

```
In [ ]: # Located in C:\Users\Owner\GitHub\Python_Data_Vis_course\Exercise_Files\4 Matplotlib
```

```
In [72]: import json
with open('./json_dictionary_source-data_academind2.json') as access_json:
    read_content = json.load(access_json)
```

```
In [73]: read_content
```

```
Out[73]: {'results': [{'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user',
      'display_name': 'Maximilian SchwarzmueLLer'}}]},
  {'_class': 'question',
    'course': {'_class': 'course',
      'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
      'url': '/the-complete-guide-to-angular-2/'},
    'replies': [{'_class': 'answer',
      'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
      {'_class': 'answer',
        'user': {'_class': 'user', 'display_name': 'Daniel Weat'}}]},
  {'_class': 'question',
    'course': {'_class': 'course',
      'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
      'url': '/the-complete-guide-to-angular-2/'},
    'replies': [{'_class': 'answer',
      'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
      {'_class': 'answer',
        'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}},
      {'_class': 'answer',
        'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}},
      {'_class': 'answer',
        'user': {'_class': 'user',
          'display_name': 'Maximilian SchwarzmueLLer'}}]},
  {'_class': 'question',
    'course': {'_class': 'course',
      'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
      'url': '/the-complete-guide-to-angular-2/'},
    'replies': [{'_class': 'answer',
      'user': {'_class': 'user',
        'display_name': 'Maximilian SchwarzmueLLer'}}]},
  {'_class': 'question',
    'course': {'_class': 'course',
      'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
      'url': '/the-complete-guide-to-angular-2/'},
    'replies': [{'_class': 'answer',
      'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
      {'_class': 'answer',
        'user': {'_class': 'user', 'display_name': 'Bernd Raucher'}},
      {'_class': 'answer',
        'user': {'_class': 'user',
          'display_name': 'Maximilian SchwarzmueLLer'}}]}]}
```

```
In [74]: type(read_content)
```

```
Out[74]: dict
```

```
In [75]: with open('./json_dictionary_source-data_academind2.json') as access_json2:
    read_content2 = json.load(access_json2)
```

```
In [76]: type(read_content2)
```

```
Out[76]: dict
```

```
In [77]: read_content2
```

```
Out[77]: {'results': [{'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user',
      'display_name': 'Maximilian SchwarzmueLLer'}}]},
 {'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Daniel Weat'}}]},
 {'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}},
    {'_class': 'answer',
    'user': {'_class': 'user',
      'display_name': 'Maximilian SchwarzmueLLer'}}]},
 {'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user',
      'display_name': 'Maximilian SchwarzmueLLer'}}]},
 {'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Bernd Raucher'}},
    {'_class': 'answer',
    'user': {'_class': 'user',
      'display_name': 'Maximilian SchwarzmueLLer'}}]}]}
```

```
In [95]: question_access = read_content2['results']
```

```
In [96]: type(question_access)
```

```
Out[96]: list
```

In [97]: question\_access

```
Out[97]: [{'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]},
{'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Daniel Weat'}}]},
{'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]},
{'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]},
{'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Bernd Raucher'}},
    {'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]}]
```

In [98]: question\_access[0]

```
Out[98]: {'_class': 'question',
  'course': {'_class': 'course',
    'title': 'Angular 7 (formerly Angular 2) - The Complete Guide',
    'url': '/the-complete-guide-to-angular-2/'},
  'replies': [{'_class': 'answer',
    'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]}
```

```
In [99]: for question_data in question_access:
        print(question_data)
```

```
{'_class': 'question', 'course': {'_class': 'course', 'title': 'Angular 7 (formerly Angular 2) - The Complete Guide', 'url': '/the-complete-guide-to-angular-2/'}, 'replies': [{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]}
{'_class': 'question', 'course': {'_class': 'course', 'title': 'Angular 7 (formerly Angular 2) - The Complete Guide', 'url': '/the-complete-guide-to-angular-2/'}, 'replies': [{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}, {'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Daniel Weat'}}]}
{'_class': 'question', 'course': {'_class': 'course', 'title': 'Angular 7 (formerly Angular 2) - The Complete Guide', 'url': '/the-complete-guide-to-angular-2/'}, 'replies': [{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}, {'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}}, {'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Mike Jauranol'}}, {'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]}
{'_class': 'question', 'course': {'_class': 'course', 'title': 'Angular 7 (formerly Angular 2) - The Complete Guide', 'url': '/the-complete-guide-to-angular-2/'}, 'replies': [{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]}
{'_class': 'question', 'course': {'_class': 'course', 'title': 'Angular 7 (formerly Angular 2) - The Complete Guide', 'url': '/the-complete-guide-to-angular-2/'}, 'replies': [{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}, {'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Bernd Raucher'}}, {'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]}
```

```
In [100]: type(question_data)
```

```
Out[100]: dict
```

```
In [101]: replies_access = question_data['replies']
```

```
In [102]: replies_access
```

```
Out[102]: [{'_class': 'answer',
            'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}},
            {'_class': 'answer',
            'user': {'_class': 'user', 'display_name': 'Bernd Raucher'}},
            {'_class': 'answer',
            'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}]
```

```
In [103]: type(replies_access)
```

```
Out[103]: list
```

```
In [104]: for replies_data in replies_access:
        print(replies_data)
```

```
{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}
{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Bernd Raucher'}}
{'_class': 'answer', 'user': {'_class': 'user', 'display_name': 'Maximilian SchwarzmueLLer'}}
```

```
In [105]: user_name = replies_data['user']['display_name']
```

```
In [106]: user_name # this is only giving you the last result
```

```
Out[106]: 'Maximilian SchwarzmueLLer'
```

```
In [107]: def get_user_names():
           question_access = read_content['results']
           for question_data in question_access:
               replies_access = question_data['replies']
               for replies_data in replies_access:
                   user_name = replies_data['user']['display_name']
               # print(user_name)
           save_data.append(user_name)
```

```
In [108]: save_data = []
```

```
In [109]: get_user_names()
```

```
In [110]: save_data
```

```
Out[110]: ['Maximilian Schwarzmüller',
           'Maximilian Schwarzmüller',
           'Daniel Weat',
           'Maximilian Schwarzmüller',
           'Mike Jauranol',
           'Mike Jauranol',
           'Maximilian Schwarzmüller',
           'Maximilian Schwarzmüller',
           'Maximilian Schwarzmüller',
           'Bernd Raucher',
           'Maximilian Schwarzmüller']
```

```
In [111]: with open ('user_names_new.json', 'w') as namefile:
           json.dump(save_data, namefile)
```

```
In [ ]:
```