Spectrum FILAMENTS

TECHNICAL DATA SHEET

S-Flex 90A

MATERIAL PROPERTIES

Density	1,22 g/cm³	DIN 53479
Shore hardness A	90	DIN 53505
Tensile Strength (Machine Direction)	35 MPa	DIN 53504
Elongation at Rupture (Machine Direction)	500,00%	DIN 53515
Tear Propagation Strength (Machine Direction)	90 N/mm	DIN 53515
Abrasion Resistance	35 mm³	DIN 53516

GUIDELINE FOR PRINT SETTINGS*

Nozzle temperature	200-230°C
Bed temperature	50-70°C
Active cooling fan	YES (up to 100%)
Layer height**	0.05 - 0.30 mm
Shell thickness**	0.40 - 2.70 mm
Print speed**	15-50 mm/s
Closed chamber	not necessary
Dry box	recommended
Ruby or hardened nozzle	not necessary

* settings are based on a 0,4 mm nozzle.
** depending on the geometrical complexity

Disclaimer
The product- and technical data provided in this datasheet is correct to the best of Spectrum Group Sp. z o.o. knowledge and are intended for reference and comparison purposes only. They should not be used for design specifications or quality control purposes. Actual values may vary according to printing conditions, model complexity, environmental conditions, etc. The user assumes all responsibility for the use of all information provided and shall verify quality and other properties or any consequence from the use of all such information. Typical values are indicative only and are not to be construed as being binding specifications. Spectrum Group Sp. z o.o. shall not be made liable for any damage, injury or loss induced from the use of Spectum Group Sp. z o.o. materials in any particular application.

DESCRIPTION

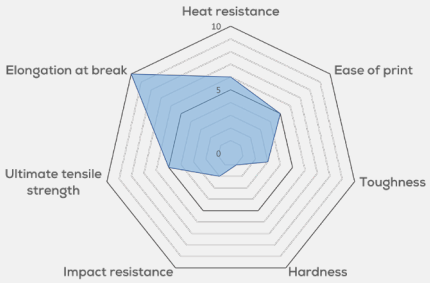
Spectrum S-Flex 90A is a filament designed for 3D printing, which enables to manufacture flexible items in a much simpler way than with other materials of this type. The appropriate composition of the material provides for good adhesion both between layers and between the printed item and the build platform.
S-Flex 90A material is also characterized by good resistance to UV radiation and high resistance to aging. Flexible filament S-Flex 90A shows resistance to weak and diluted acids and bases.

FEAUTURES

- very good wear and tear resistance
- up to 500% elongation at break
- resistance to many common industrial oils and chemicals
- low shrinkage
- high quality surface
- reduced stringing while the printer is running idle
- stability of shape and material properties in the temperature range -30 to + 60°C

STORAGE AND SHELF LIFE

Filament should be stored in a dry room at room temperature. Recommended storage temperature is ca. 18-25°C (64.4 -77.0°F). Keep out of moisture, sunlight and direct heat. When stored properly, product has a shelf life of 24 months.



SUPPORT

If you have any questions or experience any issues, please do not hesitate to contact us at **support@spectrumfilaments.com**