* CREATE DATABASE fkdemo
* ​CREATE TABLE categories(

categoryId INT AUTO\_INCREMENT PRIMARY KEY,

categoryName VARCHAR(100) NOT NULL

) ENGINE=INNODB;

* ​INSERT INTO categories(categoryName)

VALUES

('smartphone'),

('smartwatch');

* ​INSERT INTO categories(categoryId,categoryName)

VALUES

(700,'smartphone')

* ​INSERT INTO categories(categoryName)

VALUES

('Iphone')

* ​CREATE TABLE product(

productId INT AUTO\_INCREMENT PRIMARY KEY,

productName varchar(100) NOT NULL,

categoryId INT,

CONSTRAINT fk\_category

FOREIGN KEY (categoryId)

REFERENCES categories(categoryId)

) ENGINE=INNODB;

* ​INSERT INTO product(productName, categoryId)

VALUES ('iphone',1);

* ​INSERT INTO product(productName, categoryId)

VALUES ('ipad',3); (wont work)

* ​INSERT INTO categories(categoryName, categoryId)

VALUES ('smartpad',3);

* ​INSERT INTO product(productName, categoryId)

VALUES ('pad',3);

* ​DELETE FROM categories

WHERE categoryId = 2;

* ​DELETE FROM product

WHERE productId = 3;

* ​DROP TABLE product
* CREATE TABLE product(

productId INT AUTO\_INCREMENT PRIMARY KEY,

productName varchar(100) NOT NULL,

categoryId INT,

CONSTRAINT fk\_category

FOREIGN KEY (categoryId)

REFERENCES categories(categoryId)

ON UPDATE CASCADE

ON DELETE CASCADE

) ENGINE=INNODB;

* ​DROP DATABASE fkdemo
* My SQL triggers
* [CREATE](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-table.html) [table](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-table.html) employee\_audit( id [int](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/numeric-types.html) AUTO\_INCREMENT PRIMARY KEY, employeeNumber [int](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/numeric-types.html) [not](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/logical-operators.html#operator_not) null, lastname [varchar](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/string-types.html)(50) [not](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/logical-operators.html#operator_not) null, changedat [datetime](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/date-and-time-types.html) [DEFAULT](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/miscellaneous-functions.html#function_default) null, ACTION [varchar](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/string-types.html" \t "mysql_doc)(50) [DEFAULT](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/miscellaneous-functions.html#function_default) null);
* [create](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-trigger.html) [TRIGGER](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-trigger.html) before\_employee\_update BEFORE [UPDATE](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/update.html) ON employees FOR EACH ROW [INSERT](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/insert.html) INTO employee\_audit [SET](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/set.html) ACTION = "update", employeeNumber = OLD.employeeNumber, lastname = OLD.lastname, changedat = NOW();
* [SHOW](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/show-triggers.html) [TRIGGERS](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/show-triggers.html);
* [create](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-table.html) [table](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-table.html) members( id [int](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/numeric-types.html) AUTO\_INCREMENT, name [varchar](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/string-types.html)(100) [not](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/logical-operators.html#operator_not) null, email [varchar](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/string-types.html)(255), birthDate [DATE](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/date-and-time-types.html), PRIMARY KEY (id) );
* [create](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-table.html) [TABLE](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/create-table.html) reminders( id [int](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/numeric-types.html) AUTO\_INCREMENT, memberID [INT](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/numeric-types.html), message [varchar](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/string-types.html)(255) [not](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/logical-operators.html#operator_not) null, PRIMARY KEY (id , memberID) );
* DELIMITER $$
* create TRIGGER after\_members\_insert
* AFTER INSERT
* ON members FOR EACH ROW
* BEGIN
* IF NEW.birthDate IS null THEN
* INSERT INTO reminders(memberID, message)
* VALUES(NEW.id,CONCAT('Hi',NEW.name, ', please update your date of birth'));
* END IF;
* END$$
* DELIMITER;
* [INSERT](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/insert.html) INTO members(name,email,birthDate) [VALUES](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/miscellaneous-functions.html#function_values) ('jhon doe','jhon.doe@example.com',null), ('jane doe','jane.doe@example.com','2000-01-01');
* [SELECT](http://localhost/phpmyadmin/url.php?url=http://dev.mysql.com/doc/refman/5.5/en/select.html) \* FROM `reminders`;

Unique constraint

1)create database tabeeb;

2) create table suppliers( supplier\_id INT AUTO\_INCREMENT, name varchar(255) not null, phone varchar(15) not null UNIQUE, address varchar(255) not null, PRIMARY KEY (supplier\_id), CONSTRAINT uc\_name\_address UNIQUE (name,address));

3) insert into suppliers(name,phone,address) values ("ABC Inc","(408)-908-2476","4000 North 1st street")

4) ALTER TABLE suppliers drop INDEX uc\_name\_address;

5) INSERT INTO suppliers(name,phone,address) VALUES ("XYZ Coperation","(408)-908-2479","3000 North 1st Street")

6) alter table suppliers ADD CONSTRAINT uc\_name\_address UNIQUE (name,address);

MYSQL ALTER TABLE

1. create database tabeeb;
2. create table vehicles( vehicleID INT, year INT NOT NULL, make VARCHAR(100) NOT NULL, PRIMARY KEY(vehicleID));
3. ALTER TABLE vehicles add model varchar(100) not null;
4. alter table vehicles add color varchar(50), add note varchar(255)
5. alter table vehicles modify year SMALLINT NOT NULL, modify color VARCHAR(20) NULL AFTER make;
6. alter table vehicles change COLUMN note vehicleCondition VARCHAR(100) NOT NULL;
7. ALTER TABLE vehicles DROP COLUMN vehicleCondition;
8. alter table vehicles RENAME TO cars;

MYSQL INTRODUCTION TO DATABASE VIEW

1) CREATE view SalesperOrder

AS

select orderNumber,SUM(QuantityOrdered\*priceEach) as Total

from orderdetails

group by orderNumber

order by Total

2) SELECT \* FROM salesperorder WHERE Total>60000

3) create view xyz as SELECT \* FROM salesperorder WHERE Total>60000;

4) CREATE VIEW T1 AS SELECT orderNumber,customerName FROM orders AS O JOIN customers AS C ON o.customerNumber=C.customerNumber;

5) CREATE VIEW T2 AS SELECT customerName,T.orderNumber,SUM(quantityOrdered\*priceEach) as TOTAL FROM orderdetails as T JOIN t1 as ORR ON T.orderNumber=ORR.orderNumber GROUP BY orderNumber