DBMS PROJECT

MOVIE TICKETS BOOKING SYSTEM

RAHUL BOMMA-202110

BITLA VARUN KUMAR-202108

A SAI PRATYUSH-202104

Electrical and Electronics Engineering (2020-2024)

DBMS PROJECT

TOPIC: MOVIE TICKET BOOKING SYSTEM

PROBLEM STATEMENT:

Movie Ticket Booking Database Design is basically aimed to provide complete information of the movie and schedule to the customer according to which he or she can easily book tickets for their favourite movies. The database administrator can insert and delete data like movie schedules, shows timings, genre, cast and crew details, etc.

One can have wholesome cinematic experience by just booking tickets from their mobiles which saves their time and reduces effort. The details of the customer, tickets, payments, etc are stored. Customer can select the movies of their choice by taking the rating of movie into consideration.

ASSUMPTIONS:

- A customer can book any number of tickets with a single customer id.
- Only one seat can be booked for a single ticket.
- One theatre can have multiple seat type names with different costs.
- Multiple theatres can have seat types with same name.
- One customer can make many payments.
- Any number of tickets can be booked in a single payment.
- One movie can be screened in any number of shows.
- This database is applicable to single screen theatres.
- Any number of shows can be screened in a theatre in a single day.

TABLES:

1. CUSTOMER:

Attributes	Datatypes	Constraints
Customer_id	Int	Primary key
First_name	Varchar (30)	NOT NULL
Last_name	Varchar (30)	NOT NULL
age	Int	NOT NULL

Gender	Varchar (1)	NOT NULL
Mobile	Varchar (10)	UNIQUE, NOT NULL
email	Varchar (20)	UNIQUE

2. MOVIE:

Attributes	Datatype	constraints
Movie_id	Int	Primary key
Movie_name	Varchar (30)	NOT NULL
Genre	Varchar (30)	NOT NULL
Releasing_date	Date	NOT NULL
Rating	Decimal (2,1)	-
Cast	Varchar (50)	NOT NULL
Duration	Time	NOT NULL

3. THEATRE:

Attributes	Datatype	Constraints
Theatre_id	Int	Primary key
Theatre_name	Varchar (20)	NOT NULL
Location	Varchar (20)	NOT NULL
Capacity	Int	-

4. SHOWS:

Attributes	Datatype	Constraints
Show_name	Varchar (20)	Primary key (1)
Theatre_id	Int	Primary key (2), Foreign key (1)
Show_date	Date	Primary key (3)
Show_time	Time	NOT NULL
Movie_language	Varchar (20)	NOT NULL
Movie_id	Int	Foreign key (2)

5. PAYMENT:

Attributes	Datatype	Constraints
Payment_id	Int	Primary key
Price	Int	NOT NULL

Payment_mode	Varchar (20)	NOT NULL
Payment_date	Date	NOT NULL
Customer_id	Int	Foreign key

6. SEAT_TYPE:

Attributes	Datatype	Constraints
Seat_type_name	Varchar (20)	Primary key (1)
Theatre_id	Int	Primary key (2), Foreign key
Cost	Int	NOT NULL
Seat_type_capacity	Int	NOT NULL

7. TICKET:

Attributes	Datatype	Constraints
Ticket_id	Int	Primary key
Customer_id	Int	Foreign key (1)
Theatre_id	Int	Foreign key (2)
Payment_id	Int	Foreign key (3)
Show_id	Int	Foreign key (4)
Show_data	Int	Foreign key (5)

8. SEAT:

Attributes	Datatype	Constraints
Seat_number	Varchar (5)	NOT NULL
Seat_type_name	Varchar (20)	Foreign key (1)
Theatre_id	Int	Foreign key (2)
Ticket_id	Int	Primary key Foreign key (3)

FUNTIONAL DEPENCENCIES AND PRIMARY KEY:

1. CUSTOMER:

Customer_id-> {First_name, Last_name, age, gender, mobile, email}

Since all the fields depend on customer_id, (customer_id) + -> R.

Hence, Customer_id is a primary key.

2. MOVIE:

Movie_id-> {Movie_name, genre, release_date, rating, cast, duration}

Since all the fields depend on Movie_id, (Movie_id) + -> R.

Hence, Movie_id is a primary key.

3. THEATRE:

Theatre_id-> {Theatre_name, location, capacity}

Since all the fields depend on Theatre_id, (Theatre_id) + -> R.

Hence, Theatre_id is a primary key.

4. SHOWS:

{Show_name, Theatre_id, Show_date}-> {Show_time, Movie_language, Movie_id}

Since all the fields depend on (Theatre_id, Show_name, Show_date) + -> R.

