**IMDB Database Design**

Diagram

Description automatically generated

**Tables**

1. Movie Table---

-- create

CREATE TABLE Movie (

Movie\_id integer PRIMARY KEY,

Title text NOT NULL,

Year integer,

Language char(15) default "English"

);

CREATE TABLE Media (

Media\_id integer PRIMARY KEY,

Media\_type char(5) NOT NULL,

Media\_file blob NOT NULL

);

CREATE TABLE Movie\_media (

Movie\_id integer NOT NULL,

Media\_id integer NOT NULL,

foreign key(Movie\_id) references Movie(Movie\_id),

foreign key(Media\_id) references Media(Media\_id)

);

CREATE TABLE Genres (

Genre\_id integer PRIMARY KEY,

Genre\_type char(15) NOT NULL

);

CREATE TABLE Movie\_genres (

Movie\_id integer NOT NULL,

Genre\_id integer NOT NULL,

foreign key(Movie\_id) references Movie(Movie\_id),

foreign key(Genre\_id) references Genres(Genre\_id)

);

CREATE TABLE Actor (

Actor\_id integer PRIMARY KEY,

Actor\_name text NOT NULL,

Actor\_gender text NOT NULL

);

CREATE TABLE Skills (

Skill\_id integer PRIMARY KEY,

Skill\_name text NOT NULL

);

CREATE TABLE Actor\_skills (

Actor\_id integer NOT NULL,

Skill\_id integer NOT NULL,

foreign key(Actor\_id) references Actor(Actor\_id),

foreign key(Skill\_id) references Skills(Skill\_id)

);

CREATE TABLE Roles (

Role\_id integer PRIMARY KEY,

Role\_name text NOT NULL,

Movie\_id integer NOT NULL,

foreign key(Movie\_id) references Movie(Movie\_id)

);

CREATE TABLE Actor\_cast (

Actor\_id integer NOT NULL,

Movie\_id integer NOT NULL,

Role\_id integer NOT NULL,

foreign key(Actor\_id) references Actor(Actor\_id),

foreign key(Movie\_id) references Movie(Movie\_id),

foreign key(Role\_id) references Roles(Role\_id)

);

CREATE TABLE Reviewer (

Rev\_id integer PRIMARY KEY,

Rev\_name text NOT NULL

);

CREATE TABLE Reviews (

Movie\_id integer NOT NULL,

Rev\_id integer NOT NULL,

Rev\_rating integer,

Num\_of\_rating integer,

foreign key(Movie\_id) references Movie(Movie\_id),

foreign key(Rev\_id) references Reviewer(Rev\_id)

);

-- insert

INSERT INTO Movie(Movie\_id, Title, Year) VALUES (1001,'The Godfather', 1972);

INSERT INTO Movie(Movie\_id, Title, Year) VALUES (1002,'The Shawshank Redemption', 1994);

INSERT INTO Movie(Movie\_id, Title, Year) VALUES (1003,"Schindler's List", 1993);

INSERT INTO Movie(Movie\_id, Title, Year) VALUES (1004,'Star Wars', 1977);

INSERT INTO Media VALUES (2001,'Video', 'video1.mp4');

INSERT INTO Media VALUES (2002,'Image', 'image1.mp4');

INSERT INTO Media VALUES (2003,'Video', 'video2.mp4');

INSERT INTO Media VALUES (2004,'Image', 'image2.mp4');

INSERT INTO Media VALUES (2005,'Video', 'video3.mp4');

INSERT INTO Media VALUES (2006,'Image', 'image3.mp4');

INSERT INTO Media VALUES (2007,'Video', 'video4.mp4');

INSERT INTO Media VALUES (2008,'Image', 'image4.mp4');

INSERT INTO Movie\_media VALUES (1001, 2001);

INSERT INTO Movie\_media VALUES (1001, 2002);

INSERT INTO Movie\_media VALUES (1002, 2003);

INSERT INTO Movie\_media VALUES (1002, 2004);

INSERT INTO Movie\_media VALUES (1003, 2005);

INSERT INTO Movie\_media VALUES (1003, 2006);

INSERT INTO Movie\_media VALUES (1004, 2007);

INSERT INTO Movie\_media VALUES (1004, 2008);

INSERT INTO Genres VALUES (3001, "Crime");

INSERT INTO Genres VALUES (3002, "Drama");

INSERT INTO Genres VALUES (3003, "Biography");

INSERT INTO Genres VALUES (3004, "History");

INSERT INTO Genres VALUES (3005, "Action");

INSERT INTO Genres VALUES (3006, "Adventure");

INSERT INTO Genres VALUES (3007, "Fantasy");

INSERT INTO Movie\_genres VALUES (1001, 3001);

INSERT INTO Movie\_genres VALUES (1001, 3002);

INSERT INTO Movie\_genres VALUES (1002, 3002);

INSERT INTO Movie\_genres VALUES (1003, 3003);

