

Certified Material Test Report According to EN 10204, type 3.1		Narashino Plant NIPPON STEEL WELDING & ENGINEERING CO.,LTD.	
Test Report No. : 2206523V	Purchaser's Spec. No. : NSTV-8 Rev. 1		
Date of issue : June 28, 2022	Material Classification		
Purchaser : Norsk Sveiseteknikk AS	EN ISO 17632-A-T 46 4 ZMnNi P M21 1 H5		
Trade Designation : SF-3A	AWS A5.20 E71T-9M-JH4		

1. Materials

Trade Designation	Size	Manuf. No.	Flux lot No.	Remark
SF-3A	1.2 mm	2Y612BP960	2Y190V	
Test type		Test Unit		
EN ISO		14344 Lot class : T1 (each manufacturing month), Testing Schedule : 4 (exclude soundness test)		

2. Welding Condition (Test type : ISO)

Base Metal (mm)	SM490A 20tx250wx300L	Welding Position	Flat	Kind of Gas	80% Ar + 20% CO ₂	CTWD (mm)	25
	Current DC(+) (A)	Voltage (V)	Travel Speed (cm/min)	Flow Rate of Gas (l/min)	Preheat Temp. (°C)	Inter-pass Temp. (°C)	
	270	27	30	25	18	151 ~ 155	
Spec.	270 ± 10	27 ± 2	30 ± 5	20 ~ 25	15 Min.	135 ~ 163	

3. Test results of All-Weld-Metal (Test type : ISO)

Tension Test	Conditions	Yield Strength (MPa)	Tensile Strength (MPa)	Elongation (%)
	AW	585	653	24
Spec.		460 Min.	560~680	20 Min. A5

Impact Test	Conditions	Temp. (°C)	Ind. Value (J)	Ave. (J)
	AW	-40	61, 78, 82	74
Spec.			32 Min	47 Min

Chemical composition (%)

	C	Si	Mn	P	S	Cu	Ni	Cr	Mo	V	Nb
	0.06	0.47	1.61	0.011	0.004	0.35	0.32	0.04	0.01	0.02	0.011
Spec.	0.03/ 0.08	0.35/ 0.70	1.30/ 1.75	0.020 Max.	0.020 Max.	0.35 Max.	0.20/ 0.50	—	—	—	—

S, P and N of the strip : Below specified maximum

4. Hydrogen Content of Deposited Metal (Acc. to ISO 3690)

HDM (ml/100g)	Ave.	Spec.
2.4, 2.4, 2.3	2.4	5 Max.

Statement :

We hereby certify that the contents of this report are correct and accurate, and all operations performed by us or our subcontractors are in compliance with the requirements of the DATA SHEET No. : NSTV-8 Rev.1

No. 220343HGK (MIT 11945)

Net Weight
2Y612BP960 : 7,787.5 kg



Certified by

YASUNOBU SHIGEMORI
Group Manager, Quality Control Dept.

This is electronically made and is not signed.