一、创建数据库

create database JXGL

on primary

(

name=jxgl\_data,

filename='G:\数据库\2\jxgl\_data.mdf',

size=5MB,

maxsize=50MB,

filegrowth=1MB

)

Log on

(

name=jxgl\_log,

filename='G:\数据库\2\jxgl\_log.ldf',

size=5MB,

maxsize=50MB,

filegrowth=10%

)



二、创建数据表

1.学生信息表

use JXGL

create table student

(

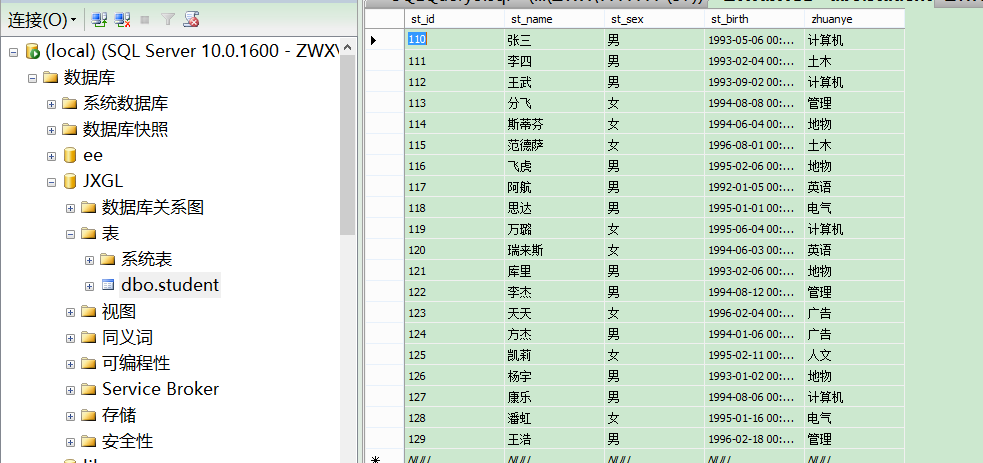
st\_id varchar(9) primary key,

st\_name char(8) null,

st\_sex nchar(2) constraint checksex check(st\_sex in('男','女')),

st\_birth datetime null,

zhuanye char(8) null

) 

2.学校系别表

use JXGL

create table school

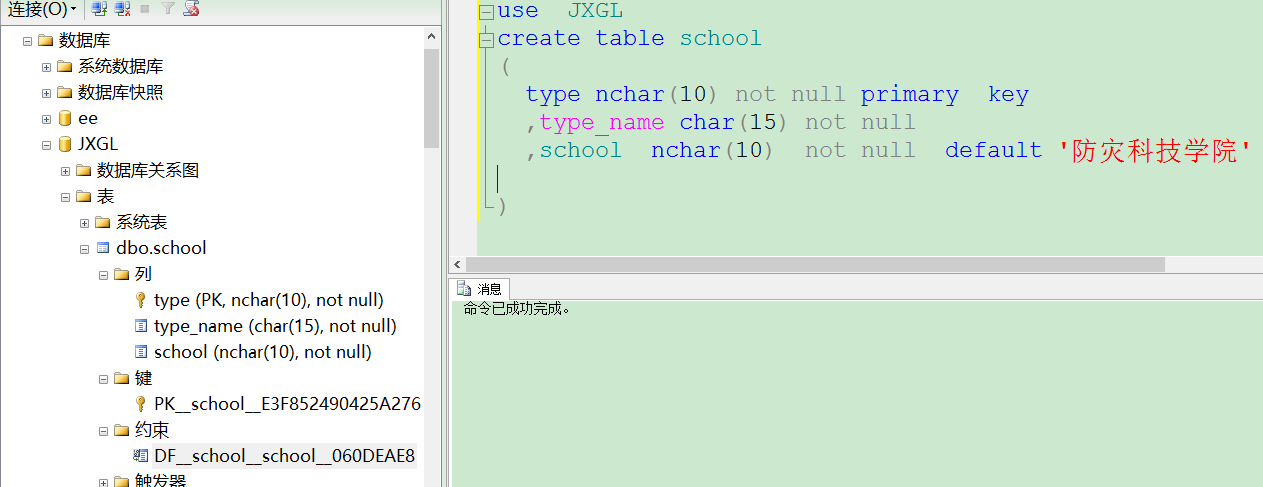
(

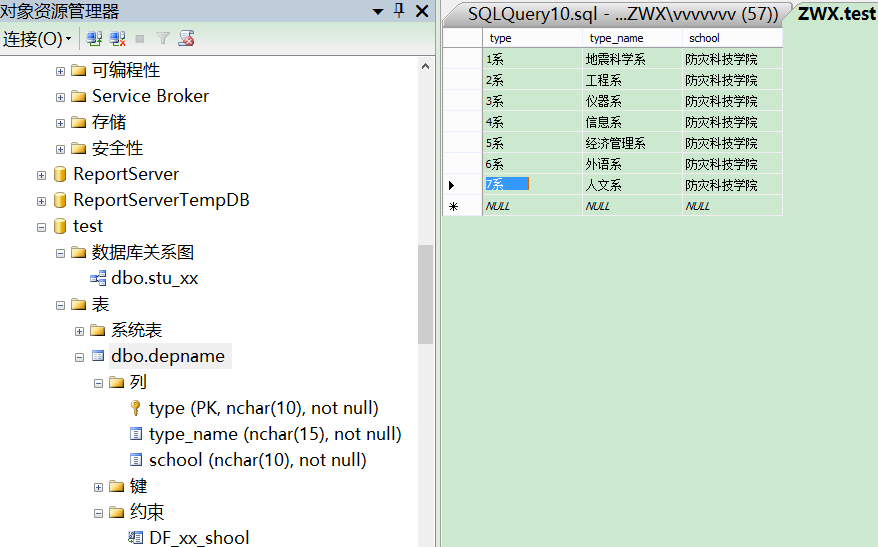
type nchar(10) not null primary key

,type\_name char(15) not null

,school nchar(10) not null default '防灾科技学院'