Hence, (Show_name, Show_date, Theatre_id) are combinedly a composite primary key.

5. PAYMENT:

Payment_id-> {Price, Payment_mode, Payment_date, Customer_id}

Since all the fields depend on Payment_id, (Payment_id) + -> R.

Hence, Payment_id is a primary key.

6. SEAT_TYPE:

(Seat_type_name, Theatre_id)-> {Cost, Seat_type_capacity}

Since all the fields depend on Seat_type_name and Theatre_id,

(Seat_type_name, Theatre_id) +->R

Hence, (Seat_type_name, Theatre_id) combinedly becomes a composite

primary key.

7. TICKET:

Ticket_id-> {Customer_id, Theatre_id, Payment_id, Show_name, Show_date}

Since all fields depends on Ticket_id, (Ticket_id) + ->R

Hence, Ticket_id is a primary key.

8. SEAT:

Ticket_id-> (Seat_number, Seat_type_name, Theatre_id)

Since all fields depends on Ticket_id, (Ticket_id) +->R

Hence, Ticket id is a primary key.

NORMALISATION:

1. CUSTOMER:

Primary key: customer_id

All attributes depend on the Customer_id, hence the table is in 2NF.

All attributes depend directly on Customer_id hence the table is in 3NF.

All determinants (customer_id) is Super key, hence the table is in BCNF.

2. MOVIE:

Primary key: Movie_id

All attributes depend on the Movie_id, hence the table is in 2NF.

All attributes depend directly on Movie_id hence the table is in 3NF.

All determinants (Movie_id) is Super key, hence the table is in BCNF.

3. THEATRE:

Primary key: Theatre_id

All attributes depend on the Theatre _id, hence the table is in 2NF.

All attributes depend directly on Theatre _id hence the table is in 3NF.

All determinants (Theatre _id) is Super key, hence the table is in BCNF.

4. SHOWS:

Primary key: Theatre_id, Show_name, Show_date

All attributes depend on the Theatre_id, Show_name, Show_date hence the table is in 2NF.

All attributes depend directly on Theatre_id, Show_name, Show_date hence the table is in 3NF.

All determinants (Theatre_id, Show_name, Show_date) is Super key, hence the table is in BCNF.

5. PAYMENT:

Primary key: Payment_id

All attributes depend on the Payment_id hence the table is in 2NF.

All attributes depend directly on Payment_id hence the table is in 3NF.

All determinants (Payment_id) is Super key, hence the table is in BCNF.

6. SEAT_TYPE:

Primary key: Theatre_id, Seat_type_name

All attributes depend on the Theatre_id, Seat_type_name hence the table is in 2NF.

All attributes depend directly on Theatre_id, Seat_type_name hence the table is in 3NF.

All determinants (Theatre_id, Seat_type_name) is Super key, hence the table is in BCNF.
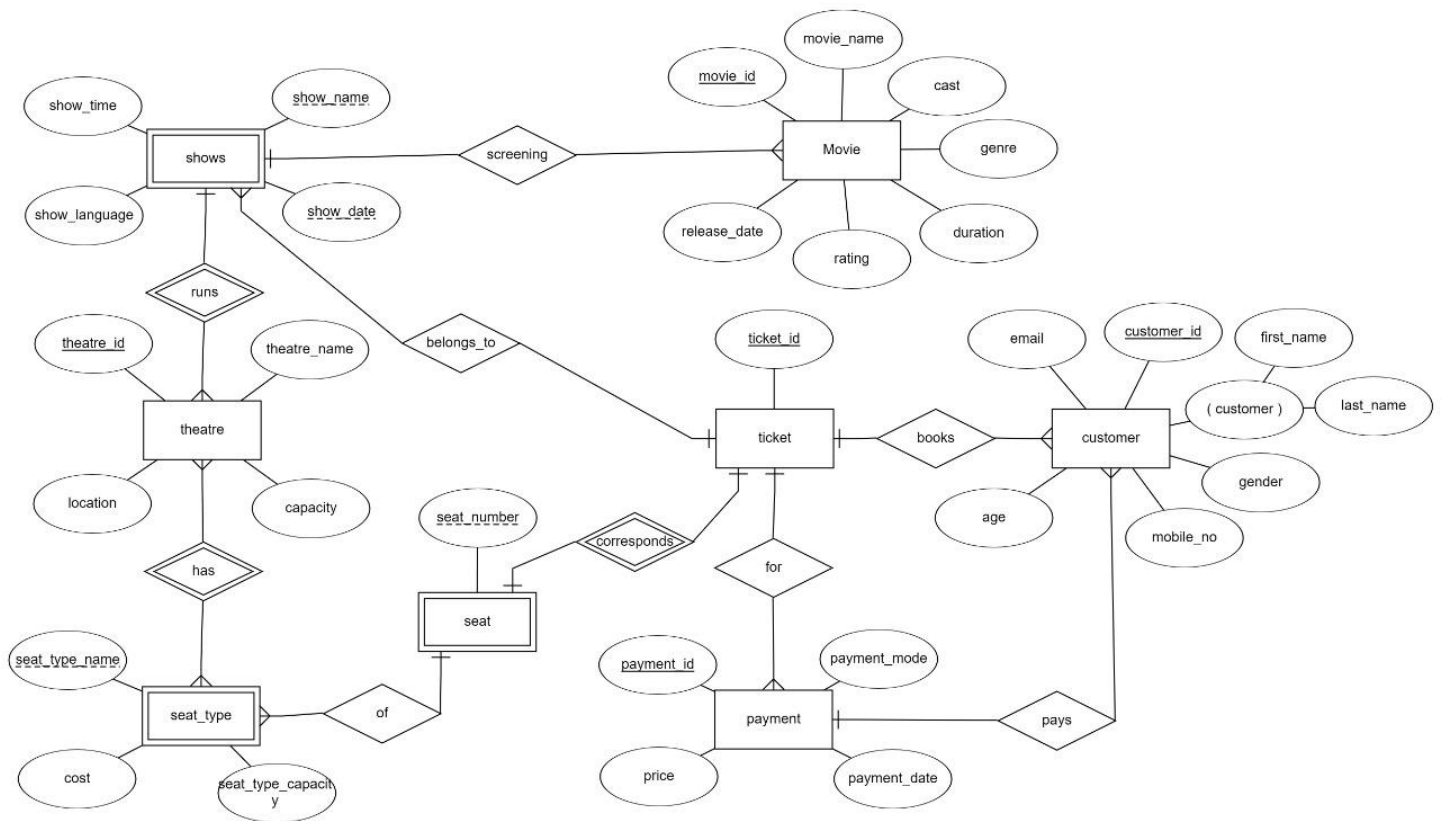
7. TICKET:

Primary key: Ticket_id

All attributes depend on the Ticket_id hence the table is in 2NF.

All attributes depend directly on Ticket_id hence the table is in 3NF.

All determinants (Ticket_id) is Super key, hence the table is in BCNF.

8. SEAT:

Primary key: Ticket_id

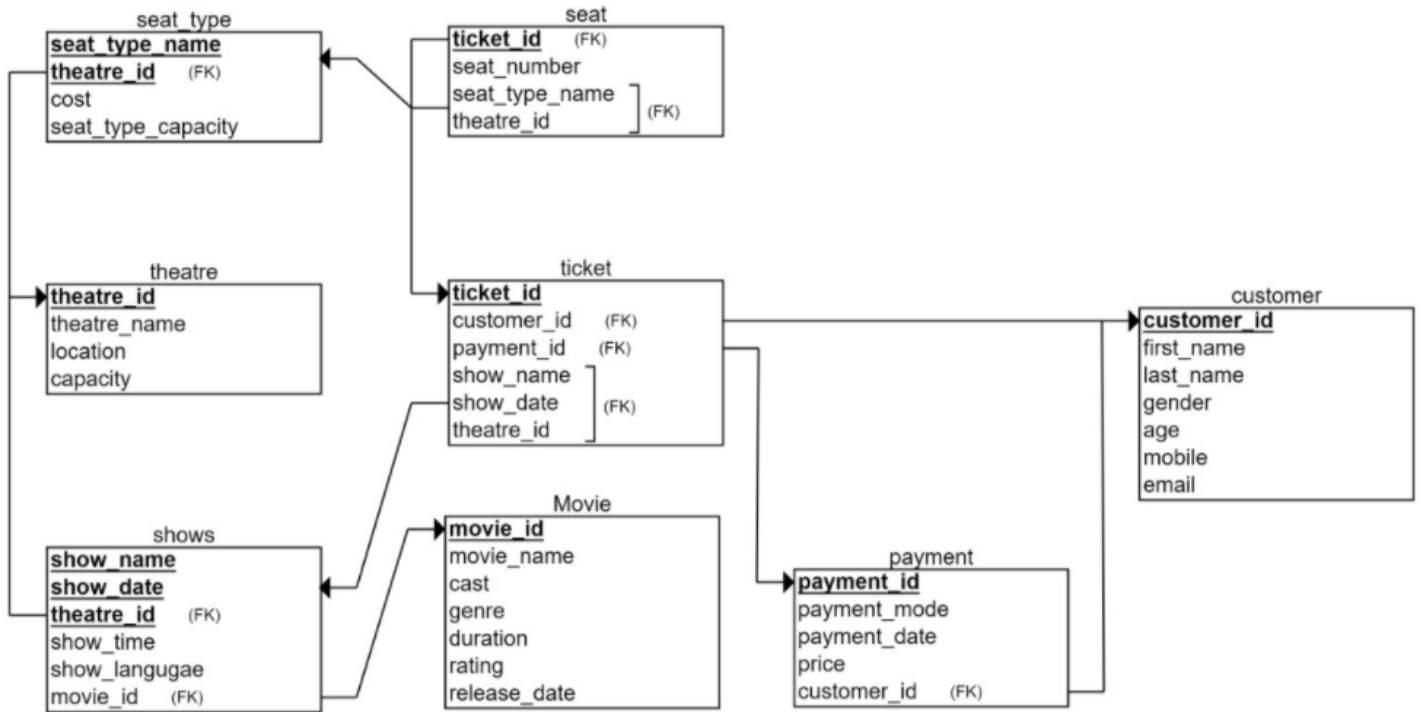All attributes depend on the Ticket_id hence the table is in 2NF.

