

4. Expanding Use of In-Vehicle Type Dry Grinding Device for Ceiling - Application to Underground Railway and Water Reclamation Center -

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The "In-Vehicle Type Dry Grinding Device for Ceiling" was developed to mechanize the manual operation in roughening or paint removal work of road tunnels. The function of this device has been expanded and it was applied to the ceiling grinding work in the repair and reinforcement of the underground railway and water reclamation center. As a result, it was possible to improve the efficiency of construction by mechanization compared with physical labor. Moreover, it was able to prevent the dust scatter during the grinding work and to improve the safety. In addition, the bond strength was increased so that the quality of the completion surface was improved as well. Based on these facts it was confirmed that the in-vehicle type dry grinding device for ceiling is able to apply to facilities in addition to road tunnels, and the range of its applications has expanded.

Key words: grinding operation, mechanization, ceiling, efficiency, labor-saving