)





3.成绩表

use JXGL

create table score

(

st\_id varchar(9) not null

,type nchar(10) not null

,math\_grade int

,average int

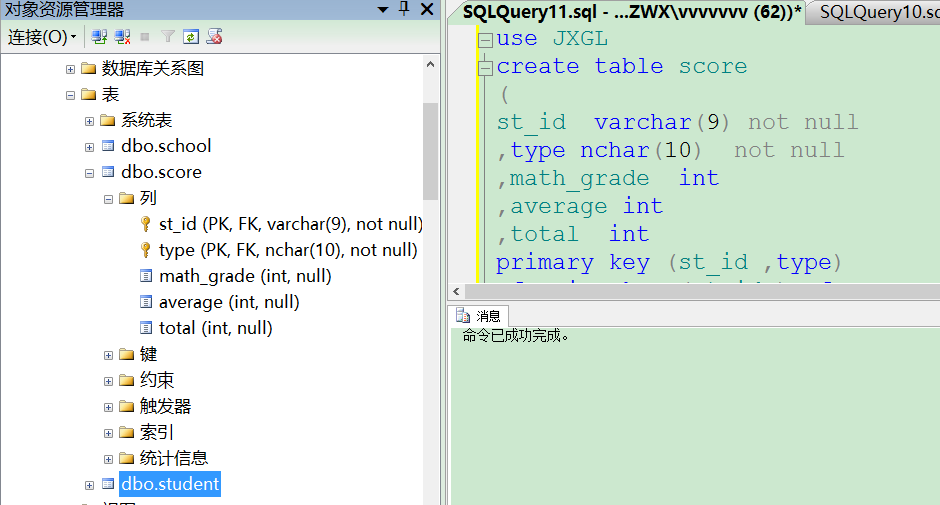
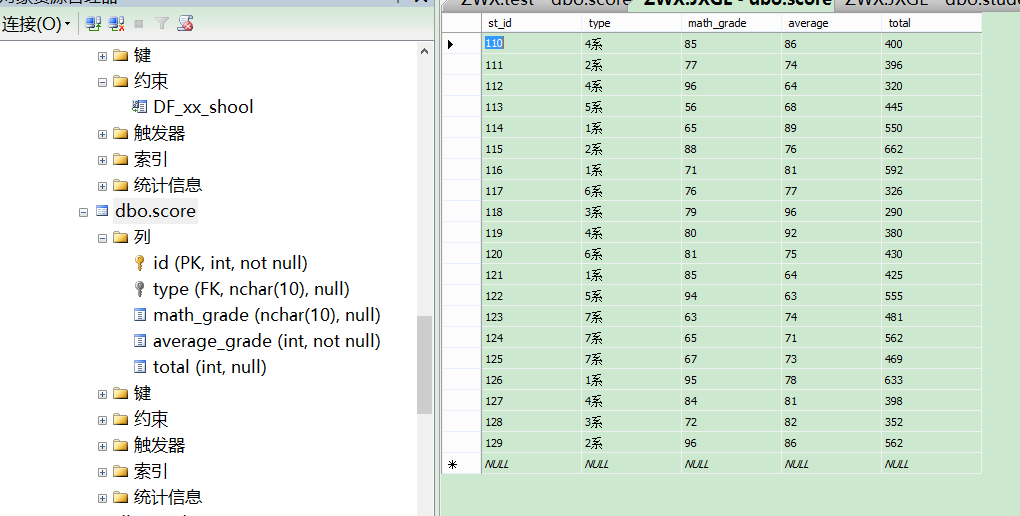
,total int

primary key (st\_id ,type)

,foreign key (st\_id )references student(st\_id)

,foreign key (type) references school(type)

)

