

# Database hw5

```
CREATE DATABASE my_database;  
USE my_database;
```

```
[mysql> CREATE DATABASE my_database;  
Query OK, 1 row affected (0.00 sec)
```

```
[mysql> CREATE DATABASE my_database;  
ERROR 1007 (HY000): Can't create database 'm
```

```
[mysql> USE my_database;  
Database changed
```

```
mysql> CREATE TABLE StudentGrades (  
    ->     student_id INT PRIMARY KEY,  
    ->     grade INT  
    -> );
```

```
Query OK, 0 rows affected (0.04 sec)
```

```
INSERT INTO StudentGrades (student_id, grade) VALUES (1, 85);  
INSERT INTO StudentGrades (student_id, grade) VALUES (2, 73);  
INSERT INTO StudentGrades (student_id, grade) VALUES (3, 91);  
INSERT INTO StudentGrades (student_id, grade) VALUES (4, 67);  
INSERT INTO StudentGrades (student_id, grade) VALUES (5, 59);
```

```
DELIMITER $$
```

```
CREATE PROCEDURE GradeDistribution()  
BEGIN
```

```
    DECLARE v_0_60 INT DEFAULT 0;  
    DECLARE v_60_70 INT DEFAULT 0;  
    DECLARE v_70_80 INT DEFAULT 0;  
    DECLARE v_80_90 INT DEFAULT 0;  
    DECLARE v_90_100 INT DEFAULT 0;
```

```
    SELECT COUNT(*) INTO v_0_60 FROM StudentGrades WHERE grade BETWEEN 0 AND 59;  
    SELECT COUNT(*) INTO v_60_70 FROM StudentGrades WHERE grade BETWEEN 60 AND 69;  
    SELECT COUNT(*) INTO v_70_80 FROM StudentGrades WHERE grade BETWEEN 70 AND 79;  
    SELECT COUNT(*) INTO v_80_90 FROM StudentGrades WHERE grade BETWEEN 80 AND 89;  
    SELECT COUNT(*) INTO v_90_100 FROM StudentGrades WHERE grade BETWEEN 90 AND 100;
```

```
    SELECT CONCAT('0~59 分数段人数: ', v_0_60) AS result;
```

```

SELECT CONCAT('60~69 分数段人数: ', v_60_70) AS result;
SELECT CONCAT('70~79 分数段人数: ', v_70_80) AS result;
SELECT CONCAT('80~89 分数段人数: ', v_80_90) AS result;
SELECT CONCAT('90~100 分数段人数: ', v_90_100) AS result;
END $$

DELIMITER ;

```

```

CALL GradeDistribution();
-- 调用

```

```
mysql> CALL GradeDistribution();
```

```

+-----+
| result |
+-----+
| 0~59 分数段人数: 1 |
+-----+
1 row in set (0.00 sec)

```

```

+-----+
| result |
+-----+
| 60~69 分数段人数: 1 |
+-----+
1 row in set (0.00 sec)

```

```

+-----+
| result |
+-----+

```