All attributes depend directly on Ticket_id hence the table is in 3NF.

All determinants (Ticket_id) is Super key, hence the table is in BCNF.

ER DIAGRAM:

RELATIONAL SCHEMA:

seat_type
- **seat_type_name**
- **theatre_id**   (FK)
- cost
- seat_type_capacity

seat
- **ticket_id**   (FK)
- seat_number
- seat_type_name   ⌉ (FK)
- theatre_id   ⌋

theatre
- **theatre_id**
- theatre_name
- location
- capacity

ticket
- **ticket_id**
- customer_id   (FK)
- payment_id   (FK)
- show_name   ⌉
- show_date   ⌋ (FK)
- theatre_id

customer
- **customer_id**
- first_name
- last_name
- gender
- age
- mobile
- email

shows
- **show_name**
- **show_date**
- **theatre_id**   (FK)
- show_time
- show_langugae
- movie_id   (FK)

Movie
- **movie_id**
- movie_name
- cast
- genre
- duration
- rating
- release_date

payment
- **payment_id**
- payment_mode
- payment_date
- price
- customer_id   (FK)

MYSQL CODE:

CREATING TABLES:

```sql
CREATE DATABASE Movie_tickets_Booking;

CREATE TABLE CUSTOMER(
    customer_id int PRIMARY KEY,
    first_name varchar(30) NOT NULL,
    last_name varchar(30) NOT NULL,
    gender varchar(1) NOT NULL,
    age int NOT NULL,
    mobile varchar(10) UNIQUE,
    email varchar(20) UNIQUE
);
```

```sql
CREATE TABLE MOVIE(
    movie_id int PRIMARY KEY,
    movie_name varchar(30) NOT NULL,
    cast varchar(50) NOT NULL,
    genre varchar(30) NOT NULL,
    duration time NOT NULL,
    rating DECIMAL(2,1),
    release_date date
);
```

```sql
CREATE TABLE THEATRE(
    theatre_id int PRIMARY KEY,
    theatre_name varchar(20) NOT NULL,
    location varchar(20) ,
    capacity int
);
```

```sql
CREATE TABLE SHOWS(
    show_name varchar(20) ,
    show_date date ,
    theatre_id int ,
    show_time varchar(10) NOT NULL,
    show_language varchar(20) NOT NULL,
    movie_id int ,
    PRIMARY KEY(show_name,show_date,theatre_id),
    FOREIGN KEY (movie_id) REFERENCES movie(movie_id) ON DELETE SET NULL,
    FOREIGN KEY (theatre_id) REFERENCES theatre(theatre_id) ON DELETE CASCADE
);
```

```sql
CREATE TABLE PAYMENT(
    payment_id int PRIMARY KEY,
    payment_mode varchar(20) NOT NULL,
    payment_date date NOT NULL,
    price int NOT NULL,
    customer_id int,
    FOREIGN KEY (customer_id) REFERENCES customer(customer_id) ON DELETE SET NULL
);
```

```sql
CREATE TABLE SEAT_TYPE(
    seat_type_name varchar(20) ,
    theatre_id int ,
    cost int NOT NULL,
    seat_type_capacity int,
    PRIMARY KEY (seat_type_name,theatre_id),
    FOREIGN KEY (theatre_id) REFERENCES theatre(theatre_id) ON DELETE CASCADE
);
```

```sql
CREATE TABLE TICKET(
    ticket_id int PRIMARY KEY,
    customer_id int,
    payment_id int,
    show_name varchar(20),
    show_date date,
    theatre_id int,
    FOREIGN KEY (customer_id) REFERENCES customer(customer_id) ON DELETE SET NULL,
    FOREIGN KEY (payment_id) REFERENCES payment(payment_id) ON DELETE SET NULL,
    FOREIGN KEY (show_name,show_date,theatre_id) REFERENCES shows(show_name,show_date,theatre_id) ON DELETE SET NULL
);
```

```sql
CREATE TABLE SEAT(
    ticket_id int PRIMARY KEY,
    seat_number varchar(5) NOT NULL,
    seat_type_name varchar(20) NOT NULL,
    theatre_id int NOT NULL,
    FOREIGN KEY (ticket_id) REFERENCES ticket(ticket_id) ON DELETE CASCADE
);
```

