Lab 1 : Software Architecture

c) Why is Software Architecture important?

Software Architecture as Martin Fowler explains it, it is “the important stuff, Whatever that is”. This important stuff is really what matters in software development and that’s the reason why all the software development teams should be aware of it. This important stuff is the shared understanding of the project being developed by a team of software programmers with a common big picture of the product. When this understanding is shared among all team members, the team members tend to deliver the product quickly with a better quality and the communication between the team members is also going to be easy and effortless.

In addition, it's also stated as “hard to change " in different publications as a term used to define what software architecture is. Hard to change is a phrase used to define a software, the common understanding of the concept between each team member as the major thing in the project. This is what makes the development process really easy.

In general, software architecture is really what matters in the project, whatever that thing is in any project. Since that’s the common shared understanding between the senior architect of the project to share a common goal and understanding between the development team to make the increment delivery fast and successful.

D) Explain what the difference is between software architecture and software design

Software Architecture is a high level definition of the software we’re building. While on the other hand, Software Design is the low level definition of the software we’re building. This includes the design pattern, the coding techniques and all other parts which define the software in detail.

E) Explain what makes software architecture so difficult.

What makes software architecture so difficult is since our design needs to accommodate a wide range of features in order to make it flexible enough for handling changes that will come along the way is one of the main difficulties of a software architecture. Therefore, there is no silver bullet for our architecture. That’s why we need to say “it depends” on our definition of the architecture of a software.