MySQL Trigger

Definition:

Trigger is a special type of stored procedure. It is executed automatically without needing to be called explicitly (unlike stored procedures) after an event has been executed.

Example:

The first above part of the syntax for trigger creation, the next SQL Statements are the event that will be executed.

```
1  CREATE TRIGGER `usersTrigger` BEFORE INSERT ON `users`
2   FOR EACH ROW BEGIN
3      DECLARE next_id INT;
4
5
6      SELECT AUTO_INCREMENT
7      INTO next_id
8      FROM INFORMATION_SCHEMA.TABLES
9      WHERE TABLE_SCHEMA = DATABASE() AND TABLE_NAME =
    'users';
10
11
12      SET NEW.userID = CONCAT('USER', LPAD(next_id, 4,
    '0'));
13  END
```

In this example, every time a user is inserted in the USERS table the "usersTrigger' will be executed, creating a unique new userID in the USERS table.

MySQL Procedure

Definition:

Stored Procedure is a compilation of pre-compiled SQL statements that can be reused anytime. However, unlike MySQL Trigger, it must be called explicitly.

Example:

This syntax is for creating a stored procedure,

```
DELIMITER //
CREATE PROCEDURE GetCustomerInfo()
BEGIN
    SELECT * FROM CUSTOMERS WHERE AGE > 25;
END //
```

This syntax is for verifying or calling the procedure to be executed

```
CALL GetCustomerInfo(); //
```