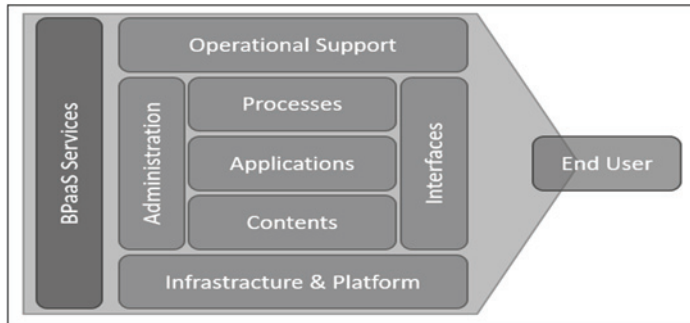


In addition, a BPaaS is a standardized service for use by many different organizations. Because these services are much more optimized to deliver a service consistently, they can leverage automation, standardization, and repeatability in the way the services are used and delivered (Hurwitz, 2017). To show how an integrated BPaaS Architecture can look like, Picture 2 illustrates the composition. In a nutshell BPaaS is Business Processing Outsourcing run as a Cloud Service (Gartner, 2017).

Picture 2: BPaaS Architecture



Source: own presentation based on (Pedro Robledo, 2014).

2.4. Business Process Outsourcing

Business process outsourcing (BPO) is the outsourcing of business processes to external service providers for optimization and cost cutting. The goal of outsourcing is the respite of non-business-critical processes and the associated concentration on the core tasks of a company. A difference is made between the outsourcing of primary processes (production / service creation, research and development, marketing and sales) and secondary processes (accounting, human resources, and customer support) (Schmelzer, 2013). Picture 3 shows a theoretical comparison of the benefits and drawbacks of BPO.

Picture 3: possible Advantages and disadvantages of BPO

Advantages	Disadvantages
<ul style="list-style-type: none"> ▪ Access to special knowledge ▪ Focus on the core business ▪ Capacity adjustment ▪ Increased efficiency ▪ External innovation impulses ▪ Transfer of operating risks to the BPO service provider 	<ul style="list-style-type: none"> ▪ Problems in the field of process adaptation between companies and BPO service providers ▪ Selection of processes to be outsourced ▪ Lack of flexibility ▪ Conflicts in the maintenance of business secrets ▪ Coordination needs with BPO service provider ▪ Lack of quality

Source: own presentation based on (Söbbing, 2015).

2.5. IT - Service Management

IT Service Management is a general term that describes a strategic approach for designing, delivering, managing and improving the way IT is used within an organization. The target of IT Service Management is to ensure that the right processes, people and technology are in place so that the organization can meet its business goals (Simons, 2013). Therefore, different frameworks (presented in the literature) like ITIL, Six Sigma, COBIT or TOGAF can be applied.

2.6. Evaluation of the scientific status

The theory shows the far-reaching changes through the digitalization in the field of Service Management and Outsourcing. The given opportunities by using Cloud Computing create new business models for the IT sector like usage-to-cash and nearly unlimited economies of scale will further push the SMAC trend and digitalization. This development will have more and more impacts on IT provider and the way they work like the business model. BPaaS is one business model to enable customers to outsource their processes in a digital way.

3. THE RESEARCH METHODOLOGY

For the proposed evaluation and analysis of BPaaS parameters, first an independent survey was executed to identify the customer needs in cases of digitalization. Based on the facts it became clear to set the scope on the process optimization as well as the process outsourcing and service management in the field of digital business transformation. August Wilhelm Scheer, Managing Director of the Scheer Group, underlines the survey results by the statement: “Everything that can be digitized will be digitized. Each process, product and business model becomes digital, so the revolution lies in the processes” (Hoffmann, 2015). With the focus on BPaaS a field study take place to evaluate the premise and to develop the framework parameters for the application of BPaaS. To assess the collected requirements and parameters a BPaaS Tool solution was developed.

