# Use Case “Rent bike”

## Use case code

UC001

## Brief Description

This use case describes the interactions between the EcoBikeRental software with the customer and Interbank when the customer desires to rent a bike.

## Actors

* 1. **Customer**
  2. **InterBank**

## Preconditions

* Customer has found the location of station on map of software.
* Station have available bike for rent.

## Basic Flow of Events

1. The customer scan code on lock of bike.
2. The EcoBikeRental software verify code and display information of that bike
3. The customer request want to rent a bike.
4. The EcoBikeRental software ask customer choose one payment method.
5. The customer chooe one payment method.
6. The EcoBikeRental software ask customer to pay a deposit equal 40% price.
7. The customer confirm transaction.
8. The EcoBikeRental software call use case pay deposit.
9. The EcoBikeRental software save transaction and unlock bike.

## Alternative flows

*Table 1 - Alternative flows of events for UC Rent bike.*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **No** | **Location** | **Condition** | **Action** | **Resume location** |
| 1. | At Step 2 | If the code on lock is invalid | * The AIMS software notifies that the code is invalid | At Step 1 |
| 2. | At Step 5 | If the customer has just one payment method | * The AIMS software skip step 5 | At Step 6 |
| 3. | At Step 8 | If the customer cancel the transaction | * The AIMS software warning that transaction will be canceled | End usecase |
| 4. | At Step 9 | If process pay deposit has error or the balance is not enough | * The AIMS software notifies: The transaction has been fail because some error payment or the balance is not enough | End usecase |

## Input data

*Table 2 - Input data of code*

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **No** | **Data fields** | **Descrip tion** | **Mandatory** | **Valid condition** | **Example** |
| 1. | Code on lock |  | Yes | It is same code with code in database | barcode |

## Output data

*Table 3 -Output data of bike information*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **No** | **Data fields** | **Description** | **Display format** | **Example** |
| 1 | license plates | The code use to identify th bike | String and Number | BK 9321 |
| 2. | Bike type | Show type of bike | String | * Nomal single bike * Nomal double bike * Electric Bike |
| 3. | Remaining Battery | Show capability of bike can active (only show with electric bike) | Number with % sign | 20% |
| 4. | Operation date | The date bike start operating | Date String | 20/10/2020 |
| 5. | Bike brand name | Name brand of bike | String | * Thong nhat * Giant |
| 6. | Bike model code | Name of model code in brand | String and Number | * TN34 * GT243 |

## Postcondition

* The lock of bike is open
* The customer’s account is automatically deducted 40% of the price.