

Проектирование базы данных и разработка объектов базы данных.

Выполнил:

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Техническое задание

На основе задания необходимо спроектировать ER-диаграмму для учета заявок на ремонт оборудования. Обязательна 3 нормальная форма с обеспечением ссылочной целостности. При разработке диаграммы обратите внимание на согласованную осмысленную схему именования, создайте необходимые первичные и внешние ключи. ER-диаграмма должна быть представлена в формате удобном для просмотра и содержать таблицы, связи между ними, атрибуты и ключи (типами данных на данном этапе можно пренебречь).

Получить ER-диаграмму средствами СУБД или средствами графического редактора для создания диаграмм.

Создайте базу данных, используя предпочтительную платформу, на сервере баз данных, которую Вам предоставили. Создайте таблицы основных сущностей, атрибуты, отношения и необходимые ограничения.

Выполните названия таблиц и полей в едином стиле, согласно отраслевой документации.

Заполните таблицы базы данных (по пять записей для каждой таблицы).

Выполните резервное копирование БД, сохраните полученные результаты.

Выберите принцип регистрации пользователей в системе учета заявок на ремонт оборудования в соответствии с функциональными обязанностями.

На рисунке 1 представлена ER-диаграмма разработанной базы данных.

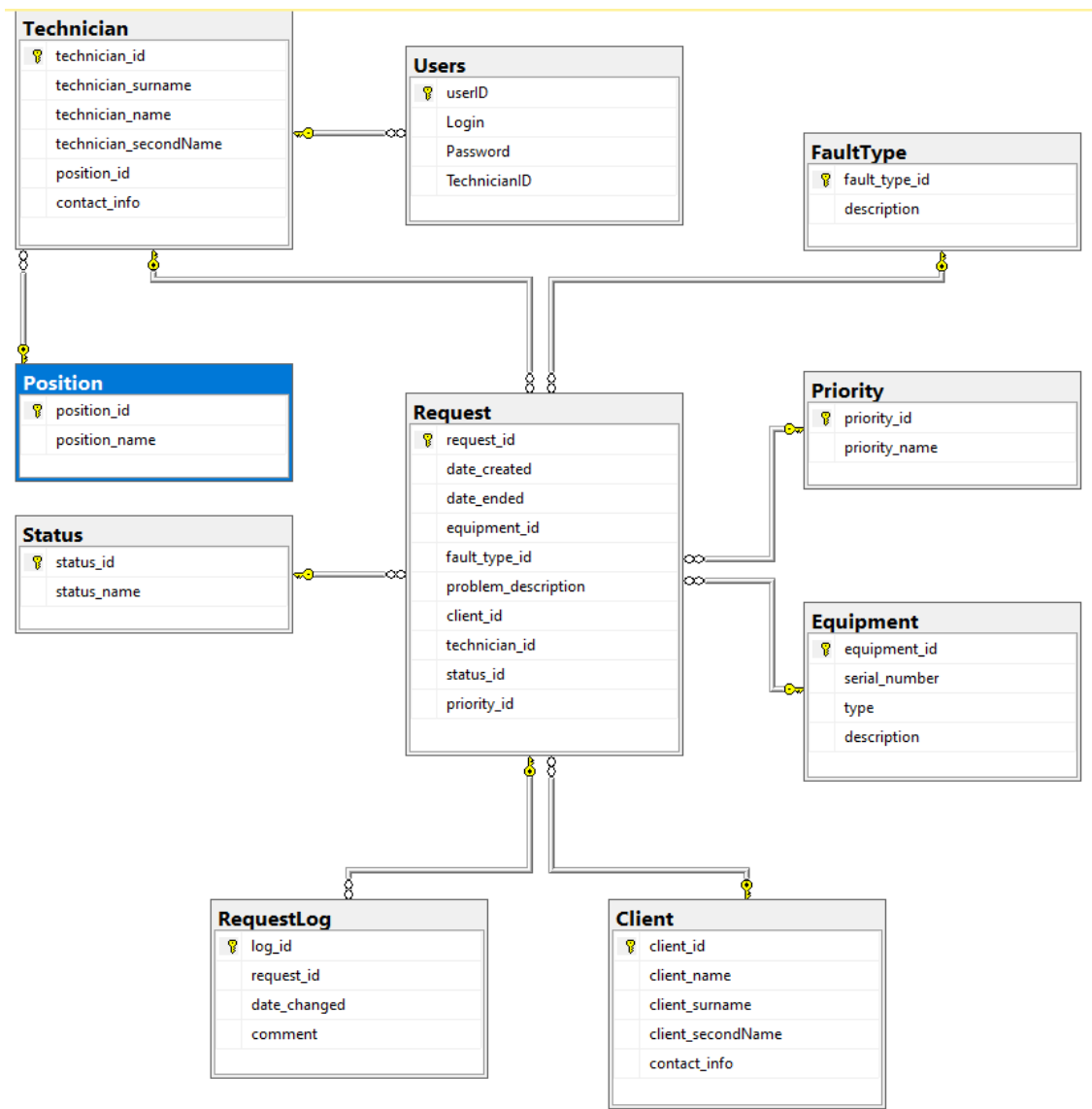


Рисунок 1 – ER диаграмма

На рисунках 2-11 представлено наполнение таблиц БД.

	client_id	client_name	client_surname	client_secondName	contact_info
1	1	Иван	Галькин	Антонович	ivan@mail.ru
2	2	Владимир	Кашин	Михайлович	vovak@example.com
