

**LE PLUS GRAND RÉSEAU D'IMPRIMANTES 3D AU
MONDE**

THE WORLD'S LARGEST 3D PRINT NETWORK



3D HUBS

“3D Hubs tapped into a
market that needed tapping”

Forbes

“3D printing on demand is
now locally available”

FAST COMPANY

www.3dhubs.com
[@3dhubs](https://twitter.com/3dhubs)



3D HUBS





15,000+ IMPRIMANTES DANS 160 PAYS

15,000+ PRINTING LOCATIONS IN 160 COUNTRIES

maps.3dhubs.com

DISTRIBUTION DIGITALE / *DIGITAL DISTRIBUTION*

Les imprimantes 3D permettent la distribution digitale de produits physiques.
Après la musique, les livres et les films, on peut aujourd'hui en faire de même pour les biens de consommation.

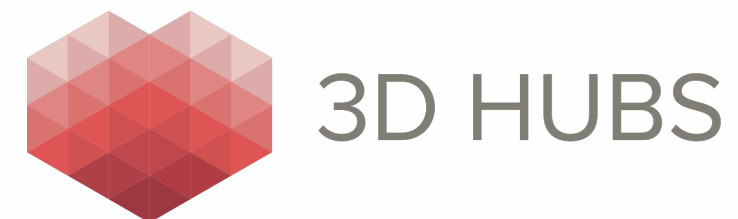
3D printers enable digital distribution of physical products.
After music, books and movies we can now do the same for consumer products.



Plus d'un million de livres/ Over 1 Million Books



Plus de vingt million de chansons/ Over 20 Million songs



Peut imprimer plus d'un million de designs/ Can print over 1 Million designs

FIRST 3D PRINTING STEPS OF LARGER CONSUMER BRANDS



Disney



NOKIA



LEGO



Talk



POPULAR

NEW

MY TAGS

MODERATE 3

START A NEW THREAD

▲ 1 Lost-wax casting on Formlabs Resin

▼ Hello fellow Hubs, I have a customer who wants to use Lost-Wax Casting on a ring, printed with a Form1+. Can the Formlabs resin (or resin in general) take this? Is it advisable? Thanks! Filemon



Filemon

5 hours ago

10 comments (1 new)[/Formlabs](#)[/Resin](#)[/Form1+](#)[/How To Hub](#)

▲ 2 transparent filament or?

▼ I wonder if there is a material that is possible to print with, that will be transparent. I am printing with PLA and ABS and all kind of filament. But sometimes I see on the tube transparent products and don't quite understand how it's done...



GN 3DImprimo

6 hours ago

3 comments (2 new)[/Filament](#)[/Linköping](#)

About Talk

Talk is a place to share projects, ask questions, show off prints and announce events. It's all about 3D Printing. We're currently in beta so we would love to [hear](#) your ideas on how we can make it better.

My Tags

[/Ultimaker](#)[/Amsterdam](#)[/Marvin](#)[/London](#)[/Fairphone](#)[/ColorFabb](#)[/3D Hubs Team](#)[/New York](#)[/Formlabs](#)[/Drones](#)[/Maker Tale](#)[/Los Angeles](#)[/San Francisco](#)[/3DRacers](#)[/Event](#)



← BACK TO TALK

How To Hub Talk

search



- POPULAR
- NEW
- MY TAGS

START A NEW /HOW-TO-HUB THREAD

▲ 1 Lost-wax casting on Formlabs Resin

▼ Hello fellow Hubs, I have a customer who wants to use Lost-Wax Casting on a ring, printed with a Form1+. Can the Formlabs resin (or resin in general) take this? Is it advisable? Thanks! Filemon



Filemon

5 hours ago

10 comments (1 new)

/Formlabs

/Resin

/Form1+

/How To Hub

▲ 2 How many prints to hubs get on average?

▼ How many prints to hubs get on average per day or hour?



georgeh1ll

1 day ago

5 comments

/How To Hub

How To Hub Talk

9 followers BC CT

UNFOLLOW /HOW TO HUB

About Talk

Talk is a place to share projects, ask questions, show off prints and announce events. It's all about 3D Printing. We're currently in beta so we would love to [hear](#) your ideas on how we can make it better.



My Tags

← BACK TO TALK

Drones Talk

POPULAR NEW MY TAGS

START A NEW /DRONES THREAD

13



3D Printed drone build

For some time now I have wanted to 3D Print a quadcopter. So I have started and wanted to share the project with you guys. Maybe some of you are in the same situation, Maybe you

Copenhagen 7 days ago 5 comments (1 new)

/Copenhagen /Drones /Maker Tale

8



Voxel8 printing drones?

Just saw this. And I want one now. This is amazing. Read the article here: <https://medium.com/the-letters/3d-printed-drones-are-finally-here-c76811...> Would any of

Copenhagen a month ago 7 comments /Drones /Voxel8

Drones Talk

17 followers BC GS

UNFOLLOW /DRONES

About Drones

Drones are aircrafts controlled by pilots from the ground.

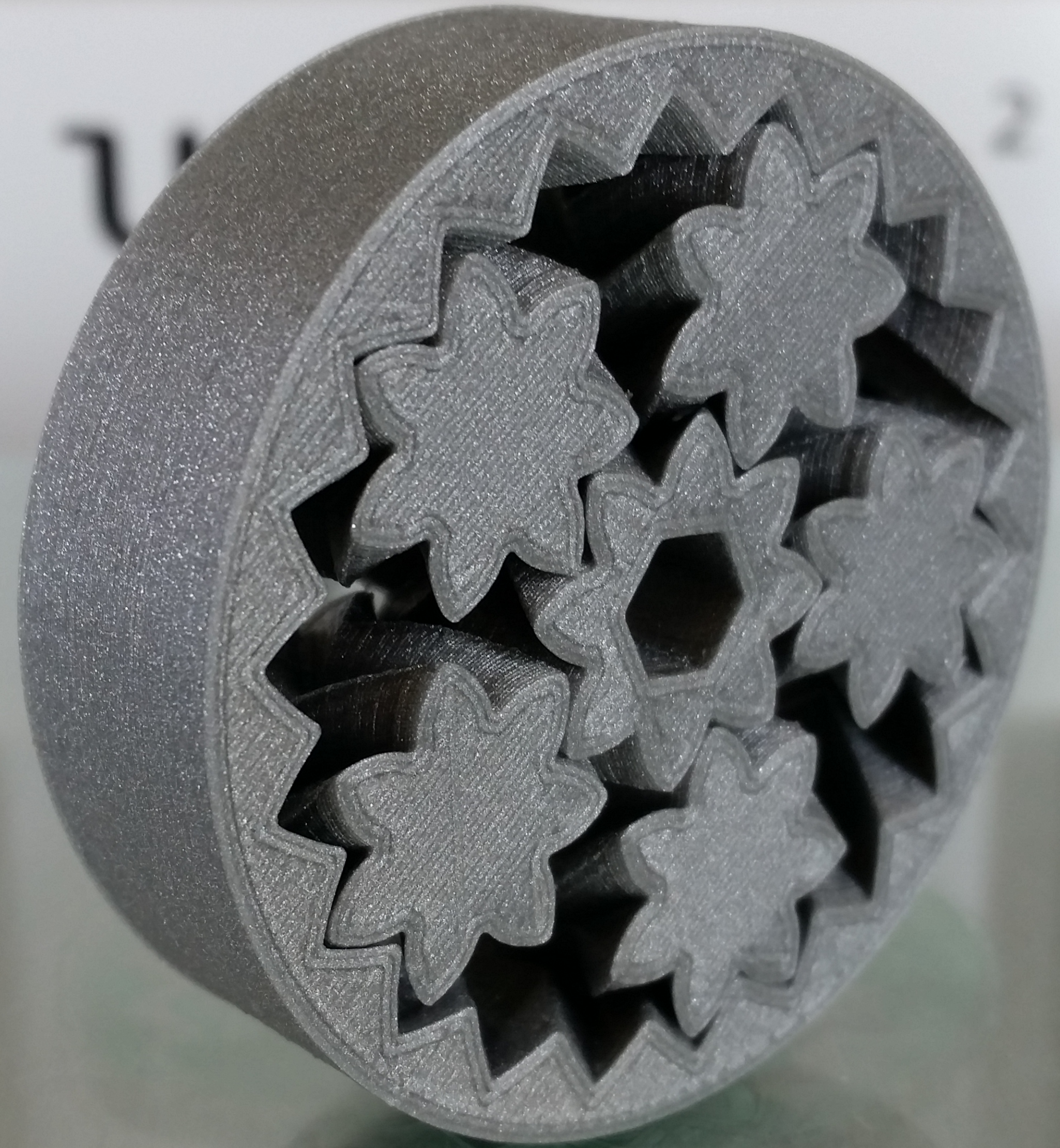
Quadcopters, Helicopters, and other hobby drones fall into this category.

