COMP4108 Final Exam Practice

William Findlay

December 13, 2019

Contents

List of Figures

List of Tables

List of Listings

1 Preamble

1.1 Textbook

- here is a link to "Tools and Jewels"

1.2 General

1. Please follow the provided format
2. We should prioritize the mock exam over notes

Part I

Mock Exam

1 Basic Concepts and Principles

1. Provide definitions for the following:

   a) Confidentiality

   b) Data integrity

   c) Authentication

   d) Authorization

   e) Availability

   f) Accountability

2. Briefly explain how repudiation violates accountability.

3. Describe the difference between a *trusted* and *trustworthy* actor.

4. Compare and contrast *privacy*, *protection*, and *anonymity*.

5. Come up with a simple example of a security policy for a house and describe a way it might be violated.

6. Label each number in Figure 1.1 using the following terms:
   a) target asset
   b) vulnerability
   c) attacker
   d) attack vector
   e) threat agent

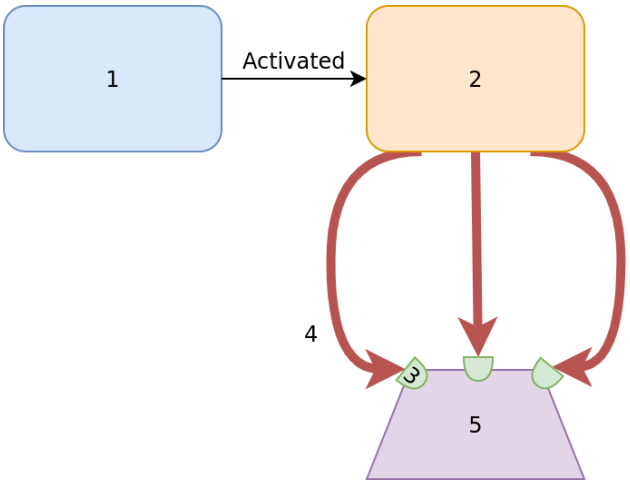

Figure 1.1

7. Draw a state machine diagram of a system's transition from a secure state to either a secure state or an insecure state.

8. Compare and contrast quantitative and qualitative risk assessment. Consider the advantages and disadvantages of each, as well as how each might work in theory/practice.

Qualitative	**Quantitative**

Part II

Notes