The members of Texas A&M AgriLife will provide equal opportunities in programs and activities, education, and employment to all persons regardless of race, color, sex, religion, national origin, age, disability, genetic information, veteran status, sexual orientation or gender identity and will strive to achieve full and equal employment opportunity throughout Texas A&M AgriLife.
TEXAS 4-H HOME ENVIRONMENT

Description
The Texas 4-H Explore series allows 4-H volunteers, educators, members, and youth who may be interested in learning more about 4-H to try some fun and hands-on learning experiences in a particular project or activity area. Each guide features information about important aspects of the 4-H program, and its goal of teaching young people life skills through hands-on experiences. Additionally, each guide contains at least six learning experiences, which can be used as a project guide, or as activities for six different 4-H meetings.

Purpose
Texas 4-H is designed to develop the youth of our state into productive adult citizens. The 4-H Program uses a non-formal educational process of engaging youth in a “learning by doing” process. This includes hands-on opportunities, participation in workshops and clinics conducted by volunteer leaders or professionals, as well as competitive experiences which allow 4-H members to demonstrate the knowledge they have gained. Through this entire process, the youth are learning key life skills such as working with others, teamwork, cooperation, and goal setting. Through all experiences, youth get to interact with adult volunteers and county Extension agents.

What is 4-H?
4-H members across the nation are responding to challenges every day in their communities and their world.

As the youth development program of the Cooperative Extension System of land-grant universities, 4-H is the nation’s largest youth development organization, empowering six million young people throughout the United States. Cooperative Extension of 1862 and 1890 land-grant universities provide leadership to engage young people in 4-H in all 3,007 counties of the United States. The impact of the Cooperative Extension partnership is profound, bringing together National Institute of Food and Agriculture of USDA, land grant universities and county government to resource learning opportunities for youth.

Through America’s 110 land-grant universities and its Cooperative Extension System, 4-H reaches every corner of our nation—from urban neighborhoods to suburban schoolyards to rural farming communities. With a network of more than 6 million youth, 600,000 volunteers, 3,500 professionals, and more than 25 million alumni, 4-H helps shape youth to move our country and the world forward in ways that no other youth organization can.

Texas 4-H
Texas 4-H is like a club for kids and teens ages 5-18, and it’s BIG! It’s the largest youth development program in Texas with more than 550,000 youth involved each year. No matter where you live or what you like to do, Texas 4-H has something that lets you be a better you!

You may think 4-H is only for your friends with animals, but it’s so much more! You can do activities like shooting sports, food science, healthy living, robotics, fashion, and photography.

Look for 4-H clubs at your school, an after-school program, a community center, or even on a military base or through the reserves for military families.

Texas 4-H is part of the Texas A&M AgriLife Extension Service and the Texas A&M System. Founded in 1908, 4-H is the largest youth development program in Texas, reaching more than 550,000 youth each year.

The 4-H Motto and Pledge
“To Make the Best Better!”

I pledge: My HEAD to clearer thinking, My HEART to greater loyalty, My HANDS to larger service and My HEALTH to better living, For my Club, my Community, my Country, and my world.

Participating in 4-H
4-H is a great program because it provides options for young people to participate. From a 4-H club located in your community, a SPIN club that focuses on one particular project area, or participating in 4-H through your classroom at school, 4-H allows youth to learn in many different environments. If you are interested in joining 4-H, contact your County Extension Office and ask for a list of the 4-H clubs in your area. If you are a school teacher/educator and would like to use 4-H curriculum or these project guides in your classroom, contact your Extension Office as well for assistance.
4-H “Learning by Doing” Learning Approach
The Do, Reflect, Apply learning approach allows youth to experience the learning process with minimal guidance from adults. This allows for discovery by youth that may not take place with exact instructions.

EXPLORE THE CONTENT
Introduction of the topic, overview and exploration of content, and review of objectives

1. Experience the activity; perform, do it
   - Youth do with limited "how to" instructions.

2. Share the results, reactions, and observations publicly
   - Youth describe results of the experience and their reaction.

