

CS 631 004: DATABASE MANAGEMENT SYSTEM DESIGN

Library Management System (Deliverable 3) USER GUIDE

Group No: 2

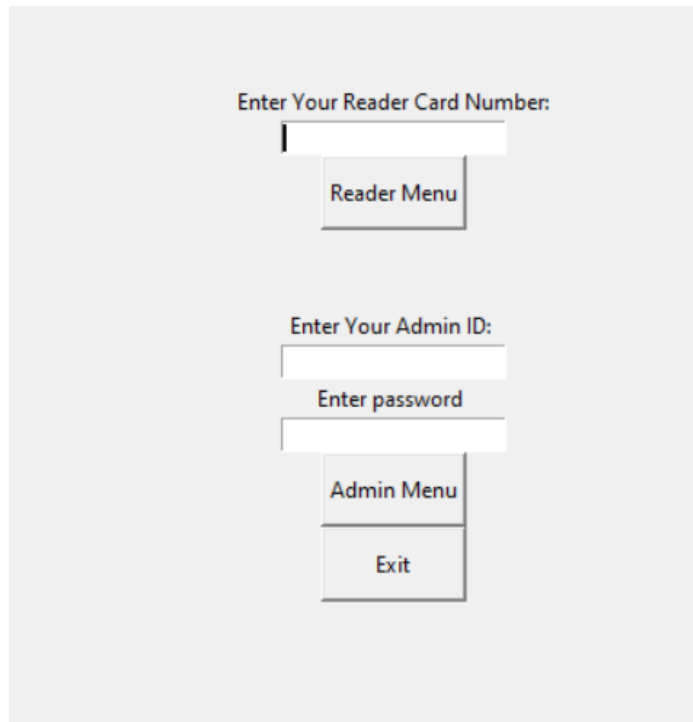
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USER GUIDE:

Main Menu: This is the first page of the project. It is the menu page. This page allows the user to log in as a Reader or an Admin.

The reader needs to enter their Card Number to enter the reader functions.

Admin needs to enter the admin id and their respective password to successfully log in.



The image shows a software interface for a 'Main Menu'. It features two distinct login paths. The first path is for a 'Reader', requiring the user to 'Enter Your Reader Card Number:' into a text box, followed by a 'Reader Menu' button. The second path is for an 'Admin', requiring the user to 'Enter Your Admin ID:' into a text box, then 'Enter password' into another text box, followed by an 'Admin Menu' button. At the bottom of these options is an 'Exit' button. The entire interface is centered on a light gray background.

Fig 1: MAIN MENU

Reader Function Menu:

This is the Reader menu where we can access the functions that a reader can perform.

- Search Document- Reader can search the document by its ID, Title, or Publisher name.
- A reader can Checkout, Return, or Reserve the document by entering its DocID, BID, CopyNO, and ReadID.
- Check status: A reader can also check the status of the document by entering their ReaderID.

The screenshot displays a Tkinter window titled "tk" with a light gray background. The interface is organized into several sections separated by horizontal lines. The first section, titled "##### Document Search #####", contains three input fields labeled "Enter DOCID/Publisher:", "Enter Title", and "Search Document". The second section, titled "##### Document Checkout, Return and Reservation #####", contains four input fields labeled "Enter DOCID", "Enter BranchID", "Enter CopyNo", and "Enter ReadID", followed by three buttons labeled "Checkout", "Return", and "Reserve". The third section, titled "##### Check Status #####", contains one input field labeled "Enter Reader ID" and a button labeled "Get Details". The fourth section, titled "##### Publisher Details #####", contains one input field labeled "Publish Name" and a button labeled "Get Details". On the left side of the window, there is a button labeled "Exit". At the bottom of the window, a list of tuples is displayed: (1, 1, 1, 'Available'), (1, 1, 1, 'Not Available'), (1, 3, 1, 'Available'), and (1, 3, 1, 'Not Available').

```
##### Document Search #####
Enter DOCID/Publisher:
Enter Title
Search Document

##### Document Checkout, Return and Reservation #####
Enter DOCID
Enter BranchID
Enter CopyNo
Enter ReadID
Checkout
Return
Reserve

##### Check Status #####
Enter Reader ID
Get Details

##### Publisher Details #####
Publish Name
Get Details

(1, 1, 1, 'Available')
(1, 1, 1, 'Not Available')
(1, 3, 1, 'Available')
(1, 3, 1, 'Not Available')
```

Fig 2: READER MENU

Admin Functions Menu: This is the Admin menu where we can access the functions that an Administrator can perform.

- Add Document- Admin can add the document by entering the Title, Publish date, and the Published ID.
- Fetch Top N Books- We can fetch the Top N number of books from the database.
- Average Fine- We can calculate the Average fine for each branch by simply entering the Start Date and End Date.
- Add a Reader- The admin can add a new reader by adding the Reader Type, Reader Name, Reader Address, and Phone Number.

The figure displays two windows of a Tkinter application titled "ADMIN MENU".

The left window, titled "tk", contains the main menu with the following sections:

- ##### Add a Document Copy #####**
 - Enter Title:
 - Enter Published Date in (YYYY-MM-DD) Format Only:
 - Enter Published ID:
 - Add Document:
- ##### Get top N borrowed Books #####**
 - Enter N:
 - Fetch:
- ##### Average Fines from Each Branch #####**
 - Enter Start Date (YYYY-MM-DD format only):
 - Enter End Date (YYYY-MM-DD format only):
 - Calculate:
- ##### ADD READER #####**
 - ADD reader:
- Exit:

The bottom of the left window shows the output of the "Fetch" operation:

```
(1, 'To Kill a Mockingbird', 4)
(2, 'Harry Potter and the Philosophers Stone', 2)
(4, 'The Great Gatsby', 1)
(3, 'The Lord of the Rings', 1)
```

The right window, titled "tk", shows the "Add a Reader Details" form:

- ##### Add a Reader Details #####**
 - Reader Type:
 - Reader Name:
 - Reader Address:
 - Reader Phone number:
 - Add Document:
- Inserted:
- Exit:

Fig 3: ADMIN MENU