDUSTRIES, LTD.

Ken Watabe

Director, Senior Vice President,

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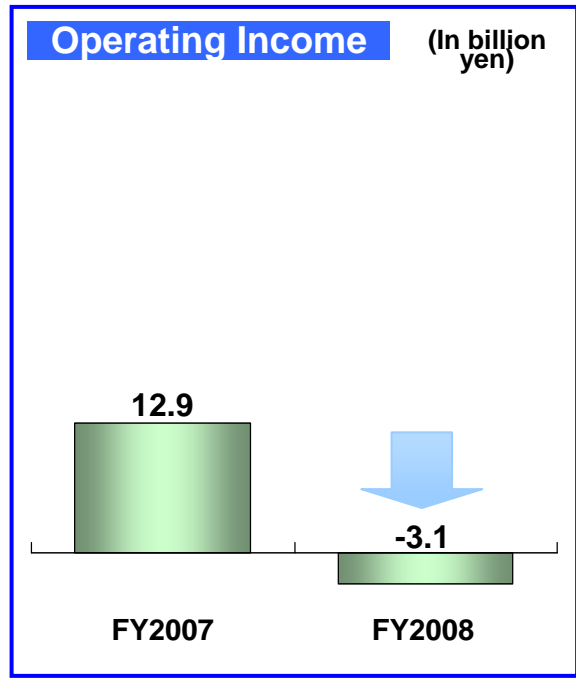
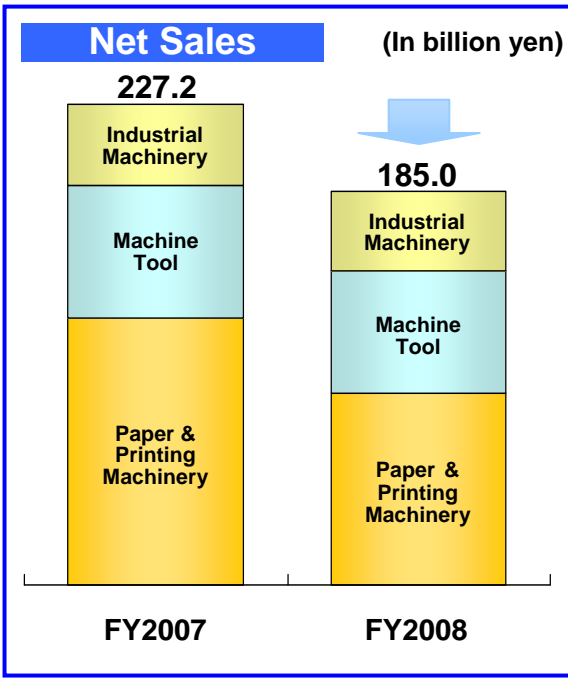
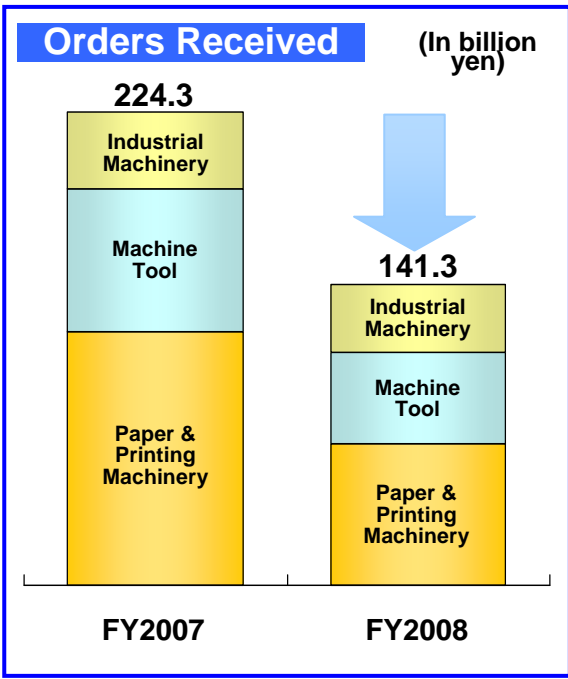
1. Industrial Machinery Operations Segment – Overview of FY2008
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1. Industrial Machinery Operations Segment

- Overview of FY2008

- The economic slowdown stemming from the financial crisis and the sharp appreciation of the yen sent orders received and net sales plummeting and led to large profit declines.
- Steps taken, including adjusting production, expanding service engineering work and redeploying human resources to the Ordered Goods business, were not enough to offset the dramatic change in the business environment.

