

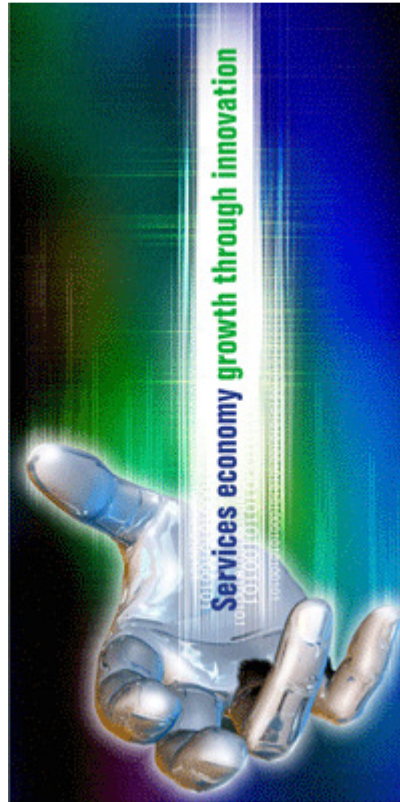
QUT Digital Repository:
<http://eprints.qut.edu.au/>



Rosemann, Michael and Fiel, Erwin and Kohlborn, Thomas and Korthaus, Axel
(2009) *Business Service Management*. [Working Paper] (Unpublished)

© Copyright 2009 Smart services - CRC Creative Commons Attribution-
Noncommercial-No Derivative Works 2.5


SMART SERVICES CRC



Business Service Management

29 June 2009



Established and supported under the Australian
Government's Cooperative Research Centres
Programme

Authors

Michael Rosemann, Erwin Fielt, Thomas Kohlborn, Axel Korthaus
Queensland University of Technology

Acknowledgment

We are very grateful to the comments and input to previous versions of this paper that we received from members of the CRC Smart Services Business Service Management project. In particular, we like to thank Keith Duddy (QUT), Terry Gillet (Suncorp), Paul Reedman (Suncorp), Rohit Shawarikar (Infosys), Paul York (Queensland Government) and Julien Vayssière (CRC Smart Services).

Disclaimer

Smart Services CRC Pty Ltd and its respective directors and officers expressly disclaim any liability, representations or warranties express or implied contained in this report or any omissions from it. This disclaimer extends to any other information whether written or not, provided at any time to a partner, researcher or student by or on behalf of Smart Services CRC Pty Ltd.

All trademarks mentioned in this document are the property of their respective owners.

Smart Services CRC Pty Ltd
Australian Technology Park
Locomotive Workshop
Suite 9003, 2 Locomotive Street
Eveleigh NSW, Australia 2015

www.smartservicescrc.com.au
T: 61 2 8374 5080
Fax: 61 2 8374 5090



This work is licensed under the Creative Commons Attribution-Noncommercial-No Derivative Works 2.5 Australia License. To view a copy of this license, visit <http://creativecommons.org/licenses/by-nc-nd/2.5/au/>

Executive Summary

Business Service Management describes the emerging discipline dedicated to the IT-enabled management of services as corporate assets. Business Service Management deals with the service orientation of the organisation and the provisioning and use of business services. The term business service describes an autonomous transformational capability that is offered to and consumed by external or internal customers for their benefit. The prefix 'business' stresses that such a service has a market value, requires the ability to be managed internally as a corporate asset and that its implementation is technology-agnostic. While business services (or so called capabilities) have attracted the attention of many vendors and organisations, a lack of understanding of the activities required for the successful management of such business services remains a critical issue. In order to fill this gap, a framework consisting of Service Lifecycle Management, Service Value Management, Service Relationship Management and Service Enablement is proposed. This Framework has the potential to provide organisations with the much needed guidance in their attempts to convert current IT-driven service initiatives into successful service-centric business models.

Introduction

Business Service Management (BSM) is the business discipline dedicated to the holistic management of services in an organisation to ensure alignment between the needs of the customer and the objectives of the organisation. The explicit management of services in organisations is required as services have become focal units for the cost-effective creation of customer value and innovation. Moreover, services can be seen as building blocks for organisational and market arrangements in service networks and ecosystems. Finally, information technology is an important enabler and driver of service innovation, and the service paradigm provides the opportunity for further progressing the widely postulated business/IT alignment.

Business Service Management deals with the service orientation of the organisation and the provisioning and use of specific business services. The term **business service** describes an autonomous transformational capability that is offered to and consumed by external or internal customers for their benefit. The prefix 'business' stresses that such a service has a customer value, requires the ability to be managed internally as a corporate asset or product and that its implementation is technology-agnostic. While Business Service Management includes any type of service (e.g., the non-automated expert advice of a lawyer), it does pay special attention to enabling business services with the driving and enable role of information technology.

Business Service Management is dedicated to the overarching and potentially enterprise-wide development of a service management capability. On a business level, it captures the design of appropriate service-enabled strategies, service-oriented business models, service portfolio management, service program management, service project management and service operations management. On a technical level, it comprises approaches that aim towards implementing services as encapsulations of autonomous, valuable software capabilities.

