HOMEWORK 6.1

Use interval notation to write the domain for each function. Then graph the function on your calculator. Identify increasing and decreasing intervals.

1. $f\left(x\right)=\frac{5x+3}{x^{2}+8x+7}$
2. $f\left(x\right)=\frac{x-2}{x^{2-4}}$
3. $f\left(x\right)=\sqrt{9-6x}$
4. $f\left(x\right)=\sqrt[3]{5x+4}$
5. $f\left(x\right)=\frac{6x^{2}+2}{\sqrt{x^{2}-8}}$
6. $f\left(x\right)=\frac{\sqrt{9-4x}}{\sqrt{2x-1}}$
7. $f\left(x\right)=\frac{5x+4}{\left|5x+4\right|}$
8. $f\left(x\right)=\sqrt{\frac{8x-4}{x-3}}$
9. $f\left(x\right)= \sqrt[4]{9-x^{2}}$
10. $f\left(x\right)=(9x-2)^{\frac{3}{)2}}$