INSERT INTO Movie\_genres VALUES (1003, 3002);

INSERT INTO Movie\_genres VALUES (1003, 3004);

INSERT INTO Movie\_genres VALUES (1004, 3005);

INSERT INTO Movie\_genres VALUES (1004, 3006);

INSERT INTO Movie\_genres VALUES (1004, 3007);

INSERT INTO Actor VALUES (4001, "Marlon Brando", "Male");

INSERT INTO Actor VALUES (4002, "Al Pacino", "Male");

INSERT INTO Actor VALUES (4003, "James Caan", "Male");

INSERT INTO Actor VALUES (4004, "Diane Keaton", "Female");

INSERT INTO Actor VALUES (4005, "Tim Robbins", "Male");

INSERT INTO Actor VALUES (4006, "Morgan Freeman", "Male");

INSERT INTO Actor VALUES (4007, "Bob Gunton", "Male");

INSERT INTO Actor VALUES (4008, "William Sadler", "Male");

INSERT INTO Actor VALUES (4009, "Liam Neeson", "Male");

INSERT INTO Actor VALUES (4010, "Ralph Fiennes", "Male");

INSERT INTO Actor VALUES (4011, "Ben Kingsley", "Male");

INSERT INTO Actor VALUES (4012, "Caroline Goodall", "Female");

INSERT INTO Actor VALUES (4013, "Mark Hamill", "Male");

INSERT INTO Actor VALUES (4014, "Harrison Ford", "Male");

INSERT INTO Actor VALUES (4015, "Carrie Fisher", "Female");

INSERT INTO Actor VALUES (4016, "Alec Guinness", "Male");

INSERT INTO Skills VALUES (5001, "Actor");

INSERT INTO Skills VALUES (5002, "Director");

INSERT INTO Skills VALUES (5003, "Cinematographer");

INSERT INTO Skills VALUES (5004, "Producer");

INSERT INTO Skills VALUES (5006, "Stunts");

INSERT INTO Skills VALUES (5007, "Soundtrack");

INSERT INTO Skills VALUES (5008, "Additional Crew");

INSERT INTO Skills VALUES (5009, "Writer");

INSERT INTO Actor\_skills VALUES (4001, 5001);

INSERT INTO Actor\_skills VALUES (4001, 5003);

INSERT INTO Actor\_skills VALUES (4001, 5002);

INSERT INTO Actor\_skills VALUES (4002, 5001);

INSERT INTO Actor\_skills VALUES (4002, 5004);

INSERT INTO Actor\_skills VALUES (4002, 5002);

INSERT INTO Actor\_skills VALUES (4003, 5001);

INSERT INTO Actor\_skills VALUES (4003, 5006);

INSERT INTO Actor\_skills VALUES (4003, 5002);

INSERT INTO Actor\_skills VALUES (4004, 5001);

INSERT INTO Actor\_skills VALUES (4004, 5004);

INSERT INTO Actor\_skills VALUES (4004, 5002);

INSERT INTO Actor\_skills VALUES (4005, 5001);

INSERT INTO Actor\_skills VALUES (4005, 5004);

INSERT INTO Actor\_skills VALUES (4005, 5002);

INSERT INTO Actor\_skills VALUES (4006, 5001);

INSERT INTO Actor\_skills VALUES (4006, 5004);

INSERT INTO Actor\_skills VALUES (4006, 5002);

INSERT INTO Actor\_skills VALUES (4007, 5001);

INSERT INTO Actor\_skills VALUES (4007, 5007);

INSERT INTO Actor\_skills VALUES (4008, 5001);

INSERT INTO Actor\_skills VALUES (4008, 5004);

INSERT INTO Actor\_skills VALUES (4008, 5002);

INSERT INTO Actor\_skills VALUES (4009, 5001);

INSERT INTO Actor\_skills VALUES (4009, 5004);

INSERT INTO Actor\_skills VALUES (4009, 5007);

INSERT INTO Actor\_skills VALUES (4010, 5001);

INSERT INTO Actor\_skills VALUES (4010, 5002);

INSERT INTO Actor\_skills VALUES (4010, 5004);

INSERT INTO Actor\_skills VALUES (4011, 5001);

INSERT INTO Actor\_skills VALUES (4011, 5004);

INSERT INTO Actor\_skills VALUES (4011, 5008);

INSERT INTO Actor\_skills VALUES (4012, 5001);

INSERT INTO Actor\_skills VALUES (4012, 5004);

INSERT INTO Actor\_skills VALUES (4012, 5009);

INSERT INTO Actor\_skills VALUES (4013, 5001);

INSERT INTO Actor\_skills VALUES (4013, 5004);

INSERT INTO Actor\_skills VALUES (4013, 5002);

INSERT INTO Actor\_skills VALUES (4014, 5001);

INSERT INTO Actor\_skills VALUES (4014, 5009);

INSERT INTO Actor\_skills VALUES (4014, 5004);