Business Service Management can be driven by customer demands and by provider capabilities. From a demand-driven viewpoint, it translates external or internal requirements via customer-facing activities (e.g., Service Marketing) into service specifications for internal or external providers. As a capability-driven discipline it ensures that the promising benefits of Service-oriented Architectures are appropriately complemented by a corresponding and comprehensively defined service management discipline. This requires the definition of

multiple levels of service-centred views on the organisation in addition to the predominant process, data or application views. BSM is a critical boundary spanner between external and internal service stakeholders and a key facilitator in the further progression of a service-centred view of the firm.

Business Service Management can be seen as a discipline and body of knowledge that is in development, just like Business Process Management was 10 years ago. The ambition of Business Service Management is to provide a focal point for service-related issues, irrespective of their origin in business or technology. Its scope depends upon the role that services play in organisations. It is one of the more fundamental contributions of BSM to identify the opportunities for service-orientation in the organisation, for example with respect to market offerings, internal capabilities and technological support. It also can drive the required organisational transformation. Its role in the organisation is complementary to other business management areas, such as Business Process Management, Marketing Management and Information Technology Management. Because of its relationships with many areas BSM will often be a bridging discipline and perform a coordinating role.

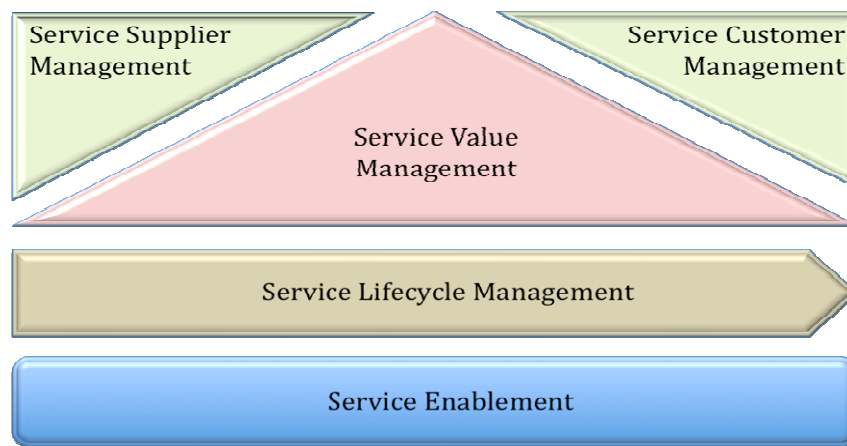


Figure 1: Business Service Management Framework - Overview

In this paper we define a Business Service Management Framework (Figure 1) that provides a reference model for the development of enterprise-wide service-related capabilities. The Business Service Management Framework has been developed as part of a project within the Smart Services CRC¹ research initiative. The framework consists of four clusters. The core of this framework is (1) Service Lifecycle Management covering all stages from service initiation to service retirement. (2) Service Value Management ensures the creation of business value by services and the integration of service-centred activities into the corporate landscape. (3) Service Relationship Management covers the integration with customers and suppliers of services. All these activities are supported by (4) Service Enablement consisting of three management functions addressing quality, data and technology. These four clusters are discussed in more detail in the following sections.

It has to be stressed that the Business Service Management Framework focuses on management activities and should be seen as orthogonal to any roles that may emerge within a service ecosystem (*e.g.*, Service Provider, Service Broker). For the purpose of this framework, we consciously abstract from these roles and refer simply to service provider and service consumer acknowledging that the actual interactions may involve many more partners. Provider and consumer may also be entities within the same organisation. We also

¹ www.smartservicecrc.com.au

simply refer to a service but recognise that a service will in many cases be an aggregated service, *i.e.* it will consist of multiple services.

The actual term ‘Business Service Management’ is obviously inspired by the Business Process Management (BPM) discipline. Like BPM, BSM captures the organisational, managerial and technical aspects of a particular set of organisational assets (services as opposed to processes). The close proximity of processes and services will motivate many organisations to utilise a comparable set or principles, rules, concepts etc. for BPM and BSM. Similar to Business Process Management we also do not envision that BSM necessarily will demand its own organisational overhead in the form of dedicated Business Service Managers or even a BSM Centre of Excellence.

Nevertheless, we see BSM and the entire ‘service-based view of the firm’ as an alternative managerial paradigm that depending on the nature of an organisation may even play a more important role than BPM and its inherent process-based view of the firm. In most cases, however, we see BPM and BSP as highly complementary approaches. BPM has over the last decade sensitised organisations for their business processes, and the critical role these play. On top of this increased process awareness, BSM now adds a service-centred view across business processes and facilitates the utilisation of economies of scale for those services that contribute to multiple processes (Figure 2).

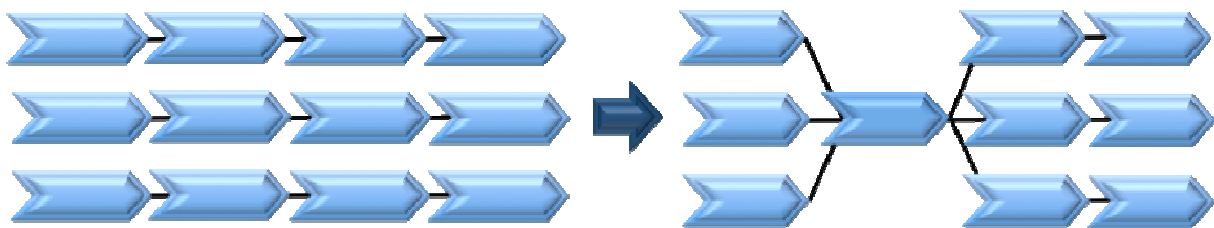


Figure 2: Complementing the Process View (left) with a Service View (right)

In many of its proposed elements, Business Service Management will be able to build on existing organisational capabilities and ‘just’ extend these with a service flavour. For example, Service Analysis relies heavily on enterprise modelling capabilities and will use available data or process models as an important source for the identification of potential services. Beyond these existing artefacts and capabilities, however, dedicated service modelling expertise is required to capture the various services and the plethora of their interrelationships in dedicated service models. These models then need to be put into context with other models under the umbrella of a comprehensive enterprise architecture.

Service Lifecycle Management

At the core of Business Service Management lays Service Lifecycle Management (Figure 3). Service Lifecycle Management addresses the need for a coordinated and systematic management of services in the different stages of their lifecycle: development (analysis, design, implementation and publishing), operation and retirement. From a service perspective, organisations thrive in service ecosystems where their services are used by others (external and internal service customers) and they make use of services of others (internal or external service providers). Therefore, we explicitly address activities related to Service Marketing and Sales and Service Purchasing. However, while we acknowledge their importance for the service lifecycle in terms of providing input and receiving output, we do not include them in the lifecycle itself because they will have their own lifecycles (*e.g.*, service customer lifecycle, service contract lifecycle) and their multi-faceted relations with the different service lifecycle phases. Figure 3 visualises the relationship of Service Lifecycle Management, Service Marketing and Sales, and Service Purchasing.

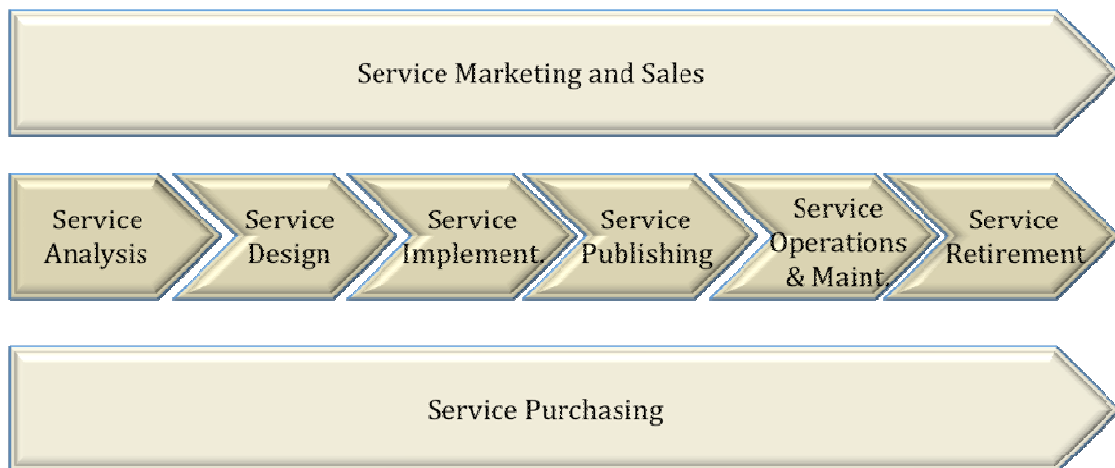


Figure 3: Service Lifecycle Management

The service lifecycle can be triggered at two different levels. First, the lifecycle addresses the need to develop or improve a specific service. Second, the lifecycle addresses the need of the organisation to be transformed according to the service paradigm. This transformation will typically involve a high-level service analysis and design at organisational level, followed by a full and more detailed analysis and design at the specific service level.

Service Analysis captures all activities required to identify and contextualise a service. Service Analysis can be driven by market requirements (*e.g.*, what services could be profitable offerings?) and/or by various internal artefacts (*e.g.*, strategy maps, process models, data models, application diagrams). The latter case is the core of Service Analysis and this task is focused on the translation of one view (*e.g.*, a process view) into a service-centred view. The more entrepreneurial, risky and often external parties involving identification of new services is part of Service Innovation Management. Service Analysis plays a central role in the facilitation of cost-effective *Service Reuse Management*. This requires strong enforcement of making the service reuse a priority during the development including service reuse where possible (design by reuse principle) and facilitating future service reuse (design for reuse principle). It also captures the evaluation and comparison of alternative service designs based on specific requirements (*e.g.*, cohesion, reusability) and the assessment of the new service in terms of competitiveness, pricing, risks, etc.