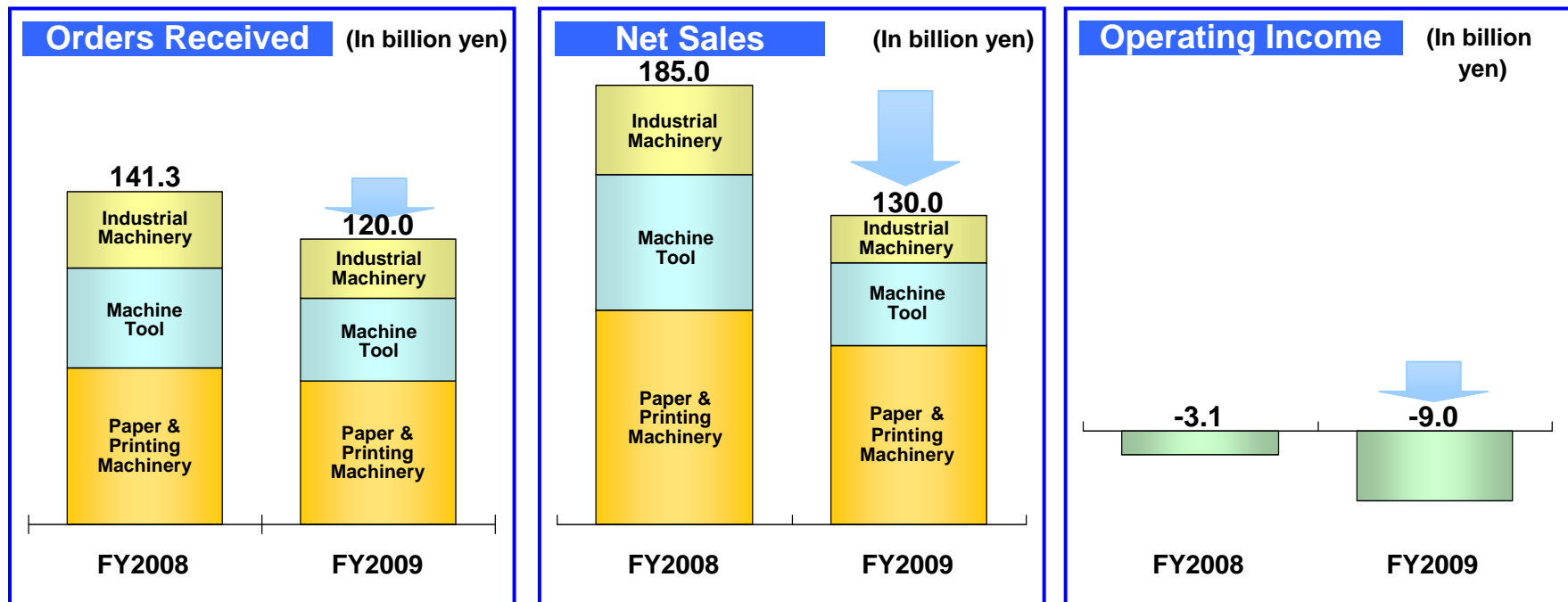
Industrial Machinery Operations Segment (Paper & Printing Machinery, Machine Tool, Industrial Machinery) Total



2. Industrial Machinery Operations Segment – Outlook for FY2009

- With the global economic slowdown, demand will continue to decline and the yen is expected to remain strong. Orders received and net sales will fall from the FY2008 level, and losses are expected to be larger than a year ago.
- We will implement measures under the company-wide emergency plan “Challenge 09” to improve profit margins.

