

Material profile iglidur® i4000 for Formlabs Form 4 3D printer

The profiles provided were created to the best of our knowledge and belief and are intended to enable an easy start when using our triboresine with the Formlabs Form 4 3D printer. The profile was created on a Form 4 and may also be used for the manufacturer's other 3D printers. igus® assumes no liability for any malfunction or damage resulting from the use of this configuration. Furthermore, igus® cannot provide any support for the configuration and operation of the 3D printer.

For best results and good processing, the processing instructions for the i4000 should be observed.

The following explains how to import the material profile provided into PreForm:

1. Start PreForm.
2. Go to **Edit > Print Settings Editor**. This opens the Print Settings Editor window, in which the existing user-defined print settings are listed.
3. Click **New Print Setting** to display a list of available Formlabs print settings.
4. Select the desired **printer type** from the drop-down menu.
5. Select the Formlabs Base Resin Profile **Black V5**. A list of validated print settings for this material will then be displayed.
6. Select a print setting and click on **Copy & Edit Selected**. This will open a window with the new print settings.
7. Click on the Import button and select **the .fps file** for the material on your computer.
8. Assign an **individual name** for the print setting.
9. You can edit the **print parameters** further if required. Click **save** when you have customized all settings. Your customized print setting will be saved and displayed in the **My Settings** list.

Formlabs – Form 4
Resin: iglidur® i4000

Printer Settings

Base Settings	
Layer Thickness	50 µm
Formlabs Basis Resin Profil	Black V5
Software Version	3.45.1.488
Open Material	enable
Dimensional Accuracy	
X Correction Factor	1,0013
Y Correction Factor	1,0013
Z Correction Factor	1,00
Outer Boundry Offset	-0,008 mm
Supports Outer Boundry Offset	-0,050 mm
Touchtip Outer Boundry Offset	-0,025 mm
Antialiasing	enable
Adhesion	
Early Layer Exposure And Offset: 1	Height: 0,0000 mm, Exposure: 300 mJ/cm², Offset: 0,4 mm
Early Layer Exposure And Offset: 2	Height: 0,5000 mm, Exposure: 100 mJ/cm², Offset: 0 mm
Heater	
Heater	disable
Exposure	
Irradiance	13,0 mW/cm²
Model Fill Exposure	80 mJ/cm²
Overhang Fill Exposure: 1	90 mJ/cm²
Perimeter Fill Exposure	0 mJ/cm²
Supports Fill Exposure	80 mJ/cm²
Supports Touchpoint Exposure	80 mJ/cm²
Top Surface Exposure	100 mJ/cm²
Post Exposure Cure Wait	0,50 s
Wipe	
Wipe Behavior Pattern	-1 (0/1/-1)
Wipe Speed	300 mm/s
Wipe Wall Approach Speed	250 mm/s
Wipe Distance From Wall	45 nm
Peel	disable
Squish	disable

Wash Cycle

	Zyklus 1	Zyklus 2
Device	Ultrasonic Cleaner	Ultrasonic Cleaner
Cleaner	Loctite Cleaner C	IPA
Cleaning Time	2 min	2 min
Cleaner Temperature	22 °C	22 °C

Wait Before Post Cure

Wait Time Before Post Cure	60 min
Resting Temperature	22 °C

Post Cude

Device	UV-Chamber
Wavelength	300-550 nm
Temperature	70 °C
Time	30 min