

MySQL 스프링 게시판

MySQL 사용한 게시판 만들기

MySQL 설치

설치 5.7

mysql.com >> downloads >> MySQL Community (GPL) Downloads >>
MySQL Installer for Windows >> Archives >> 5.7.X >> Download

실행 >> Developer Default

Choosing a Setup Type

Please select the Setup Type that suits your use case.

☒ **Developer Default**

Installs all products needed for MySQL development purposes.

☐ **Server only**

Installs only the MySQL Server product.

☐ **Client only**

Installs only the MySQL Client products, without a server.

☐ **Full**

Installs all included MySQL products and features.

☐ **Custom**

Manually select the products that should be installed on the system.

Setup Type Description

The GUI application to develop for and manage the server.

* MySQL for Visual Studio
To work with the MySQL Server from VS.

* MySQL Connectors
Connector/Net, Java, C/C++, ODBC and others.

* Examples and tutorials
To help you get started with your development.

* Documentation
Allows you to read the documentation offline.

[Next >](#)[Cancel](#)

MySQL Installer

MySQL. Installer

Adding Community

Choosing a Setup Type

Path Conflicts

Download

Installation

Product Configuration

Installation Complete

Path Conflicts

Some products has path conflicts

Here are the list of the products that has path conflicts, please navigate between them and if is necessary change the path or paths below.

Product	Architecture
MySQL Workbench 8.0.33	X64

1 Warnings

You can use the same folder or change it to a new one, take in mind that the install process can overwrite the folder if already exists.

Install Directory:
C:\Program Files\MySQL\MySQL Workbench 8.0

⚠ The selected path already exists.

< Back

Next >

Cancel

MySQL Installer

MySQL. Installer

Adding Community

Choosing a Setup Type

Path Conflicts

Download

Installation

Product Configuration

Installation Complete

Download

The following products will be downloaded.

Product	Status	Progress	Notes
 MySQL Server 5.7.41	Ready to download		
 MySQL Workbench 8.0.33	Ready to download		
 MySQL Shell 8.0.33	Ready to download		
 MySQL Router 8.0.33	Ready to download		
 MySQL Documentation 5.7.41	Ready to download		
 Samples and Examples 5.7.41	Ready to download		

Click [Execute] to download the following packages.

< Back

Execute

Cancel

MySQL Installer

MySQL. Installer

Adding Community

Choosing a Setup Type

Path Conflicts

Download




Installation

Product Configuration

Installation Complete

Download

The following products will be downloaded.

Product	Status	Progress	Notes
 MySQL Server 5.7.41	Downloading...	26%	
 MySQL Workbench 8.0.33	Downloaded		
 MySQL Shell 8.0.33	Downloading...	36%	
 MySQL Router 8.0.33	Downloading...	48%	
 MySQL Documentation 5.7.41	Downloading...	62%	

2: Download of package 'MySQL Workbench 8.0.33' succeeded

1: Download of product 'mysql-server' started from <https://cdn.mysql.com/Downloads/MySQL-5.7/mysql-5.7.41-winx64.msi>

3: Download of product 'mysql-shell' started from <https://cdn.mysql.com/Downloads/MySQL-Shell/mysql-shell-8.0.33-windows-x86-64bit.msi>

4: Download of product 'mysql-router' started from <https://cdn.mysql.com/Downloads/MySQL-Router/mysql-router-8.0.33-winx64.msi>

5: Download of product 'documents' started from <https://cdn.mysql.com/Downloads/MySQLInstaller/mysql-documents-5.7.41.msi>

6: Download of product 'examples' started from <https://cdn.mysql.com/Downloads/MySQLInstaller/mysql-examples-5.7.41.msi>

6: Download of package 'Samples and Examples 5.7.41' succeeded

< Hide Details

< Back

Cancel

MySQL Installer

MySQL. Installer

Adding Community

Choosing a Setup Type

Path Conflicts

Download




Installation

Product Configuration

Installation Complete

Download

The following products will be downloaded.

Product	Status	Progress	Notes
 MySQL Server 5.7.41	Downloaded		
 MySQL Workbench 8.0.33	Downloaded		
 MySQL Shell 8.0.33	Downloaded		
 MySQL Router 8.0.33	Downloaded		
 MySQL Documentation 5.7.41	Downloaded		

https://cdn.mysql.com/Downloads/MySQL-Shell/mysql-shell-8.0.33-windows-x86-64bit.msi

4: Download of product 'mysql-router' started from https://cdn.mysql.com/Downloads/MySQL-Router/mysql-router-8.0.33-winx64.msi

5: Download of product 'documents' started from https://cdn.mysql.com/Downloads/MySQLInstaller/mysql-documents-5.7.41.msi

6: Download of product 'examples' started from https://cdn.mysql.com/Downloads/MySQLInstaller/mysql-examples-5.7.41.msi

6: Download of package 'Samples and Examples 5.7.41' succeeded

5: Download of package 'MySQL Documentation 5.7.41' succeeded

4: Download of package 'MySQL Router 8.0.33' succeeded

3: Download of package 'MySQL Shell 8.0.33' succeeded

1: Download of package 'MySQL Server 5.7.41' succeeded

< Hide Details

< Back

Next >

Cancel

MySQL Installer

MySQL. Installer

Adding Community

Choosing a Setup Type

Path Conflicts

Installation

Product Configuration

Installation Complete

Installation

The following products will be installed.

Product	Status	Progress	Notes
 MySQL Server 5.7.41	Ready to Install		
 MySQL Workbench 8.0.33	Ready to Install		
 MySQL Shell 8.0.33	Ready to Install		
 MySQL Router 8.0.33	Ready to Install		
 MySQL Documentation 5.7.41	Ready to Install		
 Samples and Examples 5.7.41	Ready to Install		

Click [Execute] to install the following packages.

< Back

Execute

Cancel

MySQL Installer

MySQL. Installer

Adding Community

Choosing a Setup Type

Path Conflicts

Installation

Product Configuration

Installation Complete

Installation

The following products will be installed.

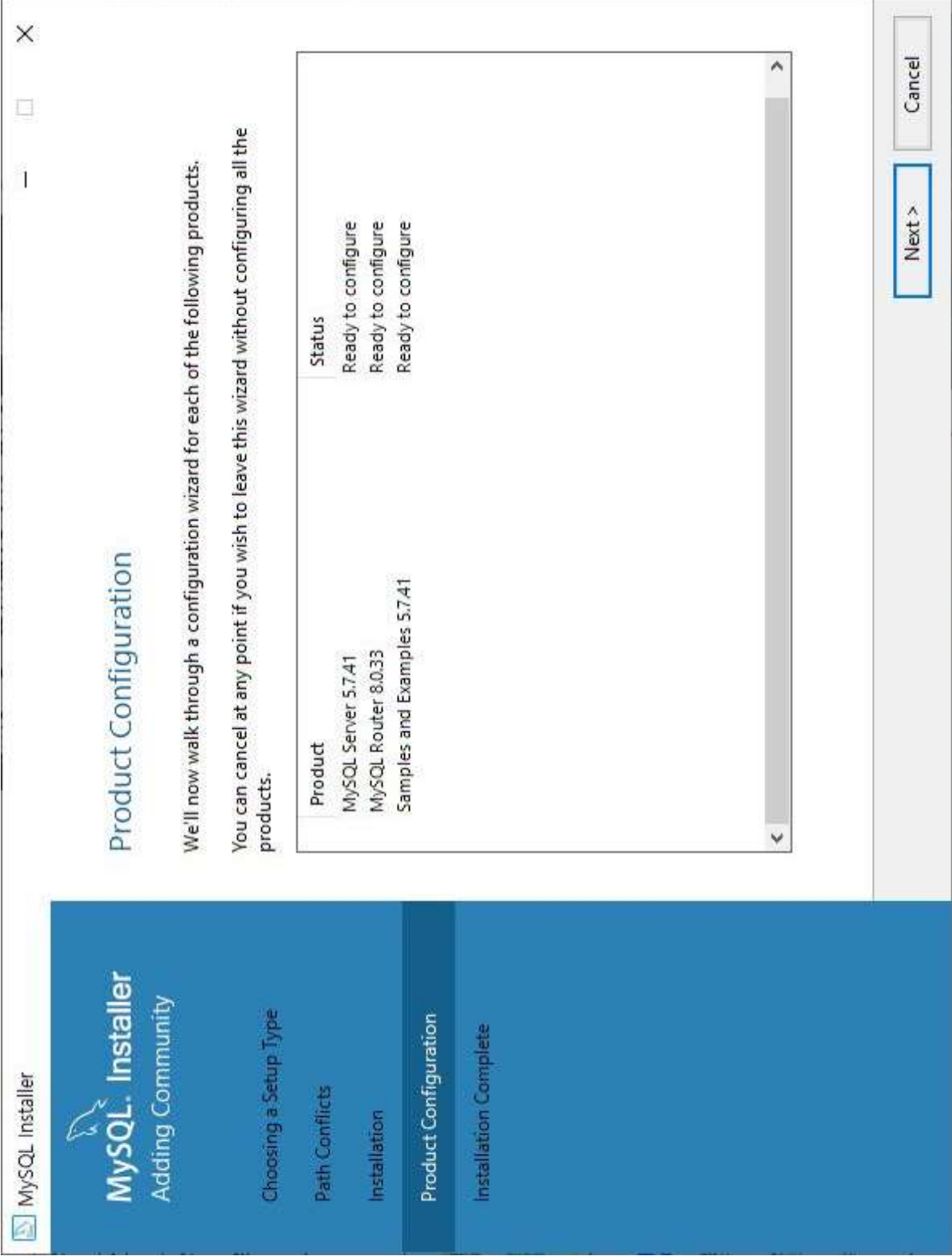
Product	Status	Progress	Notes
 MySQL Server 5.7.41	Complete		
 MySQL Workbench 8.0.33	Installing	13%	
 MySQL Shell 8.0.33	Ready to Install		
 MySQL Router 8.0.33	Ready to Install		
 MySQL Documentation 5.7.41	Ready to Install		
 Samples and Examples 5.7.41	Ready to Install		

Show Details >

< Back

Execute

Cancel



MySQL Installer

MySQL Server 5.7.41

Type and Networking

Accounts and Roles

Windows Service

Server File Permissions

Apply Configuration

Type and Networking

Server Configuration Type

Choose the correct server configuration type for this MySQL Server installation. This setting will define how much system resources are assigned to the MySQL Server instance.

