Problem of the Day #13 (10 points)

**Frieze Patterns.** Draw the seven distinct frieze patterns one can make from the half-arrow motif

Use ONLY this motif (both shapes should be filled in dark)! Make sure you draw enough of the strip so that I can see the pattern you have made. Make sure each one satisfies ONLY the listed symmetries. Please be careful and complete in your drawings, as both ACCURACY and NEATNESS will count!!

a. Translation ONLY

b. Translation, Horizontal reflection, and Glide reflection ONLY

c. Translation and Vertical reflection ONLY

d. Translation and 180° Rotation ONLY

e. Translation and Glide reflection ONLY

f. Translation, Vertical reflection, 180° Rotation and Glide reflection ONLY

g. Translation, Horizontal reflection, Vertical reflection, 180° Rotation and Glide reflection