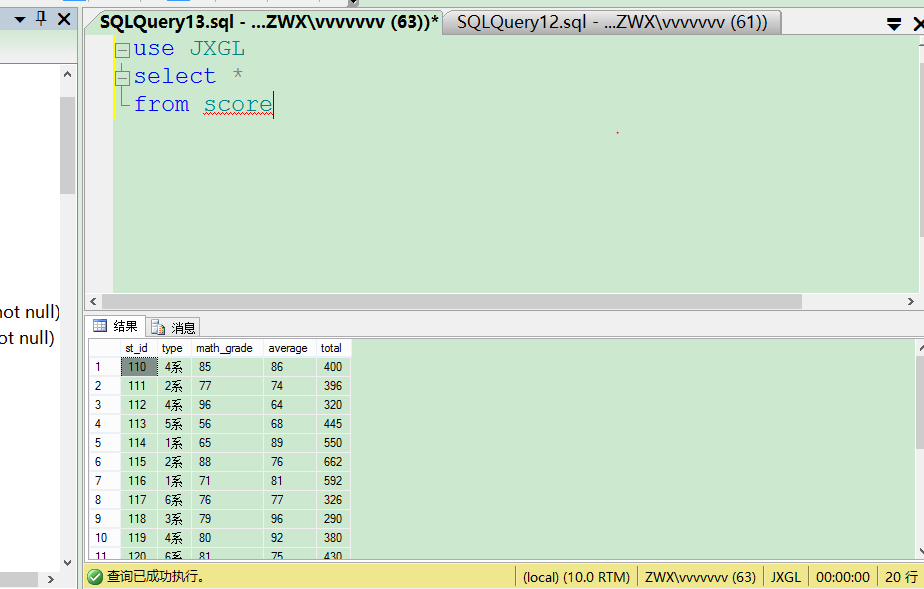
三、查询

1.查询score中的所有数据

use JXGL

select \*

from score



2.查询姓名年 月 日

use JXGL

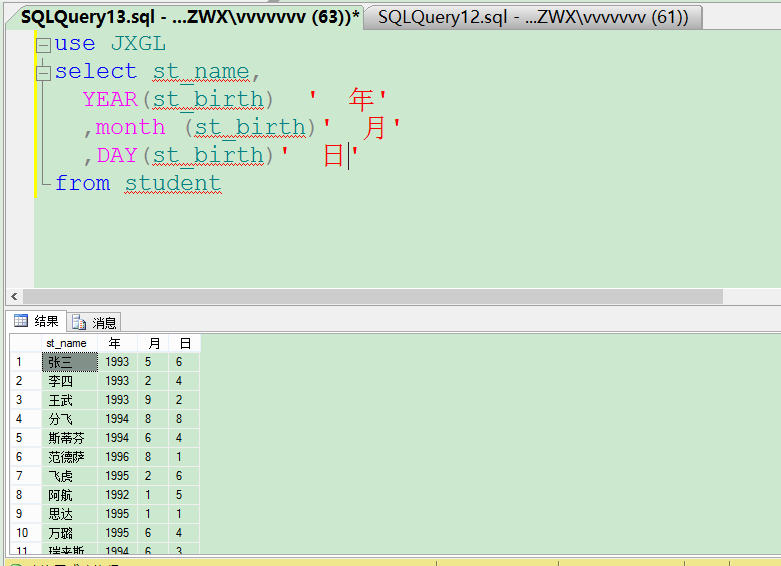
select st\_name,

YEAR(st\_birth) ' 年'

,month (st\_birth)' 月'

,DAY(st\_birth)' 日'

from student



3.年龄小于20

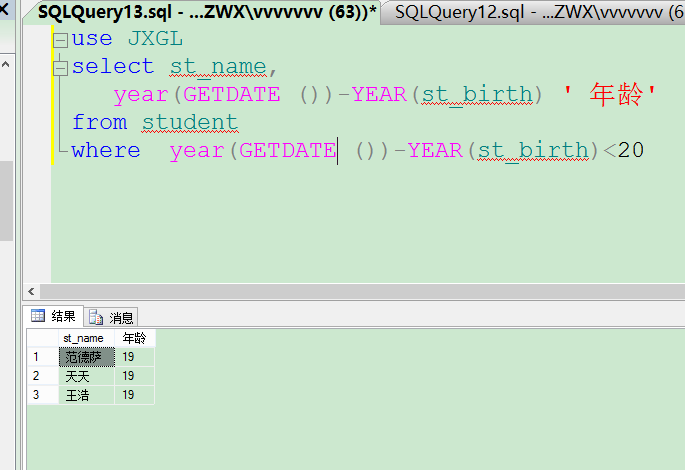
use JXGL

select st\_name,

year(GETDATE ())-YEAR(st\_birth) ' 年龄'

from student

where year(GETDATE ())-YEAR(st\_birth)<20



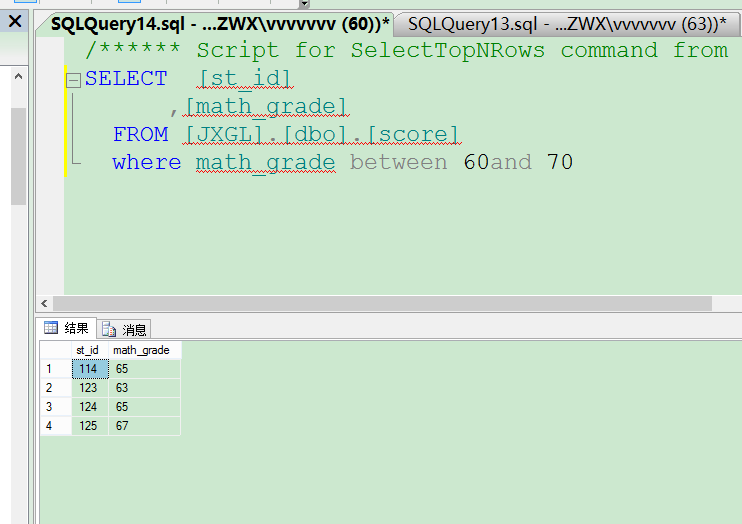
4.查询数学成绩在60~70之间的学生

SELECT [st\_id]

,[math\_grade]

FROM [JXGL].[dbo].[score]

where math\_grade between 60and 70

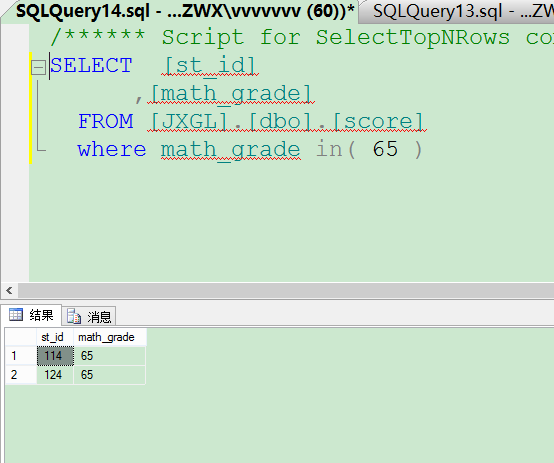


5.用in 查询math\_grade 65

SELECT [st\_id]

,[math\_grade]

FROM [JXGL].[dbo].[score]

where math\_grade in( 65 )

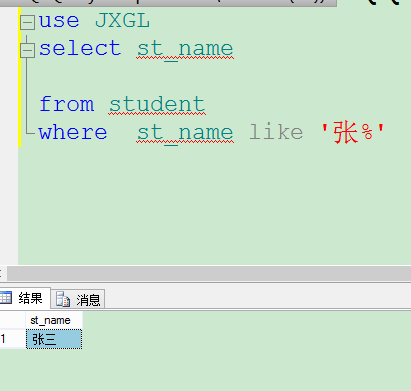
6.查询姓张的

use JXGL

select st\_name

from student

where st\_name like '张%'



