



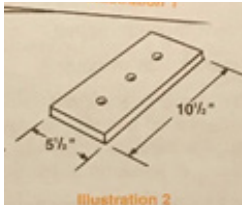
# Illinois 4-H | Spark Ideas. Ignite Possibilities.

Woodworking is a hands-on craft that involves cutting, shaping, and joining wood to create decorative and/or useful things. From learning the basics of using a tape measure and what woodworking tools do to using advanced equipment such as routers and table saws, you will learn skills that will help you create with wood.



## Exploring 4-H Woodworking

### Spark Activity: Build Your Own Flower Box



#### Supplies:

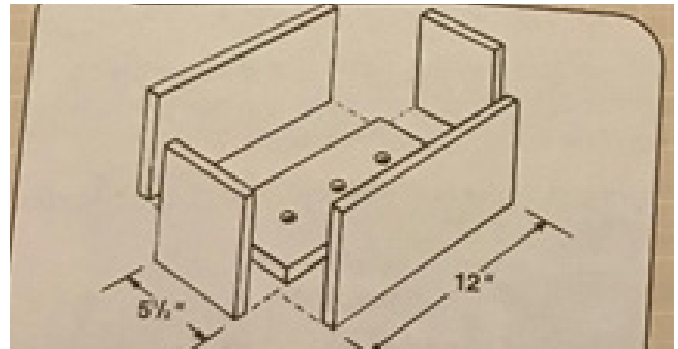
- 1- 1x6 softwood 48 inches long
- 8d finishing nails
- paint of your choice
- wood glue
- 80-120 grit sandpaper

#### Directions:

1. Check your lumber for squareness
2. Measure and mark with a sharp pencil. You will need to mark your board at 12", then another 12", then 10 1/2", then 5 1/2" and another 5 1/2". Cut the board at these places with a saw. Remember to measure twice, cut once.
3. Check your cuts for squareness.
4. Drill 3 drain holes (about 1/2" diameter) in the bottom piece (10 1/2" board).
5. Sand your cut pieces until smooth.
6. Fit the pieces together with butt joints; the 10 1/2" board is your bottom and the other boards should form a box around it.
7. Nail the ends to the outside of the bottom piece. You may use a bead of glue between the joints before you nail them together.

8. Next, nail the side pieces together. Again, you can use a bead of glue between the joints.
9. You can countersink the nails and smooth them over with sandpaper when finished.
10. Paint your project on the outside and inside. Painting it on the inside will help protect the wood from water and soil.
11. Decide if you want to put any other finish on top of the painted surface.
12. Now plant flowers or fill your box with a few of your favorite things!

Project featured in National 4-H Curriculum:  
Woodworking Wonders Level 1: Measuring Up



## 4-H Project Levels and Goals

### Beginner

- Identify tools for your work area
- Learn safety rules, tool safety settings, and how to use safety gear
- Identify what different woods look and feel like
- Learn how to connect wood using glue and nails
- Finish wood projects by sanding and finishing

### Intermediate

- Measure and mark boards
- Learn to cut boards and angles
- Learn different qualities of woods
- Enhance knowledge and use of power tools
- Enhance knowledge on sanding and getting a good finish application

### Advanced

- Discover joining, clamping, and connecting techniques
- Learn safe use of power tools on a more independent level
- Use various types of stains to emphasize the grain of wood
- Learn to enlarge scale-drawn plans
- Explore woodworking careers and entrepreneurial opportunities

## Put Your Project Into Action

### Show Your Skills

- Make and finish a piece of furniture
- Build a tack box to show your animal project
- Build a birdhouse or feeder, dog house, or a toy train set

### Service and Leadership

- Make bird houses or flower boxes to put outside nursing home windows for residents to enjoy
- Repair furniture for people in need
- Build a project to donate for a charity auction
- Build park benches or picnic tables for a local park
- Join a building project with an organization such as Habitat for Humanity
- Conduct a woodworking workshop
- Host a woodworking activity demonstration where 4-H and community members can learn basic woodworking
- Be a project helper for younger members

### Entrepreneurship

- Start a furniture repair business
- Find a project that you enjoy enough to replicate and start a business making them

### Technology Connection

- Try a project on a CNC machine (router)
- Work out a project idea in CAD programming (Computer Aided Drafting)

### Connecting with a Mentor

- Contractors or finish carpenters
- Furniture Designers or cabinet crafters
- Hobby woodworkers
- Local woodworking groups
- Community college students / programs

### Events

- Exhibit at your local county 4-H Fair
- 4-H workshops in your county
- Community college outreach classes
- Classes at a local high school



### Careers for People Interested in Woodworking

Carpenter  
Cabinet Crafter  
Furniture Refinisher

CNC Wood Lathe  
Operator

## Start a Conversation

If you could make anything out of wood, what project would you choose?

Why are you interested in learning about woodworking?

## Want to learn more?

[go.illinois.edu/4Hwoodworkingproject](http://go.illinois.edu/4Hwoodworkingproject)

## Explore more at Illinois 4-H!

[4-H.extension.illinois.edu](http://4-H.extension.illinois.edu)



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**Credits:** North Dakota State University 4-H project sheet | University of Wyoming 4-H project sheet | California 4-H project sheet | “Woodworking Wonders Level 1: Measure Up” National 4-H curriculum | Authored by Jamie Boas, University of Illinois Extension, Youth Educator | 4-H Spark Sheets are a collaborative effort of 4-H staff, volunteers, alumni and teens from across Illinois. A big thanks to the many contributors and reviewers!