|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Patient\_id | First\_Name | Last\_name | gender | Birth\_date | city | Province\_id | allergies | Height | weight |
| 1 | Miyuki | Riviera | F | 1953-12-06 | Hamilton | ON | NKA | 181 | 93 |
| 2 | Deunan | Knute | F | 1937-04-24 | Hamilton | ON | Pork | 172 | 100 |
| 3 | Lois | McAllister | F | 2011-09-02 | Carisle | ON | NKA | 101 | 31 |
| 4 | Angua | von Uberwald | F | 1972-06-21 | Toronto | ON | NKA | 176 | 80 |
| 5 | Darryl | Morris | M | 1983-06-26 | Hamilton | ON | NKA | 168 | 83 |
| 6 | Sam | Platter | M | 1989-04-01 | Hamilton | ON | NKA | 144 | 71 |
| 7 | Pamela | Harman | F | 1929-05-10 | Stoney Creek | ON | NKA | 152 | 54 |
| 8 | Rita | Morrow | F | 1978-01-12 | Toronto | ON | Cats | 182 | 107 |
| 9 | Kiriko | Masaki | F | 1963-06-16 | Fonthill | ON | NKA | 180 | 94 |
| 10 | Piper | Cooper | F | 1991-01-23 | Brantford | ON | Strawberries | 168 | 113 |
| 11 | Fenella | Burnett | F | 1998-06-13 | Toronto | ON | Codeine | 144 | 53 |
| 12 | Miranda | Corbie | F | 1981-07-26 | Burlington | ON | Penicillin | 144 | 57 |
| 13 | Trinity | Pekkala | F | 1977-06-15 | Hamilton | ON | Sulphur | 172 | 83 |
| 14 | Benjamin | Brockman | M | 1968-06-15 | Hamilton | ON | Sulphur | 189 | 121 |
| 15 | Violet | Turner | F | 2007-08-24 | Elmwood | ON | Lactose Intolerant | 138 | 49 |
| 16 | Jonathan | Capone | M | 1948-12-05 | Hamilton | ON | NKA | 191 | 122 |
| 17 | Evan | Stone | M | 1978-02-02 | Hamilton | ON | NKA | 144 | 83 |
| 18 | John | Klump | M | 1960-11-27 | Grimsby | ON | Penicillin | 183 | 127 |
| 19 | Annie | Crandall | F | 1928-09-09 | Burlington | ON | Penicillin | 166 | 85 |

| **province\_id** | **province\_name** |
| --- | --- |
| AB | Alberta |
| BC | British Columbia |
| MB | Manitoba |
| NB | New Brunswick |
| NL | Newfoundland and Labrador |
| NT | Northwest Territories |
| NS | Nova Scotia |
| NU | Nunavut |
| ON | Ontario |
| PE | Prince Edward Island |
| QC | Quebec |
| SK | Saskatchewan |
| YT | Yukon |

Admission:

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Patientid | Admission\_date | Discharge\_date | Primary\_dia | Sec\_dia | Physici | Nursind\_id | Room | bed |
| 1 | 2017-11-02 | 2017-11-04 | Dementia | Cataracts | 21 | 1EAST | 4 | 2 |
| 1 | 2017-09-16 | 2017-09-16 | Abdominal Pain | Inflammation Of The Gall Bladder | 24 | CCU | 2 | 2 |
| 3 | 2018-01-20 | 2018-01-25 | Child Birth | Low Iron (Iron Defency Anemia) | 2 | 3NORTH | 3 | 1 |
| 3 | 2017-10-17 | 2017-10-23 | Osteoarthritis Right Knee | Total Right Knee Replacement | 8 | CCU | 5 | 2 |
| 6 | 2017-06-09 | 2017-06-11 | Pregnancy | Abruptio Placentae | 3 | OR | 4 | 1 |
| 6 | 2017-11-04 | 2017-11-05 | Congestive Heart Failure | Coronary Artery Disease | 22 | 2EAST | 1 | 1 |
| 7 | 2017-06-20 | 2017-06-29 | Hyperemesis | Pregnancy | 8 | 1SOUTH | 1 | 2 |
| 8 | 2017-09-14 | 2017-09-17 | Pulmonary Edema | Myocardial Infarction | 6 |  |  |  |