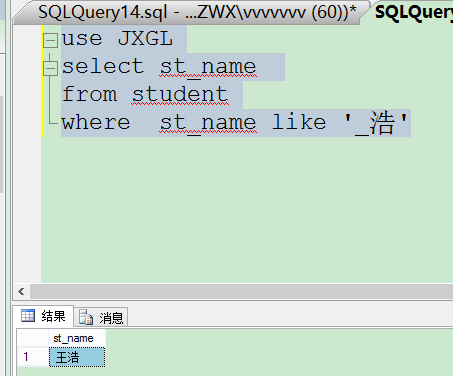
7.查询第二个字为浩的姓名

use JXGL

select st\_name

from student

where st\_name like '\_浩'

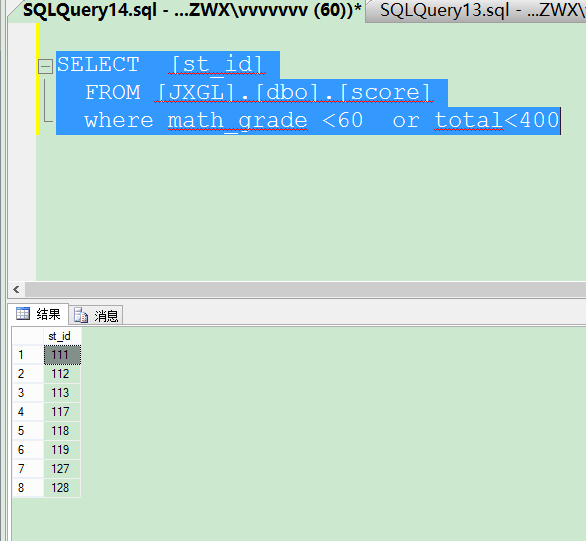


8. 查询math\_grade <60 or total<400

SELECT [st\_id]

FROM [JXGL].[dbo].[score]

where math\_grade <60 or total<400

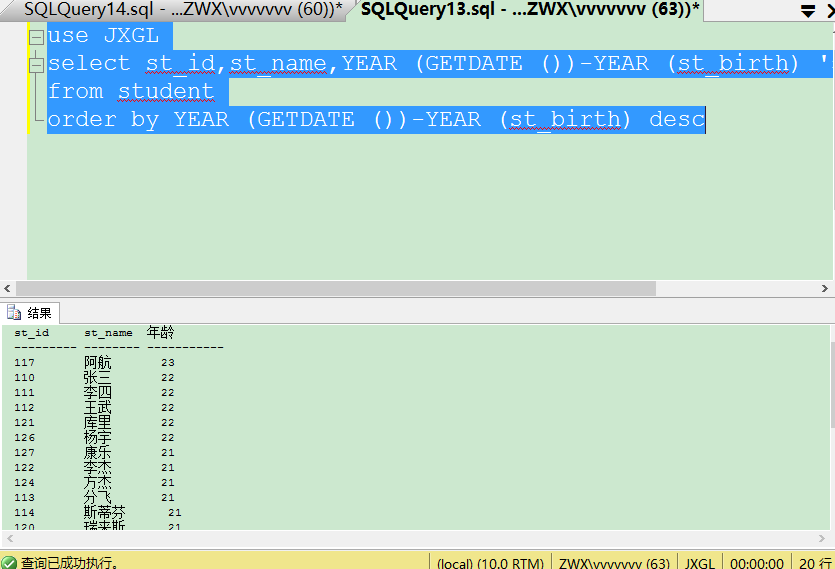


9.按年龄排序（降序）

use JXGL

select st\_id,st\_name,YEAR (GETDATE ())-YEAR (st\_birth) '年龄'

from student

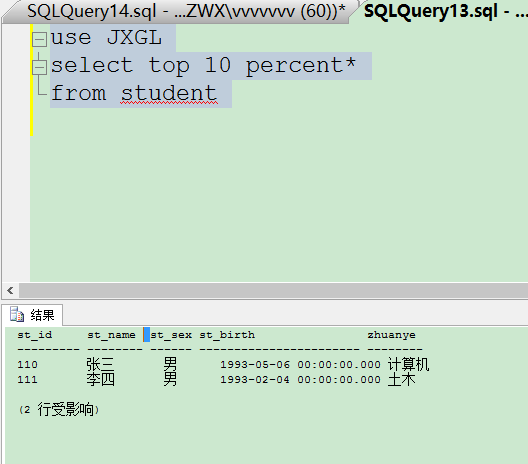
order by YEAR (GETDATE ())-YEAR (st\_birth) desc 

10. 10%

use JXGL

select top 10 percent\*

from student

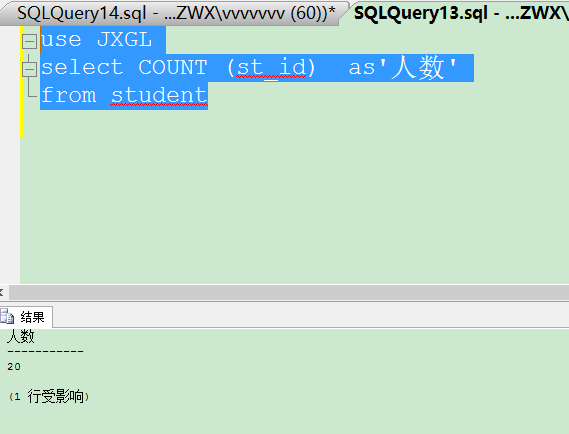


11.count

use JXGL

select COUNT (st\_id) as'人数'

from student

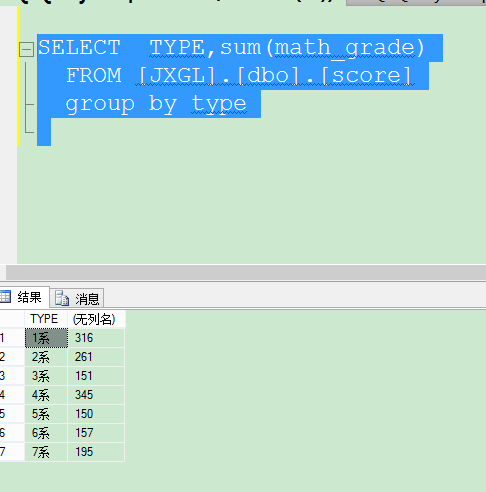


12.按系别对math­\_grade 分组

SELECT TYPE,sum(math\_grade)