3. Process by discussing, looking at the experience; analyze, reflect
   - Youth relate the experience to the learning objectives (life skills and/or subject matter).

4. Generalize to connect the experience to real-world examples
   - Youth connect the discussion to the larger world.

5. Apply what was learned to a similar or different situation; practice
   - Youth use the skills learned in other parts of their lives.

Build on knowledge by learning more and advancing to the another topic/level

Youth use the skills learned in other parts of their lives.
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Developed by:
Shawnte Clawson
Color Wheel

EXPLORE THE CONTENT:
Color Wheel Terms:
- Primary colors are red, blue, and yellow. These are primary because they cannot be made from any other colors.
- Secondary colors are green, purple, and orange. A secondary color is made by mixing two primary colors. The secondary colors are:
  - Green (yellow + blue)
  - Orange (yellow + red)
  - Violet (red + blue)
- Intermediate colors, sometimes called tertiary colors, are made by mixing a secondary and a primary color together. Examples of intermediate colors are yellow-green, blue-green, and blue-violet.
- Complementary Colors are two hues positioned exactly opposite each other on the Basic Color Wheel. For example, red and green are complimentary colors.
- Value is the lightness or darkness of a color. The value of a color can be changed by tinting or shading the color. This also changes the intensity (brightness or dullness) of the color.
- Tints are light values of a color. One usually makes tints by mixing a color with different amounts of white.
- Shades are dark values of a color. One usually makes shades by mixing a color with different amounts of black.
- Warm Colors are colors often associated with fire and sun and suggest warmth. These are colors that contain red and yellow and appear on one side of the color wheel opposite the cool colors.
- Cool Colors are often associated with water, sky, spring, and foliage and suggest coolness. These are the colors which contain blue and green and appear on one side of the color wheel opposite the warm colors. Psychologically, cool colors are said to be calming and depressive; optically, they generally appear to recede.

How does color make us feel?
Color is a wonderful tool to create mood. The effect of color can have a strong impact on your feelings. Do you remember the last rainy day, when it was dark and dreary outside? How did your mood change when sun came back out and lightened everything up?

In art, dark, dreary colors often depict sadness, while cheerful yellows and orange are used for happiness. Artists have used color in such ways as to create a mood or feeling in a piece of work. This is done by using colors realistically and by using colors “creatively”.

TIME:
45 minutes

MATERIALS NEEDED:
Activity 1
- Uncoated Paper plates, 2 per student (one for a palette, one for the color wheel)
- Color wheel templates, cut out and glued onto paper plates (paint adheres best to the “uncoated” plates)
- Tempera paint: red (or magenta), yellow, and blue (or turquoise)
- Water in small plastic containers
- Medium size brushes
- Paper towels
- Color wheel poster (optional)

Activity 2
- 8.5 x 11 piece of black or white paper or cardstock for each participant
- Scrap paper for practice sketching
- Colored pencils or crayons

OBJECTIVES:
- Understand the relationships of the color wheel.
- Describe the difference between primary, secondary and intermediate colors. Describe feelings associated with different colors.
Color is a very important aspect when creating an interior space.

**DO:**

**Activity 1:** Make your own color wheel

Using paper plates, draw two triangles as shown in the picture at the bottom right.

Add in the color words. Begin with the primary colors (red, blue, yellow) by asking youth to recall what they were. Next move to secondary (purple, green, orange) colors and write them in. Follow with the intermediate colors.

Begin the painting process. Start with the primary colors. Remind participants that these colors are the purest and do not have to be mixed with any other color. After each color is painted, youth will have to clean their brushes to paint the next color.

Next, introduce the secondary colors (orange, green, and violet). Mix two primary colors to paint each secondary color in its appropriate place, between the two primary colors which create it when combined.

