

NYLON POWDER KSPA12BK



MATERIAL OVERVIEW

KSPA12BK is a black nylon powder with a particle size D50 of about 50 microns and a narrow and uniform distribution. It can be sintered using fiber laser or carbon dioxide laser, and the powder has high sphericity and extremely high fluidity. The powder reusability rate can be close to 100%, and the 3D printed parts can maintain excellent mechanical properties and excellent surface finish.

ADVANTAGE

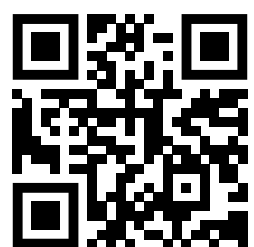
- Can be sintered using fiber laser or carbon dioxide laser
- The particle size D50 of the powder material is about 50 microns, and the distribution is narrow and uniform. The powder has high sphericity and extremely high fluidity.
- Even when the powder reuse rate is close to 100%, it can still maintain excellent mechanical properties, and the printed parts still have a perfect surface finish.

ADVANTAGE

- Functional structures
- Concept prototypes
- Automotive, aerospace, architectural, and electronic applications

MECHANICAL PROPERTIES	VALUE	UNIT	TEST STANDARD
Tensile Modulus	1600	Mpa	ISO 527
Tensile Strength	46	Mpa	ISO 527
Strain at break	20	%	ISO 527
Charpy impact strength	38	KJ/m ²	ISO 179
Charpy notched impact strength	7.5	KJ/m ²	ISO 179
Flexural modulus	1400	Mpa	ISO 178
Flexural Strength	50	Mpa	ISO 178

OTHER PROPERTIES	VALUE	UNIT	TEST STANDARD
Powder Melting temperature (10°C/min)	187	°C	ISO 11357
Vicat softening temperature (50°C/h50N)	100	°C	ISO 306
Density (Laser Sintered)	0.94	g/cm ³	Own method
Density (Powder)		g/cm ³	Own method
Particle Size (D50)	50	µm	Laser Diffraction



Additive Plus combines technology, expertise, and a personal touch to deliver various 3D printing services and products: 3D printers, 3D scanners, atomizers, industrial vacuums, laboratory and analytical instruments, industrial machinery, furnaces, software, materials and many more. Local engineering and maintenance team. Flexible payments terms available. We aim to empower everyone to live their additive journey effectively.

Additive Plus (A Plus Industrial LLC) | +1 (888) 797-7784 | +1 (747) 351-1640 | info@additiveplus.com | www.additiveplus.com



Sustainable
3D Manufacturing