

I. What is copy constructor?

It's a type of constructors that creates a new object by coping from existing one in the same class. It makes usually a deep copy to the object. It's done when passing or returning an object by value. If a class doesn't define a copy constructor, the compiler automatically provides a default one. This default constructor performs a shallow copy, which means it simply copies the values of the members from the source object to the new object. The custom copy constructor is done when shallow copy can make problems or when needing to define custom coping for the class.

II. What is Indexer, when used, as business mention cases u have to utilize it?

It allows an object to be indexed with square brackets [] like how the arrays are accessed. It has no name, it only identified by (this).

III. Summarize keywords we have learnt last lecture.

- private can be reached only within the same scope and class it was declared in it.
- private protected can be reached within same scope and classes inherite from it within same project.
- protected can be reached in classes inherite from it either same project or different one.
- internal protected can be reached in same project and classes inherite from it in same project or different one
- internal can be reached in the same project.
- public can be reached anywhere.