

Digital Business Ecosystem

Contract n° 507953

WP34: Exploitation & Sustainability

**Del 34.1: First version of the Business Plan
Scenario for the DBE
Organisation**



Information Society
Technologies

Project funded by the European
Community under the "Information Society
Technology" Programme

Contract Number: 507953
Project Acronym: DBE
Title: Digital Business Ecosystem

Deliverable N°: 34.1
Due date: 30/4/2005
Delivery Date: 19.08.2005

Short Description:

Keywords: DBE, Business Plan, Distribution
Partners owning: Technology Centre Hermia Ltd
Partners contributed: Technology Centre Hermia Ltd
Made available to:

VERSIONING		
VERSION	DATE	AUTHOR, ORGANISATION
0.1	6.4.2005	TCH, STRUCTURE
0.9	3.5.2005	TCH, FIRST COMPLETE DRAFT
1.0	26.5.2005	TCH, COMPLETE FOR INTERNAL REVIEW
1.1	10.8.2005	TCH, COMPLETE, CHANGES FROM THE INTERNAL REVIEWERS ADDED

Quality check

1st Internal Reviewer: Elmar Husmann - IBM
2nd Internal Reviewer: Nagaraj Konda - UCE

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1 Summary

The aim of this deliverable is to provide the first version of the DBE Business Plan. The time frame for this version of the Business Plan is after the initial project has ended in October 2006. The further plans will cover a longer period of time.

This being the first scenario of the Business plan, its aim is to provide guidelines for the following work of creating the final Plan. The most important aspects that have to be considered are business idea and legal entity that looks after the DBE platform. It is also important to position the DBE in the market, but being an open source project with many unselfish goals, it does not have such emphasis as in a Business Plan of an enterprise in competitive markets.

Financing is also a matter to be considered, but the amount of additional financing needed is not current until the project ends. After that time there are different financial issues to be solved as the legal entity governing the DBE must be financed but also the DBE technology is only at experimental stage and the financing of its development must be solved.

2 Background for the Deliverable

2.1 Introduction

This deliverable presents the first version of the scenario or scenarios of the business plan for the DBE organisation. This deliverable is written for the time after the project has ended in November 2006 as there is not yet a single legal entity that is responsible for the DBE, but rather it is managed by the project organisations. There are major decisions on the legal entity of the DBE, financing, revenue models and potential customers (users, service and component developers and service providers), however, that have to be made during the project time. The further deliverables concerning DBE Business Plan will widen the timeline of the Business Plan to cover a longer period of two to six years. The progress of the further development of the Business plan is described in more detail in Chapter 7.

The business model creation is an evolving process that is dependent on various activities within and outside the project. For that reason this first version of the business plan is focused in the recognition of the choices that must be made to ensure the continuity of the DBE after the project time. In this first version this is made by creating scenarios of different choices and having the best guess of the situation that is prevailing in November 2006. The business plan spanning the different time periods after the project time are presented in the future business plan versions.

This chapter defines the concepts used in this deliverable, assigns the research objectives and presents the research methods used in the creation of the business models. Also open source software business models as opposed to proprietary software business models are examined in this chapter.

The third chapter reviews the DBE Business idea from different points of view. The DBE software environment and different roles for SMEs in it are presented here. The revenue models presented in chapter two are considered in relation of the DBE legal entity and SMEs using the DBE.

The fourth chapter concentrates in the legal entity, organisation and networks. Different options for legal entities that could obtain the management of the DBE after the project has ended are introduced. Also there is preliminary contemplation on the organisation, value network structure and partners.

The fifth chapter studies the market environment of the DBE technology. The market situation is envisioned and the business opportunities as well as possible market segments and competition are considered. Also the growth perspectives are taken into attention, even though the changes in market situation are most subject to change as the time passes towards the after-project time.

The sixth chapter concentrates in the different financing options of the DBE after the project time. There are several layers in this speculation and only possibilities can be pointed out at this stage.

The seventh chapter defines the progress of the business plan development and assigns objectives for the future deliverables on the same matter.

2.2 Concepts

2.2.1 Business Idea

In pure business cases the core business can be described in brief as “business idea”. This includes usually the value added to the customers, markets, and revenue model.¹

In the case of DBE the business idea could in the project stage be transformed into exploitation idea or technology distribution idea. After the project has ended the value adding capability of the DBE technology is very crucial. The three key aspects are relevant at that point. The DBE Business Idea is in this deliverable defined as follows:

*The **business idea** of the DBE organisation is the recognition of its benefit to customers, customer need (markets), and capability to gain enough financing to keep DBE actions and operations alive (revenue model).*

2.2.2 Business Plan

There are naturally several definitions of the business plan. Most of them concentrate in businesses that exist to create profit for their owners and interest groups. Start-up organisations create a business plan for managing funding needs. Also non-profit organisations can have a business plan, however, as the profit can be measured in other forms than monetary terms as well. Here is presented some different interpretations of the concept business plan:

*A written document that describes a business, its objectives, strategies, market and financial forecast.*²

This definition is quite general in nature and can be applied in both profit and non-profit organisations.

*A document that summarises the operational and financial objectives of a business and contains the detailed plans and budgets showing how the objectives are to be realised.*³

This definition concentrates in the financial and operational aspects of the business plan.

*A document that describes an organisation's current status and plans for several years into the future. It generally projects future opportunities for the organisation and maps the financial, operations, marketing and organisational strategies that will enable the organisation to achieve its goals.*⁴

The business plan can also be seen from more strategic, long term point of view as in the definition above.

In a nutshell, the business plan should clearly explain the what, why, when, who and how of the project. It should be a comprehensive explanation of the opportunity, the

¹ Starting Up – Achieving success with professional business planning [Finnish Edition] (McKinsey & Company)

² cobrands.business.findlaw.com/business_organisations/starting/source/business_events/be1_9glossary.html

³ <http://sbinfocanada.about.com/cs/startup/g/businessplan.htm>

⁴ loans.techdictionary.com/terms.html

*people involved, the money required to implement the plan, where it will come from and what financial results the opportunity is likely to produce.*⁵

This definition is rather general, but yet comprehensive and can be applied with all kinds of different organisations.

As a conclusion, the business plan concept used in this document is defined as a synthesis from the different interpretations presented above.

*The **business plan** is a document that describes a business, its strategic and operational objectives, organisation, interest groups and the value network, products and services including the competitive edge, market and competition and the financial plan for different time periods. The business plan should answer the questions: what, why, when, who and how about the organisation*

2.2.3 Value network

We define value networks as entities consisting of several directly or indirectly connected individual or organisational actors that transform and transfer different kinds of resources in order to create value not only for the network's end customer but also to themselves. This interpretation of the concept of value networks or value-creating networks includes three interrelated elements that are perceived end customer value, core competencies and business relationships. (Helander 2004)

*The **value network** is a network of legal entities that all benefit from belonging to the value network from the perspectives of perceived end customer value, core competencies and business relationships.*

It should be noted that every legal entity belongs to a number of value networks. Thus there is not only one DBE value network, but series of networks for different interrelated legal entities which may differ from the benefits they receive from belonging to the DBE value network.

2.2.4 Business model and Revenue model

Business model is a concept that is used loosely to describe any diversifying characteristic in business activity (Kallio et al. 2002, p. 9).

