



**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-2011S
 COMMODITY: HEX CAP SCREW GR-8
 SIZE: 5/8-18X2-1/4 NF
 LOT NO: 1B2030904
 SHIP QUANTITY: 1,400 PCS
 HEADMARKS: GENIUS SYMBOL & 6 RADIAL LINES
 COUNTRY OF ORIGIN: CHINA

TEL: (0573) 84185001 (48Lines)
 FAX: (0573) 84184488 84184567
 DATE: 2020/07/10
 PACKING NO: GEM200521016
 INVOICE NO: GEM/MAP-200713SYD
 PART NO: E438
 SAMPLING PLAN:
 ASME B18.18-2017/ASTM F1470-2018
 HEAT NO: 19365268
 MATERIAL: SCM435
 FINISH: H. T. TRIVALENT ZINC 5U HYDROGEN
 RELEASE

PERCENTAGE COMPOSITION OF CHEMISTRY: TEST FACILITY :S

Chemistry	C%	Cr%	Mn%	Mo%	Ni%	P%	S%	Si%
Spec.:MIN.	0.3300	0.9000	0.6000	0.1500				0.1500
MAX.	0.3800	1.2000	0.8500	0.3000	0.2500	0.0250	0.0250	0.3500
Test Value	0.3600	0.9700	0.6300	0.2000	0.0300	0.0060	0.0010	0.2500

**DIMENSIONAL INSPECTIONS: ACCORDING TO ASME B18.2.1-2012 TEST FACILITY : M
 SAMPLED BY:**

INSPECTIONS ITEM	SAMPLE	TEST METHOD	REF	SPECIFIED	ACTUAL RESULT	ACC	REJ
NOMINAL LENGTH	15 PCS	JIS B1071		55.1200-57.1500 MM	55.5200-55.7000 MM	15	0
BODY DIAMETER	4 PCS	JIS B1071		15.6800-15.8700 MM	15.8500-15.8600 MM	4	0
WIDTH ACROSS CORNERS	4 PCS	JIS B1071		26.7000-27.5000 MM	26.8300-26.8800 MM	4	0
WIDTH ACROSS FLATS	4 PCS	JIS B1071		23.4200-23.8200 MM	23.4900-23.5100 MM	4	0
THREAD LENGTH	15 PCS	JIS B1071	38.1		44.1600-44.3400 MM	15	0
SURFACE DISCONTINUITIES	22 PCS	ASTM F788/F788M			PASSED	22	0
HEIGHT	4 PCS	JIS B1071		9.6100-10.2300 MM	9.7300-9.8400 MM	4	0
MAJOR DIAMETER	4 PCS	JIS B1071		15.6200-15.8300 MM	15.6600-15.6800 MM	4	0
THREAD	15 PCS	JIS B1071		3A GO 2A NOGO	PASSED	15	0

**MECHANICAL PROPERTIES: ACCORDING TO SAE J 429-2014 TEST FACILITY : M
 SAMPLED BY: DAIWENTING**

INSPECTIONS ITEM	SAMPLE	TEST METHOD	REF	SPECIFIED	ACTUAL RESULT	ACC	REJ
TENSILE STRENGTH	4 PCS	ASTM F606/F606M		Min. 150 KSI	165-169 KSI	4	0
SURFACE HARDNESS	15 PCS	ASTM F606/F606M		Max. 58.6 HR30N	52.6-54.9 HR30N	15	0
CORE HARDNESS	15 PCS	ASTM F606/F606M		33-39 HRC	34.9-36.8 HRC	15	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: