DB Best practices - Tips for Better Database Design

- Naming convention table and column names to use camel case
- Don't duplicate the fields unless until affecting the performance(this is very few scenario's applicable)
- Properly use field type
- Properly use index(Foreign key) constrains
- Tables mandatory fields (id, isActive, createAt, updatedAt)
- Don't store images/files in Database.
- Variable type string use UTF-8 encoded format
- Password field always stored encrypted (md5 hacked, should use SHA2+)
- Don't hold too many fields in single table (Split rarely use data like user & user info).
- Never ever import production data in development or test environment.

DB Privilege - Refer here

- Create minimum two privileges (Application can access only for the CRED operation. Alter Table kind of permissions should be Restricted)
 - Keep root user with: SELECT, INSERT, UPDATE, DELETE, CREATE, DROP, RELOAD, PROCESS, REFERENCES, INDEX, ALTER, SHOW DATABASES, CREATE TEMPORARY TABLES, LOCK TABLES, EXECUTE, REPLICATION SLAVE, REPLICATION CLIENT, CREATE VIEW, SHOW VIEW, CREATE ROUTINE, ALTER ROUTINE, CREATE USER, EVENT, TRIGGER

- Create dev user with: SELECT, INSERT, UPDATE, DELETE, CREATE,
 REFERENCES, INDEX, CREATE TEMPORARY TABLES, CREATE VIEW, SHOW
 VIEW, EXECUTE
- Create App user with: SELECT, INSERT, UPDATE, DELETE, SHOW VIEW, EXECUTE

DB encryption

• Must do the DB encryption

DB Log

Need To Check

Reference

- <u>Ten Common Database Design Mistakes</u>
- <u>Tips for Better Database Design</u>