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INTERNATIONAL BID PROCESS DEVELOPMENT IN THE CASE COMPANY

Degree Programme in Business Management and Entrepreneurship

2015

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Satakunnan ammattikorkeakoulu
Satakunta University of Applied Sciences

KANSAINVÄLISEN TARJOUSPROSESSIN KEHITTÄMINEN KOHDEYRITYKSESSÄ

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Satakunnan ammattikorkeakoulu
BME:n koulutusohjelma
Huhtikuu 2015
Ohjaaja: Lindström, Taina
Sivumäärä: 79
Liitteitä: 6

Avainsanat: Tarjousprosessi, Prosessin kehittäminen, Six Sigma, DMAIC, Benchmarkkaus

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Tämän tutkimuksen lähtökohtana oli huonosti toimiva kansainvälinen tarjousprosessi kohdeyrityksessä. Sekä tarjoustiimi että koko kohdeyritys olivat jo vuosien ajan kokeneet, että tarjousprosessi ei toimi halutulla tavalla. Olemassa olevaa tarjousprosessia ei ollut koskaan kuvattu, ja tarve sekä prosessikaavion että prosessikuvauksen rakentamiseen tunnistettiin. Lisäksi kohdeyrityksen johto tunnisti, että pärjätäkseen yhä koventuvassa kilpailussa tarjousprosessin kehitys oli ensiarvoisen tärkeää.

Kehitysprojekti lähti liikkeelle tutustumisella erilaisiin prosessinkehitysmalleihin, joista valittaisiin tämän kaltaiseen projektiin sopivan vaihtoehto. Valinta kohdistui malliin nimeltä Six Sigma ja se valittiin, koska se on osoittautunut erittäin menestyksekkääksi prosessinkehitysprojekteissa ja se tarjosi suuren valikoiman työkaluja, joista valita kussakin projektin vaiheessa.

Prosessinkehitysmallin valinnan jälkeen päätettiin suorittaa mielipidekysely tarjoustiimille, jotta saataisiin selkeä kuva tarjousprosessin nykytilasta sekä ehdotuksia prosessin kehittämiseen. Nykytilan kartoittamiseen käytettiin kvantitatiivisia kysymyksiä, jotta niistä saataisiin mitattavia arvoja, ja kehitysehdotuksia pyydettiin kvalitatiivisilla kysymyksillä. Otoksen suuruus oli 17 henkilöä ja heistä kyselyyn vastasi 14 henkilöä, joka vahvisti ajatusta siitä, että vastaajat kokivat tarjousprosessin kehityksen olevan tarpeellista ja he halusivat osallistua siihen omalla panoksellaan.

Seuraavaksi nykytilaa koskevat vastaukset analysoitiin käyttämällä eri Six Sigma työkaluja, jotta saataisiin selville tarjousprosessin Sigma-taso. Haluttu taso Six Sigmassa on 6, joka osoittaa yrityksen olevan kyseisellä osa-alueella maailmanluokan yritys. Kohdeyrityksen tarjousprosessin taso oli 2,256, joka uppoaa kategorioiden ”kilpailukyvytön” ja ”alan keskitaso” välille. Tämä perusteella pystyttiin toteamaan, että oletukset tarjousprosessin huonosta nykytilasta olivat oikeita ja kehittämistarve oli todellinen.

Nykytilan selvittyä kehitysideoita haettiin benchmarkkaamalla tarjousprosessia alan parhaisiin käytäntöihin. Perustuen benchmarkattuun prosessimalliin, kyselystä saatuihin kehitysehdotuksiin sekä tutkijan omaan kokemukseen luotiin ehdotukset uudesta prosessikaaviosta ja prosessimallista. Kehitetyn tarjousprosessin odotetaan säästävän kohdeyrityksen resursseja, parantavan tarjousprojektien hallintaa, tuottavan parempilaatuisia tarjouksia ja tärkeimpänä voittaa enemmän tarjouskilpailuja.