My Tags

- /Ultimaker
- /Amsterdam
- /Marvin
- /London
- /Fairphone
- /ColorFabb
- /3D Hubs Team



★
FAIRPHONE







15%

Filament discount

Congratulations, you qualify for a 15% Colorfabb discount! If you would like to use this discount at any time, click the link below.

[LEARN MORE](#)



color**Fabb**

— *fabulous colors* —



3D HUBS

← BACK TO TALK

ColorFabb Talk

search



3dhubs.com/talk/colorfabb

POPULAR

NEW

MY TAGS

START A NEW /COLORFABB THREAD

▲
6
▼



Ultimaker Sample Issues: Nut & Bolt

Ok, so something that earlier I got to work without any problem, suddenly I can't get done. I'm trying to print a smooth Nut & Bolt print on my Ultimaker 2 for a customer and these are my



Filemon

3 days ago

10 comments (1 new)

/ColorFabb

/Ultimaker 2

▲
4
▼



3D Hubs NY ColorFabb Workshop

Hi Hubs, We'd like to invite you to a "3D Hubs Filament Workshop" in New York, organized in collaboration with Colorfabb. During the event we'll be showcasing the new Colorfabb XT-CF20



Nikki

7 days ago

3 comments

/Boston

/ColorFabb

/Event

/Filament

/Hartford

/New York

/Philadelphia

/Providence

/Springfield-MA

ColorFabb Talk

15 followers

UNFOLLOW /COLORFABB

About ColorFabb

ColorFabb is a Dutch producer of high quality filaments for 3D printing, with special filaments such as their Bronze and Copper fill.

Thanks to our partnership with Colorfabb, our hubs can order Filament at this manufacturer with a discount.

WORKSHOP SUR LES FILAMENTS/ *FILAMENT WORKSHOP*



FILAMENTS SPÉCIAUX / SPECIAL FILAMENTS

Matériaux composites / conseils généraux pour imprimer

Composite materials / general tips for 3D printing

3D HUBS SAMPLE PACK

PLA SPÉCIAUX / SPECIAL PLA's



XT's



FILAMENTS SPÉCIAUX

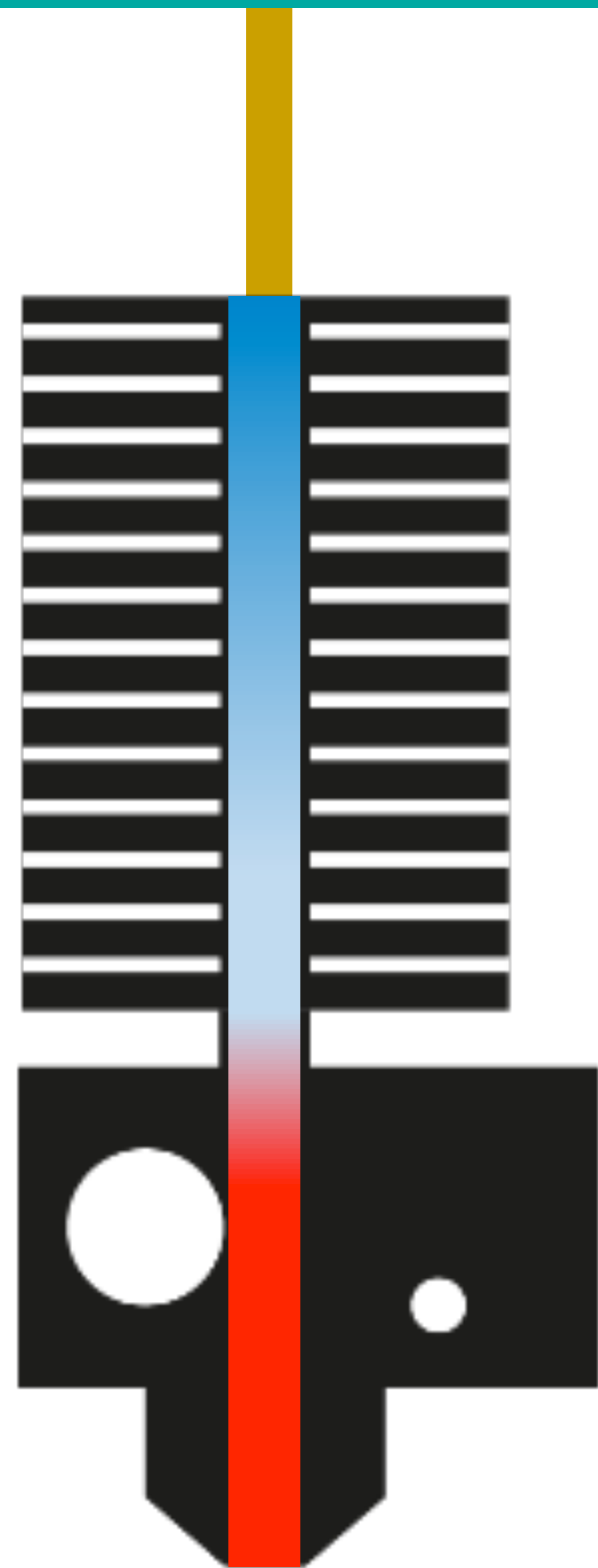
Matériaux composites / conseils généraux pour imprimer

SPECIAL FILAMENTS

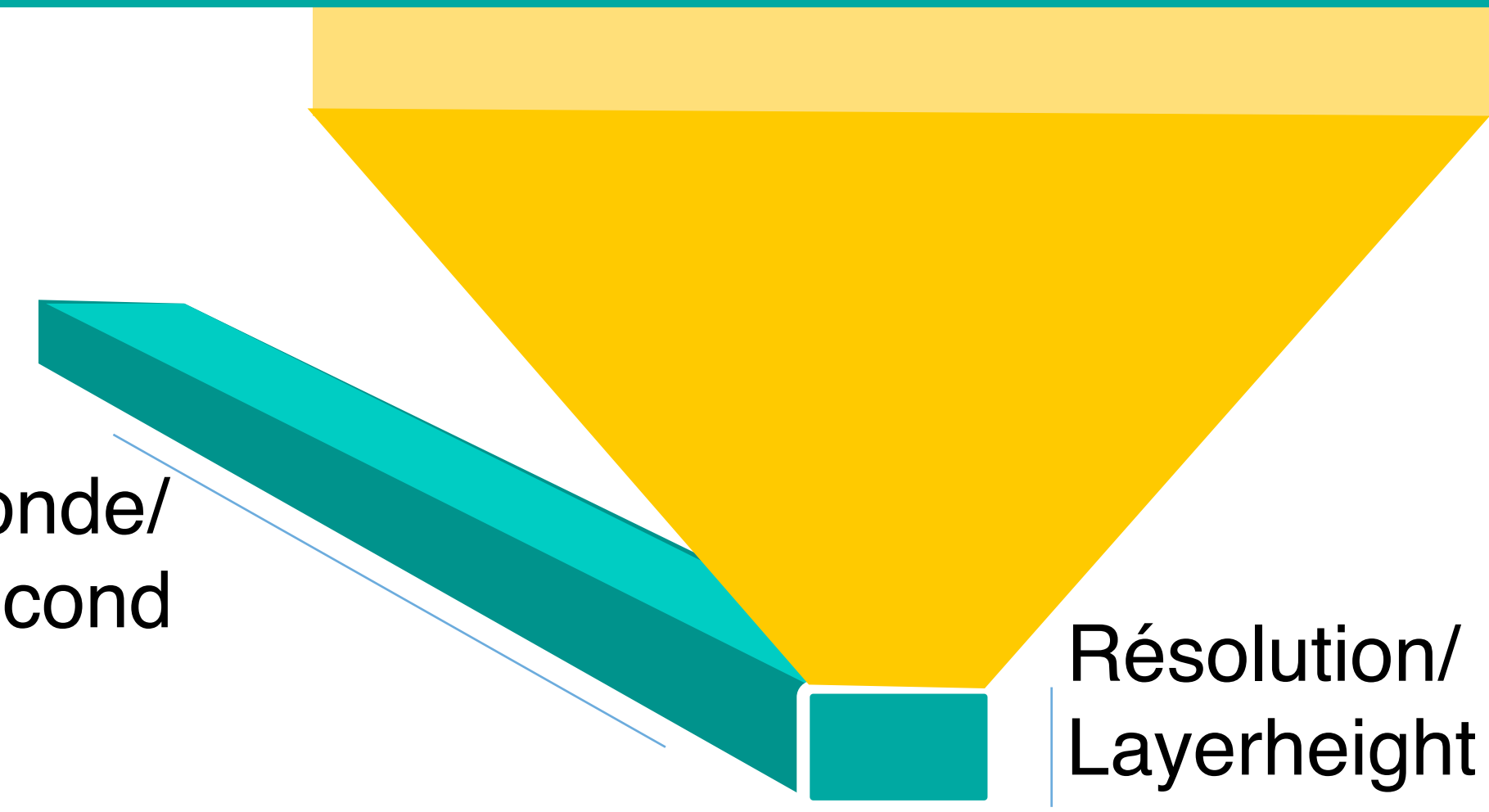
Composite materials / general tips for 3D printing