INSERTING DATA:

```sql
INSERT INTO CUSTOMER VALUES(101,'Sai','Prathyush','M',19,'9963321540','sp@gmail.com');
INSERT INTO CUSTOMER VALUES(102,'Rahul','Bomma','M',20,'9973638383','rb@yahoo.com');
INSERT INTO CUSTOMER VALUES(103,'Varun','Kumar','M',19,'9879654376','vk@gmail.com');
INSERT INTO CUSTOMER VALUES(104,'Samar','Reddy','M',22,'8739238373','sr@gmail.com');
INSERT INTO CUSTOMER VALUES(105,'Eren','Yenger','M',32,'8652839287','ey@gmail.com');
INSERT INTO CUSTOMER VALUES(106,'Sakura','Haruno','F',17,'9827387283','sh@gmail.com');
INSERT INTO CUSTOMER VALUES(107,'Anjali','Devi','F',45,'9834938748','ad@gmail.com');
INSERT INTO CUSTOMER VALUES(108,'Mahesh','Babu','M',46,'9990929893','gmb@yahoo.com');
INSERT INTO CUSTOMER VALUES(109,'Olivia','Morris','F',33,'9996664443','om@gmail.com');
INSERT INTO CUSTOMER VALUES(110,'Gayathri','Priya','F',35,'9003724540','gp@gmail.com');
INSERT INTO CUSTOMER VALUES(111,'Mitsuha','Miamizo','F',27,'9968721375','mm@gmail.com');
```

```sql
INSERT INTO MOVIE VALUES(301,'Major','Adivi Sesh,Saiee Manjrekar','Action,Drama','02:30:00',9.4,'2022-10-05');
INSERT INTO MOVIE VALUES(302,'Spiderman:no way home','Tom Holland,Zendaya','Action,Sci-fi','02:28:00',9.5,'2022-10-12');
INSERT INTO MOVIE VALUES(303,'Ms Dhoni:The untold story','Sushant singh rajput,kiara Advani','Drama','03:40:00',8.9,'2022-10-07');
INSERT INTO MOVIE VALUES(304,'PK','Aamir khan,Anushka sharma','Drama','02:32:00',9.0,'2022-07-20');
INSERT INTO MOVIE VALUES(305,'Vikram','kamal hassan,vijay sethupathi,faahad faasil','Action,fantasy','02:52:00',9.4,'2022-10-16');
INSERT INTO MOVIE VALUES(306,'mugen train','kamado tanjiro,kyojuro rengoku','action,fantasy','01:57:00',9.2,'2022-10-13');
INSERT INTO MOVIE VALUES(307,'KGF2','yash,srinidhi shetty,sanjay dutt','action,drama','02:53:22',9.5,'2022-10-02');
INSERT INTO MOVIE VALUES(308,'your name','taki tachibana,miki okudera','sci-fi,romance','01:45:00',8.8,'2022-10-15');
INSERT INTO MOVIE VALUES(309,'RRR','jr.ntr,ram charan,alia','action,drama','03:00:06',9.5,'2022-10-07');
```

```sql
INSERT INTO PAYMENT VALUES(201,'cash','2022-10-16',200,102);
INSERT INTO PAYMENT VALUES(202,'card','2022-10-04',100,106);
INSERT INTO PAYMENT VALUES(203,'upi','2022-10-07',100,101);
INSERT INTO PAYMENT VALUES(204,'cash','2022-10-06',1500,107);
INSERT INTO PAYMENT VALUES(205,'upi','2022-10-05',200,109);
INSERT INTO PAYMENT VALUES(206,'card','2022-10-06',400,103);
INSERT INTO PAYMENT VALUES(207,'upi','2022-10-16',200,110);
INSERT INTO PAYMENT VALUES(208,'cash','2022-10-16',250,101);
INSERT INTO PAYMENT VALUES(209,'upi','2022-10-07',300,105);
INSERT INTO PAYMENT VALUES(210,'upi','2022-10-11',400,108);
```

```sql
INSERT INTO THEATRE VALUES(501,'Siri','Vijayawada',220);
INSERT INTO THEATRE VALUES(502,'S2','Hanamkonda',120);
INSERT INTO THEATRE VALUES(503,'Devi','Warangal',100);
INSERT INTO THEATRE VALUES(504,'PVR Cinemas','Hyderabad',150);
INSERT INTO THEATRE VALUES(505,'IMAX','Delhi',200);
INSERT INTO THEATRE VALUES(506,'Amrutha','Pune',100);
INSERT INTO THEATRE VALUES(507,'Bhavani','kazipet',150);
INSERT INTO THEATRE VALUES(508,'AMB','Hyderabad',50);
INSERT INTO THEATRE VALUES(509,'Mayuri','Kakinada',120);
