

# **MAKE, CREATE, INNOVATE**

## **MAKERSPACE CURRICULUM INTEGRATION**

**A T T H E L I B R A R Y**



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Makerspace FCAM

## What we will cover...

What is the  
makerspace,  
and why use  
it?

What tools do  
we have?


How can I  
integrate it  
with my  
course?

When I'm  
ready, how do  
I set it up?

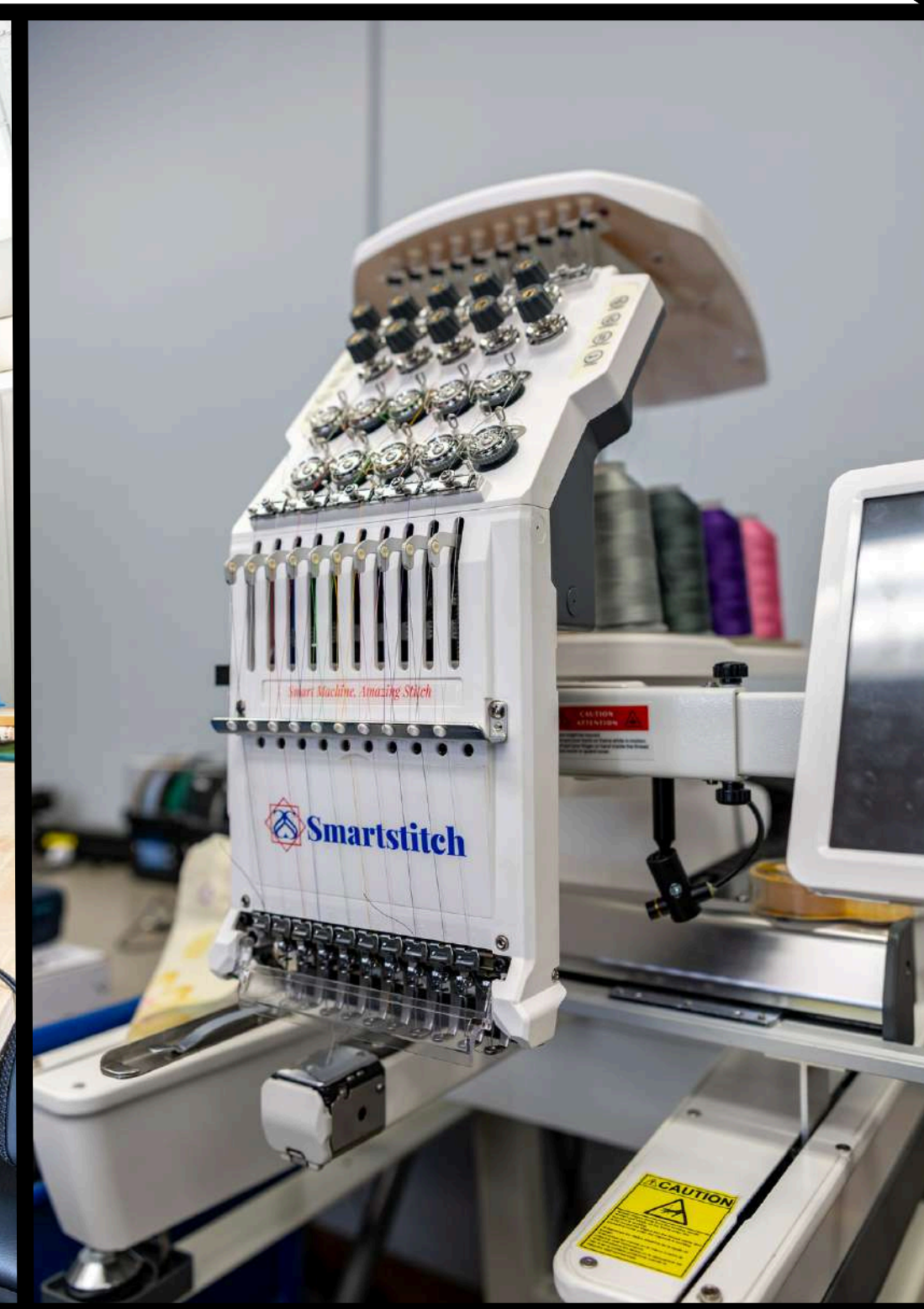
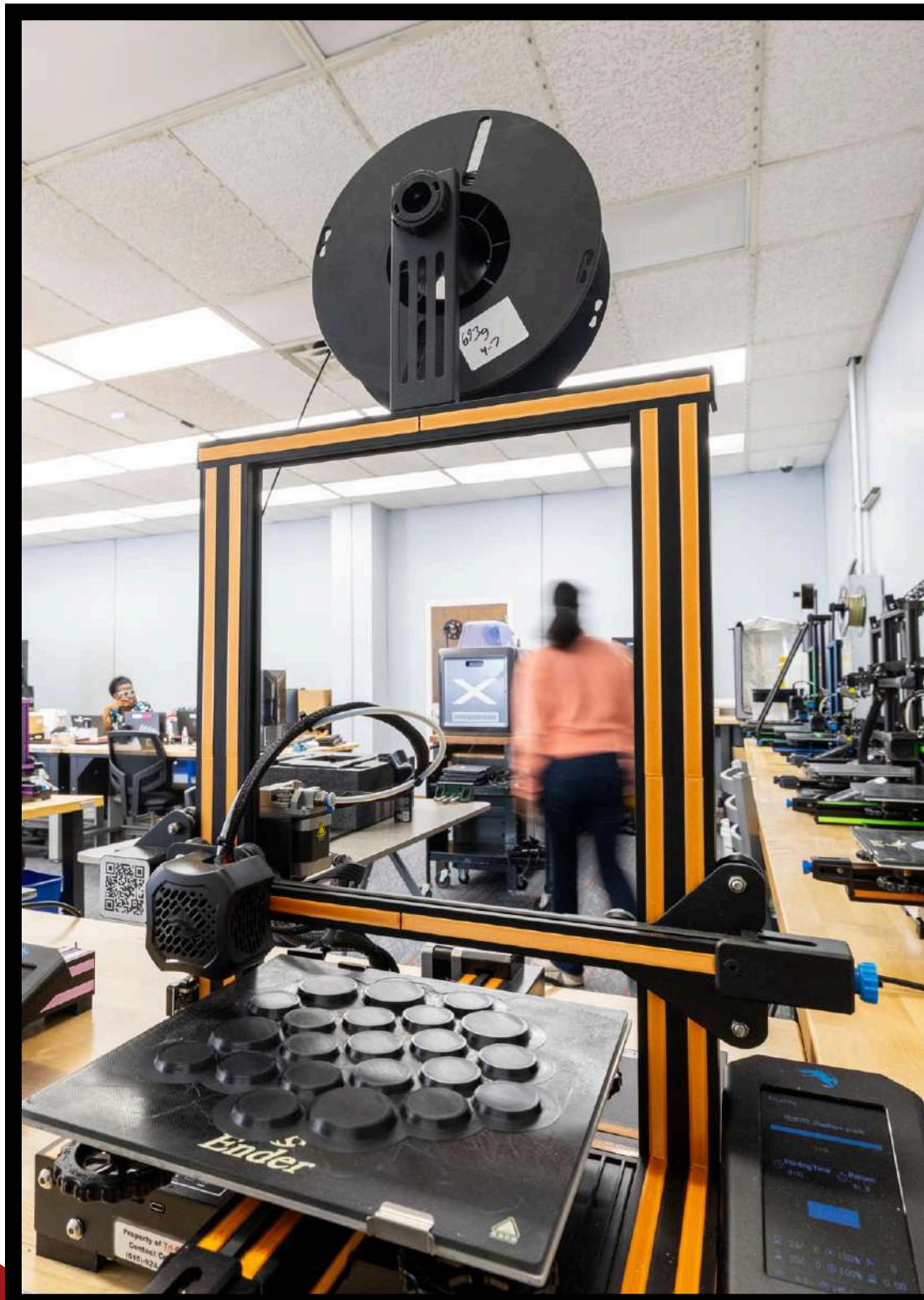


