

Architectural Design Service Project Detailed Component Descriptions

You will work as a team to complete this project in four parts: (1) Develop a 2D blueprint, (2) Design a 3D model by either building one to scale or using Google SketchUp to generate a computer rendering, (3) Write a proposal in support of your design, and (4) Present your idea to Mobile Loaves and Fishes.

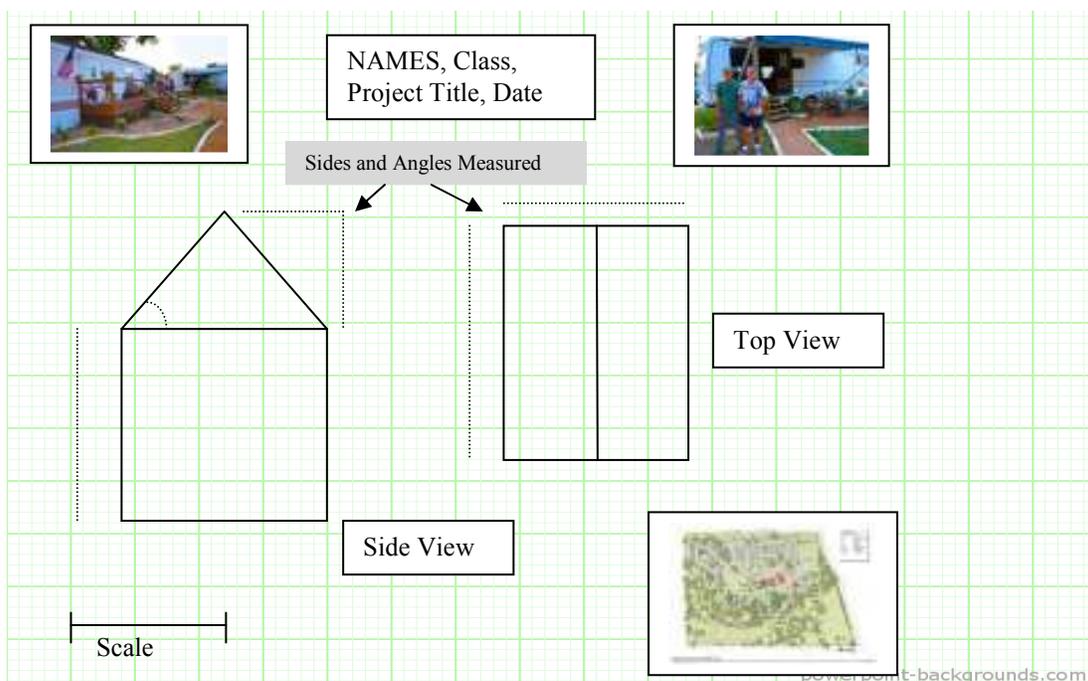
2D Blueprint

A blueprint demonstrates how the gazebo will be constructed. Once you have a vision for what your gazebo will look like, break it down into 2D viewpoints to include on your blueprint. You will need a front view, top view, and at least one side view. The number of side views you will need to include depends on the symmetry of your design. For instance, if your gazebo is going to appear as an octagon from your top view, and each of the side views will be identical, then only one side view is necessary. However, if one particular side has a unique feature then that side will need to be included as well.

You will be given a copy of “blueprints” from the new Rhetoric building at Regents. You should consider this as an example. The copy you will be given is not an official blueprint but it is sufficiently detailed enough that someone can look at it and envision the building as a 3D object. Be sure that everything is drawn to a correct scale as accurately as possible and that everything included in your drawing is properly labeled.

Oversized graph paper will be provided so that your drawing can be visible during your presentation at the conclusion of the project. You may wish to consider attaching your blueprint to a piece of poster board and including a map of the area (provided by MLF) that is marked so that it is clear where your structure will be on the property. You may also wish to include any real life pictures of the site taken from the field trip. This is not a required part of the project but will aid in your ability to cast your vision to MLF in your presentation.

