1. **Select the American directors ordered from oldest to youngest.**
2. **Query:** postgres=# select \* from directors where nationality = 'American' order by date\_of\_birth;

**OUTPUT:**

director\_id | first\_name | last\_name | date\_of\_birth | nationality

-------------+------------+--------------+---------------+-------------

8 | Victor | Fleming | 1889-02-23 | American

34 | Robert | Wise | 1914-09-10 | American

13 | Stanley | Kubrick | 1928-07-26 | American

9 | Francis | Ford Coppola | 1939-04-07 | American

26 | Martin | Scorsese | 1942-11-17 | American

17 | George | Lucas | 1944-05-14 | American

31 | Steven | Spielberg | 1946-12-18 | American

36 | Robert | Zemeckis | 1952-05-14 | American

6 | James | Cameron | 1954-08-16 | American

14 | John | Lasseter | 1957-01-12 | American

25 | Mark | Romanek | 1959-09-18 | American

24 | Sam | Raimi | 1959-10-23 | American

33 | Quentin | Tarantino | 1963-03-27 | American

29 | Zack | Snyder | 1966-03-01 | American

3 | Wes | Anderson | 1969-05-01 | American

2 | Paul | Anderson | 1970-06-26 | American

1. ows)
2. **Return the first names, last names and date of births of the 10 youngest female actors.**

**Query:** postgres=# select first\_name, last\_name, date\_of\_birth from actors where gender='F' order by date\_of\_birth desc limit 10;

**OUTPUT:**

first\_name | last\_name | date\_of\_birth

------------+-------------+---------------

Lina | Leandersson | 1995-09-27

Ivana | Baquero | 1994-06-11

Saoirse | Ronan | 1994-04-12

Yasmin | Paige | 1991-06-24

Rumi | Hiiragi | 1987-08-01

Aki | Maeda | 1985-07-11

Carey | Mulligan | 1985-05-28

Keira | Knightley | 1985-03-26

Jin-seo | Yoon | 1983-08-05

Alice | Braga | 1983-04-15

1. ows)
2. **Return the top 3 movies with the highest international takings.**

**Query:** postgres=# select movie\_name from movies where movie\_id in (select movie\_id from movie\_revenues order by international\_takings desc limit 3);

**OUTPUT:**

movie\_name

--------------------

A Clockwork Orange

Mary Poppins

The Sound of Music

(3 rows)

1. **Concatenate the first and last names of the directors spearated by a space, and call this new column full\_name.**

**Query:** postgres=# select concat(first\_name, ' ',last\_name) as full\_name from directors;

**OUTPUT**

full\_name

-----------------------------------

Tomas Alfredson

Paul Anderson

Wes Anderson

Richard Ayoade

Luc Besson

James Cameron

Guillermo del Toro

Victor Fleming

Francis Ford Coppola

Kinji Fukasaku

Florian Henckel von Donnersmarck

Terry Jones

Stanley Kubrick

John Lasseter

Ang Lee

Bruce Lee

George Lucas

Martin McDonagh

James McTeigue

Fernando Meirelles

Hayao Miyazaki

Paulo Morelli

Chan-wook Park

Sam Raimi

Mark Romanek

Martin Scorsese

Ridley Scott

Tony Scott

Zack Snyder

Sion Sono

Steven Spielberg

Robert Stevenson

Quentin Tarantino

Robert Wise

Kar Wai Wong

Robert Zemeckis

Yimou Zhang

(37 rows)

1. **Return the actors with missing first\_names or data\_of\_births.**

**Query:** postgres=# select \* from actors where first\_name is NULL or date\_of\_birth is NULL;

**OUTPUT**

actor\_id | first\_name | last\_name | gender | date\_of\_birth

----------+------------+-----------+--------+---------------

29 | | Denden | M | 1950-01-23

46 | Xian | Gao | M |

(2 rows)

