DIN EN 14811:2006-10 (E)

Railway applications - Track - Special purpose rail - Grooved and associated construction

Contents

Page

Foreword 3

Introduction 4

1 Scope 6

2 Normative references 6

3 Terms and definitions 6

4 Information to be supplied by the purchaser 7

5 Steel grades 7

6 Dimensions, static properties, linear mass and tolerances 8

7 Manufacture 8
7.1 Product integrity 8
7.1.1 Factory production control 8
7.1.2 Best practice manufacture 8
7.2 Blooms 9
7.3 Grooved rails and associated construction rail profiles 9
7.4 Marking 9
7.4.1 Rolling marks 9
7.4.2 Hot stamping 10
7.4.3 Other identification 11
7.4.4 Exceptions 11

8 Acceptance tests 11
8.1 Laboratory tests 11
8.1.1 General 11
8.1.2 Chemical composition 11
8.1.3 Hydrogen 13
8.1.4 Hardness test 13
8.1.5 Tensile test 14
8.1.6 Retests 14
8.2 Dimensional and straightness tolerances 14
8.2.1 Profile 14
8.2.2 Straightness and twist 17
8.2.3 Cutting and drilling 17
8.2.4 Gauges 18
8.3 Surface imperfections 18
8.3.1 General 18
8.3.2 Protrusions 18
8.3.3 Depressions in the web and foot 19
8.3.4 Depressions in the running surface 19
8.4 Surface microstructural damage 19
8.5 Proving and dressing of surface imperfections 19
8.6 Determination of the linear mass 20

Annex A (normative) Grooved rail profiles and associated construction rail profiles 23

Annex B (normative) Gauges 50

Annex C (informative) Holes in grooved rails 71

Annex D (informative) Electric repair welding and electric conductivity of the rails 73

Bibliography 74