

Nordson Colormax PE Enamel Powder Paint Booth

Powder Coating Type: Inorganic

Design Conveyor Speed: Variable 10 - 25 FPM

Conveyor System Type: Monorail

Parts Coated: Oven Cavities

Coating Thickness Desired: 5 - 9 mils Average on Selected Surfaces

Largest Part Size: 2'5" W x 2'1" H

Profile End Opening: 3'6" W x 3'6" H

Number of Reclaimed / Recycling Powders: 4

Number of Powders: 4

Robot Powder Gun Equipment

Prodigy™ Dual Long Gun Wall Mount System with HDLV™ Technology

- * Softer spray at gun tip provides higher first pass transfer efficiency
- * Softer spray with more powder means better coverage in cavities and corners
- * Paints faster at high line speeds with higher powder output
- * Auxiliary high-low flow adjustment trigger
- * Innovative HDLV conical and flat spray nozzle technology
- * Individual and global set-up and monitoring of all gun parameters and presets
- * 10 user configurable presets
- * Purgeable pump design provides ultra-fast color change
- * See-through pump design for quick, easy diagnostics

- 1** - *Prodigy™ II Dual Gun Wall Mount System with HDLV™ Technology*
- 2** - *Cable, Prodigy, Auto, 16M*
- 2** - *Prodigy PLC Gateway*
- 2** - *Prodigy™ Automatic Bar Mount Powder Gun with HDLV™ Technology*



- *Designed for use with HDLV™ powder transport technology*
- *Contoured body*
- *Lightweight*

- *Innovative HDLV™ Air Cap Nozzle Technology*
- *Smaller Transport Tubing*

Smart Coat Control System

- * Allen Bradley Panelview Plus 15" with Pedestal
- * Thirteen dual iFlow closed-loop mass flow meters (accuracy +/- <1%)
- * Thirteen dual gun driver cards
- * *(Same features as item "C" above)*

24 - *Encore P.E. Guns, Mounts, Cables*



Gun Mounting Equipment to Include:

Heavy Duty Fixed Gun Stand for mounting of automatic guns.

- 2** - *Heavy Duty Fixed Gun Stand*
- 2** - *24" Belt Driven In/Out Positioner Base, DC drive*

Fanuc Robot Equipment to include:

- 2** - *Fanuc M-710/C /50 Foundry Pro Six Axis Mechanical Unit*
- 2** - *Fanuc M-20iA/10L Six Axis Mechanical Units*
- 4** - *Product Documentation CD's*
- 4** - *2-year warranty for Robots*
- 1** - *2 Weeks supervision at Nordson, Amherst, Ohio lab for process validation.*
- 1** - *2 Weeks supervision at Nordson, Amherst, Ohio for validation runoff*
- 1** - *6 Weeks installation startup support at Electrolux, Memphis, TN*
- 1** - *2- 32 hour training classes at Fanuc for operator training*
- 4** - *General purpose access gate dual channel interlock w/ mt bracket*
- 4** - *General purpose emergency stop (E-Stop) dual channel push button*
- 4** - *General purpose warning beacon*
- 4** - *Custom Robot riser*

Poly Plus Canopy

- * High performance non-conductive material
- * Ceiling panels include translucent light panels.

- * Two (2) automatic gun slots, 3.93" w(100mm w) x 60"h (1524mm h)
- * Four (4) robot spray gun stations with floor blowoff and access doors
- * Exit end doors for booth clean down
- * Ten (10) Four tube fluorescent fixtures T5 lamps

COLORMAX P.E. BOOTH BASE ASSEMBLY

5'-9" wide by 44'-9" long (1750mm x 13649mm)

- * *Modular design base assembly with continuous centerline extraction hood and single extraction duct connection.*
- * *Extraction hood panels formed to optimize the shear forces along the bottom edge of the panels. Each panel having a unique slot width to ensure proper draw along the entire length of the extraction hood.*
- * *Colormax powered roller base with 4 wheel drive system*
- * *High load lateral roller carriages to prevent crabbing*
- * *Separate drive "cells" to prevent misalignment due to torsional twisting of drive shaft.*
- * *Roller base utility deck system has a series of channels with routinely spaced pass-through openings for service access of powder hoses, pneumatics and electrical services.*
- * *Roller base assembly will be pre-fitted with all gun movers, feed centers, operator painting platforms and other devices, complete with all utilities and appropriate cross-over points prior to shipping.*
- * *Roller base sections will be coupled together with a series of coupling pins.*
- * *Additional structural elements will be included to accommodate the static and dynamic loads of the painting robots for this booth.*
- * *Operator pendant for mover control*
- * *Booth positioning and Alignment Stop Accurate to +/- 1/16" at the pin point.*
- * *Stainless Steel Ductwork from Base to Module Replaceable wear liner in the ductwork from the base to the color module.*
- * *Integral floor blow-off thresholds will re-entrain any powder that may collect on the service floor during routine powder application.*
- * *Booth Base Hose and Cable Trays with cam clasp lids for easy access*
- * *Engineered hose routing and hose/cable identification system*

