



# TENALLOY HH SPL

**C-Mn STEEL (Low Hydrogen)**



Welding Electrode for joining High Tensile Steels

CLASSIFICATION : EN ISO 2560-A	AWS A/SFA 5.1	IS 814	APPROVALS :
E 42 3 B 32 H5	E 7018-1	E B5629H <sub>3</sub> JX	MEETS NACE Requirements, ONGC/EIL, Spec GS8 Annexure 1A

## KEY FEATURES :

- Extra low hydrogen iron powder type
- Weld metal resistant to cold and hot cracking and tri-axial stressing
- Medium Penetration
- Excellent toughness down to -46°C
- All position capability

## WELDING POSITION :



AC (90 OCV)/ DCEP

## TYPICAL APPLICATIONS :

- Carbon and low alloy steel fabrication where severe service condition exist
- Suitable for medium high tensile steels, heavy sections and restrained joints in high tensile steel
- Joining steels of ASTM 106 Gr.B (NACE quality), SA 414/414M Gr.D/E/F/G, SA 515/515M Gr.60/65, SA 516/516M Gr.60/65

**REDRYING CONDITION : 250-300°C for minimum 1 hr. (Also available in vacuum packed condition)**

## CHEMICAL COMPOSITION OF UNDILUTED WELD METAL, Wt % :

	C	Mn	Si	S	P
Typical	0.06	1.1	0.3	0.01	0.01
Specification	0.04-0.09	0.90-1.40	0.15-0.50	0.012 max	0.015 max

## MECHANICAL PROPERTIES OF ALL WELD METAL :

	Condition	UTS, MPa	YS at 0.2% offset, MPa	EL%	CVN Impact , J	
					-30°C	-46°C
Typical	As Welded	550	465	26	70	52
Specification		510-580	420-520	24-30	50-100	30-60

Hardness, 3 Layer: 200 BHN max

Diffusible H<sub>2</sub> Content: <3 ml/100 gm

SPECIAL TESTS : HIC, SSCC, Hot Tensile Test at 200°C

## PARAMETERS - PACKING DATA :

Ø x L, mm	Amperage, A	Approx. Pcs/Carton	Carton/Box	Approx. wt. of 1000 pcs, Kg.
2.5 x 350	60-90	281	4	18
3.15 x 450	90-140	132	4	38
4.0 x 450	140-180	85	4	58
5.0 x 450	180-240	55	4	89

