Recent Research and Development on Railway Geotechnical Structural Technology Yoshiyuki KOJIMA Railway Technical Research Institute has been researching on a variety of technology related to railway structures. These include maintenance technology (inspection, diagnosis, prediction, repair, renewal), earthquake countermeasures technology, construction technology and environmental impact assessment technology. This review describes an overview of the recent research and development trends on the maintenance technology and construction technology of "geotechnical structure" (earth retaining wall, soil structure and tunnel) in the Railway Technical Research Institute.