Relational Databases with MySQL Week 9 Coding Assignment

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Points possible: 70

Category	Criteria	% of Grade
Functionality	Does the code work?	25
Organization	Is the code clean and organized? Proper use of white space, syntax, and consistency are utilized. Names and comments are concise and clear.	25
Creativity	Student solved the problems presented in the assignment using creativity and out of the box thinking.	25
Completeness	All requirements of the assignment are complete.	25

Instructions: Using a text editor of your choice, write the queries that accomplishes the objectives listed below. Take screenshots of the queries and results and paste them in this document where instructed below. Create a new repository on GitHub for this week's assignments and push this document to the repository. Additionally, push an .sql file with all your queries and your ERD to the same repository. Add the URL for this week's repository to this document where instructed and submit this document to your instructor when complete.

Coding Steps:

You have been asked to create a database for a new social media application that your company is developing.

The database must store user data such as username, email, password, etc...

Users are able to post and comment. So, your database must also store post and comment data.

We need to know which user made which posts.

We also need to know which user made which comments, and which post a comment is on.

Posts and comments should both include the time they were created, and what the content of the post or comment is.

Create an Entity Relationship Diagram (ERD) using draw.io to model the database you will create. Insert a screenshot of the ERD in the screenshots section below.

Write a SQL script to create the database. Insert a screenshot of the SQL in your script.

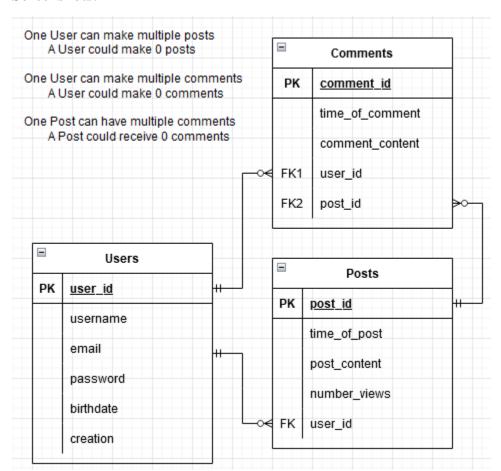
Hints:

You will only need three tables.

Two tables will have foreign key references.

One table will have two foreign key references.

Screenshots:



```
1 •
       create database if not exists socialmedia_project9;
2 •
       use socialmedia_project9;
       drop table if exists posts;
3
       drop table if exists users;
       drop table if exists comments;
5 •
6
7 • ⊖ create table users (
           user_id int not null auto_increment,
8
9
           username varchar(20) not null,
           email varchar(60) not null,
10
           password varchar(30) not null,
11
           birth_date date not null,
12
           creation datetime not null,
13
           primary key (user_id)
14
15
       );
16
17 • ⊖ create table posts (
18
           post_id int not null auto_increment,
           time_of_post datetime not null,
19
20
           message_content tinytext not null,
           number_views int(8) not null,
21
           user_id int not null,
22
           primary key (post_id),
23
24
           foreign key (user_id) references users (user_id)
25
       );
26
27 • ⊖ create table comments (
           comment_id int not null auto_increment,
28
29
           time of comment datetime not null,
           comment_content tinytext not null,
30
           user_id int not null,
31
           post_id int not null,
32
33
           primary key (comment_id),
           foreign key (user_id) references users (user_id),
34
           foreign key (post_id) references posts (post_id)
35
36
       );
```

```
mysql> desc users;
 Field
              | Type
                             Null | Key | Default | Extra
 user id
               int
                                     PRI
                                           NULL
                                                     auto_increment
                             NO
               varchar(20)
 username
                             NO
                                           NULL
 email
               varchar(60)
                             NO
                                           NULL
 password
               varchar(30)
                             NO
                                           NULL
 birth date
               date
                             NO
                                           NULL
 creation
               datetime
                             NO
                                           NULL
6 rows in set (0.01 sec)
mysql> desc posts;
 Field
                    Type
                               Null | Key | Default
                                                       Extra
 post id
                               NO
                                                       auto increment
                    int
                                       PRI
                                             NULL
 time_of_post
                    datetime
                               NO
                                             NULL
 message_content
                    tinytext
                                             NULL
                               NO
 number views
                               NO
                    int
                                             NULL
 user_id
                    int
                               NO
                                             NULL
                                       MUL
5 rows in set (0.00 sec)
mysql> desc comments;
 Field
                    Type
                               Null | Key
                                             Default
 comment_id
                    int
                               NO
                                       PRI
                                             NULL
                                                       auto_increment
 time of comment
                                             NULL
                    datetime
                               NO
 comment_content
                    tinytext
                                             NULL
                               NO
 user_id
                    int
                               NO
                                       MUL
                                             NULL
 post_id
                    int
                               NO
                                       MUL
                                             NULL
 rows in set (0.00 sec)
```

URL to GitHub Repository:

https://github.com/tylerjlivermore/Week9_MySQL_CreateDatabase