

**Research and Development concerning Superconducting Maglev and
Research on applying its Technology to the Conventional Railway System**

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RTRI is promoting the fundamental research and development concerning superconducting maglev. The topics of research are high-temperature superconducting magnet, maglev vehicles motion simulation, evaluation of the ground coil and the diagnostic technology of systems. Research on application of maglev technology to the conventional railway system is advanced in cooperation with other organizations. The main topics of this issue are a flywheel energy storage system using superconducting magnetic bearings and a magnetic refrigeration system for air-conditioners. This paper describes the existing circumstance of these researches and developments.