In general, the service analysis phase comprises all activities that are related to the analysis and decomposition of a project proposal or service idea (see Service Innovation Management) into its components and relationships. Hence, this includes all activities related to the identification and description of the processes and services in a business problem domain. The proposal for a new service has to be analysed and decomposed to identify which services should be realised and what kind of logic should be encapsulated by each service. Furthermore, an ontology should be developed and maintained during the execution of the subsequent phases to allow for an enterprise-wide congruent use of terminology. Based on that ontology, one needs to agree on a service description that suits the needs of business and IT. For each proposal for a new service, potential stakeholders need to be identified and consulted in order to maximise the reusability of the service candidate within the organisation. One main activity of service analysis is the examination of the feasibility of the idea. Only if the analysis concludes that the idea provides a valuable outcome for the organisation or its partners (*e.g.*, an internal return on investment that exceeds the defined threshold), the subsequent phases of the lifecycle will be executed. Hence, project parameters are defined and the project is finally approved (or declined). A business sponsor or service owner needs to be identified as well.

Once the scope of the project is defined, the second part of the service analysis phase starts. Resources need to be allocated accordingly and the initial information base (business documentation, models, *etc.*) needs to be compiled. Based on the information provided, the service candidates have to be identified, for example by decomposing capabilities or processes. The initial requirements of the service have to be captured and analysed including the identification of service layers and service candidates. After the services and their interrelationships are identified, the services need to be detailed regarding their inputs and outputs as this might lead to the development of additional service candidates. Additionally, different delivery scenarios should be analysed and the most preferable one should be recommended.

In alignment with classical analysis and design lifecycle models, Service Analysis is followed by the task of **Service Design**. In this activity, the conceptual service design is translated into a more detailed model of the service that can act as an appropriate specification for the actual development and reuse of the service. Service Design is focused on refining the service idea to a degree that the service itself can be implemented afterwards. Hence, service requirements have to be captured and a detailed design has to be produced including the specification of involved applications, processes, *etc.* Additionally, the scope of the architectural extension needs to be understood as well as the boundary of the architecture. Once all these requirements are specified, a decision has to be made regarding the granularity of the service and the integration into the service/enterprise architecture. The risk has to be assessed and managed including an impact assessment and related mitigation plans and test cases. Service Level Agreements (SLAs) have to be defined thoroughly for both functional and non-functional properties of the service. The services identified are transformed into a set of concrete service interfaces. Though the analysis/design analogy seems to emphasise technical service development, we would like to stress that these two stages are of equal importance for the development of non-technical services. In these cases, Service Design would be dedicated to the more detailed specification of the characteristics of the new service.

The successful service design forms the essential input for **Service Implementation**. This could immediately lead to a comprehensive and detailed implementation or first to an initial pilot that aims towards gathering feedback from a group of initial service consumers. In this stage, the actual service is built resulting in a piece of software with all technical service characteristics, in a marketable and fully executable non-technical service or, most common, in a mix of these two. The service implementation phase comprises all activities that are related to the actual realisation (*e.g.*, programming) and the delivery (*e.g.*, training) of the service based on the detailed design plans of the previous phase. Hence, the activities associated with this phase are on the one hand heavily dependent on the specific service type and on the other hand on the different potential delivery strategies.

A business service might be enabled at least in parts by a dedicated application package or supporting software services, in which case the service lifecycle process for the required software services would be triggered at this stage, starting with the software service analysis activity. Regarding software services, the Service Implementation phase comprises activities that are very much aligned with traditional activities related to software implementation on this level of granularity. The specific service needs to be developed and training scenarios have to be created accordingly. Prior to the development a decision has to be made regarding the hosting environment of the application (resource dependencies, capacity requirements, integrity and access constraints) and the programming language. As services are potentially reused in different scenarios by different service consumers under unforeseen circumstances, services need to be tested thoroughly against comprehensively defined criteria before they can be published, regardless of the service type. Testing typically aims at verifying that requirements have been met and the deliverables are of acceptable quality and in accordance to standards (SLAs).

Once the service is built, **Service Publishing** takes care of all issues related to the dissemination of the service. As such, Service Publishing covers among others the tasks of registering a service in service marketplaces and service repositories. A close relationship exists here with Service Marketing and Sales as appropriate campaign management has to make sure that identified target groups are aware of the published service.

After Service Publishing, **Service Operations and Maintenance** starts. Here, the service is in operation, actively consumed, provided and maintained. Related runtime metrics are monitored for the purposes of contract management, SLA compliance and billing. The data that is gained here forms important input for Service Performance Management and Service Relationship Management. Services will typically undergo various development stages over their lifetime leading to revisions, extensions and improvements. In this stage, service consumers can submit feedback and improvement proposals, a role that makes them a crucial partner in the co-creation of services. The iterative and interactive nature of this stage is also a clear difference to typical 'industrialised' value chains that follow more predictable sequential stages along their product lifecycle model. The service provider will have to regularly keep consumers informed about service maintenance activities as they will lead to new capabilities, potentially new pricing or other contractual attributes. Service Maintenance deals with executing minor changes to services, while substantial service improvements would go through the entire service lifecycle (e.g., an entire new service design might be required). Service Improvement captures extensions of existing services that go beyond bug fixes (maintenance). Related tasks are Service Version Management and Service Change Control Management, *i.e.* the smooth transition from one service to another. Service Maintenance Management finally comprises all tasks related to Service Outage Management, *i.e.* management of the actual unavailability of a service due to maintenance activities related to the service or essential infrastructure (e.g., a server or training of involved human resources).

