**Задание 1 (NF)**

1. Привести нермализованную таблицу из задания к 1NF и создать таблицу с данными для ее
2. Привести 1NF к 2NF, а 2NF к 3NF

**Задание 2 (views)**

1. На основании 1NF создать представления представляющие собой 2NF
2. На основании представлений 2NF создать представления представляющие собой 3NF

**Задание 3 (подзапросы, добавление данных)**

1. На основании представлений из 3NF создать таблицы и вставить данные в таблицы для 3NF с необходимыми FK для этой нормальной формы.
2. Создать представление выводящее базу данныз в 1NF на основании данных из таблиц для 3NF.
3. Написать запрос сравнивающий данные из представления для 1NF (см. Зад 2.1) и данные в таблице для 1NF и разницу вывести на экран.

Код скриптов:

2nf

create View `2nfView\_driverstable` As select

championship.drivernf1.`Pos.` As `Pos.`,

championship.drivernf1.DriverName As DriverName,

championship.drivernf1.DriverSurname As DriverSurname,

championship.drivernf1.`Points driver` As `Points driver`,

championship.drivernf1.Constructor as Constructor,

championship.drivernf1.`Year` as `Year` from

championship.drivernf1;

Select \* from `2nfView\_driverstable`;

Constructor Points Constructors Pos. Constructors ConstructorsCountry

create View `2nfView\_constructorstable` As select

championship.drivernf1.ConstructorsCountry As ConstructorsCountry,

championship.drivernf1.Constructor As Constructor,

championship.drivernf1.`Pos. Constructors` As `Pos. Constructors`,

championship.drivernf1.`Points Constructors` as `Points Constructors`,

championship.drivernf1.`Year` as `Year` from

championship.drivernf1;

Select \* from `2nfView\_constructorstable`;

create View `2nfView\_drivers` As select

championship.drivernf1.DriverName As DriverName,

championship.drivernf1.DriverSurname As DriverSurname,

championship.drivernf1.DriverCountry As DriverCountry

from

championship.drivernf1;

Select \* from `2nfView\_constructorstable`;

3nf

create View `3nfView\_driverstable` As select

`Pos.` As `Pos.`,

CONCAT(DriverName," ",DriverSurname) As DriverId,

`Points driver` As `Points driver`,

Constructor as Constructor,

`Year` as `Year` from

championship.`2nfView\_driverstable`;

create View `3nfView\_constructorstable` As select

ConstructorsCountry As ConstructorsCountry,

Constructor As Constructor,

`Pos. Constructors` As `Pos. Constructors`,

`Points Constructors` as `Points Constructors`,

`Year` as `Year` from

championship.2nfview\_constructorstable;

Select \* from `3nfView\_constructorstable`;

create View `3nfView\_drivers` As select

CONCAT(DriverName," ",DriverSurname) As DriverId,

DriverCountry As DriverCountry

from

championship.2nfview\_drivers;

Select \* from `3nfView\_constructorstable`;

task3

create tables

create table `3nfTable\_driverstable` As select

`Pos.` As `Pos.`,

DriverId As DriverId,

`Points driver` As `Points driver`,

Constructor as Constructor,

`Year` as `Year` from

championship.`3nfView\_driverstable`;

create table `3nfTable\_constructorstable` As select

ConstructorsCountry As ConstructorsCountry,

Constructor As Constructor,

`Pos. Constructors` As `Pos. Constructors`,

`Points Constructors` as `Points Constructors`,

`Year` as `Year` from

championship.3nfview\_constructorstable;

Select \* from `3nfTable\_constructorstable`;

create table `3nfTable\_drivers` As select

DriverId As DriverId,

DriverCountry As DriverCountry

from

championship.3nfview\_drivers;

Select \* from `3nfTable\_constructorstable`;

create 1NF from 3NF

create view `1nfView` As select

championship.`3nfView\_driverstable`.`Pos.` As `Pos.`,

championship.`3nfView\_driverstable`.`DriverId` As `Driver`,

championship.`3nfView\_driverstable`.`Points driver` As `Points driver`,

championship.`3nfView\_driverstable`.Constructor as Constructor,

championship.`3nfView\_driverstable`.`Year` as `Year`,

a.ConstructorsCountry As ConstructorsCountry,

a.`Pos. Constructors` As `Pos. Constructors`,

a.`Points Constructors` as `Points Constructors`,

b.DriverCountry As DriverCountry

from

championship.`3nfView\_driverstable`

inner join championship.3nfview\_drivers as b on b.DriverId = championship.`3nfView\_driverstable`.DriverId

inner join championship.3nfview\_constructorstable as a on a.Constructor = championship.`3nfView\_driverstable`.Constructor;

select \*

from championship.drivernf1

where not exists(

select \*

from 1nfView

where 1nfView.DriverId= CONCAT(championship.drivernf1.DriverName,” ”, championship.drivernf1.DriverSurname)

);