# RESTful API: Important Questions & Answers

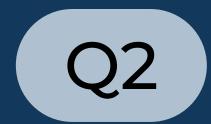
**SWIPE** 



#### What is a REST API?

A REST (Representational State Transfer) API (Application Programming Interface) is a set of rules and conventions for building and interacting with web services. It uses HTTP methods like GET, POST, PUT, PATCH, DELETE to operate on data.

**KEEP SWIPING** 



## What does it mean when an API is RESTful?

When an API is RESTful, it follows the principles of REST. It is stateless, meaning each request from a client to a server must contain all the information needed to understand and process the request.

**KEEP SWIPING** 

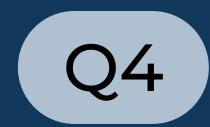


## What are the HTTP methods used in REST?

The main HTTP methods used in REST are

- GET: Retrieves data.
- POST: Sends data to be processed to a specified resource.
- PUT: Updates a current resource with new data.
- PATCH: Partially updates a current resource with new data.
- DELETE: Removes a specified resource.

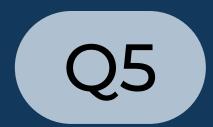
**KEEP SWIPING** 



## What is a Resource in REST?

In REST, a resource is an object with a type, associated data, relationships to other resources, and a set of methods that operate on it. It is similar to an object instance in an object-oriented programming language.

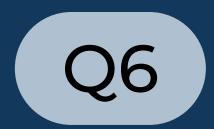
**KEEP SWIPING** 



## What is an API endpoint?

An API endpoint is a specific URL or URI (Uniform Resource Identifier) that an API interacts with. For example, in a blogging API, "/posts" might be the endpoint to retrieve all blog posts.

**KEEP SWIPING** 



## What is the purpose of HTTP status codes in RESTful APIs?

HTTP status codes are used to indicate the success or failure of a request. For example, 200 means the request was successful, 404 means the requested resource was not found, and 500 indicates a server error.

**KEEP SWIPING** 



#### What is CORS?

CORS (Cross-Origin Resource Sharing) is a mechanism that allows many resources (e.g., fonts, JavaScript, etc.) on a web page to be requested from another domain outside the domain from which the resource originated.

**KEEP SWIPING** 



## What are common authentication methods used in RESTful APIs?

Common methods include Basic Auth (username and password), API keys, OAuth (delegated authorization), and JWT (JSON Web Tokens) for information exchange.

**KEEP SWIPING** 



## How do you handle errors in RESTful APIs?

Errors in RESTful APIs are typically handled by returning appropriate HTTP status codes along with meaningful error messages in the response body.

**KEEP SWIPING** 



### How do you document RESTful API?

Documentation can be done manually, but there are also tools like Swagger or Postman that can generate interactive documentation for your API.

**KEEP SWIPING** 



## What are tools or frameworks commonly used for building RESTful APIs?

There are many tools and frameworks to help build RESTful APIs. Some popular ones include Express.js for Node.js, Django and Flask for Python, and Spring for Java.

**KEEP SWIPING** 

## Thanks for exploring REST APIs with me!