## Preface

The machine industry in Japan from 2008 to the first half of 2009 was seriously affected by the worldwide recession triggered by the worst bankruptcy in history of Lehman Brothers Holdings ("Lehman shock") in September 2008. In particular in the fourth quarter of 2008 and after, the production rapidly decreased, mainly in the area of transportation and general machines, and any prospect for recovery of the whole machine industry was not yet in sight as of the first six months of 2009.

In such a situation, some new industries and markets have begun to shed the first rays of hope for the machine industry in Japan that are suffering slower growth. While moves for expanding demand for household solar panels for photovoltaic power generation began in earnest, fuel cells for home use started to enter the stage of widespread use. There is also the possibility for a full-scale shift in the future to recyclable energy industries, including the wind power generator industry. In addition, 2009 was the year that could be called the first year of electric vehicles. Japanese automakers took off aiming at spreading various types of next-generation cars, such as hybrid electric vehicles, plug-in hybrid cars and electric automobiles.

The Economic Research Institute summarized the trend of the machine industry in 2009 in this annual report "Machine Industry in Japan, 2009 Edition" entitled "Manufacturing in Japan Searching for New Directions in the Situation of Worldwide Recession." Aiming at covering the machine industry in Japan as broadly as possible, we analyzed supply and demand trend, export and import, results of operations, trend of the industry and other related subjects for the industrial fields listed below. The main industrial fields and business categories covered by this report are:- industrial machine fields: machine tools, injection molding/plastics processing machines, forming machines, vending machines, conveying and carrying machines and industrial robots, construction machines, device-related manufacturing appliances (semiconductor/FPD panel manufacturing appliances), farm machines, textile machines, freezers and applied products; industrial heavy electric machine fields: heavy electric machine, etc; electric machine fields: consumer electric machines and appliances, consumer electronic machines and appliances (including cameras), batteries, electronic devices, general electronic parts, telecommunications equipment and wireless-applied appliances, medical electronics, computers and office machines; transportation machine fields: automobiles, automotive parts, two-wheeled vehicles, industrial vehicles and aircraft; precision machine fields: electric measuring instruments, measuring equipment, analyzing equipment and electric controls; and machine element fields: bearings and dies.

This report in English contains a summary of the annual report in Japanese mentioned above. We hope that this report will be helpful to the people of related organizations in understanding the machine industry in Japan.

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