

**MANUFACTURER'S CERTIFICATE**

(Mill Test Certificate) DIN 50049-3.1-B / EN 10204-3.1

Purchaser : PLESA ANAHUAC Y CIAS., SA DE C.V. Certificate No : 130506  
 Product : CARBON STEEL FITTINGS Order No : PO. 16082  
 Specification : ASTM A-234 WPB / NACE MR -01-75 Date : AUGUST 10, 2013  
 : ASME SA234 WPB L/C No : M929849

Raw Material Standard	Inspection Standard	Visual Inspection		Dimensional Inspection
PIPE : ASTM A106 B / A53B / API5LB PLATE : ASTM A516 Gr 50 / 60	ANSI B16.9 ANSI B16.28	PASS		PASS
Product & Size (inch)	Heat ID.	Quantity	Heat NO.	Raw Material Maker
1 45 ELBOW LR XH 3"	38806	30	824162	2554-806
2 45 ELBOW LR XH 4"	38811	50	11-701	2554-811
3 45 ELBOW LR SCH80 12"	38161	1	1-61430	2554-161
4 TEE XH 2 1/2"	38477	10	210-248	2554-477
5 RED TEE XH 4"x2"	38771	10	10-108874	2554-771
6 RED TEE XH 10"x4"	38317	5	0844607	2554-317

Standard	Chemical Composition %												Mechanical Test			Average Hardness	CE Long Formula
	C	Si	Mn	P	S	Cu	Ni	Cr	Mo	V	Nb	Al	YS	TS	E		
	x 100	x 100	x 100	x 1000	x 1000	x 100	x 100	x 100	x 100	x 100	x 1000	x 1000	psi	psi	%	Hb	x 100
Min.	-	10	29	-	-	-	-	-	-	-	-	-	35,000	60,000	30	-	-
Max.	30	-	106	48	58	40	40	40	15	8	-	50	-	85,000	-	197	42
1	18	19	51	15	8	3	2	3	-	-	-	-	48200	70400	36	155	38
2	19	23	47	15	17	8	9	6	-	-	-	-	48200	70400	35	157	39
3	15	26	78	17	14	<1	1	3	<1	2	-	-	49500	71200	40	145	30
4	18	19	47	5	9	7	2	5	-	-	-	-	46400	67900	31	141	38
5	21	21	52	15	5	3	1	2	<1	<1	-	-	47900	67500	30	125	30
6	20	23	50	12	10	10	4	4	-	-	-	-	45400	67900	33	166	36

• We hereby certify that the products described herein have been manufactured, inspected and conforms to standard as specified above.  
 • ALL FITTINGS ARE HEAT TREATED TO MEET NACE MR0175-03 STANDARD SPECIFICATION AT 650-680 C x 1.0 HR.  
 • CE = C + (Mn/8) + (Cr + Mo + V)/5 + (Ni+Cu)/15  
 • ALL TEES ARE TESTED BY MAGNETIC PARTICLE EXAMINATION (MT)

  
 Chief of Quality Assurance Dept