# ntch Filaments®

## ABS-X<sub>@df</sub>

ABS-X @df is our take on a next-generation ABS filament. By applying our zero warp technology to the filament we have created a filament with far less cracking, proven near perfect interlayers, reliable bed adhesion (glass, tape & other adhesives) while improving the mechanical properties making ABS-X @df extra strong. These properties make ABS-X @df the ultimate ABS replacement that prints strong and beautiful parts on any FDM 3D printer without the common headaches associated with regular ABS like warping & horrible bed adhesion. ABS-X @df is the perfect material for strong objects that require an high impact tolerance.

#### Features:

- Zero warp technology
- Excellent interlayer adhesion
- Reliable bed adhesion (Glass, tape & other adhesives)
- Enhanced mechanical properties over regular ABS
- Great strength & aesthetics



### Colours:

ABS-X @df is available from stock in 12 colours. Other colours on request

na1 bk1 wh1	rd1	gr1 y	ll or1	si1	go1	bu2	gy1	gyb
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### Packaging:

ABS-X @df is available in nearly any type of packaging and labelling. Ask our team to help you customizing your product.

Filament specs.		
Size	Ø tolerance	Roundness
1,75mm	± 0,05mm	≥ 95%
2,85mm	± 0,10mm	≥ 95%

Material properties		
Description	Testmethod	Typical value
Specific gravity	ISO 1183	1,1 g/cc
MFR 260°C/5 kg	ISO 1133	41 gr/10 min
Tensile strength at yield	ISO 527	43,6 Mpa
strain at break	ISO 527	34%
Tensile modulus	ISO 527	2030 Mpa
Impact strength - Charpy notched 23°C	ISO 179	58 kJ/m <sup>2</sup>
Printing temp.	DF	240-260°C
Melting temp.	ISO 294	235°C ± 10°C
Vicat softening temperature	ISO 306	97°C

### Additional info:

Recommended temperature for heated bed is  $\pm$  80°C.

ABS-X @df is printed at high temperatures to make the final product extra strong. ABS-X @df can be used on all common desktop FDM or FFF technology 3D printers. Storage: Cool and dry (15-25°C). This enhances the shelf life significantly.