INSERT INTO THEATRE VALUES(510,'Rain cinema','Nellore',200);
```

```sql
INSERT INTO SHOWS VALUES('Matinee show','2022-10-07',507,'02:30','telugu',301);
INSERT INTO SHOWS VALUES('First show','2022-10-16',503,'06:45','telugu',305);
INSERT INTO SHOWS VALUES('Morning show','2022-10-17',504,'10:45','english',302);
INSERT INTO SHOWS VALUES('First show','2022-10-16',505,'06:15','korean',308);
INSERT INTO SHOWS VALUES('Second show','2022-10-07',508,'09:45','telugu',309);
INSERT INTO SHOWS VALUES('First show','2022-10-06',506,'06:35','telugu',307);
INSERT INTO SHOWS VALUES('Second show','2022-10-18',501,'09:45','english',306);
INSERT INTO SHOWS VALUES('First show','2022-10-08',509,'06:30','telugu',307);
INSERT INTO SHOWS VALUES('First show','2022-10-11',510,'06:45','telugu',303);
INSERT INTO SHOWS VALUES('First show','2022-10-06',502,'6:00','hindi',304);
```

```sql
INSERT INTO TICKET VALUES(801,107,204,'First show','2022-10-06',506);
INSERT INTO TICKET VALUES(802,103,206,'First show','2022-10-06',502);
INSERT INTO TICKET VALUES(803,105,209,'First show','2022-10-08',509);
INSERT INTO TICKET VALUES(804,110,207,'Second show','2022-10-18',501);
INSERT INTO TICKET VALUES(805,109,205,'Second show','2022-10-07',508);
INSERT INTO TICKET VALUES(806,101,203,'Matinee show','2022-10-07',507);
INSERT INTO TICKET VALUES(807,108,210,'First show','2022-10-11',510);
INSERT INTO TICKET VALUES(808,106,202,'First show','2022-10-16',505);
INSERT INTO TICKET VALUES(809,101,208,'First show','2022-10-16',503);
INSERT INTO TICKET VALUES(810,101,208,'First show','2022-10-16',503);
INSERT INTO TICKET VALUES(811,108,210,'First show','2022-10-11',510);
INSERT INTO TICKET VALUES(812,102,203,'Morning show','2022-10-17',504);
```

```sql
INSERT INTO SEAT_TYPE VALUES('silver',507,80,100);
INSERT INTO SEAT_TYPE VALUES('gold',507,100,50);
INSERT INTO SEAT_TYPE VALUES('deluxe',503,200,30);
INSERT INTO SEAT_TYPE VALUES('regular',503,125,70);
INSERT INTO SEAT_TYPE VALUES('gold',504,200,30);
INSERT INTO SEAT_TYPE VALUES('silver',504,150,80);
INSERT INTO SEAT_TYPE VALUES('copper',504,100,20);
INSERT INTO SEAT_TYPE VALUES('platinum',505,200,40);
INSERT INTO SEAT_TYPE VALUES('elite',505,100,160);
INSERT INTO SEAT_TYPE VALUES('upper balcony',506,30,150);
INSERT INTO SEAT_TYPE VALUES('lower balcony',506,70,100);
INSERT INTO SEAT_TYPE VALUES('sofas',508,200,30);
INSERT INTO SEAT_TYPE VALUES('deluxe seating',502,400,20);
INSERT INTO SEAT_TYPE VALUES('elite',501,200,15);
INSERT INTO SEAT_TYPE VALUES('regular',509,120,50);
INSERT INTO SEAT_TYPE VALUES('sofas',510,200,20);
```

```sql
INSERT INTO SEAT VALUES(806,'B15','gold',507);
INSERT INTO SEAT VALUES(809,'A12','regular',503);
INSERT INTO SEAT VALUES(810,'A13','regular',503);
INSERT INTO SEAT VALUES(812,'E14','gold',504);
INSERT INTO SEAT VALUES(801,'F12','upper balcony',506);
INSERT INTO SEAT VALUES(805,'D22','sofas',508);
INSERT INTO SEAT VALUES(802,'C25','deluxe',502);
INSERT INTO SEAT VALUES(804,'G1','elite',501);
INSERT INTO SEAT VALUES(803,'B12','regular',509);
INSERT INTO SEAT VALUES(808,'D16','platinum',505);
INSERT INTO SEAT VALUES(807,'A4','sofas',510);
INSERT INTO SEAT VALUES(811,'A5','sofas',510);
```

