

Northern California Injection Molding

Facility and Equipment List

Building Information:

Over 23,500 Sq. Ft. Manufacturing and Warehouse area

Computer Systems:

A well maintained local network of 21 workstations and 6 servers with supportive peripheral hardware. Company and customer data is backed up nightly and stored at secure off site locations. Primary software applications for management and production include:

- **IQMS** ERP database system, integrated with our sister company, *El Dorado Molds*.
- **MAS 90** accounting database
- **Microsoft Office** application suites, including **Exchange** and **Sharepoint** services

Plastic Injection Molding Presses:

- (1) **Nissei FN 7000**, 400 Ton molding press with Star Robot and color screen controller, model #NC9300T. Machine is equipped with runner removal station, indexing conveyor, and automatic dry air resin loading system. Shot size 32.1 oz, tiebar distance 28.9" x 28.9".
- (1) **Nissei FN 5000**, 240 Ton molding press with color screen controller, model #NC9300T. Shot size 16.9 oz, tiebar distance 23.2" x 23.2". Yushin robotic sprue picker attached. Automatic material conveying system.
- (1) **Nissei FN 5000**, 240 Ton molding press with color screen controller, model #NC9300T. Shot size 22 oz, tiebar distance 23.2" x 23.2". Yushin robotic sprue picker attached. Automatic material conveying system.
- (4) **Nissei FN 3000**, 154 Ton molding press with color screen controller, model #NC9300T. Shot size 8.5 oz, tiebar distance 18.9" x 18.9". Yushin robotic sprue picker attached. Automatic material conveying system.
- (2) **Nissei FN 1000**, 89 Ton molding press with color screen controller, model #NC9300T. Shot size 4.3 oz, tiebar distance 15.2" x 15.2". Yushin robotic sprue picker attached. Automatic material conveying system.

- (2) **Nissei PS 40**, 44 Ton molding press with color screen controller, model #NC9300T. Shot size 1.5 oz, tiebar distance 12.2" x 12.2". Yushin robotic sprue picker attached. Automatic material conveying system.
- (2) **Nissei FNX 220**, 237 Ton molding press with TACT touch screen color controller. Shot size 17.08 oz, tiebar distance 23.2" x 23.2". 3-axis Star Robot attached. Automatic material conveying system.
- (2) **Nissei FNX 140**, 154 Ton molding press with TACT touch screen color controller. Shot size 8.59 oz, tiebar distance 20.1" x 20.1". Automatic material conveying system.

- (1) **Nissei NEX 50**, 55 Ton molding press with TACT touch screen color controller. Shot size 1.18 oz, tiebar distance 13" x 13". Automatic material conveying system.
- (1) **Nissei NEX 80**, 88 Ton molding press with TACT touch screen color controller. Shot size 3.41 oz, tiebar distance 15.15" x 15.15". Automatic material conveying system.
- (1) **Nissei NEX 180**, 198 Ton molding press with TACT touch screen color controller. Shot size 6.9 oz, tiebar distance 20.8" x 20.8". Automatic material conveying system.

Robotics:

- (4) **Star** fully automated robot with wrist flip orientation and end of arm tooling.
- (1) **Adept** fully automated robot with wrist flip orientation and end of arm tooling.
- (1) Heated thrust-cut nipper station for automatic gate trimming at press side.
- (10) **Yushin** wrist flip and vacuum sprue picker robots.

Hot Runner and Mold Controller Equipment:

- (3) **DME** single zone hot manifold controllers
- (2) **DME** dual zone hot manifold controllers
- (3) **PPE** dual zone hot manifold controllers
- (1) **IMS** dual zone hot manifold controllers
- (2) 10 zone **Gammaflux** hot manifold controllers
- (2) 12 zone **Gammaflux** hot manifold controllers
- (1) 11 zone **Gammaflux** hot manifold controller
- (1) 6 zone **Gammaflux** hot manifold controller
- (2) **MoldMaster** eight (8) zone hot manifold controller

Mold Heaters:

- (24) **Thermalcare** mold temperature controllers
- (2) **Thermalcare Oiltherm** mold oil heaters
- (1) Negative pressure mold heater