There are a variety of business model definitions including the following:

*A description of the operations of a business including the components of the business, the functions of the business, and the revenues and expenses that the business generates.*⁶

*Sets of characteristics that describe how a business is going to operate, including R&D, marketing, product development, and revenues and expenses.*⁷

A business model (also called a business design) is the mechanism by which a business intends to generate revenue and profits. It is a summary of how a

⁵ www.angelscorner.com/inv/lexicon_of_private_equity_investment.htm

⁶ http://www.investorwords.com/629/business_model.html

⁷ <http://www.bitpipe.com/tlist/Business-Models.html>

company plans to serve its customers. It involves both strategy and implementation. It is the totality of:

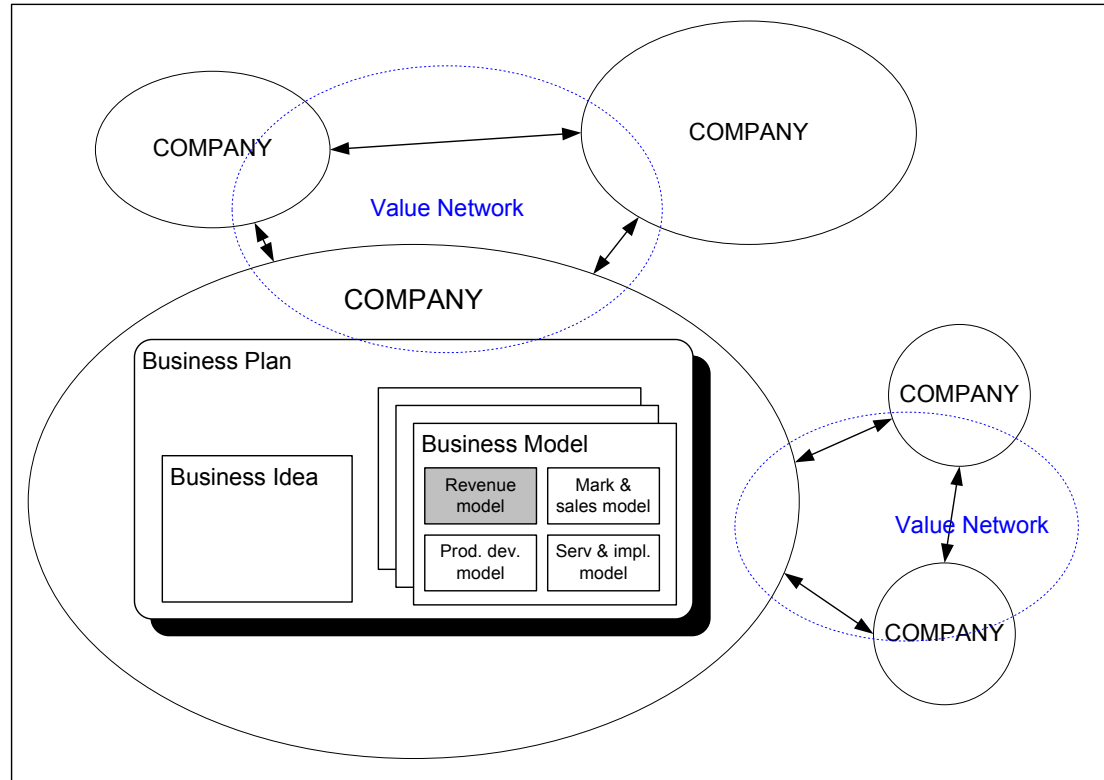
- *How it will select its customers*
- *How it defines and differentiates its product offerings*
- *How it creates utility for its customers*
- *How it acquires and keeps customers*
- *How it goes to the market (promotion strategy and distribution strategy)*
- *How it defines the tasks to be performed*
- *How it configures its resources*
- *How it captures profit⁸*

In this deliverable the business model is defined as follows:

Business model is the practical action plan designed to fit a specific market situation in order to execute strategic plans - generate revenues and profits by recognising and serving its customers.

The revenue model is part of the business model and defined in this deliverable as follows:

Revenue model is a component of the business model. It explains the way in which companies receive their revenues created through the value creation process in the value network.



⁸ http://en.wikipedia.org/wiki/Business_model

Figure 1. The relationships of the concepts

2.3 *Research objectives and limitations*

The objectives of this research are:

1. Creating the first draft of the business plan after the end of the project for the DBE organisation
2. Identification of the crucial decisions that have to be made during the project time
3. Preliminary scenarios that are consequent to the choices identified above

This research concentrates in the business plan of the DBE organisation and the business plans of the companies that belong to the interest group of the DBE are processed here only to the extent that the DBE relies to them.

2.4 *Research methods*

The process of creating the final business plan for the DBE has several stages between which there are iterations of ideas. In this first stage the research methods included a workshop in which the objectives for the business plan and the DBE environment were defined.

The sources of information used in this research were internet resources, literature and DBE project documentation. The report was written in TCH and reviewed first internally and then within the DBE consortium.

2.5 *Open source software business models versus proprietary software business models*

This chapter describes the differences between the OSS business models and traditional proprietary software business models.

The basis of OSS business models is in the traditional, proprietary software models. The principle that the source code of the OSS must be public has created series of characteristics that an open source business model has to meet, however. A distinctive characteristic of software compared to other products is that it is not physical but a product consisting of information. Information or digital products have unique cost characteristics as they are typically rather expensive to produce, but very cheap to reproduce. In addition, the production costs are seldom reusable with forthcoming development projects as the software production requires mainly labour resources from highly qualified experts. (Rajala et al. 2001) This leads to a situation, where the pricing can seldom be based on production costs added with a premium. The pricing is instead based on maximising the revenues for the owner of the intellectual property rights of the software product by a certain price-quantity combination. In Figure 1 is presented an imaginary example of the price-quantity curve of a product and the total revenues that can be gained with different pricing options.

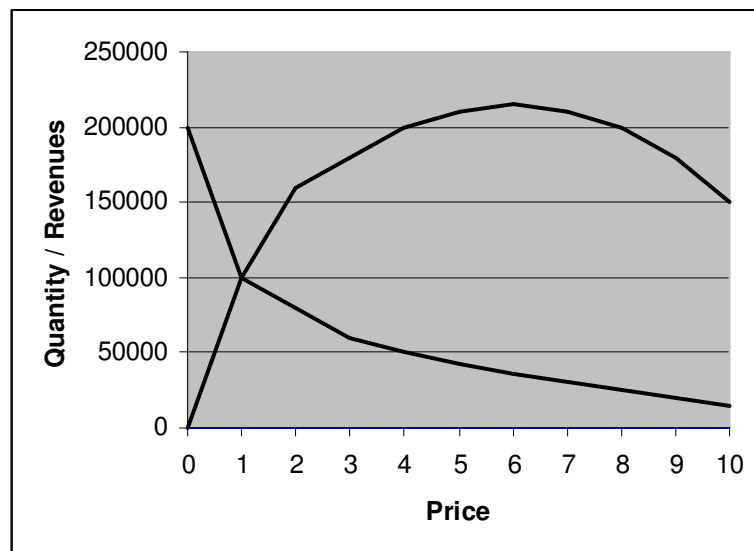


Figure 1. An example of the pricing of a software product

The natural decision from a software company that gets the price-quantity -diagram presented in the Figure 1 from a market research would be selling the software for the price of 6. If we assume that the total costs from the development of the software were 50 000 €, this pricing would generate a remarkable revenue of 160 000 € from selling the software to 36 000 customers. However, 2/3 of customers that would pay the price of 1 and 5/6 of customers that would like to use the software, but are not willing to pay anything for it, will not get the software in this procedure. If the product would be a typical, physical product, this would be natural business logic as the pricing would have some connection to the production costs. In the case of software (or other digital products), however, the reproduction of additional copies of the product does not create any additional costs and leaving part of interested customers without the software product is a business decision. The feel of added value is created sometimes (especially in B2C market) by selling the software in big cardboard boxes including a CD, user manual and a lot of air. Even though the same product could be distributed through the Internet, the look and feel of a physical product is used to explain the pricing of the software. There is nothing wrong with this approach, but the fact is that distribution of the software is limited. Company's goal is to provide added value to its owners, but entities with different goals may consider other things more important. Furthermore, making software widely available can maximise the demand instead of maximising the direct revenues and thus create other sources of income besides the license fees. These possibilities are introduced later in this chapter.