TABLES CREATED:

1. CUSTOMER:

customer_id	first_name	last_name	gender	age	mobile	email
101	Sai	Prathyush	M	19	9963321540	sp@gmail.com
102	Rahul	Bomma	M	20	9973638383	rb@yahoo.com
103	Varun	Kumar	M	19	9879654376	vk@gmail.com
104	Samar	Reddy	M	22	8739238373	sr@gmail.com
105	Eren	Yenger	M	32	8652839287	ey@gmail.com
106	Sakura	Haruno	F	17	9827387283	sh@gmail.com
107	Anjali	Devi	F	45	9834938748	ad@gmail.com
108	Mahesh	Babu	M	46	9990929893	gmb@yahoo.com
109	Olivia	Morris	F	33	9996664443	om@gmail.com
110	Gayathri	Priya	F	35	9003724540	gp@gmail.com
111	Mitsuha	Miamizo	F	27	9968721375	mm@gmail.com
NULL	NULL	NULL	NULL	NULL	NULL	NULL

2. MOVIE:

movie_id	movie_name	cast	genre	duration	rating	release_date
301	Major	Adivi Sesh,Saiee Manjrekar	Action,Drama	02:30:00	9.4	2022-10-05
302	Spiderman:no way home	Tom Holland,Zendaya	Action,Sci-fi	02:28:00	9.5	2022-10-12
303	Ms Dhoni:The untold story	Sushant singh rajput,kiara Advani	Drama	03:40:00	8.9	2022-10-07
304	PK	Aamir khan,Anushka sharma	Drama	02:32:00	9.0	2022-07-20
305	Vikram	kamal hassan,vijay sethupathi,faahad faasil	Action,fantasy	02:52:00	9.4	2022-10-16
306	mugen train	kamado tanjiro,kyojuro rengoku	action,fantasy	01:57:00	9.2	2022-10-13
307	KGF2	yash,srinidhi shetty,sanjay dutt	action,drama	02:53:22	9.5	2022-10-02
308	your name	taki tachibana,miki okudera	sci-fi,romance	01:45:00	8.8	2022-10-15
309	RRR	jr.ntr,ram charan,alia	action,drama	03:00:06	9.5	2022-10-07
NULL	NULL	NULL	NULL	NULL	NULL	NULL

3. THEATRE:

theatre_id	theatre_name	location	capacity
501	Siri	Vijayawada	220
502	S2	Hanamkonda	120
503	Devi	Warangal	100
504	PVR Cinemas	Hyderabad	150
505	IMAX	Delhi	200
506	Amrutha	Pune	100
507	Bhavani	kazipet	150
508	AMB	Hyderabad	50
509	Mayuri	Kakinada	120
510	Rain cinema	Nellore	200
NULL	NULL	NULL	NULL

4. PAYMENT:

payment_id	payment_mode	payment_date	price	customer_id
201	cash	2022-10-16	200	102
202	card	2022-10-04	100	106
203	upi	2022-10-07	100	101
204	cash	2022-10-06	1500	107
205	upi	2022-10-05	200	109
206	card	2022-10-06	400	103
207	upi	2022-10-16	200	110
208	cash	2022-10-16	250	101
209	upi	2022-10-07	300	105
210	upi	2022-10-11	400	108
NULL	NULL	NULL	NULL	NULL

5. SEAT_TYPE

seat_type_name	theatre_id	cost	seat_type_capacity
copper	504	100	20
deluxe	503	200	30
deluxe seating	502	400	20
elite	501	200	15
elite	505	100	160
gold	504	200	30
gold	507	100	50
lower balcony	506	70	100
platinum	505	200	40
regular	503	125	70
regular	509	120	50
silver	504	150	80