Drying Equipment:

- (1) **Comet** Desiccant dryers, 200 lb. capacity with auto loaders
- (3) **Dri-Air** 100 lb, 4 bed desiccant dryer with 7 day timer
- (12) **Dri-Air** 150 lb, 4 bed desiccant dryer with 7 day timer
- (1) **Dri-Air** 200 lb, 4 bed desiccant dryer with 7 day timer
- (1) **Dri-Air** 400 lb, 4 bed desiccant dryer with 7 day timer
- (1) **Matsui** 250 lb. desiccant Dryer with 7 day calendar timer

Resin Process Equipment:

- (2) **AEC Nelmor** 10 hp. granulators
- (2) **Nissui** sprue grinders with vacuum take-offs
- (2) Venturi vacuum resin conveyors

Material Loading Equipment:

- (1) **Crizaf** automatic box loading conveyer system with robot interface capable of handling 24" cubic box.
- (1) **Crizaf** automatic box loading conveyer system with robot interface capable of handling 18" cubic box.
- (3) **Crizaf** auto indexing part conveyor.
- (2) **Crizaf** auto reversing part conveyors for part quality separation.
- (3) **La Ros** 45° incline conveyors with variable speed control.
- (16) Venturi auto loaders with sight glass attached to every molding press.

Cooler, Chiller and Process Equipment:

- (1) **Thermalcare** 10 ton chiller unit
- (1) **Thermalcare** 80 ton recirculating cooling tower
- (2) 10 HP process pumps with one as standby
- (2) 100 Micron process supply filtration system
- (2) 25 Micron filtration system for mold cooling process

Air Supply Equipment:

- (1) **Kaeser** screw type air compressor
- (1) **Kaeser** air drying system
- (1) **Kaeser** moisture removal unit
- (1) **Kaeser** oil removal unit
- (1) **Ingersoll Rand** back-up compressor
- (1) 120 Gallon Air Receiving Tank

Material Handling Equipment:

- (1) 25,000 lb. pallet storage and racking system
- (1) Set Extra heavy duty mold storage racks, 24,000 lb. per shelf
- (1) **Toyota** 8,000 lb. lift capacity propane forklift
- (1) **Toyota** 5,500 lb. pallet truck
- (1) Battery charging system

Quality Control Measuring and Inspection Equipment:

- Complete equipped quality laboratory maintaining procedures to extremely high standards. Our Quality System meets ISO 9000 Quality standards.
 - Precision instruments for quality control inspection and in-process inspection criteria.
 - All block gauge sets, digital micrometers, digital depth micrometers, digital calipers, pin gauges and indicator gauges are recalled, dated and calibrated annually with certifications per QSA 9000 procedures.
 - Special purpose thread gauges, plug gauges and custom test fixtures
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- (1) **Mitutoyo QV 606 PRO** 3D vision measuring machine with full touch probe option. Measuring capability 24" x 24" x 10". CMM capability with touch probe option.
 - (1) Surface analyzer for measuring surface finish
 - (1) **Arizona Instruments** molding resin moisture analyzer
 - (1) **Micro-Flat** 8" x 48" x 72" surface plate
 - (1) Inspection microscope for detailed visual inspection of all parts
 - (18) Inspection magnifying lamps at press side for detailed visual inspection of all parts manufactured at NCIM.
 - (1) Stress testing machine for part testing and conformance to customer specifications.
 - (1) Rotary and dividing inspection head with fixtures

Weight Measuring Equipment:

- (1) **Detecto** 2000 lb. capacity platform scale
- (1) **Setra** 100 lb. capacity x 0.01 grams weigh counting scale with 500 lb. remote platform
- (1) **Setra** 60 lb. capacity x 0.5 grams weigh counting scale with 500 lb. remote platform
- (1) **Ohaus** triple beam measuring scale

Packaging Equipment:

- (1) Electric plastic bag sealer
- (1) Guillotine and paper cutter
- (18) Assembly and inspection benches
- (2) Die carts for mold maintenance and in house mold servicing