1. Show first name, last name, and gender of patients who's gender is 'M'

db=# select first\_name, last\_name from hos where gender = 'm';

first\_name | last\_name

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

Darryl | Morris

Sam | Platter

(2 rows)

1. Show first name and last name of patients who does not have allergies (null).

db=# select first\_name, last\_name from hos where allergies = 'null';

first\_name | last\_name

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

Sam | Platter

1. Show first name of patients that start with the letter 'C'

db=# select \* from hos where first\_name like 'A%';

patient\_id | first\_name | last\_name | gender | birth\_date | city | province\_id | allergies | height | weight

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

4 | Angua | von Uberwald | f | 1972-06-21 | Toronto | ON | NKA | 176 | 80

1. Show first name and last name of patients that weight within the range of 100 to 120 (inclusive)

db=# Select first\_name, last\_name from hos where weight between 100 to 120;

ERROR: syntax error at or near "to"

LINE 1: ...st\_name, last\_name from hos where weight between 100 to 120;

^

db=# Select first\_name, last\_name from hos where weight between 100 and 120;

first\_name | last\_name

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

Deunan | Knute

(1 row)

1. Update the patients table for the allergies column. If the patient's allergies is null then replace it with 'NKA'

update hos set allergies = null where allergies = 'nka';

1. Show first name and last name concatinated into one column to show their full name.

select first\_name, last\_name, concat(first\_name ,’ ‘, last\_name) as fullname from hos;

7. Show first name, last name, and the full province name of each patient.

Example: 'Ontario' instead of 'ON'

db=# select first\_name, last\_name, province\_name from hos inner join pital on hos.province\_id = pital.province\_id;

first\_name | last\_name | province\_name

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

Sam | Platter | Ontario

Darryl | Morris | Ontario

Angua | von Uberwald | Ontario

Lois | McAllister | Ontario

Miyuki | Riviera | Ontario

Deunan | Knute | Ontario

1. Show how many patients have a birth\_date with 2010 as the birth year.

select count(birth\_date) from hos where year(birth\_date) = 2010;

1. Show the first\_name, last\_name, and height of the patient with the greatest height.

select first\_name, last\_name, height from hos order by height desc limit 5;

10. Show all columns for patients who have one of the following patient\_ids:

1,45,534,879,1000

select \* from hos where patient\_id in (1,3,4);

db=# select \* from hos where patient\_id in (1,3,4);

patient\_id | first\_name | last\_name | gender | birth\_date | city | province\_id | allergies | height | weight

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

1 | Miyuki | Riviera | f | 1953-12-06 | Hamilton | ON | NKA | 181 | 93

3 | Lois | McAllister | f | 2011-09-02 | Carisle | ON | NKA | 101 | 31

4 | Angua | von Uberwald | f | 1972-06-21 | Toronto | ON | NKA | 176 | 80

11. Show the total number of admissions

12. Show all the columns from admissions where the patient was admitted and discharged on the same day.

13. Show the total number of admissions for patient\_id 573.

14. Show unique birth years from patients and order them by ascending.

15. Show unique first names from the patients table which only occurs once in the list.

For example, if two or more people are named 'John' in the first\_name column then don't include their name in the output list. If only 1 person is named 'Leo' then include them in the output.

medium

16. Show patient\_id and first\_name from patients where their first\_name start and ends with 's' and is at least 6 characters long.

17. Show patient\_id, first\_name, last\_name from patients whos primary\_diagnosis is 'Dementia'.

Primary diagnosis is stored in the admissions table.

