**GEOMETRIC MODEL PROJECT**

1. ***Goal***:

Each Group will create a geometric model – a prism or pyramid that would fit a certain object inside. Each group will be assigned a particular 3D object to design and create by their teacher.

The curriculum outcomes that should be met and applied on their project are:

1. Students will be expected to solve problems that involve linear measurement, using SI and imperial units of measure, estimation strategies, and measurement strategies.
2. Students will be expected to apply proportional reasoning to problems that involve

conversions between SI and imperial units of measure.

1. Students will be expected to solve problems, using SI and imperial units that involve the surface area and volume of 3-D objects including right cones, right cylinders, right prisms, right pyramids, and spheres.
2. Each group will submit:
3. Scale Drawing of the model with accurate measurements
4. Math Report
5. Geometric Model
6. The criteria for evaluation will be:
7. Accuracy and Precision of Measurements 25%
8. Math Report ( Calculations on Surface area, Areas, Perimeter, Volume) 25%
9. Blue Print (Drawing) 25%
10. Creativity and Teamwork 25%

|  |  |
| --- | --- |
| **CRITERIA** | **DESCRIPTION** |
| Accuracy and Precision of Measurements | * The measurements of the dimensions of the prototype model are accurate and precise. Appropriate standard of unit is used (SI or Imperial Unit). |
| Math Report | * Provides a table of data of information needed and necessary to calculate areas, surface area, and volume of the model and the object that will be put inside.. * Also provides a sketch of the plan on how to build the model. * List down the materials used and how the model is created. |
| Blue Print | * Shows a scale drawing of the plan to the real model. * Shows all dimensions which are properly labeled. |
| Creativity & Teamwork | * The product outcome shows that the group has exert effort in making their project. * Distribution of the workloads for every member is fair. * Displays creativity and originality on their work product. |

***BE CREATIVE, BE SMART, AND BE HARD WORKERS! HAVE FUN IN MATH!!!***