Vitesse à laquelle le filament traverse la zone à haute température

Speed at which the filament is moving through the hot-zone



Longueur imprimée en 1 seconde/
Distance printed in one second



Largeur de la buse / Nozzle width

Résolution \times largeur buse \times vitesse d'impression
= Volume par seconde

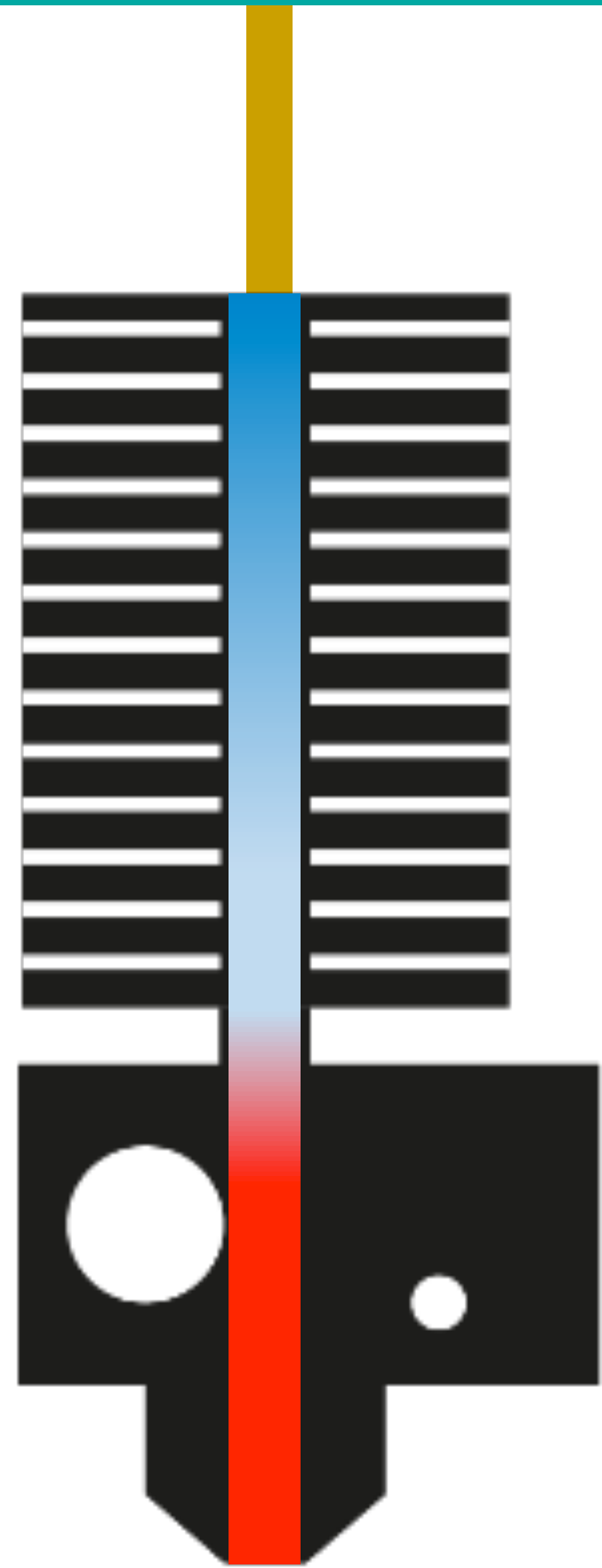
Layerheight \times nozzle width \times print speed
= Volume per second

FILAMENTS SPÉCIAUX

Matériaux composites / conseils généraux pour imprimer

SPECIAL FILAMENTS

Composite materials / general tips for 3D printing



$$0.05\text{mm} \times 0.4\text{mm} \times 50 \text{ mm/s} = 1 \text{ mm}^3 / \text{s}$$

$$0.2\text{mm} \times 0.4\text{mm} \times 100\text{mm/s} = 8 \text{ mm}^3 / \text{s}$$

FILAMENTS SPÉCIAUX

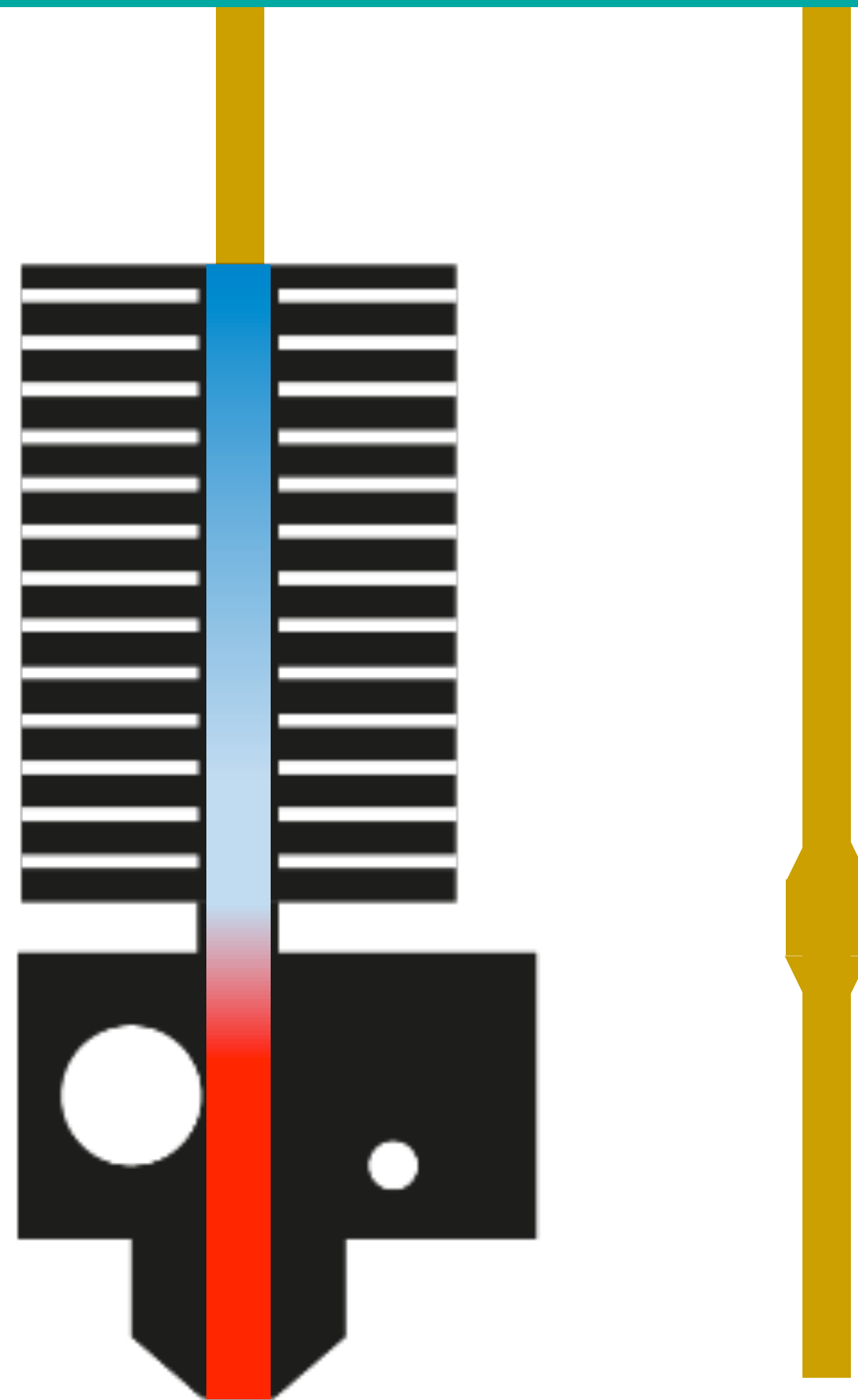
Matériaux composites / conseils généraux pour imprimer

