



**GEM-YEAR TESTING LABORATORY
CERTIFICATE OF INSPECTION**

MANUFACTURER: GEM-YEAR INDUSTRIAL CO., LTD.
 ADDRESS: NO.8GEM-YEAR
 ROAD,E.D.Z.JIASHAN,ZHEJIANG,P.R.CHINA
 PURCHASER: MAPTCO FASTENERS (AUST) PTY LTD
 PO. NUMBER: MAP-2022M
 COMMODITY: ISO 4014 HEX HEAD BOLT HALF THREAD CL 8.8
 SIZE: M16-2.00X130
 LOT NO: 1B2071932
 SHIP QUANTITY: 1,080 PCS
 HEADMARKS: GENIUS SYMBOL & 8.8
 COUNTRY OF ORIGIN: CHINA

TEL: (0573) 84185001 (48Lines)
 FAX: (0573) 84184488 84184567
 DATE: 2020/08/24
 PACKING NO: GEM200804003
 INVOICE NO: GEM/MAP-200824MEL
 PART NO: A921
 SAMPLING PLAN:
 ASME B18.18-2017/ASTM F1470-2018
 HEAT NO: 18100536-4
 MATERIAL: X40ACR
 FINISH: H. T. PLAIN

PERCENTAGE COMPOSITION OF CHEMISTRY: TEST FACILITY :S

Chemistry	Al%	C%	Cr%	Mn%	P%	S%	Si%
Spec.:MIN.	0.0200	0.4000	0.2000	0.7000			
MAX.		0.4300	0.4000	0.9000	0.0250	0.0150	0.1000
Test Value	0.0230	0.4100	0.2600	0.7600	0.0090	0.0080	0.0300

DIMENSIONAL INSPECTIONS: ACCORDING TO ISO4014-2011 TEST FACILITY : M

SAMPLED BY: YUQIAN

INSPECTIONS ITEM	SAMPLE	TEST METHOD	REF	SPECIFIED	ACTUAL RESULT	ACC	REJ
WIDTH ACROSS FLATS	3 PCS	JB/T 9151		23.6700-24.0000 MM	23.7500-23.8500 MM	3	0
HEIGHT	3 PCS	JB/T 9151		9.8200-10.1800 MM	9.9200-9.9800 MM	3	0
BODY DIAMETER	3 PCS	JB/T 9151		15.7300-16.0000 MM	15.7800-15.8200 MM	3	0
MAJOR DIAMETER	3 PCS	JB/T 9151		15.6900-15.9600 MM	15.7500-15.8000 MM	3	0
NOMINAL LENGTH	13 PCS	JB/T 9151		129.2000-130.8000 MM	129.5200-129.8900 MM	13	0
SURFACE DISCONTINUITIES	18 PCS	IS06157.3			PASSED	18	0
THREAD LENGTH	13 PCS	JB/T 9151	44		45.2500-46.3000 MM	13	0
WIDTH ACROSS CORNERS	3 PCS	JB/T 9151		Min. 26.7500 MM	27.3200-27.5600 MM	3	0
THREAD	13 PCS	JB/T 9151		6g GO 6g NOGO	PASSED	13	0

MECHANICAL PROPERTIES: ACCORDING TO ISO 898.1-2013 TEST FACILITY : M

SAMPLED BY: WANGXIAOLAN

INSPECTIONS ITEM	SAMPLE	TEST METHOD	REF	SPECIFIED	ACTUAL RESULT	ACC	REJ
TENSILE STRENGTH	3 PCS	IS0898.1		Min. 800 N/MM2	884-890 N/MM2	3	0
CORE HARDNESS	13 PCS	IS0898.1		22-32 HRC	28.1-29.8 HRC	13	0
SURFACE HARDNESS	13 PCS	ASTM E384		Max. 350 HV	279-295 HV	13	0

ALL TESTS ARE IN ACCORDANCE WITH THE METHODS PRESCRIBED IN THE APPLICABLE ASTM/SAE/ASME. SPECIFICATION. WE CERTIFY THAT THIS DATA IS A TRUE REPRESENTATION OF INFORMATION PROVIDED BY THE MATERIAL SUPPLIER AND OUR TESTING LABORATORY.

THE REPORT IS ISSUED ACCORDING TO ISO16228 F3.1(EN10204 3.1)

TYPE M: MANUFACTURER

TYPE S: SUPPLIER(STEEL MILL,PLATING SUB SUPPLIER,HEAT TREATMENT SUB SUPPLIER ETC.)

WE CERTIFY THE PARTS ARE ROHS COMPLIANT.

SIGNATURE: