

## Use Case 1 Buy Stocks over the Web

**Primary Actor:** Purchaser

**Scope:** Personal Advisors / Finance package (PAF)

**Level:** User goal

**Stakeholders and Interests:**

Purchaser—wants to buy stocks and get them added to the PAF portfolio automatically.

Stock agency—wants full purchase information.

**Precondition:** User already has PAF open.

**Minimal Guarantee:** Sufficient logging information will exist so that PAF can detect that something went wrong and ask the user to provide details.

**Success Guarantee:** Remote web site has acknowledged the purchase; the logs and the user's portfolio are updated.

**Main Success Scenario:**

1. Purchaser selects to buy stocks over the web.
2. PAF gets name of web site to use (E\*Trade, Schwab, etc.) from user.
3. PAF opens web connection to the site, retaining control.
4. Purchaser browses and buys stock from the web site.
5. PAF intercepts responses from the web site and updates the purchaser's portfolio.
6. PAF shows the user the new portfolio standing.

**Extensions:**

- 2a. Purchaser wants a web site PAF does not support:
  - 2a1. System gets new suggestion from purchaser, with option to cancel use case.
- 3a. Web failure of any sort during setup:
  - 3a1. System reports failure to purchaser with advice, backs up to previous step.
  - 3a2. Purchaser either backs out of this use case or tries again.
- 4a. Computer crashes or is switched off during purchase transaction:
  - 4a1. (What do we do here?)
- 4b. Web site does not acknowledge purchase, but puts it on delay:
  - 4b1. PAF logs the delay, sets a timer to ask the purchaser about the outcome.
- 5a. Web site does not return the needed information from the purchase:
  - 5a1. PAF logs the lack of information, has the purchaser update questioned purchase.

## Use Case 2 Get Paid for Car Accident

**Primary Actor:** Claimant

**Scope:** Insurance company (“MyInsCo”)

**Level:** Summary

**Stakeholders and Interests:**

Claimant—to get paid the most possible.

MyInsCo—to pay the smallest appropriate amount.

Department of Insurance—to see that all guidelines are followed.

**Precondition:** None.

**Minimal Guarantees:** MyInsCo logs the claim and all activities.

**Success Guarantees:** Claimant and MyInsCo agree on amount to be paid; claimant gets paid that.

**Trigger:** Claimant submits a claim.

**Main Success Scenario:**

1. Claimant submits claim with substantiating data.
2. Insurance company verifies claimant owns a valid policy.
3. Insurance company assigns agent to examine case.
4. Insurance company verifies all details are within policy guidelines.
5. Insurance company pays claimant and closes file.

**Extensions:**

1a. Submitted data is incomplete:

1a1. Insurance company requests missing information.

1a2. Claimant supplies missing information.

2a. Claimant does not own a valid policy:

2a1. Insurance company denies claim, notifies claimant, records all this, terminates proceedings.

3a. No agents are available at this time.

3a1. (What does the insurance company do here?)

4a. Accident violates basic policy guidelines:

4a1. Insurance company denies claim, notifies claimant, records all this, terminates proceedings.

4b. Accident violates some minor policy guidelines:

4b1. Insurance company begins negotiation with claimant as to amount of payment to be made.

## Use Case 4 Buy Something (Casual Version)

The Requestor initiates a request and sends it to her or his Approver. The Approver checks that there is money in the budget, checks the price of the goods, completes the request for submission, and sends it to the Buyer. The Buyer checks the contents of storage, finding the best vendor for goods. The Authorizer validates Approver's signature. The Buyer completes request for ordering, initiates PO with Vendor. The Vendor delivers goods to Receiving, gets receipt for delivery (out of scope of system under design). The Receiver registers delivery, sends goods to Requestor. The Requestor marks request delivered.

At any time prior to receiving goods, the Requestor can change or cancel the request. Canceling it removes it from any active processing (deletes it from system?). Reducing the price leaves it intact in processing. Raising the price sends it back to the Approver.

## Use Case 5 Buy Something (Fully Dressed Version)

**Primary Actor:** Requestor

**Goal in Context:** Requestor buys something through the system, gets it. Does not include paying for it

**Scope:** Business—the overall purchasing mechanism, electronic and nonelectronic, as seen by the people in the company

**Level:** Summary

**Stakeholders and Interests:**

Requestor: Wants what he/she ordered, easy way to do that.

Company: Wants to control spending but allow needed purchases.

Vendor: Wants to get paid for any goods delivered.

**Precondition:** none

**Minimal Guarantees:** Every order sent out has been approved by a valid authorizer. Order was tracked so that company can be billed only for valid goods received.

**Success Guarantees:** Requestor has goods, correct budget ready to be debited.

**Trigger:** Requestor decides to buy something.

**Main Success Scenario:**

1. *Requestor:* initiate a request.
2. *Approver:* check money in budget, check price of goods, complete request for submission.

3. *Buyer*: check contents of storage, find best vendor for goods.
4. *Authorizer*: validate Approver's signature.
5. *Buyer*: complete request for ordering, initiate PO with Vendor.
6. *Vendor*: deliver goods to Receiving, get receipt for delivery (out of scope of system under design).
7. *Receiver*: register delivery; send goods to Requestor.
8. *Requestor*: mark request delivered.

#### **Extensions:**

- 1a. Requestor does not know vendor or price: Leave those parts blank and continue.
- 1b. At any time prior to receiving goods, Requestor can change or cancel request:
  - Canceling it removes it from active processing (Delete from system?).
  - Reducing price leaves it intact in processing.
  - Raising price sends it back to Approver.
- 2a. Approver does not know vendor or price: Leave blank and let Buyer fill in or callback.
- 2b. Approver is not Requestor's manager: Still OK as long as Approver signs.
- 2c. Approver declines: Send back to Requestor for change or deletion.
- 3a. Buyer finds goods in storage: Send those up, reduce request by that amount, and carry on.
- 3b. Buyer fills in Vendor and price, which were missing: Request gets resent to Approver.
- 4a. Authorizer declines Approver: Send back to Requestor and remove from active processing. (What does this mean?)
- 5a. Request involves multiple Vendors: Buyer generates multiple POs.
- 5b. Buyer merges multiple requests: Same process, but mark PO with the requests being merged.
- 6a. Vendor does not deliver on time: System does alert of non-delivery.
- 7a. Partial delivery: Receiver marks partial delivery on PO and continues.
- 7b. Partial delivery of multiple-request PO: Receiver assigns quantities to requests and continues.
- 8a. Goods are incorrect or improper quality: Requestor refuses delivered goods. (What does this mean?)
- 8b. Requestor has quit the company: Buyer checks with Requestor's manager: either reassign Requestor or return goods and cancel request.

**Technology and Data Variations List:** None.

**Priority:** Various

**Releases:** Several

**Response Time:** Various

**Frequency of Use:** 3/day

**Channel to Primary Actor:** Internet browser, mail system, or equivalent

**Secondary Actors:** Vendor

**Channels to Secondary Actors:** Fax, phone, car

**Open Issues:**

- When is a canceled request deleted from the system?
- What authorization is needed to cancel a request?
- Who can alter a request's contents?
- What change history must be maintained on requests?
- What happens when Requestor refuses delivered goods?
- How does a requisition work differently from an order?
- How does ordering reference and make use of the internal storage?

**Usage Narrative: Getting "Fast Cash"**

Mary, taking her two daughters to the day care center on the way to work, drives up to the ATM, runs her card across the card reader, enters her PIN code, selects FAST CASH, and enters \$35 as the amount. The ATM issues a \$20 and three \$5 bills, plus a receipt showing her account balance after the \$35 is debited. The ATM resets its screens after each transaction with FAST CASH, so Mary can drive away and not worry that the next driver will have access to her account. Mary likes FAST CASH because it avoids the many questions that slow down the interaction. She comes to this particular ATM because it issues \$5 bills, which she uses to pay the day care provider, and she doesn't have to get out of her car to use it.

**Table 3.3.** *Sample Use Case Briefs*

<b>Actor</b>	<b>Goal</b>	<b>Brief</b>
Production Staff	Modify the administrative area lattice	Production staff adds administrative area metadata (administrative hierarchy, currency, language code, street types, etc.) to the reference database. Contact information for source data is cataloged. This is a special case of updating reference data.
Production Staff	Prepare digital cartographic source data	Production staffs convert external digital data to a standard format and validate and correct it in preparation for merging with an operational database. The data is cataloged and stored in a digital source library.
Production and Field Staff	Commit update transactions of a shared check-out to an operational database	Staff applies accumulated update transactions to an operational database. Nonconflicting transactions are committed to the operational database. The application context is synchronized with the operational database. Committed transactions are cleared from the application context, leaving the operational database consistent, with conflicting transactions available for manual/interactive resolution.

**Table 3.1.** *A Sample In/Out List*

<b>Topic</b>	<b>In</b>	<b>Out</b>
Invoicing in any form		Out
Producing reports about requests (e.g., by vendor, by part, by person)	In	
Merging requests into one PO	In	
Partial deliveries, late deliveries, wrong deliveries	In	
All new system services, software	In	
Any nonsoftware parts of the system		Out
Identification of any preexisting software that can be used	In	
Requisitions	In	

**Table 3.2.** *A Sample Actor-Goal List*

<b>Actor</b>	<b>Task-level Goal</b>	<b>Priority</b>
Any	Check on requests	1
Authorizer	Change authorizations	2
Buyer	Change vendor contacts	3
Requestor	Initiate a request	1
	Change a request	1
	Cancel a request	4
	Mark request delivered	4
	Refuse delivered goods	4
Approver	Complete request for submission	2
Buyer	Complete request for ordering	1
	Initiate PO with vendor	1
	Alert of nondelivery	4
Authorizer	Validate Approver's signature	3
Receiver	Register delivery	1