

47909

INSPECTION CERTIFICATE

Nippon Steel Corporation

CONTRACT No: 2-820-D3-5-9-NV03
 REFERENCE No: J83-YK71R009
 SHIPPER: MARUBENI-ITOCHU STEEL INC.
 CUSTOMER: FERRE BARNIEDO S.A. DE C.V.
 SHIP No:
 COMMODITY: WIDE FLANGE BEAMS
 SPECIFICATION: ASTM A992-06A

HEAD OFFICE: 6-1 MARUYOCHI 2-CHOME, CHIYODA-KU, TOKYO 100-8071, JAPAN
 SAKAI WORKS: 1-CHIKKOTAWATA-CHO, SAKAI-KU, SAKAI-SHI, OSAKA-PREF. 590-0901, JAPAN

CUSTOMER'S CONTROL No(1):
 PROJECT NAME:

DATE OF ISSUE: SEP. 21, 2012
 CERTIFICATE No: 20921H045-001

FERRE BARNIEDO, S.A. DE C.V.
 ESTE CERTIFICADO ES COPIA DE NUESTRO ORIGINAL
 LA REMISION DE ESTE CERTIFICADO A LA REMISION DE NUESTROS ARCHIVOS
 TEL: 58-36-10-00
 ventas@ferrebarniedo.com.mx

REMARKS:		TENSILE TEST		IMPACT TEST	
1) TYPE OF STEEL : FULLY KILLED STEEL		7-GL 8 INCH (RECT)		mm Charpy X9	
SIZE	CUSTOMER'S CONTROL No (2)	YIELD STRENGTH (MPa)	TENSILE STRENGTH (MPa)	ELONGATION (%)	REDUCTION OF AREA (%)
27"X14"X178LX40'	3 9690G87796UC0310FL7	53	7433	72	
	UC0320FL7	55	7433	72	
	29 93670G88043UB7710FL7	56	7732	73	
	UB7720FL7	57	7632	75	
	62-200260G88044UB7610FL7	57	7631	75	
	UB7620FL7	57	7632	75	
	6 193802L8718UB7810FL7	57	7632	75	
	UB7820FL7	57	7734	74	
	3 9690G87796UC0310FL7	53	7433	72	
	UC0320FL7	55	7433	74	
TOTAL		103	332690		

NOTES:
 *1 LOCATION F: FLANGE W: WEB C: CENTER
 *2 ORIENTATION L: LONGITUDINAL C: TRANSVERSE
 Z: THROUGH THICKNESS

CAST No	CHEMICAL COMPOSITION (%)											L: CAST ANALYSIS				P: PRODUCT ANALYSIS (%)				
	C	Si	Mn	P	S	CU	NI	CR	MO	NB	V	SN	N	T-AZ	Mn/C	CEQ-1	CEQ-2	Pcm	TE-1	TE-2
G87796	18	34	116	13	5	1	1	2	0	1	0	0	19	20	38				10	10
G88043	17	36	118	18	6	1	1	2	0	1	0	0	23	29	37				10	10
G88044	18	34	119	16	4	1	1	1	0	1	0	0	21	27	38				10	10
2L8718	17	36	123	16	6	2	3	5	1	1	0	0	40	16	39				10	10

CEQ-1 = C + Mn/6 + (Cr + Mo + V) / 5 + (Ni + Cu) / 15
 TE-1 = Nb + V

WE HEREBY CERTIFY THAT THE MATERIAL DESCRIBED HEREIN HAS BEEN MADE IN ACCORDANCE WITH THE RULES OF THE CONTRACT.

H. Sugiyama
 DEPARTMENT MANAGER,
 PRODUCTION SCHEDULING
 & QUALITY MANAGEMENT DEPT.
 SAKAI WORKS