The ideology behind open source software supports the free availability of the source code of software. Thus anyone can obtain the code and use it for own purposes as long as the requirements of the open source license are met. The most common license, GPL (General Public License) states that all derivative work using software that is under GPL is also under GPL and thus the source code must be distributed the similar way as the original software. In other words all software utilising pieces of GPL-licensed software can be sold as any other software, but the source code of the whole software must be published.

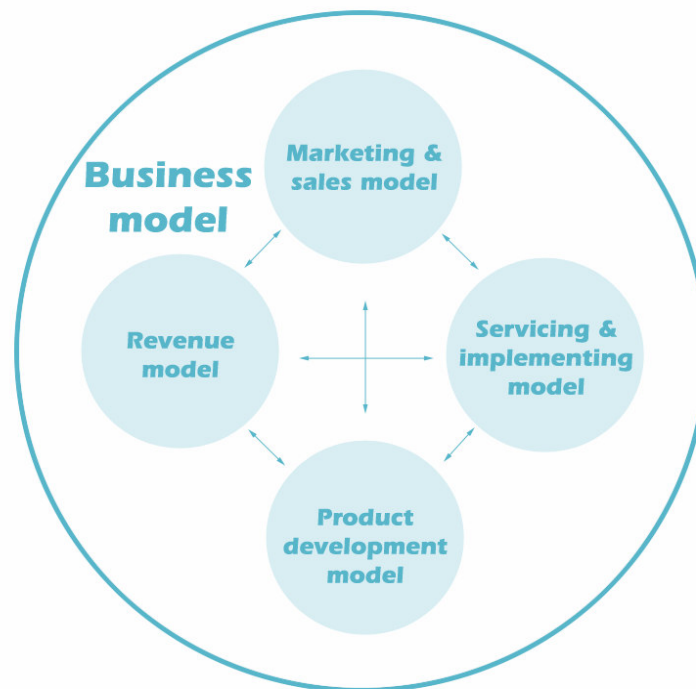


Figure 2. Elements of a business model (Adopted from Rajala et al. 2001, p. 51)

Traditional software business model can be divided into four interrelated elements as presented in Figure 2.

1. **Product development model** defines how the process that creates the value proposition is structured
2. **Revenue model** includes the organisations idea of how the revenues are gained
3. **Marketing and sales model** reflects the decisions on marketing strategy and distribution
4. **Servicing and implementation model** represents all the installation and deployment activities required to achieve a working solution based on a software product. (Rajala et al. 2001)

The product development of proprietary software is typically a structured process in which the value for the customer is created. The term product itself refers to a piece of software, which is not customized according to any individual user. Proprietary product development aims also to quality that is high enough to guarantee the basic functionalities. (Rajala et al. 2001) Open source software development is not based on a product but on a project. Each participant of the project has the right to tailor the software to his/her own needs as long as the license conditions are met. The value is not created for a customer but for the software developers themselves. The open source community distributes the best changes to the software for everyone. Also open source ideology encourages to publishing the source code early and often, which leads to the fact that the software is not ready when it is published, but on the other hand there are many possibilities making it better and in that way create value for the users.

The entities using OSS can have different approaches to the usage. Some only use pieces of software for their own purposes. To get the most out of OSS, however, the participation in the OSS community is required and often actors that have begun as

users of software in time become members and further on contributors in the OSS community.

Regarding product development, the OSS maintenance is more challenging than that of proprietary software. A user of proprietary software can rely on some sort of updates, maintenance and support whereas those services with OSS are probable to be less organised and often part of OSS organisations' revenue models and thus available for a fee. There can therefore be a bargain between license fees with lower maintenance and implementation costs of proprietary software and free or cheap license with higher maintenance and implementation costs. The business cases vary with each user / developer and are very hard to compare, because the development made by other developers in OSS community can or cannot lower the costs above depending on the case and the competence of the software user/developer.

Revenue models of proprietary software can be divided roughly into four categories: licensing, profit sharing, loss leader and media model. **Licensing** means that the customer is sold the right to use a piece of software. **Profit sharing** is a sort of licensing, but the revenues are tied to the customer's performance when using the software. **Loss leader** implies to a model, where the piece of software is distributed for free, but the revenues are collected by selling related products or services. **Media model** means that the piece of software is used to provide an advertising or marketing forum by creating a base for a group of users. (Rajala et al 2001)

The revenue models of open source software are not based on limiting the availability of software, but other aspects. The business models can be divided into numerous different categories some of which are similar to proprietary revenue models. The following lists the most used revenue models: (Rajala et al. 2001, Ingo 2004)

1. **Support selling**, in which revenue comes from selling support materials such as books, manuals, CD's and support services such as training. The software can be acquired for free from the Internet, but despite of that, companies can generate revenues by selling software and support manuals through regular distribution channels.
2. **Give software for free, sell services**, which is self-explanatory. Services concerning open source software include training, installation support, user support, updating software. For example when the City of München wishes to install Linux operating system to 14 000 workstations (which they have done), it is natural that they need someone to guarantee that the process is done effectively and efficiently. It would be free to cut one's hair by oneself, but for some reason quite many people use the services of barbers and hairdressers.
3. **Loss-leading**, in which the software is made open source in order to stimulate interest and demand for other products the company is offering
4. **Widget Frosting**, in which the company's main business is hardware and the incentive of making the drivers needed open source is to ensure that they are up to date. Hardware can also be sold with pre-installed open source software, which lowers the producer's costs and creates an opportunity for additional revenues or competitive pricing.
5. **Open source with a hook**, in which the software is distributed as open source, but it contains some crucial parts, such as updating or installation service that are not open source and can be sold to the users of open source software.

Typically the user can get by without the costly parts of the software, but it requires a lot of extra work.

6. **Brand licensing**, in which the software is open source, but the company keeps exclusive rights to the brand name
7. **Software franchising**, in which a successful *support seller* sells other companies the right to use its *brand* in other geographical areas or markets.
8. **Pay for work**, in which companies are paid for designing a specific solution for customers by utilizing open source software. The distinction from similar business model with proprietary software comes from the fact that utilizing open source software leads to the requirement of distributing source code of the generated solution. So the company that pays for the software gets the solution by paying for the programming work, but others get it for free.
9. **Tipping**, in which the users have a voluntary opportunity to donate money for the programmers or the community that has provided the open source software
10. **Dual license**, in which there are two license versions available from the same software. The first license is a GPL-license and thus free for the user of the software. The other license is not free, but the user is not bound to the GPL license requirements eg. are not required to publish the source code of their own work by the open source rules.
11. **A mix between open source and proprietary**, in which proprietary software is offered as additions to open source software, for example to integrate open source software to Microsoft environment.
12. **Turning proprietary into open source** in which proprietary software is turned into an open source project in order to develop it and generate indirect business. Mozilla firefox and Open Office.org are great examples of this approach.

