MA 109: October 4

Transformations: Summary and Review

# Start of Class

## Instructor Information

Name:

Email:

Office Hours:

## Warm-up Questions

# Notes

|  |  |  |
| --- | --- | --- |
|  | **Vertical Transformation** | **Horizontal Transformation** |
| **Shift** | Shift up | Shift left |
| Shift down | Shift right |
| **Scale** | Vertical stretch | Horizontal stretch |
| Vertical compression | Horizontal compression |
| **Reflection** | Vertical reflection | Horizontal reflection |

Chart, line chart

Description automatically generated**Example:** Suppose 𝑓(𝑥) is given in the graph to the right. Draw the graph of 𝑓(2𝑥)+3.

**Example:** Suppose the domain of 𝑓(𝑥) is (−5,1) and its range is (−2,7]. What are the domain and range of 4𝑓(−𝑥)?

# End of Class

Write a summary of what you learned today:

What questions do you have about the material from today?

What do you need to do between now and the next class meeting?