

TP Activity Diagram

System:

A university library provides an online system which allows students borrow books by digitalizing. Students can search for books, request to borrow them, and return borrowed books. The system will automatically checks book availability or not, borrowing limits and overdue status. Librarians manage books and approve special borrowing requests.

First Task:

Draw an Activity Diagram for the Borrow book process.

Second Task:

- Student:
 - logs into the system
 - selects a book
 - clicks “Request Borrow”
 - checks book availability
- System:
 - check borrowing limit (you can set condition base what you think how much or there is setting for system to set up the limitation of borrowing)
 - checks overdue status (if student have the overdue, so normally we can't allow him/her to borrow the book)
 - processes borrow request
 - updates book status
 - displays confirmation message

Third Task:

Include decision nodes with guard conditions for:

- Book availability
- Borrowing limit
- Overdue status

Forth Task:

Add an alternative flow where a librarian approves or rejects a special borrow requests.