SPECIAL FILAMENTS

Composite materials / general tips for 3D printing

Propagation ascendante de la chaleur dans le filament

HEAT MOVING UPWARDS IN THE FILAMENT



Partial or complete plug

FILAMENTS À BASE DE PLA/PHA

Matériaux composites / conseils généraux pour imprimer

PLA/PHA BASED FILAMENTS

Composite materials / general tips for 3D printing



**PREMIERS RÉGLAGES POUR
BRONZEFILL, COPPERFILL, BRASSFILL, BAMBOOFILL, WOODFILL.**

***DIAL IN SETTINGS FOR
BRONZEFILL, COPPERFILL, BRASSFILL, BAMBOOFILL, WOODFILL.***



Commencer avec des couches d'épaisseur comprise entre 0.2mm et 0.3mm

À température et vitesse habituelles pour le PLA sur votre imprimante

Start with layers between 0.2mm and 0.3mm

At regular PLA temperature and speed for your 3D printer.

FILAMENTS À BASE DE XT

Matériaux composites / conseils généraux pour imprimer

XT BASED FILAMENTS

Composite materials / general tips for 3D printing



XT-copolyester

conseils généraux pour imprimer

XT-copolyester

general tips for 3D printing



Ni du PLA ni de l'ABS.

It's not PLA and not ABS.

Température conseillée:
Advised 3d printing temperature:
240-260C

Vitesse d'impression conseillée:
Advised 3d print speed:
40 - 70 mm/s

Température conseillée plateforme chauffante:
Advised Heated Bed temperature:
60-70C

XT-copolyester

conseils généraux pour imprimer

XT-copolyester

general tips for 3D printing

Déformations lors des déplacements Oozing on travel moves



Paramètres de retrait / Retraction Settings Ultimaker 2

Vitesse de retrait / Retraction Speed 45 mm/s

Distance de retrait / Retraction Distance 4.5 / 6mm

Vitesse déplacement / Travel speed 150 / 200 mm/s

Température / Print temperature 240 / 260C

XT-CF20

conseils généraux pour imprimer
general tips for 3D printing

It's XT with carbon fiber.



Température conseillée:
Advised 3d printing temperature:
240-260C

Vitesse d'impression conseillée:
Advised 3d print speed:
40 - 70 mm/s

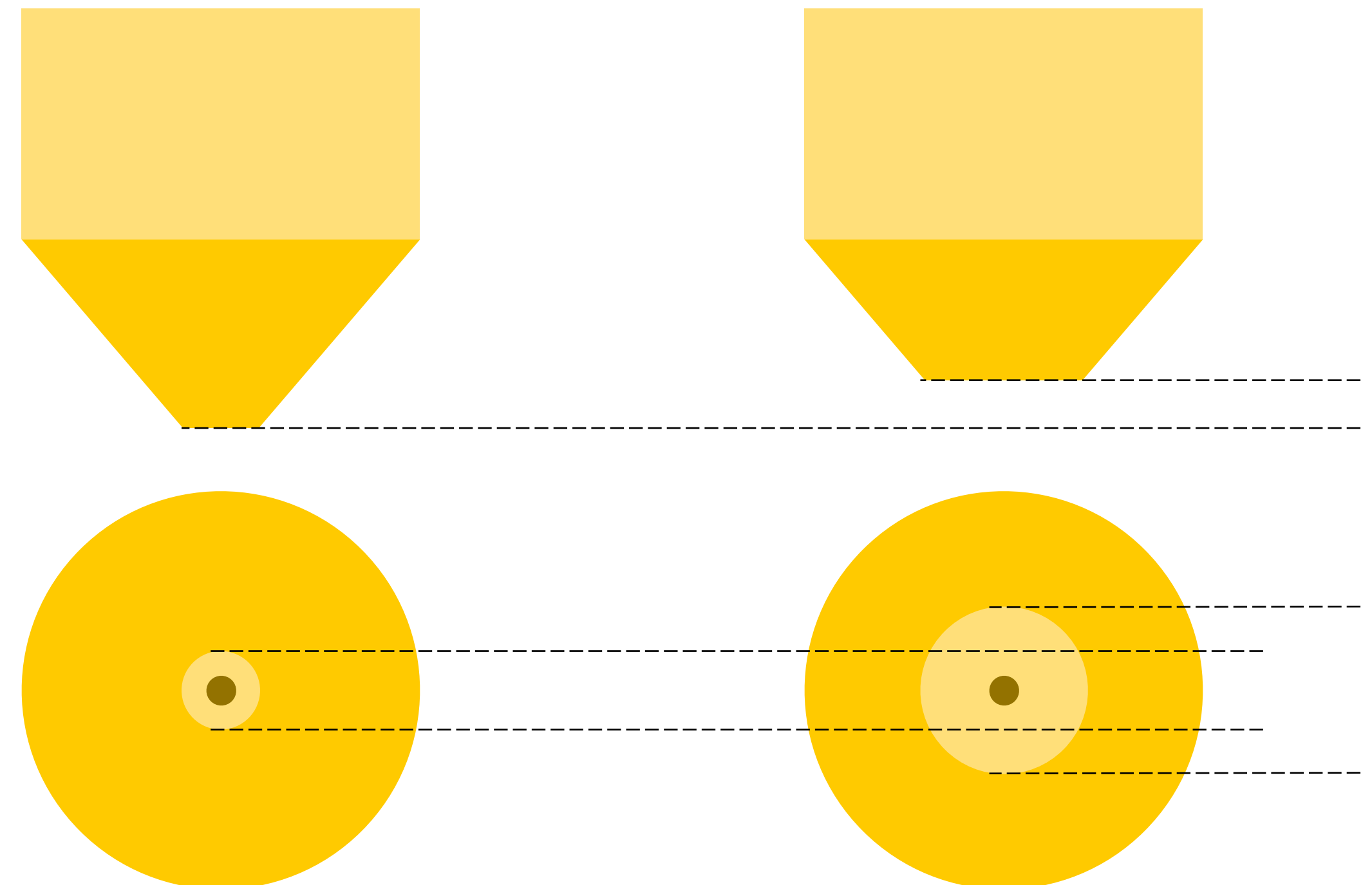
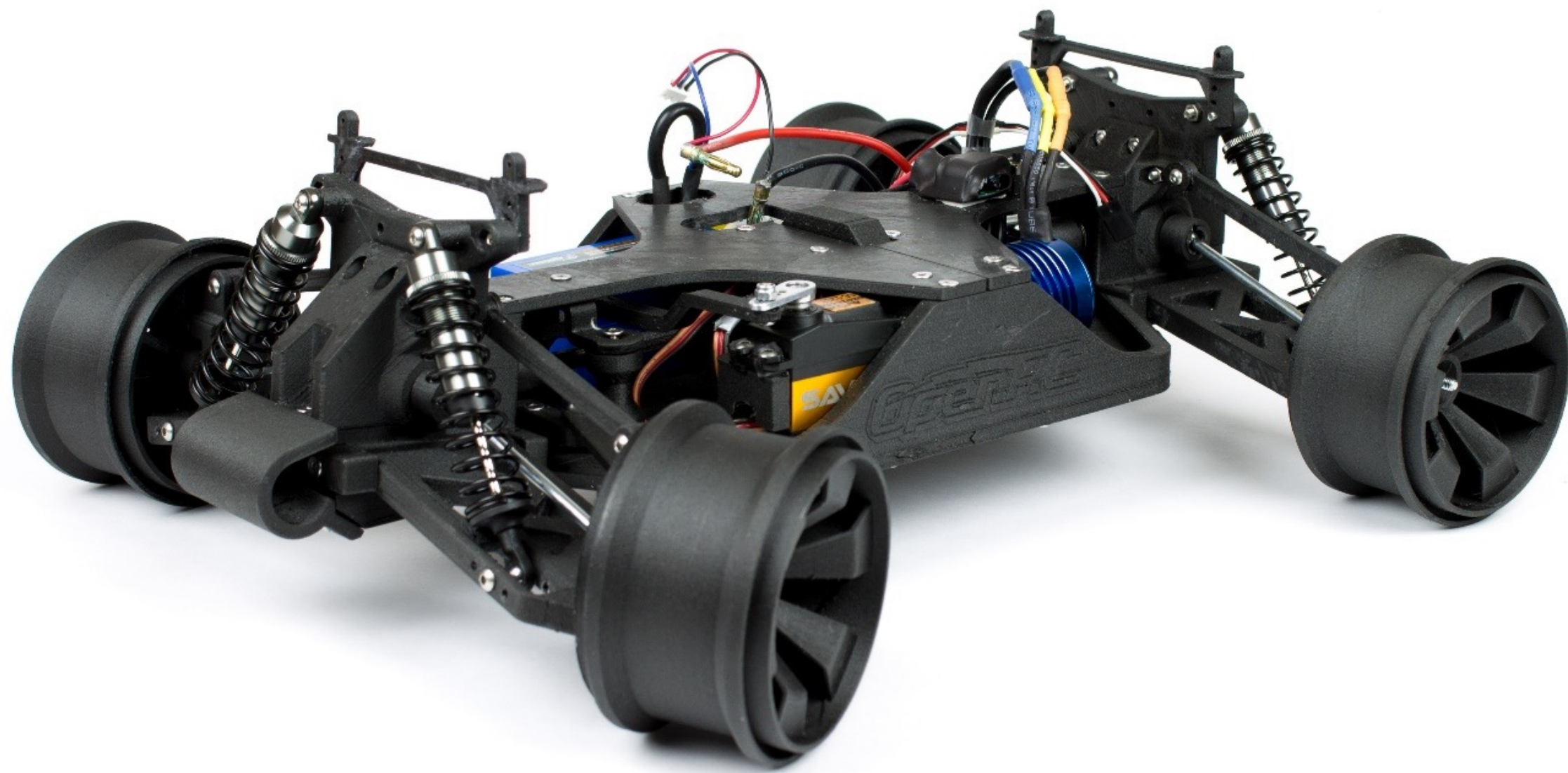
Température conseillée plateforme chauffante:
Advised Heated Bed temperature:
60-70C

