

Solve the equation by graphing by hand

1.  $|x + 3| = \frac{1}{2}x + 3$

2. a) Graph the piecewise function  
b) State the domain and range  
c) Give any increasing, decreasing or constant intervals

$$f(x) = \left\{ \begin{array}{ll} -3, & -5 \leq x < -2 \\ x + 1 & -2 < x < 2 \\ -x + 2 & 2 \leq x < 5 \end{array} \right\}$$