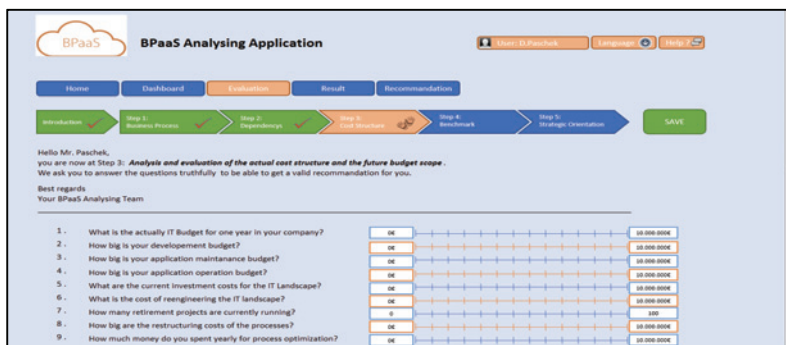
3.1. BPaaS – Application for Business Process Outsourcing

The digitalization offers big opportunities for a fast optimization and harmonisation of business processes quicker than ever before (Bearingpoint, 2016). To provide customers these opportunity’s and enable the focus on the economic feasibility the BPaaS Investigation Application for BPO was developed. The process of analysing the customer based on the results of the realized survey with more than 125 BPaaS Customers. The application process is set up logically into 5 steps which are attuned to one another.

1. Analysis and evaluation of the focused Business Processes and their contribution to value creation;
2. Analysis and evaluation of the functional and operational dependencies to the processes;
3. Analysis and evaluation of the actual cost structure;
4. Analysis and evaluation of the process benchmarking;
5. Analysis and evaluation of the future company targets and strategic orientation.

The customer user will be guided through the application and get further information’s and descriptions to every step, as it is shown in Picture 4.

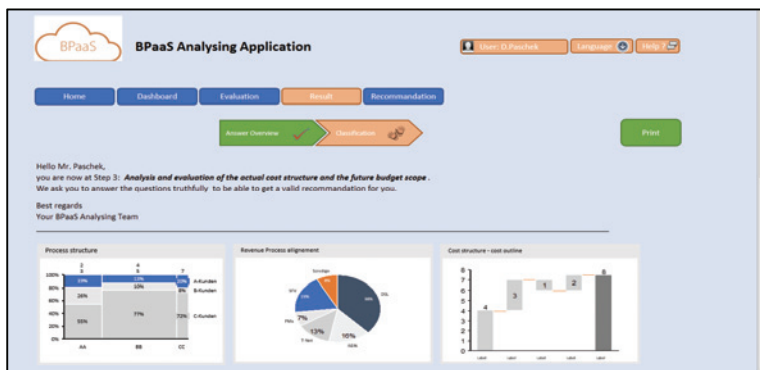
Picture 4: Mock-up BPaaS Analysis Application



Source: own presentation.

Each step consists of approximately 20-30 questions. The answers are predetermined and based on the survey analysis. In addition, a free text field can be chosen if the desired answer is missing. After the customer answered all questions at the BPaaS Analysing Application the evaluation process runs out with the linking to the result level. The customer get the opportunity to have a look at all answers and questions and to skip to any step and answer to adapt his choice. After the confirmation, the classification for the customer, based on the answers, will be shown, like displayed in Picture 5.

Picture 5: Mock-up BPaaS Analysing Application – result overview



Source: own presentation.

At the recommendation site, the customer will see the references and opportunities by using BPaaS with detailed strategic descriptions. In times of digitalization the frame conditions could change frequently therefore the customer should repeat the evaluation on any effective change. At the Dashboard, he will see all his evaluations, status and some important analysis based on his evaluation.

With this application, the customer could react flexible to analyse if one process or all processes can be outsourced to a BPaaS Solution.

3.2. Detailed study description

For the evaluation and development of the BPaaS Analysing Application two surveys were carried out. Previously, the basic parameters of the customer, requirements, trends and further information's were collected as base data for the application. For this study the anonymous survey method was used. It was ensured that the subjects present their experiences, expectations and prospects of BPO projects. Target persons were mainly Chief Information Officers (CIO), Chief Technology Officers (CTO), Chief Execution Officers (CEO) and Senior Vice President managers with experiences in the field of IT Outsourcing, BPM and BPO. The base value of 112 valid replies from a total of 51 different companies related to six different industries support the conclusions of the first survey (conducted in German and English languages).

The second survey took place after the development of the BPaaS Analysing Application in order to examine whether the recommendations and customer assessments are correct and useful to the customer. Therefore, customer get the invitation to use the BPaaS Analysing Application for free and to answer a short survey before, how the company of the subject would interact strategically and operationally in the field of BPO. Afterwards a comparison of both take place together with the company deputy to identify whether the application is going wrong ore provide advisable recommendations.

