Tool 13: Useful documents model for Strategic Information Systems Planning

* The model on the right shows three layers of a business architecture: Business level (business environment), application level (business-IS/IT) and the infrastructure (IS/IT environment) level. For each level there are several documents which specify their layer. If all information is filled into the documents, the structure and processes of the organization should be clear.

Many projects create a large amount of documentation. If all the information is documented well, it can be reused in the planning process [SALM02]. According to Ward & Griffith [WARD96, p135] the purpose of existing documents is to develop an extensive understanding of the business in its environment, and to interpret its current, planned and future potential needs. To understand the current business and IT/IS situation of an organization, it is necessary to dig into existing documents that describe or model certain parts of it. Based on the '3 lagenmodel' [DOOL02] three categories, in which the documents can be placed, can be distinguished.

Business environment

The business environment contains four different documents which are the blueprints of the processes and structure of the organization and can be modeled with the '<u>Dynamic Enterprise Modelling</u> Development Method' developed by the <u>Baan Company</u> [ESPO96 cited in: LIMB02]. The four documents are:

- Corporate strategy, which contains elements such as the mission, vision and Critical success factors [WARD96, p164-165].
- Organizational architecture, which describes aspects such as the organizational structure, functions, roles and responsibilities.
- Process architecture, which describes the organization of business processes and the output to internal or external parties.
- Process indicators, which can be used to analyze and improve current business processes.

Business-IS/IT

The business IS/IT environment contains two different documents which should provide some blueprints to support the business environment, which can be modeled with a tool such as 'Bizzdesigner' [BIZZ03]. The two documents are:

- Information needs, which describes aspects such as how certain information systems support certain business process and activities within these processes.
- Application/IS portfolio description, which describes their role in the current (and future) business needs (WARD96, p142).

Not only IS/IT supports the business environment, but also people within the organization (employees at IS and non IS-levels). It is therefore important to have an inventory of the available knowledge and IS skills of the employees within the organization.

IS/IT environment

The IS/IT environment contains three documents which are about the technical infrastructure of the IS/IT environment [DOOL02], which can be modeled with <u>UML</u>-techniques such as <u>component</u> <u>diagrams</u> and <u>deployment diagrams</u> [LETH01]. The three documents are:

- System-architecture, which describes the hardware and middleware and their structure.
- Data-architecture, which describes the technical representation of the data (how the data is stored and what the storage-structures are).
- Network-architecture, which describes the communication, both physical and software-based, between applications and/or systems.

All the documents listed above should be established by means of analytical approach. This is because the former takes a structured analysis route from the upper (organizational) levels to lower levels. He systematically decomposes each level according to its characteristics (WARD96, p136).