## So, what is the makerspace?

A makerspace is a collaborative, hands-on environment that provides tools, materials, and guidance for people to explore ideas, learn new skills, and bring their creative projects to life. It's designed to support do-it-yourself (DIY) projects in technology, crafts, engineering, art, and more. It's a space where innovation, experimentation, and curiosity are encouraged—no matter your age or experience level.











# What makes us different?

## Open

The Woodward Library's Makerspace is the only makerspace on campus that's open to *any* class in *any* program. We even have community memberships!

## Low Cost

The only costs associated with the makerspace are to refill supplies. Supplies are basically sold at-cost, and bringing your own supplies is welcomed.

## Reservation

While the makerspace is open to all, it can be reserved! So if you do decide after today to bring an entire course to the makerspace, you can reserve it ahead of time.

Any Class

Any Program

Low Cost


Space Can Be Reserved



# What tools we have and why

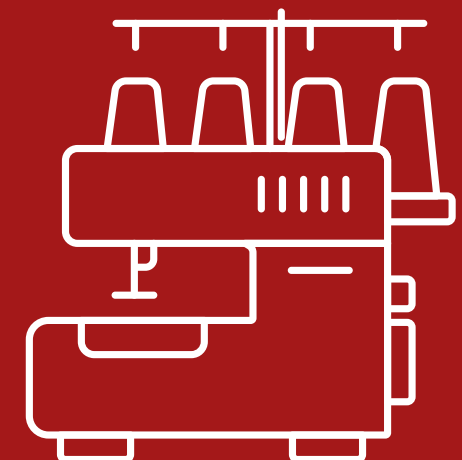
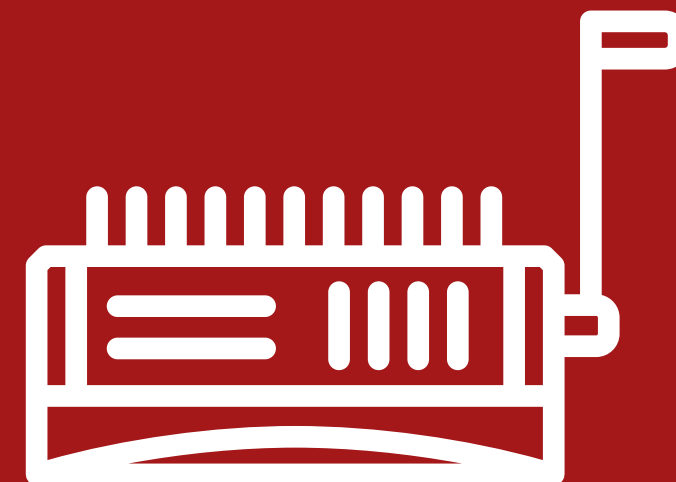
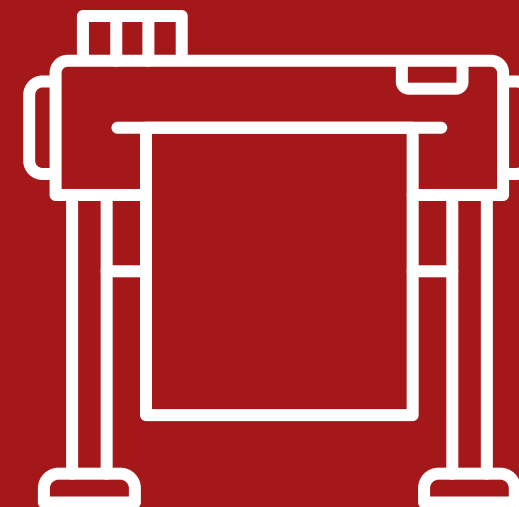
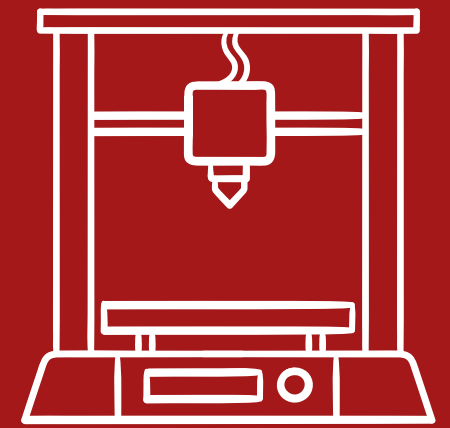
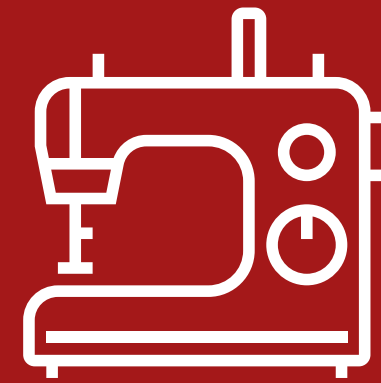
## Supporting a wide range of users at varying skill levels