The final stage of the service lifecycle model is **Service Retirement**. The service has reached the end of its economic or technical competitiveness and will have to be taken out of the service portfolio on at least one side (provider or consumer). Related to this task will be contractual activities and succession planning (What new service can replace the retiring service, if required?). The service provider will have to make sure that the active service user base is appropriately notified and that implications of the service retirement are carefully evaluated (e.g., the service might be a critical component in a service bundle).

Up till now we provided a straight-forward description of a service lifecycle from development through operations to retirement but did not address how organisational units provide services to others or make use of the services of others. Making use of the services of others requires activities of **Service Purchasing** and Supplier Relationship Management, addressed below in Service Value Management. Service Purchasing includes the tactical and operational purchasing processes. The more strategic, sourcing activities are part of Service Supplier Management. The tactical purchasing process consists of defining the specification of the requirements, selecting providers and coming to a contract agreement. The operational purchasing process consists of managing and evaluating the use of the service. The way the service purchasing process is executed will greatly depend upon whether or not the organisation wants to purchase a new service from a new provider, a new service from a known provider or a known service from a known provider ('straight re-buy'). Service Analysis and Service Design are closely related with the tactical purchasing process as both are concerned with defining functional and non-functional service characteristics. Service Operation and Improvement are to be tightly coordinated with the operational purchasing process of use (e.g., authorisation, accounting) and evaluation (e.g., service levels).

It may be the case that a (highly innovative) new service is advertised to the consumer and triggers demand in this way. Both ways (the service consumer discovers the service or the service discovers the consumer) are summarised as *Service Discovery Management*. The more widely discussed scenario is that of a potential user discovering a service of interest. While initial service repository concepts (e.g., UDDI) have not yet delivered on over-inflated promises (and maybe never will), it can be expected that Google-like service discovery engines will become available very soon. Current service marketplaces (e.g., Apple Store, Strikelron) still have a rather proprietary conceptualisation and implementation. However, purely consumer-driven service discovery hardly captures all relevant scenarios. As the rollout of innovative services such as Facebook, Skype, YouTube, eBay, Salesforce.com, Google, Triplt, etc. demonstrates, users will come across such services often because of word of mouth advertisement. This demonstrates that service marketing (see Service Customer Management, Service Publishing) will play a crucial role in the adoption of new services.

Providing services to others requires activities of **Service Marketing and Sales** and Service Customer Relationship Management, addressed below in Service Value Management. Depending upon the overall service concept of the organisation, marketing and sales may be related to the service lifecycle in different ways. In the case of unique customer services, most marketing & sales activities may have started before the actual service development. On the other hand, in the case of mass services, most marketing & sales activities may take place after publishing the service. There are, however, some relations that will in general be of importance. *Service Market Analysis* will provide valuable input for service analysis, for example by providing generic customer trends or working with lead users. Moreover, early service designs can benefit from *Service Market Testing* before the actual roll-out of the service. Service Publishing is required but not sufficient to have a service used (or re-used). Therefore, it can be accompanied by *Service Market Promotion* making existing and new customers aware of a (new) service. *Service Market Evaluation* in diverse forms (e.g., financial results, customers' complaints etc.) is valuable for service improvement and can trigger new service development.

As mentioned earlier, we deliberately exclude a detailed discussion of the different points of view of the various roles participating in a service ecosystem from the description of the Business Service Management framework in this paper. Suffice it to say at this stage that different scenarios, e.g. referring to different distributions of responsibilities between the stakeholders in a service ecosystem, will require different configurations of the Service Lifecycle Management activities (and other managerial and operational activities) from the overall framework. We, however, acknowledge that the current Service Lifecycle Management description is more heavily influenced by a new service development and service provisioning perspective.

Service Value Management

Any activity within an organisation has to be aligned with the overall corporate strategy, and Business Service Management is no exception. Under the Service Value Management cluster, seven distinct disciplines can be summarised (Figure 4).

