



Industry Uses:

- Aerospace
- Aircraft
- Automotive
- Tool & Die
- Defense

Call: (937) 253-5311

www.techmetals.com

Technical Advantages

- Superior hardness
- Hard Chrome replacement
- Protect parts & tooling from wear
- Uniformity of thickness, no post-machining
- Increase/improves MTBF of equipment
- Can prevent premature failure on moving parts
- Increases frictional transmission by 300%
- Frictional enhancement
- Texture on molds
- Reduces slippage

Properties as Plated:

- Deposit Thickness: .0025" – .008" +/- .0003"
- Texture: 160-220 grit
- Hardness: 900 Vickers

After Heat Treatment:

- Deposit Thickness: .0025" – .008" +/- .0003"
- Texture: 160-220 grit
- Hardness: 1,200 Vickers

Diamonize Plus

Diamonize Plus is a hard uniform coating that is commonly used to attain a grit-like texture to improve wear and grip. The coefficient of friction is determined by that of a deposit with a 20 micron particle size.

In some applications, this alloy can eliminate the requirement for additional texturing. Diamonize-Plus can be applied to all ferrous & most non-ferrous metals. Uniformity & accuracy of the deposit is maintained within +/- .0003". This is a good Hard Chrome Replacement for wear.

It provides uniform deposits on the most complex shapes and is a friction-enhancing coating. The load transfer ability of frictional parts is limited by the friction coefficient of the mating of material. Frictional transmission can be increased up to 300% – which can enhance in more lightweight and compact designs.

This coating can open up new possibilities in automotive, petrochemical paper and engineering applications. Diamonize-Plus can be a superior choice in power train, transmission, drive technologies and other mechanical engineering or pulley applications.

