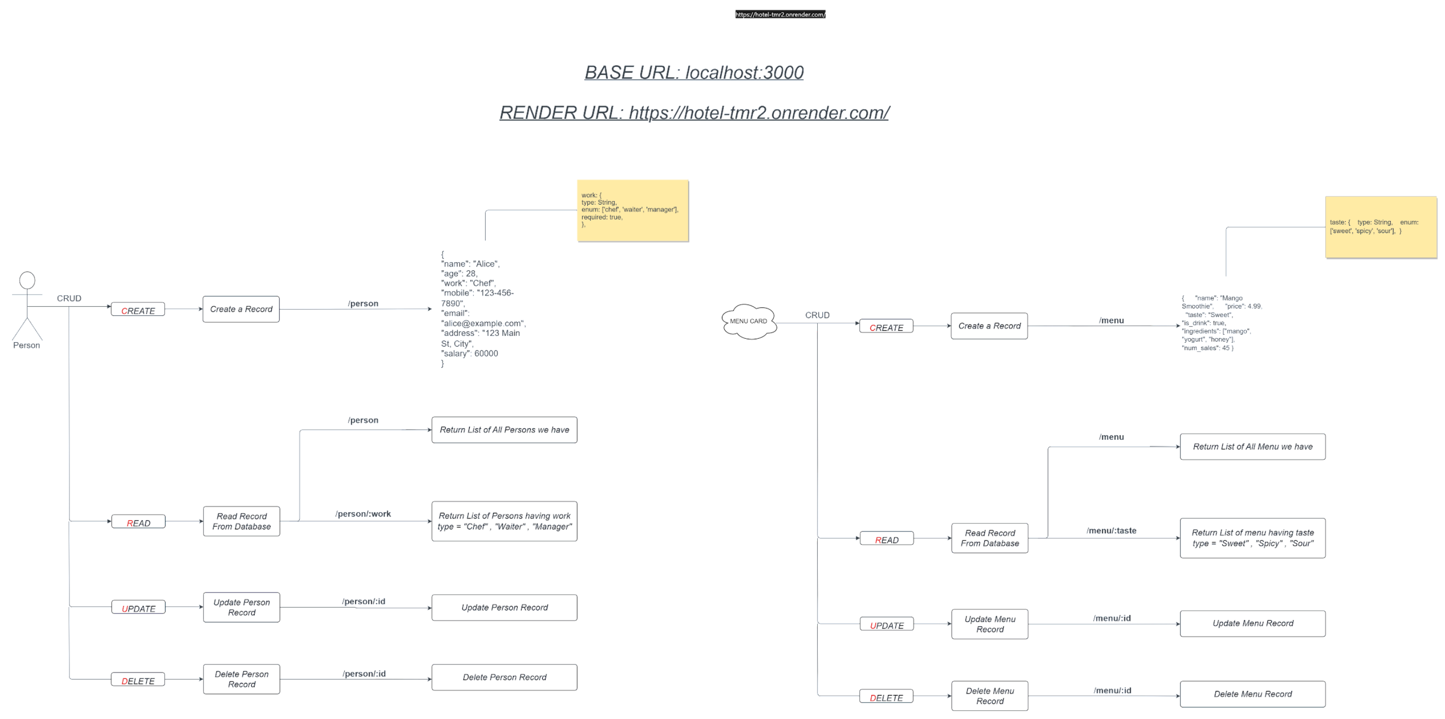
# DAY 6

- *Homework Update for Menu API*

- **Task To create POST /menu and GET /menu**

- We are now creating a POST method to save menu details and it's similar to person details and the same for the GET method

- *Flow Diagram of API*



```
work: {
type: String,
enum: ['chef', 'waiter', 'manager'],
required: true,
},
```

```
{
"name": "Alice",
"age": 28,
"work": "Chef",
"mobile": "123-456-
7890",
"email":
"alice@example.com",
"address": "123 Main
St, City",
"salary": 60000
}
```

```
taste: {    type: String,    enum:
['sweet', 'spicy', 'sour'],  }
```

```
{     "name": "Mango
Smoothie",      "price": 4.99,
  "taste": "Sweet",
"is_drink": true,
"ingredients": ["mango",
"yogurt", "honey"],
"num_sales": 45 }
```

https://drive.google.com/file/d/1TswAyCgfsa04Hp6f4OP-Umg_GVkdW4eQ/view?usp=sharing

- *Parametrised API calls*

- Now if someone told you to give a list of people who are only waiters
- Then we can create an endpoint like this

- **/person/chef**
- **/person/waiter**
- **/person/manager**

- But this is not the correct method to create as many functions Here we can use parametrized endpoints
- It can be dynamically inserted into the URL when making a request to the API.