3	3	Вячеслав	Медведев	Сергеевич	vyach@gmail.com
4	4	Светлана	Бибирева	Николаевна	svetochka@yandex.ru
5	5	Андрей	Фролов	Павлович	andrew@yahoo.com

Рисунок 2 – Таблица Client

	equipment_id	serial_number	type	description
▶	1	SN001	Принтер	Офисный при...
	2	SN002	Ноутбук	Dell Latitude 55...
	3	SN003	Роутер	Cisco Router X5...
	4	SN004	Монитор	HP 24-inch LED
	5	SN005	Сервер	IBM X-Series Se...
*	NULL	NULL	NULL	NULL

Рисунок 3 – Таблица Equipment

	technician_id	technician_sur...	technician_na...	technician_sec...	position_id	contact_info
▶	1	Иванов	Алексей	Петрович	1	ivanov.alexey@...
	2	Петрова	Мария	Сергеевна	2	petrova.maria...
	3	Смирнов	Дмитрий	Владимирович	3	smirnov.dmitry...
	4	Кузнецова	Елена	Игоревна	4	kuznetsova.ele...
	5	Лебедев	Сергей	Анатольевич	5	lebedev.sergey...
*	NULL	NULL	NULL	NULL	NULL	NULL

Рисунок 4 – Таблица Technician

	fault_type_id	description
▶	1	Проблема с питанием
	2	Сетевая неполадка
	3	Физическая поломка
	4	Программная ошибка
	5	Неизвестная ошибка
*	NULL	NULL

Рисунок 5 – Таблица FaultType

	request_id	date_created	date_ended	equipment_id	fault_type_id	problem_descr...	client_id	technician_id	status_id	priority_id
▶	1	2024-01-12 10:0...	2024-02-12 15:0...	1	1	Не работает п...	1	1	1	3
	2	2024-03-12 11:0...	2024-04-12 14:0...	2	2	Перегревается...	2	2	2	2
	3	2024-05-12 12:0...	NULL	3	3	Роутер не подк...	3	3	3	4
	4	2024-06-12 13:0...	2024-07-12 16:0...	4	4	Мерцает экран...	4	4	4	1
	5	2024-08-12 14:0...	NULL	5	5	Сервер не запу...	5	5	5	5
*	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL

Рисунок 6 – Таблица Requests

	status_id	status_name
▶	1	Открыть
	2	В процессе
	3	Решено
	4	Закрыто
	5	Заморожено
*	NULL	NULL

