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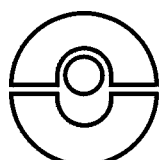
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Translation

Pantograph / overhead line interaction for DC - electrified railway lines

Interaction entre caténaire et pantographe pour les lignes ferroviaires en courant continu

Zusammenwirken Stromabnehmer/Oberleitung auf Gleichstromstrecken



*Union Internationale des Chemins de fer
Internationaler Eisenbahnverband
International Union of Railways*





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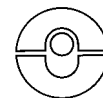
VII - Fixed installations

Application :

With effect from 1st January 1999

All members of the International Union of Railways

The person responsible for this leaflet is named in the UIC Code



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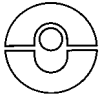
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Summary

This leaflet sets out relevant provisions for ensuring minimum conditions of interoperability between different pantograph and OHL designs used on direct-current railways. It also contains suitable recommendations for improving the interaction between them in order to reduce infrastructure and rolling-stock operating costs taking account of reliability and cost factors.

For each of the four speed ranges involved, from $V \leq 100$ km/h to $V \leq 250$ km/h the leaflet sets out the criteria which the pantograph and OHL equipment shall meet (height and stagger, gradient, permissible maximum uplift, maximum current drawn when stationary, bow dimensions and profiles, contact-strip materials, current-collection parameters, maximum static force when stationary).

The recommendations given for the pantograph and OHL equipment (maximum span, maximum wave-propagation speed, regularity coefficient, span deflection, maximum number of uplifted pantographs per train, maximum distance between any two uplifted pantographs, etc.) are designed to improve the quality of pantograph-OHL interaction.

To assess interaction between catenary and OHL equipment the leaflet recommends using mathematical simulation programs and lists the data required for validating such programs.