

Assignment 1

Name :

Student ID :

Describe all processes in detail. (풀이 과정을 모두 적으세요. 다만 제출시 감점 처리합니다)

1. Determine if the following nested quantified expression is true or false? Explain why? Domain of discourse is $\mathbb{R} \times \mathbb{R}$ (0.3 points)

A. $\forall x \exists y (x + y = 0)$

B. $\exists x \forall y (x + y = 0)$
2. Write a pseudocode that determines $\exists x \forall y P(x, y)$ is true or false (0.3 points)

Please find the answers for the exercises in the textbook of Discrete Math. 8th edition. (each 0.15 points)

3. 1.4 Exercises (0.45 points)

#5, #16, #21
4. 1.5 Exercises (0.45 points)

#2, #49, #78
5. 1.6 Exercises (0.3 points)

#36 #56
6. 2.2 Exercises (0.3 points)

#1, #8
7. 2.3 Exercises (0.15 points)

#3

8. 2.4 Exercises (0.15 points)

#2,

9. 3.3 Exercises (0.3 points)

#28, #31

10.3.4 Exercises (0.3 points)

#8, #22