Рисунок 7 – Таблица Status

	position_id	position_name
▶	1	Техник
	2	Главный техник
	3	Инженер
	4	Менеджер
	5	Стажер
*	NULL	NULL

Рисунок 8 – Таблица Position

	priority_id	priority_name
▶	1	Низкий
	2	Средний
	3	Высокий
	4	Критический
	5	Срочный
*	NULL	NULL

Рисунок 9 – Таблица Priority

	log_id	request_id	date_changed	comment
▶	1	1	2024-01-12 12:0...	Принято в обработку
	2	2	2024-03-12 13:0...	Детали заказаны
	3	3	2024-05-12 14:0...	Ожидается подтверждение от клиента
	4	4	2024-06-12 15:0...	Проблема решена
	5	5	2024-08-12 16:0...	Техник прикреплен
*	NULL	NULL	NULL	NULL

Рисунок 10 – Таблица RequestLog

	userID	Login	Password	TechnicianID
▶	1	user1	wlejikhghfo24	1
	2	user2	gg48gh	2
	3	user3	pass123123	3
	4	user4	12222534	4
	5	user5	admin999	5
*	NULL	NULL	NULL	NULL

Рисунок 11 – Таблица Users

Скрипт для создания БД отражен в листинге 1.

Листинг 1 – Скрипт для создания БД

```
USE [master]
GO
/***** Object:  Database [TechnoService]      Script Date: 19.12.2024
13:51:05 *****/
CREATE DATABASE [TechnoService]
    CONTAINMENT = NONE
    ON PRIMARY
    ( NAME = N'TechnoService', FILENAME = N'E:\Microsoft SQL
Server\MSSQL16.SQLEXPRESS\MSSQL\DATA\TechnoService.mdf' , SIZE = 8192KB ,
MAXSIZE = UNLIMITED, FILEGROWTH = 65536KB )
    LOG ON
    ( NAME = N'TechnoService_log', FILENAME = N'E:\Microsoft SQL
Server\MSSQL16.SQLEXPRESS\MSSQL\DATA\TechnoService_log.ldf' , SIZE = 8192KB
, MAXSIZE = 2048GB , FILEGROWTH = 65536KB )
    WITH CATALOG_COLLATION = DATABASE_DEFAULT, LEDGER = OFF
GO
ALTER DATABASE [TechnoService] SET COMPATIBILITY_LEVEL = 160
GO
IF (1 = FULLTEXTSERVICEPROPERTY('IsFullTextInstalled'))
begin
EXEC [TechnoService].[dbo].[sp_fulltext_database] @action = 'enable'
end
GO
ALTER DATABASE [TechnoService] SET ANSI_NULL_DEFAULT OFF
GO
ALTER DATABASE [TechnoService] SET ANSI_NULLS OFF
GO
ALTER DATABASE [TechnoService] SET ANSI_PADDING OFF
GO
ALTER DATABASE [TechnoService] SET ANSI_WARNINGS OFF
GO
ALTER DATABASE [TechnoService] SET ARITHABORT OFF
GO
ALTER DATABASE [TechnoService] SET AUTO_CLOSE OFF
GO
ALTER DATABASE [TechnoService] SET AUTO_SHRINK OFF
GO
ALTER DATABASE [TechnoService] SET AUTO_UPDATE_STATISTICS ON
GO
ALTER DATABASE [TechnoService] SET CURSOR_CLOSE_ON_COMMIT OFF
GO
ALTER DATABASE [TechnoService] SET CURSOR_DEFAULT GLOBAL
GO
ALTER DATABASE [TechnoService] SET CONCAT_NULL_YIELDS_NULL OFF
GO
ALTER DATABASE [TechnoService] SET NUMERIC_ROUNDABORT OFF
GO
ALTER DATABASE [TechnoService] SET QUOTED_IDENTIFIER OFF
GO
ALTER DATABASE [TechnoService] SET RECURSIVE_TRIGGERS OFF
GO
ALTER DATABASE [TechnoService] SET DISABLE_BROKER
GO
ALTER DATABASE [TechnoService] SET AUTO_UPDATE_STATISTICS_ASYNC OFF
GO
ALTER DATABASE [TechnoService] SET DATE_CORRELATION_OPTIMIZATION OFF
GO
ALTER DATABASE [TechnoService] SET TRUSTWORTHY OFF
```

```

GO
ALTER DATABASE [TechnoService] SET ALLOW_SNAPSHOT_ISOLATION OFF
GO
ALTER DATABASE [TechnoService] SET PARAMETERIZATION SIMPLE
GO
ALTER DATABASE [TechnoService] SET READ_COMMITTED_SNAPSHOT OFF
