# mysql 子查询

出现在其他语句内的 select 字句

1. 子查询嵌套在查询内部，且必须出现在圆括号内

2. 子查询可以包含多个关键字或条件：DISTINCT、GROUP BY、ORDER BY、LIMIT、函数等

3. 子查询的外层查询可以是：SELECT、INSERT、UPDATE、SET 或 DO

**使用比较运算符的子查询**

mysql> select round(avg(goods\_price),2) from tdb\_goods;

mysql> select \* from tdb\_goods where goods\_price > (select round(avg(goods\_price),2) from tdb\_goods);

子查询返回多个结果时可用 ANY、SOME、ALL 进行修饰



mysql> select \* from tdb\_goods where goods\_price > all (select goods\_price from tdb\_goods where goods\_cate='超级本');

**使用 [NOT]IN 的子查询**

= ANY 与 IN 等效，!= ALL 与 NOT IN 等效

mysql> select \* from tdb\_goods where goods\_price not in (select goods\_price from tdb\_goods where goods\_cate='超级本');

**使用 [NOT]EXISTS 的子查询**

如果子查询返回任何行，EXISTS 将返回 TRUE，否则 FALSE

使用 INSERT ... SELECT 插入

mysql> insert into tdb\_goods\_cates(cate\_name) select goods\_cate from tdb\_goods group by goods\_cate;

# 多表更新 + 连接

**INSERT + SELECT**

mysql> update tdb\_goods g inner join tdb\_goods\_cates gc on g.goods\_cate = gc.cate\_name set g.goods\_cate = gc.cate\_id;

**CREATE + SELECT**

mysql> create table tdb\_goods\_brands (

-> brand\_id smallint unsigned primary key auto\_increment,

-> brand\_name varchar(40) not null)

-> select brand\_name from tdb\_goods group by brand\_name;

mysql> update tdb\_goods g inner join tdb\_goods\_brands gb on g.brand\_name = gb.brand\_name set g.brand\_name = gb.brand\_id;

修改表结构使用事实外键（而不是物理外键）

mysql> alter table tdb\_goods change goods\_cate cate\_id smallint unsigned not null,

-> change brand\_name brand\_id smallint unsigned not null;