1. **Count the number of actors born after the 1st January 1970.**

**Query:** postgres=# select count(\*) from actors where date\_of\_birth >= '1970-01-01';

**OUTPUT**

count

-------

55

(1 row)

1. **What was the highest and lowest domestic takings for a movie.**

**Query:** postgres=# select max(domestic\_takings), min(domestic\_takings) from movie\_revenues;

**OUTPUT**

max | min

--------+------

659.20 | 0.30

(1 row)

1. **What is the sum total movie length for movies rated 15.**

**Query:** postgres=# select sum(movie\_length) from movies where age\_certificate= '15';

**OUTPUT**

sum

------

2184

(1 row)

1. **How many Japanese directors are in the directors table.**

**Query:** postgres=# select \* from directors where nationality = 'Japanese';

**OUTPUT:**

director\_id | first\_name | last\_name | date\_of\_birth | nationality

-------------+------------+-----------+---------------+-------------

10 | Kinji | Fukasaku | 1930-07-03 | Japanese

21 | Hayao | Miyazaki | 1941-01-05 | Japanese

30 | Sion | Sono | 1961-12-18 | Japanese

(3 rows)

1. **What is the average movie length for chinese movies.**

**Query:** postgres=# select avg(movie\_length) from movies where movie\_lang = 'Chinese';

**OUTPUT:**

avg

----------------------

121.8000000000000000

(1 row)

1. **How many directors are there per nationality?**

**Query:** postgres=# select nationality, count(\*) from directors group by nationality order by nationality;

**OUTPUT:**

nationality | count

--------------+-------

American | 16

Australian | 1

Brazilian | 2

British | 6

Chinese | 4

French | 1

German | 1

Japanese | 3

Mexican | 1

South Korean | 1

Swedish | 1

(11 rows)

1. **What is the sum total movie\_length for each age certificate and movie language combination?**

**Query:** postgres=# select movie\_lang, age\_certificate, sum(movie\_length) from movies group by movie\_lang, age\_certificate order by movie\_lang;

**OUTPUT:**

movie\_lang | age\_certificate | sum

------------+-----------------+------

Chinese | 12 | 496

Chinese | 15 | 113

English | 12 | 929

English | U | 393

English | PG | 1364

English | 15 | 1638

English | 18 | 500

German | 15 | 165

Japanese | U | 227

Japanese | 18 | 219

Korean | 18 | 130

Portuguese | 18 | 145

Portuguese | 15 | 140

Spanish | PG | 98

Swedish | 15 | 128

(15 rows)

1. **Return the movie languages which have a sum total movie length of over 500 minutes**.

**Query:** postgres=# select movie\_lang, sum(movie\_length) from movies group by movie\_lang having sum(movie\_length)>500;

**OUTPUT**:

movie\_lang | sum

------------+------

Chinese | 609

English | 4824

(2 rows)

1. **Select the directors first and last names, the movie names, and release dates for all Chinese, Korean, and Japanese movies**.

**Query:** postgres=# select first\_name, last\_name, movie\_name, release\_date from directors, movies where movies.director\_id = directors.director\_id AND nationality IN ('Chinese','Korean','Japanese');

**OUTPUT:**

first\_name | last\_name | movie\_name | release\_date

------------+-----------+-------------------------------+--------------

Kinji | Fukasaku | Battle Royale | 2001-01-04

Kar Wai | Wong | Chungking Express | 1996-08-03

Sion | Sono | Cold Fish | 2010-09-12

Ang | Lee | Crouching Tiger Hidden Dragon | 2000-07-06

Yimou | Zhang | House of Flying Daggers | 2004-03-12

Kar Wai | Wong | In the Mood for Love | 2001-02-02

Ang | Lee | Life of Pi | 2012-11-21

Hayao | Miyazaki | Ponyo | 2009-08-14

Hayao | Miyazaki | Spirited Away | 2001-06-19

Bruce | Lee | Way of the Dragon | 1972-06-01

(10 rows)

