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CONSTANCIA DE INSPECCION

INSPECTION CONSTANCY

No. CONSTANCIA (constancy No.): **110039**

CLIENTE(customer): PLESA ANÁHUAC Y CÍAS., S.A. DE C.V.

DIRECCION(address): AV. VALLE DE LAS ALAMEDAS # 66-O COL. SAN FCO CHILPAN TULTITLÁN, EDO. MEXICO C.P. 54940

O.T. (order no.)	DIAMETRO (outside diam.)	ESPESOR (thickness)	GRADO (grade)	ESPECIFICACION (specification)	PROCESO (process)	PEDIDO (contract)	O. PREPARACION (preparation order)	PROVEEDOR (supplier)	FECHA (date)
33489	12.750"	0.406"	X42/5LB PSL1/A53B	API SPEC 5L 44TH ED./A.S.T.M.	HFW	9807	SB-009-2011	TERNIUM	27/01/2011

TUBO (pipe) O SERIE (SERIAL)	COLADA (heat)	TYPE	LOC	PRUEBA DE TENSION(tensile test) UNIDADES (units) PSI (Y.S.)	ORIENTACION (orientation) 1 (T.S.)	TAMAÑO (size) 3 % EL.	Y S/T S.	BEND	HARDNESS	PRUEBA DE IMPACTO (impact test) -10 °C °F ORIENTACION (orientation) ENERGY (lbs/ft) 1	2	3	AVG	SHEAR AREA 1	2	3	AVG	DWTT -10 SHEAR AREA 1	2	AVG	GRAIN SIZE
309	0812860	H	6		74000																
			7	48900	65500	41	0.74														
120	0812861	H	6		72000																
			7	53600	67100	38	0.79														
129	0822877	H	6		78300																
			7	50100	70900	37	0.70														
20	0842929	H	6		75000																
			7	51200	67100	42	0.76														
108	0812862	H	6		78000																
			7	55300	69400	42	0.79														
254	0812864	H	6		76300																
			7	57600	70500	40	0.81														
150	0832928		6																		9
179	0842929		6																		9
340	0822877		6																		9
CRITERIOS DE ACEPTACION: (Acceptance critera)	MIN:			42100	60200	28	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
	MAX:			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
	PROMEDIO (AVG.)			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	

(%)ANALISIS QUIMICO / chemical analysis (%)

TUBO (pipe) O SERIE (SERIAL)	TYPE	LOC	C	Mn	P	S	Si	Al	Cu	Cr	Ni	Mo	Ti	Nb	B	V	N	Als	Ca	PCM	CE
309	H	7	0.18	0.69	0.011	0.002	0.184	0.034	0.000	0.000	0.000	0.000	0.000	0.000	0.0000	0.000	-	-	-	-	-
	P	7	0.22	0.71	0.015	0.003	0.207	0.026	0.011	0.001	0.001	0.001	0.001	0.001	0.0001	0.001	-	-	0.001	0.27	0.34
	P	7	0.22	0.70	0.015	0.003	0.210	0.026	0.009	0.001	0.001	0.001	0.001	0.002	0.0001	0.001	-	-	0.001	0.26	0.34
120	H	7	0.19	0.68	0.011	0.003	0.185	0.042	0.000	0.000	0.000	0.000	0.000	0.000	0.0000	0.000	-	-	-	-	-
	P	7	0.14	0.66	0.014	0.002	0.196	0.033	0.001	0.001	0.001	0.001	0.001	0.001	0.0001	0.001	-	-	0.001	0.18	0.25
	P	7	0.17	0.67	0.015	0.002	0.190	0.034	0.001	0.001	0.001	0.001	0.001	0.001	0.0002	0.001	-	-	0.001	0.22	0.28
129	H	7	0.18	0.87	0.010	0.002	0.164	0.035	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	-	-	-	-	-
	P	7	0.17	0.81	0.011	0.003	0.182	0.033	0.005	0.012	0.002	0.001	0.001	0.002	0.0001	0.001	-	-	0.001	0.22	0.31
	P	7	0.20	0.84	0.013	0.005	0.184	0.036	0.006	0.014	0.003	0.001	0.001	0.003	0.0001	0.001	-	-	0.001	0.25	0.34
20	H	7	0.18	0.75	0.011	0.001	0.188	0.035	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	-	-	-	-	-
	P	7	0.17	0.74	0.014	0.001	0.191	0.026	0.001	0.001	0.001	0.001	0.001	0.001	0.0002	0.001	-	-	0.001	0.21	0.29
	P	7	0.16	0.73	0.014	0.001	0.189	0.024	0.002	0.001	0.001	0.001	0.001	0.001	0.0002	0.001	-	-	0.001	0.21	0.28
108	H	7	0.20	0.71	0.010	0.002	0.188	0.028	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	-	-	-	-	-
	P	7	0.23	0.71	0.014	0.001	0.185	0.020	0.002	0.001	0.001	0.001	0.001	0.001	0.0002	0.001	-	-	0.001	0.28	0.35
	P	7	0.23	0.71	0.014	0.001	0.185	0.019	0.002	0.001	0.001	0.001	0.001	0.002	0.0001	0.001	-	-	0.001	0.28	0.35
254	H	7	0.19	0.70	0.011	0.003	0.185	0.033	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	-	-	-	-	-
	P	7	0.24	0.69	0.014	0.002	0.185	0.023	0.001	0.001	0.001	0.001	0.002	0.001	0.0002	0.002	-	-	0.001	0.28	0.35
	P	7	0.23	0.71	0.013	0.002	0.195	0.025	0.001	0.001	0.001	0.001	0.001	0.001	0.0001	0.002	-	-	0.001	0.27	0.35
CRITERIOS DE ACEPTACION: (Acceptance critera) MIN:			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MAX:			0.26	1.20	0.030	0.030	-	-	0.500	0.400	0.400	0.150	0.040	-	-	0.080	-	-	-	-	-
PROMEDIO (AVG.)			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