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Satakunta University of Applied Sciences
Degree Programme in Business Management and Entrepreneurship
Master of Business Administration
April 2015
Supervisor: Lindström, Taina
Number of pages: 79
Appendices: 6

Keywords: Bid Process, Process Development, Six Sigma, DMAIC, Benchmarking

This study derived from the malfunctioning international bid process in the case company. It had been a common perception within the bid team, and all around the case company, for years that the process was not functioning up to its full potential. The present process model had never been depicted and a valid need for both a process model and process description was detected. It had also been recognized by the case company's management that development was essential in order to manage in the ever-tightening competition.

The development project started with getting acquainted with different process development philosophies in order to determine the most suitable one for this kind of development project. Six Sigma was chosen as it had been proven to be very successful in process development projects and it had several tools to choose from for different phases of the project.

After having chosen the development philosophy, it was decided to carry out a mixed-method survey to the bid team in order to gain understanding on the present state of the bid process by using quantitative questions, and also to obtain ideas on development by using qualitative questions. The survey sample was 17 persons of which 14 answered the questionnaire which proved that there was a common need for development of the bid process and many wanted to contribute.

The survey results on the present state of the bid process were then analyzed with different Six Sigma tools in order to discover the overall Sigma level of the bid process. The sought level in Six Sigma is 6 which means that the company is classified as a world class company. The score was 2,256 which falls in between of categories of noncompetitive and industry average. Hence, the assumptions on the poor state of the bid process were accurate and the need for development was indeed valid.

Having unraveled the present state of the bid process, which was quite poor, development ideas were sought by benchmarking the bid process to best practices. Based on the benchmark, the development suggestions from the survey, and the experience of the researcher, suggestions for a new process model and process description were made. The developed process is expected to help the case company save resources, improve bid project management, generate bids of higher quality, and lastly and most importantly win more bid competitions.

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ABBREVIATIANS/TERMINOLOGY

As-Is	Current state of the bid process
Bid	The supplier's response to a customer's Request for Proposal (RFP)
CTQ	Critical To Quality
Defect	Anything outside of customer specifications
DMAIC	Six Sigma problem-solving process (define, measure, analyze, improve, and control)
DPMO	Defects per million opportunities
FMEA	Failure mode and effects analysis
ITIL	Information Technology Infrastructure Library
KAM	Key Account Management System
KPI	Key Performance Indicator
Opportunity	Lowest defect noticeable by a customer
RFI	Request for Information (same as draft RFP)
RFP	Request for Proposal (Request for Bid)
ROI	Return on Invest
Six Sigma	Philosophy for improving organizational performance
SLA	Service Lever Agreement
SME	Small to medium-sized enterprise
To-Be	Future state of the bid process

1 INTRODUCTION

There are several reasons for choosing international bid process development as the topic of this study, but a few stand out as key reasons. First, the importance of having a depicted and specified process; second, the current process is not functioning up to its full potential: it is consuming too much resources, process management is inadequate and the inner customer satisfaction is in a low level; and third, Finnish businesses are internationalizing now more than ever.

It is very important for a company to have all its processes depicted and the bid process is no different. According to Cleden (2010, 35) a well-designed bid process is a blueprint for success as it eliminates the element of chance and ensures that the right things are done at the right time as well as ensures quality and consistency. Cleden (2010, 41-42) suggests several benefits that can be gained from adapting a formal bid process; defined roles help the bit team members understand what is expected of them, planning becomes easier and more effective, time is saved by doing the right things at the right time, prioritization becomes easier, all the customer requirements are better taken into account and addressed, creativity is encouraged, and the success rate increases.

It is a common and much spoken fact that the bid team is not satisfied with the present state of the international bid process in the case company. It is recognized that the present practice is consuming too much resources, both people and time, and thereby eating away from the core business which is sales. It is also a common perception that management in the bid process is inadequate and it is often quite unclear to the bid team members what they are expected to do, how they are expected do it, and when they are expected to do it. These issues are in the very center of the bid process development as with these out of place the process cannot perform as desired.