Config Type: Development Computer

Connectivity

Use the following controls to select how you would like to connect to this server.

☒ TCP/IP

Port: 3306

☒ Open Windows Firewall port for network access

☐ Named Pipe

Pipe Name: MYSQL

☐ Shared Memory

Memory Name: MYSQL

Advanced Configuration

Select the check box below to get additional configuration pages where you can set advanced and logging options for this server instance.

☐ Show Advanced and Logging Options

Next > Cancel

MySQL Installer

MySQL. Installer

MySQL Server 5.7.41

Type and Networking

Accounts and Roles

Windows Service

Server File Permissions

Apply Configuration

MySQL User Account

Please specify the user name, password, and database role.

User Name: scott

Host: <All Hosts (%)>

Role: DB Admin

Authentication: ☒ MySQL

MySQL user credentials

Password:

Confirm Password:

Password strength: Weak

OK

Cancel

Accounts and Roles

Root Account Password

Enter the password for the root account. Please remember to store this password in a safe place.

MySQL Root Password:

Repeat Password:

Password strength: Weak

MySQL User Accounts

Create MySQL user accounts for your users and applications. Assign a role to each user. A user account consists of a set of privileges.

MySQL User Name	Host	User Role
-----------------	------	-----------

Add User

Edit User

Delete

< Back

Next >

Cancel

Root Password : root

user id/pw :

- scott
- tiger

MySQL Installer

MySQL Server 5.7.41

Type and Networking

Accounts and Roles

Windows Service

Server File Permissions

Apply Configuration

MySQL. Installer

MySQL Server 5.7.41

Accounts and Roles

MySQL Root Password

MySQL Root Password:

Repeat Password:

Password strength: Weak

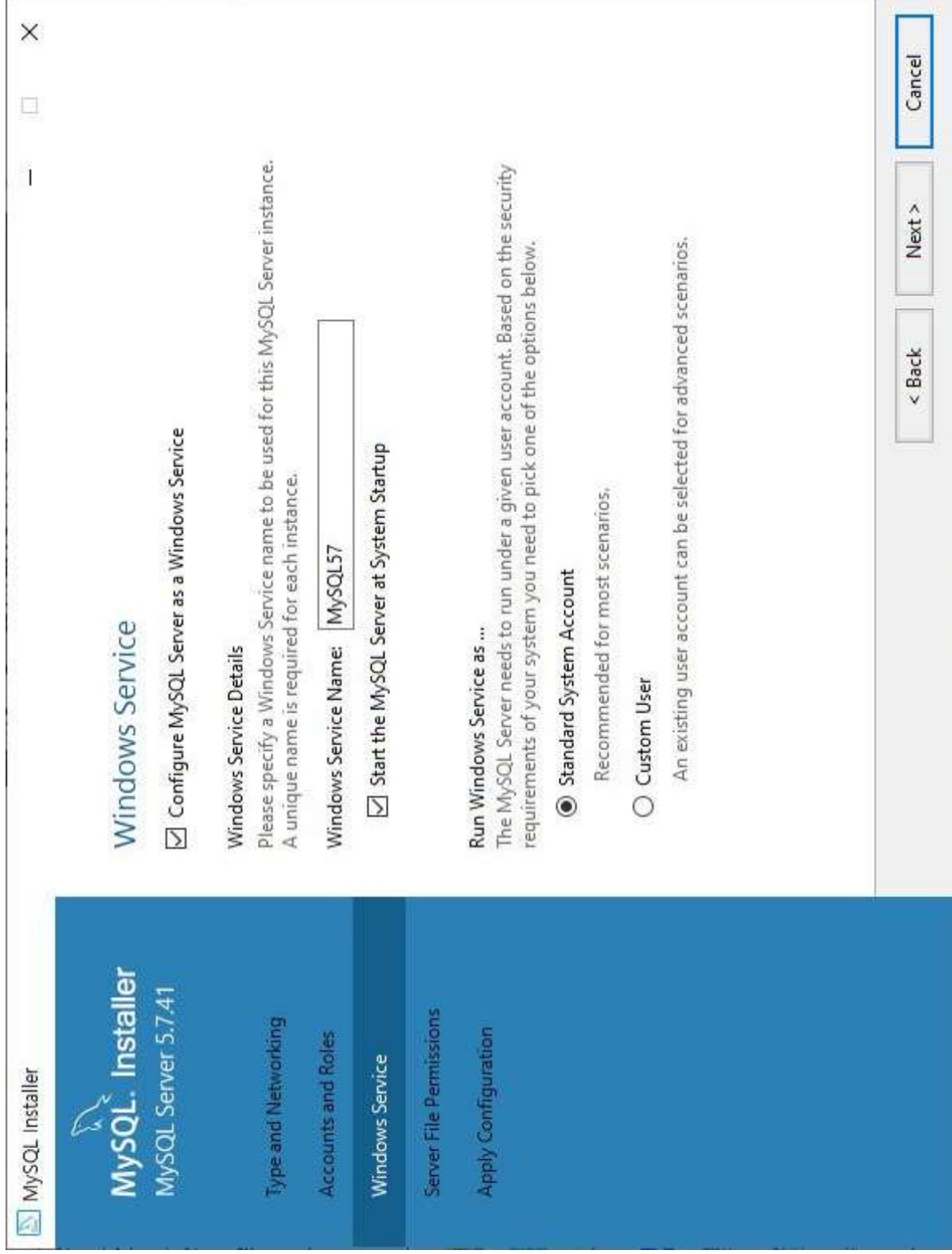
MySQL User Accounts

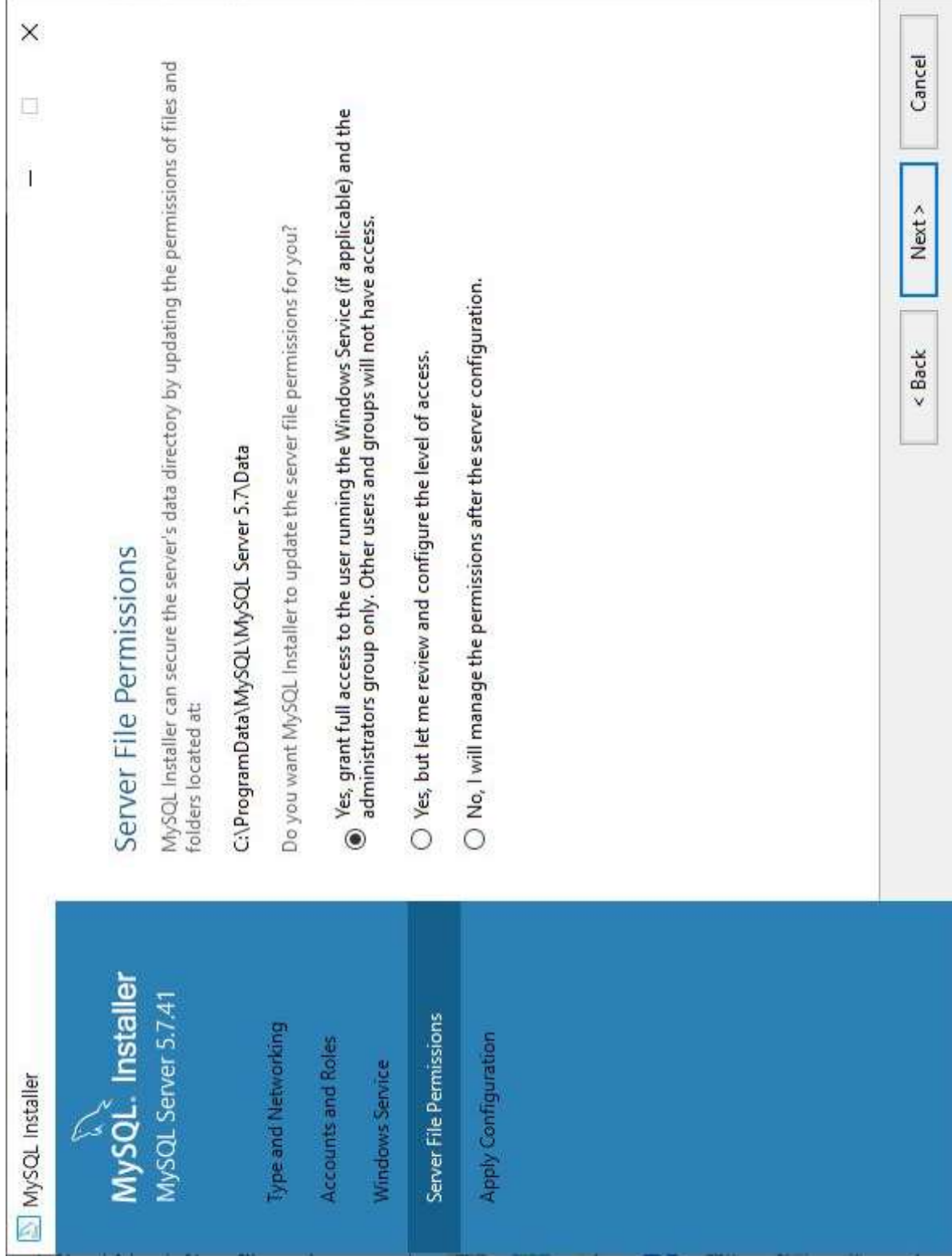
Create MySQL user accounts for your users and applications. Assign a role to the user that consists of a set of privileges.

