3D Printing at the Library

In order to meet the mission, education and quality of life needs of the Grand Forks Air Force Base community, the Grand Forks AFB Library strives to offer community access to new and emerging technologies such as 3D printers. This policy establishes how and under what circumstances members may access this new resource.

Create and Request: Step by Step

I. **Create**

   a. The 3D printer can be used with basic knowledge of Computer Assisted Design (CAD). Creating a new design requires some knowledge of 3D modeling software products. Free software programs, such as **Tinkercad**, are available.

   b. Digital designs also are available from various repositories such as **Thingiverse.com**.

   c. Restrictions

      i. File must be submitted in .stl or .obj format

      ii. File size cannot exceed 100 MB

      iii. Print size cannot exceed 9.92 x 7.83 x 5.9 in

      iv. Print time cannot exceed seven (7) hours

II. **Submit**

   a. Send print requests from a valid email address to gfafblibrary@outlook.com. Patrons are also welcome to present their file via a USB drive in person. Request must include:

      i. Attached file and any copyright information

      ii. Your name, and library card number, and phone number

      iii. Color. Options are grey, white, black, cream, red, orange, yellow, green, blue and purple. Colors may be limited. If your requested color is not available, items will be printed in grey or white.

   b. Your file must be reviewed and approved by a staff member before it can be printed. If the file cannot be printed for any reason, you will receive an email notification.

III. **Pick Up**

   a. A completion email or call will be sent when the print is finished. Your item may be picked up at the circulation desk.

b. Models will be printed on a first come first served basis that is contingent upon staff and printer availability. If there is high demand, the Library will schedule only one print per day per person or entity. We can only accept **one file per patron at a time**. Patrons must wait until they have picked up their finished print before they can submit another file. Prints consisting of multiple pieces/ files may take longer to complete.

IV. Please note that procedures governing the use of the 3D printer are subject to change.

Grand Forks AFB Library 3D Printing Policy

The Library's 3D printers are available to library patrons to make three-dimensional objects in plastic using a design that is uploaded from a digital computer file.

1. The Library's 3D printers may be used only for lawful purposes. Patrons will not be permitted to use the Library's 3D printers to create material that is:

   a. Prohibited by local, state or federal law.

   b. Unsafe, harmful, dangerous or poses an immediate threat to the well-being of others. (Such use may violate the terms of use of the manufacturer.)

   c. Obscene or otherwise inappropriate for the Library environment.

   d. In violation of another's intellectual property rights. For example, the printers will not be used to reproduce material that is subject to copyright, patent or trademark protection.

2. The Library reserves the right to refuse any 3D print request. In the event the library determines that a 3-D printing request be refused, the library shall provide written notice of the reasons for the refusal. The library's decision will be governed by this policy. The customer agrees to assume all responsibility for, and shall hold the library harmless in, all matters related to copyrighted, patented or trademarked materials. The Grand Forks AFB Library is not responsible for any damage, loss, or security of data arising from the use of its equipment or network, nor the functionality or quality of objects produced on the 3-D printer.

3. Cost: 3D printing at the Grand Forks AFB Library is free.

4. Items printed from Library 3D printers must be picked up within seven (7) days of completion notification or will become property of the Library. Items must be picked up by the individual who requested them.

5. Only designated Library staff and volunteers will have hands-on access to the 3D printer.

6. The Library is not liable for any malfunctions or misprints.

<u>Definitions</u>

3D printing: the process of making a physical object from a digital model.

3D printer: a 3D printer uses melted plastic to produce objects designed on a computer.

CAD: Computer Assisted Drawing