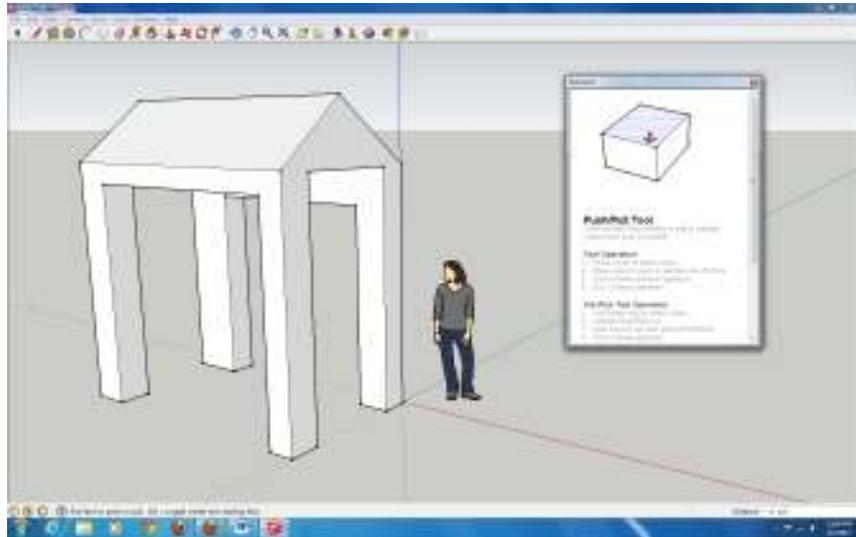
Example:



Design in SketchUp

Once you have determined the details of each perspective of your gazebo in 2D, you are now ready to create a 3D version of your structure. Instead of asking you to draw this by hand, you will be using program called SketchUp. SketchUp is a free 3D computer design program offered through Google. See the additional handout on SketchUp for details on how to install and begin using SketchUp.

You will need to spend time learning SketchUp on your own to utilize it fully. Most of you are technologically savvy enough (and Google is user friendly enough) that you can figure out the basics just by playing around with it. I was able to make this *horrible* example in about 10 minutes:



There are four introductory tutorial videos that you will NEED to watch to be thoroughly successful on this project (45 minutes all in total). These videos take you through the complete construction of a house including furniture, so while the program can do a lot more, the level of proficiency that you'll have after these four videos will be sufficient. You will email me a file for your structure when you turn in your project and you may include images from SketchUp in your written report (see below).

Scale Model

As an alternative to using SketchUp, you can build an actual 3D scale model of your structure. As you walk into the Grammar building at Regents on your left is a scale model of the new construction. This is essentially what you are aiming for: a scaled down version of what your building will actually look like. This also needs to be as detailed as possible including the correct use of scale, colors, and textures. The end goal is to leave nothing to the imagination: your model should look exactly like a miniature version of the real thing. In your final construction you need to include a model human to help make the scaling evident. If you choose this option I strongly encourage you to start on this as early as possible. I have an excellent example from last year's project for you to view so that you can see the standard that will be required. I will warn you up front: for this option you will need artistic/design skills. This is NOT a "craft project" option.

Written Proposal

In the written proposal your goal is to sell your idea to MLF. Convince them of how awesome your idea is. Act as if you are competing against the other groups for a contract. Explain all the advantages of your plan in detail. Questions to consider: How does it meet the needs of MLF? How does it meet the needs of the homeless who utilize it? What is it exactly about your design that makes it useful (how does form translate to function)? Show them (and me) how the geometry has produced a design that is worthwhile for building consideration.

In this report is where you also have the opportunity to provide any research citations for special features. For example, perhaps you want to include a rain water collection system. If you are going to pitch this as part of your design, you will need to do some research and include it in your written proposal. On our field trip Mr. Hebbard mention one such device by name that he would like to see included. I hope you were taking notes.

The tone should be professional and you should include graphics for reference. The proposal should be at least one but no more than three typed pages (including graphics). You need to make your case convincingly, but make it succinctly. Remember that MLF will be reading proposals from all the other groups as well. Be sure you have double checked for any spelling or grammar issues. There is no set format to follow, but remember: professional is the key word (in other words you probably shouldn't include giant pink letters printed on purple paper).

Presentation

Your project will conclude with an oral presentation to Mr. Hebbard, members of his team at MLF, and the architecture students from UT that will be giving you feedback during the course of the project. This is where you can summarize your work and highlight why your design is the one they should go with. All team members must participate in the presentation in an active way. Your blueprint and 3D model should be prominently displayed. Presentations will take place in class so you will have access to a computer, projector, elmo, whiteboard, etc. and you will have the ability to fully show your 3D rendering in SketchUp. The presentation will be no more than 5 minutes long with 5 minutes allowed for questions from MLF and the architects. The presentation should be informative but also creative. It is a sales pitch and MLF will see many of them. Make them remember yours.