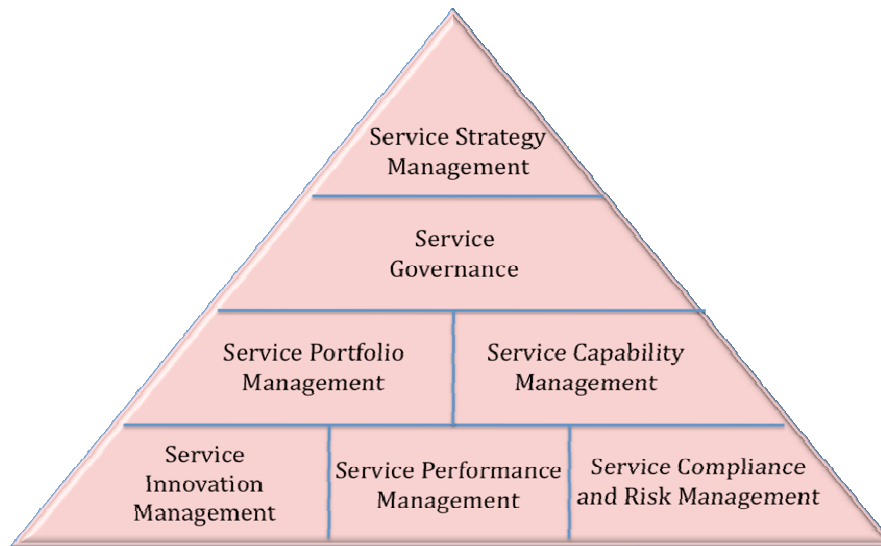


Figure 4: Service Value Management

Service Strategy Management provides the important link back to the corporate strategy, and in more technically focused service environments back to the IT strategy. This link is bi-directional, *i.e.* the corporate strategy will be the main driver for the design of service strategies. However, it can also be seen that outstanding service capabilities can inspire revisions to the corporate strategy (*e.g.*, potential to globalise the market) and lead to entire service-enabled new business models. A *Service Architecture* can be seen as a high level summary of the corporate service landscape. As such it provides an essential link between the articulated strategy and the more detailed services. Service Architectures have to be embedded in larger Enterprise Architectures. Service Strategy Management defines the overall ambitions of the service-centred approach for the organisation. It also includes the strategic assessment of each service, which provides valuable input to Service Portfolio Management and the identification of services that can be retired (or should be integrated). A strategic assessment requires addressing the viability and strategic alignment of a service based on the underlying business model.

Service Governance is the task of defining the roles, responsibilities, policies and the overall decision-making processes as part of Business Service Management. The responsibilities can be derived from the tasks as they evolve as part of the service lifecycle management (*e.g.*, sign off for a business case, validate service design) and complementary managerial and operational activities. These tasks have to be allocated to roles based on the similarity of the required skills and experiences. The so derived roles will to a large extent reflect familiar roles (*e.g.*, enterprise architect) but will typically also include a few roles that are new to an organisation (*e.g.*, service portfolio manager, service librarian, service architect). The requirements of each role are consolidated and form essential input for job descriptions. The process-related definition of the responsibilities defines decision-making processes that direct all service management tasks. Service Governance has also to ensure that the involved organisational entities comply with the defined decision-making processes and that relevant constraints (*e.g.*, segregation of duties) are considered. Finally, Service

Governance includes incentive and rewards schemas that are of relevance to encourage, for example, a sufficient service reuse level.

An essential component of the strategic side of Business Service Management is **Service Portfolio Management**. A service portfolio comprises a well-defined set of services (e.g., HRM services or all services offered to a certain customer group). Service Portfolio Management explicitly considers the requirements of managing a large set of services. Once all relevant services are consolidated in one portfolio, Service Portfolio Management supports channelling service-related investments by the comparative analysis of services and based on defined normative strategies. Ultimately visualised in the form of two or three-dimensional service portfolios, such analysis could, for example, identify those services of high strategic importance but poor performance. A service portfolio will also include services that are not developed yet, but only exist as service ideas. Hence, service portfolio management is very much aligned with a subset of the activities of the service analysis phase as part of the service lifecycle. The feasibility of the initial service ideas needs to be analysed in order to make an informed decision about the allocation of resources to realise these ideas in alignment with the overall service portfolio. Complementary with the establishment of Service Portfolio Management as a discipline, we see signs of the emerging new role of a Service Portfolio Manager. A key discipline within Service Portfolio Management is *Service Bundling Management* that deals with the challenge of identifying services that can and should be consolidated into service bundles. Besides substantial technical and conceptual challenges, a demanding managerial task exists in comprehending the fast growing internal service portfolio and potential service candidates offered in the ecosystem, and being able to identify those service bundles that lead to efficient and strategically-aligned new aggregations. This will require the generation of 'could-be service bundles' based on joint service properties (e.g., consider bundling services that are provided to the same customer group or at the same location) in order to generate a solution space of service aggregates. These so generated candidates for new service bundles need to be assessed from multiple dimensions (economic, risk, technical, etc.) so that the viable candidates for relevant service bundles can be derived.

Service Capability Management is complimentary to Service Portfolio Management. While Service Portfolio Management focuses on existing and non-existing services, Service Capability Management focuses on the capabilities that are needed in order to provide and use current and future services (e.g., service value management capabilities, service development capabilities, organisational culture, methods, skills, etc.). Different maturity levels can be identified for each of the capability levels leading to a Service Capability Maturity model. As part of Service Capability Management, different strategies related to the specific maturity level of a specific capability need to be defined. Each increase in this maturity needs to be justified per capability factor to ensure economic relevance. Such normative strategies can then guide the organisation in reaching the next level of maturity leading to a roadmap for service capability development.