In the early times of open source software the business was quite modest and concentrated in support selling and loss-leading models. Most well known business was made by selling Linux operating systems in big cardboard boxes including CD's and support manuals, which was quite ironic. In recent years the business models have widened as the Internet has made the physical distribution of software in CD's almost obsolete. As the previous list shows, there are other ways of doing business with open source software than selling CD's. It also shows clearly that open source does not equal "free as in beer but free as in speech" (Free Software Foundation 1996).

Marketing and sales model of a proprietary software company is the company's idea of defining and segmenting the markets and customers. The model describes how the customers are made aware of the software and how it is sold to them. (Rajala et al. 2001) With open source software it is clear, that marketing and sales such as with proprietary software, can not be made. The initial marketing of open source software is often made through informal channels as the purpose of the software is usually to create value to the developers rather than customers. At the point there are companies utilising the OSS as part of their business model, there are more traditional marketing and sales models following the business models described above. The sales and marketing is thus often more concentrated in services than the actual product. The availability of the software can create a great demand for the software, if it is considered good enough. The sales and marketing in a regular way can be done with open source software also, if the revenue model in use allows it (e.g. dual license for paying customers or provision of support services).

The servicing and implementation model of proprietary software ties the service to the actual software. These services include implementation, consulting, training, hosting, maintenance and technical support, product updates, new modules and new products. The servicing and implementation can be a revenue model for companies as well. Because of the nature of open source software, there is even more business made in the sector of servicing and implementation than with the proprietary software. The companies selling OSS related services must tie their services closely to the servicing and implementation model as that is their core competence and key way to achieve competitive advantage.

3 Description of the DBE business idea

3.1 Software Products

Digital Business Ecosystem is defined in the DBE project Technical annex as follows:

***Digital Business Ecosystem** is an evolutionary self-organising system aimed at creating a digital software environment for small organisations that support regional and local development by empowering open, distributed and adaptive technologies and evolutionary business models for the growth of small organisations.*

In other words the DBE, for which the business plan in this deliverable is been created, is a **software environment** that provides a new way of enhancing business for

1. Software and service developers and -providers
2. All SMEs using software in their business.

The SME software developers, service developers and service providers are given an open source -based platform that enables their existing products to be integrated with their customers' systems flexibly. It also provides a new channel to market and distribute software and service products cost effectively.

The SMEs that use the DBE are given the tools to communicate the business needs into software and service needs without any need for technological competence. The DBE also helps in the integration of software and services into the SMEs existing systems.

The customers of the software environment are divided into four different categories:

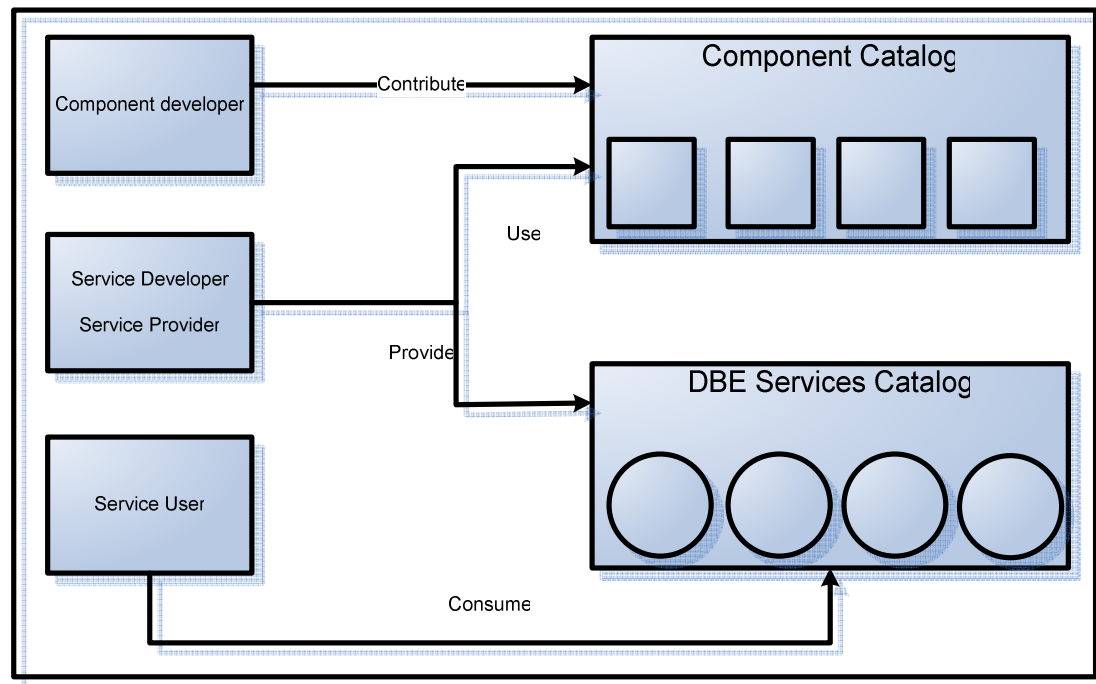


Figure 3. Customers of the DBE software environment (Vidal 2004)

The **component developers**, **service developers** and **service providers** form the first group of customers. The **component developers** create basic software components that are published in the component catalogue. The components can be published also elsewhere and the DBE is one distribution channel for the components. The components can be open source, proprietary or a mix between the two (dual license for example). The service developers can use the components to create their integrated services.

Service developers create integrated services for the service users utilising the component catalogue. The created services are provided in the DBE Services Catalogue and they can use a business model of their choice.

Service producers provide their own services through the DBE environment. Also their services are provided in the DBE services catalogue with their own business model. The DBE environment takes care of the back-end integration for the service producers.

Service users form the second group of customers. They consume the services published in the services catalogue. They can utilise the DBE environment to specify their business needs and the DBE assembles a solution for them utilising the Services Catalogue.

3.2 Related Services

The services provided by the DBE for the end-users often create a need for services in the companies. Even though the idea of DBE is to minimise the needs for SME intervention in matching their business needs of the end-customer SME's, there may be a lack of skills in the implementation of the service, training or in some other stage of the process. The beneficiaries of this service business are local software service companies that can provide on-site help for the user companies. Related services play an essential part in building the DBE community.

3.3 Revenue Models

The DBE environment is an open source project and its purpose is not to create profit to interest groups but to foster European software industry and help software user SME's to get more diversified range of business solutions to help them do their business better than in the present day. DBE is designed to work autonomously and thus it does not require a heavy infrastructure to operate. However, at least in the beginning there must be some organisation that is responsible for the marketing, maintenance, trust and confidence issues and updating of the DBE environment. This organisation requires some resources to operate and thus there must be a revenue model to provide this service for the DBE environment after the project has ended.

The idea of the DBE is not to charge for being the intermediary between the software/service providers and service user companies. Some business model must be issued, however, to create income that covers the costs from the activities described above. The most prominent revenue model is to get financing from the whole interest group of the DBE including the SME's but also large companies and public organisations involved in the DBE.

