

DPS 1000

The DPS 1000 is a semi-automatic depowdering station that safely removes and collects all loose powder from the printed components for reuse in future print jobs. Designed to automate post-print component cleaning, it enables its users to more easily serially-manufacture binder jetted parts and frees up valuable time.

HOW IT WORKS

The layout of the print box, with the powder embedded components, is opened in a CAD program to create CAM-curves and uploaded to the DPS 1000. An automated depowdering nozzle then removes the loose powder with compressed air. If necessary, a secondary step can be performed for components with more challenging geometries, such as channels and hard to access areas. In this case, the components are manually rearranged and put back in the depowdering station for additional processing.



THE DPS 1000

BENEFITS

- Compatible with G-Code for easy to use programming
- Programmable air pressure control
- Depowdering tool with 4 axis movement
- 2 separate air channels to enable simultaneous operations
- Fully customizable nozzle-tool that enables you to 3D print your own required tool
- Possibility to be used as a manual depowdering station
- Easy inside access to operate through glove operation
- Automatic safety system for manual interaction during process
- Multiple powder extraction ports to facilitate easy cleaning
- Port for easy connection of auxiliary equipment
- Threaded coordinate table for easy and accurate fixing of print boxes and fixtures

Machine facts

Dimensions	1300 × 1100 mm
Weight	1250 kg
Power Consumption	1.5 kW Average
Compressed Air Flow	Approx. 100 l/min

Est Time Saving

Depending on components complexity and series standardization.

Case Study

For a standard set of acceptance test cubes, a 45 min time saving was achieved vs. a fully manual process. No need for operator handling during the process.

Replaces

Manual Depowdering Cabinet.