

COR™ALLOY 4140 FC

DESCRIPTION

COR™ALLOY 4140 FC is a flux-cored, AISI chrome-moly steel, and is readily available in MIG, TIG, and sub-arc versions.

APPLICATIONS

4140 FC is typically used to build up all types of dies, forgings, castings, and other machine parts made from medium carbon, low alloy steels. It may also be used to join thin sections of AISI 4140 materials.

PROCEDURE

A minimum preheat/interpass temperature of 550-650°F is recommended for AISI 4140. Allow the welded part to cool as slow as possible. Post heat treat to desired hardness. Heat treat according AISI 4140 to desired hardness.

WELDING PARAMETERS

Size	Volts	Amps	Shielding Gas/Flux
MC-G .045"	18-30	150-250	CO ₂ or Ar-CO ₂ mixtures
MC-G 1/16"	20-30	200-300	CO ₂ or Ar-CO ₂ mixtures
FC-G 3/32"	26-29	250-350	CO ₂ or Ar-CO ₂ mixtures
FC-S 1/16"	25-30	200-250	Lincoln 880
FC-S 3/32"	28-32	350-450	Lincoln 880

MECHANICAL PROPERTIES

Hardness: 32-40 as welded
Flame hardenable to 58 Rc

CLASSIFICATION

AISI 4140