MySQL User Name	Host	User Role
scott	%	DB Admin

Add User Edit User Delete

< Back Next > Cancel





Apply Configuration

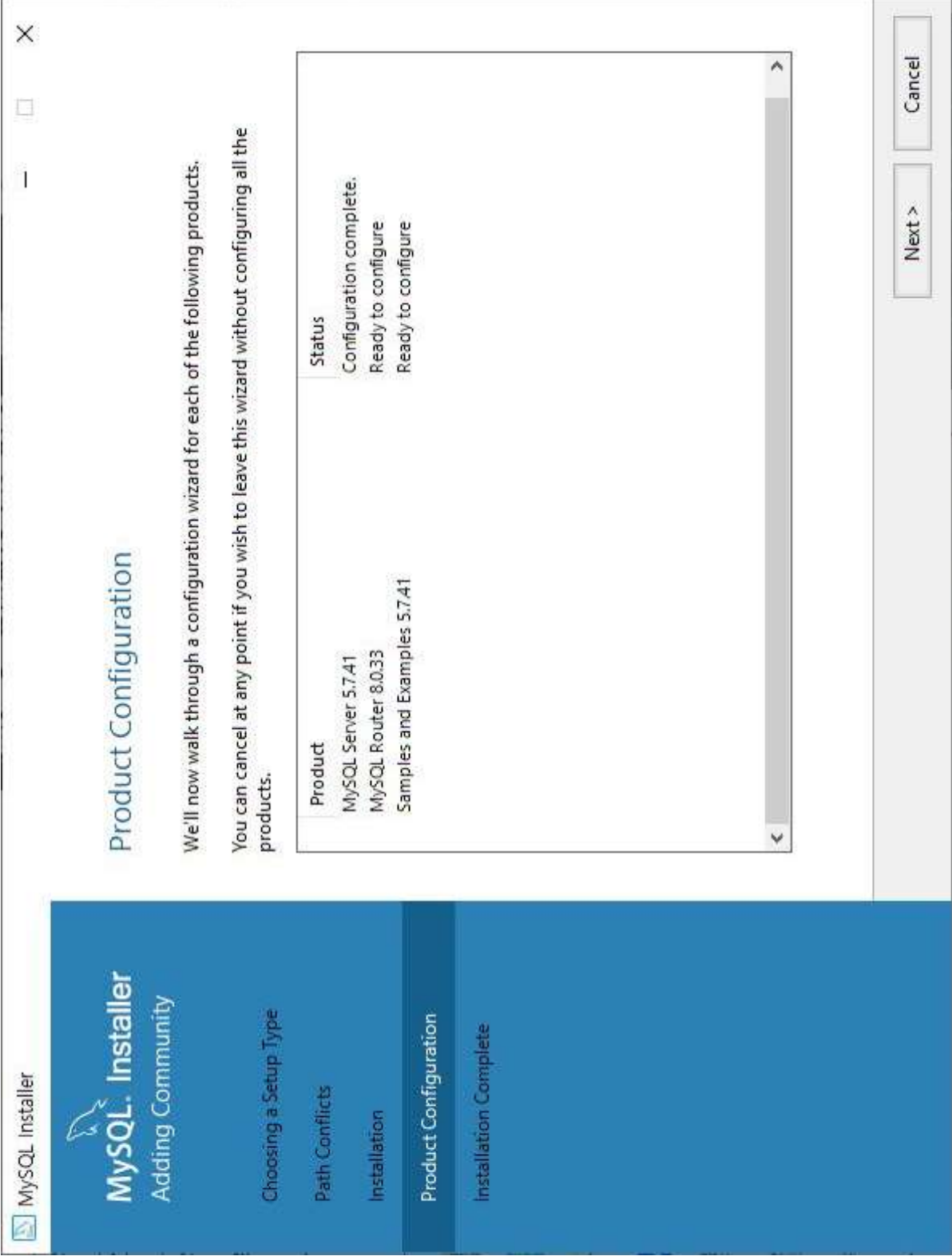
The configuration operation has completed.

Configuration Steps **Log**

- ✓ Writing configuration file
- ✓ Updating Windows Firewall rules
- ✓ Adjusting Windows service
- ✓ Initializing database (may take a long time)
- ✓ Updating permissions for the data folder and related server files
- ✓ Starting the server
- ✓ Applying security settings
- ✓ Creating user accounts
- ✓ Updating the Start menu link

The configuration for MySQL Server 5.7.41 was successful.
Click Finish to continue.

Finish



MySQL Router Configuration

☐ Bootstrap MySQL Router for use with InnoDB Cluster

This wizard can bootstrap MySQL Router to direct traffic between MySQL applications and InnoDB Cluster. Applications that connect to the router will be automatically directed to an available read/write or read-only member of the cluster.

The bootstrapping process requires a connection to InnoDB Cluster. In order to register the MySQL Router for monitoring, use the current Read/Write instance of the cluster.

Hostname:

Port:

3306

Management User:

root

Password:

Test Connection

MySQL Router requires specification of a base port (between 80 and 65532). The first port is used for classic read/write connections. The other ports are computed sequentially after the first port. If any port is indicated to be in use, please change the base port.

Classic MySQL protocol connections to InnoDB Cluster:

Read/Write:

6446

Read Only:

6447

X Protocol connections to InnoDB Cluster:

Read/Write:

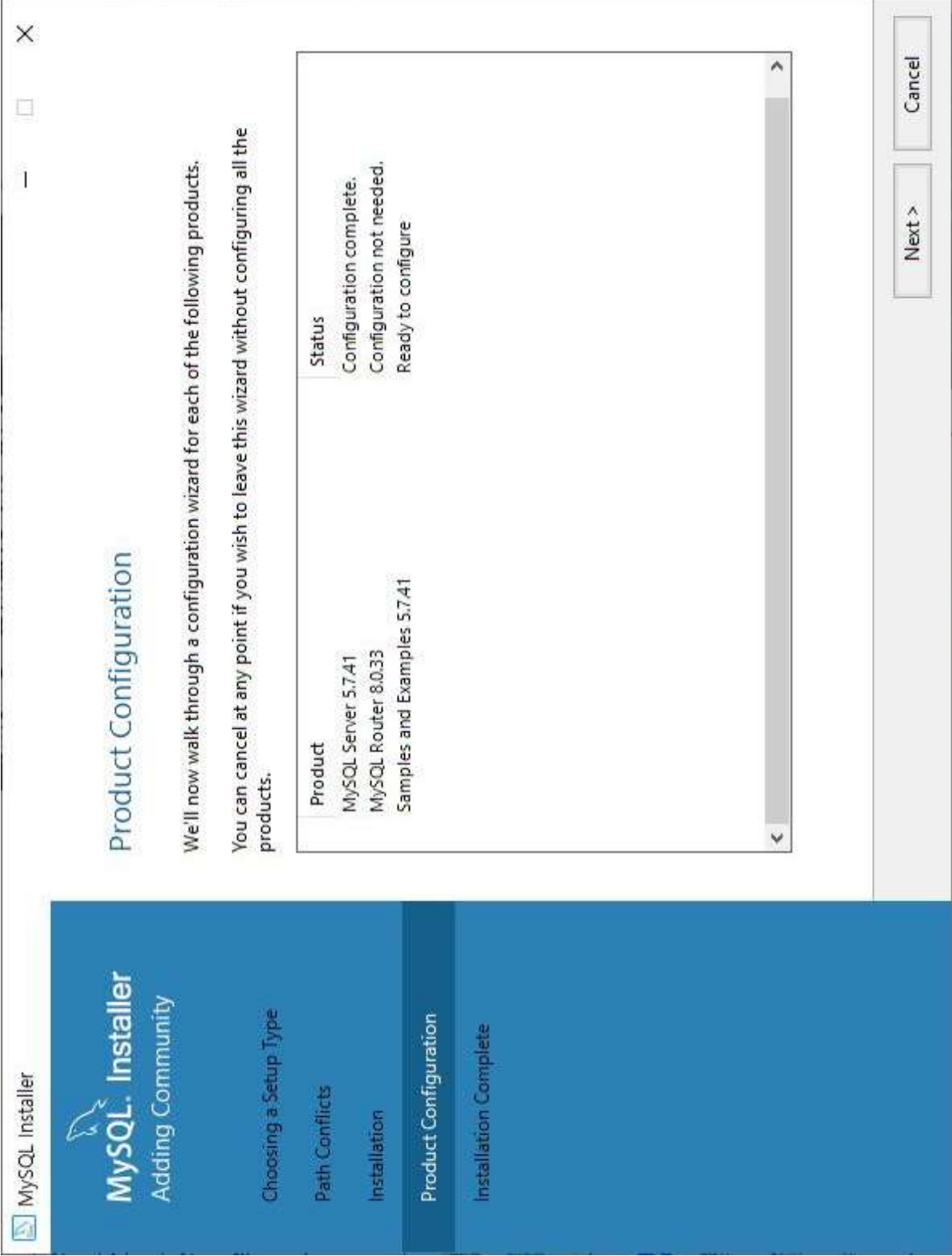
6448

Read Only:

6449

Finish

Cancel



MySQL Installer

MySQL. Installer
Samples and Examples

Connect To Server

Apply Configuration

Connect To Server

Select the MySQL server instances from the list to receive sample schemas and data.

	Server	Port	Arch...	Type	Status
<input checked="" type="checkbox"/>	MySQL Server 5.7.41	3306	X64	Stand-alone Server	Running

Provide the credentials that should be used (requires root privileges).
Click "Check" to ensure they work.

User name:
root

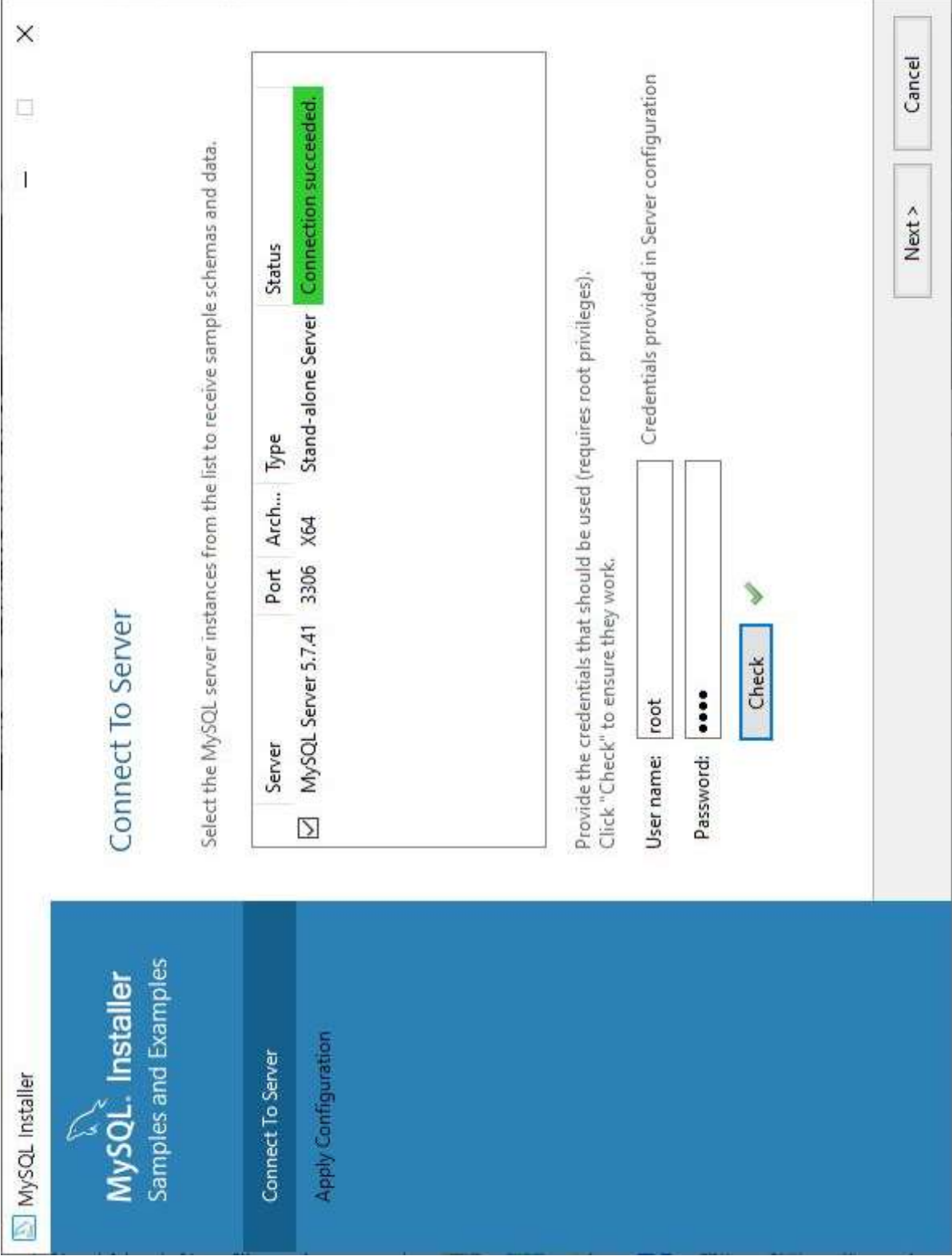
Password:

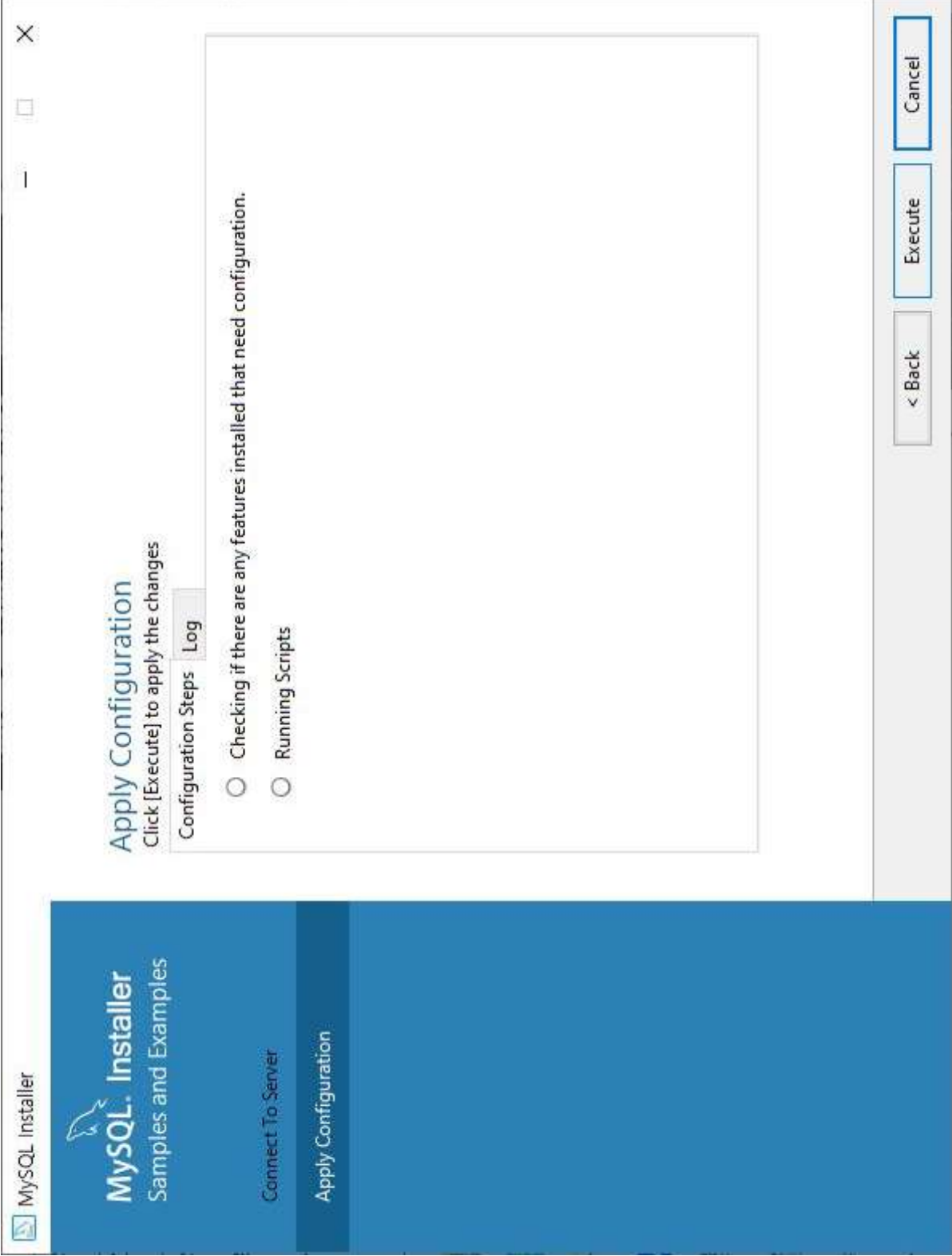
Check

Credentials provided in Server configuration

Next >

Cancel





Apply Configuration

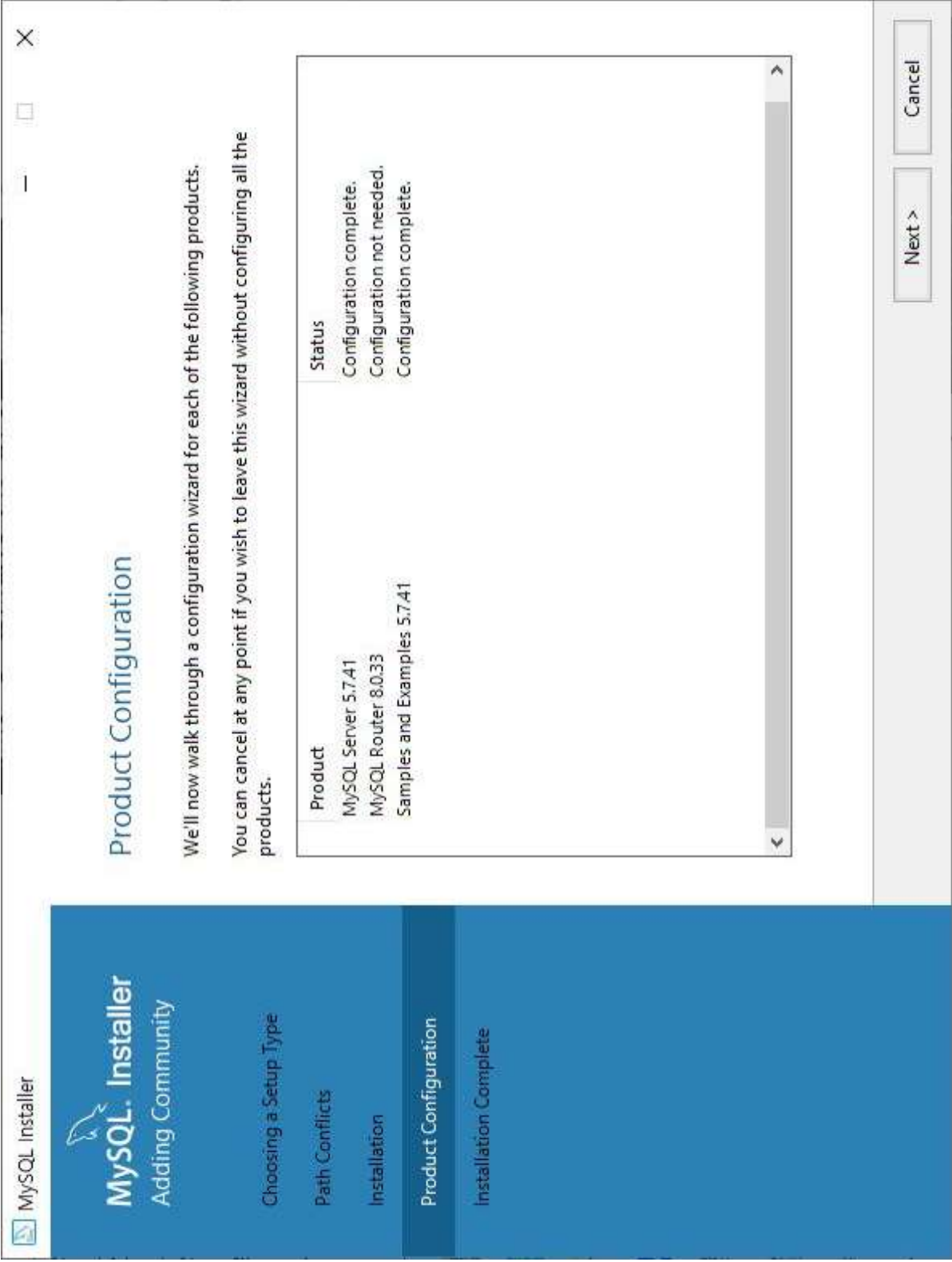
The configuration operation has completed.

Configuration Steps Log

- ✓ Checking if there are any features installed that need configuration.
- ✓ Running Scripts

The configuration for Samples and Examples 5.7.41 was successful.
Click Finish to continue.

Finish



Installation Complete

The installation procedure has been completed.

[Copy Log to Clipboard](#)

- ☒ Start MySQL Workbench after setup
- ☒ Start MySQL Shell after setup

The MySQL Shell is an advanced MySQL client application that can be used to work with single MySQL Server instances. Further, it can be used to create and manage InnoDB Cluster, an integrated solution for high availability and scalability of MySQL databases, without requiring advanced MySQL expertise.



Refer to the following links for documentation, tutorials and examples on MySQL Shell:

[MySQL Shell Documentation](#)

[Setting up a Real World Cluster Blog](#)

[The All New MySQL InnoDB ReplicatSet Blog](#)

[Changing Cluster Options Live Blog](#)

[Finish](#)

설치완료

MySQL 5.7 & Workbench 설치 완료



Welcome to MySQL Workbench

MySQL Workbench is the official graphical user interface (GUI) tool for MySQL. It allows you to design, create and browse your database schemas, work with database objects and insert data as well as design and run SQL queries to work with stored data. You can also migrate schemas and data from other database vendors to your MySQL database.

[Browse Documentation >](#)[Read the Blog >](#)[Discuss on the Forums >](#)

MySQL Connections

Local instance MySQL57

 root

 localhost:3306

Setup New Connection

Connection Name: scott

Type a name for the connection

Connection Method: Standard (TCP/IP)

Method to use to connect to the RDBMS

Parameters

SSL

Advanced

Hostname: 127.0.0.1

Port: 3306

Name or IP address of the server host - and TCP/IP port.

Username: scott

Name of the user to connect with.

Password:

Store in Vault ...

Clear

The user's password. Will be requested later if it's not set.

Default Schema:

Store Password For Connection

Please enter password for the following service:

Service: Mysql@127.0.0.1:3306

User: scott

Password: *****

OK

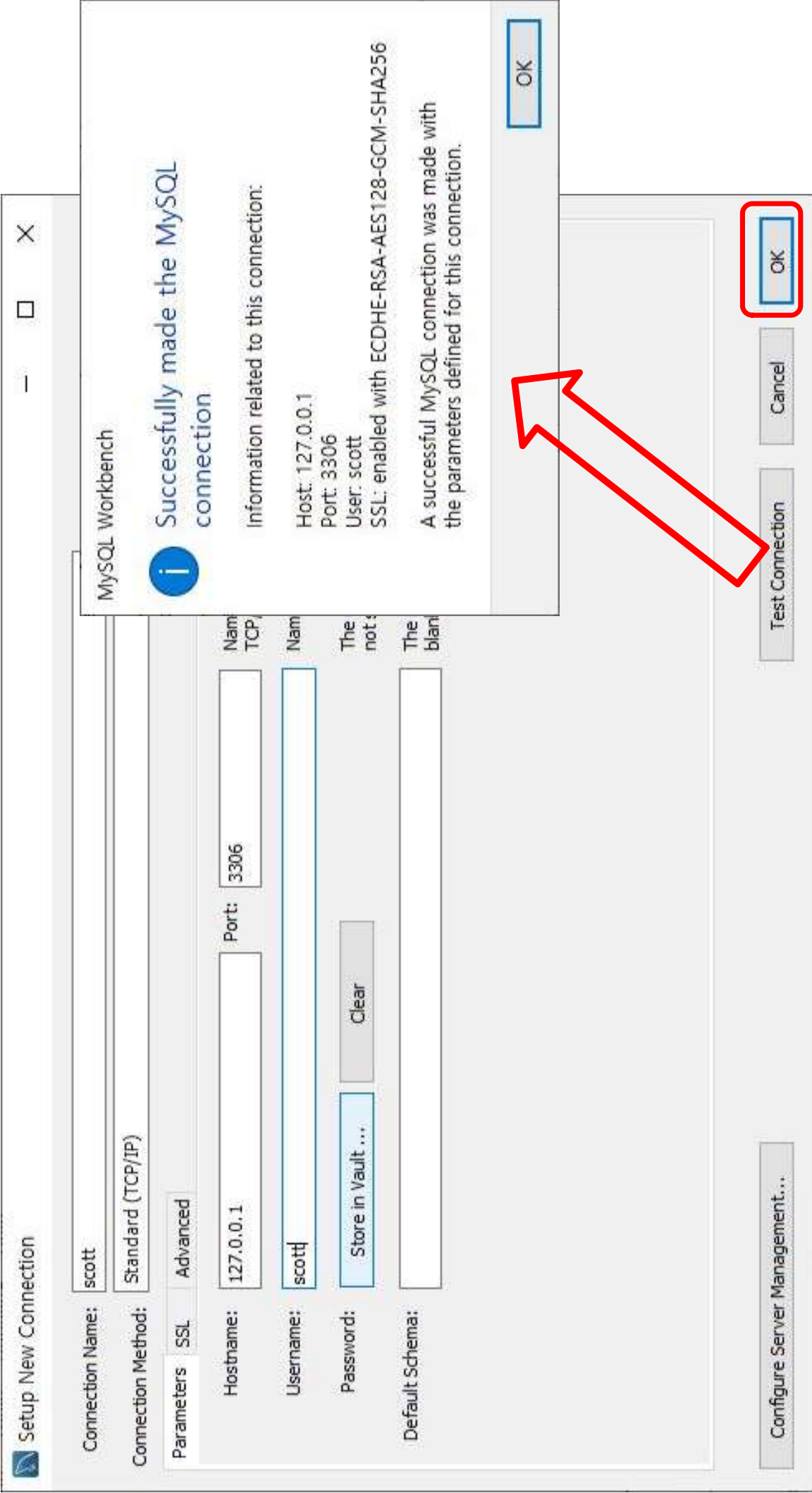
Cancel

Configure Server Management...

