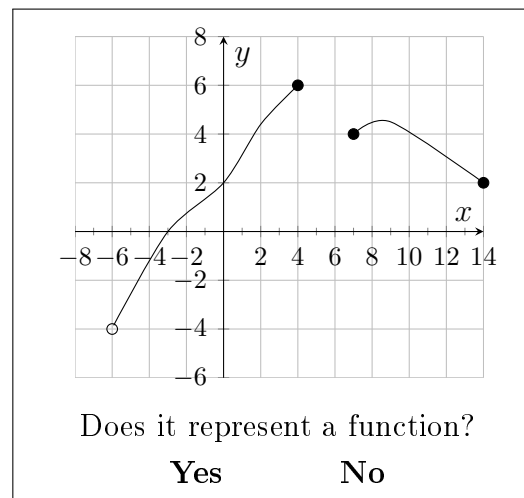
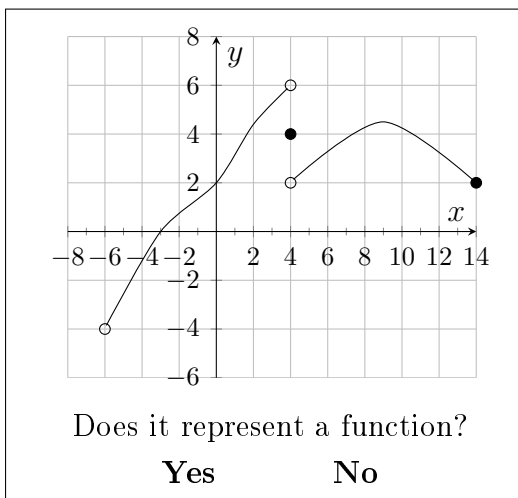
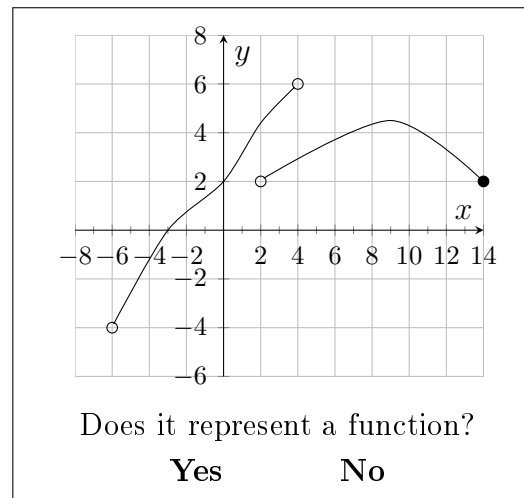
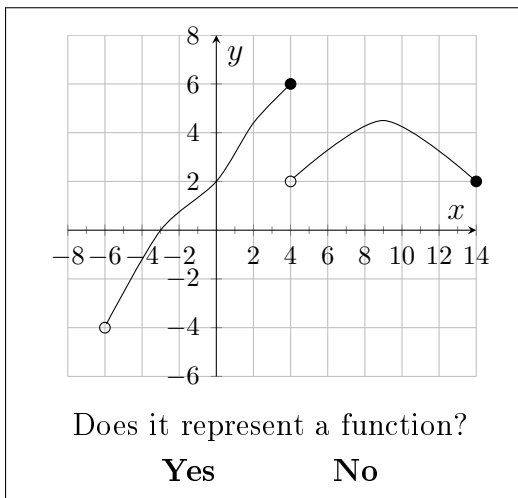
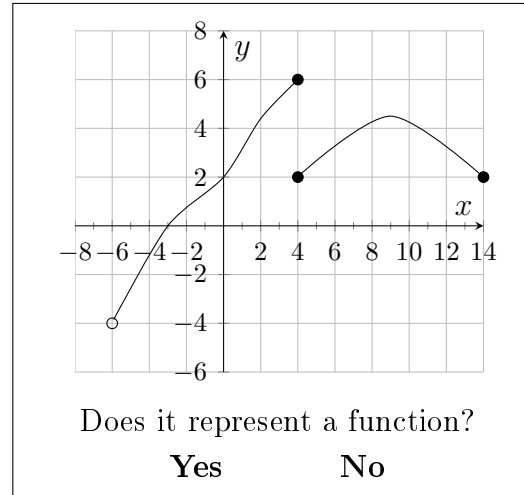
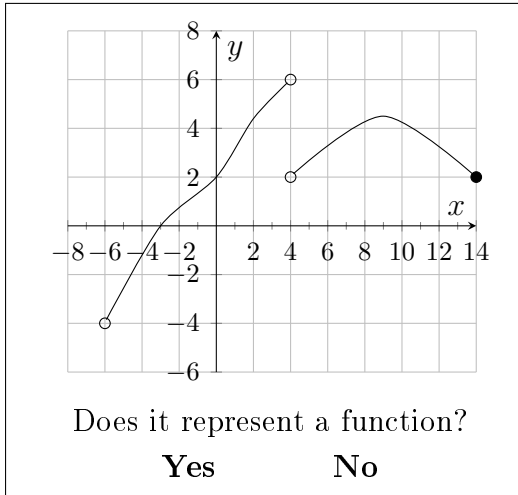


1. (1ea) Determine whether each of the following could represent the graph of a function.



2. (1ea) Use the function $g(x) = \sqrt{64 - x^2}$ to evaluate and simplify the following. Give simplified, exact answers.

(a) $g(0)$

(d) $g(\sqrt{15})$

(b) $g(-3)$

(e) $g(8)$

(c) $g(10)$

(f) $g(5t)$

3. (1ea) The number of games played and the number of homeruns hit by Babe Ruth in each season from 1923 to 1931 are given in the following table.

Y , year	1923	1924	1925	1926	1927	1928	1929	1930	1931
G , games	152	153	98	152	151	154	135	145	145
H , homeruns	41	46	25	47	60	54	46	49	46

Determine whether each of the following relationships could be *functions*.

- a) Could H be a function of Y ? **Yes** **No**
- b) Could Y be a function of H ? **Yes** **No**
- c) Could H be a function of G ? **Yes** **No**

4. (1,2,3) Consider the functions $f(x) = x^2 + 2x$ and $g(t) = 9 - (t + 5)^2$. Determine (and simplify) the following quantities.

(a) $g(7)$

(b) $f(x + 3)$

(c) $f(t - 5) - g(t - 5)$