SET A

1. Given that $f(x) = 3x^4 + 2\sqrt{x} - 2$ and $g(x) = 5x^3 - 4$. Write a Java program that estimates the value of $(gof)(x)$ for a given x.

2. Write a Java program to estimate the value of the following equation for a given value x and t.

$$m = \sqrt{\frac{24t - 10t}{\sqrt{xt} + 100} + \left(\frac{3t}{6t^2}\right)^2}$$

3. Write a Java program to display the following asterisks pattern.

```
*
  *
*   *
  *
*
```

SET B

1. Given that $f(x) = 4x^2 + 2\sqrt{x} - 3$ and $g(x) = 7x - 6$. Write a Java program that estimates the value of $(fog)(x)$ for a given x.

2. Write a Java program to estimate the value of the following equation for a given value a, b, c, and d.

$$m = \sqrt{\frac{(a - b)^2}{(c + 4d)^2}} + \sqrt{\sqrt{\frac{a - b}{c + d}}}$$

3. Write a Java program to display the following asterisks pattern.

```
      *
    *  *
*     *
    *
      *
```

SET A

1. Given that $f(x) = 3x^4 + 2\sqrt{x} - 2$ and $g(x) = 5x^3 - 4$. Write a Java program that estimates the value of $(gof)(x)$ for a given x.

2. Write a Java program to estimate the value of the following equation for a given value x and t.

$$m = \sqrt{\frac{24t - 10t}{\sqrt{xt} + 100} + \left(\frac{3t}{6t^2}\right)^2}$$

3. Write a Java program to display the following asterisks pattern.

```
*
  *
*   *
  *
*
```

SET B

4. Given that $f(x) = 4x^2 + 2\sqrt{x} - 3$ and $g(x) = 7x - 6$. Write a Java program that estimates the value of $(fog)(x)$ for a given x.

5. Write a Java program to estimate the value of the following equation for a given value a, b, c, and d.

$$m = \sqrt{\frac{(a - b)^2}{(c + 4d)^2}} + \sqrt{\sqrt{\frac{a - b}{c + d}}}$$

6. Write a Java program to display the following asterisks pattern.

```
      *
    *  *
*     *
    *
      *
```

SET A

1. Given that $f(x) = 3x^4 + 2\sqrt{x} - 2$ and $g(x) = 5x^3 - 4$. Write a Java program that estimates the value of $(gof)(x)$ for a given x.

2. Write a Java program to estimate the value of the following equation for a given value x and t.

$$m = \sqrt{\frac{24t - 10t}{\sqrt{xt} + 100} + \left(\frac{3t}{6t^2}\right)^2}$$

3. Write a Java program to display the following asterisks pattern.

```
*
  *
*   *
  *
*
```

SET B

7. Given that $f(x) = 4x^2 + 2\sqrt{x} - 3$ and $g(x) = 7x - 6$. Write a Java program that estimates the value of $(fog)(x)$ for a given x.

8. Write a Java program to estimate the value of the following equation for a given value a, b, c, and d.

$$m = \sqrt{\frac{(a - b)^2}{(c + 4d)^2}} + \sqrt{\sqrt{\frac{a - b}{c + d}}}$$

9. Write a Java program to display the following asterisks pattern.

```
      *
    *  *
*     *
    *
      *
```