Test Connection

Cancel

OK





Welcome to MySQL Workbench

MySQL Workbench is the official graphical user interface (GUI) tool for MySQL. It allows you to design, create and browse your database schemas, work with database objects and insert data as well as design and run SQL queries to work with stored data. You can also migrate schemas and data from other database vendors to your MySQL database.

[Browse Documentation >](#)[Read the Blog >](#)[Discuss on the Forums >](#)

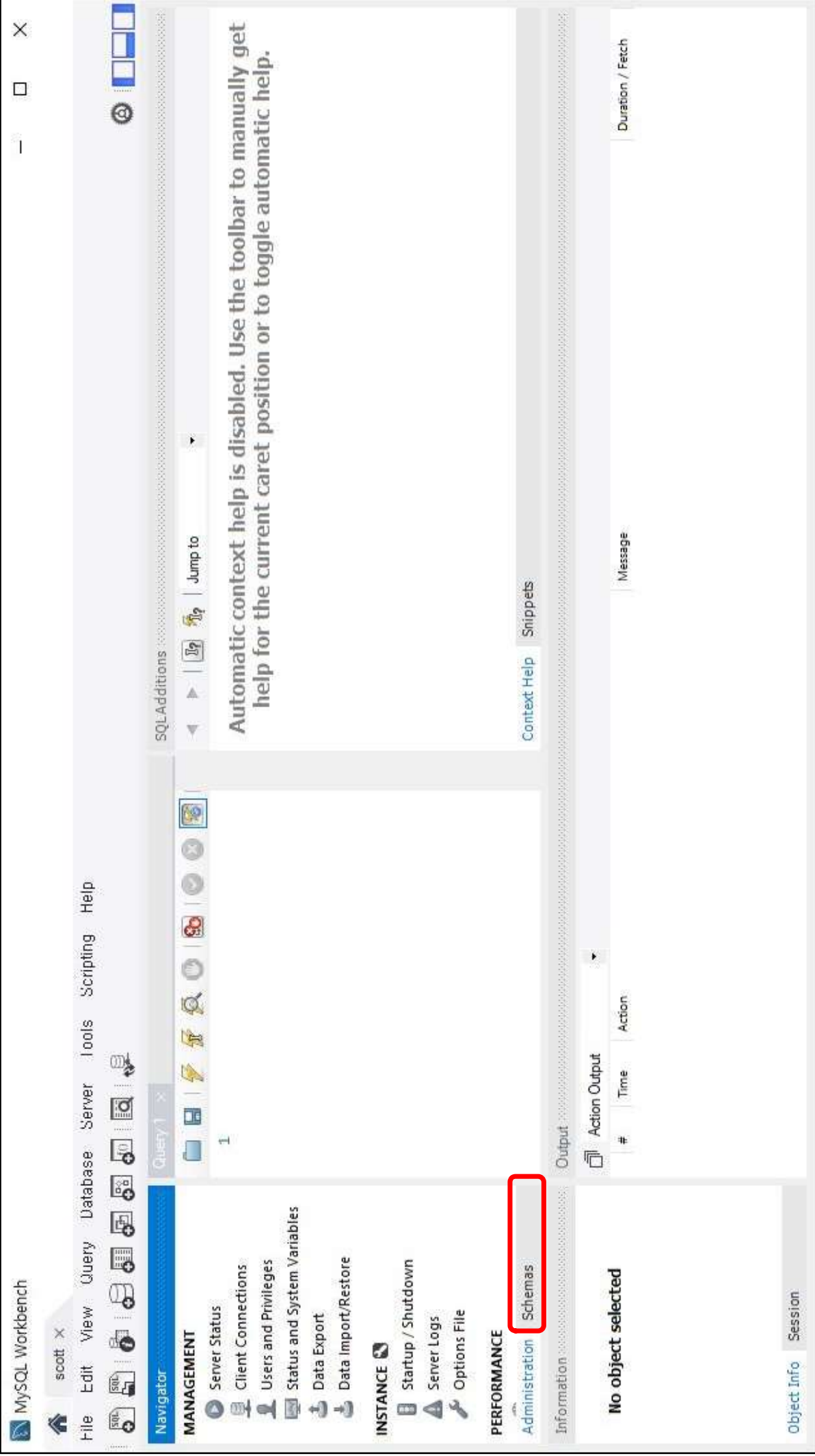
MySQL Connections

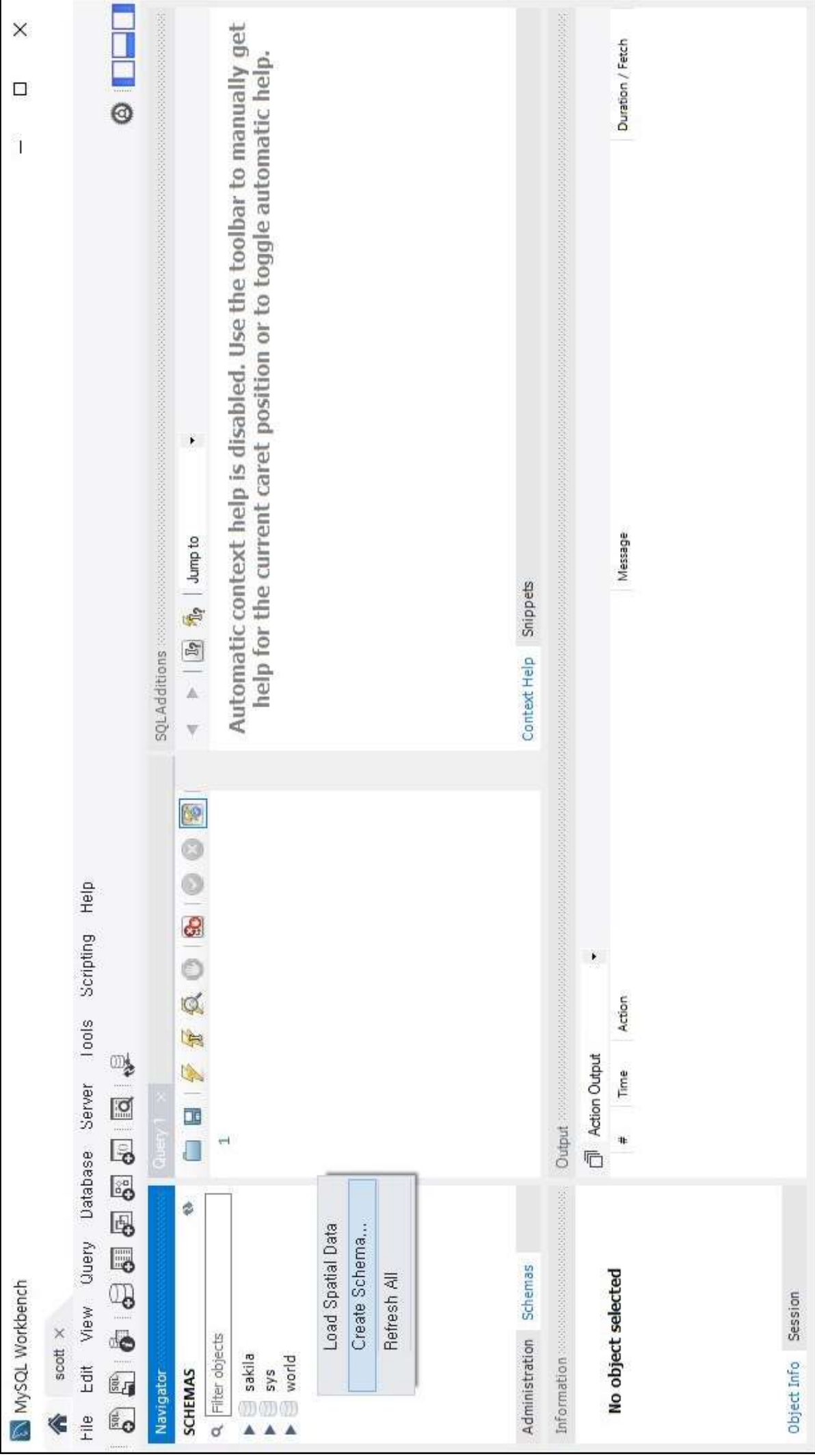
Local instance MySQL57	scott
 root	 scott
 localhost:3306	 127.0.0.1:3306



MySQL 의 새로운 스키마 추가

스키마 구성





Review the SQL Script to be Applied on the Database

Online DDL

Algorithm:

Default



Lock Type:

Default



```
1 CREATE SCHEMA `board` DEFAULT CHARACTER SET utf8 ;
2
```



Back

Apply

Cancel


Apply SQL Script to Database

Review SQL Script

Apply SQL Script

Applying SQL script to the database

The following tasks will now be executed. Please monitor the execution. Press Show Logs to see the execution logs.

