# **OTP Object Test Case**

#### 01. Valid OTP Generation:

- Test that a valid OTP is generated when a user requests it.
- Verify that the OTP is of the correct length.
- Confirm that the OTP is numeric

### 02. OTP Expiry:

- Check that the OTP expires after the specified time duration.
- Verify that the system does not accept an expired OTP.

### 03. Invalid OTP:

- Test the system's behavior when an invalid OTP is entered.
- Confirm that the system rejects an OTP that is incorrect.
- Check for appropriate error messages.

## **04.** Multiple OTP Requests:

- Verify that multiple OTP requests for the same user do not interfere with each other.
- Confirm that each OTP is unique.

# 05. Rate Limiting:

- Test if there is a limit on the number of OTP requests within a specific time frame.
- Verify that the system enforces the rate limit.

### 06. Security:

- Test the system's resistance to OTP generation prediction.
- Check if the OTPs are not easily guessable or predictable.

#### 07. User Lockout:

- Test the system's behavior when there are multiple failed OTP attempts.
- Verify that the user is temporarily locked out after exceeding a certain number of failed attempts.

### **08. OTP Delivery Channels:**

- Test the delivery of OTPs through various channels (SMS, email, mobile app).
- Verify that the OTP is delivered promptly and accurately.

## 09. Cross-browser/Device Testing:

- Test the OTP functionality on different browsers and devices.
- Confirm that the OTP works consistently across various platforms.

#### **10.** Integration Testing:

• If the OTP system is integrated with other systems (login systems), test the integration points.

## 11. Usability Testing:

- Check the user experience during the OTP entry process.
- Confirm that the system provides clear instructions on how to enter the OTP.

## 12. Localization Testing:

If the application is multilingual, test the OTP functionality in different languages.

#### 13. Fallback Mechanism:

• Test the fallback mechanism in case the primary OTP delivery channel fails.

### 14. Logging and Auditing:

Verify that relevant events (OTP generation, validation, failures) are logged appropriately.

## 15. Recovery Mechanism:

- Test the recovery process if a user encounters issues with OTP authentication.
- These are just examples, and the actual test cases will depend on the specific requirements and features of your OTP system.