1. **Select the movie names, release dates & international takings of all English language movies.**

**Query:** postgres=# select movie\_name, release\_date, international\_takings from movies, movie\_revenues where movies.movie\_id= movie\_revenues.movie\_id AND movie\_lang='English';

**OUTPUT:**

movie\_name | release\_date | international\_takings

--------------------------------------------+--------------+-----------------------

The Wizard of Oz | 1939-08-25 | 1.30

Gone with the Wind | 1939-12-15 | 201.20

Mary Poppins | 1964-08-29 |

The Sound of Music | 1965-03-02 |

A Clockwork Orange | 1972-02-02 |

Jaws | 1975-06-20 | 210.90

Taxi Driver | 1976-02-07 |

Star Wars: A New Hope | 1977-05-25 | 314.20

Apocalypse Now | 1979-08-15 |

Life of Brian | 1979-08-17 |

Star Wars: Empire Strikes Back | 1980-05-21 | 247.80

The Shining | 1980-05-23 |

Raging Bull | 1980-11-14 |

Blade Runner | 1982-06-25 |

Star Wars: Return of the Jedi | 1983-05-25 | 166.20

Top Gun | 1986-05-16 | 177.30

Goodfellas | 1990-09-19 |

Forrest Gump | 1994-07-06 | 348.10

Pulp Fiction | 1994-10-14 | 106.20

Leon | 1994-11-18 |

Toy Story | 1995-11-22 | 182.40

The Fifth Element | 1997-05-09 | 200.30

Titanic | 1997-12-19 | 1528.10

Rushmore | 1998-11-12 |

Eyes Wide Shut | 1999-07-16 | 106.30

Gladiator | 2000-05-05 | 273.40

Spider-Man | 2002-05-03 | 418.10

Spider-Man 2 | 2004-06-30 | 410.40

V for Vendetta | 2006-03-17 | 62.50

Spider-Man 3 | 2007-05-04 | 554.00

The Darjeeling Limited | 2007-09-29 | 23.20

There Will Be Blood | 2007-12-26 | 35.80

Watchmen | 2009-03-06 | 77.50

Never Let Me Go | 2010-09-15 | 7.10

Submarine | 2011-06-03 | 0.40

Life of Pi | 2012-11-21 | 484.10

Grand Budapest Hotel | 2014-07-03 | 115.50

Three Billboards Outside Ebbing, Missouri | 2017-11-10 | 104.70

(38 rows)

1. **Select the movie names, domestic takings and international takings for all movies with either missing domestic takings or missing international takings and order the results by movie name.**

**Query:**

postgres=# select movie\_name, domestic\_takings, international\_takings from movies, movie\_revenues where movies.movie\_id= movie\_revenues.movie\_id AND (domestic\_takings IS NULL or international\_takings IS NULL);

**OUTPUT:**

movie\_name | domestic\_takings | international\_takings

--------------------+------------------+-----------------------

A Clockwork Orange | 27.10 |

Apocalypse Now | 83.40 |

Battle Royale | |

Blade Runner | 33.30 |

Chungking Express | |

Cold Fish | |

Goodfellas | 46.60 |

Leon | |

Life of Brian | 19.60 |

Mary Poppins | 102.10 |

Raging Bull | 23.10 |

Rushmore | 16.90 |

Taxi Driver | 28.10 |

The Shining | 44.10 |

The Sound of Music | 158.70 |

Way of the Dragon | |

(16 rows)

1. **Use left join to select the first and last names of all British directors and the names and age certificates of the movies that they directed.**

**Query:** postgres=# select first\_name, last\_name, movie\_name, age\_certificate from directors left join movies on directors.director\_id = movies.director\_id where nationality = 'British';

**OUTPUT:**

first\_name | last\_name | movie\_name | age\_certificate

------------+-----------+--------------------------------------------+-----------------

