

## 4140 HOLLOW BAR

### RELATED SPECIFICATIONS:

Europe	EN 42CrMo4
Germany	DIN 17212 W.Nr 1.7223 Type 41CrMo4 DIN 17200-1654 W.Nr 1.7225 Type 42CrMo4
Great Britain	BS703M CD4
France	AFNOR 42CD4
USA	AISI 4140 ASTM A519-96 4140 SAE 4140 UNS G 41400
Japan	JIS G 3441 SCM 440 TK

### DESCRIPTION:

4140 Hollow Bar has a good combination of strength and toughness in the quenched and tempered condition. After oil quenching it will be through hardened up to 60mm bar diameter. The bar structure of bigger dimensions is not fully martensite. The steel is applicable to induction hardening. The surface hardness will exceed min. 53HRC. Can be delivered M-treated in order to optimise the machinability. 4140 has a restrictive weldability.

### APPLICATIONS:

Hydraulic shafts, hollow shafts, nuts, bushes, bearings, cylinders.

### CHEMICAL ANALYSIS:

	C %	Si %	Mn %	P %	S %	Cr %	Mo %
Min.	0.38	0.15	0.75	-	-	0.80	0.15
Max.	0.43	0.40	1.00	0.04	0.04	1.10	0.25

### MECHANICAL PROPERTIES:

Yield strength, R <sub>eH</sub> min MPa	Tensile strength, R <sub>m</sub> min MPa	Elongation, A <sub>5</sub> min %	Hardness, approx HB
900	1000	16	300

### COLOUR CODE: BLUEBELL END

