

STUBS - Europe's largest manufacturer of Silver Steel

Insist on *STUBS* for guaranteed special accuracy at standard prices.

Fine Standard Tolerances

1" and above +/- 0.0005"

Below 1" +/- 0.0003"

Over 25mm + 0.00mm - 0.02mm

25mm and below + 0.00mm - 0.01mm

Closely Controlled Analysis - min. max

Carbon 1.10% 1.20%	Silicon 0.10% 0.25%
Chromium 0.40% 0.50%	Sulphur 0.035% max.
Manganese 0.30% 0.40%	Phosphorus 0.035% max.

Uniform machining properties and consistent response to heat treatment.

Exceptional Surface Finish

Eliminates grinding or polishing.

The exceptionally high surface finish of genuine STUBS Silver Steel can be utilised without the need for further expensive grinding or polishing.

Controlled Annealing

Maximum degree of spheroidisation.

Easier, more uniform machining is possible giving greatly improved machined surface.

Heat Treatment

Hardening

For maximum hardness, (66 Rockwell 'C' or 850 DPN), heat to 770°C - 790°C (1420°F - 1450°F). Soak till uniform then quench clean water or preferably 10% brine solution. The most satisfactory and efficient method is to heat in a salt bath and it is advisable that the temperature should be carefully controlled. The use of a pyrometer is suggested. If a muffle furnace is used the atmosphere should be slightly reducing to minimise scaling and to avoid soft spots.

Tempering

Minimum 1 hour soak, immediately after hardening.

Temp Range	Hardness
150°C (302°F)	63/65 Rc
200°C (392°F)	60/62 Rc
250°C (482°F)	59/61 Rc
300°C (572°F)	55/57 Rc

Annealing

Heat slowly to 760°C - 780°C (1400°F-1436°F). Soak for 1 hour per inch of section and cool slowly in the furnace.