



Piocreat G40
Machine
Parameters



Piocreat G40 Machine Parameters Installation Guide

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Piocreat G40 Machine Parameters



Product Usage Instructions

1. Machine Setup and Preparation

Before starting the machine, ensure that the printing table is clean and free from any debris. Check that all components are properly connected and secured.

2. Powering On the Machine

Turn on the main circuit breaker switch located in the electric cabinet. Press the switch power button to activate the machine.

3. Loading Materials

Load the desired printing material into the feeder according to the specifications provided. Make sure the material is compatible with the machine.

4. Setting Parameters

Adjust the print mode and processing mode parameters as needed for your specific project. Ensure that the unit parameters are correctly configured.

5. Initiating Printing Process

Select the print trip coordinates and start the printing process. Monitor the machine during operation for any irregularities.

LARGE GANTRY ADDITION AND SUBTRACTION PROCESSING CENTER



Additive and subtractive manufacturing integrated machine

Screw 3D printing and CNC five-axis manufacturing integrated By 3D printing to print the work piece closed to the final size and contour, then the final size is achieved by milling, the processing speed is faster, the cost is lower, and the material is more efficient to use. The integrated manufacturing of adding and subtracting materials is an ideal solution for forming large sized work pieces.

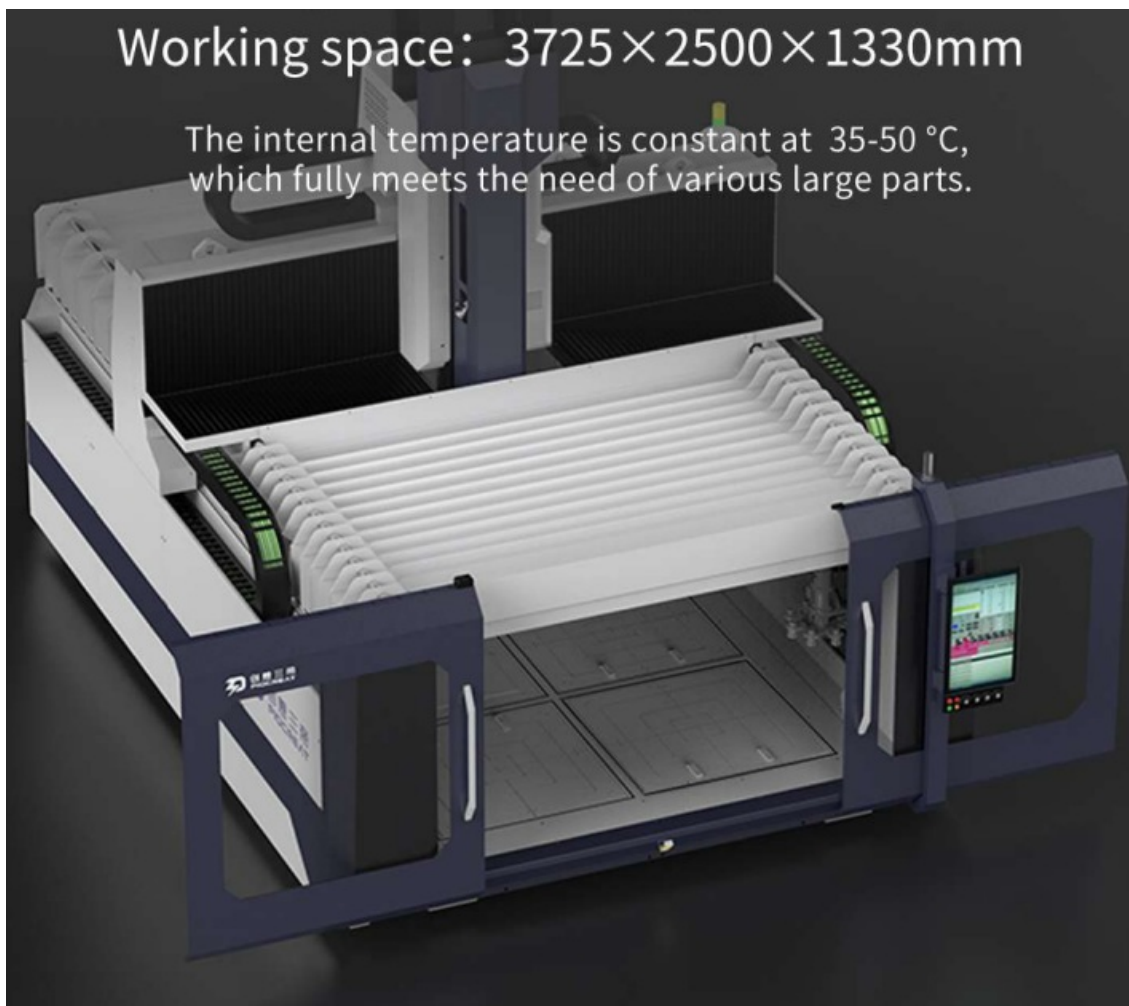
Large working space

Working space: 3725×2500×1330mm

The internal temperature is constant at 35-50 °C,
which fully meets the need of various large parts.