In Table 1 is short analysis of open source software revenue models. Analysis indicates possible revenue models of DBE from both DBE organisation's and DBE component developers' and service providers' and/or developers' point of view.

Revenue Model	DBE Legal Entity			DBE component developers and service developers /providers		
	Relevant	Possible	Irrelevant	Relevant	Possible	Irrelevant
Support selling		X		X		
Give software for free, sell services		X			X	
Loss-leading			X	X		
Widget Frosting			X		X	
Open source with a hook			X			X
Brand licensing		X				X ⁹
Software franchising			X	X		
Pay for work			X	X		
Tipping		X			X	
Dual license			X			X
A mix between open source and proprietary			X		X	
Turning proprietary into open source			X		X	

Table 1. DBE revenue model analysis

The background and basic assumptions of revenue model analysis include, that the DBE code is open and the DBE brand is owned by DBE legal entity. The DBE is aimed in fostering the European software business and the ideology behind the DBE is against hooks and restriction of distribution or use. It is arguable whether or not the DBE legal entity has an organisation that could offer services to the interest groups of the DBE. The purpose for the existence of the DBE legal entity is to ensure the continuity of the DBE and to provide actual support services for the service developers, -providers and –users. The DBE legal entity is also needed to provide a vision for the SME's using the DBE that someone is responsible for the DBE and “behind” the technology. This is essential to build trust relationship with the new SME's considering whether or not they will start using the DBE.

The revenue model possibilities of the DBE component developers and service developers/providers are much more versatile than for DBE legal entity. They can use the DBE as an open source extension for their existing revenue models. They are not necessarily required to have any previous open source experience and the services and components provided through the DBE are not required to be open source. The Table 1 assumes that the services / component provided are open source, however.

3.4 Development Needs

The objective of the revenue model is not to maximise the profit but to cover the expenses of the DBE organisation for a pre-determined time. For that reason the creation of the revenue model is highly dependent to the organisational structure and

⁹ DBE brand is owned by DBE legal entity. Brand licensing is possible if developer/provider uses it's own brands.

the resources it requires. The revenue model can be sketched from the approaches presented in the previous chapter but the actual model can only be defined after the actual costs can be estimated.

4 Legal Entity, Organisation, and Networks

4.1 Legal Entity

As part of the DBE business model one key strategic decision is the legal entity. Legal entity is (an individual or) an organization that is legally permitted to enter into a contract, and be sued if it fails to meet its contractual obligations.¹⁰ There are several possible alternatives in which actors like founders, users, and developers have different roles. Choice of type of legal entity will be made based on wide scale of issues such as characteristics of the entity type, characteristics of business model, domicile, geographic location, and willingness to widen the founder and/or owner group in the future. The need to bind interest groups and stakeholders to DBE business also affects to the choice of legal entity type.

Legal entities to be taken in question as a type of DBE business entity are primarily foundation (or trust), limited company, or association. Depending of domiciles local legislation these are the most common entity types, in which business owners are legally responsible for no more than the amount that they have contributed to a venture (limited liability).

Descriptions of legal entities below are based on Dictionary of Legal Terms¹¹ and Wikipedia¹². Although the prior mentioned web page has background of Anglo-American legislation (Common law) the descriptions are mainly common in Europe. Also Wikipedia partly refers to common law.

4.1.1 Foundation or trust

Foundation is a kind of philanthropic organization, set up by either individuals or institutions as a legal entity – usually either a corporation or a trust – with the purpose of distributing grants to support causes in line with the goals of the foundation.

A trust is a relationship in which a person or entity (the trustee) has legal control over certain property (the trust property or trust corpus), but is bound by fiduciary duty to exercise that legal control for the benefit of someone else (the beneficiary), according to the terms of the trust and the law.

A good example of a foundation behind an open source project is Mozilla Foundation, which was established in July 2003 with start-up support from America Online's Netscape division. The mission of Mozilla Foundation is to provide organizational, legal, and financial support for the Mozilla open-source software project and thus ensure the continuation and existence of Mozilla project beyond the participation of individual developers. It also provides a vehicle to limit the legal exposure of participating in an open source project. The Foundation has been incorporated as a California not-for-profit corporation.¹³

¹⁰ www.investorwords.com/2759/legal_entity.html

¹¹ www.sixthform.info/law/03_dictionary/index_dictionary.htm

¹² http://en.wikipedia.org/wiki/Main_Page

¹³ <http://www.mozilla.org/foundation/>

4.1.2 Corporations and companies

A corporation is a legal entity (distinct from a natural person) that often has similar rights in law to those of a natural person. Civil law systems may refer to corporations as "moral persons;" they may also go by the name "AS" (anonymous society) or something similar, depending on language.

A company in the broadest sense is an aggregation of people who stay together for a common purpose. This includes commercial purposes, organised as a type of business organization.

A legal entity, allowed by legislation, which permits a group of people, as shareholders, to create an organisation, which can then focus on pursuing set objectives, and empowered with legal rights which are usually only reserved for individuals, such as to sue and be sued, own property, hire employees or loan and borrow money.

4.1.3 Association

Association is a group of individuals or legal entities that voluntarily enter into an agreement to form a body (or organization) to accomplish a purpose. Associations may take the form of a non-profit organization or they may be not-for-profit corporations; this does not mean that the association cannot make benefits from its activity, but all the benefits must be reinvested. Most associations have some kind of document or documents that regulate the way in which the body meets and operates. Such an instrument is often called the organization's bylaws, regulations, or agreement of association.

4.1.4 Some characteristics of legal entities

Major differences or characteristics of legal entities come from the ways they approach to making profit (entity's profitability and profits to stakeholders), membership/partnership, and image issues.

The primary advantage of a company structure is that it provides the shareholders with a right to participate in the profits (by dividends) without any personal liability (the company absorbs the entire liability of the business). The other two types are usually non-profit or not-for-profit, when all the benefits will be reinvested. A limited company may also have such non-profitable objectives.

Company and association have partners or members as foundation usually does not have. The membership or ownership of DBE business may be important way to bind stakeholders like developers to the use DBE technology and community. Association is more open for new members than company for new partners. Also company lets new partners to join business, but procedure is more complicated.

Image issues have to be inspected carefully, too. Association and foundation may be more easily understood as not-for-profit communities, those objectives are to develop and distribute DBE technology. This kind of image would support the wider distribution of technology.

In every type of DBE legal entity is crucial to observe the expenses and potential incomes of the legal entity.

4.1.5 No acting legal entity

Alongside the highly active DBE legal entity is an “open source” type open network or community. Then the legal entity is maybe needed only to maintain server or other facilities as a technical gateway of distribution. In this case community – with no barriers to join – develops DBE technology and distributes it to end-users. On the other hand legal entity owned or controlled by small group of parties maintains the platform of distribution.

4.2 Organisation

Every legal entity has its own organisation structure depending on local legislation. Basically legal entity should have a board to make strategic level decisions and someone (in person) to take care of day-to-day business. The board may be a general meeting group or some kind of advisory group. When deciding on the organisational structure for the DBE also the specific technological and cultural needs must be taken into account.

