SQL Statements Implemented in the System

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This user manual only shows as many SQL statements that can be used in the database system as possible. There are many usable SQL statements (in combination with various functions) that are not shown in this file .

Test Account

Account：user   Password：test

DATABASE

1.   CREATE DATABASE
CREATE DATABASE database_name；
CREATE DATABASE db;

2.   DROP DATABASE
DROP DATABASE database_name;
DROP DATABASE db;

3.   RENAME DATABASE
RENAME DATABASE old_name TO new_name;
Rename database db1 to db2;

4.   SHOW DATABASES
SHOW DATABASES;

5.   USE DATABASEA
USE database_name;
Use db;

TABLE

1. CREATE TABLE

CREATE TABLE table_name (column_name_1 data_type column_constraint,
column_name_2 data_type column_constraint, ..., table_constraint);
// Table must have primary key

Data Type
Text: VARCHAR, CHAR
Number: INT , DECIMAL, DOUBLE, FLOAT, BIGINT, REAL, NUMERIC
Time: DATE, TIME, TIMESTAMP,YEAR
Column Constraint
NOT NULL, PRIMARY KEY, AUTO_INCREMENT, COMMENT
Table Constraint
PRIMARY KEY
PRIMARY KEY('id'); PRIMARY KEY (id, name);

- ✓ *CREATE TABLE tnum(id int primary key,dde Decimal(10,2),ddo Double(10,2) not null,fflo float(7,2),iin int(8) auto_increment,rrea Real COMMENT "it is a test",bi bigint(7),numric numeric(3,1));*
- ✓ *CREATE TABLE tdate(id int primary key,td Date, tt Time,tts TimeStamp,yyyy Year);*
- ✓ *CREATE TABLE ttext(id int primary key,vvar varchar(255),cchar char(255));*
- ✓ *Create table mytable (id float,id1 float(12,4), phone bigint, phone1 bigint(64), detail_time date, primary key(id,phone, detail_time));*

2. DROP TABLE

- ➢ DROP TABLE tbname;
- ➢ DROP TABLE tbname1, tbname2, ...;

3. RENAME TABLE

RENAME TABLE tbname TO tbname1;
Rename table tb1 to tb2;

4. SHOW TABLES

SHOW TABLES;

5. ALTER TABLE

ALTER TABLE ADD COLUMN

- ➢ ALTER TABLE tbname ADD new_column data_type;
- ➢ ALTER TABLE tbname ADD ..., ADD ..., ADD ..., ...;

ALTER TABLE MODIFY COLUMN

- ➢ ALTER TABLE tbname MODIFY column_definition;

- ➤ ALTER TABLE tbname MODIFY column_definition, MODIFY column_definition, ...;

ALTER TABLE DROP COLUMN
- ➤ ALTER TABLE tbname DROP COLUMN column_name;
- ➤ ALTER TABLE tbname DROP COLUMN column_name, DROP COLUMN column_name, ...;

6. TRUNCATE TABLE
TRUNCATE tbname;
TRUNCATE tb1;

DATA

1. INSERT DATA
INSERT LINES
INSERT INTO table_name (column1, coulumn2, …) VALUES (value1, value2, …);
INSERT INTO table_name (column1, coulumn2, …) VALUES (value1, value2, …), (value3, value4, …), …;

INSERT FROM OTHER TABLES
INSERT INTO table1 SELECT columns FROM table2 (constraint1, constraint2, ...);
- ✓ *INSERT INTO table1 SELECT column1, column2, ... FROM table2 where ...;*
- ✓ *INSERT INTO table1 SELECT * FROM table2;*
- ✓ *INSERT INTO table1 SELECT column1, column2, ... FROM table2;*
- ✓ *INSERT INTO table1 SELECT * FROM table2 where ... limit ... ;*

2. DELETE DATA
DELETE FROM table constraint1, constraint 2, ...;
- ✓ *delete from tnum where id>2 or ddo<5;*
- ✓ *delete from tnum where id in (1,2,5);*
- ✓ *delete from tnum where ddo between 1 and 2;*

3. SELECT DATA
- ➤ SELECT column1, column2, ... FROM tbname;
- ➤ SELECT */ALL FROM tbname;
- ➤ SELECT column1,column2,column3 AS a FROM tbname;
- ➤ SELECT column1 FROM tbname AS cs;
- ➤ SELECT column1, column2 FROM tbname ORDER BY column1;
- ➤ SELECT column1, column2 FROM tbname ORDER BY column1 ASC, column2 DESC, ...;
- ➤ SELECT DISTINCT column1, column2 FROM tbname;
- ➤ SELECT column1, column2 FROM tbname ORDER BY xx LIMIT xx;
- ➤ SELECT column1, column2 FROM tbname ORDER BY xx LIMIT xx OFFSET xx;

- SELECT column1, column2 FROM tbname ORDER BY xx OFFSET xx ROWS FETCH NEXT xx ROWS ONLY;
- SELECT column1 FROM tbname WHERE a>b; (<,>,=,<=,>=,!=)
- SELECT column1 FROM tbname WHERE c1>b AND/OR c2>d;
- SELECT column1 FROM tbname WHERE a1 (NOT) BETWEEN a AND b;
- SELECT column1 FROM tbname WHERE a1 (NOT) IN (a, b, ...);
- SELECT column1 FROM tbname WHERE a1 (NOT) LIKE 'ab' / '%na' ('adf%', '%da%', ...) / '__a__' ('_a_', ...) / '_a%' ('%a__', ...);
- SELECT column1 FROM tbname WHERE a1 IS (NOT) NULL;
- SELECT column1 FROM tbname WHERE a>b ORDER BY c1;
- SELECT column1 FROM tbname WHERE a>b ORDER BY c1,d1;
- SELECT column1 FROM tb1 INNER/RIGHT/FULL/CROSS/LEFT JOIN tb2 ON tb1.xx = tb2.xx;
- SELECT column1 FROM tb1 INNER/RIGHT/FULL/CROSS/LEFT JOIN tb2 ON tb1.xx = tb2.xx (WHERE ..., ORDER BY ..., LITMIT ..., ...);
- SELECT column1 FROM tb1 INNER/RIGHT/FULL/CROSS/LEFT JOIN tb2 ON tb1.xx = tb2.xx INNER/RIGHT/FULL/CROSS/LEFT JOIN tb3 ON tb1.xx = tb3.xx ... (WHERE ..., ORDER BY ..., LITMIT ..., ...);
- SELECT SUM(column1) (MAX(column2), MIN(column3), AVG(column4)) FROM tbname (WHERE ..., ORDER BY ..., LIMIT ..., ...);

4. UPDATE DATA

UPDATE table SET column1 = value1, column2 = value2, ... constraint1, constraint2, ...;
UPDATE table SET column1 = value1, column2 = value2 WHERE a<b;