

Started on	Monday, 1 July 2024, 3:03 PM
State	Finished
Completed on	Monday, 1 July 2024, 3:06 PM
Time taken	2 mins 40 secs
Grade	10.00 out of 10.00 (100%)

Question 1

Correct

Mark 3.00 out of 3.00

Suppose you are writing a python web client to access an API of an online supermarket. Given below are the API details.

Base URL= <http://host1.open.uom.lk:8080>

Method	API Endpoint	Description
GET	/api/products/	Get all products
GET	/api/products/X/	Get product with product ID X
POST	/api/products/	Enter new product entry into the API server
PUT	/api/products/	Update an existing product record

Write a python program to create a new product with the following information in JSON format. Print the response code of the request.

```
{
    "productName": "Araliya Basmathi Rice",
    "description": "White Basmathi Rice imported from Pakistan. High-quality rice with extra fragrance. Organically grown.",
    "category": "Rice",
    "brand": "CIC",
    "expiredDate": "2023.05.04",
    "manufacturedDate": "2022.02.20",
    "batchNumber": 324567,
    "unitPrice": 1020,
    "quantity": 200,
    "createdDate": "2022.02.24"
}
```

Answer: (penalty regime: 0 %)

```
1 import requests
2 import json
3
4 BASE_URL = "http://host1.open.uom.lk:8080"
5 ENDPOINT = "/api/products/"
6
7 # Product data in JSON format
8 product_data = {
9     "productName": "Araliya Basmathi Rice",
10    "description": "White Basmathi Rice imported from Pakistan. High-quality rice with extra fragra
11    "category": "Rice",
12    "brand": "CIC",
13    "expiredDate": "2023.05.04",
14    "manufacturedDate": "2023.02.20",
15    "batchNumber": "324567",
16    "unitPrice": 1020,
17    "quantity": 200,
18    "createdDate": "2022.02.24"
19 }
20
21 try:
22     # Send POST request to create new product
23     headers = {'Content-Type': 'application/json'}
```

Passed all tests! ✓

Correct

Marks for this submission: 3.00/3.00.

Question 2

Correct

Mark 3.00 out of 3.00

Suppose you are writing a python web client to access an API of an online supermarket. Given below are the API details.

Base URL= <http://host1.open.uom.lk:8080>

Method	API Endpoint	Description
GET	/api/products/	Get all products
GET	/api/products/X/	Get product with product ID X
POST	/api/products/	Enter new product entry into the API server
PUT	/api/products/	Update an existing product record

Write a python program to retrieve all the products from the API Server and print the **total number** of products currently stored in the server.

Hint: the json response will be of the following example format:

```
{
  "message": "success",
  "data": [
    {
      "id": 85,
      "productName": "Araliya Basmathi Rice",
      "description": "White Basmathi Rice imported from Pakistan. High-quality rice with extra fragrance. Organically grown.",
      "category": "Rice",
      "brand": "CIC",
      "expiredDate": "2023.05.04",
      "manufacturedDate": "2022.02.20",
      "batchNumber": 324567,
      "unitPrice": 1020,
      "quantity": 200,
      "createdDate": "2022.02.24"
    },
    {
      "id": 86,
      "productName": "Araliya Basmathi Rice",
      "description": "White Basmathi Rice imported from Pakistan. High-quality rice with extra fragrance. Organically grown.",
      "category": "Rice",
      "brand": "CIC",
      "expiredDate": "2023.05.04",
      "manufacturedDate": "2022.02.20",
      "batchNumber": 324567,
      "unitPrice": 1020,
      "quantity": 200,
      "createdDate": "2022.02.24"
    }
  ]
}
```

```
    },  
    ...  
    ...  
}
```

Answer: (penalty regime: 0 %)

```
1 import requests  
2  
3 BASE_URL = "http://host1.open.uom.lk:8080"  
4 ENDPOINT = "/api/products/"  
5  
6 try:  
7     # Send GET request to retrieve all products  
8     response = requests.get(BASE_URL + ENDPOINT)  
9  
10    # Raise an exception for bad status codes  
11    response.raise_for_status()  
12  
13    # Parse the JSON response  
14    data = response.json()  
15  
16    # Get the list of products from the 'data' key  
17    products = data.get('data', [])  
18  
19    # Print the total number of products  
20    print(len(products))  
21  
22 except requests.exceptions.RequestException as e:  
23     print("An error occurred:", e)
```

Passed all tests! ✓

Correct

Marks for this submission: 3.00/3.00.

Question 3

Correct

Mark 4.00 out of 4.00

Suppose you are writing a python web client to access an API of an online supermarket. Given below are the API details.

Base URL= <http://host1.open.uom.lk:8080>

Method	API Endpoint	Description
GET	/api/products/	Get all products
GET	/api/products/X/	Get product with product ID X
POST	/api/products/	Enter new product entry into the API server
PUT	/api/products/	Update an existing product record

The following product has been entered into the API server by you in the previous question. However, it has been noted that the entered product's brand should be changed to "Araliya" instead of "CIC". Write a python program to update the entry on the API server as required. Print the JSON response of the request.

```
{
    "productName": "Araliya Basmathi Rice",
    "description": "White Basmathi Rice imported from Pakistan. High-quality rice with extra fragrance. Organically grown.",
    "category": "Rice",
    "brand": "CIC",
    "expiredDate": "2023.05.04",
    "manufacturedDate": "2022.02.20",
    "batchNumber": 324567,
    "unitPrice": 1020,
    "quantity": 200,
    "createdDate": "2022.02.24"
}
```

Answer: (penalty regime: 0 %)

```
1 import requests
2 import json
3
4 BASE_URL = "http://host1.open.uom.lk:8080"
5 ENDPOINT = "/api/products/"
6
7 # Updated product data
8 product_data = {
9     "productName": "Araliya Basmathi Rice",
10    "description": "White Basmathi Rice imported from Pakistan. High-quality rice with extra fragra
11    "category": "Rice",
12    "brand": "Araliya", # Updated brand
13    "expiredDate": "2023.05.04",
14    "manufacturedDate": "2022.02.20",
15    "batchNumber": 324567,
16    "unitPrice": 1020,
17    "quantity": 200,
18    "createdDate": "2022.02.24"
19 }
20
21 try:
22     # Send PUT request to update the product
23     headers = {'Content-Type': 'application/json'}
```

Passed all tests! ✓

Correct

Marks for this submission: 4.00/4.00.

GET IN TOUCH

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