* OOP: Using OOP in frontend has lot of advantages as it wil saves lot of time in rewritting same logic, it helps for code reusability and for easy code maintenance.
* **Frontend design pattern:**

**module pattern :** is one common pattern that is usually used in javascript, it is very useful to encapsulates logic and functions in the same scope, instead of having variables spread across your code , it can be put in one function , and it makes code easier to read.

**Builder pattern:**

The builder pattern is used when we need to create complex objects with different variations and also we want to have the flexibility to modify the construction process without impact the object representation in self.

I tried to create an example that we can use in the real-world.

* **D.R.Y Principle**: The "Don't Repeat Yourself" principle is for the elimination of repetition of code that which one has to get rid by reducing the bunch of code and still get the functions working perfectly, a simple example is: ***{name:name}*** instead just ***{name}.***
* **Encapsulation:** is an Object Oriented Programming concept that binds data and functions that manipulate the data together, and that keeps both safe from outside interference and misuse. Data encapsulation led to the important OOP concept of data hiding. Data encapsulation is a mechanism of bundling the data, and the functions that use them and data abstraction is a mechanism of exposing only the interfaces and hiding the implementation details from the user.
* **Software versioning:** is the process of numbering different releases of a particular software program for both internal use and release designation. It allows programmers to know when changes have been made and track changes enforced in the software. At the same time, it enables potential customers to be acquainted with new releases and recognize the updated versions.
* **DOM manipulation** in javascript is the process of manipulating the dom element in the browser, to change or manipulate an html, one can create web applications that manipulate the data in a web page without refreshing the page and can change its layout without doing a refresh. Throughout the document, items can be deleted, moved, or rearranged.