FROM [JXGL].[dbo].[score]

group by type



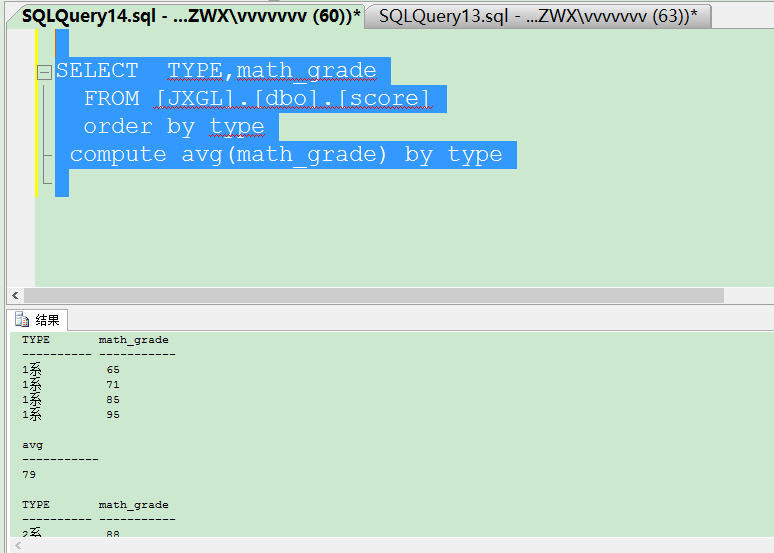
13.分类

SELECT TYPE,math\_grade

FROM [JXGL].[dbo].[score]

order by type

compute avg(math\_grade) by type



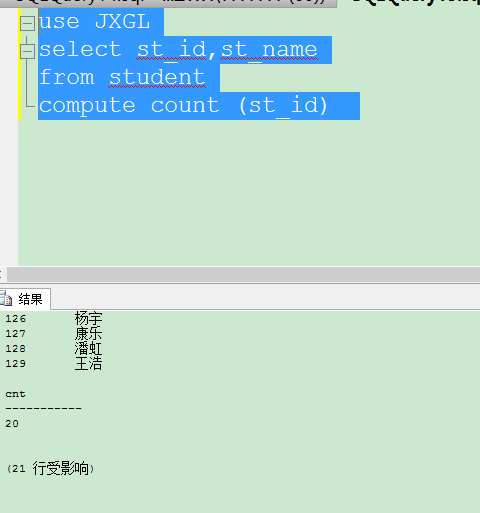
14 汇总

use JXGL

select st\_id,st\_name

from student

compute count (st\_id)



15.利用别名多表联合查询

use JXGL

select s1.[st\_id]

,s1.[st\_name]

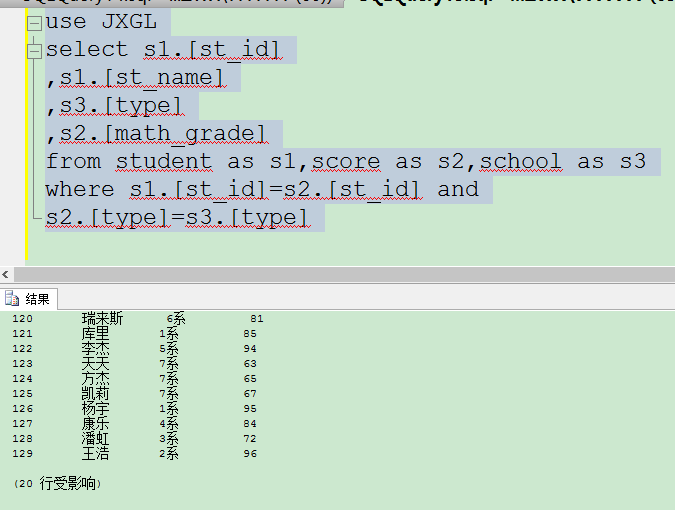
,s3.[type]

,s2.[math\_grade]

from student as s1,score as s2,school as s3

where s1.[st\_id]=s2.[st\_id] and

s2.[type]=s3.[type]



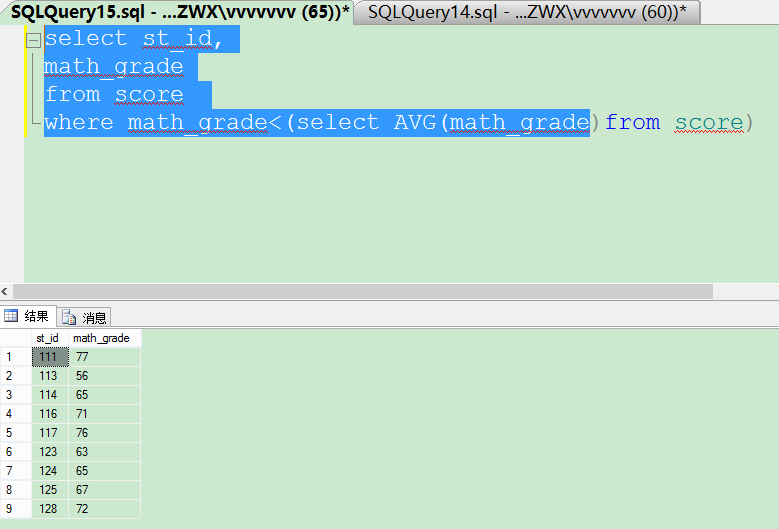
16.嵌套查询

select st\_id,

math\_grade

from score

where math\_grade<(select AVG(math\_grade)from score)



