Class Prep (prepare for Friday, February 2)

- Start assembling your buckyball with your group.

- Try the knots in Question 4 on the Knotting a Strip of Paper handout and think about the content of the question.

Problems (due Friday, February 9 at the beginning of class)

1. We conjectured in class that if $(H, *)$ is a subgroup of a group $(G, *)$, then $a * H = H$ if and only if $a \in H$. Prove this conjecture.

Friday's Celebration of Learning

For this Celebration of Learning, you should be able to

- State and use Euler's formula relating the number of vertices, edges, and regions/faces for a polyhedron or a planar graph to make conclusions about a given polyhedron or planar graph.

- Explain characteristics of a dual of a given polyhedron (e.g., what shape are the faces, how many vertices are there, etc.).

- Determine if a given subset of a specific group $((\mathbb{Z}_n, +)$ or $(\mathbb{Z}_n^*, \cdot))$ is a subset of that group and explain why or why not.

- Find cosets of a given subset of a given group.