Now paint an intermediate color between each primary and secondary color. For each intermediate color, mix some of the primary color with the secondary color next to it, adding just a tiny amount of the darker color to a larger amount of the lighter color. (The name of an intermediate color always begins with its dominant primary color, followed by its secondary color, such as “yellow-orange” or “blue-green”.)

Tertiary colors are the browns and grays you get when you mix the three primary colors together. Browns and grays vary depending on the amounts of each primary color. Mix a tertiary color and paint a swatch of it in the center of your color wheel.

Save the color wheel to refer back to in other color related activities.

**REFLECT:**

How does color make us feel?

Color is a wonderful tool to create mood. The effect of color can have a strong impact on your feelings. Do you remember the last rainy day, when it was dark and dreary outside? How did your mood change when sun came back out and lightened everything up?
In art, dark, dreary colors often depict sadness, while cheerful yellows and orange are used for happiness. Artists have used color in such ways as to create a mood or feeling in a piece of work. This is done by using colors realistically and by using colors “creatively”. Color is a very important aspect when creating an interior space.

**Activity 2 - Letter Design**

List the initials of your first, middle and last name (if you don’t have a middle name use your whole name, or choose someone other than yourself).

Make three thumbnail sketches using the initials of your name. Experiment with overlapping the initials, making them curvy or geometric, interlinking them, etc.

Take the lines of your letters off the edge of the paper.

Evaluate your thumbnail sketches and decide which one you like best.
Draw your favorite on a 9 x 11 inch piece of paper. Your letters need to be at least $\frac{1}{2}$ inch wide. Your designs will be created in the negative space (shown in white in the diagram below) found outside of the solid (black as shown below) letters.

![Diagram](image)

Fill in the negative areas (all the areas that surround the letter) with textures using colored pencils. Try using all warm colors or all cool colors or contrasting the spaces with warm and cool colors. Think about your color choices. Also consider a theme for your work when creating the textures. For example if your theme was baseball you could do patterns with bats, balls, hats, stars, etc.

Example: Here is an example of one done with all animal skin prints. *(Note that the black spaces are the positive spaces of your letters and nothing is drawn in these areas. They remain the black or white of the paper.)*

![Example](image)

When you have completed your art, look at your colors. What color scheme did you use? Warm? Cool? Primary? Secondary?
REFLECT:
• How do you think the color wheel can help you design a room?
• Are you more attracted to warm colors or cool colors? Why?

APPLY:
• Think about the colors in your room or a friend’s room, are they: primary, secondary or intermediate? Warm or cool?
• How are colors used in public spaces like airports, restaurants, retail stores, and medical offices?
• How do these colors make you feel when entering the space?

Additional Resources
• The Psychology of Color. http://positivemed.com/2013/03/07/the-psychology-of-color/
Principles and Elements of Design

EXPLORE THE CONTENT:
It is important for interior designers, whether working on a personal or professional project, to know the basics of art and design. The elements and principles of design are the building blocks used to create a work of art.

Elements of design can be thought of as the things that make up a painting, drawing, design, etc. Good or bad, all paintings and interior designs will contain most, if not all, seven elements of design.

The principles of design can be thought of as what is done with the elements of design. How the principles of design are applied, determines how successful we are in creating an inviting space.

Terms
- Elements of Design: line, shape, form, space, color, texture
- Principles of Design: balance, emphasis, movement, pattern, repetition, proportion, rhythm, variety, and unity

DO:
Activity 1 - The Elements of Design
Elements:
Discuss the elements of design: line, shape, forms, space, color, and texture. Give detailed description, definition, and show examples of each. If time allows, let youth find examples around the room and share their findings.

Design:
Discuss the principles of design: balance, emphasis, movement, pattern, repetition, proportion, rhythm, variety, and unity. Give detailed description, definition, and show examples of each (see resources from Iowa State University Extension, 4-H).