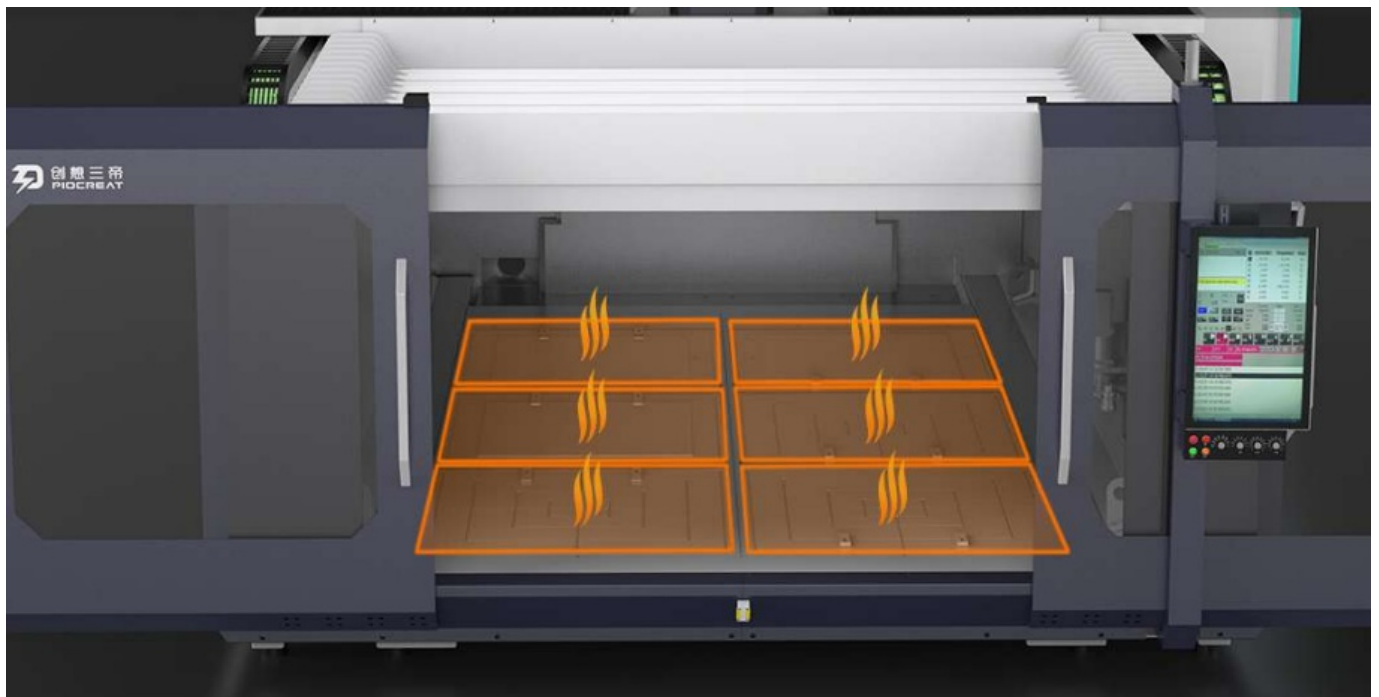


Large working space



Workbench design

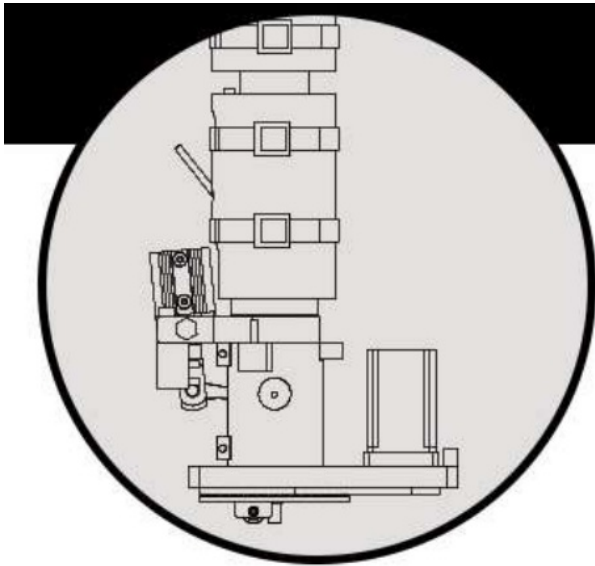
Can be divided into 6 independently controlled heating table According to the printed model, zone heating control can be selective, avoid effectively electricity wasting, and improves the stability of the bottom layer of the printing model.