As an open access Makerspace, it is important to offer a wide range of tools for all skill levels , from beginner to advanced for 3D printers to sewer, to guarantee everyone feels welcome and confident exploring, learning and creating. This method helps user gain confidence and transition to more advanced equipment as they grow more comfortable.



# Types of Tools

- Digital fabrication
- Textiles
- Digital design
- Interactive media
- and more....





# Digital Fabrication

## 3D printers

- Resin
- Fused Deposition Modeling (FDM, better known as filament)

## Laser cutter/engraver

- CO<sub>2</sub>
- Diode

## 3D Scanner

- Handheld scanner



# Textile

## Sewing

- Sewing machines
- Overlock machine
- Hand sewing / Mending

## Embroidery

- Single-needle
- Multi-needle
- Hand embroidery





# Digital Design

## Printers

- Color ink-jet
- Photo
- Large format
- Sublimation

## Presses

- Heat press
- Hat press/Mug press

## Vinyl cutters

- Cricut
- Cameo





# Interactive Media

## Mixed-Reality Headset

- Quest 2
- Quest 3
- Quest 3S

## License Software

- Gravity sketch
- YouTube 360
- OvationVR



# Ovation VR

Ovation VR is an immersive virtual reality training tool that uses AI that helps build confidence and improve communication skills through realistic customizable practice scenarios. It provides feedback on uses pacing, filler words, eye contact and more its multiple environments make it ideal for students and educators.

## Uses

- Public speaking
- Language practice
- Interview practice
- Situational training