四.数据更新

1.数据插入

use JXGL

insert into student

values('130','张宇','男','1990-01-02','计算机'

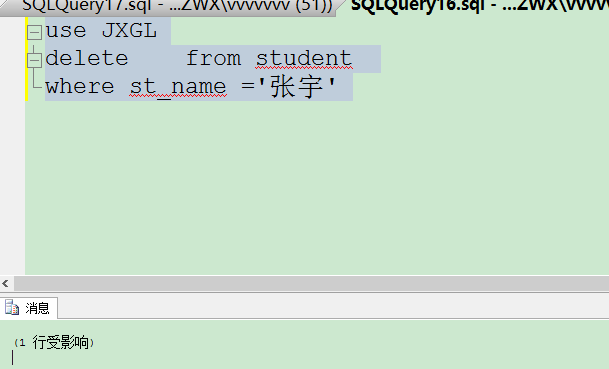
) 

2.删除张宇的信息

use JXGL

delete from student

where st\_name ='张宇'



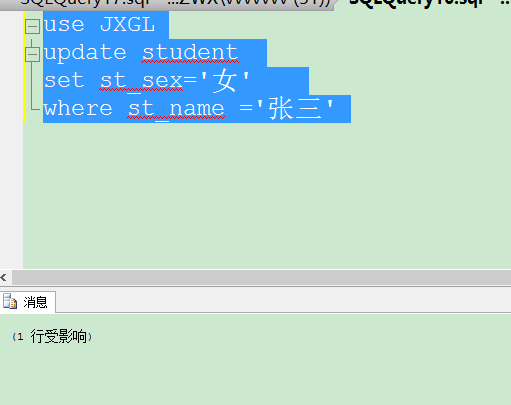
3.修改数据

use JXGL

update student

set st\_sex='女'

where st\_name ='张三'



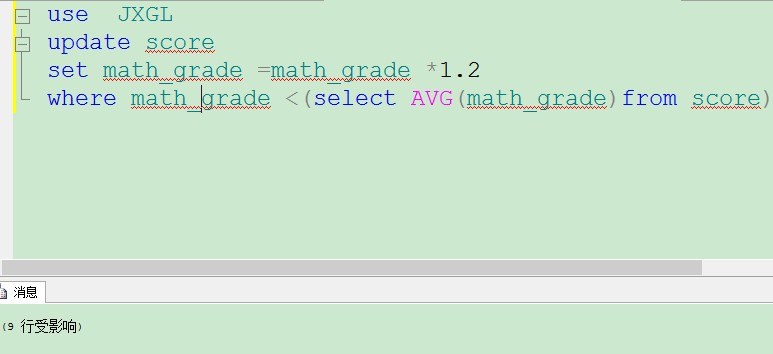
4. 将低于maTh\_grade平均分的学生成绩\*120%

use JXGL

update score

set math\_grade =math\_grade \*1.2

where math\_grade <(select AVG(math\_grade)from score)



5.将math\_grade\*1.4，超过100的设成100

While exists(Select math\_grade From d1 Where math\_grade<80)

Begin

Update d1

SET math\_grade=math\_grade\*1.2

IF (Select Max(math\_grade) From d1)>100

begin

update d1

set math\_grade=100

where math\_grade >100

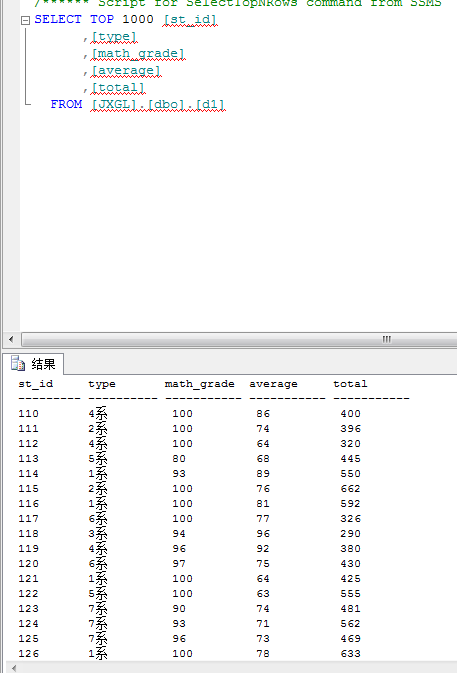
Break

end

Else

Continue

END



五.视图

1.创建

create view stuView

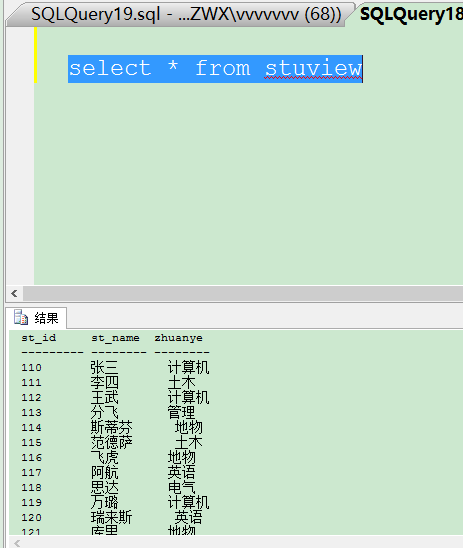
as select st\_id ,st\_name,zhuanye

from student



2.查看视图

select \* from stuview



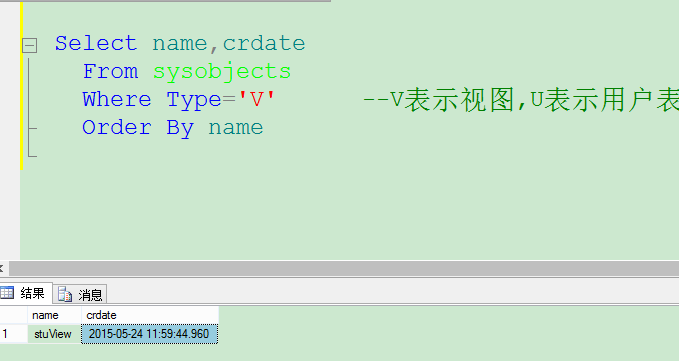
3. **查询当前数据库中所有的视图的名字和创建时间**

Select name,crdate

From sysobjects

Where Type='V' --V表示视图,U表示用户表

Order By name



3.向视图插入数据

insert into stuview

values('144','威德','计算机')