- **localhost:3000/person/:work**

→ work = [ “chef”, “waiter”, “manager” ]

```
app.get('/person/:work', async (req, res) => {
  try {
    const workType = req.params.work; // Extract the work type
from the URL parameter

    // Assuming you already have a Person model and MongoDB
connection set up
    const persons = await Person.find({ work: workType });

    // Send the list of persons with the specified work type as
a JSON response
    res.json(persons);
  } catch (error) {
    console.error('Error fetching persons:', error);
    res.status(500).json({ error: 'Internal server error' });
  }
});
```

- *Express Router*

- We have lots of Endpoints in a single file server.js
- This makes bad experience in code readability as well as code handling
- Express Router is a way to modularize and organize your route handling code in an Express.js application.
- So let’s create a separate file to manage endpoints /person and /menu
- Express Router is like a traffic cop for your web server
- Express Router helps you organize and manage these pages or endpoints in your web application. It's like creating separate folders for different types of tasks.

- Create a folder `routes` → `personRoutes.js`

```
const express = require('express');
const router = express.Router();

// Define routes for /person
router.get('/', (req, res) => {
  // Handle GET /person
});

router.post('/', (req, res) => {
  // Handle POST /person
});

module.exports = router;
```

- Now in **server.js,** we will use this `personRoutes`

```
// Import the router files
const personRoutes = require('./routes/personRoutes');

// Use the routers
app.use('/person', personRoutes);
```

- *Update Operation*

- We will update our person Records, and for that, we will create an endpoint from where we are able to update the record
- For Updation, we need two things
  - Which record we want to update?
  - What exactly do we want to update?
- For update, we will use the ***PUT*** method to create an endpoint
- *What is a unique identifier in a document in a collection?*
- It's **_id** which Mongodb itself gives, We will use this to find the particular record that we want to update
- —> And now we will send the data the same as we did in the POST method.

```
app.put('/person/:id', async (req, res) => {
  try {
    const personId = req.params.id; // Extract the person's ID
from the URL parameter
    const updatedPersonData = req.body; // Updated data for the
person

    // Assuming you have a Person model
    const updatedPerson = await
Person.findByIdAndUpdate(personId, updatedPersonData, {
      new: true, // Return the updated document
      runValidators: true, // Run Mongoose validation
    });

    if (!updatedPerson) {
      return res.status(404).json({ error: 'Person not found'
});
    }

    // Send the updated person data as a JSON response
    res.json(updatedPerson);
  } catch (error) {
    console.error('Error updating person:', error);
    res.status(500).json({ error: 'Internal server error' });
  }
});
```

- *Delete Operation*

- We will **Delete** our person Records, and for that we will create an endpoint from where we are able to delete the record
- For Deletion, we need one thing
    - Which record we want to update?
- For deletion, we will use the ***DELETE*** method to create an endpoint
- *What is a unique identifier in a document in a collection?*
- It's **_id** which Mongodb itself gives, We will use this to find the particular record that we want to delete

```
app.delete('/person/:id', async (req, res) => {
  try {
    const personId = req.params.id; // Extract the person's ID
from the URL parameter

    // Assuming you have a Person model
    const deletedPerson = await Person.findByIdAndRemove(personId);

    if (!deletedPerson) {
      return res.status(404).json({ error: 'Person not found' });
    }

    // Send a success message as a JSON response
    res.json({ message: 'Person deleted successfully' });
  } catch (error) {
    console.error('Error deleting person:', error);
    res.status(500).json({ error: 'Internal server error' });
  }
});
```