Practice quiz on Types of Functions

NÚMERO TOTAL DE PONTOS 6

1. Suppose that $A = \{1, 2, 10\}$ and $B = \{4, 8, 40\}$. Which of the following formulae do ***not*** define a function $f : A \to B$? 1 ponto

- (●) $f(1) = 5, f(2) = 8$, and $f(10) = 40$.
- ( ) $f(1) = 4, f(2) = 4$, and $f(10) = 4$.
- ( ) $f(1) = 4, f(2) = 40$, and $f(10) = 8$.
- ( ) $f(a) = 4a$, for each $a \in A$

2. Suppose that A contains every person in the VBS study (see the second video in the course if you're confused here!). Suppose that $Y = \{+, -\}$ and $Z = \{H, S\}$ 1 ponto

Suppose that $T : A \to Y$ is the function which gives $T(a) = +$ if person a tests positive and $T(a) = -$ if they test negative.

Suppose that $D : A \to Z$ is the function which gives $D(a) = H$ does not actually have VBS and $D(a) = S$ if the person actually has VBS.

Which of the following must be true of person a if we have a false positive?

- ( ) $T(a) = -$ and $D(a) = S$
- (●) $T(a) = -$ and $D(a) = H$
- ( ) $T(a) = +$ and $D(a) = S$
- ( ) $T(a) = +$ and $D(a) = H$

3. Consider the function $g : \mathrm{R} \to \mathrm{R}$ defined by $g(x) = x^2 - 1$. Which of the following points are *not* on the graph of g? 1 ponto

- (●) $(2, -1)$

- $(1, 0)$
- $(-1, 0)$
- $(0, -1)$

4. Let the point $A = (2, 4)$. Which of the following graphs does *not* contain the point A? 1 ponto

- The graph of $f(x) = 2x$
- The graph of $s(x) = x^2$
- **The graph of $h(x) = x - 1$**
- The graph of $g(x) = x + 2$

5. Suppose that $h(x) = -3x + 4$. Which of the following statements is true? 1 ponto

- h is neither a strictly increasing function nor a strictly decreasing function.
- h is a strictly increasing function
- **h is a strictly decreasing function**
- All statements are correct

6. Suppose that $f : \mathrm{R} \to \mathrm{R}$ is a strictly increasing function, with $f(3) = 15$ 1 ponto

Which of the following is a possible value for $f(3.7)$?

- -3
- 3
- 14.7
- **17**

Eu compreendo que enviar um trabalho que não seja meu pode resultar em fracasso permanente deste curso ou desativação de minha conta do Coursera

curso ou desativação de minha conta do Coursera.

Saiba mais sobre o Código de Honra do Coursera

Cinthya Langue Blois