So why address the international side of business? According to the website of Yrittäjät (2014) the Finnish SME's are internationalizing their business more than ever before; more than 10 percent of new organizations are planning on going abroad, and as many as approximately 25 % of existing businesses are considering to expand their business across borders. This is due to the fact that it usually also reinforces the activities in

Finland, and that SME owners are frustrated with Finland's heavy cost levels; especially the labour costs have developed unfavourably in the last years and thereby weakened the international competitiveness of Finnish businesses (Website of Yrittäjät 2014). This makes it altogether critical for the case company to develop its international bid process in order to manage in bid competitions with the scope of two or more countries.

2 BACKGROUND

2.1 Case Company

The case company in this study is a middle-sized ICT provider that functions in many different areas of ICT, both in the consumer side and business-to-business side of the market. The company has local operations all over Finland in many regional offices and also operations in the Baltic countries Estonia, Latvia and Lithuania. The company is a part of a global business chain and gets strong guidelines from its head-office in Europe.

The case company is a well-known and respected brand all over the world and it is known for high quality products and services. Customers are the number one priority of the case company and it places high emphasis on the quality of customer service by training and certifying its personnel, this way the customers are guaranteed to receive a standardized service level throughout the country. The quality of service is also improved on the basis of regularly arranged customer satisfaction surveys.

The case company is introduced in more detail in appendix 1 which is confidential.

2.2 Bid Process

A well thought out and managed bid process is a prerequisite for success. It ensures that the right things are done at the right time and ensures quality and consistency. A bid process should be treated like a project and planned and managed like any project.

Even though the bid process might seem quite simple, it is actually quite complex. Preparing a bid requires a considerable investment of the supplier as several people are involved; usually there is a bid manager to manage the bid process and he/she requires support from many people throughout the organization such as account managers who have profound knowledge of the customer and technical managers who have knowledge of the tasks within the implementation project. (Cleden 2010, 35; Turner 2000, 117-118.)

A bid process on the supplier's part starts with the customer publishing a Requests for Proposal (RFP). The RFP is usually published for all interested to see, or send to all potential suppliers, in order to encourage competition and provide the customer with several bids to select from. The RFP outlines the customer's needs concerning the bid; the requirements, criteria and instructions. (Website of Small Biz…)

The interested suppliers will then prepare a bid that includes descriptions of products and/or services they are offering, pricing, schedules, and their eligibility for the project. The supplier aims to demonstrate how their bid offers the best value for money and furthermore emphasize their advantage over competitors with qualifications, competencies and experience. A bid is a binding document based on which the customer determines whether to award the work or not. If awarded, the bid becomes a commitment on the supplier's part. (Cleden 2010, 4; Website of Small Biz…)

As to why bid in the first place, Nickson (2003, 2) gives a short yet an explicit answer: "to gain significant new business". If companies do not succeed in winning bid competitions their business will soon seize to be (Turner 2000, 117). Therefore bidding, and before all doing it *well*, is a prerequisite in managing in the ever-tightening competition.

3 PURPOSE AND OBJECTIVES OF THE STUDY

As there are challenges in the current international bid process in the case company the purpose is to discover the present state, and problem areas thereof, of the process, and to resolve how the process could be improved. The overall purpose of this study is to create an effective international bid process that is easy to implement and manage, and to gain a competitive advantage over the competitors.

In order to achieve the desired outcome stated above there are different actions to be taken. The objective is to discover the present state - the strengths, weaknesses, opportunities and threats - of the international bid process by conducting a survey to the bid team and to interpret the survey findings by utilizing an effective problem-solving philosophy called Six Sigma in order to achieve measurable results. Another objective is to resolve how the process could be improved by benchmarking it to best practices of bid process management and by utilizing the suggestions given by the survey respondents. The overall objective of this study is to produce a renewed process model and process description that better serve the purposes of the case company.

