

**CERTIFICADO DE CALIDAD  
INSPECTION CERTIFICATE**  
( DIN EN 10204:2004E - ISO 10474 3.1.B )

Numero:  
Number:  
22176

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Vendido a: Sold to:	PLESA ANAHUAC Y CIA. S.A. DE C.V.	Pedido del Cliente No: Customers Order No:	5831 - 5826 -	Lista de Empaque: Packing List:	11284	Fecha/Date:	17 de Febrero de 2009
Especificaciones y Grados / Standard or Specification and Steel Grade Seamless Fittings according to ASTM A 234M WPB-07, NACE MR 01.75-2003 Conform to ASME II Ed. 2001 ASME SA-234M Grade WPB, NACE MR0103-2003		Dimensiones y tolerancias / Dimension and tolerances ASME B 16.9 - 2007 and ASME B 16.28 - 1994			Factura/Invoice: Bocas / Ends Biselado / Bevelled ends		

DESCRIPCION DE MATERIAL / MATERIAL DESCRIPTION				PRUEBAS MECANICAS / MECHANICAL TEST				PRUEBA DE IMPACTO 0°C / IMPACT TEST 0°C				
ART. ITEM	COLADA HEAT CODE	CANTIDAD QUANTITY	DESCRIPCION / DESCRIPTION	ESF. CEDENCIA YIELD STRENGTH (Mpa)	ESF. RUPTURA TENSILE STRENGTH (Mpa)	ELONG. %2"	DUREZA HARDNESS HBW	DIMENSIONES SAMPLE DIM mm	1 Joules	2 Joules	3 Joules	PROMEDIO AVERAGE Joules
12	S25531	25	RED. CONC. 4 X 3 CED-STD	310	486	35	111					
13	T41975	6	TEE RED. 8 X 4 CED-STD	347	501	30	111					
14	T41644	2	TEE RED. 8 X 4 CED-STD	315	494	30	120					
15	T27384	3	TEE RED. 10 X 6 CED-XS	319	498	44	97					
16	S42716	8	CODO 2 1/2 X 90° R.C. CED-XS	298	469	35	100					
17	S45663	8	CODO 2 X 90° R.C. CED-XS	309	496	34	120					

ANALISIS QUIMICO / CHEMICAL ANALYSIS														
PROCESO PROCESS	COLADA HEAT CODE	COLADA/HEAT M.P./MOTHER PIPE	%C.E.	%C	%Mn	%P	%S	%Si	%Cr	%Cu	%Mo	%Ni	%V	%Nb
CF	S25531	25531	0.330	0.190	0.720	0.009	0.001	0.300	0.040	0.039	0.020	0.026	0.001	0.001
HF	T41975	41975	0.300	0.170	0.670	0.008	0.002	0.270	0.050	0.068	0.019	0.030	0.000	0.000
HF	T41644	41644	0.320	0.180	0.710	0.010	0.003	0.280	0.050	0.057	0.006	0.030	0.000	0.000
HF	T27384	27384	0.330	0.180	0.800	0.009	0.002	0.290	0.050	0.063	0.014	0.030	0.000	0.000
HF	S42716	42716	0.303	0.170	0.720	0.009	0.001	0.300	0.030	0.032	0.020	0.016	0.001	0.000
HF	S45663	45663	0.310	0.180	0.730	0.009	0.001	0.300	0.030	0.022	0.020	0.017	0.001	0.002

Certificamos que los resultados de los Analisis Quimicos y Pruebas Mecanicas son verdaderos o una copia fiel de los certificados enviados por el Fabricante y/o el proveedor de Materia Prima (Tubería Sin Costura) conforme ASTM A106 Grado B con N°: 410976 8062387 8069915 6008122 306038 321679

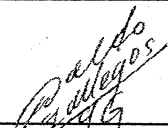
We certify that result of chemical analysis and mechanical test are true and correct copy of the test certificate issued by the manufacturer and/or supplier Raw material (Seamless Pipe) certs conform to ASTM A106 Grade B N°: 410976 8062387 8069915 6008122 306038 321679

"Este material cumple con los requerimientos especificados en la orden".  
"The material of this certificate heat number mentioned above is in compliance with the requirements specified in the order".

<p>Notas:</p> <p>Formado en caliente a 620°C-980°C, enfriado al aire; Formado en frío normalizado a 940°C max.</p> <p>Tiempo de permanencia 10'.</p> <p>Inspección Dimensional: Satisfactoria.</p> <p>HF: FORMADO EN CALIENTE/HOT FORMED</p>	<p>Notes:</p> <p>Hot formed fittings in a range from 620°C to 980°C, cooled in still air, Cold formed normalized at 940°C max.</p> <p>Holding time 10'.</p> <p>Visual dimensional check: Satisfactory</p> <p>CF: FORMADO EN FRIO/COLD FORMED</p>
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The Products described herein were produced in accordance with the above referenced specification and are identified with the "R" which is permanently marked on each fitting./ The values of hardness for fittings NPS 2 1/2" and smaller ones obtain from the conversion of hardness Rockwell B to hardness Brinell HBW by means of table WILSON DESK CHART 60.

Los valores de dureza para conexiones de NPS de 2 1/2" y menores, se obtienen de la conversión de dureza Rockwell B a dureza Brinell HBW mediante la tabla WILSON DESK CHART 60.

  
**Quality Manager / Jefe de Calidad:**  
**ING. WALDO GALLEGOS GALVAN**