XT-CF20

conseils généraux pour imprimer
general tips for 3D printing

Carbon Fiber is abrasive.

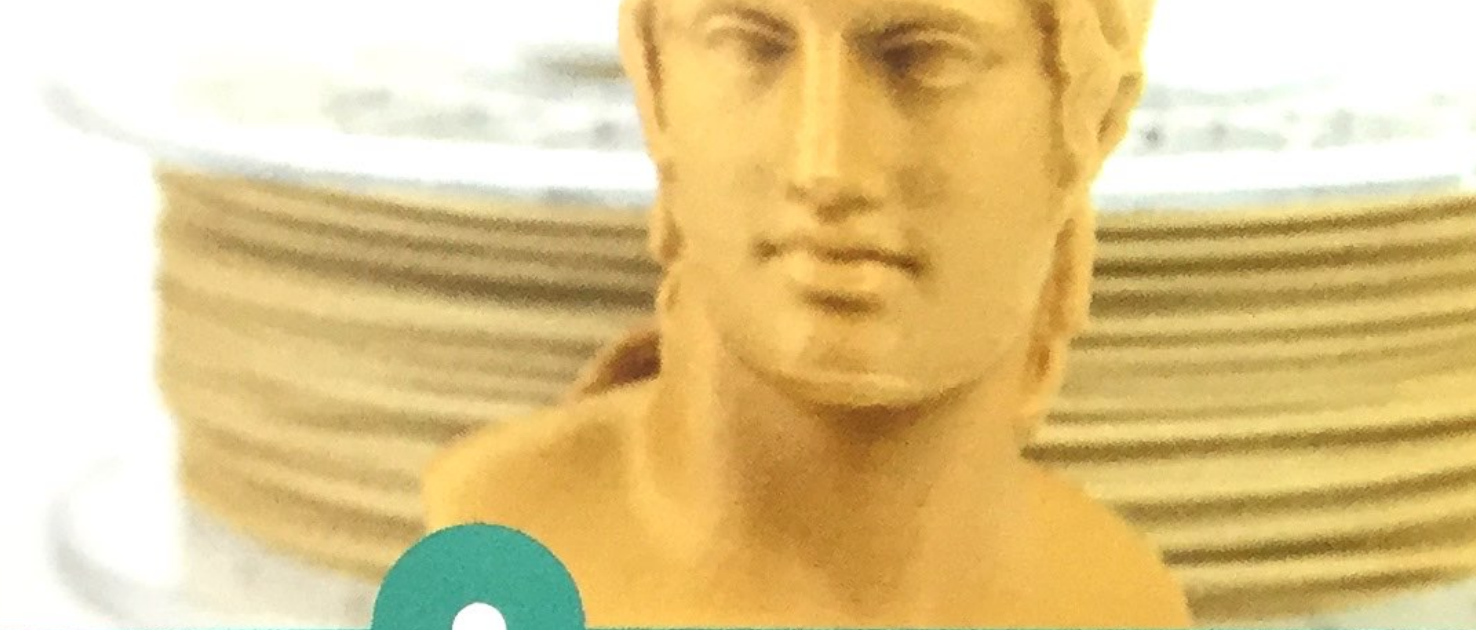
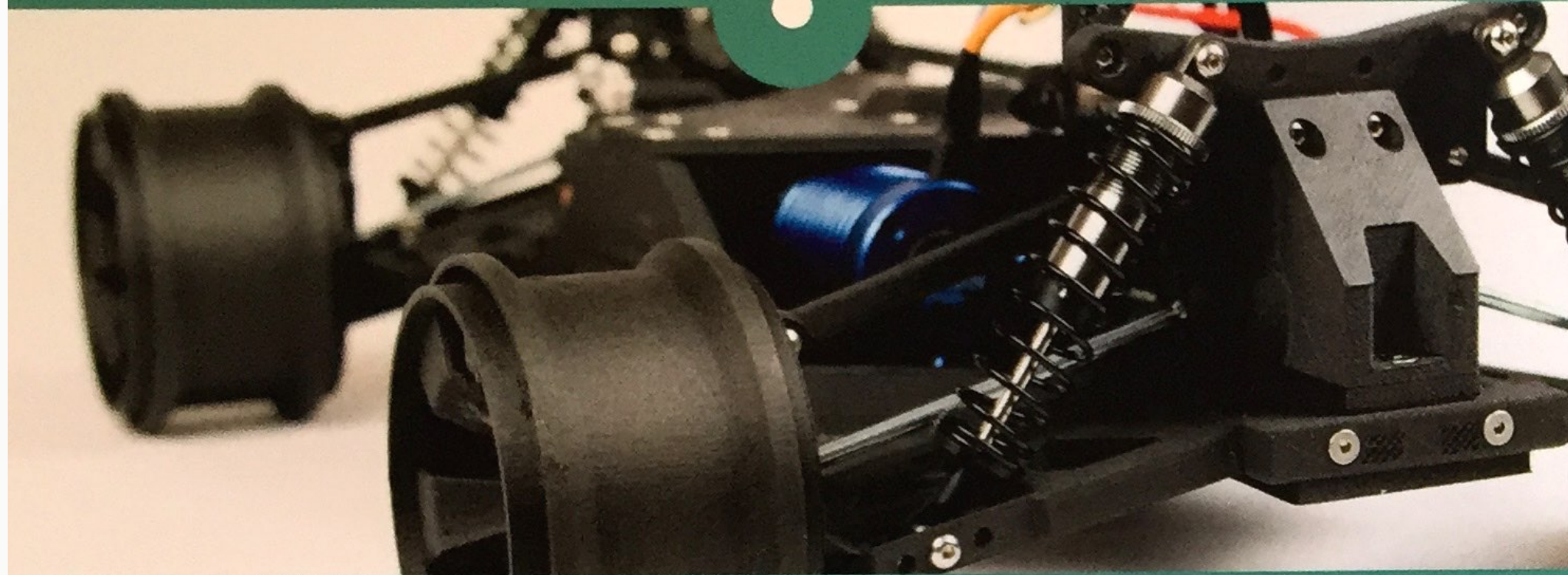
L'impression avec du XT-CF20 va user le laiton de la buse.
Brass nozzles will wear while printing XT-CF20



