**Use Case “Return a bike”**

1. **Use case code**

UC0010

1. **Brief Description**

This use case describes the interactions between User and EBR software when User wishes to return a bike.

1. **Actors**
   1. **User**
   2. **EBR software**
2. **Preconditions**

**4.1 User rented a bike**

1. **Basic Flow of Events**

Step 1. The User requests to return a bike

Step 2. The User enters the barcode

Step 3. EBR software checks the barcode

Step 4. EBR software converts barcode to rental code

Step 5. EBR software closes the user’s renting session

Step 6. EBR software Summarizes session information, calculates rental fee, calculates excess money and notifies to User

Step 7. User confirms information

Step 8. EBR software calls Use case “Refund deposit after deducting rental fee”

Step 9. EBR software saves and prints bill for user

1. **Alternative flows**

*Table 1 - Alternative flow of events for UC “Name of the Use Case”*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| No | Location | Condition | Action | Resume location |
| 1 | At step 3 | Invalid barcode | Notifies wrong barcode | Step 2 |
| 2 | At step 8 | Transaction fail | Notifies transaction fail | End use case |

1. **Input data**

*Table 2 - Input data of …*

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| No | Data fields | Description | Mandatory | Valid condition | Example |
| 1 | Barcode | Bike’s barcode | Yes | String | 1231abc212 |

1. **Output data**

*Table 3 - Output data of …*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| No | Data fields | Description | Display format | Example |
| 1 | End time | Ending time of the User’s renting session | hh : mm  DD/MM/YY | 12:20  10/10/2020 |
| 2 | Usage time |  | . A number of minutes usage | 120 |
| 3 | Renting fee |  | . Comma for thousands separator  . Positive integer  . Right alignment | 123,000 |
| 4 | Refund deposit | deposit after deducting rental fee | . Comma for thousands separator  . Positive integer  . Right alignment | 100,000 |

1. **Postconditions**