

CERTIFICATE OF INSPECTION & TEST

ORIGINAL



ST&H CORPORATION
 411-3 Shinwol-ri, Jinryemyun, Gimhae-si Gyungnam, Korea
 Tel:82.51.744-4680(5 line) Fax:82.51.744-4670
 E-mail : stcorp@kornet.net

(EN 10204 3.1)

Certified to ISO9001:2008, ISO14001:2004, PED97/23/EC by LRQA

Certified API Spec Q1 and API Spec 6A (Licence No : 6A-1284)



Customer : PLESA ANAHUAC Y CIAS..S.A DE C.V.				Contract No. : 15982				Report No : MSH8188				Date: SEP.09.2013	
Spec. For Material : ASTM/ASME A/SA105N-11(NACE MR0175/ISO 15156-2009)												Heat Treatment	
Chemical Composition (%)		C	Si	Mn	P	S	Ni	Cr	Mo	Cu	V	910°C NORMALIZED & AC	
Heat No./Batch no.	MAX	0.350	0.350	1.050	0.035	0.040	0.400	0.300	0.120	0.400	0.080		
	MIN		0.100	0.600									
03384K		0.183	0.161	0.990	0.017	0.005	0.009	0.023	0.002	0.010	0.004	Dimensional Inspection	
Tension Test						Charpy Impact Test (10x10 mm Specimen Size)				Hardness Test (HB)	Bending Test 90:120(180°)	ANSI B16.5 - 2009 GOOD	
Size of Specimen(mm)		Yield Strength MPa	Tensile Strength MPa	Elongation %	Red of Area %	Individual		Average					
Dia	Gage Length					min	min	Test Result		Temp			
12.5	50	MAX				①	②	③	Average	187	155, 158		
		MIN	250.000	485.000	22.000								
12.5	50		301.000	496.000	34.000						Ultrasonic Examination		
ITEM / SIZE		Q'TY		ITEM / SIZE		Q'TY		ITEM / SIZE		Q'TY		N/A	
150LBS SORF 6"		220		BLANK				BLANK				Magnetic Particle Examination	
BLANK												N/A	
												Remarks :	
												**CE = 0.36 (LONG FORMULAR)	

NOTE :
 1MPa = 145.037 psi
 1MPa = 0.145037 ksi
 1psi = 0.006895 MPa
 1ksi = 6.89476 MPa

W.C:Water Cool O.C:Oil Cool
 A.C:Air Cool N.A:Non Action
 N:Normalized A:Annealed
 Q.T:Quenched and Tempered
 N.T:Normalized and Tempered

We hereby certify that the material herein has been made and tested in accordance with the above specification and also with the requirements called for by the above order.

[Signature]



Witnessed by / H. J. LEE Manager of Q.A Dept. / S. H. LEE