Activity 2 - Create Collage
Allow youth to look through the materials available and cut out an example of each element and principle of design. They can create what they can’t find! Arrange and glue the items on the base. Make it interesting! Let the collage dry.
REFLECT:
• What elements of design are most appealing to you?
• How did you use the elements and principles of design when creating your own design collage?

APPLY:
• What are other places where you have seen the elements and principles of design being used?
• How might you incorporate principles and elements of design in future projects?

REFERENCES:
• http://www.extension.iastate.edu/Publications/4H492.pdf
• http://www.extension.iastate.edu/Publications/4H634.pdf
• https://www.youtube.com/watch?v=BwNQkhKg2lg (video)
EXPLORE THE CONTENT:
Wallpaper is one of the simplest and most affordable aspects of home décor. A lot can be done with wallpapers to add elegance and simplicity to a room. Years ago, wallpaper was made out of paper. Today, the majority of wallcoverings are vinyl coated with a paper backing. Although vinyl is the most commonly used wall covering today, felt and velour or straw and bamboo are also available.

DO:
Activity 1 - Wallpaper Notebook:
Many paint stores are happy to share old wallpaper samples or will sell them for a reasonable price. If you are able to collect some, this is a nice way to allow participants to visually examine different types of wallpapers. Some types collected might include: felt, vinyl, foil, grass, bamboo, or fabric.

Lay the different types of wallpaper out on a table and discuss which wallpapers would be best for different rooms in the house.

- **Durable** wallpaper that is vinyl or vinyl coated is best for bathrooms and high traffic kitchens. Because of the scrub able feature of these papers, you can use fragile papers in these rooms, but will need to avoid putting them near a water source and should not expect them to last a long time.
- **Embossed** papers make great borders and ceiling papers. Their texture often mimics tile and plaster ceilings.
- **Designer** papers can be used in any bedroom or living area away from a water source. They make eye catching accent walls in a great room or home office. When balanced properly with different patterns or paints, they can create a beautiful bedroom.
Afterwards, allow each participant to choose a wallpaper remnant or sample. Utilize the remnant to decorate the front of a notebook. All that is needed is a pair of scissors and an adhesive to stick the remnant to the front of the notebook. This notebook can then be utilized for taking notes throughout the project. See the picture below as an example!

**Activity 2 – My Room in Wallpaper**

In advance, find pictures from home decorating magazines of wall papered rooms. Cut them out and have them ready for the meeting.

Allow participants to look at the magazine clippings. Which wallpaper would they choose for their own room? Once chosen, then ask, “What is the process is for determining the amount of wall paper need for a room?” Discuss answers.
Explain that estimating wall paper must be done by finding the "square footage" of a room. To find square footage, add together the length of all the walls and then multiply the number by the height of the room, from floor to ceiling. For example:

- Add together the length of each wall.
  \[(\text{wall}) + (\text{wall}) + (\text{wall}) + (\text{wall}) = \text{wall length}\]
  For example, \(16 + 16 + 20 + 20 = 72\) feet
- Multiply the total length of walls by the total height.
  \(72\) feet \(\times 9\) feet = \(648\) square feet

The next step is to determine how much of that square footage is wallpaper surface area. Because you won’t use wallpaper on the doors and windows, subtract those areas from the room total. The final number is close to the actual wall area you have to cover with wall paper.

- Measure the height and width of each window. Multiply the height and width to find the square footage. Add the square footage of all of the windows.

  Windows
  For example, \(3\) feet (height) \(\times 4\) feet (width) = \(12\) square feet
  \((\text{window }1) + (\text{window }2) + (\text{window }3) = \text{square feet}\)
  \((12) + (12) + (12) = 36\) square feet

  Doors
  \(3\) feet \(\times 6.75\) feet = \(20.25\) square feet
  \((\text{door }1) + (\text{door }2) + (\text{door }3) = \text{square footage}\)
  \((20.25) + (20.25) + (20.25) = 60.75\) square feet

  Final Step:
  Subtract the total door and window square footage amounts.
  \((\text{wall}) – (\text{door}) – (\text{window}) = \text{square footage}\)
  \(648\) (wall) – \(60.75\) (doors) – \(36\) (window) = \(551.25\) square feet

Now for the wallpaper decision!