GO
ALTER DATABASE [TechnoService] SET HONOR_BROKER_PRIORITY OFF
GO
ALTER DATABASE [TechnoService] SET RECOVERY SIMPLE
GO
ALTER DATABASE [TechnoService] SET MULTI_USER
GO
ALTER DATABASE [TechnoService] SET PAGE_VERIFY CHECKSUM
GO
ALTER DATABASE [TechnoService] SET DB_CHAINING OFF
GO
ALTER DATABASE [TechnoService] SET FILESTREAM( NON_TRANSACTED_ACCESS = OFF )
GO
ALTER DATABASE [TechnoService] SET TARGET_RECOVERY_TIME = 60 SECONDS
GO
ALTER DATABASE [TechnoService] SET DELAYED_DURABILITY = DISABLED
GO
ALTER DATABASE [TechnoService] SET ACCELERATED_DATABASE_RECOVERY = OFF
GO
ALTER DATABASE [TechnoService] SET QUERY_STORE = ON
GO
ALTER DATABASE [TechnoService] SET QUERY_STORE (OPERATION_MODE = READ_WRITE,
CLEANUP_POLICY = (STALE_QUERY_THRESHOLD_DAYS = 30),
DATA_FLUSH_INTERVAL_SECONDS = 900, INTERVAL_LENGTH_MINUTES = 60,
MAX_STORAGE_SIZE_MB = 1000, QUERY_CAPTURE_MODE = AUTO,
SIZE_BASED_CLEANUP_MODE = AUTO, MAX_PLANS_PER_QUERY = 200,
WAIT_STATS_CAPTURE_MODE = ON)
GO
USE [TechnoService]
GO
/***** Object: Table [dbo].[Client]      Script Date: 19.12.2024 13:51:05
*****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[Client](
    [client_id] [int] IDENTITY(1,1) NOT NULL,
    [client_name] [varchar](50) NULL,
    [client_surname] [varchar](50) NULL,
    [client_secondName] [varchar](50) NULL,
    [contact_info] [varchar](100) NULL,
PRIMARY KEY CLUSTERED
(
    [client_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object: Table [dbo].[Equipment]    Script Date: 19.12.2024 13:51:05
*****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[Equipment](
    [equipment_id] [int] IDENTITY(1,1) NOT NULL,

```

```

        [serial_number] [varchar](50) NULL,
        [type] [varchar](50) NULL,
        [description] [varchar](255) NULL,
PRIMARY KEY CLUSTERED
(
        [equipment_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object:  Table [dbo].[FaultType]      Script Date: 19.12.2024 13:51:05
*****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[FaultType](
        [fault_type_id] [int] IDENTITY(1,1) NOT NULL,
        [description] [varchar](255) NULL,
PRIMARY KEY CLUSTERED
(
        [fault_type_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object:  Table [dbo].[Position]      Script Date: 19.12.2024 13:51:05
*****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[Position](
        [position_id] [int] IDENTITY(1,1) NOT NULL,
        [position_name] [varchar](50) NULL,
PRIMARY KEY CLUSTERED
(
        [position_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object:  Table [dbo].[Priority]      Script Date: 19.12.2024 13:51:05
*****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[Priority](
        [priority_id] [int] IDENTITY(1,1) NOT NULL,
        [priority_name] [varchar](50) NULL,
PRIMARY KEY CLUSTERED
(
        [priority_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object:  Table [dbo].[Request]      Script Date: 19.12.2024 13:51:05
*****/

