A01
Tata Steel IJmuiden BV
Henckebachstraat 1
1951 JZ Velsen Noord
Postbus 10000
1970 CA IJmuiden the Netherlands
Telephone: 0251-492110

Company Trade Register 34048551
E-mail : info.testing@tatasteel.com

A07.A09 Reference
4500002584
11001475 00030

A02
Inspection certificate 3.1, EN10204.

B01.B02.B05.B06.B15
Hot rolled pickled, Coil, S355MC, YMPRESS WG S:01-2010.
1.00 G/M2/Side oiled.
Mill edges.

Tolerance EN 10051 : 2010 (E) (Width tolerance +20/-0 mm) Dev.Tol. (Thickness tolerance +0.15/-0.15 mm).

TATA STEEL

A05 Doc. nr
2017130670 00

A06 Customer/Consignee
NAANTALI STEEL SERVICE CENTRE OY
RAUTAKATU 5

21110 NAANTALI

FINLAND

Z04

A08 Order nr.
59877 C

A11 Dispatch note
66896

A10 Transport
JOLYN

B09.B10.B11 Dimensions
1500 mm X 5.00 mm

C10-C29 TENSILE TEST

HARD-NESS

C40.C60.C65 IMPACT TEST AND OTHER TESTS

B07 PROD.-IDENT	B15 MASS kg	B08 NR	B07 CAST NR.		C01	C01/C02	C10	B05	C05 Temp °C	C11 R_{eH} MPa	C11 R_{eL} MPa	C11 R_p MPa	C12 R_m MPa	C13 A %	C15 A %	C16 R_{eH}/R_m %	C17 r-value	C18 n-value	C52	C01/C02	C10	B05	C41 mm	C40.C60.C65	C05 Temp °C	C44	C42 ind.	C42 ind.	C42 ind.	C43 mean	C95 ASTM E-112
742696	10450	1	H7668		32	1L	P		+ 20	390			468	33.0		83														
742697	10460	1	"																											
742698	10250	1	"																											
742688	10450	1	"		32	1L	P		+ 20	386			464	32.0		83														
742689	10440	1	"																											
742690	10190	1	"																											
TOTAL	62240	6																												

C71-C92 CHEMICAL COMPOSITION in %

B07 CAST NR.	B07 PROD.-IDENT	C71 C	C72 Mn	C75 P	C74 S	C75 Si	C74 Al	C77 Cu	C78 Cr	C79 Ni	C80 Mo	C81 Nb	C82 V	C83 N	C84 B	C85 C-eq	C86 Al-ZO	C87 Sn	C88 Ti	C89 C-eq1
H7668		.065	0.495	.011	.006	0.008	0.036	.0_0	0.015	0.014	.001	.025	.002	.0029	.0000		0.035	.001	.001	.153

C44 1: J/cm² 4: Contraction (%)
2: J 5: Shear area (%)
3: Later. exp. (mm)

C01 1:1=Top 2:1=Edge 2=Middle 2=Middle 3=Bottom

C01 C02 L=Longitudinal T=Transverse Z=In Thickn dir D=In Diagonal dir 1=1/4 Surface 2=Centre

C18 P=prismatical C=cylindrical

C-eq1: C + Mn/6 + (Cr + Mo + V)/5 + (Ni + Cu)/15

C79 STEELMAKING PROCESS: BO

Z05 Stamp of the expert :

Z02
Tata Steel IJmuiden BV

SIMON BRAAM
MANAGER TESTING

IJMUIDEN, 5 DECEMBER 2017

Z05 B06 A04

Z01 We hereby confirm that we comply to the terms of our order acknowledgement and any agreed concessions

A01
Tata Steel IJmuiden BV
Wenckebachstraat 1
1951 JZ Velsen Noord
Postbus 10000
1970 CA IJmuiden The Netherlands
Telephone: 0251-492110

Company Trade Register 54040551
E-mail : info.testing@tatasteel.com

A07.A09 Reference
4500002827
11001473 00020

A02
Inspection certificate 3.1, EN10204.

B01.B02.B03.B04.B15

A05 Doc. nr
2018000447 00

Hot rolled pickled, Coil, S355MC, YMPRESS WG S:01-2010.
1.00 G/M2/Side oiled.
Mill edges.

Tolerance EN 10051 : 2010 (E) (Width tolerance +20/-0 mm) Dev.Tol. (Thickness tolerance +0.14/-0.14 mm).

TATA STEEL

Z04

A06 Customer/Consignee
NAANTALI STEEL SERVICE CENTRE OY
RAUTAKATU 5

21110 NAANTALI

FINLAND

Purchase Order: 4500002827
Vendor Batch: 747673
110014730000144309

Purchase Order: 4500002827
Vendor Batch: 747674
110014730000144310

A08 Order nr.
51248 B

A11 Dispatch note
74430

A10 Transport
HATHOR

B09.B10.B11 Dimensions
1500 mm X 4.00 mm

C10-C29 TENSILE TEST

B07 PROD.-IDENT	B15 MASS kg	B08 NR	B07 CAST NR.		C01	C01/C02	C10	B05	C05 Temp °C	C11 R_{eH} MPa	C11 R_{eL} MPa	C11 R_p MPa	C12 R_m MPa	C15 A %	C15 A %	C16 R_{eH}/R_m %	C17 r-value	C18 n-value
747673	10568	1	H8657		32	1L	P		+ 20	399			481	31.5		83		
747674	10568	1	"															
747675	10360	1	"															
TOTAL	31496	3																

HARD-NESS C52

C40.C60.C65 IMPACT TEST AND OTHER TESTS

C01/C02	C10	B05	C41 mm	C40.C60.C65	C05 Temp °C	C44	C42 ind.	C42 ind.	C42 ind.	C43 mean	B95 ASTM E-112

Purchase Order: 4500002827
Vendor Batch: 747675
110014730000144151

C71-C92 CHEMICAL COMPOSITION in %

B07 CAST NR.	B07 PROD.-IDENT	C71 C	C72 Mn	C73 P	C74 S	C75 Si	C76 Al	C77 Cu	C78 Cr	C79 Ni	C80 Mo	C81 Nb	C82 V	C85 N	C84 B	C85 C-eq	C86 Al-ZO	C87 Sn	C88 Ti	C89 C-eql
H8657		.070	0.517	.010	.004	0.010	0.034	.016	0.021	0.018	.001	.025	.002	.0027	.0000		0.031	.001	.001	.163

C44 1: J/cm² 2: J 3: Later. exp. (mm) 4: Contraction (%) 5: Shear area (%)

C01 1:1=Top 2:1=Edge 2=Middle 2=Middle 3=Bottom

C01 C02 L=Longitudinal T=Transverse Z=in Thickn dir S=Surface D=in Diagonal dir

C10 P=prismatical C=cylindrical

C-eql: C + Mn/6 + (Cr + Mo + V)/5 + (Ni + Cu)/15

C70 STEELMAKING PROCESS: BO

Z05 Stamp of the expert :

Z02
Tata Steel IJmuiden BV

SIMON BRAAM
MANAGER TESTING

IJMUIDEN, 3 JANUARI 2018

Z06 B06 A04

Z01 We hereby confirm that we comply to the terms of our order acknowledgement and any agreed concessions