**CSCI 361 Homework 2**

**ACM Software Engineering Code of Ethics Writing Assignment**

**Fall 2019**

Find an example of when a programmer (or computer scientist or IT specialist) has been portrayed in popular culture, for example in a movie or television series. Write a structured 5-paragraph essay reflecting on how the character was or was not a *professional* according to ACM/IEEE Code of Ethics and Professional Conduct (<https://ethics.acm.org/code-of-ethics/software-engineering-code/>).

* Each paragraph should be between 100 and 200 words
* **Paragraph 1**: introduce your example and explain how the character is related to computer science or IT
* **Paragraphs 2-4**: in each paragraph choose one of the ACM Code principles (for example, PRODUCT) and explain how the character did or did not uphold this particular principle
* **Paragraph 5**: explain why you would or would not want to be associated with the character you chose to analyze

Do not use the example of *Jurassic Park* since that was discussed in lecture.

*Please submit your work by the due date of October 28, 2019.*

This essay analyzes the character of the movie Sneakers 1992, Martin Brice according to the ACM/IEEE Code of Ethics and Professional Conduct. Martin is a white hacker as well as head of small team who does penetration testing for companies. He works as a white hacker until a criminal organization blackmails him with a crime he did in his student years and got away with. Organization requires him to get them a new decrypter machine that can break any cryptosystem (likely RSA public cryptosystem). He is related to the computer science field since he helps companies to improve their software security against intruders who wish to get customers sensitive data such as bank cards. His work includes fields as cryptography, analyze of a software system and how it works in a real-world application.

First ACM Code principles is Profession. Even though Martin and his team are capable of hacking the software system of companies and get lots of money illegally, they decided to stay professional in their field and work for the better good. He did not promote his interest as getting more money and even after he breaks a company system, he does not take any money from the company despite the fact that the company cannot know that. After he breaks the security system, he reports authorities about vulnerabilities and the ways there can be fixed/removed. Nevertheless, in the face of blackmailing, he decides to work in his interest in order to avoid prison which contradicts the Profession principle.

Second ACM Code principles is Judgment. After Martin's team get access to the company's system, they do not abuse their power, they do not look to other parts of the system except ones they have told to evaluate. In the evaluation of the software system, they are independent in their professional judgment and tells vulnerabilities without concerning about its business logic or price to fix/removement. As a student, Martin and his friend hacked conservatives funds to distribute it to liberals which can be considered as improper financial practice, but as Martin gets older he realizes that it is not right stops involving in illegals activities.

Third ACM Code principles is Public. In one period of the movie, Martin and his team get hands on the ultimate decoder/decrypter which gives access to any software system, such as any private bank accounts, states security/military/power system. They had a machine that can do great damage to the software system of the world, especially if given to criminals. Moreover, they themselves could become criminals earning money, power, nonetheless decides to work in the interest of the public. Even at the end of the movie, Martin does not give microcontroller of the machine without which it is useless to the government organization in fear/concern that the government could use it to spy on people, other states as well as promoting their ideas despite the interest of the public.

I would not mind being associated with movie character as Martin, however, I do not see myself as a hacker in the future, because I do not find sitting and thinking ways to hack software system appealing and I think I do not have a temperament of a hacker. I prefer creating new applications and ways to improve them. Nevertheless, I think the profession of hacker is admirable because there are lots of ways to hack systems and involves creativity, as well as hackers, need to learn new information continuously since security systems get improved every day.