- Divide the total square feet by \(25\) (\(551.25\) / \(25\) = \(22.05\)) to determine how many single rolls you will need. The number \(25\) allows for a large repeat pattern to ensure you will have plenty of wall paper for your project.
  \((551.25\) square feet / \(25\) = \(22.05\) single rolls)\)

- All wallpaper is sold in double rolls. So after you get your number in the previous step, divide it be two (\(2\)) to figure how many double rolls you will need.
  \((22.05\) single rolls / \(2\) = \(11.02\) double rolls)

For practice, allow participants to use the tape measures to measure the meeting room. Use these measurements to figure the wall paper surface of the room.

**REFLECT:**

- Why is it important to know the correct square footage of a room?
- What types of wallpaper do you like? Why?
- Would you choose wallpaper for your own home? Why or why not?
APPLY:
- Where might restaurants, office buildings, hospitals and other public spaces use wallpaper?
- What types of finishes or product features would be desirable in the examples listed above?

REFERENCES:
Figuring Paint Needs

EXPLORE THE CONTENT:
In advance, ask project members to bring the dimensions of a room they want to paint. They will need the width and length of the room as well as the height of the walls. Another idea is to demonstrate how to measure these dimensions by measuring the room you are meeting in. Utilize a steel tape measure for this activity.

DO:
Activity 1
Once the room measurements are found, the amount of paint needed can be estimated by using square footage. To find square footage, add together the length of all walls (usually 4) and then multiply the number by the height of the room, from floor to ceiling. For example:
- Add together the length of each wall. (wall) + (wall) + (wall) + (wall) = wall length
  Ex: 16 + 16 + 20 + 20 = 72 feet
- Multiply the total length of walls by the total height. 72 feet x 9 feet = 648 square feet

The next step is to determine how much of that square footage will be paintable surface area. Because you use a different paint on doors and windows, subtract those areas from the room total. The final number is close to the actual wall area needed to cover with paint.
- Measure the height and width of each window. Multiply the height and width to get the square footage. Add the square footage of all of the windows.
  - For example, 3 feet x 4 feet = 12 sq. ft.
  - (window 1) + (window 2) + (window 3) = sq. ft.
  - (12) + (12) + (12) = 36 sq. ft.
- Measure the height and width of each door. Multiply the height and width to find the square footage. And the square footage of all the doors.
  - For example, 3 feet x 6.75 feet = 20.25 sq. ft.
  - (door 1) + (door 2) + (door 3) = sq. ft.
  - (20.25) + (20.25) + (20.25) = 60.75 sq. ft.
- Subtract the total door and window square footage amounts from the square foot measurement of the four walls.
  - (wall) – (door) – (window) = square footage
  - For example, 648 - 60.75 - 36 = 551.25 square feet

In general, you can expect 1 gallon of paint to cover about 350
square feet. Slightly more than a gallon is needed if the walls are unpainted drywall, which absorbs more of the paint. You also need to consider whether to paint more than one coat. If you are painting walls that are unfinished, heavily patched, or dark in color, plan on applying at least two coats of paint.

- Divide the square feet (answer from above) by 350 (the estimated coverage/gallon) for smooth walls; or divide by 300 for rough or textured walls, which soak up more paint.
- \( \frac{\text{(square footage)}}{350} = 1.5 \text{ gallons for smooth walls per coat} \)
- \( \frac{\text{(square footage)}}{300} = 1.84 \text{ gallons for rough / textured walls} \)

Allow participants to utilize the dimensions of their own room to calculate how much paint would be needed for their space.

**Activity 2**

Painting – The Basic Tools

For this activity, it would be best to bring the following materials to a project meeting for participants to view. If this isn’t an option, try setting up a trip to your local paint store to examine painting materials.

