

Volume 7

# PINS & ROLLERS SOLUTIONS

## Hartford Technologies: World Leader in Engineered Solutions for High Volume Pins and Rollers

*Hartford Technologies has extensive capability for the design and manufacture of precision custom pins and rollers in high volumes.*



**Do you have applications that demand precision engineered pins, shafts or rollers?** Hartford Technologies is the world's leading source for high volumes of engineered components, delivered on-time, and on-budget.

**Need perfectly spherical ends that are free of marks?** Highly polished ground surfaces? Precise perpendicularity? Exact lengths? Hartford manufacturing teams are the industry's experts in metal finishing, with 80+ years experience in handling complex, close tolerance turning milling and grinding requirements.

**Made on 2 Continents . . . Sold on 6.** Hartford gives a powerful logistical advantage. Our dual manufacturing facilities in the US and China meet even the tightest lead times, and always excel where there are multiple shipping destinations. US-based inventory management, and US-based quality control systems assure that specifications for metallurgy, surface, and tolerance are met.

Hartford Technologies is ISO 9001 and ISO/TS 16949 certified, and is certified by numerous automotive manufacturers.

*Next time you need precision pins and rollers, call Hartford. Put our worldwide resources to work for your application!*

**High volume products are custom-manufactured to your specifications,** with length and diameter tolerances depending upon the size and end configuration.

Crowned, rounded spherical, and chamfered ends are available.

**Standard Materials:** chrome, carbon steel, 400, and 300 series stainless steel.

**Finishes:** up to 6 RMS

- Alignment pins
- U-Joints (needle rollers)
- Small motor shafts
- Mechanical timer pins
- CV Joints
- Clutches
- Starter drives
- Rolling elements in bearings
- Universal joints
- Constant velocity joints
- Roller clutches
- Cam rollers
- Rocker arms
- Transmission pins



*Hartford Technologies pins & rollers are a leading choice for the products shown here – and many others as well.*

# Needle Rollers

Whether you need 100,000 pieces or 100 million, Hartford needle rollers can be made to exacting requirements. Hartford needle rollers are used in bearing applications for automotive, industrial, ag and aerospace applications, and are also used as internal bearings.

**Standard Materials:** 52100 chromium steel, 8620 alloy steel, 440C stainless steel, 1008/1010 carbon steel, and M50 tool steel

**Finishes:** up to 6 RMS

**Applications:**

- Caged roller bearings
- Thrust bearings
- Cam followers



# Precision Rollers

Hartford precision rollers can be machined or cold formed, and are ideal for linear bearings, or as alignment pins in precision assemblies. Precision rollers for Hartford are widely used throughout the automotive and industrial sectors.

**Standard Materials:** 52100 chromium steel, 8620 alloy steel, 440C stainless steel, 1008/1010 carbon steel

**Finishes:** Up to 6 RMS

**Applications:**

- Alignment pins
- Linear seat track bearings
- Thrust roller bearings



# Special End Rollers

Special End Rollers are designed primarily for roller bearing applications. End configurations include flat, spherical, and cone shaped. Applications for special end rollers include the automotive and industrial markets.

**Standard Materials:** 52100 chromium steel, 8620 alloy steel, 440C stainless steel, 1008/1010 carbon steel

**Finishes:** Up to 6 RMS

**Applications:**

- Roller bearings
- Linear seat track bearings
- Thrust roller bearings



**Hartford Technologies is a Leading Global Manufacturer of Precision Metal Components for OEM Applications. We Offer:**



- Exceptional manufacturing flexibility
- LCC manufacturing for greatest overall value
- TS/ISO certified manufacturing facilities in the US and China
- Quick response to your inquiry
- A US tech support team
- US-based inventory management
- US-based quality control systems