4.更改

update stuview

set zhuanye ='广告'

where st\_id ='144'



5.修改视图定义

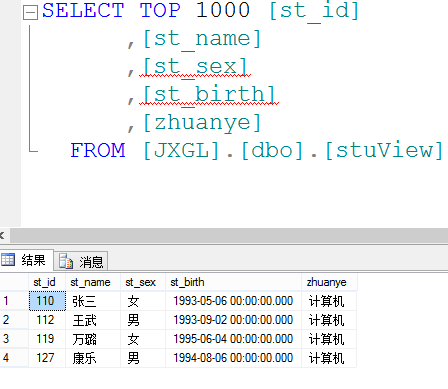
Alter view stuview

As

Select \*

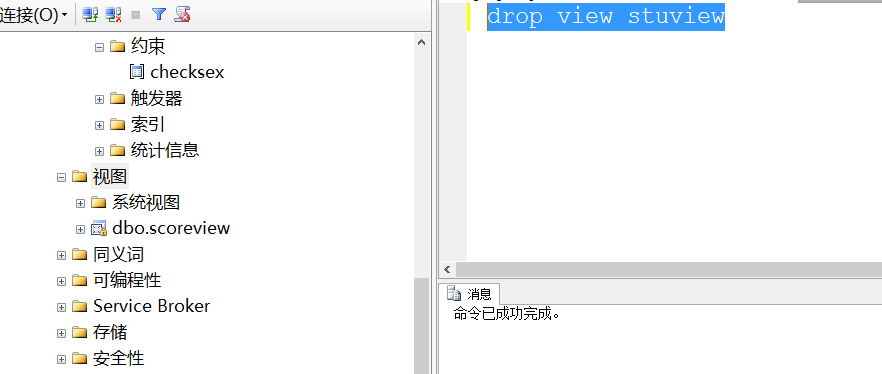
From student

Where zhuanye ='计算机'



6.删除视图

drop view stuview



7.视图加密

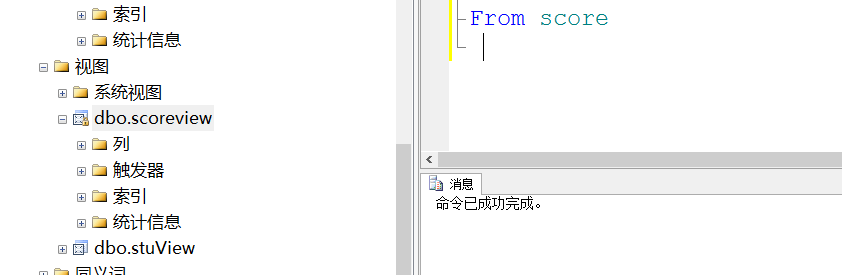
Create View scoreview

WITH ENCRYPTION --视图加密语句

As

Select \*

From score



六.约束

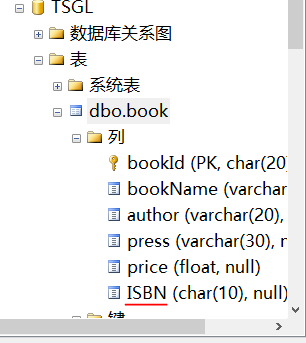
1.增加列

为book表增加ISBN列 类型 char（10）

use TSGL

alter table book

add ISBN char(10)

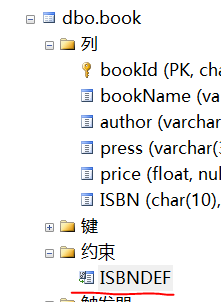


2.为ISBN列增加缺省值约束，约束名ISBNDEF 缺省值为‘71110859449’

use TSGL

alter table book

add constraint ISBNDEF default '7111085949' for ISBN



3.为reader的tel列添加CHECK约束，要求电话号4位数 约束名TEL

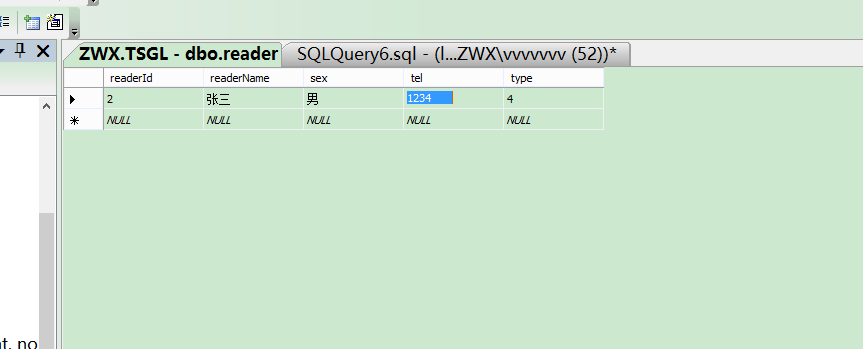
use TSGL

alter table reader

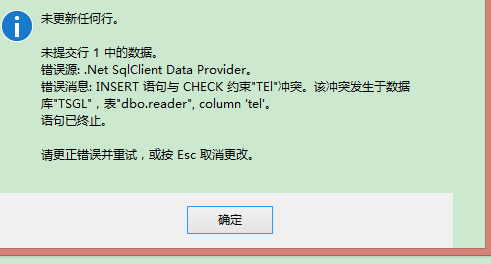
add constraint TEl

check(tel like ('\_\_\_\_'))

