## MATH 13X Written Assignment 01

Your Name (email@uwaterloo.ca) September 9, 2020

## Question 1.

Determine if the following statements are true or false. No justification is required.

- (a)  $\forall x \in \mathbb{Z}, \exists y \in \mathbb{Z}, x^2 \leq y^4$  (Your answer here)
- (b)  $\exists y \in \mathbb{Z}, \forall x \in \mathbb{Z}, x^2 \leq y^4$  (Your answer here)
- (c)  $\forall y \in \mathbb{Z}, \exists x \in \mathbb{Z}, x^2 \leq y^4$  (Your answer here)

## Question 2.

- (a) (Answer)
- (b) (Answer)
- (c) (Answer)