```

```

SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[Request](
    [request_id] [int] IDENTITY(1,1) NOT NULL,
    [date_created] [datetime] NULL,
    [date_ended] [datetime] NULL,
    [equipment_id] [int] NULL,
    [fault_type_id] [int] NULL,
    [problem_description] [varchar](255) NULL,
    [client_id] [int] NULL,
    [technician_id] [int] NULL,
    [status_id] [int] NULL,
    [priority_id] [int] NULL,
PRIMARY KEY CLUSTERED
(
    [request_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object: Table [dbo].[RequestLog]      Script Date: 19.12.2024
13:51:05 *****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[RequestLog](
    [log_id] [int] IDENTITY(1,1) NOT NULL,
    [request_id] [int] NULL,
    [date_changed] [datetime] NULL,
    [comment] [varchar](255) NULL,
PRIMARY KEY CLUSTERED
(
    [log_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object: Table [dbo].[Status]      Script Date: 19.12.2024 13:51:05
*****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[Status](
    [status_id] [int] IDENTITY(1,1) NOT NULL,
    [status_name] [varchar](50) NULL,
PRIMARY KEY CLUSTERED
(
    [status_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object: Table [dbo].[Technician]      Script Date: 19.12.2024
13:51:05 *****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON

```



```

GO
CREATE TABLE [dbo].[Technician](
    [technician_id] [int] IDENTITY(1,1) NOT NULL,
    [technician_surname] [varchar](50) NULL,
    [technician_name] [varchar](50) NULL,
    [technician_secondName] [varchar](50) NULL,
    [position_id] [int] NULL,
    [contact_info] [varchar](100) NULL,
PRIMARY KEY CLUSTERED
(
    [technician_id] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
/***** Object:  Table [dbo].[Users]      Script Date: 19.12.2024 13:51:05
*****/
SET ANSI_NULLS ON
GO
SET QUOTED_IDENTIFIER ON
GO
CREATE TABLE [dbo].[Users](
    [userID] [int] IDENTITY(1,1) NOT NULL,
    [Login] [varchar](50) NULL,
    [Password] [varchar](50) NULL,
    [TechnicianID] [int] NULL,
PRIMARY KEY CLUSTERED
(
    [userID] ASC
)WITH (PAD_INDEX = OFF, STATISTICS_NORECOMPUTE = OFF, IGNORE_DUP_KEY = OFF,
ALLOW_ROW_LOCKS = ON, ALLOW_PAGE_LOCKS = ON, OPTIMIZE_FOR_SEQUENTIAL_KEY =
OFF) ON [PRIMARY]
) ON [PRIMARY]
GO
SET IDENTITY_INSERT [dbo].[Client] ON
GO
INSERT [dbo].[Client] ([client_id], [client_name], [client_surname],
[client_secondName], [contact_info]) VALUES (1, N'Иван', N'Галькин',
N'Антонович', N'ivan@mail.ru')
GO
INSERT [dbo].[Client] ([client_id], [client_name], [client_surname],
[client_secondName], [contact_info]) VALUES (2, N'Владимир', N'Кашин',
N'Михайлович', N'vovak@example.com')
GO
INSERT [dbo].[Client] ([client_id], [client_name], [client_surname],
[client_secondName], [contact_info]) VALUES (3, N'Вячеслав', N'Медведев',
N'Сергеевич', N'vyach@gmail.com')
GO
INSERT [dbo].[Client] ([client_id], [client_name], [client_surname],
[client_secondName], [contact_info]) VALUES (4, N'Светлана', N'Бибирева',
N'Николаевна', N'svetochka@yandex.ru')
GO
INSERT [dbo].[Client] ([client_id], [client_name], [client_surname],
[client_secondName], [contact_info]) VALUES (5, N'Андрей', N'Фролов',
N'Павлович', N'andrew@yahoo.com')
GO
SET IDENTITY_INSERT [dbo].[Client] OFF
GO
SET IDENTITY_INSERT [dbo].[Equipment] ON
GO
INSERT [dbo].[Equipment] ([equipment_id], [serial_number], [type],
[description]) VALUES (1, N'SN001', N'Принтер', N'Офисный принтер DELL
1324')

