

# Space Habitation Milky Way Galaxy



## **Students Information:**

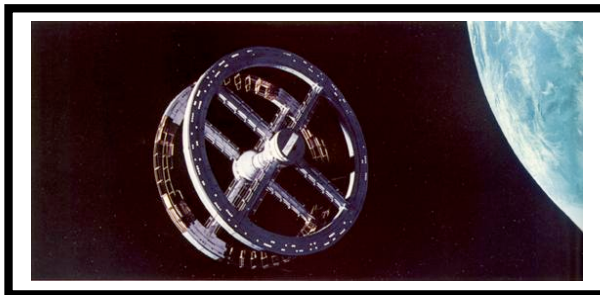
You have reached your final destination! All of your planning and dreams have finally come true as you prepare to step foot on a planet that no human has ever stepped foot on before! But you realize that all the risk, time and effort to reach your destination is only the beginning.

As a Star Fleet Commander, your first responsibility is to build your Space Colony or Space Station.

Your first order of business is to design a model of the space habitat, colony or station. This model must be 14–16 inches across and all areas must be interconnected. Remember that you are out in space – so you cannot just open the door and go outside to another area. Try to incorporate as many mathematical shapes as possible in your design (square, triangle, etc). Remember, the theory is that math is the universal language. If contact with alien beings is made, the shapes in your habitat will serve as a message to them, conveying that we are a civilized and peaceful settlement.

## **Requirements:**

- 3 docking ports
- command area
- living areas (eat, sleep, etc.)
- recreation area
- power generation area



## **Procedure:**

1. Divide Star Fleet Personnel into groups of 2 or 3.
2. Each individual should submit 3 sketches of the habitat. (A top-view will best represent the layout of your design.)
3. Into each design, try to incorporate as many mathematical shapes as possible.
4. Select one space colony or station design.
5. Build the station or colony.
6. Suspend your space station or space colony in space.

continued on following page >



# Space Habitation Milky Way Galaxy

## Suggestions For Materials:

- Paper towel rolls
- Juice bottle
- Aluminum foil
- Popsicle sticks

## Mathematical Shapes for Alien Communication:

- cylinder      hexagon
- octagon      triangle
- pyramin      circle
- Square      pentagon