# Integrating the Makerspace into your Curriculum

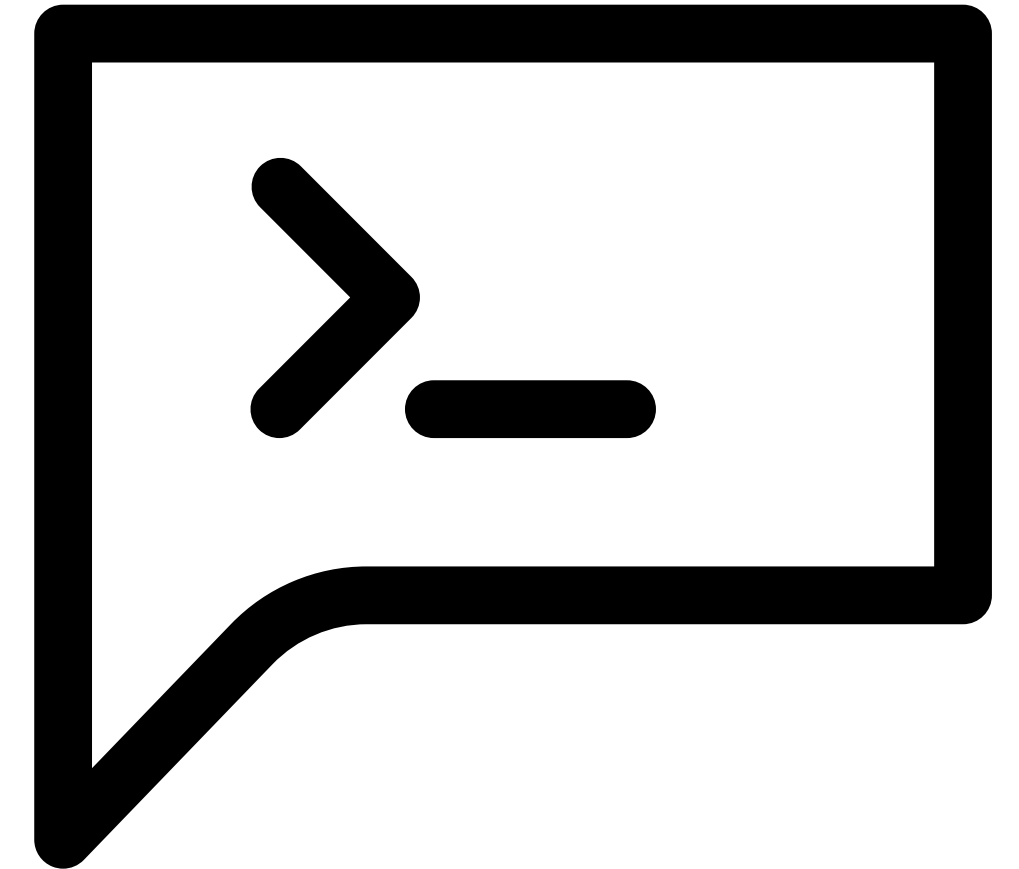
In the 2024-2025 academic year, the library makerspace has been integrated in many courses in a variety of ways.

## Who is already using the space and how:

- Chemistry for everyone
- Technical report writing
- graphic design senior project
- Alternative Medium

## Who's next:

- Criminal justice
- Business





# Chemistry for Everyone

Using a 3D Printer to make additive manufacturing a hands-on experience.

- 25-45 students
- 4 sections
- Students download, slice, and print
- Makerspace staff supported the instructor



# Technical Report Writing

Using the makerspace as a tool to write a press-style piece through hands-on experience.

- 25 students
- 1 section
- Students explore the various makerspace tools in groups
- Makerspace staff instructed, introduced tools, and answered questions



# Graphic Design Senior Project

Tour and explore the makerspace tools and equipment to learn how they can be user to help them create their final project.

- 15 -20 students
- 1 section
- Students explore the various makerspace tool in groups
- Makerspace staff gave tour and answered question





# Alternative Medium

Using the Cricut vinyl cutter to demo techniques in art course.

- 10–15 students
- 1 section
- The instructor taught stencil-making using the Cricut machine
- Makerspace staff provided introductory overview and follow-up support



# Criminal Justice & Business

Using VR software for simulation-based training.

- 5 students
- 1 section
- The instructor will guide students through Virtual Scenarios related to their field.
- Makerspace staff provided access to the Ovation software



# How can we support your course?

## ***You tell us!***

What you've heard today are examples, but it's not an exhaustive list.

We offer:

- Demos
- Tours
- Instruction
- Class support
- Have an idea not listed here? Reach out!





# Schedule a Meeting

- Email Deanna (sherryd@apsu.edu)
- Library's website
- QR Code will take you straight to us!

## Schedule a Class

- Fill out Library Makerspace Instruction Request form
- 2 weeks advance is requested
- Email confirmation





# Questions?

- Visit our website for more information or to reserve a room! Link below or QR code.
  - <https://library.apsu.edu/services/makerspace/>

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