XT-CF20

density **1,35 gram/cc**
flex modulus **6,2 GPa**
glass temperature **80C**

Advised 3d printing temperature:
240-260C*
Advised 3d print speed:
40 - 70 mm/s
Advised Heated bed
60-70C



bambooFill

density **1,12 - 1,15 gram/cc**
flex modulus **3,3 GPa**
glass temperature **55C**

Advised 3d printing temperature:
195-220C*
Advised 3d print speed:
40 - 100 mm/s
Advised Heated bed (not mandatory)
50-60C

XT-copolyester

density **1,27 gram/cc**
flex modulus **2,1 GPa**
glass temperature **75C**

Advised 3d printing temperature:
240-260C*
Advised 3d print speed:
40 - 70 mm/s
Advised Heated bed
60-70C



copperFill

density **3,9 gram/cc**
flex modulus **n/a**
glass temperature **55C**

Advised 3d printing temperature:
195-220C*
Advised 3d print speed:
40 - 100 mm/s
Advised Heated bed (not mandatory)
50-60C

Exemple de réglages bronzeFill

bronzeFill example settings

<http://learn.colorfabb.com/print-bronzeFill/>

3d printer	layerheight (mm)	speed (mm/s)	temperature (C)	Build Plate temp (C)	Retraction Distance (mm)	Retraction Speed (mm/s)
Ultimaker Original	0.2	50mm/s	215	n.a.	4.5	45
Ultimaker 2	0.2	50mm/s	220	55 / 60	4.5	25
Makerbot Replicator 2	0.2	90mm/s	200C	n.a.	(standard makerware)	(standard makerware)



Exemple de réglages copperFil

copperFill example settings

<http://learn.colorfabb.com/print-copperfill/>

3d printer	layerheight (mm)	speed (mm/s)	temperature (C)	Build Plate temp (C)	Retraction Distance (mm)	Retraction Speed (mm/s)
Ultimaker Original	0.2 / 0.27	50mm/s	200-210	n.a.	4.5	45
Ultimaker 2	0.2 / 0.27	50mm/s	195-210	55 / 60	4.5	25 / 45
Makerbot Replicator 2	0.16 / 0.2	80mm/s	190 - 205	n.a.	(standard makerware)	(standard makerware)



Exemple de réglages XT

XT example settings

http://learn.colorfabb.com/print-_xt/

Ultimaker 2 - speed and temperature settings

Layerheight (mm)	Speed (mm/s)	Temperature (C)	Build Plate Temperature (C)
0.2	50	240-245	70
0.1	50 - 70	235-240	70

Retraction settings remained unchanged, 40 mm/s speed and 4.5 mm distance.

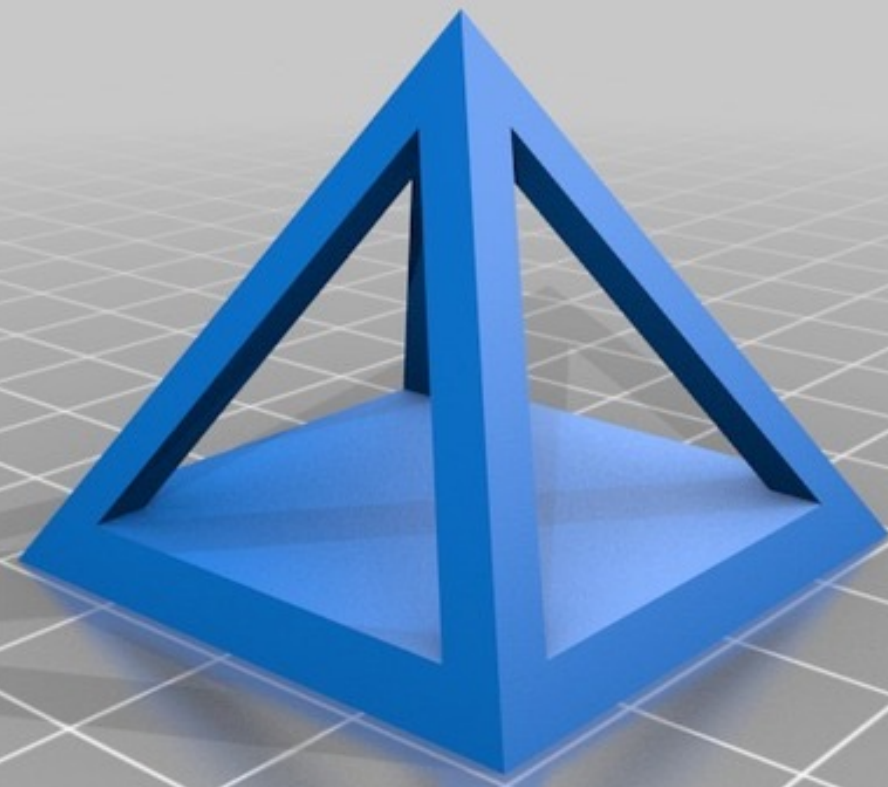
Ultimaker Original - speed and temperature settings

Layerheight (mm)	Speed (mm/s)	Temperature (C)	Cooling
0.2	50	250-255	off for first centimeter
0.1	50 - 70	245-250	off for first centimeter