12,000 CFM High Flow Fan Assembly

- * *20 HP belt driven fan, 95.3% efficiency with loss of phase protection*
- * *Noise abatement design high flow exhaust fan*

- 1** - *Excel 2003 Fan Assembly(s)*
- 1** - *Level Sensor(s)*
- 6** - *Final filters no tools required for final filter removal. Filters are 95% efficient at .30 microns*

Reclaim Cartridge Modules Features:

- * Designed to assemble as either a cartridge filter or a sintered thermoplastic Teflon coated rigid panel filter module.
- * Non-integrated final filter/fan section is required to allow the system to roll on/off onto either conveyor line for this stream.
- * Enlarged face opening to reduce load on fan and provide more uniform air flow.
- * Inflatable pneumatic seal provides air-tight connection between collector module and fan section.
- * Center-mount cartridges automatically set gasket compression without torque specifications to eliminate leaks and ensure faster filter changes.
- * Quick disconnect design
- * Fitted with low rolling resistance wheel assemblies and are capable of being propelled by an external powered hand tug.

- 1** - *Powder Coated Collector Module per booth*
- 30** - *36" PowderGrid[®] Plus Cartridges*
- 2** - *HDLV High-Capacity pump stations*
- 1** - *Backup HDLV pump and stand*



Powder Supply Equipment for 26 Guns

- 1** - *Model HTM-36 350# Capacity Hopper*
- 1** - *AZO 650 Sieve*
- 1** - *Fluidized Bed Heater*
- 1** - *Magnetic Separator*
- 1** - *Endress Hauser Level Control*
- 24** - *P.E. Pump*
- 1040-** *Tubing, Polyurethane, High-Flow*

Tilt Table Bulk Feed System

*Provides cleaner, easier transfer of powder materials directly from 3,000 pound fiber containers to the hopper/feeder in a constant, more efficient operation.

1 - Tilt Table Assembly

2 - HDLV High-Capacity pump stations for Virgin Feed

**Greater output for higher productivity rates- up to 360 lbs per hour*

**Improved savings in compressed air usage*

**Lower powder velocity with less air to propel the powder*

125' - Tubing, Polyurethane, Transfer



Standard Electro-Pneumatic Control Panel Featuring:

** (Same features as item "L" above)*

Automatic Air Flow Control

1 - 30 HP 95.3% efficient VFD

** Includes one touch clean-up mode for full exhauster power to assist in color change.*

**Includes automatic exhauster idle mode for extended line gaps*

Part Identification System

1 - Parasitic "CAT" Drive

1 - Part Identification Stand(s)

2 - 48" Vertical Emitter Scanner, 3/4" Resolution

2 - 48" Vertical Receiver Scanner, 3/4" Resolution

2 - 24" Horizontal Emitter Scanner, 3/4" Resolution

2 - 24" Horizontal Receiver Scanner, 3/4" Resolution

1 - Incoming part crash avoidance interlock

1 - Bent hangar part out of position detection system

Enhanced Lean Recipe Selector (LRS)

** Parts will be measured in three dimensions*

** A recipe number will be assigned to the part based on unique part dimension assigned by Nordson and EHP.*

* Provides the ability to manually select a color group that can be used in conjunction with automatically generated recipe number.

Automated Booth Control Functions Including:

** (Same features as item "P" above)*

Additional Reclaim Module:

** (Same description as item "X" above)*

- 1** - Powder Coated Collector Module(s)
- 30** - 36" PowderGrid[®]™ Plus Cartridges each
- 1** - Model HTM-36 350# Capacity Hoppers
- 1** - AZO 650 with Mag Separator
- 1** - Quick disconnect plate for gun purge

