

COMP 3610 Tutorial 11

26 October, 2023

Exercise 1

Use the Owicki Gries method to prove

$$\begin{array}{c} \{x == 0\} \\ x := x + 1 \parallel x := x + 2 \\ \{x == 3\} \end{array}$$

Exercise 2

Use Owicki-Gries method to prove Peterson's algorithm to be correct (Slide 445).

Exercise 3

How would the proof change if we would use RG to prove Peterson's protocol; what would be the relies and guarantees for a single process.