1. Using the alternate list of fundamental principles (p. 428 of the text) analyze the ethical issues involved in the scenario below and answer the question at the end. Be sure to state clearly the principles you are using.

You have recently been promoted to become a manager of a software engineering group in a large company. You receive a directive from the company’s vice president to submit a budget request for your group for the next fiscal year. In the directive, the vice president specifically indicates that you should only ask for the amount of money your group will really need. Having never done this before, you consult another more experienced manager, Joe, for advice. Joe tells you to figure out what you will really need to complete the projects your group will be doing and then add an additional 15%. He explains that every year the upper-level management ends up cutting the submitted budgets by 10 to 15 percent. So if you do not add the extra amount on your initial request, your group will not be able to hire all the staff you will need and everyone in the group will be super stressed trying to meet deadlines and other project requirements. You express concerns to Joe that you could be asked to justify your budget request. Joe tells you that upper management has never done that before and that, if they did, you could probably make up some numbers that would look feasible. He also indicates that the other group managers in the company also often pad their group’s budget requests for the same reason.

What would you do and why?

Disclose information that others ought to know. The vice president should know what is going on in the lower levels of the company and that other managers are fudging the numbers to prevent defunding. Under this principal we can safely make an accurate budget without risk of going overboard and if the company has to make changes to their budgets then let them.

(20 pts) 2. Describe two technologies the evolution of which affects or has affected social changes in

• commerce

• job loss and/or creation

• economics

Automated cars and

Explain how the evolution of the technologies affected these three things. (Note: All three social issues must be discussed between the two selected technologies.)

(20 pts) 3. Describe the five principal rights of the owner of a copyright and give an example of how and when ‘fair use’ may be applied to legally

* The right to reproduce the copyrighted work
* The right to distribute copies of the work to the public
* The right to display copies of the work to the public.
* The right to perform the work in public
* The right to produce new works derived from the copyrighted work.

• copy software

It really depends on the context or nature of why you are copying the software and how much of it is being copied.

• copy a TV program

As long as you are not distributing the copied TV program to other people and keep it for yourself then you are not harming the market for the copyrighted work and is legal.

• copy a song

(20 pts) 4. Both copyrights and patents have been used to provide intellectual protection to software.

A. Provide at least three differences between using copyrights and patents to protect software.

B. Describe two concerns of critics of software patents

(20 pts) 5. Discuss the social impact of computing with respect to the following:

• digital divide

• transformation of work

• impact on race, class and gender Your discussion should include actual examples. (20 pts) \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_