Service Innovation Management covers all activities related to the creation of entirely new services or the radical improvement of existing services. This activity is closely related to Service Portfolio Management, where the need and opportunities for service innovation are identified and comparatively assessed. Service innovation can also include the engagement of external parties (open service innovation, service co-creation) whether in the form of intensive and very selective partnerships or in the form of an open innovation with a large pool of to a large extent unknown parties (Web 2.0). In addition to this outside-in view, Service Innovation Management could also include an inside-out approach comprising the development of service ideas that are sold to a third party for development and further commercialisation.

Service Performance Management takes care of the analytical side of Business Service Management. In Service Performance Management, all relevant quantitative and qualitative data describing service performance from multiple aspects is consolidated, aggregated, evaluated and disseminated. In this role, it provides important input for Service Strategy Management, Service Portfolio Management and Service Quality Management. Aggregated data is also integrated into overall corporate performance systems (*e.g.*, Balanced Scorecard). Based on lead indicators and a sound understanding of cause-effect-relationships, early warnings have to be generated. The Service Operation phase within the service lifecycle is the most important provider of relevant information for the performance management tasks. Service Quality Management provides important service attributes that deserve to be measured in terms of service quality characteristics.

Service Compliance & Risk Management captures all tasks related to the requirement that the design, delivery and consumption of services is not only driven by performance goals, but also has to comply with legislative requirements and further constraints. As such, relevant constraints have to be identified, operationalised and service management practices have to be evaluated in accordance with defined requirements. Specific challenges of Service Compliance Management are the scalability and heterogeneity that results from the potentially global delivery of services (see for example the issues of Internet services such as Pandora or Google Streetview in different countries).

Service Relationship Management

Business Service Management is in most cases not a pure internal management discipline but relies on effective relationships with external partners, mainly customers and suppliers (Figure 5), but also R&D institutes, universities, etc. Note that when organisations are structured as service units consuming and providing services from each other, it may also refer to the management of the relations with internal customers and suppliers.

Service Supplier Management captures all management tasks related to the providers of services. While the operational activities will be covered to a large extent as part of Service Lifecycle Management, Service Supplier Management mostly deals with the more strategic issues such as strategic partnerships and make-or-buy decisions. It has a strong relation with the interface between Service Lifecycle Management and Service Purchasing.

Service Customer Management is the corresponding activity on the demand side. Here, target customer groups, regional markets, etc. will be identified, pre-sales services (*e.g.*, marketing, advice) will be provided and after-sales activities will be coordinated. It also deals with strategic decisions in relation to the possibilities of providing internal services to external customers. It has a strong relation with the interface between Service Lifecycle Management and Service Marketing and Sales.



Figure 5: Service Relationship Management

Service Enablement

The effective management of the service lifecycle is dependent on three enabling service disciplines (Figure 6).



Figure 6: Service Enablement

Service Quality Management is dedicated to the reliable definition of perceptual or actual service qualities (see also SERVQUAL). Based on external and internal quality requirements, appropriate quality definitions have to be derived and their relevance has to be confirmed with the involved service consumers. Consequently, Service Quality Management requires the capability to translate requirements into quality metrics. These metrics have to be regularly measured, evaluated, consolidated and acted upon. A strong link exists with Service Innovation Management and Service Analysis and Design as unsatisfactory service qualities will require revisions.

Service Master Data Management is dedicated to the management of service descriptions in the form of service master records that are properly stored in database like all organisational assets. The attributes of a service master record have to cover a wide range of business and technical criteria and can be clustered in attribute groups. In absence of a widely accepted standard for service specification, many organisations are currently developing their own service description frameworks. A reference point for such service descriptions is provided by the Universal Service Description Language (USDL). In summary, Service Master Data Management deals with all data requirements along the service lifecycle.

Service Technology Management captures all software-related requirements of successful Business Service Management. This includes technological requirements such as standardisation or service interface management, *i.e.* addressing interoperability issues. Service Technology Management demands the ongoing assessment of relevant market developments and the evaluation and adoption of service standards. As such, Service Technology Management provides the technical capabilities that are required for the successful execution of Service Lifecycle Management.

Conclusion

Business Service Management is a strong advocate for the establishment of a mature management discipline related to services as corporate assets in order to ensure that the market potential and the technological capabilities of service-centred approaches will be converted into sustainable economic success. The comprehensiveness of the Business Service Management Framework clearly articulates the scope of activities that need to be addressed (Figure 7).