Ridley | Scott | Blade Runner | 15

Ridley | Scott | Gladiator | 15

Terry | Jones | Life of Brian | 15

Robert | Stevenson | Mary Poppins | U

Richard | Ayoade | Submarine | 15

Martin | McDonagh | Three Billboards Outside Ebbing, Missouri | 15

Tony | Scott | Top Gun | 12

(7 rows)

1. **Count the number of movies that each director has directed.**

**Query:** postgres=# select first\_name, last\_name, count(movie\_id) from movies, directors where directors.director\_id = movies.director\_id group by directors.director\_id;

**OUTPUT:**

first\_name | last\_name | count

------------+--------------------------+-------

Zack | Snyder | 1

Richard | Ayoade | 1

Robert | Wise | 1

Robert | Stevenson | 1

Kinji | Fukasaku | 1

Francis | Ford Coppola | 1

Guillermo | del Toro | 1

Kar Wai | Wong | 2

Ang | Lee | 2

James | Cameron | 1

Martin | Scorsese | 3

Terry | Jones | 1

Sam | Raimi | 3

James | McTeigue | 1

Robert | Zemeckis | 1

Mark | Romanek | 1

Steven | Spielberg | 1

Sion | Sono | 1

Hayao | Miyazaki | 2

John | Lasseter | 1

Wes | Anderson | 3

George | Lucas | 3

Yimou | Zhang | 1

Tony | Scott | 1

Paulo | Morelli | 1

Fernando | Meirelles | 1

Quentin | Tarantino | 1

Stanley | Kubrick | 3

Tomas | Alfredson | 1

Luc | Besson | 2

Martin | McDonagh | 1

Paul | Anderson | 1

Bruce | Lee | 1

Ridley | Scott | 2

Chan-wook | Park | 1

Florian | Henckel von Donnersmarck | 1

Victor | Fleming | 2

(37 rows)

1. **Select the first names, last names and dates of birth from directors & actors table. Order the result by the date of birth.**

**Query:** postgres=# select first\_name,last\_name, date\_of\_birth from directors union select first\_name, last\_name, date\_of\_birth from actors order by date\_of\_birth;