Industrial Machinery Operations Segments (Paper & Printing Machinery, Machine Tool, Industrial Machinery) Total



3. Paper & Printing Machinery Division – Core Products

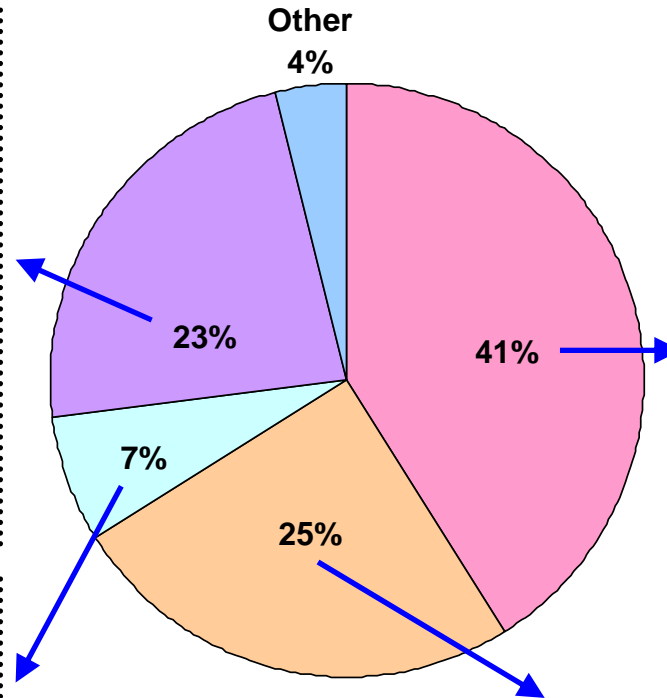
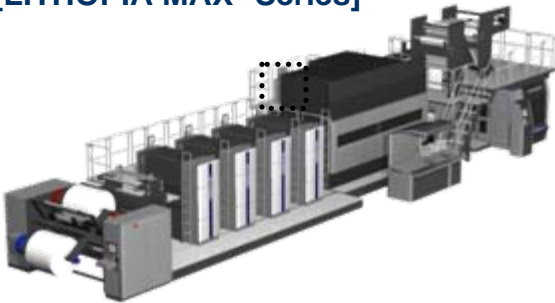
Newspaper offset presses



- World's fastest 4x2 press (90,000 IPH)
..... DIAMONDSTAR
- New-type 4x1 press (80,000 IPH)
..... DIAMONDSPIRIT

Commercial web offset presses

[LITHOPIA MAX+ Series]



Sheet-fed offset presses

- [DIAMOND 300]
- Awarded Good Design Gold Award 2008 (METI Minister Award)
- Received the JSIM Prize at 38th Industrial Machinery Design Awards



Paper converting machinery

[Corrugating machinery]



[EVOL] box-making machine



4. Paper & Printing – Outlook for FY2009

1. Business Environment

In addition to the slump in printing demand itself, reflecting reduced advertising cuts in response to the economic slowdown, it is also difficult to raise finance.

→ Customers remain reluctant to invest in printing machinery.

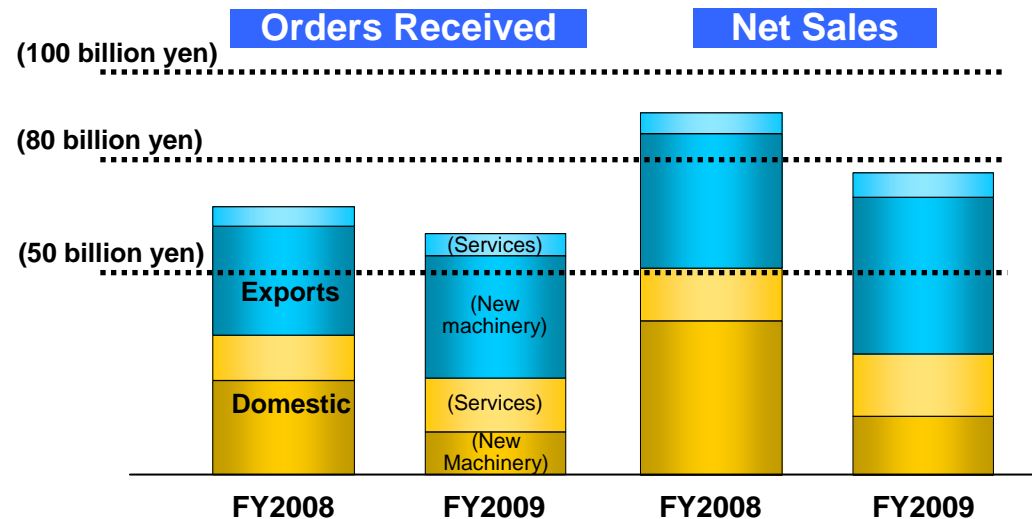
However, market conditions have been gradually recovering in China since the spring. Negotiations are also starting to pick up in in the United States, Europe and India.