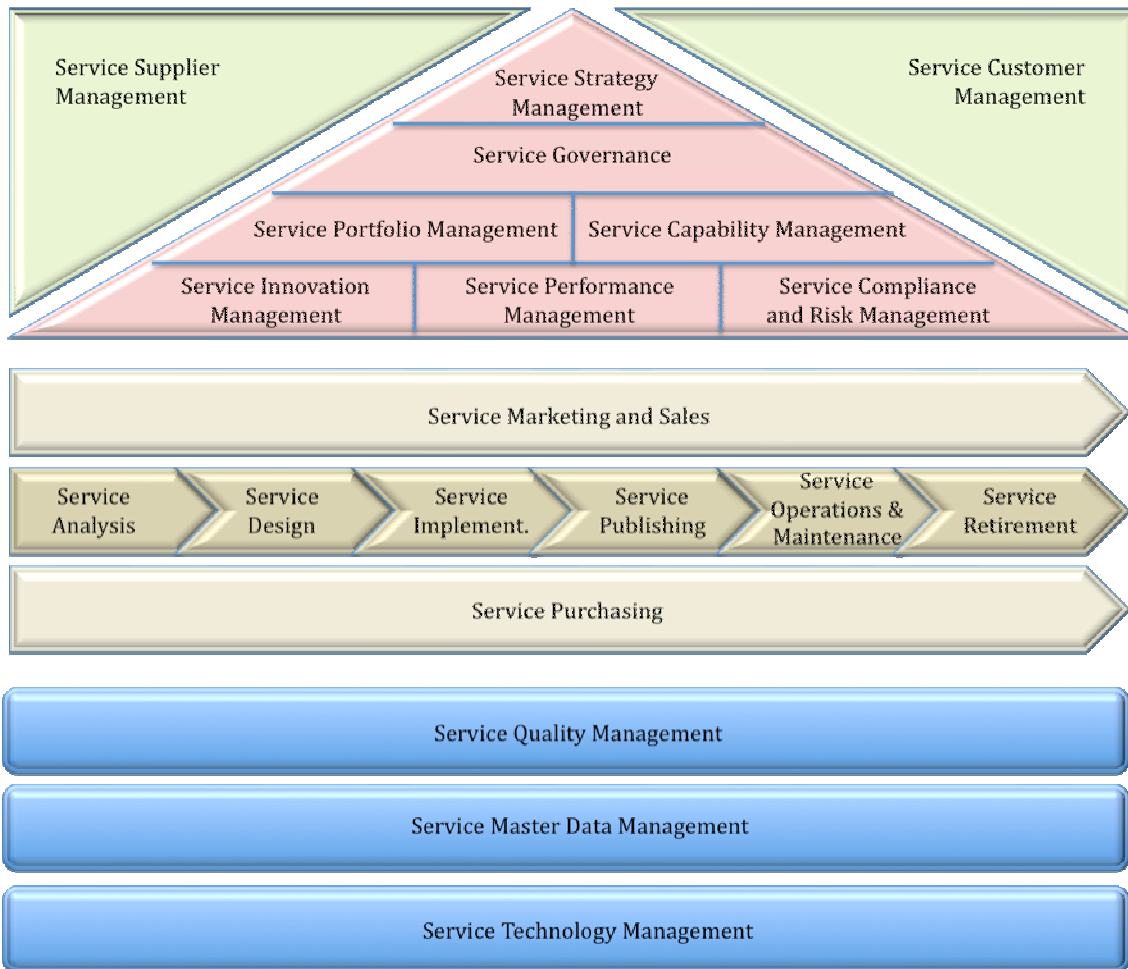


Figure 7: The Detailed Business Service Management Framework

The proposed Business Service Management Framework intends to provide a reference model for the development of enterprise-wide capabilities that leverage the symbiotic relationship between business-centred and the more technically focused service concepts. The proposed framework has the potential to guide the identification of those disciplines that need to be addressed for holistic and comprehensive service management.

Current and future work in the Business Service Management project will be dedicated to the development of detailed, empirically validated methodologies, tools and techniques for selected disciplines within this framework.

Authors

Prof. Michael Rosemann (m.rosemann@qut.edu.au) is Leader of the Information Systems Program within QUT's Faculty of Science and Technology. He is responsible for the Business Service Management project as part of the Smart Services CRC with particular interest in Service Portfolio Management, Service Architectures, Service Analysis and Design, and Service Governance.

Dr. Erwin Fielt (e.fielt@qut.edu.au) is Postdoctoral Research Fellow in the Smart Services CRC and a member of the Information Systems Program within QUT's Faculty of Science and Technology. Within the Business Service Management project he is responsible for coordinating the involvement of the different academic and industry partners and he actively conducts research in the field of Business Service Management with a focus on Service Portfolio Management and Service Quality Management.

Thomas Kohlborn (t.kohlborn@qut.edu.au) is a PhD student in the Information Systems Program within QUT's Faculty of Science and Technology. Working previously on the Service Lifecycle, especially Service Analysis and Design, his current research focuses on Service Portfolio Management with an emphasis on service bundling.

Dr. Axel Korthaus (axel.korthaus@qut.edu.au) is Postdoctoral Research Fellow in the Information Systems Program within QUT's Faculty of Science and Technology. He currently coordinates an ARC Linkage project titled "Service Ecosystems Management for Collaborative Process Improvement" and actively conducts research in the field of Business Service Management.