Annex 1

# DESCRIPTIONS AND PROFILES OF OCCUPATIONAL QUALIFICATION LEVELS OF RAILWAY ENGINEERS

Depending on the complexity of the work, the necessary know-how and the extent of independence and responsibility, the occupational qualification levels of railway engineers are defined as follows:

## Railway Engineer, Level 6

Railway Engineer, Level 6 plans and organises the operation of existing technologies and techniques in their field of specialisation (construction incl. supervision, management of railway traffic, etc.). The work involves resource allocation, management of the activities of employees and instruction. The work requires action in difficult and unforeseen situations as well as taking responsibility for the results of one's own work and that of other employees. Railway Engineer, Level 6 specialises in a narrower field of work (specialty) and occupation (area). See the table below.

#### Certified Railway Engineer, Level 7

Certified Railway Engineer, Level 7 applies their engineering knowledge, capabilities and practical skills in order to keep existing technologies and techniques in operation and to develop them in their field of specialisation (construction incl. design and supervision, management of railway traffic, etc.). The work involves resource allocation, management of the activities of employees and instruction. The work requires independent action in difficult situations that call for an innovative approach as well as taking responsibility for the results of one's own work and that of other employees. Certified Railway Engineer, Level 7 specialises in a narrower field of work (specialty) and occupation (area) of their choice. See the table below.

# **Chartered Railway Engineer, Level 8**

Chartered Railway Engineer, Level 8 is a high-level specialist and expert with extensive knowledge and experience who sees the field in its entirety. They apply their engineering knowledge, understanding and creativity in order to keep existing technologies and techniques in operation and improve them or develop new railway systems and technologies in their field of specialisation (construction incl. design, supervision and auditing, management of railway traffic, etc.). A chartered railway engineer independently works in situations that demand mastery, that are complex and undefined and that may require new strategic approaches.

As a leader, they are responsible for the strategic activities of a unit or organisation.

Chartered Railway Engineer, Level 8 specialises in a narrower field of work (specialty) and occupation (area) of their choice. See the table below.

Competences	Level	Level 7	Level 8
	6		
B.2.1 Ensuring the use of and synergy between railway	х		
infrastructure and rolling stock (level 6)			
B.2.1 Development of railway infrastructure and rolling stock and		х	
ensuring synergy between them (level 7)			
B.2.1 Improvement of railway infrastructure and rolling stock and			х
ensuring synergy between them (level 8)			
B.2.2 Management	х	х	х
B.2.3 Commitment to occupation	х	х	х
B.2.4 Communicating	х	х	х

### PROFILES OF OCCUPATIONAL QUALIFICATION LEVELS OF RAILWAY ENGINEERS

COMPETENCES RELATED TO SPECIALISATION			
B.2.5 Construction and operation of railway rolling stock	х	х	x
B.2.6 Construction and operation of tracks	х	х	х
B.2.7 Management of railway traffic	х	х	х
B.2.8 Construction and operation of automatic railway equipment	х	х	х
and communication technology			
B.2.9 Technology and planning of railway transport	х	х	х
B.2.10 Construction and operation of railway overhead contact	х	х	х
systems			
OPTIONAL COMPETENCES			
Optional competences related to specialisation in the construction rolling stock	and oper	ation of ra	ilway
B.2.11 Construction and operation of wagons	х	х	x
B.2.12 Construction and operation of locomotives	х	х	х
B.2.13 Construction and operation of multiple units	х	х	х
Optional competences related to specialisation in the construction	and oper	ation of tra	acks
B.2.14 Design and design control of tracks	-	х	х
B.2.15 Technical maintenance of tracks	х	х	х
B.2.16 Construction management in the construction of tracks	х	Х	х
B.2.17 Supervision of the construction and operation of tracks	х	х	х
B.2.18 Maintenance of railway tracks	х	х	х
Optional competences related to specialisation in the construction	and oper	ation of au	utomatic
railway equipment and communication technology			
B.2.19 Design and design control of automatic equipment and		х	х
communication technology			
B.2.20 Construction management in the construction of automatic	х	х	х
equipment and communication technology			
B.2.21 Technical maintenance of automatic equipment and	х	х	х
communication technology			
B.2.22 Supervision of the construction and operation of automatic	х	х	х
equipment and communication technology			
Optional competences related to specialisation in the construction	and oper	ation of ra	ilway
overhead contact systems			
B.2.23 Design and design control of overhead contact systems		X	X
B.2.24 Construction management in the construction of overhead	х	х	X
contact systems			
B.2.25 Maintenance and operation of overhead contact systems	X	X	X
B.2.26 Supervision of the construction and operation of overhead	х	х	x
contact systems			