输入1234 可以



输入12345



4.（1）删除book表中ISBN列增加缺省值约束

alter table book

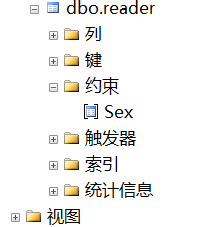
drop constraint ISBNDEF



（2）删除reader表中TEL列的check约束

alter table reader

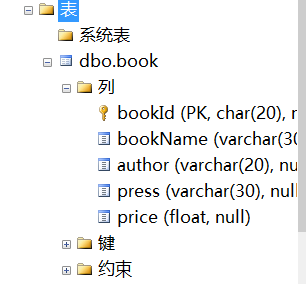
drop constraint TEL

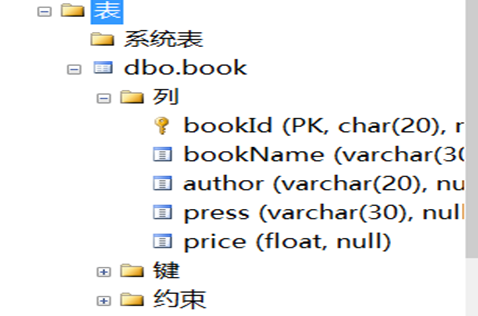


5.删除列ISBN

alter table book

drop column ISBN





6.游标

declare @a varchar,

@b char(8)

declare s cursor scroll

for select st\_id,st\_name from student

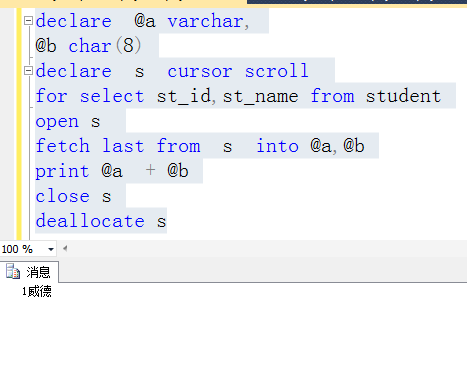
open s

fetch last from s into @a,@b

print @a + @b

close s

deallocate s



7.存储过程

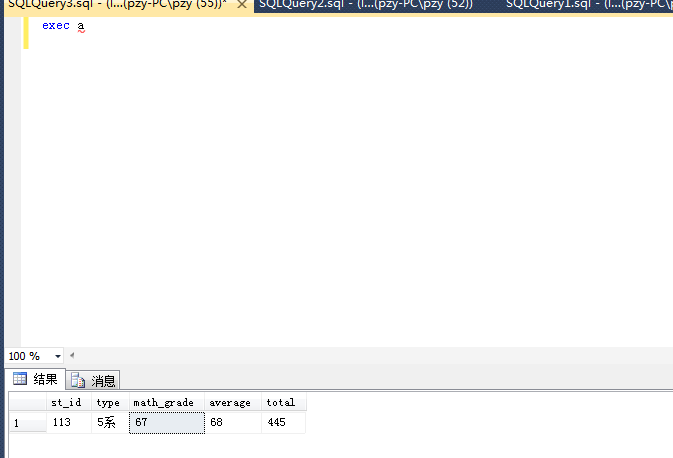
（1）

Create Procedure a

As

Select \* from score

Where math\_grade<70



（2）不带参数的存储过程

Create Procedure a3 @a int

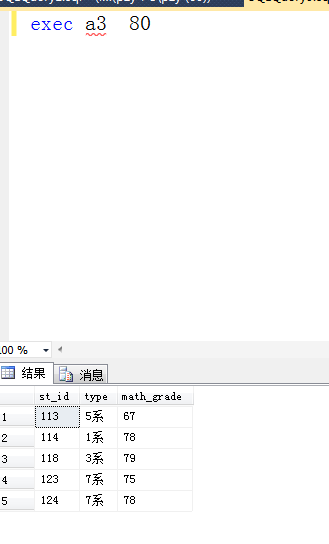
as

Select st\_id,type,math\_grade

from score

Where math\_grade<@a

exec a3 80



（3）默认参数

Create Procedure b1 @a int = null

As

IF @a IS NULL

Begin

select st\_id,type,average from score

where average< 70

End

Else

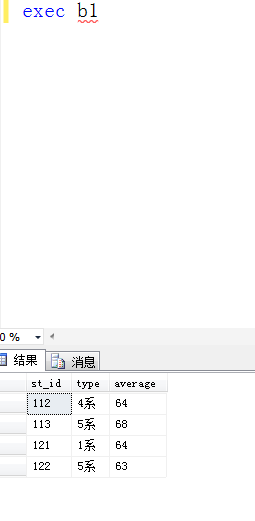
Begin

select st\_id,type,average from score

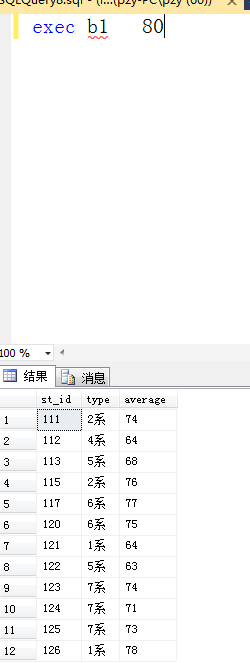
where average < @a

End

exec b1



exec b1 80



8.触发器

create trigger d1Insert

on d1

after insert

as

declare @a int

if update (math\_grade)

select @a=math\_grade from inserted

print @a

insert into d1

values ('132','2系',60,70,440)