Note: Painting tools come in various shapes and sizes; however, you generally need the following tools for a basic paint project.

- 2 inch blue painter’s tape: Protects painted and finished trim and helps you achieve professional paint lines
- Drop Cloth: Protects furniture and floors
- Sandpaper: Eliminates imperfections
- 1 ½ or 2 inch angled sash brush: Best for painting flat surfaces.
- Paint tray and disposable liners: The liner eliminates cleanup
- 9 inch roller, screw on extension pole, and roller cover: Essential for coating walls and ceilings.

Allow each participant to try their hand at painting. Youth can work independently or in pairs and will need a piece of poster board on which to paint. Utilize (2 oz.) craft paint or paint samples in a variety of colors to practice painting. Small brushes or small rollers will be best for this activity. Make sure a drop cloth is underneath the projects.

Ask participants to tape off a design on their poster board utilizing the painter’s tape. A variety of designs and colors may be used for this activity. The main focus is to experiment with painting materials and get a “hands on” opportunity to paint.

Many web sites offer videos to beginning painters. If accessible, this might be a nice way to start your project meeting. A few videos you might try are below:


**REFLECT:**

- Why is it important to know the correct square footage of a room?
- What types of colors are you attracted to (bright, pastel, neutral)? Why?
- Do you think you could paint a space after working with these basic materials?

**APPLY:**

- Is paint a good way to enhance your home? Why or why not?
- What have you learned about paint that you might use in your own bedroom or future home?
- How have you seen paint utilized in other spaces besides your home?
Inspiration Piece

EXPLORE THE CONTENT:
An inspiration piece is anything that an individual enjoys having in their home. Examples are a throw pillow, a favorite ball cap, a small room accessory, or a piece of art. These pieces often inspire one to choose colors and patterns that will complement the inspiration piece. Through this activity, participants will gain a basic understanding of one way to begin a decorating project by utilizing an inspiration piece.

DO:
Activity 1 - Paint Inspiration
Before the meeting, collect a variety of paint swatches from a local paint store. Ask participants to bring an “inspiration piece” to the meeting.

See attached articles for more information on inspiration pieces. https://magnoliamarket.com/finding-inspiration-piece/

Allow members to look at paint swatches. Ask the following:
• Which colors seem to create emotion? How do they make you feel?
• Which ones are you immediately drawn to?

Now take a look at your inspiration piece. Is there a paint color that coordinates with it or brings the piece to life?

Look through color swatches and choose three colors that give a different feeling or mood when paired with your piece.

Activity 2 – Give it a Try
Give participants an opportunity to visualize color on their actual wall by using one of the commercial online programs (below) or other similar resources.

(Optional) Participants can bring a photo of the room they are interesting in decorating. Photos can be uploaded to one of the online programs (if desired). Using the instructions given with each program the participants can “try out” a variety of colors in their space.

• Sherwin Williams: https://www.sherwin-williams.com/visualizer/#/active

TIME:
30 minutes

MATERIALS NEEDED:
• Paint swatches from local home improvement store
• Inspiration piece (see description below)
• Photo of room participants are interested in painting (on jump drive if possible)
• Home decorating magazines

OBJECTIVES:
• Learn how inspiration pieces can influence room design.
• Exhibit the ability to begin designing a space utilizing an inspiration piece.
REFLECT:
• What is your definition of inspiration?
• Why is an inspiration piece important?
• What ideas and color schemes coordinated with your inspiration piece?

APPLY:
• How can you use an inspiration piece in creating or updating a new space?
• What are some examples of inspiration pieces used in public buildings? How was the design of the space influenced by the inspiration piece?