 Execute SQL Statements

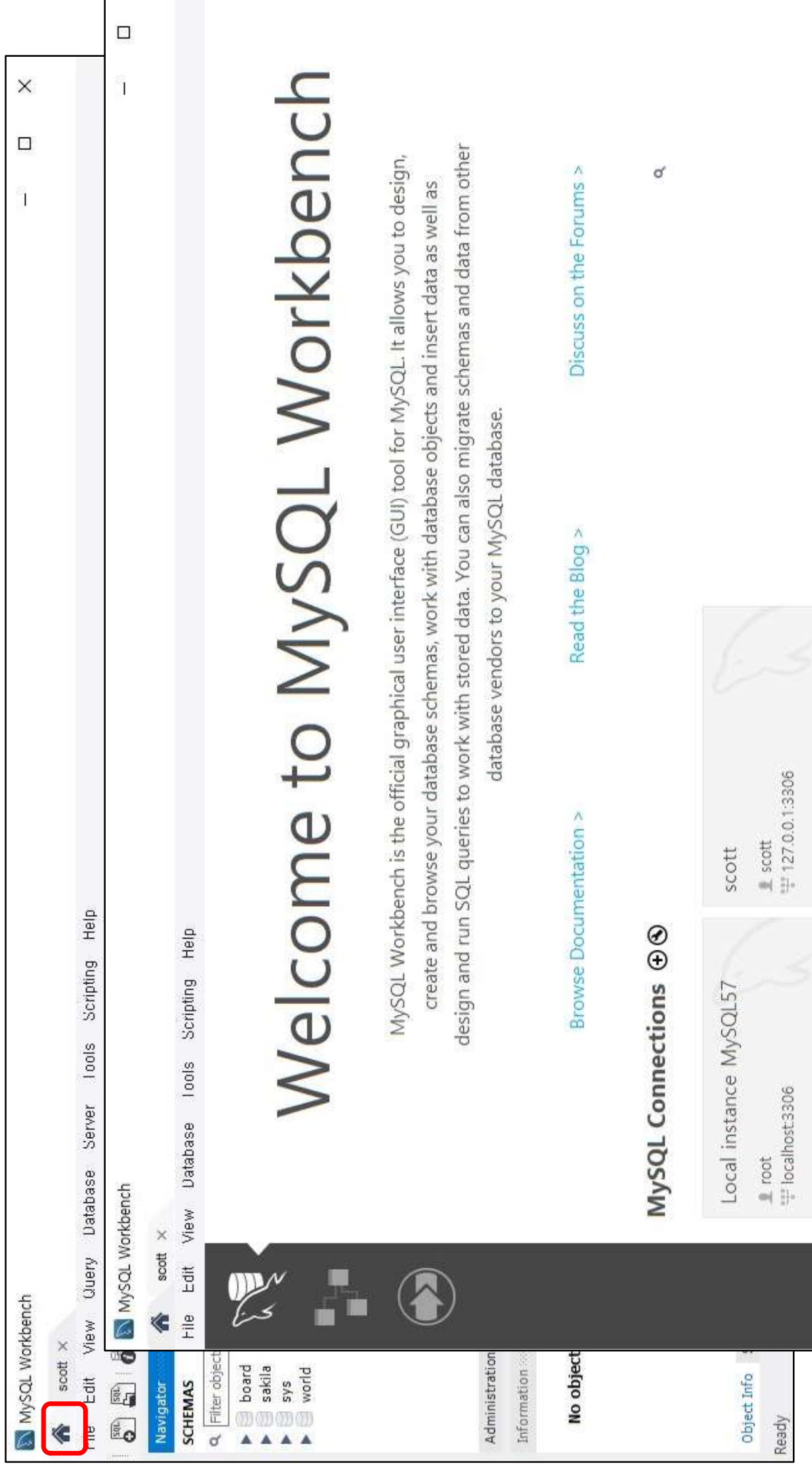
SQL script was successfully applied to the database.

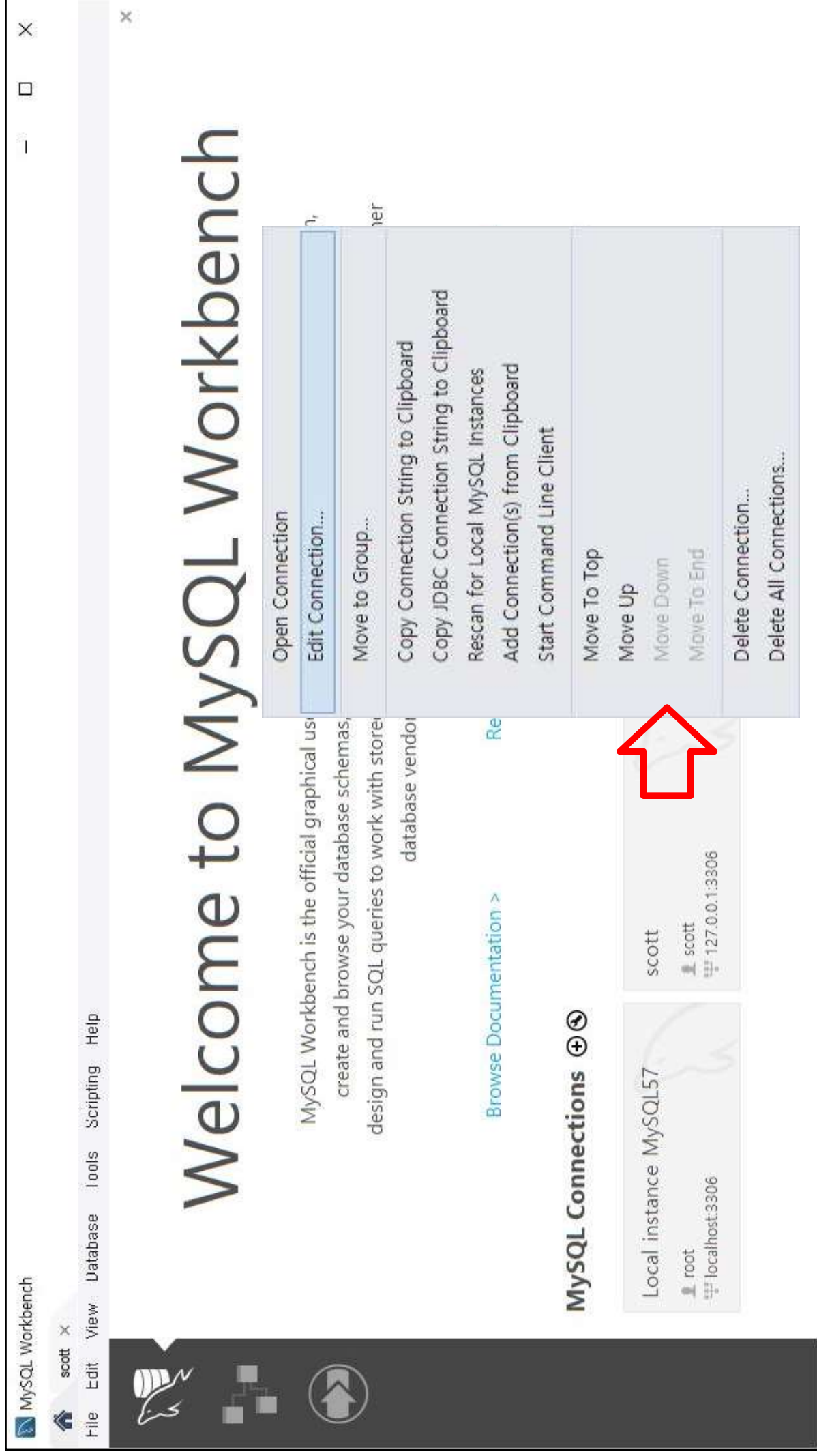
Show Logs

Back

Finish

Cancel





Manage Server Connections

MySQL Connections

Local instance MySQL57

scott

Connection Name: scott

ConnectionRemote ManagementSystem Profile

Method to use to connect to the RDBMS

ParametersSSLAdvanced

Hostname:127.0.0.1Port:3306

Name or IP address of the server host - and TCP/IP port.

Username:scott

Name of the user to connect with.

Password:Store in Vault ...Clear

The user's password. Will be requested later if it's not set.

Default Schema:board

The schema to use as default schema. Leave blank to select it later.

New

Delete

Duplicate

Move Up

Move Down

Test Connection

Close

기본 설치외 추가 설치

MySQL Connector/J

- pom.xml 사용

mvnrepository.com >> mysql >> MySQL ...