**OUTPUT:**

first\_name | last\_name | date\_of\_birth

------------+--------------------------+---------------

Victor | Fleming | 1889-02-23

Clark | Gable | 1901-02-01

Robert | Stevenson | 1905-03-31

Scatman | Crothers | 1910-05-23

Vivien | Leigh | 1913-11-05

Alec | Guiness | 1914-04-02

Robert | Wise | 1914-09-10

Judy | Garland | 1922-06-10

Marlon | Brando | 1924-04-03

Dick | Van Dyke | 1925-12-13

Stanley | Kubrick | 1928-07-26

Sihung | Lung | 1930-01-01

Kinji | Fukasaku | 1930-07-03

Ian | Holm | 1931-09-12

Rebecca | Pan | 1931-12-29

Roy | Scheider | 1932-11-10

Julie | Andrews | 1935-10-01

Dennis | Hopper | 1936-05-17

Jack | Nicholson | 1937-04-22

Ridley | Scott | 1937-11-30

Oliver | Reed | 1938-02-13

Francis | Ford Coppola | 1939-04-07

John | Cleese | 1939-10-27

Chuck | Norris | 1940-03-10

Martin | Sheen | 1940-08-03

Bruce | Lee | 1940-11-27

Hayao | Miyazaki | 1941-01-05

Graham | Chapman | 1941-01-08

Per | Ragnar | 1941-05-29

Terry | Jones | 1942-02-01

Harrison | Ford | 1942-07-13

Martin | Scorsese | 1942-11-17

Joe | Pesci | 1943-02-09

Eric | Idle | 1943-03-29

Michael | Palin | 1943-05-05

Malcolm | McDowell | 1943-06-13

Robert | De Niro | 1943-08-17

Rutger | Hauer | 1944-01-23

George | Lucas | 1944-05-14

Tony | Scott | 1944-06-21

Brian | Cox | 1946-06-01

Pei-pei | Cheng | 1946-12-04

Steven | Spielberg | 1946-12-18

Takeshi | Kitano | 1947-01-18

Jean | Reno | 1948-07-30

Samuel | Jackson | 1948-12-21

Shelley | Duvall | 1949-07-07

| Denden | 1950-01-23

Yimou | Zhang | 1950-04-02

Bill | Murray | 1950-09-21

Peter | Carlberg | 1950-12-08

Mark | Hamill | 1951-09-25

Mari | Natsuki | 1952-05-02

Robert | Zemeckis | 1952-05-14

Jeff | Goldblum | 1952-10-22

Alfred | Molina | 1953-05-24

Tim | Allen | 1953-06-13

Ulrich | Muhe | 1953-06-20

John | Travolta | 1954-02-18

James | Cameron | 1954-08-16

Lorraine | Bracco | 1954-10-02

Ang | Lee | 1954-10-23

Ray | Liotta | 1954-12-18

George | Tokoro | 1955-01-26

Bruce | Willis | 1955-03-19

Yun-fat | Chow | 1955-05-18

Willem | Dafoe | 1955-07-22

Fernando | Meirelles | 1955-11-09

Tom | Hanks | 1956-07-09

Carrie | Fisher | 1956-10-21

John | Lasseter | 1957-01-12

Mykelti | Williamson | 1957-03-04

Daniel | Day-Lewis | 1957-04-29

Francis | McDormand | 1957-06-23

Gary | Oldman | 1958-03-21

Kar Wai | Wong | 1958-07-17

Daryl | Hannah | 1958-12-03

Luc | Besson | 1959-03-18

Mark | Romanek | 1959-09-18

Sam | Raimi | 1959-10-23

Sean | Young | 1959-11-20

Val | Kilmer | 1959-12-31

Hugo | Weaving | 1960-04-04

Ika | Nord | 1960-04-29

Tilda | Swinton | 1960-11-05

Cathy | Moriarty | 1960-11-29

Jackey | Haley | 1961-07-14

Woody | Harrelson | 1961-07-23

Dandan | Song | 1961-08-25

Martina | Gedeck | 1961-09-14

Andy | Lau | 1961-09-27

Sion | Sono | 1961-12-18

Min-sik | Choi | 1962-05-30

Sebastian | Koch | 1962-05-31

Tony | Leung | 1962-06-27

Tom | Cruise | 1962-07-03

Michelle | Yeoh | 1962-08-06

Jodie | Foster | 1962-11-19

Ralph | Fiennes | 1962-12-22

Quentin | Tarantino | 1963-03-27

Chan-wook | Park | 1963-08-23

Russell | Crowe | 1964-04-07

Maggie | Cheung | 1964-09-20

Guillermo | del Toro | 1964-10-09

Mitsuru | Fukikoshi | 1965-02-17

Tomas | Alfredson | 1965-04-01

Connie | Nielsen | 1965-07-03

Billy | Zane | 1966-02-24

Zack | Snyder | 1966-03-01