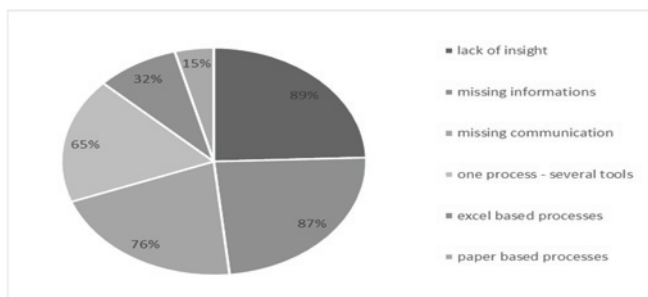
The survey and software application testing was done with the support of 27 companies in a range of 9 small, 9 medium-sized and 9 large companies in the classification of headcounts. Companies under 250 employees are classified as small ones; between 251 and 1000 as medium-sized and over 1000 as large companies. Finally, a document with cumulative results was created to show to the customers the differences between the self-assessment and the BPaaS Analysing Application.

3.3. Research results and debates

In the following, the results of the survey are presented and the resulting priorities for the developed model are shown. 400 managers from different companies were questioned. 112 answered the first survey to analyse the base data for the application. The survey shows, that 72% of the participants evaluate their process development skills as very good and only 28% as less good. However, 68% estimate their process transformations skills as less good than 23% as good. This shows that even though process development skills are more than sufficient, there is problem with their implementation. Compared to the Scheer Report of 2014, nearly the same values were elevated (Hoffmann, 2014). This outcome pointed at the complexity of BPM and shows the demand of process support like BPaaS and

the necessity to provide customers a helpful application in times of fast moving frameworks and conditions. The background of the lack of very good transformation skills is shown in Picture 6.

Picture 6: Reason for a lack of BPM



Source: own presentation.

Furthermore, 89% of the respondents have no insight of their own processes and 87% don't have information about process adaptations or process base data. Already at this point the demand for support of the customers in cases of process optimization and BPM can be observed. Very interesting are the answers of the 32% and 15% who responded, that they work with paper or Excel based processes. At the further investigation of these surveys it turns out that these were small companies with less than 3 locations and 50 employees. Furthermore, the buzzword agility has a significant value for the survey respondents. 79% want a possibility to adapt processes by nearly real-time to react to changes of the business environment and internal factors.

Thereby the time to market should be reduced, the quality increased and the collaboration with suppliers and partners should be more easy. Equally the SMAC trend is very important to the customers. Process performance data should be shared via mobile device to interact with the supplier or provide the customer further information about the parcel (e.g. hence generally interfaces should be provided by the BPaaS provider and the platform mentioned 61% of the respondents).

Based on the shown facts of the first survey, further relevant research results of the second and of the compared survey to the application are listed in the following.

- 95% of the respondents evaluate the BPaaS application as helpful to rethink in general the actual processes of the company by the questions in the application;
- 100% of the customer indicates that they want only one service provider and application for implementation and maintenance support of processes within a platform with general APIs;
- Derived from the one service provider and platform request, all respondents have the demand for five following key functionalities:
 - Process design, implementation, analyzing and monitoring component;
 - Connectivity to all systems, data with simple interfaces and one central data lake;
 - Workflow management and business rules and target management;
 - SMAC integration with a business intelligence module;
 - Mobile device usability to interact in real time and adapt processes;
- 85% of the customers evaluate the BPaaS analyzing application as independent, helpful and useful for the recommendation to use BPaaS solutions;
- Nearly the half of the respondents, 45% mentioned that the 5 questionnaire steps with maximum 150 questions are too comprehensive and thus 9 customers out of the 45% interrupted the questionnaire session.

3.4. Pre-Conclusion

Already in the year 2016 at an IT-Trends analyses of Capgemini there have been recognized the increasing flexibility and agility of core processes as a very important trend to be competitive in the market (Capgemini, 2016). For this reason, the BPaaS Analysing Application will help customers to identify if they are able to outsource their processes to a service provider without a lack of competences and to get more flexibility. According to the presented research results, 22 companies out of 27 evaluate the BPaaS Analysing Application as a very helpful software tool. Compared to a manual analysing process the customer gets the opportunity for a 24/7 analysis and recommendation if there are any essential base data modifications. Furthermore, the application provides a framework of questions and

touch points to potential customers to think about their future strategic company goals. By using this application customers will get well-grounded recommendations how to work with BPM and BPaaS for their company based on a wide range of customer experience.

4. CONCLUSION

BPaaS will help a company to be agile and flexible but process management has to be still done by the customer. A process-driven and holistic process view is not only necessary a reaction to increasing market competition and complexity, it also exposes optimization potentials that are not directly visible or apparent because of an extensive analysis via the integrated BPaaS platform module. Companies are looking for more service-oriented approaches in times of digitalization and similar products. The time to market and additional services are sales arguments to customers. To meet these named customer requirements a company has to be familiar and to go with the trends in times of digitalization.

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