Example of questions with short answer

1. Comment on this interface in terms of its affordance, visibility, mapping and constraint, and when appropriate, redesign for a better affordance, visibility, mapping and constraint and provide your justifications of why the new design is better in those aspects.

   Figure 1: An interface of a movie player

![Figure 1: An interface of a movie player](image)

2. As described in class in the example of the arrow in Fedex symbol (see Figure 2), once you provide the information about of a hidden (but otherwise salient) feature, the feature is hard to miss even by novice observer/user. Describe, sketch when appropriate, how you translate this piece of knowledge into the design of a user interface.

   Figure 2: the arrow in Fedex symbol

![Figure 2: the arrow in Fedex symbol](image)

An example of questions with long answer

3. The following scenario was developed as a part of the requirement gathering for an automatic check-out terminal at McHenry library. Please develop based on this scenario:
   a. A hierarchical task diagram to represent the tasks that this terminal has to have
   b. A storyboard of the interface, indicating how the interface conforms to the usability principles of recoverability and synthesizability.
   c. A use case, with Saul as the author, for checking out books (assuming Saul has already successfully logged in to the system) – with one extension
Saul is returning 3 books (2 which are overdue) and is going to borrow 8 more books. Joan (not real name), the librarian, starts checking out his holdings. She notices that he has reached the max level of $10 fine (he actually owes $11 in fine). She tells Saul about the fine, and he pays only $7 as that’s all that he has with him. After 7 books, she notices that Saul is maxed out on the allowable books. Saul asks if he can check the rest out on his son’s account as he happens to have his son’s library card with him. She says yes and checks out the last one. Saul then asks if he can renew any books that are almost overdue (in the next week or so). 3 of them are, and Joan renews them for six months because he is a Faculty member.

Glossary:
• Affordance: the properties that things have and how these relate to how the things could be used
• Constraint: restricting what is irrelevant
• Mapping: the set of possible relations between objects
• Recoverability: allow users to recover from their errors
• Synthesizability: allow users to know what had happened by looking at the current state of the system
• Visibility: make things visually observable