<dependency>

<groupId>**com.mysql**</groupId>

<artifactId>**mysql-connector-j**</artifactId>

<version>**8.0.33**</version>

</dependency>

계속...

```
<dependency>
  <groupId>org.springframework</groupId>
  <artifactId>spring-jdbc</artifactId>
  <version>${org.springframework-version}</version>
</dependency>

<dependency>
  <groupId>org.mybatis</groupId>
  <artifactId>mybatis</artifactId>
  <version>3.2.8</version>
</dependency>

<dependency>
  <groupId>org.mybatis</groupId>
  <artifactId>mybatis-spring</artifactId>
  <version>1.2.2</version>
</dependency>
```

오라클 DB 대신 MySQL

```
create sequence board_seq;  
create table board (  
    mId number(4) primary key,  
    mWriter varchar2(100),  
    mContent varchar2(300)  
);
```

Oracle DB

```
DROP TABLE IF EXISTS `board`;  
create table `BOARD` (  
    `MID` INT(4) auto_increment ,  
    `MWRTITER` VARCHAR(100),  
    `MCONTENT` VARCHAR(300),  
    PRIMARY KEY(`MID`)  
)ENGINE=innodb DEFAULT CHARSET=utf8;
```

MySQL - No Sequence

servlet-context.xml 수정

```
<!-- # MySQL dataSource -->
<beans:bean name="dataSource" class="org.springframework.jdbc.datasource.DriverManagerDataSource" >
    <beans:property name="driverClassName" value="com.mysql.cj.jdbc.Driver" />
    <beans:property name="url" value="jdbc:mysql://127.0.0.1:3306/scott?characterEncoding=utf8" />
    <beans:property name="username" value="scott" />
    <beans:property name="password" value="tiger" />
</beans:bean>

<!-- # mybatis SqlSessionFactoryBean # -->
<beans:bean id="sqlSessionFactory" class="org.mybatis.spring.SqlSessionFactoryBean">
    <beans:property name="dataSource" ref="dataSource" />
    <beans:property name="mapperLocations" value="classpath:com/spring/mybatis/dao/mapper/*.xml" />
</beans:bean>

<beans:bean id="sqlSession" class="org.mybatis.spring.SqlSessionTemplate">
    <beans:constructor-arg index="0" ref="sqlSessionFactory" />
</beans:bean>
```




Namespaces 처리
왼쪽처럼 필요한 항목 체크

web.xml 수정

```
<!-- 한글처리 -->
<filter>
    <filter-name>encoding</filter-name>
    <filter-class>org.springframework.web.filter.CharacterEncodingFilter</filter-class>
    <init-param>
        <param-name>encoding</param-name>
        <param-value>UTF-8</param-value>
    </init-param>
</filter>

<filter-mapping>
    <filter-name>encoding</filter-name>
    <url-pattern>*/</url-pattern>
</filter-mapping>
<!-- 한글처리 -->
```

com.spring.mybatis.dao.mapper

IDao.xml

```
<?xml version="1.0" encoding="UTF-8"?>

<!DOCTYPE mapper
    PUBLIC "-//mybatis.org/DTD Mapper 3.0//EN"
    "http://mybatis.org/dtd/mybatis-3-mapper.dtd">

<mapper namespace="com.spring.mybatis.dao.IDao">

    <select id="listDao" resultType="com.spring.mybatis.dto.ContentDto">
        SELECT * FROM BOARD ORDER BY MID DESC
    </select>

    <insert id="writeDao">
        INSERT INTO BOARD ( MWRITER, MCONTENT) VALUES ( #{param1}, #{param2})
    </insert>

    <delete id="deleteDao">
        DELETE FROM BOARD WHERE MID = #{param1}
    </delete>

</mapper>
```

파일 이름과 위치

com.spring.mybatis >> HomeController.java

com.spring.mybatis.dao >> IDao.java

com.spring.mybatis.dto >> ContentDto.java

com.spring.mybatis >> HomeController.java

```
package com.spring.mybatis;

import java.text.DateFormat;
import java.util.Date;
import java.util.Locale;

import javax.servlet.http.HttpServletRequest;

import org.apache.ibatis.session.SqlSession;
import org.slf4j.Logger;
import org.slf4j.LoggerFactory;
import org.springframework.beans.factory.annotation.Autowired;
import org.springframework.stereotype.Controller;
import org.springframework.ui.Model;
import org.springframework.web.bind.annotation.RequestMapping;
import org.springframework.web.bind.annotation.RequestMethod;

import com.spring.mybatis.dao.IDao;

@Controller
public class HomeController {

    @Autowired
    private SqlSession sqlSession;

    private static final Logger logger = LoggerFactory.getLogger(HomeController.class);
```

com.spring.mybatis >> HomeController.java

```
@RequestMapping(value = "/", method = RequestMethod.GET)
public String home(Locale locale, Model model) {
    logger.info("Welcome home! The client locale is {}", locale);

    Date date = new Date();
    DateFormat dateFormat = DateFormat.getDateInstance(DateFormat.LONG, DateFormat.LONG, locale);
    String formattedDate = dateFormat.format(date);
    model.addAttribute("serverTime", formattedDate );
    return "home";
}

@RequestMapping("/list")
public String list(Model model) {
    IDao dao = sqlSession.getMapper(IDao.class);
    model.addAttribute("list", dao.listDao());
    return "list";
}

@RequestMapping("/writeForm")
public String writeForm() {
    return "writeForm";
}
```

com.spring.mybatis >> HomeController.java

```
@RequestMapping("/write")
public String write(HttpServletRequest request, Model model) {
    IDao dao = sqlSession.getMapper(IDao.class);
    dao.writeDao(request.getParameter("mWriter"), request.getParameter("mContent"));
    return "redirect:list";
}
```

```
@RequestMapping("/view")
public String view() {
    return "view";
}
```

```
@RequestMapping("/delete")
public String delete(HttpServletRequest request, Model model) {
    IDao dao = sqlSession.getMapper(IDao.class);
    dao.deleteDao(request.getParameter("mId"));
    return "redirect:list";
}
```

```
}
```


com.spring.mybatis.dao >> IDao.java

```
package com.spring.mybatis.dao;

import java.util.ArrayList;

import com.spring.mybatis.dto.ContentDto;

public interface IDao {

    public ArrayList<ContentDto> listDao();
    public void writeDao(String mWriter, String mContent);
    public ContentDto viewDao(String stdID);
    public void deleteDao(String bId);

}
```



```
package com.spring.mybatis.dto;
```

```
public class ContentDto {
```

```
    private int mId;
```

```
    private String mWriter;
```

```
    private String mContent;
```

```
    public ContentDto() { }
```

```
    public ContentDto(int mId, String mWriter, String mContent) {
```

```
        super();
```

```
        this.mId = mId;
```

```
        this.mWriter = mWriter;
```

```
        this.mContent = mContent;
```

```
    }
```

```
    public int getId() { return mId; }
```

```
    public String getmWriter() {return mWriter;}
```

```
    public String getmContent() {return mContent;}
```

```
    public void setmId(int mId) {this.mId = mId;}
```

```
    public void setmWriter(String mWriter) {this.mWriter = mWriter;}
```

```
    public void setmContent(String mContent) {this.mContent = mContent;}
```

```
}
```

com.spring.mybatis.dto >> ContentDto.java

부어

jsp 파일 상단에 다음 내용 추가 (없으면)

```
<%@ page language="java" contentType="text/html; charset=UTF-8" pageEncoding="UTF-8"%>
```

작성

list.jsp

writeForm.jsp

```

<%@ page language="java" contentType="text/html; charset=UTF-8" pageEncoding="UTF-8"%>
<%@ taglib prefix="c" uri="http://java.sun.com/jsp/jstl/core" %>
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01 Transitional//EN" "http://www.w3.org/TR/html4/loose.dtd">
<html>
<head>
<meta http-equiv="Content-Type" content="text/html; charset=UTF-8">
<title>Insert title here</title>
</head>
<body>
<table width="500" cellpadding="0" cellspacing="0" border="1">
  <tr>
    <td>번호</td>
    <td>작성자</td>
    <td>내용</td>
    <td>삭제</td>
  </tr>
  <tr>
    <c:forEach items="${list}" var="dto">
      <td>${dto.mId}</td>
      <td>${dto.mWriter}</td>
      <td>${dto.mContent}</td>
      <td><a href="delete?mId=${dto.mId}">X</a></td>
    </c:forEach>
  </tr>
</table>
<p><a href="writeForm">글작성</a></p>
</body>
</html>

```

list.jsp


```

<%@ page language="java" contentType="text/html; charset=UTF-8" pageEncoding="UTF-8"%>
<!DOCTYPE html>
<html>
<head>
<meta charset="UTF-8">
<title>Insert title here</title>
</head>
<body>
<table width="500" cellpadding="10" cellspacing="0" border="1">
  <form action="write" method="post">
    <thead>
      <tr>
        <td> 작성자 </td>
        <td> <input type="text" name="mWriter" size = "50"> </td>
      </tr>
    </thead>
    <tbody>
      <tr>
        <td> 내용 </td>
        <td> <input type="text" name="mContent" size = "150" > </td>
      </tr>
      <tr>
        <td colspan="2"> <input type="submit" value="입력"><a href="list">목록보기</a></td>
      </tr>
    </tbody>
  </form>
</table>
</body>
</html>

```

writeForm.jsp