

2.13

① ①  $x = (y-1)^3 + 2$

$$x-2 = (y-1)^3$$

$$\sqrt[3]{x-2} = y-1$$

$$y = \sqrt[3]{x-2} + 1$$

②  $x = \frac{1}{y+1}$

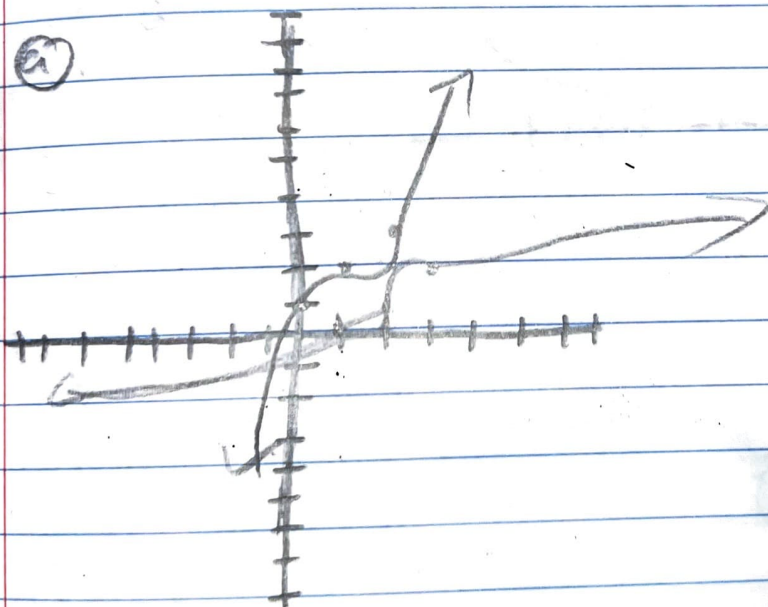
$$x(y+1) = 1$$

$$y+1 = \frac{1}{x}$$

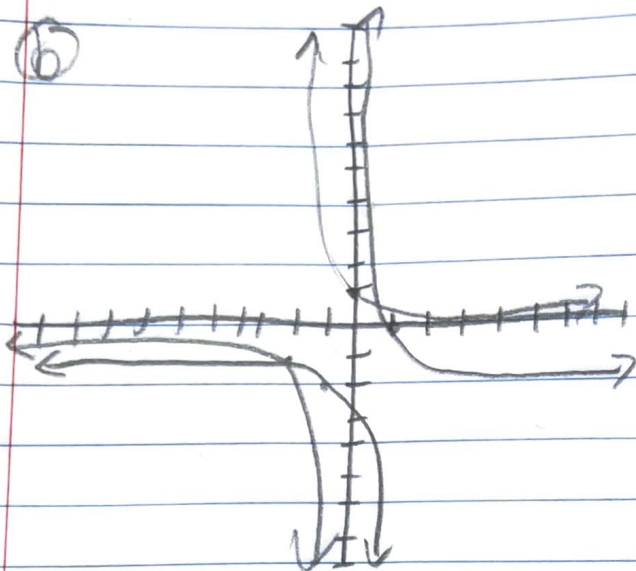
$$y = \frac{1}{x} - 1$$

③  $x = 6y - y^2 \quad \frac{-6 \pm \sqrt{6^2 - 4(-1)(0)}}{2(-1)}$

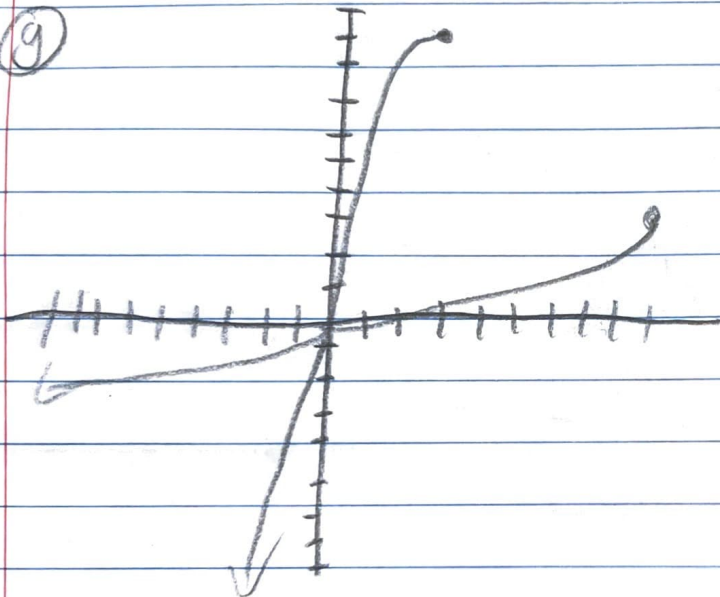
② ②



⑥



⑨



③ a)  $f: \{x | x \in \mathbb{R}\}$   
 $f': \{x | x \in \mathbb{R}\}$

⑥  $f: \{x | x \in \mathbb{R}, x \neq -1\}$   
 $f': \{x | x \in \mathbb{R}, x \neq 0\}$

⑦  $f: \{x | x \leq 3\}$   
 $f': \{x | x \leq 9\}$

(5) (a)  $h(x) = \sqrt[3]{1-x^3}$  ,  $x = \sqrt[3]{1-y^3}$

$$x^3 = 1 - y^3$$

$$y = \sqrt[3]{1-x^3}$$

$h(x)$  and  $h^{-1}(x)$

are the same