

## **MADE IN AMERICA**

LUFKIN Rods is the only privately owned and operated Sucker Rod manufacturing plant in the USA. All our products are sourced and manufactured domestically, and our advanced manufacturing plant ensures the highest quality possible. Our automated system continually monitors the manufacturing process and ensures the quality is consistent from start to the finish. Throughout the entire manufacturing process our quality control is unmatched in the industry. We offer more experience than any other sucker rod provider and offer unparalleled solutions for your rod lift applications. LUFKIN Rods will help you meet or exceed your goals, and can offer expert help with predictive designs, product selection, failure analysis, training and more. Put our experienced team to work for you and reduce your failure rates and improve your bottom line.

GRADE	С	K	DA	KD	DXS	HA	HS
UNS Series Steel	G15360	G47200	G41400	G47200	G43300	G41380	G43300
End Cap Color	White	Blue	Yellow	Orange	Silver	Green	Purple
Chemical Composition						1 hours	
Carbon, %	0.34 to 0.39	0.19 to 0.23	0.38 to 0.43	0.19 to 0.23	0.30 to 0.34	0.38 to 0.43	0.30 to 0.34
Manganese, %	1.15 to 1.35	0.85 to 1.05	0.75 to 1.05	0.85 to 1.05	0.70 to 1.10	1.00 to 1.30	0.70 to 1.10
Phosphorus, %	0.04 max.	0.03 max.	0.03 max.	0.03 max.	0.03 max.	0.03 max.	0.03 max.
Sulfur, %	0.04 max.	0.04 max.	0.035 max.	0.04 max.	0.035 max.	0.035 max.	0.035 max.
Silicon, %	0.15 to 0.35	0.15 to 0.35	0.15 to 0.35	0.15 to 0.35	0.15 to 0.35	0.15 to 0.35	0.15 to 0.35
Nickel, %	0.25 max.	0.90 to 1.20	0.25 max.	0.90 to 1.20	1.65 to 1.85	0.30 max.	1.65 to 1.85
Chromium, %	0.20 max.	0.80 to 1.05	0.90 to 1.10	0.80 to 1.05	0.90 to 1.10	0.50 to 0.90	0.90 to 1.10
Molybdenum, %	0.06 max.	0.22 to 0.30	0.15 to 0.25	0.22 to 0.30	0.15 to 0.30	0.24 to 0.35	0.15 to 0.30
Vanadium, %	0.04 to 0.07	0.02 to 0.045	0.03 to 0.05	0.02 to 0.045	0.07 to 0.10	0.07 to 0.11	0.07 to 0.10
Copper, %	0.35 max.	0.40 to 0.60	0.35 max.	0.40 to 0.60	0.35 max.	0.35 max.	0.35 max.
Mechanical Properties							
Yield Strength, 2-inch offset, ksi	60 min.	60 min.	95 min.	85 min.	100 min.	115 min.	115 min.
Tensile Strength, ksi	90 to 115	90 to 115	120 to 140	115 to 140	125 to 140	140 to 150	140 to 150
Elongation, 8-inches, %	13 min.	16 min.	10 min.	10 min.	10 min.	10 min.	10 min.
Reduction of Area, %	45 min	55 min.	45 min.	45 min.	45 min.	40 min.	40 min.

## SUCKER ROD – SPECIFICATIONS

Effective Date: January 13, 2022. Specifications subject to change without notice.