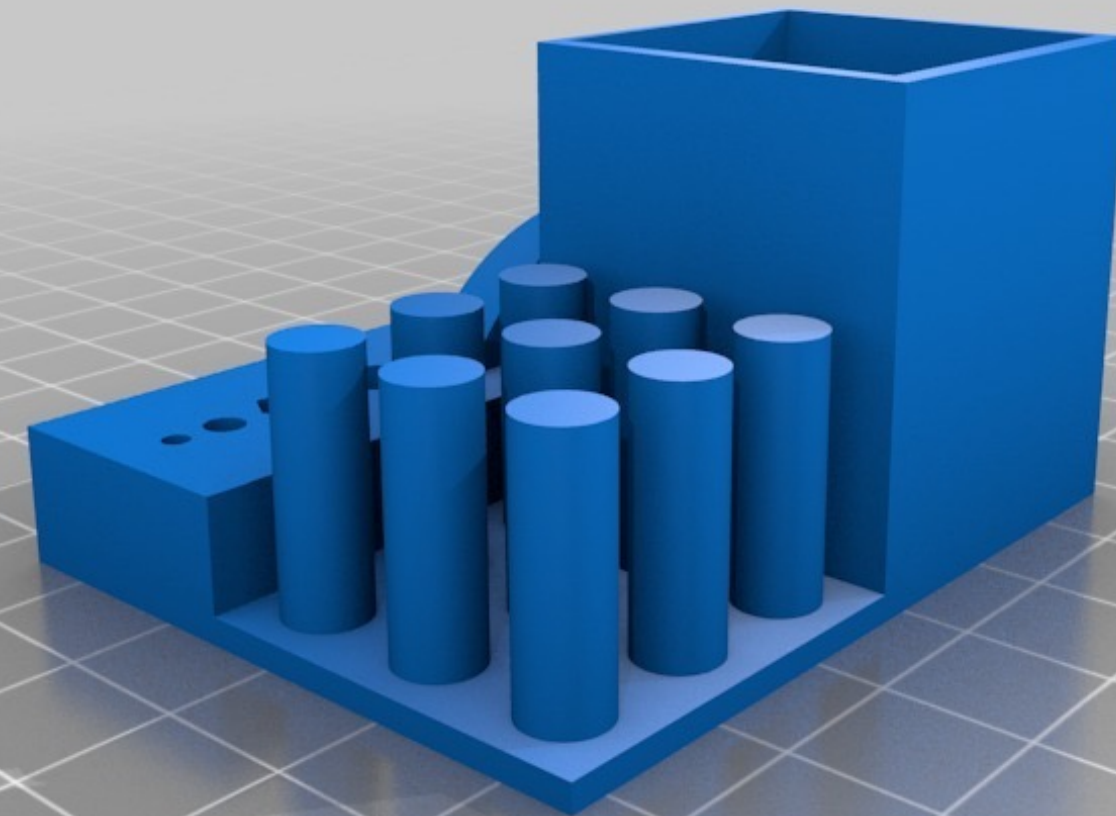
MODÈLES POUR CALIBRATION

CALIBRATION MODELS



Pyramide vide
Réglages du retrait

Hollow Pyramid
Retraction settings
thing:11846



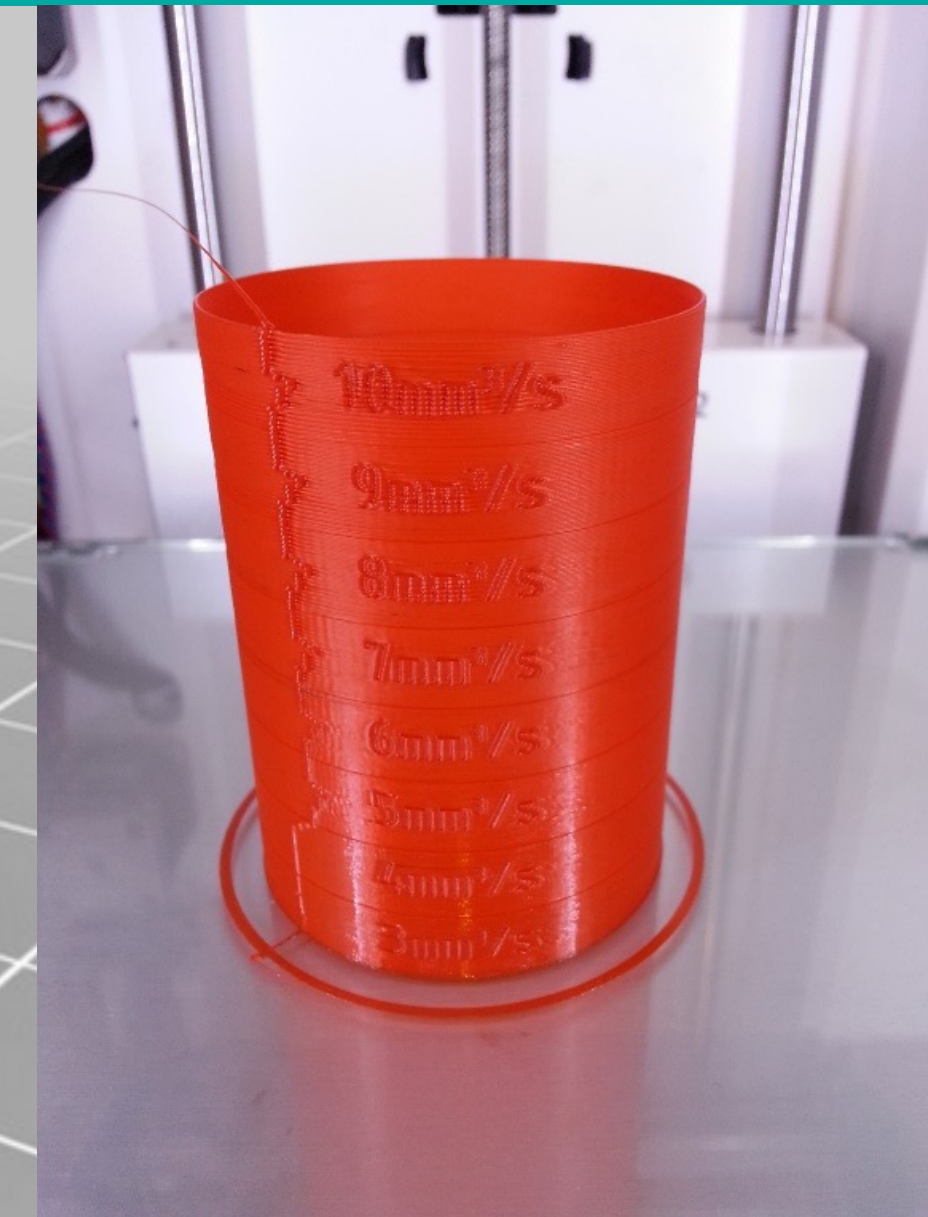
Test de torture
Test général

Torture Test
Overall test
thing:33902



Marvin Test
Test général

Marvin Test
Overall test
thing:215703



Test débit
volume max/ sec à
température donnée

Flow test
Max volume / second
at temperature

← BACK TO TALK

ColorFabb Talk

search



3dhubs.com/talk/colorfabb

POPULAR

NEW

MY TAGS

START A NEW /COLORFABB THREAD

▲
6
▼



Ultimaker Sample Issues: Nut & Bolt

Ok, so something that earlier I got to work without any problem, suddenly I can't get done. I'm trying to print a smooth Nut & Bolt print on my Ultimaker 2 for a customer and these are my



Filemon

3 days ago

10 comments (1 new)

/ColorFabb

/Ultimaker 2

▲
4
▼



3D Hubs NY ColorFabb Workshop

Hi Hubs, We'd like to invite you to a "3D Hubs Filament Workshop" in New York, organized in collaboration with Colorfabb. During the event we'll be showcasing the new Colorfabb XT-CF20



Nikki

7 days ago

3 comments

/Boston

/ColorFabb

/Event

/Filament

/Hartford

/New York

/Philadelphia

/Providence

/Springfield-MA

ColorFabb Talk

15 followers

UNFOLLOW /COLORFABB

About ColorFabb

ColorFabb is a Dutch producer of high quality filaments for 3D printing, with special filaments such as their Bronze and Copper fill.

Thanks to our partnership with Colorfabb, our hubs can order Filament at this manufacturer with a discount.

copperFill

Déplacement et suintement du filament entre support et pièce
et pièce

Oozing and stringing between support and model.

Baisser la température
Augmenter le retrait

*Decrease temperature
Increase retraction*



XT-copolyester

Le remplissage ne se fait pas de manière continue
Infill is not laying down in consistent extruded lines.

Vitesse d'impression plus lente pour le remplissage

Slower print speed for infill.