```

```

GO
INSERT [dbo].[Equipment] ([equipment_id], [serial_number], [type],
[description]) VALUES (2, N'SN002', N'Ноутбук', N'Dell Latitude 5500')
GO
INSERT [dbo].[Equipment] ([equipment_id], [serial_number], [type],
[description]) VALUES (3, N'SN003', N'Роутер', N'Cisco Router X500')
GO
INSERT [dbo].[Equipment] ([equipment_id], [serial_number], [type],
[description]) VALUES (4, N'SN004', N'Монитор', N'HP 24-inch LED')
GO
INSERT [dbo].[Equipment] ([equipment_id], [serial_number], [type],
[description]) VALUES (5, N'SN005', N'Сервер', N'IBM X-Series Server')
GO
SET IDENTITY_INSERT [dbo].[Equipment] OFF
GO
SET IDENTITY_INSERT [dbo].[FaultType] ON
GO
INSERT [dbo].[FaultType] ([fault_type_id], [description]) VALUES (1,
N'Проблема с питанием')
GO
INSERT [dbo].[FaultType] ([fault_type_id], [description]) VALUES (2,
N'Сетевая неполадка')
GO
INSERT [dbo].[FaultType] ([fault_type_id], [description]) VALUES (3,
N'Физическая поломка')
GO
INSERT [dbo].[FaultType] ([fault_type_id], [description]) VALUES (4,
N'Программная ошибка')
GO
INSERT [dbo].[FaultType] ([fault_type_id], [description]) VALUES (5,
N'Неизвестная ошибка')
GO
SET IDENTITY_INSERT [dbo].[FaultType] OFF
GO
SET IDENTITY_INSERT [dbo].[Position] ON
GO
INSERT [dbo].[Position] ([position_id], [position_name]) VALUES (1,
N'Техник')
GO
INSERT [dbo].[Position] ([position_id], [position_name]) VALUES (2,
N'Главный техник')
GO
INSERT [dbo].[Position] ([position_id], [position_name]) VALUES (3,
N'Инженер')
GO
INSERT [dbo].[Position] ([position_id], [position_name]) VALUES (4,
N'Менеджер')
GO
INSERT [dbo].[Position] ([position_id], [position_name]) VALUES (5,
N'Стажер')
GO
SET IDENTITY_INSERT [dbo].[Position] OFF
GO
SET IDENTITY_INSERT [dbo].[Priority] ON
GO
INSERT [dbo].[Priority] ([priority_id], [priority_name]) VALUES (1,
N'Низкий')
GO
INSERT [dbo].[Priority] ([priority_id], [priority_name]) VALUES (2,
N'Средний')
GO
INSERT [dbo].[Priority] ([priority_id], [priority_name]) VALUES (3,
N'Высокий')
GO

