# Restaurant Suggestion and Management Application.

- Document provided had a lot of typos in url and field names, so i fixed that to have uniform fields. (like: restaurant had a lot of typos). Due to this the request payload in documnet will not work unless typos are not fixed there too. I have provided fixed payload in this document below.
- I am using a Embedded H2 database that is setup using provided schema.sql and data.sql files on application startup.
- This is a maven project.
- DataBase code is added. Used Spring Data JPA.
- Unit tests added

## 1) add new restaurants.(Done)

POST <a href="http://localhost:8080/api/v1/restaurants">http://localhost:8080/api/v1/restaurants</a>

Request Body:

```
{
    "restaurant_name": "RestaurantC",
    "restaurant_cusines": [
        "cusineX",
        "cusineY"
    ],
    "restaurant_chefs": [
        {
            "chef_name": "chefG",
            "chef_salary": 4000,
            "chef_cusines": [
                "cusineX",
                "cusineR"
            ]
        },
            "chef_name": "chefH",
            "chef_salary": 2000,
            "chef_cusines": [
                "cusineY",
                "cusineZ"
        }
    "restaurant_rating": 6,
    "restaurant_city": "brampton",
    "restaurant_province": "ON"
}
```

Response :

Valid Request Status code : 201

```
{
    "restaurant_id": 3,
    "create_date": "2021-04-30T05:39:31.6745509"
}
```

#### Incase of Invalid Request body (fields are null/empty/not present)

Status code: 400

```
{
    "error": "Bad Request",
    "code": "com.restaurantservice.request.body.invalid",
    "message": "Validation error in request body",
    "details": [
       {
            "error": "restaurant_name",
            "message": "must not be blank"
        },
        {
            "error": "restaurant_rating",
            "message": "must be less than or equal to 10"
        },
            "error": "restaurant_city",
            "message": "must not be blank"
   ]
}
```

#### **Incase of Internal Server Error**

Status code : 500

# 2)update details in existing restaurants.(Done)

PUT <a href="http://localhost:8080/api/v1/restaurants/3">http://localhost:8080/api/v1/restaurants/3</a>

Request Body:

```
{
    "restaurant_name": "RestaurantC",
    "restaurant_cusines": [
        "cusineY"
],
    "restaurant_chefs": [

        {
             "chef_name": "chefH",
             "chef_salary": 2000,
             "chef_cusines": [
                  "cusineY",
                  "cusineZ"
```

```
}

],

"restaurant_rating": 4,

"restaurant_city": "missi",

"restaurant_province": "ON"
}
```

#### Response:

Valid Request Status code : 200

```
{
    "restaurant_id": 3,
    "update_date": "2021-04-30T05:39:31.6745509"
}
```

#### Incase of Invalid Request body (fields are null/empty/not present)

Status code: 400

```
"error": "Bad Request",
    "code": "com.restaurantservice.request.body.invalid",
    "message": "Validation error in request body",
    "details": [
        {
            "error": "restaurant_name",
            "message": "must not be blank"
       },
            "error": "restaurant_rating",
            "message": "must be less than or equal to 10"
        },
            "error": "restaurant_city",
            "message": "must not be blank"
        }
    ]
}
```

#### **Incase of Internal Server Error**

Status code : 500

Incase of  $restaurant\_id$  not found in database

Status code : 404

```
{
  "error": "Not Found",
  "code": "com.restaurantservice.entity.notfound",
  "message": "Restaurant with id : 4 doesn't exist.",
```

```
"details": []
}
```

# 3) Delete existing restaurants.(Done)

DELETE <a href="http://localhost:8080/api/v1/restaurants/3">http://localhost:8080/api/v1/restaurants/3</a>

Response:

Valid Request Status code : 200

```
{
    "restaurant_id": 3,
    "delete_date": "2021-04-30T05:39:31.6745509"
}
```

**Incase of Internal Server Error** 

Status code : 500

Incase of restaurant\_id not found in database

Status code: 404

```
"error": "Not Found",
   "code": "com.restaurantservice.entity.notfound",
   "message": "Restaurant with id : 4 doesn't exist.",
   "details": []
}
```

- 4) Search restaurant based on restarunt\_name ,
  restarunt\_id, restarunt\_city,
  restarunt\_province,restarunt\_rating , restarunt\_cusines
  available (Done)
- 1. GET <a href="http://localhost:8080/api/v1/restaurants/1">http://localhost:8080/api/v1/restaurants/1</a>
- 2. GET http://localhost:8080/api/v1/restaurants?restaurant\_name=RestaurantB
- 3. GET <a href="http://localhost:8080/api/v1/restaurants?restaurant\_city=brampton">http://localhost:8080/api/v1/restaurants?restaurant\_city=brampton</a>
- 4. GET <a href="http://localhost:8080/api/v1/restaurants?restaurant\_province=0N">http://localhost:8080/api/v1/restaurants?restaurant\_province=0N</a>
- 5. GET <a href="http://localhost:8080/api/v1/restaurants?restaurant\_rating=8">http://localhost:8080/api/v1/restaurants?restaurant\_rating=8</a>
- 6. GET <a href="http://localhost:8080/api/v1/restaurants?restaurant\_cusine=cusineA">http://localhost:8080/api/v1/restaurants?restaurant\_cusine=cusineA</a>

Response for above api's will be a list a restaurants based on query parameters

4Bouns) you'll have extra credit if you can provide search based on multiple parameters like being able to

### search on rating and cusine at the same time. (Done)

GET <a href="http://localhost:8080/api/v1/restaurants?">http://localhost:8080/api/v1/restaurants?</a>
<a href="restaurant cusine=cusineA&restaurant rating=5">restaurant cusine=cusineA&restaurant rating=5</a>

The service will handle any combinations of QueryParameter provided. Parameter Should have only one value and not multiple values

# 5) Search chefs based on restarunt\_id he is working in , cuisines he can make (Done)

- 1. GET <a href="http://localhost:8080/api/v1/chefs?restaurant\_id=1">http://localhost:8080/api/v1/chefs?restaurant\_id=1</a>
- 2. GET <a href="http://localhost:8080/api/v1/chefs?restaurant\_id=1&cusine=cusineA">http://localhost:8080/api/v1/chefs?restaurant\_id=1&cusine=cusineA</a>
- 3. GET <a href="http://localhost:8080/api/v1/chefs?restaurant\_id=1&name=chefA">http://localhost:8080/api/v1/chefs?restaurant\_id=1&name=chefA</a>
- 4. GET <a href="http://localhost:8080/api/v1/chefs?name=chef8">http://localhost:8080/api/v1/chefs?name=chef8</a>
- 5. GET <a href="http://localhost:8080/api/v1/chefs?cusine=cusineC">http://localhost:8080/api/v1/chefs?cusine=cusineC</a>

Response for above api's will be a list a chefs based on query parameters

Status code: 200

Response:

```
[
    {
        "chef_name": "chefA",
        "chef_salary": 2000,
        "chef_cusines": [
            "cusineA",
            "cusineB"
        1
    },
        "chef_name": "chefB",
        "chef_salary": 2000,
        "chef_cusines": [
            "cusineC",
            "cusineD"
        1
    },
        "chef_name": "chefC",
        "chef_salary": 4000,
        "chef_cusines": [
            "cusineF",
            "cusineG"
        ]
    },
        "chef_name": "chefD",
        "chef_salary": 4000,
```