sql syntax

* select commands (between select and from)
* Commands from (between the from and the where)
* where commands (after where)

*Distinct (select):*

Distinct is used to display all the data without repeating itself in a column.

For example, to show all models of cars without repeating for the year, would be:

**Select DISTINCT model from cars;**

*Column aliases (select):*

Some column we want it to say 'article' instead of productName and 'price' as costoor things like that,

because AS is used when selecting tables to replace the name of the column shown:

**Select productName as ‘article, price as ‘costo’**

**From productos;**

You can also remove the AS, as long as there is a space between the column and the alias, leaving the previous query like this:

**Select productName ‘article, price ‘costo’**

**From productos;**

*Merge columns (select):*

It is required that all the workers join the Name column with the Surname column plus a hyphen in the middle because it looks nice. So the Concat instruction will be used.

**Select Concat(firstName, ‘-‘,lastName) as ‘Full Name’**

**From workers;**

*Calculated columns (select):*

Let us imagine that we have the year of birth of students and we want to calculate how many years they are minus the year of birth from 2016 and show it as 'age':

**Select (year(now()) - yearObBirth) as ‘age’**

**From students;**

Preferably enclose calculations in parentheses

*Note: now() gets the date and time based on the computer running the mysql server*

*Year() gets the year from any given date*

*Multiple conditions (where):*  
For convenience and to avoid confusion when making enquiries at the beginning (you’ll get rid of them with the practice), if there is more than one condition, lock yourself in parentheses.

Example: Showing a list of products supplied by suppliers in Spain that are also in the category 'Beverages' or 'Condiments'.

**Select \* from tableName**

**where (rprovName ='España' ) and ((catName = 'Beverages') or (catName = 'Condiments'))**

*Sort data (where):*

Order by syntax (it goes after the conditions (if there are conditions), otherwise goes after from

**Select \* from tableName**

**Where (conditions)**

**Order by columnName 'x’**

Where x could be:

**Asc** to sort the data from minor to major or from Z to A

**Desc** to sort the data from highest to lowest or A to Z

Imagine that it is required to display the name of all products in a store ordered from Z to A by name, and in each letter are ordered from the cheapest to the most expensive.

**Select prodName, price from products**

**order by prodName asc, price desc;**

Or you can also use an identifier number representing the table(s) you select in select, for the above example, the result order by would be:

**Order by 1 asc, 2 desc**

*Like(where):*

The like condition is when you search for a text similar to what is before or after %.

For example, to search for names beginning with B

Select \* from student where name like 'b%'

to look for names that end with A

Select \* from student where name like '%a'

to search for names that have ASDs between the text would be:

Select \* from student where name like '%\_asd\_%'

to search for names that have ASDs between the text after the 2nd character and before the last character

Select \* from student where name like '%\_asd\_%'

Note: The underscore means one character at the left or right ignored ignored

*Null(where):*

When you search where the data is null instead of where column=null is where comumn **is** null

*Different from (where)*

where tableName <> número

*Between(where):*

When searching between 2 values or dates 'between' is used

For example, to look for students who were born between 1999 and 2000 or have between 8 and 10 subjects would be:

**Select name from students**

**Where (bornDate between ‘1999-01-01’ and ‘2000-12-31’) or (subjects between 8 and 10);**

*Limit(where):*

At the very end of the queries (after order by and group by), if needed, **Limit x** is put where X represents the limit number of the data to be displayed.

Ex. It is required to show the first 3 students with the highest grade, so the code would be:

**Select \* from students**

**Order by grades Desc**

**Limit 3;**

*In (where):*

This is best explained by an example

We want to show students that they have 5, 8 or 12 subjects.

**Select \* from students**

**where subjets in (5, 8, 12);**

Es lo mismo que

**Select \* from students Where subjets = 5 or subjets = 8 or subjets = 12;**