

Topic: Use Cases

Problem: Based on what you learned about use cases, generate a use case and use case diagram that walks through one of the primary tasks the user must perform to use your chosen system.

Pointers/Tips:

- The use case should possess the following attributes:
 - A primary actor (typically the end user)
 - Secondary actors (if any)
 - A summary of the purpose of the use case
 - The primary goal of the use case (e.g., withdraw cash from external account)
 - Any pre-conditions or assumptions that are true before your use case begins (e.g., ATM is powered on, there are no faults, there is cash in the vault, and a connection exists to an external banking network)
 - The primary course of events: a step-by-step walkthrough of how the end user and your system interact to accomplish the goal of the use case. Typically, these will range from 10-20 steps. Focus is primarily applied to this section of the use case.
 - Alternative paths (if any) that describe other ways some of the primary course of events is carried out. (e.g., instead of requesting a receipt be printed, the user simply waits until the ATM timer provides a receipt)
 - Exception paths (if any) that describe what could go wrong during any of the primary course events, and the steps taken to bring the system back to the primary course of events (e.g., ATM loses power, loses connection, or does not have enough cash in the vault to match the amount requested)
 - Extension paths (if any) that inherit steps from another external use case (e.g., “Validate User Credentials” use case would be used during the “Withdraw Cash”, “Deposit Checks or Cash” and “Check Balance” use cases)
- Try your best not to force or assume solutions into your use case. (e.g., instead of “user provides ATM card and PIN”, I would instead say, “user provides credentials and authorization to account access”)
- Each step can be stated from the system’s perspective but typical use cases focus on the user’s experience (UIX) and so are told from the perspective of the user.
- I have included a user case for Withdraw Cash for the ATM here. This was created in a tool called Case Complete. See next page.

Submit to support@learnse.com if you’d like me to check it and provide feedback.

UC-3	Withdraw Cash	P1
Parent: Provide ATM Services		
Primary Actors: Customer, Bank		Supporting Actors: Bank
Brief Description/Goal The <u>Customer</u> Withdraws cash from their Checking_Account or Savings_Account .		
Preconditions: Customer has an active Checking_Account or Savings_Account .		Success Guarantee: Customer receives desired cash and Receipt.
Flow of Events Main Success Scenario:		
<ol style="list-style-type: none"> 1. The <u>Customer</u> performs Initialize Transaction (UC-1-1). 2. The <u>Customer</u> interacts with the ATM, choosing Withdrawl. 3. The ATM prompts the <u>Customer</u> to choose from Checking_Account or Savings_Account. 4. The <u>Customer</u> interacts with the ATM, choosing either Checking_Account or Savings_Account. 5. The ATM prompts the <u>Customer</u> to choose if they want a Receipt. 6. The <u>Customer</u> interacts with the ATM, choosing to receive a Receipt or not to receive a Receipt. 7. The ATM prompts the <u>Customer</u> to enter the desired amount withdrawn. 8. The <u>Customer</u> interacts with the ATM, entering the desired Withdrawl amount. 9. The ATM requests the desired Withdrawl amount from the <u>Customer's Bank</u>. 10. The <u>Customer's Bank</u> responds to the ATM, with permission to provide cash to the <u>Customer</u> from the ATM. 11. The <u>Customer's Bank</u> provides Account_Balance data for the ATM to print on a Receipt. 12. The ATM provides the exact amount of cash requested. 13. The <u>Customer</u> takes the provided cash. 14. The ATM performs Finalize Transaction (UC-1-3). 		

