

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	: 140381
Product	: SEAMLESS STEEL WELDING FITTING	Order No	: PO. 18799
Specification	: ASTM A-234 WPB – 2011A	Date	: JULY 14, 2014
	: ASME SA234 WPB	L/C No	: T/T

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 90 ELBOW LR STD 1 1/2"	47334	800	208-97	2554-334
2 90 ELBOW LR STD 2"	47801	500	718067	2554-801
3 90 ELBOW LR STD 3"	47805	500	321843	2554-805
4 90 ELBOW LR STD 4"	47882	500	11-1-1472	2554-882
5 90 ELBOW LR STD 12"	47807	50	671365	2554-807
6 90 ELBOW LR SCH40 14"	47141	16	80560	2554-141
7 90 ELBOW LR SCH40 12"	47807	30	671365	2554-807
8 90 ELBOW LR SCH40 20"	4749C	3	1030864	2554-49C
9 45 ELBOW LR STD 1 1/4"	47334	50	208-97	2554-334
10 45 ELBOW LR STD 2"	47801	100	718067	2554-801
11 45 ELBOW LR STD 4"	47882	400	11-1-1472	2554-882

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 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	19	21	49	8	6	14	5	5	-	-	-	-	45700	67100	34	125	30	
2	21	24	49	6	12	9	3	4	-	-	-	-	45700	66800	35	135	31	
3	20	22	43	16	10	2	1	1	-	-	-	-	42500	72100	34	167	38	
4	21	21	42	17	6	10	7	8	-	-	-	-	47500	70700	34	159	31	
5	19	21	57	16	7	6	2	4	-	-	-	-	40400	65400	38	164	30	
6	16	24	77	21	12	<1	1	3	<1	2	-	-	46300	69200	40	138	30	
7	19	21	57	16	7	6	2	4	-	-	-	-	40400	65400	38	164	30	
8	17	37	95	18	6	8	3	8	1	1	1	2	47900	68900	42	155	37	
9	19	21	49	8	6	14	5	5	-	-	-	-	45700	67100	34	125	30	
10	21	24	49	6	12	9	3	4	-	-	-	-	45700	66800	35	135	31	
11	21	21	42	17	6	10	7	8	-	-	-	-	47500	70700	34	159	31	

- 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/6) + (Cr + Mo + V)/5 + (Ni+Cu)/15
- ALL TEES ARE TESTED BY MAGNETIC PARTICLE EXAMINATION (MT)


 Chief of Quality Assurance Dept