

Promoting Further Utility Pole Removal

Road Structures Department and Road Traffic Department

We conduct research on the method of promoting removal of utility poles from the viewpoints of improving the disaster-preventing ability of roads, securing safe and comfortable traffic space, forming beautiful scenery, and encouraging tourism.

Social Background and Challenges

- Low level in the removal of utility poles than other countries
(Less than 10% even in the 23 cities of Tokyo where the Olympic and Paralympic Games will be held in 2020.)
- Enactment of a law to promote removal of utility poles (in December 2016) and movement toward enactment of ordinances by local governments
- High costs of removal
-> Low cost utility pole removal methods need to be developed to satisfy the needs for the promotion of removal.

Research Details

Installing cables at shallow levels

Verifying the impact on the functions of roads, current-carrying capacity, and telecommunication functions when electric power cables and communication cables or the compact boxes that protect the cables are placed inside pavement with light traffic.



Accelerated loading tests for pavement and underground cables

Checking workability when cables are installed

Checking the impact caused by each type of the cable and each method of protection and burying when cables are placed inside the pavement as well as workability when cables are laid in compact boxes



Checking damage to underground cables

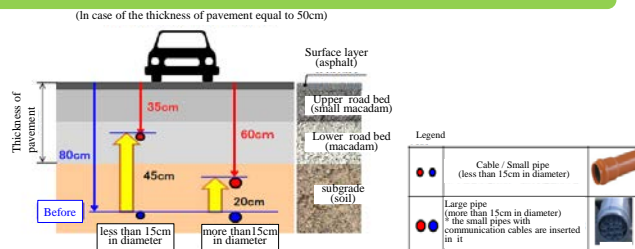


Test of laying cables in a compact box

Review of the Standards for Burying Electric Power Cables and other Cables

Based on the verification results, the Standards for Burying Electric Power Cables and other Cables (Ministry of Land, Infrastructure, Transport and Tourism) were relaxed in April 2016. On the low-traffic roads in residential areas, the distance between the top of the cables and road surface may be shorter than before.

-> Costs are reduced because the cables may be buried in a shallower level.



Cables buried shallower thanks to the relaxation of the standards
(Low-traffic roadway in residential areas)

Realizing a safe, comfortable and disaster-resilient community that has better scenery by reducing cables and poles

☞ Related articles:

- Systematic Review on the Effect of Removal of Power Poles