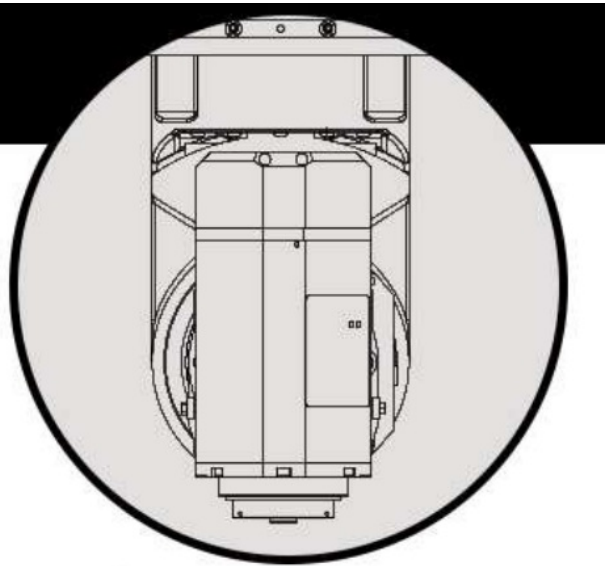
High flow screw extrusion design

Equipped with 3-8mm large flow screw extrusion nozzle The maximum printing speed can reach 100kg/h. To ensuring the stability and accuracy of the gantry (0.02mm/1000mm), the printing speed is 10m/min and the

processing speed is 15m/min.



Screw 3D printing



CNC five-axis machining

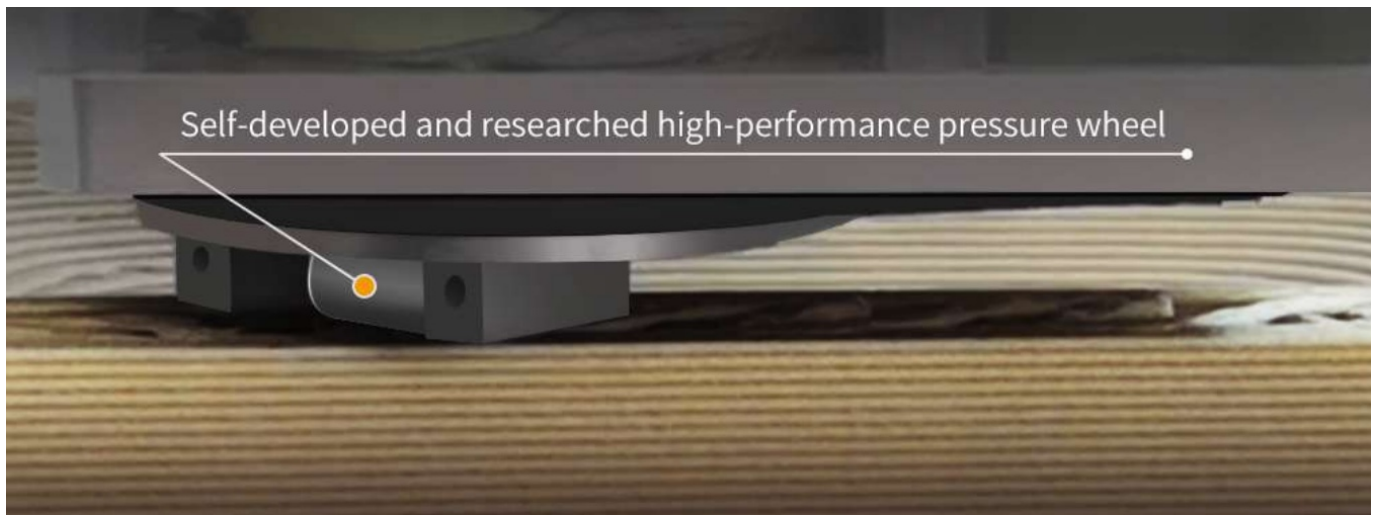
High-speed and high-precision five-axis head

Equipped with 8.5KW/24000 high-speed hvct Using precision five-axis head, A axis $\pm 120^\circ$ C, C'axis $\# 320^\circ$ C, machinable with plastic, carbon fiber and non-ferrous metals.



High performance pressure wheel

Effectively improve the printing materials density Self-developed and researched high-performance pressure wheel, according to the control printing path, can effectively improve the density of the printing material and make stronger the bonding between the printing layers.