- **Sheet-fed offset presses:** Orders received are recovering slightly on the Chinese market. While business is also picking up in other regions, price competition is intensifying.
- **Commercial web offset presses:** No sign of a recovery in demand
- **Newspaper offset presses:** While there is a strong trend towards the postponement of equipment upgrades, investment for rationalization is becoming evident.
- **Paper converting machinery:** Negotiations are significantly down from a year ago, and price competition is also intensifying.

2. Business Policy

- Work on expanding overseas sales and sales of services.
- Implement measures under special measure “Challenge 09.”
- Move forward with business reforms towards attainment of mid-to-long term vision.

3. Business Forecast



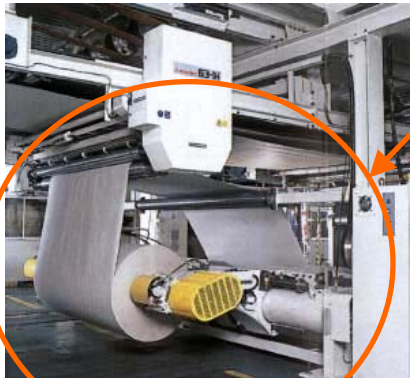
5. Special Measure “Challenge 09” – Measures (1)

1. Cost-Cutting Activities

◎ Increasing profitability through manufacturing reforms

(1) Cross-category cost reductions

- Standardization and bulk ordering of units such as feeders which are similar in manufacturing terms



Feeding unit of
paper converting
machinery

Feeding unit of
printing machinery

Standardization



LITHOPIA MAX[®] BT2-850SSS

(2) Global sourcing of parts

- Reduce number of key parts manufactured in-house:
 - ⇒ Consign manufacturing of parts which can be manufactured externally to good suppliers.
 - ⇒ Adjust difficulty of parts and shift to overseas sourcing.
- Moderate-to-high difficulty parts:
 - ⇒ Consultation between good suppliers and VEs/VAs
Work on improving designs in addition to suppliers & construction ideas
- Low-difficulty parts:
 - ⇒ Shift to overseas sourcing (⇒ Action for strong yen)
 - ⇒ Also speed up progression into assembled product.

(3) Supply Chain Management Reform

- Sophistication of production management system
 - ⇒ Increase accuracy of parts arrangement to implement Just-In-Time (JIT) manufacturing
- Speed up VE activities through stronger collaboration of BPT (Business Partner Team) with suppliers.

5. Special Measure “Challenge 09” – Measures (2)

2. Cutting General Expenses

◎Cutting general expenses in response to temporary reduction in business scale

- Increasing number of support staff dispatched to other sites. Also examining additional measures.
 - Reducing outsourced office-related operations, and also continuing with dispatch of designers to outside construction work.
- Flexibly taking in construction work from other sites.
- Providing training to develop multi-skilled workers and improve skills.
 - Training machinery operators to operate more than one type of machinery and assembly workers to assemble and adjust other products.
 - Improving ability to maintain machinery independently and developing field service engineers.
 - Improving design skills of designers by developing their 3D-CAD skills and setting them practice development assignments.
- Radically reducing site overheads, selling expenses, advertising expenses, etc.
- Significantly reducing overtime by improving business efficiency.
- Reviewing equipment investment plan.

