

MACHINING

MATERIALS

Steel	Cast Iron
Pre-Heat Treated Steel	Ductile Iron
Stainless Steel	Nylon
Aluminum	Phenolic
Bronze	Delrin
Brass	



MILLING

- 1 Okuma Genos M560-V Vertical Machining Center
- 2 Mazak HCN-6000 (with one Pallettech)
- 2 Mazak FH-6800 Horizontal Machining Center
- 1 Bridgeport with Optics
- 1 Cincinnati "Cinova 80" Horizontal Mill with Vertical Head

	X axis	Y axis	Z axis	Table
CNC Horizontal (B Axis) CNC	31"	31"	31"	20"/2200lbs
Horizontal (B Axis)	41"	35"	38"	24"/3300lbs
Vertical	24"	12"	16"	42"x 9"



TURNING

- 1 Mazak Quick Turn 350M
- 1 Tool Room Lathe
- 1 Mazak Quick Turn 250MSY with bar feeding (Milling Y Axis and second turning spindle)
- 1 Mazak Quick Turn 350MSY with FANUC Robot CRX-20ia/l (Milling with Y Axis and second turning spindle)
- 1 Mazak Quick Turn 350 (Milling with Y Axis)
- 1 Mazak Quick Turn 450 (Milling with Y Axis)

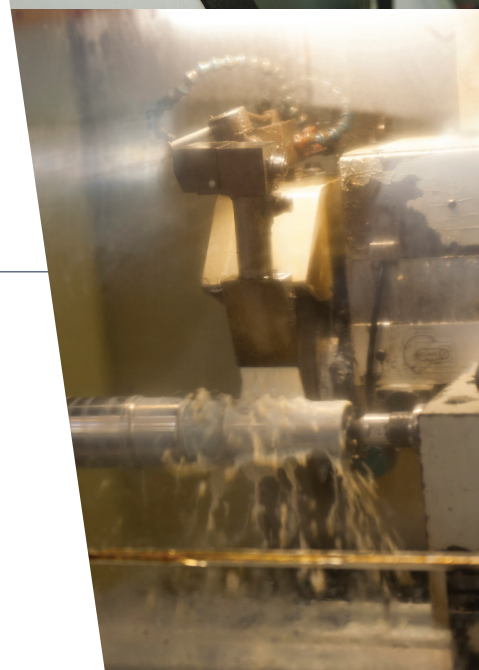
	Max diameter	Max length
CNC	10"	80"
CNC Chucking	22"	75"



GRINDING

- 1 Kellenberger CNC Universal Cylindrical Grinding Machine
- 1 Okamoto 12x24 Surface Grinder
- 1 Blanchard Rotary Surface Grinder

	length	diameter
CNC External	35"	6.875"
CNC External w/chuck	28"	6.875"
Surface	10"	36"
Rotary Surface	36" table	



MACHINING

GEAR CUTTING

AGMA Class 8

- 2 Fellows 36-6 Gear Shaper
- 1 Fellows 20-4 Gear Shaper
- 2 Fellows #6 Gear Shaper
- 2 Fellows #7 Gear Shaper

	Max. Diameter	Max. Face Width	Max. Diametal Pitch
External	40"	6"	3
Internal	36"	6"	3



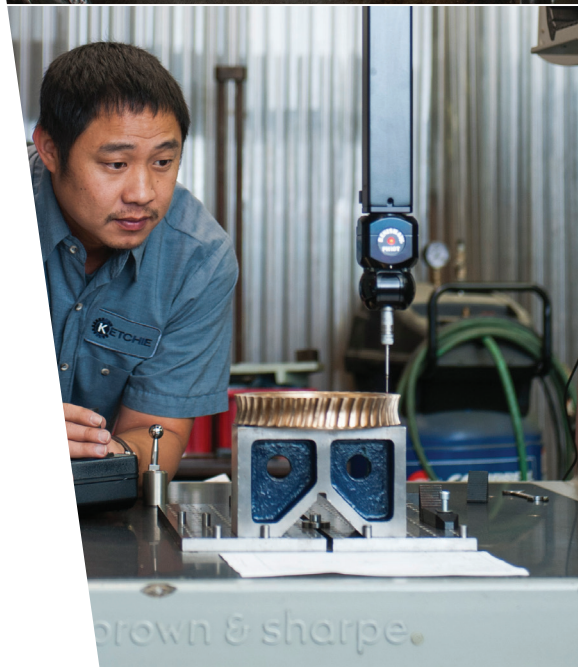
DRILLING & BROACHING

- 1 LaPoint 5 Ton Hydraulic Horizontal Broach
- 1 Clausing 15" Drill with Procurier Tapping Head
- 1 Leland-Gifford 3 Spindle Drill Press
- 1 Carlton Radial Drill



INSPECTION

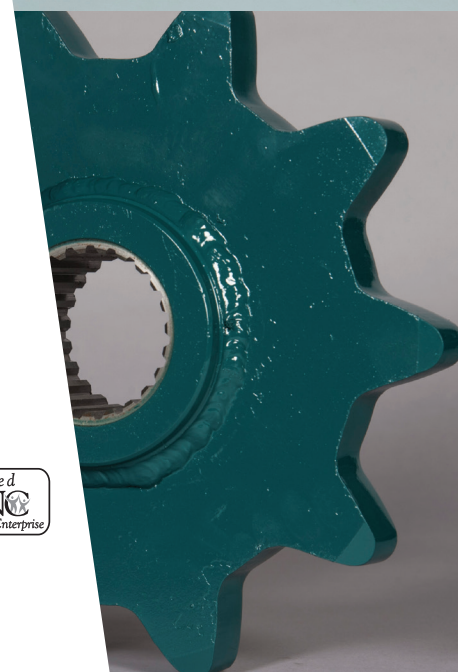
- 1 Brown & Sharpe Coordinate Measuring Machine
- 1 Faro Arm, Portable CMM
- 1 J&L Optical Comparator
- 1 Wilson Rockwell Hardness Tester
- 1 Phase 2 Surface Roughness Tester
- 2 Bryant Surface Plates



FINISHING

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