18. Display every patient's first\_name.

Order the list by the length of each name and then by alphbetically

19. Show the total amount of male patients and the total amount of female patients in the patients table

20. Show first and last name, allergies from patients which have allergies to either 'Penicillin' or 'Morphine'. Show results ordered ascending by allergies then by first\_name then by last\_name.

21. Show patient\_id, primary\_diagnosis from admissions. Find patients admitted multiple times for the same primary\_diagnosis.

22. Show the city and the total number of patients in the city in the order from most to least patients.

23. Show all allergies ordered by popularity. Remove 'NKA' and NULL values from query.

24. Show all patient's first\_name, last\_name, and birth\_date who were born in the 1970s decade. Sort the list starting from the earliest birth\_date.

25. We want to display each patient's full name in a single column. Their last\_name in all upper letters must appear first, then first\_name in all lower case letters. Separate the last\_name and first\_name with a comma. Order the list by the first\_name in decending order  
EX: SMITH,jane

26. Show the province\_id(s), sum of height; where the total sum of its patient's height is greater than or equal to 7,000.

27. Show the difference between the largest weight and smallest weight for patients with the last name 'Maroni'

28. Based on the cities that our patients live in, show unique cities that are in province\_id 'NS'?

29. Show all of the month's day numbers and how many admission\_dates occurred on that number. Sort by the day with most admissions to least admissions.

30. Show the patient\_id, nursing\_unit\_id, room, and bed for patient\_id 542's most recent admission\_date.

31. Show the nursing\_unit\_id and count of admissions for each nursing\_unit\_id. Exclude the following nursing\_unit\_ids: 'CCU', 'OR', 'ICU', 'ER'.

32. Show patient\_id, attending\_physician\_id, and primary\_diagnosis for admissions that match one of the two criteria:  
1. patient\_id is an odd number and attending\_physician\_id is either 1, 5, or 19.  
2. attending\_physician\_id contains a 2 and the length of patient\_id is 3 characters.

33. Show all of the patients grouped into weight groups.  
Show the total amount of patients in each weight group.  
Order the list by the weight group decending.  
  
For example, if they weight 100 to 109 they are placed in the 100 weight group, 110-119 = 110 weight group, etc.

34. Show patient\_id, weight, height, isObese from the patients table.  
  
Display isObese as a boolean 0 or 1.  
  
Obese is defined as weight(kg)/(height(m)2) >= 30.  
  
weight is in units kg.  
  
height is in units cm.

35. Show patient\_id, first\_name, last\_name, and attending physician's specialty.  
Show only the patients who has a primary\_diagnosis as 'Dementia' and the physician's first name is 'Lisa'  
  
Check patients, admissions, and physicians tables for required information.

36. All patients who have gone through admissions, can see their medical documents on our site. Those patients are given a temporary password after their first admission. Show the patient\_id and temp\_password.  
  
The password must be the following, in order:  
1. patient\_id  
2. the numerical length of patient's last\_name  
3. year of patient's birth\_date

37. Each admission costs $50 for patients without insurance, and $10 for patients with insurance. All patients with an even patient\_id have insurance.  
  
Give each patient a 'Yes' if they have insurance, and a 'No' if they don't have insurance. Add up the admission\_total cost for each has\_insurance group.

38. Show the provinces that has more patients identified as 'M' than 'F'. Must only show full province\_name

39. We are looking for a specific patient. Pull all columns for the patient who matches the following criteria:  
- First\_name contains an 'r' after the first two letters.  
- Identifies their gender as 'F'  
- Born in February, May, or December  
- Their weight would be between 60kg and 80kg  
- Their patient\_id is an odd number  
- They are from the city 'Halifax'

40. Show the percent of patients that have 'M' as their gender. Round the answer to the nearest hundreth number and in percent form.

41. Show the patient\_id and total\_spent for patients who spent over 150 in combined medication\_cost. Sort by most total\_spent to least total\_spent.

42. Provide the description of each item, along with the total cost of the quantity on hand (rounded to the nearest whole dollar), and the associated primary vendor. Sort the output by the most spent to the least spent on inventory.