REFERENCES:
• Sherwin Williams: https://www.sherwin-williams.com/visualizer/#/active
• Benjamin Moore: http://www.benjaminmoore.com/en-us/for-your-home/personal-color-viewer
• Magnolia Market: https://magnoliamarket.com/finding-inspiration-piece/
The Space You Live In

EXPLORE THE CONTENT:
Traffic Patterns and Space Design

People and pet traffic is a major consideration in any room design. Interior traffic patterns—the routes a family uses to navigate inside the home—must be carefully thought out when determining furniture and appliance placement. Areas of the home that annoy or frustrate family members will often go unused. The purpose of a well-designed space is to create one that is fully functional from top to bottom. Well-planned traffic patterns play a big role in making that happen. When designing a room, it’s important to keep in mind a few key traffic factors, including:

- **Efficiency.** A major goal in any design is to create an efficient traffic pattern. This means minimizing crisscrossing through major rooms and preventing “traffic jams” between occupants. It also means placing items in rooms in a way that makes sense for the family using the home. For example; having a staircase to bedrooms located near the entry or adding a place to deposit books, outerwear and shoes might be a practical approach to clutter control.

- **Convenience.** Convenience is another important factor in home designs. Take into account everything from how much of the house you have to traverse to bring in groceries to how far guests have to travel to the bathroom.

- **Safety.** There is plenty of room for injury in poorly designed spaces. Walking between the kitchen and garage with hot or sharp objects can be a recipe for disaster. Anticipate potential dangers and bypass them with safer traffic patterns.

**TIME:**
2-60 minute lessons

**MATERIALS NEEDED:**
- Magazine
- Graph paper
- Pencil
- Pictures of furniture
- Ruler
- Foam core or mat board
- Glue
- Computers with internet access

**OBJECTIVES:**
- Develop a furnished plan based on design, traffic flow, and activities
Sample diagram of traffic patterns

Adapted from article posted on April 6, 2012 from https://houseplans.co/articles/custom-home-design-creating-traffic-patterns/. Note: The floor plan shown above is from The Campbell House Plan 2369. https://houseplans.co/articles/custom-home-design-creating-traffic-patterns/

DO:
Activity 1
Make a plan
- Pick a room for which you will be selecting furniture. Draw a scale drawing of the space. Check out this site for step by step instructions on making a scale drawing. (http://www.instructables.com/id/Arrange-Furniture-More-Easily>Create-a-scale-draw/step2/Measure-your-room/)
- Determine the mood or theme you wish to express.
  - Do you want the room to be formal or informal?
  - Do you prefer bright and cheerful spaces or more neutral ones?
  - Do you want the space to reflect your interests or hobbies?
- List needs (functions that must be present) and wants (features you would like to include, but are not necessary) separately.
- Make a list of the activities that will take place in the space. This will help you determine what types of
furnishings are needed.

- Arrange the furniture: Draw dotted lines to represent the traffic pattern when walking in or out and while using the room.
- Make an inventory list of furniture you already have. Create a second list of furnishings you would like to buy.
- Determine your furniture budget. Take a trip to a furniture store and determine prices. This could be a virtual trip as participants can often find pictures and prices online.

Evaluate your space and floorplan then share it with another participant to get a fresh perspective.

**Activity 2**

Consider a room in your home that does not flow well. Create a diagram of the room and use furniture templates to experiment with ways to improve the traffic flow. See example below for ideas of a diagram and furniture templates.
Optional: Create a computer generated design board. Experiment with different styles and pieces of furniture in different patterns and colors for your designated room.

**REFLECT:**
- Did using a diagram of the room help visualize traffic flow? If so, how?
- What changes did/should you make after looking at the diagram?

**APPLY:**
- Think of spaces (personal or public) where efficiency, convenience and safety are not working well. How can they be improved?
- How does effective space planning improve quality of life?
- What types of careers are connected to home environment and interior design?

**REFERENCES:**
- Google Sketch Up: http://sketchup.google.com
- Better Homes & Gardens Furniture Arranger: http://www.bhg.com/decorating/arrange-a-room/
- Chief Architect Software (has demo download): http://www.chiefarchitect.com
- Furniture Templates: http://www.timelytemplates.com/f_arrange_furniture/TTTenglarged202A.htm
- Traffic Patterns: https://houseplans.co/articles/custom-home-design-creating-traffic-patterns/
1. Please read the statement in the left column of the table below. For each item listed below, mark the number in the left column for your level of understanding BEFORE the program; then mark the number in the right column for your level of understanding AFTER the program.

