## Flexa Grey

Material's Technical Data Sheet

General purpose elastic TPU material for prototyping. Reasonable elongation with ease of use.

Compatible with:











## **FEATURES**

- flexible prints with increased extensibility
- adjustable hardness
- 100% reusable



## **APPLICATIONS**

- standard rubber items
- prototypes and design
- shock and vibration absorbers
- protectors



## General information Test method

| Material type              | TPU                   |       |                    |
|----------------------------|-----------------------|-------|--------------------|
| Software                   | Sinterit Studio Basic |       |                    |
| Nitrogen needed            | No                    |       |                    |
| Refresh ratio <sup>1</sup> | O <sup>2</sup>        | %     |                    |
| Colour                     | grey                  |       |                    |
| Particle size              | 20-105                | μm    | ISO 13320          |
| Printout density           | 0.74                  | g/cm³ | PN-EN ISO 845:2010 |
| Printout water absorption  | 9.1                   | %     | PN-EN ISO 62:2008  |

Information provided within this document are average values for reference and comparison only. All tests were performed with print samples from Lisa/Lisa Pro printers. Parameters presented in this specification are subject to change without notice. Final part properties may vary based on printed part design, print orientation and material handling.



Refresh ratio is the amount of refreshing powder that is required to be mixed after the printing with unsintered material.

Fexa materials has 100 [%] of usability. Although to keep the parameters of printouts as high as possible, we recommend adding 10% of fresh powder each time.

| Mechanical properties                    |        |     | Test method            |
|--|--------|-----|------------------------|
| Tensile Strength                         | 3.73   | MPa | PN-EN ISO 37:2007      |
| Elongation at Break                      | 136    | MPa | PN-EN ISO 37:2007      |
| Shore hardness in type A scale           | 70/904 |     | PN-EN ISO 868:2005     |
| Thermal properties                       |        |     | Test method            |
| Melting point                            | 160    | °C  | internal procedure     |
| Heat Deflection Temperature A at 1.8 MPa | 67,6   | °C  | PN-EN ISO 3006:2014-02 |

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It might need additional refresh with 50% in case of drop of surface quality (every few to over a dozen printouts).

<sup>4.</sup> Depending on printing settings and the design.