



(Translation)

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OFFICE OF INTERNATIONAL  
CORPORATE FINANCE

Minebea Co., Ltd.

&lt; Press Release &gt;

**Minebea's Manufacturing Subsidiary in China has Obtained ISO9001:2000**

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Shanghai Shun Ding Technologies Ltd., (hereinafter "SST" ), a manufacturing subsidiary in China of Minebea Co., Ltd. (hereinafter "Minebea" ), has obtained the ISO9001:2000, the international standard for quality management systems, on March 11, 2004. SST is scheduled to obtain ISO14001, the international standard for environmental management systems, and OHSAS18001, the standard for occupational health and safety management systems, by the end of September 2004.

In the past, Minebea produced personal computer (PC) keyboards at its Thailand subsidiary Minebea Thai Ltd. As SST started production of PC keyboards in August 2003, the production transfer from Thailand to SST is currently underway. The production transfer of keyboards for desktop PCs is scheduled to be completed by October 2004. The production transfer of keyboards for notebook PCs is scheduled to be completed by March 2005.

The overview of SST is as follows.

- |                       |   |
|-----------------------|---|
| • Trade name          | Shanghai Shun Ding Technologies Ltd.    |
| • Established         | November 12, 2002                       |
| • Start of production | August 20, 2003                         |
| • Capital             | UD22M (Minebea 60%, HuanHsin Group 40%) |
| • Number of employees | 1,141 persons (as of February, 2004)    |
| • Manufactured items  | PC keyboards                            |

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(Translation)

April 14, 2004

Minebea Co., Ltd.

< Press Release >

### **Minebea Develops Two Types of New Fluid Dynamic Bearing Units**

Minebea Co., Ltd. (“Minebea”) today announces the development of two types - ROF type and HMF type - of new fluid dynamic bearing (“FDB”) units.

The basic concept of the development is to produce high-performance, cost-competitive FDB units that are fit for mass-production. ROF type of FDB units have been developed by Minebea on its own, while HMF type of FDB units have been developed jointly with Hitachi Powdered Metals Co., Ltd. (“Hitachi Powdered Metals”). Both ROF type and HMF type of FDB units have high performance and cost competitiveness and are fit for mass-production.

Minebea intends to use these FDB units, for the time being, in spindle motors for hard disk drives (“HDDs”) that it manufactures and sells. Minebea plans to standardize these FDB units for sale to its customers in future just like ball bearings, one of Minebea’s mainstay products.

Minebea is planning to hold a technical briefing (scheduled for May 20, 2004) to explain technical details of these FDB units, which will be seen in our website.

#### **Outlines of the New Products**

- **ROF type of FDB units**

This type of FDB units are primarily characterized in that they are produced with Minebea’s proprietary ball bearing manufacturing technology, which monthly turns out 170 million pieces of ball bearings, on the same production line and by the same method for ball bearing production, and that bearings of the FDB units are readily mass-produced, except for machining of hydrodynamic grooves.

To be more specific, bearings of FDB units, which are the most technically difficult part and require the highest-precision machining technology, are readily produced with stainless steel at the same productivity level and within the same machining time as machining of ball bearing rings.

• **HMF type of FDB units**

This type of FDB units are primarily characterized in that they use sintered material in bearings and hydrodynamic force in the radial direction will occur in the entire inside of the bearing that has multiple lobes instead of the conventional hydrodynamic grooves.

Also, as adopting multiple lobed shape in radial side of the bearing, it has become possible to simultaneously and easily form the shape of both multiple lobes in radial side and hydrodynamic grooves in thrust side during sizing.

The FDB, which has multiple lobes in the radial direction will have advantages, such as high pressure in the radial direction, good pressure balance in the thrust direction, superiority in high speed rotations, is most suitable for small thin type motors.

With its superior powder metallurgical technology and production lines, Hitachi Powdered Metals has made it possible to facilitate mass-production of multi-lobed bearings.

Minebea will assemble HMF type of FDB units, using the said multi-lobed bearings to be supplied by Hitachi Powdered Metals.

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