<table>
<thead>
<tr>
<th>LEVEL OF UNDERSTANDING: 1 = Poor, 2 = Average, 3 = Good, 4 = Excellent</th>
<th>BEFORE</th>
<th>AFTER</th>
</tr>
</thead>
<tbody>
<tr>
<td>As a result of participating in the Housing Project lessons and activities...</td>
<td>1 2 3 4</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>I understand that the elements and principles of design are the building blocks used to create a work of art.</td>
<td>o o o o</td>
<td>o o o o</td>
</tr>
<tr>
<td>I understand the difference between primary, secondary and intermediate colors.</td>
<td>o o o o</td>
<td>o o o o</td>
</tr>
<tr>
<td>I understand the relationship between colors on the color wheel.</td>
<td>o o o o</td>
<td>o o o o</td>
</tr>
<tr>
<td>I understand the basic tools needed to complete a paint project.</td>
<td>o o o o</td>
<td>o o o o</td>
</tr>
<tr>
<td>I understand how to design a space beginning with an inspiration piece.</td>
<td>o o o o</td>
<td>o o o o</td>
</tr>
<tr>
<td>I understand basic steps to create an interior design plan.</td>
<td>o o o o</td>
<td>o o o o</td>
</tr>
</tbody>
</table>

2. For each statement below, fill in the bubble that best describes you.

<table>
<thead>
<tr>
<th>INTENTIONS TO ADOPT:</th>
</tr>
</thead>
<tbody>
<tr>
<td>As a result of participating in the Housing Project lessons and activities...</td>
</tr>
<tr>
<td>I will be able to identify elements of design in home interiors, architecture and visual arts.</td>
</tr>
<tr>
<td>I will be able to use principles of design in combination to create a pleasing design.</td>
</tr>
<tr>
<td>I will incorporate principles and elements of design in future projects.</td>
</tr>
<tr>
<td>I will use formulas to estimate the amount of paint or wallpaper to purchase for a project.</td>
</tr>
<tr>
<td>I plan to incorporate different colors into my room designs to invoke certain feelings.</td>
</tr>
<tr>
<td>I plan to use an inspiration piece to assist in choosing colors and patterns in future projects.</td>
</tr>
<tr>
<td>I can use interior traffic patterns to determine placement of appliances and furniture in room design.</td>
</tr>
</tbody>
</table>

3. For each statement below, fill in the bubble that best describes your level of agreement with the following statements.

<table>
<thead>
<tr>
<th>BEHAVIOR CHANGES:</th>
</tr>
</thead>
<tbody>
<tr>
<td>As a result of participating in the Housing Project lessons and activities...</td>
</tr>
<tr>
<td>I am more comfortable working in a team.</td>
</tr>
<tr>
<td>I am more willing to listen to others.</td>
</tr>
<tr>
<td>I am more comfortable speaking with others.</td>
</tr>
<tr>
<td>I am more confident in my abilities as a leader.</td>
</tr>
</tbody>
</table>
3. What is the most significant thing you learned in the Housing project?

Please tell us about yourself.

**Gender:**
- Female
- Male

**I consider myself to be:**
- African American
- Asian American
- Native American
- White
- Other

**I consider myself to be:**
- Hispanic
- Non-Hispanic

**Grade:**
- 3rd
- 4th
- 5th
- 6th
- 7th
- 8th
- 9th
- 10th
- 11th
- 12th

**Most of the time, you live . . .**
- Farm or ranch
- Town less than 10,000
- City between 10,000 - 50,000
- Suburb of city between 50,000
- Central city/urban center with more than 50,000

Please provide any additional comments below.

Thank you!