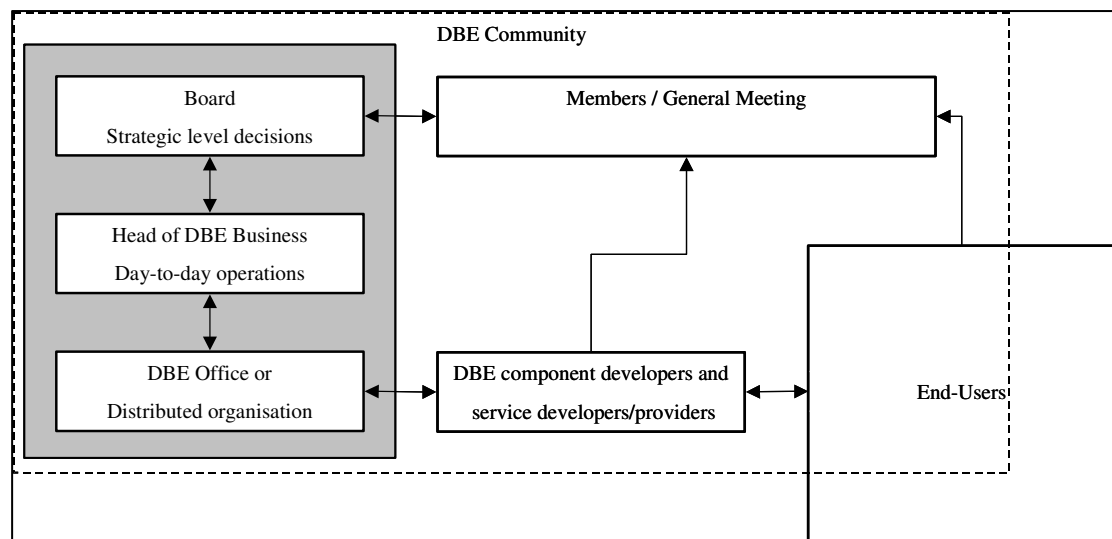


Figure 4: Introductory organisational chart including DBE community

DBE community’s organisation includes members and DBE legal entity. Members will further include groups like component developers and service providers. Also part but not all of the end-users are assumed to become more active on DBE community, and considered as members. Members’ influence to community comes from their day-to-day business activities as well as via general meetings. General meeting is the primary way to influence DBE legal entity.

4.3 Value Networks and Partners

DBE value network includes several different types of stakeholders. These will influence DBE and get benefit of it. Following stakeholder and their roles were identified during preliminary business plan processing.

	Pro vid er	Co mp etit or	Fin anc ing	Poli cy ma ker s	Res ear ch	Use rs	Dev elo pers
Private investors			X				
Public sector	X		X			X	X
Project partners	X	X	X		X	X	X
Nachira Francesca / project office			X				
Competition / Microsoft	X	X			X		
SMEs	X		X			X	X
OSS-community					X		X
Standard bodies /OMG	X			X			
Regional policy makers			X	X			
EU-business unit			X	X			
EU-parliament			X	X			
(IBM, Sun, Intel) Big corporations	X	X	X	X	X	X	X
SME-organisations			X	X			
Research community	X	X	X		X	X	X

Table 2. Potential DBE stakeholders

4.4 Development Needs

There is strong indication that DBE should have some type of legal entity, although “no-legal-entity” may be still considered as an option. Currently the Foundation is the favoured option for legal entity. Next step is to further analyse different options and to choose one for further planning, and finally to choose the best option for DBE.

As the type of legal entity defines some characteristics of organisation, the planning of organisation and operations follows. Questions of organisational aspects will arise also from the services and products point of view.

5 Market

5.1 Market situation

The DBE is aimed at fostering the competitiveness of European SME's. The market segments for the actual DBE software environment are thus European software component developers, software service developers, software service providers and software service users.

Open source software model has risen to challenge the traditional software business models. While the traditional, proprietary software business concentrates on the sales of software licenses, open source software business has more versatile business models that have focus in the services rather than products. The same phenomenon,

“servicisation” of business, can be seen in other business sectors as well. In software business the eLearning sector is the pioneer in turning towards open source software.

It is not easy to compare proprietary software and open source software, because of the major differences in the business models. Open source is in many ways an alternative way of approaching software business. Proprietary software may thus be more suitable solution to some cases as open source software is more advantageous in some other situations. For this reason it is difficult to create a scenario, where an open source project is competing with proprietary solution. In DBE open source is seen as the prevailing way of creating software in the future. Proprietary software will not be completely driven off the market, but instead it will be available in areas that it can compete with open source software. The software business will (hopefully) be based on competitive pricing rather than monopolies in the future.

DBE is not based on revolutionarily new technology but instead on combining existing technologies together in a new way and making them available for European SME's on open source basis. There are solutions that have the same functionalities with the DBE, but they are typically highly tailored proprietary software for large companies and so expensive that they are not available for the needs of SME's. The definite business opportunity for the DBE is in the SME's, which open up a new market area for software and service provision companies. The distribution and integration of business solutions in DBE is made cost-effective and easy when it has previously been available only for companies that have been able to find the right solutions and pay for costly integration.

In the process of creating the business plan for the DBE it is essential to identify related open source communities and activities as well as relevant standardisation bodies. It is extremely difficult for DBE to succeed in its difficult task if the integration with existing OS projects and standardisation bodies fails. Implementing DBE into real, existing market environment must be the core feature of the business plan to be developed.

5.2 Business opportunities of the DBE

DBE as business is a difficult question as the purpose of the DBE project is not to build a business opportunity in itself. Naturally the DBE requires some funding after the DBE project has ended to carry out marketing, hosting, updating and customer services. The main purpose of the DBE is, however, to help SME's do business between themselves more effectively and thus enhance their competitiveness in the global market situation.

5.3 Market Segments and competition

The DBE is positioned in between the ICT providers and ICT users. DBE in itself does not initially have interests in gaining profit. It is thus rather difficult to consider the competition that DBE is facing. As mentioned before, there are existing solutions that use the same technologies as the DBE, however. As it is, the ICT providers and ICT users may get into a situation where they must choose between the DBE and some other solution.

The (business) software market has one important feature that sets it apart from a traditional free market: that competition is not entirely based on product characteristics but also on compatibility – and possible interaction - between products. An ICT user can not simply pick a best-of-breed collection of software products or even online service – he has to care about how they integrate among each other, with his suppliers, customers and other business partners.

Proprietary vendors (figure 5) have exploited this phenomenon ever since. By dominating a platform standard – for example an operating system or an ERP package – they are able to control interface and security standards and force smaller partners to adapt to that standards. This might not only mean to charge royalties for using them or licenses for own developer tools but also to dominate the technical progress.

