

Section 2

Equipment Description

2.1 Specifications



Physical	
Feeder Weight	90 lbs. With empty powder canister
Feeder Width	13 1/16 in. (331.79 mm)
Feeder Length	31 3/8 in. (796.93 mm)
Feeder Height	32 1/8 in. (815.98 mm)
Canister Capacity	205 in ³ (3,359 mm ³)
Optional Cart Width	21 in. (533.4 mm)
Optional Cart Length	39 in. (990.6 mm)
Optional Cart Height	31 in. (787.4 mm)
Electrical	
Input	115 VAC, 50/60 Hz, 2.4 FLA
Gases	
Nitrogen (Carrier) OR	100 SCFH (47 l/min) max. at 100 psi (690 kPa)
Argon (Carrier)	140 SCFH (66 l/min) max. at 100 psi (690 kPa)
Air (for Pinch Valves Only on HP/HVOF version)	1-3 CFM (30-85 l/min) at 70 psi (483 kPa)

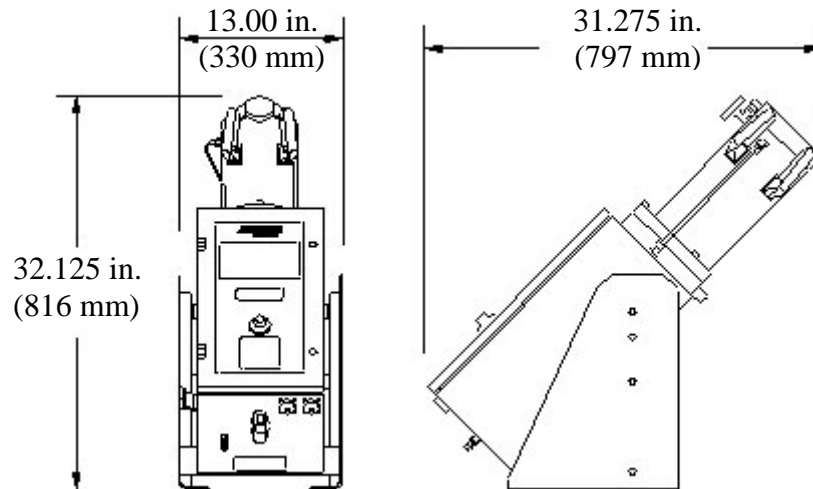
2.2 Description

The Praxair Model 1264 Powder Feeder is an electronically controlled, pressurized unit that produces accurate, repeatable feed rates. The Model 1264 is used with plasma and High Velocity Oxygen Fuel (HVOF) thermal spray systems.

The Model 1264 operates on a volumetric feed principle, where slots in a powder wheel at the base of the canister fill with powder. As the powder wheel rotates past the exit port, the powder is metered into the powder hose and carried to the spray gun in the gas stream.

Powder wheel speed governs the rate at which powder flows to the gun. A built-in tamper assembly helps feed powders that have a tendency to bridge or clog by tamping powder into the slots of the powder wheel. The Model 1264 mounts on a roll away cart with locking wheels.

Figure 2-1. Model 1264 Dimensions



When the hopper is turned off, a pressure relief valve is actuated, releasing the pressure inside the canister (Plasma Mode only). The rapid release of pressure from the hopper reduces the residual flow of powder. When the hopper is in HVOF Pressurization Mode, the pressure relief valve remains closed and the canister remains pressurized until operator turns off power to hopper. See Section 4 for a description of Model 1264 modes.

A large numeric display shows current and pertinent hopper conditions. These include powder wheel RPM, hours the unit has been in actual powder feeding operation since its last preventive maintenance overhaul, and total run time hours.

2.3 Options

- **Powder Wheels**

The Model 1264 comes with the standard powder wheel installed (1250-109). There are 4 other powder wheels available for special applications.

- 1250-109 Standard Wheel (Plasma - HVOF)
- 1250-141 Fine Wheel (Plasma - HVOF)
- 1253-109 High Volume (Plasma)
- 5008643 120-Hole Wheel (HP/HVOF - HVOF – Plasma)
- 451760 240-Hole Wheel (Plasma - HVOF)

- **Feeder Stacking Canister Kit – P/N 800811**

For high-volume powder feeding needs, a stacking canister assembly is available. The stacking canister attaches to the existing canister and effectively doubles the holding capacity of the feeder.

- **Pinch Valve Retrofit Kit – P/N 601163**

The Pinch Valve Retrofit Kit is an internally mounted set of air operated pinch valves that provide instantaneous, positive powder feed shutoff while maintaining feeder pressure which allows quick restarts. This is standard for 1264 Powder Feeders being used with JP-5000 and JP-8000 HP/HVOF systems.

- **1280 Feedrate Control – P/N 800830**

The 1280 Feedrate Control is a sophisticated loss-in-weight platform. The 1280 provides closed-loop control of the powder feeder to accurately and consistently feed powder to the spray guns.

- **1284 Powder Gas Control – P/N 800841**

The 1284 Powder Gas Control provides carrier gas control and remote operation for the 1264 Powder Feeder.

- **Step-down Transformer Power Supply – P/N 610313**

A step-down power transformer is available for converting 220 VAC, 50/60 Hz, 1 Ph to the 1264's required 110V, 50/60 Hz, 1 Ph. This power supply has receptacles for two powder feeders.

- **Mixer Assembly Kit for Plastic Powders – P/N 5004581**

A mixer assembly kit is available for enhancing the 1264 Powder Feeder's ability to feed light plastic powders.

- **High Volume Powder Wheel Conversion Package – P/N 800810**

A conversion package for the 1264 when the high volume wheel (1253-109) is used. Helps to ensure proper feeding of large particle sized, low density, hard to feed powders such as plastics.

Notes