```

```

INSERT [dbo].[Priority] ([priority_id], [priority_name]) VALUES (4,
N'Критический')
GO
INSERT [dbo].[Priority] ([priority_id], [priority_name]) VALUES (5,
N'Срочный')
GO
SET IDENTITY_INSERT [dbo].[Priority] OFF
GO
SET IDENTITY_INSERT [dbo].[Request] ON
GO
INSERT [dbo].[Request] ([request_id], [date_created], [date_ended],
[equipment_id], [fault_type_id], [problem_description], [client_id],
[technician_id], [status_id], [priority_id]) VALUES (1, CAST(N'2024-01-
12T10:00:00.000' AS DateTime), CAST(N'2024-02-12T15:00:00.000' AS DateTime),
1, 1, N'Не работает принтер', 1, 1, 1, 3)
GO
INSERT [dbo].[Request] ([request_id], [date_created], [date_ended],
[equipment_id], [fault_type_id], [problem_description], [client_id],
[technician_id], [status_id], [priority_id]) VALUES (2, CAST(N'2024-03-
12T11:00:00.000' AS DateTime), CAST(N'2024-04-12T14:00:00.000' AS DateTime),
2, 2, N'Перегревается ноутбук', 2, 2, 2, 2)
GO
INSERT [dbo].[Request] ([request_id], [date_created], [date_ended],
[equipment_id], [fault_type_id], [problem_description], [client_id],
[technician_id], [status_id], [priority_id]) VALUES (3, CAST(N'2024-05-
12T12:00:00.000' AS DateTime), NULL, 3, 3, N'Роутер не подключается к сети',
3, 3, 3, 4)
GO
INSERT [dbo].[Request] ([request_id], [date_created], [date_ended],
[equipment_id], [fault_type_id], [problem_description], [client_id],
[technician_id], [status_id], [priority_id]) VALUES (4, CAST(N'2024-06-
12T13:00:00.000' AS DateTime), CAST(N'2024-07-12T16:00:00.000' AS DateTime),
4, 4, N'Мерцает экран монитора', 4, 4, 4, 1)
GO
INSERT [dbo].[Request] ([request_id], [date_created], [date_ended],
[equipment_id], [fault_type_id], [problem_description], [client_id],
[technician_id], [status_id], [priority_id]) VALUES (5, CAST(N'2024-08-
12T14:00:00.000' AS DateTime), NULL, 5, 5, N'Сервер не запускается', 5, 5,
5, 5)
GO
SET IDENTITY_INSERT [dbo].[Request] OFF
GO
SET IDENTITY_INSERT [dbo].[RequestLog] ON
GO
INSERT [dbo].[RequestLog] ([log_id], [request_id], [date_changed],
[comment]) VALUES (1, 1, CAST(N'2024-01-12T12:00:00.000' AS DateTime),
N'Принято в обработку')
GO
INSERT [dbo].[RequestLog] ([log_id], [request_id], [date_changed],
[comment]) VALUES (2, 2, CAST(N'2024-03-12T13:00:00.000' AS DateTime),
N'Детали заказаны')
GO
INSERT [dbo].[RequestLog] ([log_id], [request_id], [date_changed],
[comment]) VALUES (3, 3, CAST(N'2024-05-12T14:00:00.000' AS DateTime),
N'Ожидается подтверждение от клиента')
GO
INSERT [dbo].[RequestLog] ([log_id], [request_id], [date_changed],
[comment]) VALUES (4, 4, CAST(N'2024-06-12T15:00:00.000' AS DateTime),
N'Проблема решена')
GO
INSERT [dbo].[RequestLog] ([log_id], [request_id], [date_changed],
[comment]) VALUES (5, 5, CAST(N'2024-08-12T16:00:00.000' AS DateTime),
N'Техник прикреплен')
GO

