

Estimation of the Effects of Train Draft on Maintenance Workers

Hiroharu ENDOH Koji OMINO Hiroaki SHIROTO
Mitsugu SAWA Katsuji TANEMOTO Yasushi TAKEI

The author conducted wind tunnel experiments to study the effects of train-induced drafts on track maintenance gang waiting at a sidetrack in a brace position, the posture either squatting or holding to a handrail. Based on the experimental results, we clarified the relationship between a wind speed and the postural stability of the workers in the brace position, and then proposed a model to predict the dynamic effects due to the transient wind on them. In this paper, we also discussed the range of wind speed where the men in the brace position would be able to maintain their postures.