This study is built upon two main entities; the process development tool Six Sigma on which the entire development work is based, and Shipley Associates' Business Development Lifecycle which is used as a benchmark to best practices of bid process management. Six Sigma was chosen as the development philosophy in this study as it focuses on process improvement and there are several good references to be found on it, of which 9 are used in this study. The ones most commonly referenced in this study are the website of I Six Sigma (2014) and the website of Six Sigma Online (2014). These references together give a profound understanding of the subject of Six Sigma. The Shipley Associates' Business Development Lifecycle was chosen as the benchmark in this study because of their proven success in bid process development, and because the Business Development Lifecycle covers the bid process all the way from strategy development to bid preparation and contract execution. On Shipley Associates there are two references used in this study; the website of Shipley Associates (2014), and Newman's "Proposal Guide for Business Development Professionals" from 2003, which is also produced by the Shipley Associates.

The thesis statement in this study is as follows: the international bid process in the case company is not functioning up to its full potential and therefore needs to be developed and depicted in order to have an effective process that is easy to implement and manage, and to gain a competitive advantage over the competitors.

The main research question of this study is:
1. How to develop the international bid process in the case company?

The sub research questions are:
2. What is the present state of the international bid process in the case company?
3. What should the international bid process in the case company be like in order to achieve full potential and what needs to be done in order to get there?

The scope of this study is the international bid process in the case company. First it is important to clarify what is qualified as international business in the case company; international business is defined as any opportunity where the customer requires a contractual commitment from the case company to deliver products and / or services in more than one country. In this study the focus is on the bid competitions where the case company acts as a leading country - the country in charge of the customer, the bid and the contract, if awarded - and prepares the bid on behalf of every country in scope with guidance from the head office and possible help from other countries. The scope concerning the process itself covers the actions all the way from customer relationship management with the intention to influence the customer before the RFP comes out, to entering into the contract, if awarded.

The conceptual framework in this study is built upon Six Sigma. The study starts with defining the present state of the international bid process in the case company. After having unraveled the present state, a voice of the customer survey is being conducted in order to discover the problem areas of the current process model. Next the data driven from measure phase is being analyzed with the help of root cause analysis to discover the root causes of the problems. In the improve phase information on best practices of process management is being sought with the help of benchmarking and suggestions based on the discoveries are being made. Last the new process is being

controlled in order to ensure that it is functioning to its full potential and it is being improved continuously based on the findings.

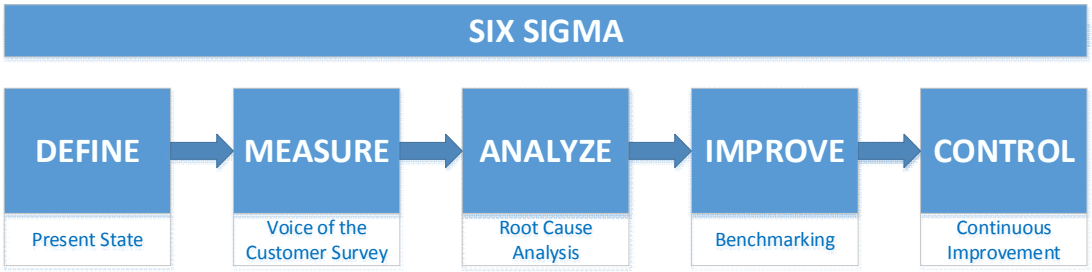

Figure 1. Conceptual Framework (adapted from website of Six Sigma)

4 RESEARCH METHODS

4.1 Mixed-Methods Research

The research method used in this study is a Mixed-methods research. It is less-known than the qualitative and quantitative traditions as it emerged only some 20 years ago and it has been defined as a type of research design in which qualitative and quantitative approaches are used in questions, research methods, data collection and analysis procedures (Teddlie & al 2009, 7).

The use of Mixed-methods research gives advantages over the use of only one method. The website of Mixed Research (2014) reports four of them; the research provides more comprehensive data, it includes more approaches than the use of only one method, it allows investigation of different types of questions in the same study, and it includes triangulation to enhance credibility of the findings. (Website of Mixed Research 2014.)

4.2 Mixed Methods Design

The first thing when planning the research is to identify which mixed methods design to use. According to Creswell & Plano Clark (2011, 54) the designs can be either fixed

and/or emergent; in the fixed mixed methods designs the use of quantitative and qualitative methods planned at the beginning of the research process, and the procedures are implemented as planned; and in the emergent mixed methods designs the use of mixed methods is decided after already having begun the research and having found that one method is not enough. The design used in this study is fixed mixed methods design as the use of both methods was decided straight in the beginning as it was thought to be the best approach.