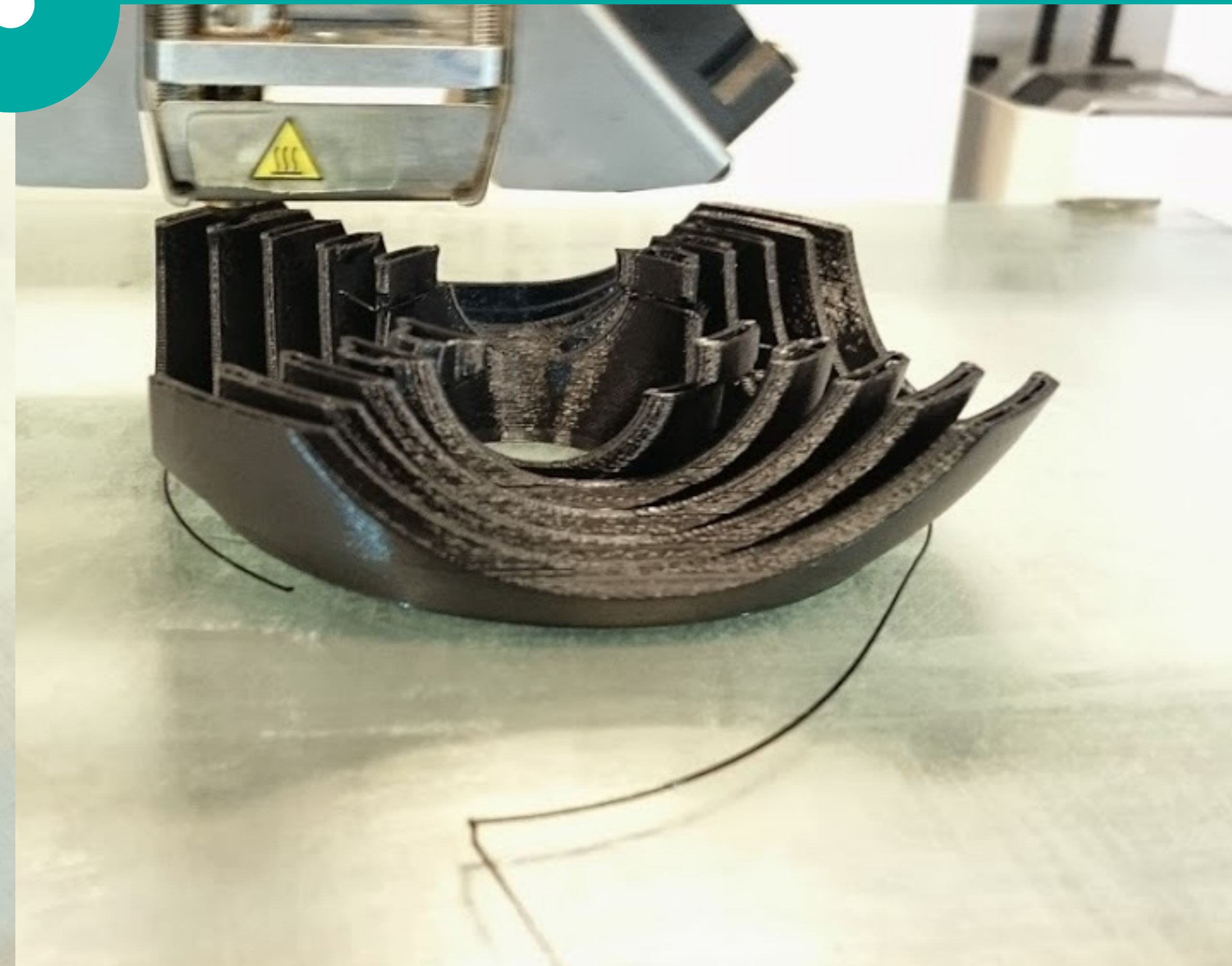
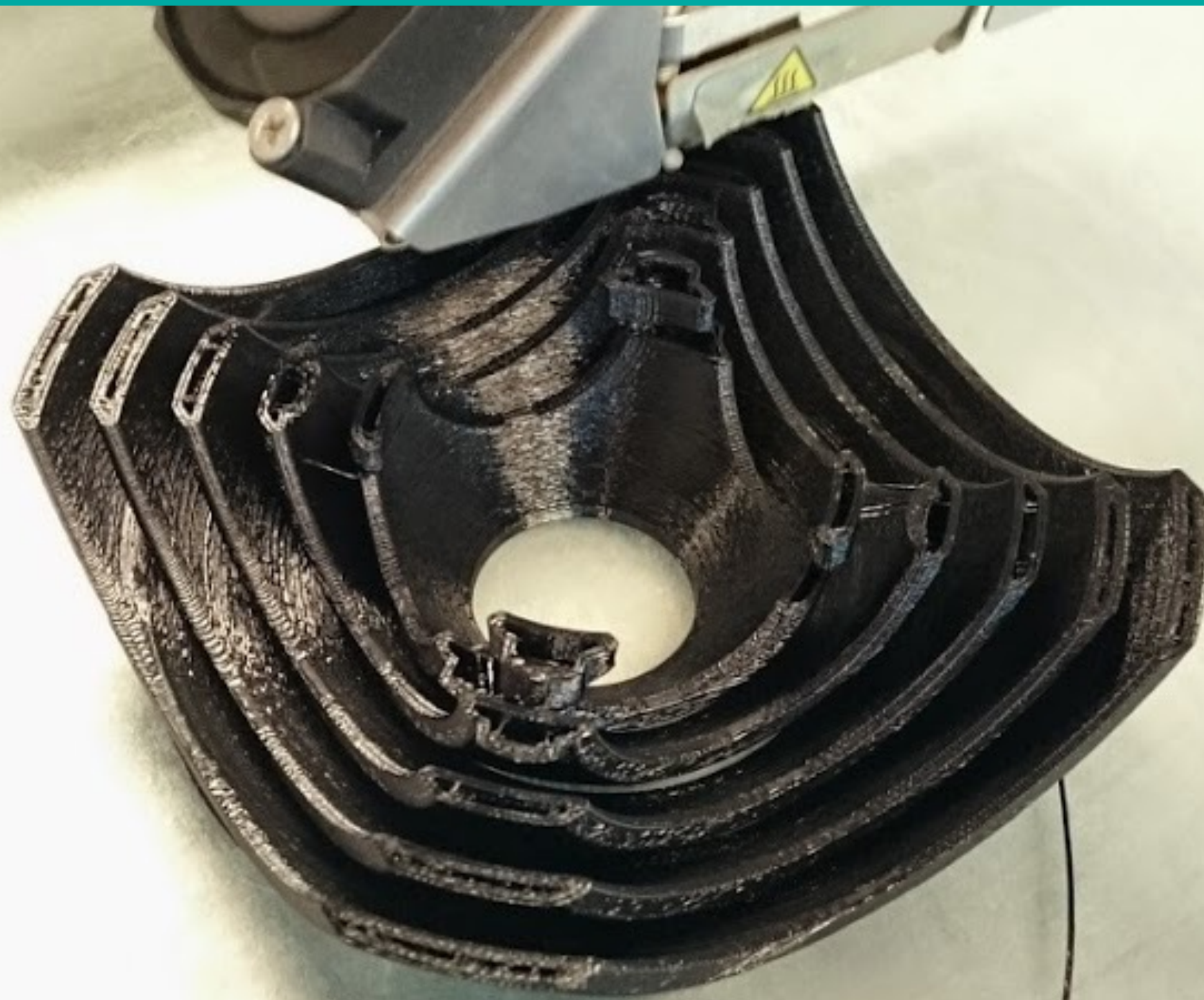
XT-copolyester

Déformation de la pièce durant l'impression
due au repli du matériau

Model shifted during print, due to warping.

Application d'une nouvelle couche
de colle

Fresh coating of gluestick.



XT-copolyester

Extrémités fondues dues à une impression trop rapide et un refroidissement insuffisant

Molten tips due to fast printing and not enough cooling.

Augmenter le temps min.
par couche

Increase minimal layertime.



bronzeFill

comment imprimer le Marvin parfait en Bronzefill

how to print the perfect Marvin with bronzeFill

<https://www.3dhubs.com/talk/thread/bronzeFill-marvin-0>

Best Practices sur Talk

Best Practices on Talk



← BACK TO TALK

ColorFabb Talk

search



3dhubs.com/talk/colorfabb

POPULAR

NEW

MY TAGS

START A NEW /COLORFABB THREAD

▲
6
▼



Ultimaker Sample Issues: Nut & Bolt

Ok, so something that earlier I got to work without any problem, suddenly I can't get done. I'm trying to print a smooth Nut & Bolt print on my Ultimaker 2 for a customer and these are my



Filemon

3 days ago

10 comments (1 new)

/ColorFabb

/Ultimaker 2

▲
4
▼



3D Hubs NY ColorFabb Workshop

Hi Hubs, We'd like to invite you to a "3D Hubs Filament Workshop" in New York, organized in collaboration with Colorfabb. During the event we'll be showcasing the new Colorfabb XT-CF20



Nikki

7 days ago

3 comments

/Boston

/ColorFabb

/Event

/Filament

/Hartford

/New York

/Philadelphia

/Providence

/Springfield-MA

ColorFabb Talk

15 followers

UNFOLLOW /COLORFABB

About ColorFabb

ColorFabb is a Dutch producer of high quality filaments for 3D printing, with special filaments such as their Bronze and Copper fill.

Thanks to our partnership with Colorfabb, our hubs can order Filament at this manufacturer with a discount.