

## ***„Potential of the European Timetable & Capacity Redesign-Process for railway capacity management”***

To harmonize and simplify capacity pre-planning and allocation processes across Europe, RailNetEurope (RNE) has developed the "Timetabling Redesign for Smart Capacity Management" (TTR) project. The aim of this thesis is to analyse and critically evaluate the potential of the TTR-process for optimizing capacity management within the European railway system. In a first step, a detailed overview of the structure of the TTR-process and the IT systems designed to support it should be given. Research should also be conducted to identify which European countries are planning to implement the TTR-process and whether there are countries already applying it or parts of it today. Following this, an evaluation framework should be developed to assess the advantages and disadvantages of the TTR-process for various stakeholders, such as railway infrastructure managers or railway undertakings. Special focus should be placed on aspects such as the digitalization of capacity management, the transparency of the process, and its overall complexity. Based on these findings, recommendations should be formulated regarding the extent to which the implementation of the TTR-process can be considered beneficial, and which additional steps are required to sustainably improve efficiency and collaboration in European capacity management.