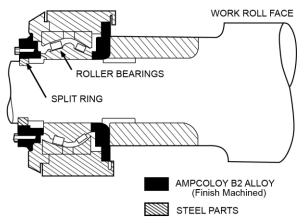


AMPCO METAL Excellence in engineered alloys

APPLICATION DATA OF AMPCO ALLOYS

APPLICATION: Spacer rings on necks of steel mill work rolls.

DESCRIPTION: On certain hot strip mill stands there are designs where it is necessary to position axially the roller bearings on the roll necks of the work rolls. The roller bearings take tremendous shock loads so it is advantageous to permit the inner races of the bearings to slightly rotate or creep. This prevents excessive Brinelling of the races. Lubrication is also aided by this movement. With suitable bronze spacer rings properly machined and tightened, the inner races have a load applied against their faces which permits an occasional partial rotation due to the compatibility of the bronze and the steel.



ALLOY: AMPCO® 18 alloy

METHOD OF MANUFACTURE: Centrifugally cast, rough bored and faced or finish machined complete.

ADVANTAGES: During normal operation, spacer rings must withstand heavy loads and exhibit good wear resistance. When the rolls break in service, however, the AMPCO® 18 alloys is subjected to excessive abuse and then proves its real merit in this application. It resists squashing and possesses the slipperiness necessary to avoid seizing and additional lost time and maintenance cost.

GENERAL: Spacer rings must be machined to close tolerances. AMPCO® 18 alloy lends to this type of machining.