Method for Extracting Knowledge of Train Rescheduling from Data of Operation Records

Shunichi TANAKA  Takashi SAKAGUCHI  Satoshi KATO  Tomoharu TAKIMOTO

Train rescheduling is carried out for a delay recovery when train schedules are disrupted. Computational generation methods of the train rescheduling have been developed. However, it is an issue to be solved to incorporate the knowledge of experienced dispatchers in them. In our previous research, we proposed a method to extract knowhow as a set of association rules from past dispatcher decision data and to reflect it to train rescheduling algorithms using mathematical optimization. This paper presents the method and verification results of efficiency improvement on the extracting rules and of routinely update the rules.