

Express.js
CRUD
Get

C

Create

R

Read

U

Update

D

Delete

READ

- Firstly we are going to see how we can **read** something and return it to user when requested!
- Initially we are going to see how we can read data from json files before moving to databases
- We are going to use a **get request**
- **Get request method** : specifies that we are trying to **get** some kind of resource that lives on a server

READ

- Any information that we can think of may be used as a **resource**.
 - A resource can be a list of users, a document or picture, etc.

```
app.get('/', (req, res) => {  
  res.send('Hello World!')  
})  
//remember, app is an instance of express
```

- Lets see an example where we read a number of landmarks from a json file

READ

The **res.json()** method sends a JSON response

- sends a **response** (with the correct content-type) that is the parameter converted to a JSON string using the `JSON.stringify()` method

Syntax:

- `res.json([body])`
- **body parameter:** is the body which is to be sent in the response.
- **Return Value:** It returns an Object.

Get

```
crud > JS app.js > app.get('/api/v1/landmarks') callback
9
10
11 //before sending data we need to read it, we do this outside the route
12 //in the top level code that is executed once
13 //${__dirname}= where current script is located
14 var landmarks = fs.readFileSync(`${__dirname}/dev-data/data/landmarks.json`)
15
16 //convert json to javascript object
17 landmarks = JSON.parse(landmarks);
18
19 //handle get requests app.get('/api/v1/landmarks'..
20 //I am specifying the url with version->good practice in some cases
21 //(req,res)=>{} this funtion is called the route handler
22
23 app.get('/api/v1/landmarks', (req,res)=>{
24     res.status(200).json({
25         status:"success",
26         results: landmarks.length,
27         data:{
28             landmarks
29         }
30     });
31 })
32
33
34 //start a server
35 app.listen(8080, () => {
36     console.log('Yeah I run');
37 });
```

http method



url

} form a json
we wish to
send back as a response

app.js

Get

```
"status": "success",
"results": 10,
"data": {
  "landmarks": [
    {
      "id": 0,
      "type": "landmark",
      "name": "Acropolis",
      "description": "The Acropolis is the strongest and most important monument of Ancient Greek civilization. The main building, Parthenon was dedicated to Athena Parthenos, the patron Goddess of the city and was completed in 432 BC. Unique in its beauty, like all ancient monuments is has suffered destruction and theft, but thankfully just under the hill where the monument stands in, there is the Acropolis Museum providing all the missing pieces of information needed for someone to understand its significance and all the stories it has played a role in throughout the years",
      "ratingsAverage": 4.9,
      "ratingsQuantity": 97,
      "imageCover": "acropolis_cover.jpg",
      "images": [
        ""
      ]
    },
    {
      "id": 1,
      "type": "landmark",
      "name": "Hadrian's Arch",
      "description": "Before starting the climb to get the Parthenon, it is impossible to miss a monument as impressive as Hadrian's Arch. Constructed in 131 AD by the Roman Emperor, it was created to form an entrance for the new city and separate it from the old one. From the side of the monument that faces the Acropolis one can see the inscription "This is Athens, the former city of Theseus" while on the other side "This is the city of Hadrian and not of Theseus.",
      "ratingsAverage": 4.2
```

To be continued...