Scenario 1: Borrowing a Book in the Library

Consider the following process for handling borrowing a book in the Library.

A reader should be registered by a library secretary to borrow a book. The reader should provide personal details, contact information and a valid document to a secretary who creates an account for the reader. The registered reader can access the library database and search for books using their credentials.

A borrowing request is created when a reader wants to borrow a book. The Library allows two options to borrow a book: (i) take a book from the shelf and bring it right to the desk for the librarian to check out, or (ii) order a book online to pick up from a self-checkout machine.

If a reader creates a booking request online, the following process occurs. The created request has a type of "Online". If the requested book is available, a librarian is notified about the request. Then the librarian prepares the book for checkout, and delivers it to the self-checkout machine, notifying a reader about the request status change to "Ready to pick up". Additionally, the reader is informed about the deadlines for the book return. After, a reader can pick up a book in the machine that will result in changing the status of the order to "Checked out" and the status of the book — to "Borrowed".

If a reader prefers to conduct checkout with the help of a librarian, they should provide the document, and the librarian should create a booking request. The created request has a type of "On-site". Once the librarian has filled in the book and reader details, the notification about the deadlines for the book return is sent to the reader, the status of the order is set to "Checked out" and the status of the book — to "Borrowed".

A reader should use a self-checkout machine to return a book, signing in with his credentials. Once a book is inside the machine, the booking request changes the status to "Closed" and the book's status to "Returned". Once a day, a librarian retrieves returned books from the machine to place them in the storage room and changes the status of a book to "Available".

场景一: 在图书馆借书

考虑以下在图书馆处理借书的流程。

读者借书需经图书馆秘书登记。读者应向为读者创建帐户的秘书提供个人详细信息、联系信息和有效文件。注册读者可以使用其凭据访问图书馆数据库并搜索书籍。

当读者想要借书时,就会创建借阅请求。图书馆提供两种借书方式:(i)从书架上取出一本书,然后将其带到办公桌上供图书管理员借阅,或(ii)在线订购一本书,然后从自助借还机上取书。

如果读者在线创建预订请求,则会发生以下过程。创建的请求的类型为"在线"。如果请求的书籍可用,图书馆员会收到有关该请求的通知。然后,图书馆员准备借书,并将其交付到自助借书机,通知读者请求状态更改为"准备取书"。此外,读者还被告知还书的截止日期。之后,读者可以在机器中拿起一本书,这将导致订单状态更改为"已借出",并将书籍状态更改为"已借"。

如果读者希望在图书馆员的帮助下进行结账,则应提供该文件,图书馆员应创建预订请求。创建的请求的类型为"现场"。图书管理员填写完图书和读者详细信息后,有关还书截止日期的通知将发送给读者,订单状态将设置为"已借出",图书状态将设置为"已借"。

读者应该使用自助结账机还书,并使用他的凭据登录。一旦书籍进入机器,预订请求就会将状态更改为"已关闭",并将书籍的状态更改为"已退回"。图书管理员每天一次从机器中检索归还的书籍,将它们放入储藏室,并将书籍的状态更改为"可用"。