The approach chosen to be used in this study was the typology-based approach as Creswell & Plano Clark (2011, 60) suggest it to be the best choice for those researchers that are new to designing and conducting mixed methods studies because these typologies provide a range of options that are well defined, facilitate the researcher's use of a solid approach for addressing the research problem, and help anticipate and resolve challenging issues. This approach was chosen over the other option, the dynamic approaches, which would tailor the taken approach according to their own needs.

The mixed methods design in this study was chosen by taking into account the interaction, priority, timing, and mixing of the quantitative and qualitative methods. In this study the interaction level between the methods is independent, the priority between the methods is equal, the timing is concurrent, and the mixing is done within a theoretical framework. The chosen design out of the six given options was the convergent parallel design. According to Creswell & Plano Clark (2011, 70-71) the convergent design occurs when the collection and analysis of both data is done during the same phase of the research process and then merged the results into an overall interpretation. Creswell & Plano Clark (2011, 77) state that the purpose of this design is "to obtain different but complementary data on the same topic" in order to understand the research problem. The convergent parallel design can be seen in the figure below.

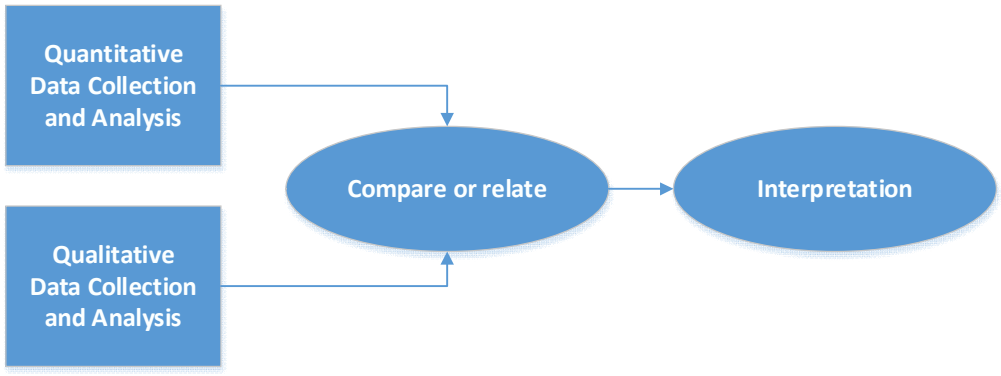

Figure 2. Convergent Parallel Design (Creswell & Plano Clark 2011, 69)

Creswell & Plano Clark (2011, 78) state that there are four major steps in the convergent design; first, both quantitative and qualitative data are being collected concurrently but so that one does not depend on the results of the other, and they have equal importance for addressing the study's research questions; second, the two data sets are analyzed separately and independently by using different procedures; third, the results of the two data sets are being merged; and fourth, it is interpreted and combined to create a better understanding in response to the study's overall purpose. The steps are being depicted in the flowchart below to give a clearer picture of the process flow.

