**Software Process models**

Structured set of activities required to develop a software system

Many Different Software processes but all involve:

* Specification - defining what the system would do
* Design and implementation – defining the organization for the system and implementing the system;
* Validation – checking that it does what the customer wants;
* Evolution – changing the system in response to changing the customers needs

Software process model is and abstract representation of a process. It presents a description of a process from some particular perspective

**Software process descriptions**

When we describe and discuss the processes, we usually talk about the activities in these processes such as specifying a data model, designing a user interface, etc. and the ordering of these activities

Process descriptions may also include:

* Products, which are the outcomes of a process activity
* Roles, which reflect the responsibilities of the people involved in the process;
* Pre and post conditions, which are statements that are true before and after a process activity has been enacted or a product produced.

Plan- Driven and Agile processes

Plan-driven processes are processes where all of the process activities are planned in advance and progress is measured against this plane

In agile Processes, planning is incremental and it is easier to change the process to reflect changing customer requirements

In Practice, most practical processes include elements of both plan driven and agile approaches

Models

1. Waterfall model – plan driven model separate and distinct phases of specification and development
2. Incremental – specification, development and validation are interleaved. May be plan driven or agile
3. Integration and configuration – system is assembled from existing configurable components. May be plan driven or agile