PRUEBA HIDROSTATICA: (hidrostatic test) PRESION: (pressure) 2280 Psi TIEMPO: (time) 10 sec

ULTRASONIDO(U.T.): (ultrasonic) STANDARD DE REFERENCIA: REFERENCE STANDARD J

PRUEBA DE APLASTAMIENTO: (flattening test) 0° OK 90° OK

NORMALIZADO DE SOLDADURA: (heat treatment weld) TEMPERATURA (temperature): 1600° F MIN (NO UNTEMPERED MARTENSITE REMAINS)

ESTANDAR DE REFERENCIA (REFERENCE STANDARD) F: U.T. DRILLED HOLE 1/16", G: U.T. DRILLED HOLE 1/8", I: U.T. NOTCH N-5, J: U.T. NOTCH N-10 L: RT HOLE 1/16", N: RT HOLE 2-2T O: RT HOLE 2-4T
Barreno (Drilled Hole)=H Muesca (Notch)=N

ORIENTACION(orientation):
1. TRANSVERSAL (transverse)
2. LONGITUDINAL (longitudinal)
TAMAÑO (size)
3.RECTANGULAR(rectangular)
4.CILINDRICA(round bar) 0.500"
5.CILINDRICA(round bar) 0.350"
LOCALIZACION (location)

6. SOLDADURA (weld)
7. METAL BASE (base metal)
8. ZONA AFECTADA (h.a.z.)
9. LINEA DE FUSION (fusion line)
TIPO DE PRUEBA (type)
H: COLADA (heat)
P: PRODUCTO (product)
R: REMUESTREO (recheck)

HACEMOS CONSTAR QUE EL MATERIAL DESCRITO HA SIDO FABRICADO, MUESTREADO, PROBADO E INSPECCIONADO DE ACUERDO CON LA ESPECIFICACION MENCIONADA, Y QUE LOS RESULTADOS SON COMO APARECEN EN LOS REGISTROS DE LA COMPAÑIA
(WE HEREBY VERIFY THAT MATERIAL DESCRIBED HEREIN HAS BEEN MANUFACTURED, SAMPLED, TESTED AND INSPECTED IN ACCORDANCE WITH THE SPECIFICATION MENTIONED AND THAT THESE TEST RESULT ARE AS THEY APPEAR IN RECORDS OF THE COMPANY)

CONTROL DE CALIDAD TUBACERO, S. DE R.L. DE C.V. 04

Control de Calidad (Quality Control)