

$$6. \quad f(x) = \frac{3-x}{2}$$

$$\begin{aligned} (a) \quad f(x+2) &= \frac{3-(x+2)}{2} \\ &= \frac{3-x-2}{2} \\ &= \frac{1-x}{2} \end{aligned}$$

$$\begin{aligned} (b) \quad f(x-2) &= \frac{3-(x-2)}{2} \\ &= \frac{3-x+2}{2} \\ &= \frac{5-x}{2} \end{aligned}$$

$$\begin{aligned} (c) \quad f(2x) &= \frac{3-2x}{2} \end{aligned}$$

$$\begin{aligned} (d) \quad f\left(\frac{x}{2}\right) &= \frac{3-\frac{x}{2}}{2} \\ &= \frac{6-x}{4} \end{aligned}$$

$$7. \quad h(x) = \frac{x+2}{x-3}$$

$$\begin{aligned} (a) \quad h\left(\frac{1}{x}\right) &= \frac{\left(\frac{1}{x}+2\right)}{\left(\frac{1}{x}-3\right)} \\ &= \frac{1+2x}{1-3x} \end{aligned}$$

$$\begin{aligned} (b) \quad h\left(\frac{x+2}{x-3}\right) &= \dots \\ &= \frac{3x-4}{11-2x} \end{aligned}$$