5. Special Measure “Challenge 09” – Measures (3)

3. Generating Sales

- Increasing certainty of receiving orders through speedier responses in negotiations and higher level of judgment.
- Devoting more resources towards China as our top priority market.
(Dispatching additional sales staff from Japan and organizing additional independent printing machinery exhibitions.)
- Expanding after-service business.
 - Bolstering proposal-based services.
Expanding prevention and maintenance market through customer visits and P&Q/TPM diagnosis.
Providing consulting services to increase efficiency based upon data from installed operating rate meter.
 - Taking in, maintaining and reselling pre-owned machinery (encouraging purchase of new machinery and expanding pre-owned machinery market).
- Expanding sales by launching new models
 - Sheet-fed offset presses: Diamond Series (including convertible perfecter press for both single-side and double-side printing, press for printing on thick stock, and compact models)
 - Commercial web offset presses: MAX+ Series (comprehensive measures to improve efficiency, e.g. fitted with fully-automated plate changing device)
 - Newspaper offset presses: Diamond Spirit (4x1 press for lower plate costs, Printplex for higher operation rate)
 - Paper converting machinery: box-making machine EVOL (four color machinery/and simple spec. three color machinery for multicolor printing)

★ New Core Products

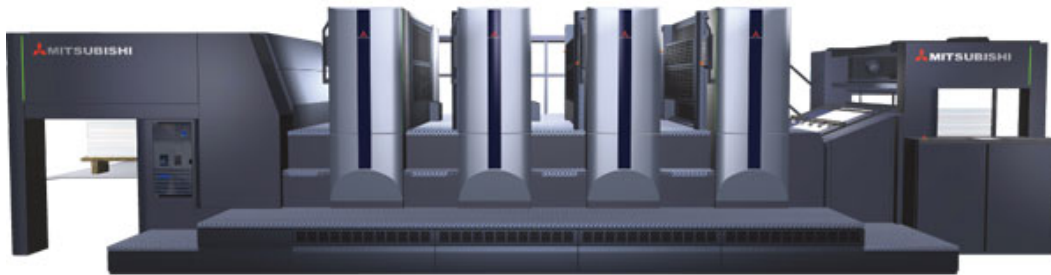
New DIAMOND Series sheet-fed offset presses

[Features]

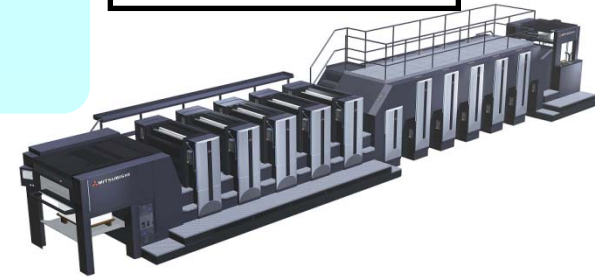
“World’s highest print quality and fastest print speeds” and “improvements in productivity and operability”

Awarded Good Design Gold Award
2008 (METI Minister Award)

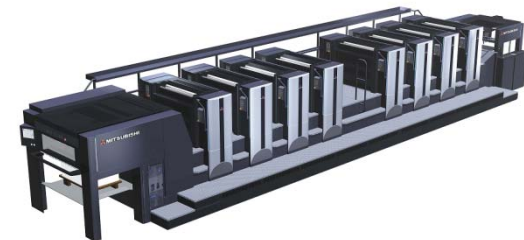
Received the JSIM Prize at 38th
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Tandem Perfector Press



Convertible Perfector Press



Launch of new function “Printplex” for newspaper offset press

[Features]

A single offset press can essentially be used as two because the front half and back half of the press are separate and operate independently of each other.

Prints two types of newspaper simultaneously.



