**Sql Project Code Academy**

**Query—**

-- top 25 schools

SELECT email\_domain,

  count(\*) AS students

FROM users

GROUP BY email\_domain

ORDER BY 2 DESC

LIMIT 25;

-- NYC edu learners

SELECT count(\*)

FROM users

WHERE city = 'New York'

AND email\_domain LIKE '%.edu';

-- mobile users count

WITH mobile\_app\_users AS (

SELECT

  CASE

  WHEN mobile\_app = 'mobile-user'

  THEN 1

  ELSE NULL

  END AS mobile\_users

FROM users)

SELECT COUNT(mobile\_users) AS mobile\_users\_count

FROM mobile\_app\_users;

-- Sign up count by hour

SELECT strftime('%H', sign\_up\_at) AS 'sign\_up\_hour',

  count(\*) AS 'sign\_up\_count'

FROM users

GROUP BY 1;

-- Do different schools (.edu domains) prefer different courses?

-- how many and which ones, sort by the most complete to the less.

WITH courses\_by\_school AS (

SELECT u.email\_domain,

  CASE

  WHEN p.learn\_cpp = ''

  THEN 0

  ELSE 1

  END AS cpp,

  CASE

  WHEN p.learn\_sql = ''

  THEN 0

  ELSE 1

  END AS sql,

  CASE

  WHEN p.learn\_html = ''

  THEN 0

  ELSE 1

  END AS html,

  CASE

  WHEN p.learn\_javascript = ''

  THEN 0

  ELSE 1

  END AS js,

  CASE

  WHEN p.learn\_java = ''

  THEN 0

  ELSE 1

  END AS java

FROM users AS 'u'

JOIN progress AS 'p'

  ON u.user\_id = p.user\_id

WHERE email\_domain LIKE '%.edu')

SELECT email\_domain,

  cpp+sql+html+js+java AS total\_courses,

  CASE

  WHEN cpp = 1 THEN 'yes'

  ELSE '-'

  END AS cpp\_course,

  CASE

  WHEN sql = 1 THEN 'yes'

  ELSE '-'

  END AS sql\_course,

  CASE

  WHEN html = 1 THEN 'yes'

  ELSE '-'

  END AS html\_course,

  CASE

  WHEN js = 1 THEN 'yes'

  ELSE '-'

  END AS js\_course,

  CASE

  WHEN java = 1 THEN 'yes'

  ELSE '-'

  END AS java\_course

FROM courses\_by\_school

GROUP BY 1

ORDER BY total\_courses DESC;

-- 4.B

-- What courses are the New Yorkers students taking?

-- By order of preference

WITH courses\_by\_city AS (

SELECT u.city,

  CASE

  WHEN p.learn\_cpp = ''

  THEN 0

  ELSE 1

  END AS cpp,

  CASE

  WHEN p.learn\_sql = ''

  THEN 0

  ELSE 1

  END AS sql,

  CASE

  WHEN p.learn\_html = ''

  THEN 0

  ELSE 1

  END AS html,

  CASE

  WHEN p.learn\_javascript = ''

  THEN 0

  ELSE 1

  END AS js,

  CASE

  WHEN p.learn\_java = ''

  THEN 0

  ELSE 1

  END AS java

FROM users AS 'u'

LEFT JOIN progress AS 'p'

  ON u.user\_id = p.user\_id

WHERE email\_domain LIKE '%.edu'

AND u.city = 'New York')

SELECT 'cpp' AS course,

  SUM(cpp) AS students

FROM courses\_by\_city

UNION

SELECT 'sql' AS course,

  SUM(sql) AS students

FROM courses\_by\_city

UNION

SELECT 'html' AS course,

  SUM(html) AS students

FROM courses\_by\_city

UNION

SELECT 'js' AS course,

  SUM(js) AS students

FROM courses\_by\_city

UNION

SELECT 'java' AS course,

  SUM(java) AS students

FROM courses\_by\_city

ORDER BY 2 DESC;

-- 4.C

-- What courses are the Chicago students taking?

-- By order of preference

WITH courses\_by\_city AS (

SELECT u.city,

  CASE

  WHEN p.learn\_cpp = ''

  THEN 0

  ELSE 1

  END AS cpp,

  CASE

  WHEN p.learn\_sql = ''

  THEN 0

  ELSE 1

  END AS sql,

  CASE

  WHEN p.learn\_html = ''

  THEN 0

  ELSE 1

  END AS html,

  CASE

  WHEN p.learn\_javascript = ''

  THEN 0

  ELSE 1

  END AS js,

  CASE

  WHEN p.learn\_java = ''

  THEN 0

  ELSE 1

  END AS java

FROM users AS 'u'

LEFT JOIN progress AS 'p'

ON u.user\_id = p.user\_id

WHERE email\_domain LIKE '%.edu'

AND u.city = 'Chicago')

SELECT 'cpp' AS course,

  SUM(cpp) AS students

FROM courses\_by\_city

UNION

SELECT 'sql' AS course,

  SUM(sql) AS students

FROM courses\_by\_city

UNION

SELECT 'html' AS course,

  SUM(html) AS students

FROM courses\_by\_city

UNION

SELECT 'js' AS course,

  SUM(js) AS students

FROM courses\_by\_city

UNION

SELECT 'java' AS course,

  SUM(java) AS students

FROM courses\_by\_city

ORDER BY 2 DESC;

**Output**