6. SHOWS:

show_name	show_date	theatre_id	show_time	show_language	movie_id
First show	2022-10-06	502	6:00	hindi	304
First show	2022-10-06	506	06:35	telugu	307
First show	2022-10-08	509	06:30	telugu	307
First show	2022-10-11	510	06:45	telugu	303
First show	2022-10-16	503	06:45	telugu	305
First show	2022-10-16	505	06:15	korean	308
Matinee show	2022-10-07	507	02:30	telugu	301
Morning show	2022-10-17	504	10:45	english	302
Second show	2022-10-07	508	09:45	telugu	309
Second show	2022-10-18	501	09:45	english	306
NULL	NULL	NULL	NULL	NULL	NULL

7. SEAT:

ticket_id	seat_number	seat_type_name	theatre_id
801	F12	upper balcony	506
802	C25	deluxe	502
803	B12	regular	509
804	G1	elite	501
805	D22	sofas	508
806	B15	gold	507
807	A4	sofas	510
808	D16	platinum	505
809	A12	regular	503
810	A13	regular	503
811	A5	sofas	510
812	E14	gold	504
NULL	NULL	NULL	NULL
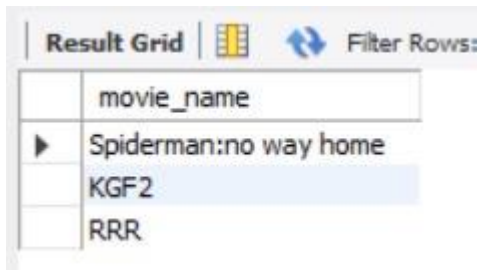
8. TICKETS:

ticket_id	customer_id	payment_id	show_name	show_date	theatre_id
801	107	204	First show	2022-10-06	506
802	103	206	First show	2022-10-06	502
803	105	209	First show	2022-10-08	509
804	110	207	Second show	2022-10-18	501
805	109	205	Second show	2022-10-07	508
806	101	203	Matinee show	2022-10-07	507
807	108	210	First show	2022-10-11	510
808	106	202	First show	2022-10-16	505
809	101	208	First show	2022-10-16	503
810	101	208	First show	2022-10-16	503
811	108	210	First show	2022-10-11	510
812	102	203	Morning show	2022-10-17	504
NULL	NULL	NULL	NULL	NULL	NULL

QUERIES:

1. Display all movie names with rating greater than 9.5.
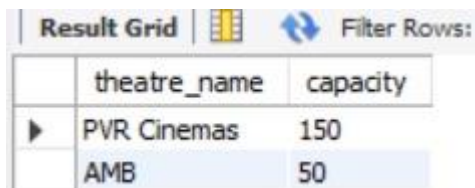
```
SELECT movie_name FROM MOVIE WHERE rating>=9.5;
```

Result Grid | Filter Rows:

movie_name
Spiderman:no way home
KGF2
RRR

2. Display all theatre names of theatres located in Hyderabad in decreasing order of their capacity.

```
SELECT theatre_name,capacity
FROM THEATRE
WHERE location='Hyderabad' ORDER BY capacity DESC;
```
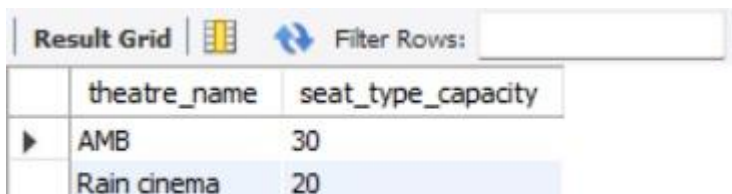
Result Grid | Filter Rows:

theatre_name	capacity
PVR Cinemas	150
AMB	50

3. Display all the theatre names who have 'sofas' in it ordered by number of sofas in each table and display number of sofas in each theatre.

```
SELECT theatre_name,seat_type_capacity
FROM theatre JOIN seat_type
WHERE seat_type_name='sofas'
AND theatre.theatre_id=seat_type.theatre_id ;
```

Result Grid | Filter Rows:

theatre_name	seat_type_capacity
AMB	30
Rain cinema	20

4. Name all the movies watched by customer with first name Eren?

```sql
SELECT movie_name FROM movie
WHERE movie_id IN(
 SELECT movie_id FROM shows WHERE
 show_name IN (
SELECT show_name FROM ticket WHERE customer_id IN (
SELECT customer_id FROM customer WHERE first_name='eren'))
and
theatre_id IN(
SELECT theatre_id FROM ticket WHERE customer_id IN (
SELECT customer_id FROM customer WHERE first_name='eren'))
and
show_date IN(
SELECT show_date FROM ticket WHERE customer_id IN (
SELECT customer_id FROM customer WHERE first_name='eren'))
);
```

Result Grid

movie_name
KGF2

THANK YOU

Rahul Bomma 202110

Bitla Varun Kumar 202108

A Sai Prathyush 202104