1. Which function matches the graph?

![Graph Image]

- [A] $f(x) = \frac{x + 3}{x + 2}$
- [B] $f(x) = \frac{x + 2}{x + 3}$
- [C] $f(x) = \frac{x + 1}{x + 4}$
- [D] $f(x) = \frac{x + 4}{x + 1}$

2. Identify the type of symmetry (if any) of the graph of the function.

$$g(x) = \frac{x^3}{3x^4 + 1}$$

- [A] $y$-axis symmetry
- [B] origin symmetry
- [C] no symmetry
- [D] $x$-axis symmetry

3. Identify the type of symmetry (if any) of the graph of the function.

$$g(x) = \frac{2x^4}{2x^7 + 1}$$

- [A] origin symmetry
- [B] $x$-axis symmetry
- [C] $y$-axis symmetry
- [D] no symmetry

4. Identify the type of symmetry (if any) of the graph of the function.

$$g(x) = \frac{3x^2}{4x^2 + 1}$$

- [A] origin symmetry
- [B] $x$-axis symmetry
- [C] $y$-axis symmetry
- [D] no symmetry

5. Compare the quantity in Column A with the quantity in Column B.

Rewrite this function in $y = \frac{k}{x-b} + c$ form:

$$y = \frac{3x - 2}{x + 4}$$

- [A] The quantity in Column A is greater.
- [B] The quantity in Column B is greater.
- [C] The two quantities are equal.
- [D] The relationship cannot be determined on the basis of the information supplied.

NAME: ___________________________
[1] A_____
[2] B_____
[3] D_____
[5] B_____