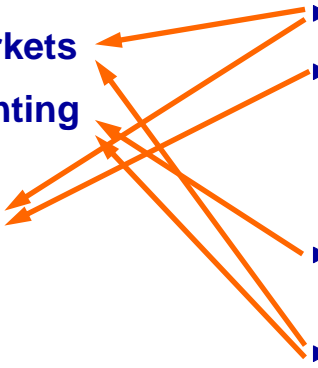
6. Paper & Printing Machinery Division – Mid-to-Long Term Vision

- Regain growth trajectory by being perceptive to new demand for printing machinery and paper converting machinery

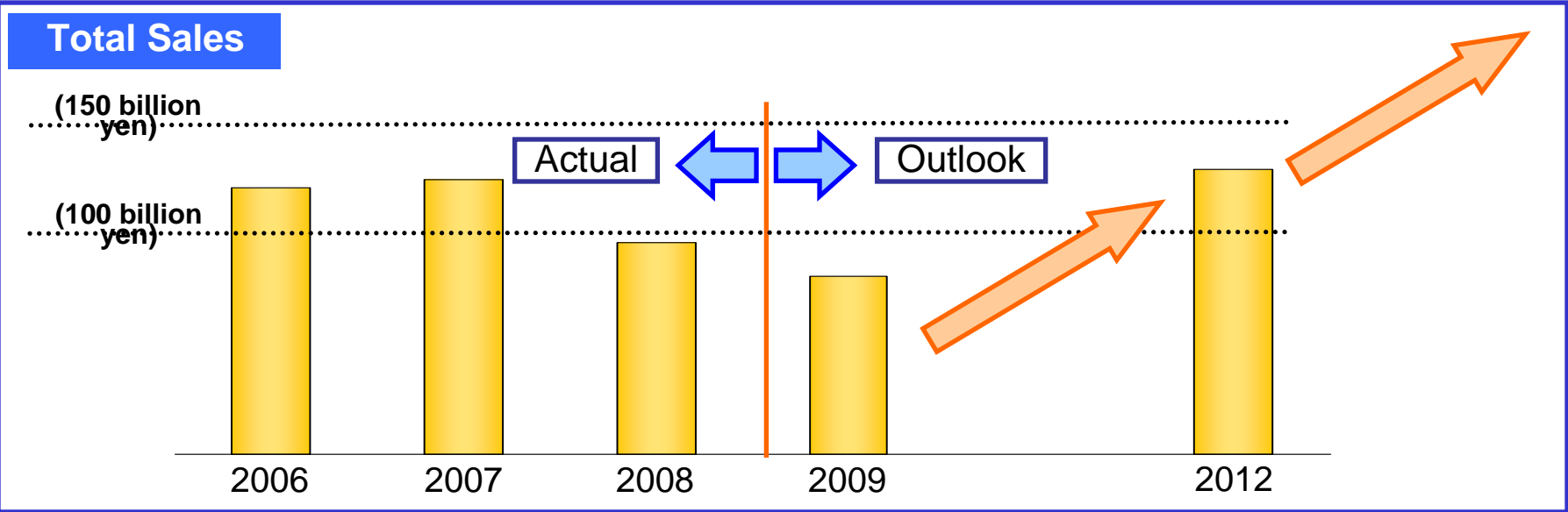
New demand

MHI Technologies

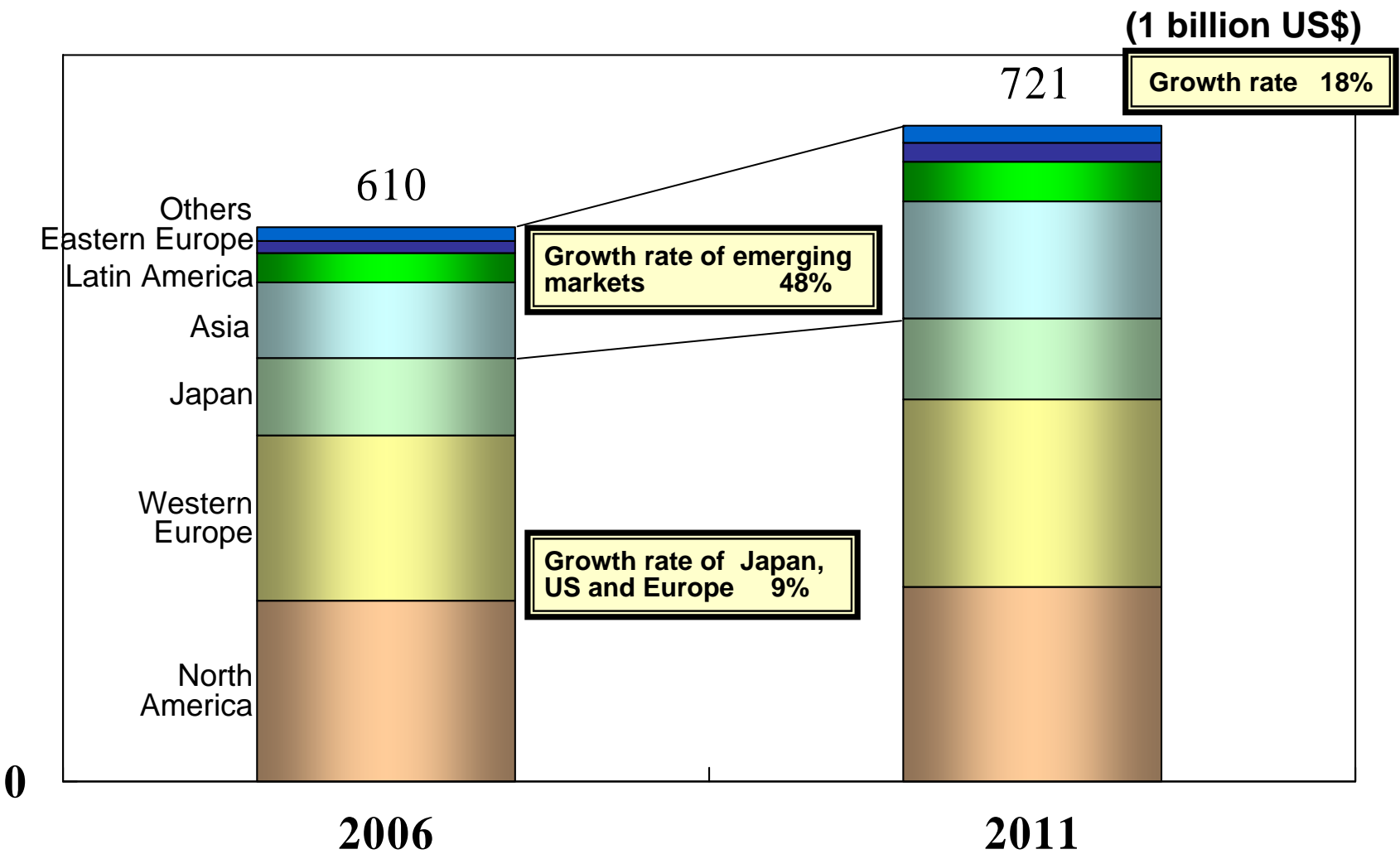
- ▶ Expansion of emerging markets
- ▶ Marked improvement in printing productivity
- ▶ Sophistication of printing technology



- ▶ Clearer, more precise print quality
- ▶ Color & image recognition technologies and their application
Automatic color inspection, automatic adjustment, automatic adjustment of cutting position
- ▶ Automation of incidental operations such as plate changing
- ▶ High speed and high reliability and durability



★ Growth in Global Shipments for Printed Matter Driven by Emerging Markets



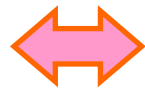
Source: "World Wide Market for Print" PIRA International, 2007

★ Work Efficiency Trends Downward as Price Per Unit Declines

◆ Number of copies printed per printing job shows a downward trend (shift to small-lot printing)

Paper/board shipments:

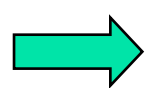
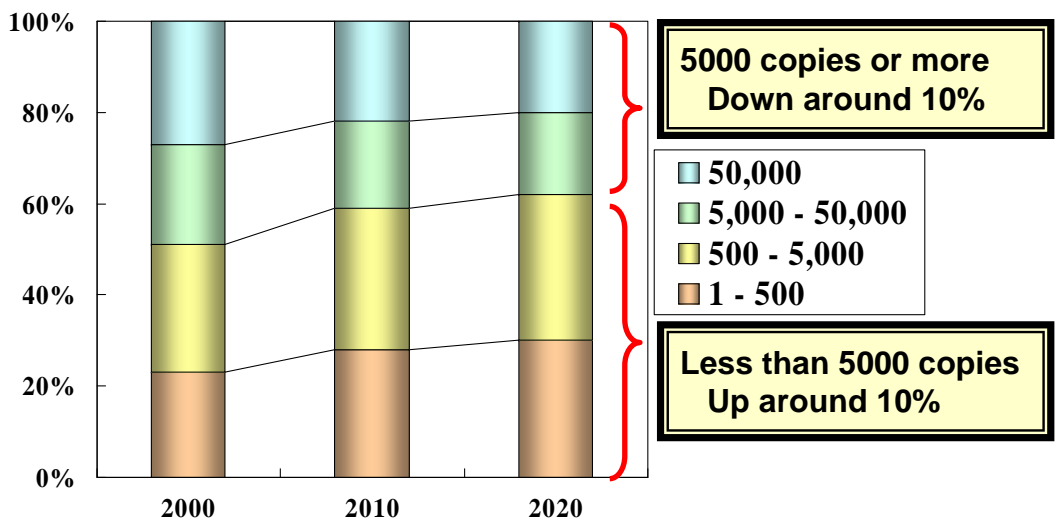
Unchanged



Consumption of printing materials: Up

Ink shipments: Up slightly

Lot-size Trend



Increase in downtime (plate change time, cleaning, quality adjustment, etc.) leads to lower efficiency.

7. Paper & Printing Machinery Division

– Business Policy (1)

1. Expand market share by introducing new technologies and new products.

- **Printing:** Response to customer concerns, i.e. shift to small-lot printing and decline in price per unit
 - Minimize downtime (plate change time, print quality adjustment time, maintenance time, etc.).
 - Increase efficiency by facilitating operability (one-man operation).
- **Paper converting:** Response to shift to small lots, environmental load reduction and demand from emerging markets
 - Quick set up and reduction of heat consumption for drying after sheet gluing
 - Launch market-compatible products which match the needs of emerging markets (simplification of specifications and low price).

2. Expand business on overseas emerging markets.

- **Reorganize sales bases and distributors with the focus on emerging markets.**
 - China:** Form alliance with MHI Shanghai and Beijing Mitsubishi Heavy Industries Beiren Printing Machinery Co., Ltd. (manufacturing JV), expand network of distributors and bases.
 - Europe:** Develop influential distributors and reorganize sales structure (shift from direct sales ⇒ distributors)
 - India:** Develop new distributors.
- **Input sales staff and engineers into emerging markets.**
- **Reinforce service structure.**

7. Paper & Printing Machinery Division

– Business Policy (2)

3. Expand overseas production.

- Expand production of compact sheet-fed offset presses at JV in China.
- Increase local sourcing + local general assembly in overseas markets.
Peripheral devices such as feed roll stands and stockers, scaffold, covers, etc.
- Extend sourcing overseas suppliers of sheet-fed offset press parts to all printing and paper converting parts
Standardization/commoditization reform (MD Project), and restructuring taking into consideration the possibility of a shift to local production in the future

4. Speed up entry into new businesses.

- Develop new products based on advanced printing technologies
 - Next-generation digital press (capable of high-speed on-demand printing)
 - Precision press (which apply high-precision patterning technology to enable printing on liquid crystal panel filters)
 - Expansion of specialty press product lineup (high-speed coating printing, lens formation printing, etc.)
 - Micro defect inspection equipment (detection of defects in print patterns, etc.)
 - Application of technology to manufacturing of lithium ion battery film
- Advance into parts machining business using machine tool technology.



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