Paulo | Morelli | 1966-03-10

Robin | Wright | 1966-04-08

Irfan | Khan | 1967-01-07

Nicole | Kidman | 1967-06-20

James | McTeigue | 1967-12-29

Olivia | Williams | 1968-07-26

Sam | Rockwell | 1968-11-05

Owen | Wilson | 1968-11-18

Wes | Anderson | 1969-05-01

Peter | Dinklage | 1969-06-11

Faye | Wong | 1969-08-08

Edward | Norton | 1969-08-18

Noah | Taylor | 1969-09-04

Martin | McDonagh | 1970-03-26

Uma | Thurman | 1970-04-29

Paul | Anderson | 1970-06-26

Carla | Gugino | 1971-08-29

Chris | Tucker | 1971-08-31

Luke | Wilson | 1971-09-21

Asuka | Kurosawa | 1971-12-22

Danny | Lloyd | 1972-10-13

Jude | Law | 1972-12-29

Adrien | Brody | 1973-04-14

Florian | Henckel von Donnersmarck | 1973-05-02

Patrick | Wilson | 1973-07-03

Paddy | Considine | 1973-09-05

Takeshi | Kaneshiro | 1973-10-11

Joaquin | Phoenix | 1974-10-28

Leonardo | DiCaprio | 1974-11-11

Tobey | Maguire | 1975-06-27

Kate | Winslet | 1975-10-05

Milla | Jovovich | 1975-12-17

Ji-tae | Yoo | 1976-04-13

Sally | Hawkins | 1976-04-27

Chen | Chang | 1976-10-14

Richard | Ayoade | 1977-06-12

James | Franco | 1978-04-19

Malin | Akerman | 1978-05-12

Leandro | Firmino | 1978-06-23

Ziyi | Zhang | 1979-02-09

Jason | Schwartzmann | 1980-06-26

Natilie | Portman | 1981-06-09

Megumi | Kagurazaka | 1981-09-28

Hei-Jung | Kang | 1982-01-04

Kirsten | Dunst | 1982-04-30

Tatsuya | Fujiwara | 1982-05-15

Abbie | Cornish | 1982-08-07

Gemma | Chan | 1982-11-29

Rafe | Spall | 1983-03-10

Alice | Braga | 1983-04-15

Alexandre | Rodrigues | 1983-05-21

Jin-seo | Yoon | 1983-08-05

Andrew | Garfield | 1983-08-20

Paul | Dano | 1984-06-19

Keira | Knightley | 1985-03-26

Carey | Mulligan | 1985-05-28

Aki | Maeda | 1985-07-11

Mason | Gamble | 1986-01-16

Rumi | Hiiragi | 1987-08-01

Miyu | Irino | 1988-02-19

Darlan | Cunha | 1988-07-26

Douglas | Silva | 1988-09-27

Craig | Roberts | 1991-01-21

Yasmin | Paige | 1991-06-24

Suraj | Sharma | 1993-03-21

Saoirse | Ronan | 1994-04-12

Ivana | Baquero | 1994-06-11

Kare | Hedebrant | 1995-06-28

Lina | Leandersson | 1995-09-27

Dillon | Freasier | 1996-03-06

Tony | Revolori | 1996-04-28

Hiroki | Doi | 1999-08-10

Xian | Gao |

(182 rows)

1. **Select the first and last names of all directors and actors born in the 1960s. Order the result by last name.**

**Query:** postgres=# select first\_name, last\_name from directors where date\_of\_birth between'1960-01-01' AND '1969-12-31' union select first\_name, last\_name from actors where date\_of\_birth BETWEEN '1960-01-01' AND '1969-12-31' order by last\_name;

**OUTPUT:**

first\_name | last\_name

------------+-----------

Tomas | Alfredson

Wes | Anderson

Maggie | Cheung

Min-sik | Choi

Russell | Crowe

Tom | Cruise

Guillermo | del Toro

Peter | Dinklage

Ralph | Fiennes

Jodie | Foster

Mitsuru | Fukikoshi

Martina | Gedeck

Jackey | Haley

Woody | Harrelson

Irfan | Khan

Nicole | Kidman

Sebastian | Koch

Andy | Lau

Tony | Leung

James | McTeigue

Paulo | Morelli

Cathy | Moriarty

Connie | Nielsen

Ika | Nord

Edward | Norton

Chan-wook | Park

Sam | Rockwell

Zack | Snyder

Dandan | Song

Sion | Sono

Tilda | Swinton

Quentin | Tarantino

Noah | Taylor

Hugo | Weaving

Olivia | Williams

Owen | Wilson

Faye | Wong

Robin | Wright

Michelle | Yeoh

Billy | Zane

(40 rows)