Wide range of printing materials

Can meet the application needs of different fields It is suitable for printing all kinds of thermoplastic particles, special mixtures materials, and ceramics and metal materials. Supports a variety of fiber composite thermoplastic polymer materials.



Full-automatic provide dry material

Automatic feeding + drying + dehumidification three in one The full-automatic three in one feeding system provides constantly dry materials, which can meet the continuous printing needs of 7 x 24 hours



OSAI Control System

32-inch full touch all-in-one machine Adopt OSAI control system and motion servo system, 32-inch full touch all-in-one machine, to ensure equipment stability and machine response speed.



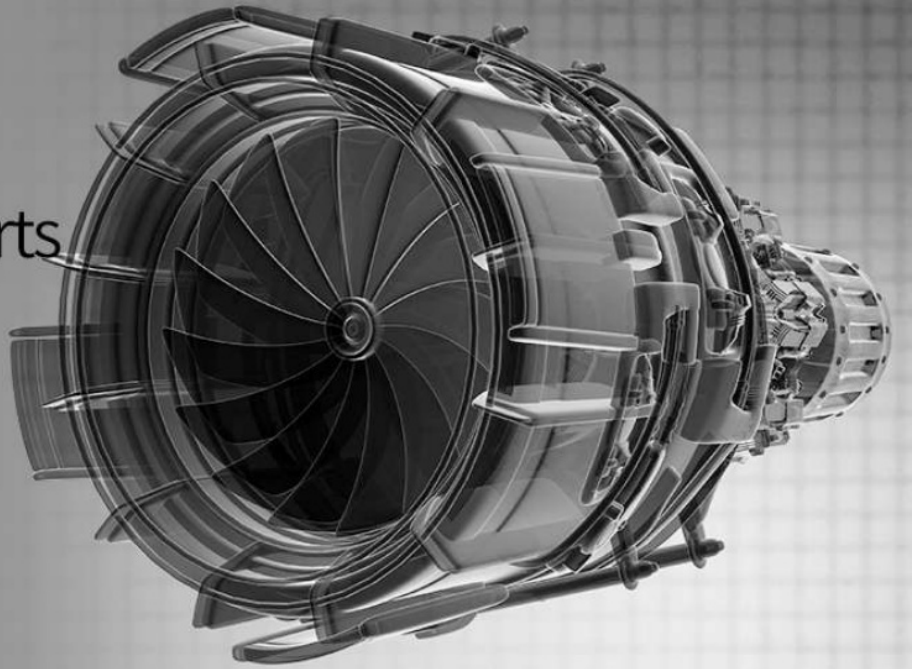
Application field

Applied in various fields

Suitable for producing large to very large thermoplastic materials parts, molds, models and industrial tools, etc. Widely used in aerospace, automobile manufacturing, wind power, yacht and ship, home life, urban landscape and other composite materials field.

Aerospace

Ultra-large parts



Rail transit models



Wind power

oversized parts



Urban landscape
Super large model



Product specification

G40 particle 3D printing and CNC 5-axis machining

- Printing Size: 3725x 2500 x 1330mm
- Particles Diameter: 2-5mm
- Hybrid additive manufacturing and milling system: Yes
- Machine Size: 5962x4220 X 4800mm
- Maximum extrusion volume: 100kg/h precision and repeatability: 0.018/1000mm
- Molding Tech: FGF Bed Temp: < 200°C
- Filament: PLA, PETG, ABS, PC, PA and other composite materials
- Discharge structure: Screw extrusion
- Nozzle Number: 1
- Nozzle Diameter: 3-8mm

- Nozzle Temp: <450°C
- Power Voltage: AC 380V
- Slicer Software: Creality Print
- Rated Power: 65KW
- Weight: ~ 15000KG

CNC machining parameters

- Processing Size: 3400 × 2500 × 1330mm
- Processing Speed: 20m/min
- Spindle Power: 8.5KW
- Processing Mode: Five axis

Frequently Asked Questions (FAQ)

Q: What is the maximum heating rotation angle for the machine?

A: The maximum heating rotation angle is ASSE A at 0.7.

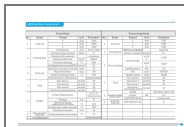
Q: What is the recommended maximum extrusion volume for the machine?

A: The recommended maximum extrusion volume is 25kg/h.

Q: How do I adjust the feed speed of the machine?

A: The feed speed can be adjusted using the speed regulating handwheel for precise control.

Documents / Resources



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G40 Machine Parameters, G40, Machine Parameters, Parameters

References

- [User Manual](#)

[Manuals+](#), [Privacy Policy](#)

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