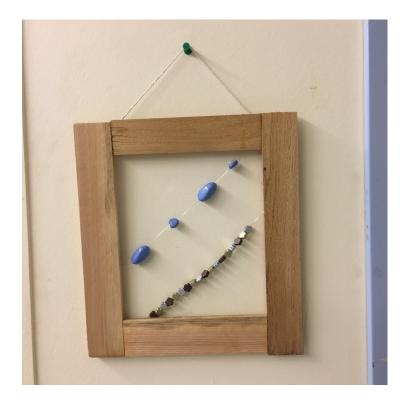
Beaded Picture Frame



ADST Project



Picture Frames are a great ADST project for students in grades 4-7.

The first thing that you will need to do as a teacher, is get trained in using your school Maker Cart. Once you are Safe and Certified you will need to do an inventory on your ADST Toolbox kits (there are 12 for your school) and your Maker Cart. Each cart and your 12 kits have master lists of what should be in them. If you are not sure or if you will need additional resources, please contact your District Careers Coordinator and they will be able to help you, <u>Dawn.Anderson@sd71.bc.ca</u> or <u>Steve.Claassen@sd71.bc.ca</u>

Jr. ADST (Applied Design Skills and Technology)

ADST courses have been designed so that students can gain hands-on learning experiences and skills through design and creation. The Curricular Competencies within these courses ask students to understand context, define what they need to do, ideate with others and evaluate, prototype, test their ideas, make and share.

With this, these booklets have been designed to support new to experienced users and there are many ways to approach each step.

Feel free to challenge your students to come up with new ways to compete a step in the booklet. Some of the steps are challenging and should be completed with a partner. Please share if you have a good approach to a step and we can tweak the booklet for all.

For this project you will need the following items:

- Hand Saw
- Wood Glue
- Speed Square
- Safety Glasses
- Wood Burner
- Metal wire (thin)
- Measuring Tape
- Beads (not in picture)
- Scissors
- Lathe wood strips x 2, 16" each
- Bench Hook
- Stapler
- Pencil



Once you have all of these you are ready to go!

Step 1: * Plug in your wood burner so that it is ready when you need it.

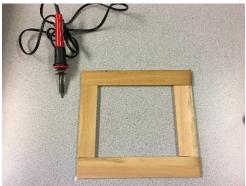
- The first thing that you are going to need are your:
 - o Bench hook
 - Hand saw
 - Safety glasses
 - Measuring tape
 - o Pencil
 - o Lathe wood
- You will first use your measuring tape and measure out how long you want your top, bottom and side pieces.
- Note, there are two pieces of wood, each piece will measure out one side and one top or bottom piece so that you get the correct sizes. If you would like it perfectly square just cut each piece in half and all 4 sides will be the same.
- Once measured out mark with a pencil and then using your speed square draw a straight line across your wood.
 Please note, the raised edge of the speed square needs to be tight to the side of the wood and you will get a perfectly straight line.
- Then using your bench hook on the table, safety glasses on and hand saw, cut your wood.





Step 2:

- You should now have 4 pieces of wood. A top and bottom and two sides. Place them how you would like them so that you know how you are going to glue it together.
- Next you will use your wood burner to write a word or phrase on your frame. Remember, it is hard to draw circles and I would write out your intended word or statement in pencil on the wood first, so that you get your desired result.
- Careful not to touch the tip as it will burn the skin.







• Once you have burnt your word or statement it is time to glue and staple your frame together. The glue should hold it together, but you will need the staples on the back to allow it to set properly and it will support the frame in the future.

• Place the pieces face down how you want them to go, if you had any jagged ends you may rub them smooth using sandpaper or on concrete.

• I glue on top of cardboard, so the glue doesn't get everywhere.

• Next you will apply a good amount of glue in the corners of the frame. Once they all have glue, extend the stapler and staple the back side of the frame together, you do not want the staples on the front \bigcirc





Step 4:

• The wood frame is going to have to dry for at least 1 hr. Please let it sit undisturbed. If you can, I would let it sit for a bit longer, just to be safe, but I am over cautious.

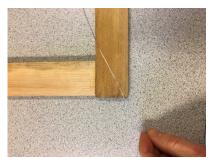
Step 5:

- Now you will start to bead. For this you will need your wire, scissors, and beads.
- Some students may want to have a full line of beads and others may only want to have a couple beads on each wire that sit in a specific spot.
- To get the correct length of wire have students decide where they want the wire and bead line to sit and measure



it out. You will need an extra bit at the ends so that you can loop it and tie it off so that it doesn't slip back through the staple.

• Once you have your wire cut and have a planned place on your frame for it to sit you are ready to bead.



Step 6:

- Beading can look a couple different way.
 - Beads placed in a spot on the wire. Here students will take their wire and moving in a couple inches, thread a bead and then double back and place the wire through a second time, this will lock the bead in place.



Students can continue to place beads until they have it to their liking. They will also need to test their wire to make sure the beads sit where they would like them to in the frame.



Straight beads: Students will need to tie a knot in the end of their wire, I suggest 1-2" up from end as they will need to staple the wire down and tie it off. The beads will also need to sit inside the frame. Then they can just bead a straight line of beads. Once complete they will need to tie off the other end.

Step 7:

- Next, students will need to staple their beaded wires to the frame. To do this students will flip their frames so that they are working on the back.
- They will then lay their wires down where they want them, and they will staple them to the frame. Make sure to pull the wire straight and once it is stapled tie a knot in the end so that it doesn't slip back through the staple.







Step 8:

- The last step will be to get a piece of string, wire, or twine and staple it to the back so that you can hang the frame in your home.
- Cut a piece of string to your desired length, flip the picture frame back over and staple the string to the frame. Tie a knot in the end. Staple it approximately where the sides join but not on the joint.

Congratulations!!!