```

```

SET IDENTITY_INSERT [dbo].[RequestLog] OFF
GO
SET IDENTITY_INSERT [dbo].[Status] ON
GO
INSERT [dbo].[Status] ([status_id], [status_name]) VALUES (1, N'Открыть')
GO
INSERT [dbo].[Status] ([status_id], [status_name]) VALUES (2, N'В процессе')
GO
INSERT [dbo].[Status] ([status_id], [status_name]) VALUES (3, N'Решено')
GO
INSERT [dbo].[Status] ([status_id], [status_name]) VALUES (4, N'Закрыто')
GO
INSERT [dbo].[Status] ([status_id], [status_name]) VALUES (5, N'Заморожено')
GO
SET IDENTITY_INSERT [dbo].[Status] OFF
GO
SET IDENTITY_INSERT [dbo].[Technician] ON
GO
INSERT [dbo].[Technician] ([technician_id], [technician_surname],
[technician_name], [technician_secondName], [position_id], [contact_info])
VALUES (1, N'Иванов', N'Алексей', N'Петрович', 1,
N'ivanov.alexey@example.com')
GO
INSERT [dbo].[Technician] ([technician_id], [technician_surname],
[technician_name], [technician_secondName], [position_id], [contact_info])
VALUES (2, N'Петрова', N'Мария', N'Сергеевна', 2,
N'petrova.maria@example.com')
GO
INSERT [dbo].[Technician] ([technician_id], [technician_surname],
[technician_name], [technician_secondName], [position_id], [contact_info])
VALUES (3, N'Смирнов', N'Дмитрий', N'Владимирович', 3,
N'smirnov.dmitry@example.com')
GO
INSERT [dbo].[Technician] ([technician_id], [technician_surname],
[technician_name], [technician_secondName], [position_id], [contact_info])
VALUES (4, N'Кузнецова', N'Елена', N'Игоревна', 4,
N'kuznetsova.elena@example.com')
GO
INSERT [dbo].[Technician] ([technician_id], [technician_surname],
[technician_name], [technician_secondName], [position_id], [contact_info])
VALUES (5, N'Лебедев', N'Сергей', N'Анатольевич', 5,
N'lebedev.sergey@example.com')
GO
SET IDENTITY_INSERT [dbo].[Technician] OFF
GO
SET IDENTITY_INSERT [dbo].[Users] ON
GO
INSERT [dbo].[Users] ([userID], [Login], [Password], [TechnicianID]) VALUES
(1, N'user1', N'wlejikghfo24', 1)
GO
INSERT [dbo].[Users] ([userID], [Login], [Password], [TechnicianID]) VALUES
(2, N'user2', N'gg48gh', 2)
GO
INSERT [dbo].[Users] ([userID], [Login], [Password], [TechnicianID]) VALUES
(3, N'user3', N'pass123123', 3)
GO
INSERT [dbo].[Users] ([userID], [Login], [Password], [TechnicianID]) VALUES
(4, N'user4', N'12222534', 4)
GO
INSERT [dbo].[Users] ([userID], [Login], [Password], [TechnicianID]) VALUES
(5, N'user5', N'admin999', 5)
GO
SET IDENTITY_INSERT [dbo].[Users] OFF
GO

```

```
ALTER TABLE [dbo].[Request] WITH CHECK ADD FOREIGN KEY([client_id])
REFERENCES [dbo].[Client] ([client_id])
GO
ALTER TABLE [dbo].[Request] WITH CHECK ADD FOREIGN KEY([equipment_id])
REFERENCES [dbo].[Equipment] ([equipment_id])
GO
ALTER TABLE [dbo].[Request] WITH CHECK ADD FOREIGN KEY([fault_type_id])
REFERENCES [dbo].[FaultType] ([fault_type_id])
GO
ALTER TABLE [dbo].[Request] WITH CHECK ADD FOREIGN KEY([priority_id])
REFERENCES [dbo].[Priority] ([priority_id])
GO
ALTER TABLE [dbo].[Request] WITH CHECK ADD FOREIGN KEY([status_id])
REFERENCES [dbo].[Status] ([status_id])
GO
ALTER TABLE [dbo].[Request] WITH CHECK ADD FOREIGN KEY([technician_id])
REFERENCES [dbo].[Technician] ([technician_id])
GO
ALTER TABLE [dbo].[RequestLog] WITH CHECK ADD FOREIGN KEY([request_id])
REFERENCES [dbo].[Request] ([request_id])
GO
ALTER TABLE [dbo].[Technician] WITH CHECK ADD FOREIGN KEY([position_id])
REFERENCES [dbo].[Position] ([position_id])
GO
ALTER TABLE [dbo].[Users] WITH CHECK ADD FOREIGN KEY([TechnicianID])
REFERENCES [dbo].[Technician] ([technician_id])
GO
USE [master]
GO
ALTER DATABASE [TechnoService] SET READ_WRITE
GO
```