## THOR'S GEOMETRY SCALE FACTOR PROJECT

**OBJECTIVE** : To enlarge to scale an object which fits in the palm of your hand.

Suggested ideas: remote control, band-aid, tea bags, CD, Q-tips, candy, tape cassette, chips bag, soap, food box, clock, matches, paper clip, etc. (or anything else you can find that is 3-dimensional)

Suggested materials:

cardboard tissue paper foil plastic wrap styrofoam wood

## **REQUIREMENTS** :

- A) Choose an object that will fit in the palm of your hand and get teacher approval.
- B) Choose a ratio for enlargement (between 4 and 20 times the size of the object)
- C) In a four page report, write up the following:
  - Page 1 : Provide a sketch of the original object with its measurements.
    The sketch can be computer drawn, if you know how to do it.
  - **Page 2**: Tell the ratio of enlargement and show/explain the steps involved in calculating the enlarged values.
  - **Page 3** : Provide a sketch of the enlarged object with its new measurements.
  - **Page 4**: Write a results/evaluation section in which you answer all three of the following questions:
    - 1) How much time did you spend on the project?
    - 2) How difficult was it to actually enlarge your object?
    - 3) What are the pros and cons of this project?
- D) Create a model of your object using the enlarged values.
- E) Hand in your report, the original object, and the enlarged model.

**DUE DATES**: (Project will be officially assigned Thursday, January 23rd)

- Tuesday, February 4<sup>th</sup> : Chosen object approved by teacher. Turn in notecard with description of object.
- Tuesday, March 18<sup>th</sup> : Pages 1 4, original object, and enlarged model due.

## \*\*\*2<sup>nd</sup> and 4<sup>th</sup> periods : your due dates are Wednesday, February 5<sup>th</sup> and Wednesday, March 19<sup>th</sup>, respectively.