Strand: Spatial sense and geometric reasoning
Band: Middle Years
Standard: 3
Year Level: 6

Key Idea
Students analyse and understand the uses and purposes of flips (reflection), slides (translation), rotations and dilations to explore geometric relationships and alternative preferred possibilities in the physical world. [F] [T] [KC1] [KC6]

Outcome
3.12 Analyses the result of a series of flips, slides, rotations and reflections and translations and uses scales to undertake enlargements and reductions of figures and objects. [Id] [In] [KC2]

3.13 Produces, uses and critiques scaled maps and plans and envisages alternative possibilities. [T] [C] [KC1]

Task/Activities
1. Using a simple drawing in a grid, change its size by a ratio of 2:1
   An example is included here, but any picture could be used – clip art, colouring books, students’ own choice.
2. Suggest where else this skill might be used and demonstrate its use in another subject area.

Examples of evidence towards achievement of outcomes
Students:
- Successfully and accurately complete drawing according to instructions.
- Apply knowledge in a different situations eg.:
  - Visual art – enlarging and reducing
  - SOSE – mapping eg map of a bedroom calculating appropriate scale.
  - Technology – cropping, inserting and enlarging pictures.
Example