INSERT INTO Actor\_skills VALUES (4015, 5001);

INSERT INTO Actor\_skills VALUES (4015, 5008);

INSERT INTO Actor\_skills VALUES (4015, 5009);

INSERT INTO Actor\_skills VALUES (4016, 5001);

INSERT INTO Actor\_skills VALUES (4016, 5009);

INSERT INTO Actor\_skills VALUES (4016, 5007);

INSERT INTO Roles VALUES (6001, "Don Vito Corleone", 1001);

INSERT INTO Roles VALUES (6002, "Michael", 1001);

INSERT INTO Roles VALUES (6003, "Sonny", 1001);

INSERT INTO Roles VALUES (6004, "Kay Adams", 1001);

INSERT INTO Roles VALUES (6005, "Andy Dufresne", 1002);

INSERT INTO Roles VALUES (6006, "Ellis Redding", 1002);

INSERT INTO Roles VALUES (6007, "Warden Norton", 1002);

INSERT INTO Roles VALUES (6008, "Heywood", 1002);

INSERT INTO Roles VALUES (6009, "Oskar Schindler", 1003);

INSERT INTO Roles VALUES (6010, "Amon Goeth", 1003);

INSERT INTO Roles VALUES (6011, "Itzhak Stern", 1003);

INSERT INTO Roles VALUES (6012, "Emilie Schindler", 1003);

INSERT INTO Roles VALUES (6013, "Luke Skywalker", 1004);

INSERT INTO Roles VALUES (6014, "Han Solo", 1004);

INSERT INTO Roles VALUES (6015, "Princess Leia Organa", 1004);

INSERT INTO Roles VALUES (6016, "Ben Obi-Wan Kenobi", 1004);

INSERT INTO Actor\_cast VALUES (4001, 1001, 6001);

INSERT INTO Actor\_cast VALUES (4002, 1001, 6002);

INSERT INTO Actor\_cast VALUES (4003, 1001, 6003);

INSERT INTO Actor\_cast VALUES (4004, 1001, 6004);

INSERT INTO Actor\_cast VALUES (4005, 1002, 6005);

INSERT INTO Actor\_cast VALUES (4006, 1002, 6006);

INSERT INTO Actor\_cast VALUES (4007, 1002, 6007);

INSERT INTO Actor\_cast VALUES (4008, 1002, 6008);

INSERT INTO Actor\_cast VALUES (4009, 1003, 6009);

INSERT INTO Actor\_cast VALUES (4010, 1003, 6010);

INSERT INTO Actor\_cast VALUES (4011, 1003, 6011);

INSERT INTO Actor\_cast VALUES (4012, 1003, 6012);

INSERT INTO Actor\_cast VALUES (4013, 1004, 6013);

INSERT INTO Actor\_cast VALUES (4014, 1004, 6014);

INSERT INTO Actor\_cast VALUES (4015, 1004, 6015);

INSERT INTO Actor\_cast VALUES (4016, 1004, 6016);

INSERT INTO Reviewer VALUES (7001, "Sheldon");

INSERT INTO Reviewer VALUES (7002, "Gustavo");

INSERT INTO Reviewer VALUES (7003, "Chandler");

INSERT INTO Reviews VALUES (1001, 7001, 5, 3);

INSERT INTO Reviews VALUES (1002, 7001, 4, 2);

INSERT INTO Reviews VALUES (1003, 7001, 4, 5);

INSERT INTO Reviews VALUES (1004, 7001, 3, 3);

INSERT INTO Reviews VALUES (1001, 7002, 4, 5);

INSERT INTO Reviews VALUES (1002, 7002, 5, 2);

INSERT INTO Reviews VALUES (1003, 7002, 4, 1);

INSERT INTO Reviews VALUES (1004, 7002, 3, 3);

INSERT INTO Reviews VALUES (1001, 7003, 4, 4);

INSERT INTO Reviews VALUES (1002, 7003, 4, 3);

INSERT INTO Reviews VALUES (1003, 7003, 4, 6);

INSERT INTO Reviews VALUES (1004, 7003, 4, 2);

-- fetch

SELECT \* FROM Movie;

SELECT \* FROM Media;

SELECT \* FROM Movie\_media;

SELECT \* FROM Genres;

SELECT \* FROM Movie\_genres;

SELECT \* FROM Actor;

SELECT \* FROM Skills;

SELECT \* FROM Actor\_skills;

SELECT \* FROM Roles;

SELECT \* FROM Actor\_cast;

SELECT \* FROM Reviewer;

SELECT \* FROM Reviews;

Graphical user interface, application

Description automatically generated

Graphical user interface, application

Description automatically generated

Graphical user interface

Description automatically generated with low confidence

A picture containing graphical user interface

Description automatically generated

Graphical user interface

Description automatically generated with low confidence

Graphical user interface

Description automatically generated

Graphical user interface

Description automatically generated with low confidence