

Material Test Certificate according to EN 10204-2004 : 3.1

Customer :	-			Material :	ASTM A193 GR. B8MLCuN CL.1B			TC No. :	S102/26-XX
SWO No. :	-	Date :	-	Bar Shape :	Round Bar	Bar Size	14.0 mm	TC Date :	01.04.20XX
PO No. :	-	Date :	-	RM TC No. :	-	Lot No. :	AKF-1XX	INV. No./Date	-

Chemical Composition Results %

Elements :	C	Mn	P	S	Si	Cr	Ni	Mo	N	Sn	Cu	Al	B	Pb	Ca
Min. :	-	-	-	-	-	19.50	17.50	6.00	0.180	-	0.50	-	-	-	-
Max. :	0.020	1.000	0.0300	0.010	0.800	20.50	18.50	6.50	0.250	-	1.00	-	-	-	-
Actual :	0.012	0.670	0.0144	0.007	0.344	19.70	17.90	6.19	0.205	-	0.89	-	-	-	-
Lab TC No.:	XXXX				Lab Name :	XXXX				Result :	Satisfactory				

Heat Treatment Records

Heat Treatment Process	Hardening Temp. °C	Tempering Temp. °C	Solution Annealing Temp. °C
Temp. °C Min. :	-	-	-
Temp. °C Recorded :	-	-	-
Soaking Time :	-	-	-
Quenching Medium :	-	-	-
			Carbide Solution Treated

Mechanical Testing Results

Mechanical Properties		Tensile Strength (Mpa)	Yield Strength 0.2 % Offset (Mpa)		% Elongation (GL-50mm)	%Reduction Area	Hardness (HRB)		Proof Load (Kn)		
Specified	Min.	550	240		30	40	-		-		
	Max.	-	-		-	-	96 HRB		-		
Actual Results:		612.09	256.30		31.43	49.79	88.0 HRB		-		
Impact Test Results		Charpy V Notch Impact Test				AVG Value (J)	Lateral Expansion				
		Specified Value (J)	-	-	-	-	Value 1	Value 2	Value 3	Avg. Value	
		Achieved Value (J)	-	-	-	-	-	-	-	-	
Lab TC No.:	XXXX		Lab Name :		XXXX		Result :		Satisfactory.		

Item Details

Po Sr. No.	Item Code	Drawing No./Rev. No.	Item Description	Length	Quantity
1	-	-	Stud Bolt M-14-2P, ASTM A193 GR. B8MLCuN CL.1B	-	13.00 NOS

Remarks: -
01) Material is free from surface defects.
02) 100% visual inspection is carried out on the lot.
03) Chemical composition is verified by using a spectrophotometer (SP).
04) Mechanical properties are verified by using a tensile testing machine.
05) No weld repair is carried out on the lot.
06) Impact testing is carried out on the lot as per the requirement.
07) All dimensions are as per the specification.
08) All test results are as per the requirement.

We confirm that above mentioned items was Manufactured, Sampled, Tested and Inspected in accordance with the subjected Customer's Purchase Order and as applicable Drawings, Material Specifications, Codes & Standards and the results of the items have been determined to meet the users' requirements.

For Ananka Fasteners Pvt. Ltd.

For Client / TPI