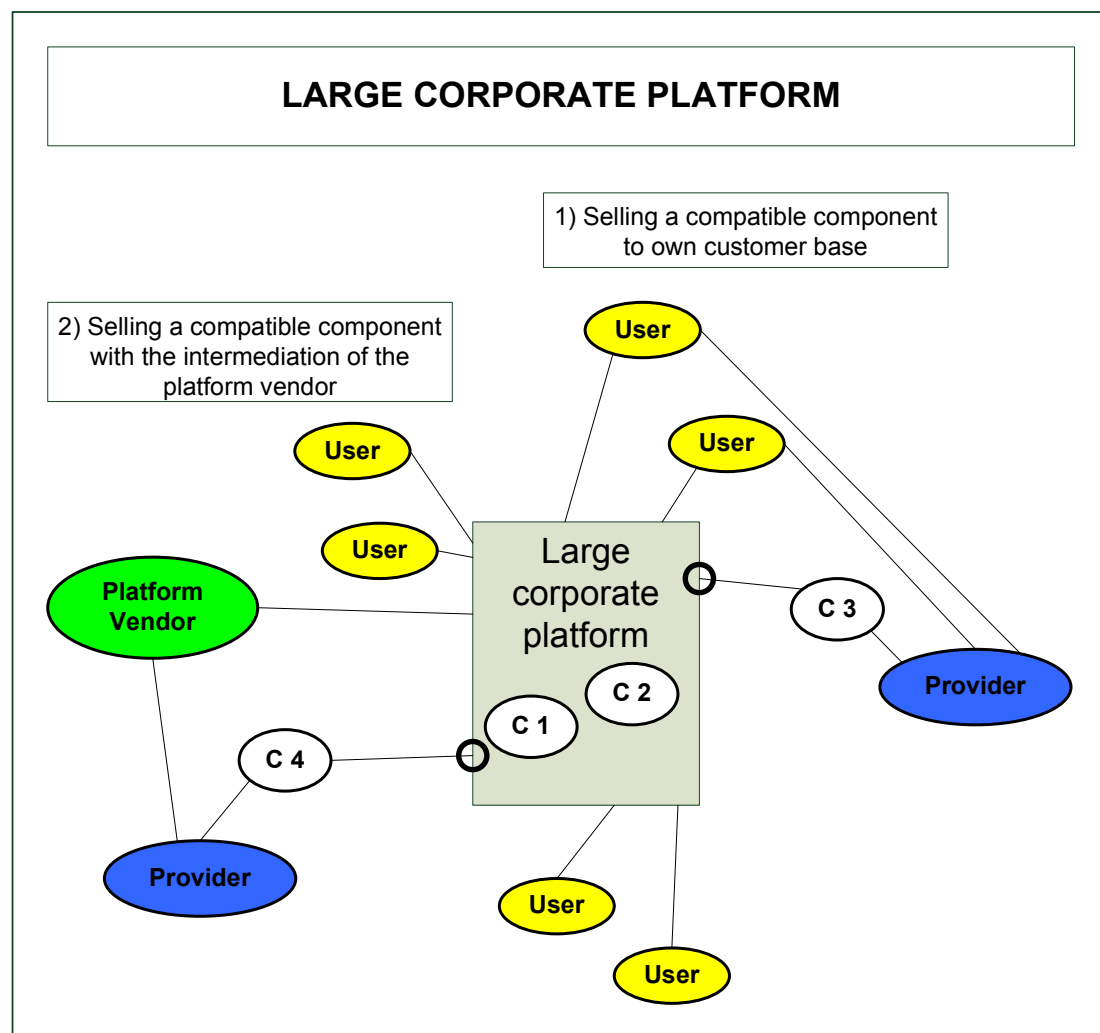


Figure 5: Large corporate platform approach to component integration

In figure 6 the large corporate platforms control the value network. The software components must be compatible with the platform and they are either sold directly by the providers to their own customer base or the platform vendor acts as an intermediary between the providers and the users.

In both cases the full user community of the platform is shielded away from the small providers of additional components. In addition the users have to follow the platform vendor. The market is thus fully dominated by the platform vendor. As a component provider has little influence on the platform vendor, the vendor can always force a small provider out of business – for example by changing technology standards or developing a component himself.

In such a situation the dependency and vulnerability of a provider SME is very high. However the approach holds many advantages from a user perspective when it comes to integration, reliability and investment security.

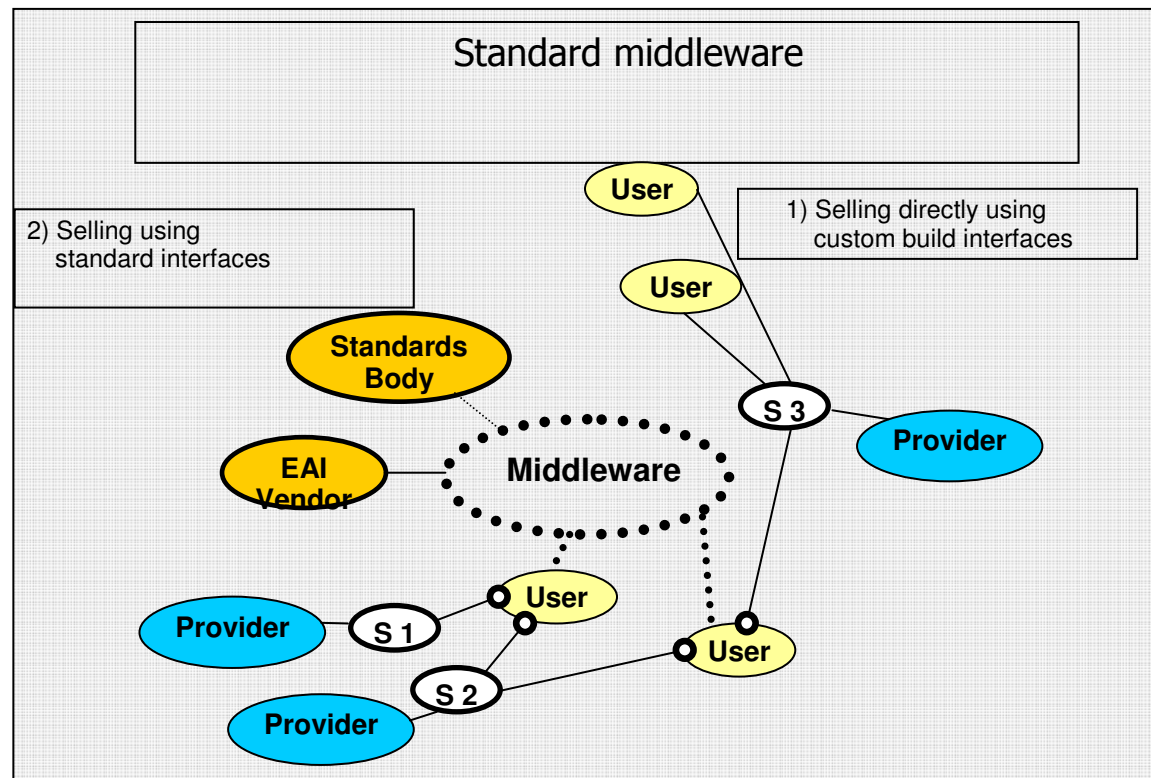


Figure 6: Standard middleware approach to service and component integration

The counter movement to proprietary platform domination is often found in open standards (figure 6). In fact, the Open Source movement mostly goes in line with open standards.

However, if we take a closer look at the value network, the user community looks highly fragmented partially using custom-built solutions and partially adopting open standards but without necessarily being aware of solutions from other providers that they might be able to integrate with.

Hence, the open standards approach hold advantages for provider SMEs but the fragmented market is non-transparent and difficult to understand and thus users have to pay more attention on choosing standards and providers carefully.

