



PROCARSA, S.A. DE C.V.

**CERTIFICADO DE CALIDAD  
DE PRUEBAS FISICAS-QUIMICAS**

QUALITY CERTIFICATE OF TEST PHYSICALS-CHEMICAL

CLIENTE:	UCOTA	NÚMERO	PTM-48726-1-2001
CUSTOMER:		FECHA	AGOSTO 23, 2001
PEDIDO CLIENTE / I.D.	6906	DATE	
PARTIDA (S)			
ITEMS	25091-30 / 22458-30		

TAMAÑO: 12 3/4" ESPESOR DE PARED: 0.250" GRADO: ASTM A53-B

**PRUEBAS DE TENSION**

WALL THICKNESS: 0.250" GRADE: ASTM A53-B

ANÁLISIS QUÍMICO % EN PESO: 58 Kg/cm<sup>2</sup> 820 PSI

NUM. PROBETA DESCRIPTION	COLADA HEAT	TENSILE TEST		CHEMICAL ANALYSIS PERCENT WEIGHT															
		LIMITE ELASTICO YIELD STRENGTH (PSI)	ULTIMA TENSION TENSILE STRENGTH (PSI)	% ELONG. 1"	LEAKY VALVE	C	Mn	P	S	Cb	V	Ti	Si	Cu	Al	Ca	Cr	Ni	Mo
11-24 TC TS	114492	55 777	67 729	33	0.82	0.135	0.98	0.018	0.001	-	-	0.157	0.016	0.026	0.0026	0.018	0.035	-	0.0043
10-20 TC TS	114493	56 633	76 803	39	0.84	0.127	0.88	0.019	0.006	-	-	0.172	0.011	0.040	0.0040	0.012	0.023	-	0.0029
7-7 TC TS	114494	55 722	71 012	35	0.83	0.132	0.89	0.019	0.008	-	-	0.189	0.009	0.040	0.0022	0.016	0.022	-	0.0037
35-27 TC TS	212085	68 072	72 882	35	0.89	0.081	1.12	0.015	0.005	-	-	0.204	0.031	0.050	0.0025	0.014	0.034	-	0.0080
14-17 TC TS	212086	62 672	81 380	38	0.84	0.083	1.15	0.013	0.007	-	-	0.179	0.035	0.048	0.0015	0.007	0.040	-	0.0059
8-1 TC TS	214259	59 350	77 366	38	0.88	0.131	0.91	0.016	0.008	-	-	0.155	0.012	0.038	0.0030	0.013	0.024	-	0.0056
12-2 TC TS	214261	55 714	73 722	36	0.82	0.138	0.90	0.014	0.005	-	-	0.202	0.012	0.032	0.0029	0.020	0.022	-	0.0051

CERTIFICAMOS QUE LA TUBERIA AQUÍ DESCRITA CUMPLE Y HA SIDO FABRICADA, MUESTREADA, PROBADA E INSPECCIONADA DE ACUERDO CON LOS REQUISITOS APLICABLES DE LA ESPECIFICACION:

WE CERTIFY THE PIPE ABOVE MENTIONED ACCOMPLISH AND HAS BEEN MANUFACTURED, SAMPLED, TESTED AND INSPECTED IN ACCORDANCE WITH APPLICABLE REQUIREMENTS OF SPECIFICATIONS:

ASTM

ING. FERNANDO OSORIO PEREZ  
GERENTE DE ASEGURAMIENTO DE CALIDAD  
QUALITY ASSURANCE MANAGER