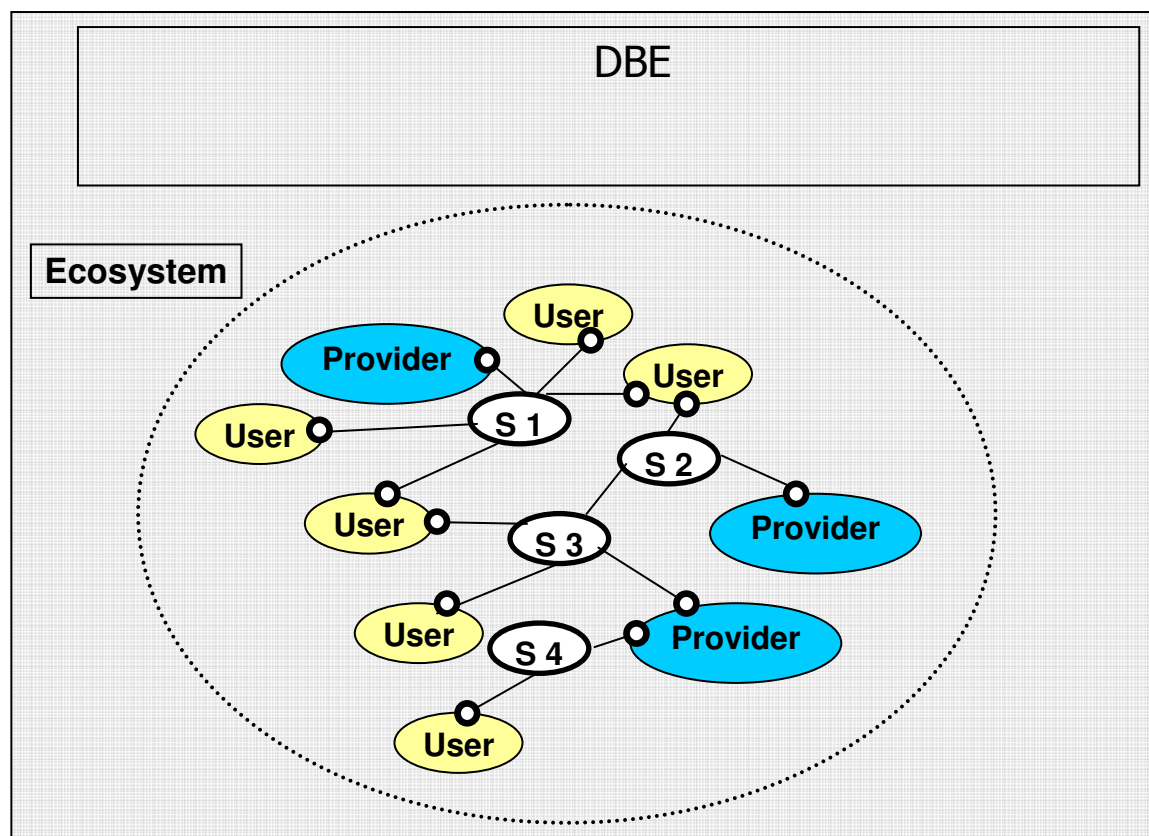


Figure 7: DBE approach to service and component integration

In figure 7 is presented the DBE approach to component and service integration. DBE takes care of the integration for both component / service providers and users. This allows a very flexible system for the whole value network.

The DBE approach is compatible with the open standards approach but brings in some distinct features of a platform. By making providers as well as users nodes of the DBE network, all users gain access to all components and all providers gain – theoretically – access to the full user community. In addition the distributed semantic layer of the DBE allows for the identification of providers as well as users in the network.

We think that this combination of technical integration possibility as well as discovery possibility allows for the rather dynamic formation of instant networks. In that sense, the DBE aims to drive the integration process of the open standards approach. This mutual dependency is very important for the business plan. Without getting absorbed and accepted by open source communities as well as open standard bodies and without participation of providers as well as users the DBE is not going to be of any value.

As mentioned in 5.1, there are other actors in the market besides the DBE, but not with similar goals. Also, the SME's that are the market segment for the DBE, are typically not the most interesting segment for commercial actors as the market is very challenging and the profits hard to make due to the lack of ICT infrastructure in the SME's and limited financial resources.

5.4 Growth Perspectives

The purpose of the DBE is to provide growth opportunities for the European software provider SME's and the software user SME's, not for the DBE organisation. The growth perspectives are thus indirect. Main challenge of the DBE is to grow beyond the critical mass so that it interests both software providers and users to get involved in the DBE.

6 Financing

6.1 Financing needs

The financial needs for the DBE after the project time are primarily focused on the support services of the legal entity mentioned before in this deliverable. In the long run the purpose is to make DBE self-sustainable so that the financing needs would cease to exist.

The secondary financial needs are required to foster and support the creation of other DBE-related projects. The DBE after the project time is still going to be in a beginning stage and a lot of research and implementation work is needed to achieve the goals of the DBE.

To be able to estimate the financing needs, the future project planning has to be on greatly more specific level it is at the moment. At this stage the financing needs are mentioned on a topic level, identifying the cost areas and possible sources for finance. Operational incomes, financial support, and financing needs will be estimated later. It is foreseen that following activities will incur costs:

- Technology research and development (depending on the development phase at the end of DBE project)
- Further development of DBE code (keeping it up)
- Personnel (R&D, marketing, management/administration)
- Communication with the DBE network (personnel, systems, marketing and informative material) and maintaining the network

Operational incomes may come from servers etc. IT-systems, if peer-to-peer operations or complex network of providers and developer in future need such.

6.2 Potential financiers

The planning and preparations of DBE business will be done as a part of the DBE project. At the end of project the business will most probably not have enough incomes to cover all costs.

Some parties has already been identified as potential sources of additional funding . These are private public sector, regional policy makers, EU business unit, EU parliament, SME organisations, research community, corporations, project partners and associates, SMEs, and private investors. First mentioned parties may be interested in to support even if there is no clear revenue model foreseen. Towards the end of

prior list the (private) parties are more willing to get crystal clear business or revenue opportunity.

7 Further development of the Business Plan

This document provides only an outline for the business plan. There are two more deliverables for drafting the business plan and the final business plan deliverable. The deliverables will be created following the timeline in figure 8.

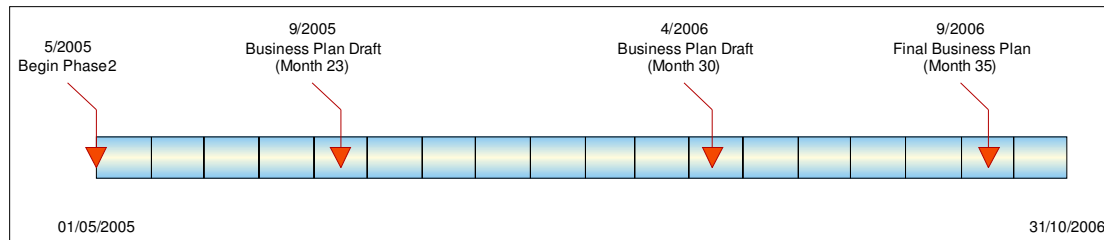


Figure 8: DBE Business Plan deliverable timeline

The structure of the deliverables will follow the structure of this document. The contents will be deepened with following emphasis:

Business Plan draft 2 - Projectmonth 23

1. Aspect of time – different phases, milestones, timeline and actions should be recognised with different precision depending on how far in the future the actions will take place
2. Management and organisational structure
3. Business environment description

Business Plan Draft 3 - Projectmonth 30

1. Market description
2. Development and production description
3. Sales and marketing plan
4. Financial plan

Final Business Plan - Projectmonth 35

8 References

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