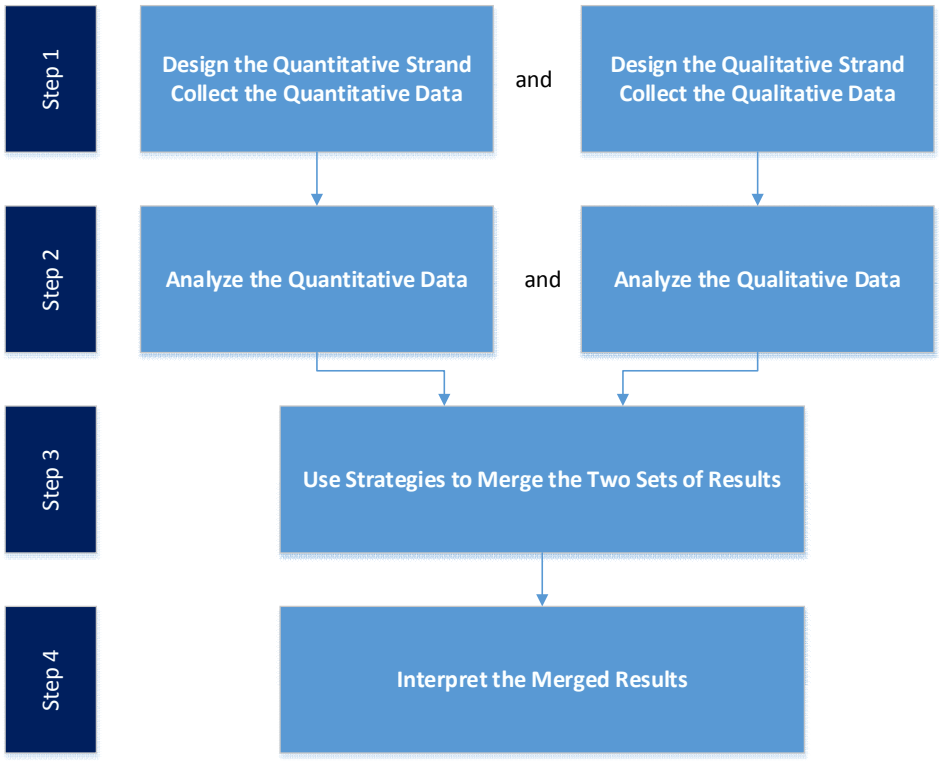

Figure 3. Flowchart on a Convergent Design (Creswell & Plano Clark 2011, 79)

4.3 Research Strategy

The collection of data in this study was planned carefully; the needed data, the means of analysis and the design of the questionnaire. All this was linked to the research questions and objectives.

The data in this study was collected by using a mixed methods survey and more precisely a questionnaire addressed to the bid team. The strategy was carefully considered and decided to be the best approach as the number of recipients would be too high i.e. for interviews; a sample of 17 persons, and because a comprehensive questionnaire would give good insight on the opinions of the bid team both on the present state of the process and development ideas for it.

The design of a questionnaire differs according to how much contact the researcher has with the respondents (Saunders & al 2006, 356-357). The types of questionnaires are being depicted in the figure below.

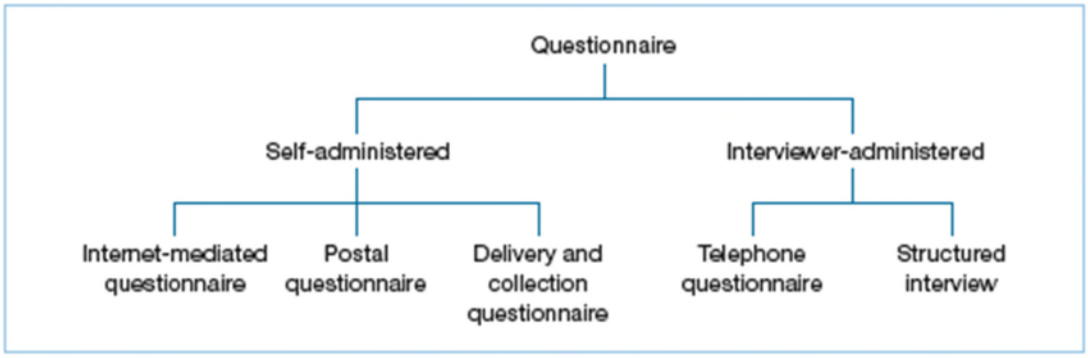

Figure 4. Types of Questionnaire (Saunders & al 2006, 357)

In this study a self-administered questionnaire sent to the recipients by email was used, hence it is a mail questionnaire. A self-administered mail questionnaire was chosen as the tool in this study because of the many advantages it brings. The website of Readex Research (2014) conveys some of them; respondents can answer at their own pace; there is no need for interview appointments; respondents can respond from wherever, whenever; interviewer cannot influence the responses; and it is economical. As a negative factor Saunders & al (2006, 359) give that self-administered questionnaires usu-

ally have a lower response rate than interviewer-administered ones. In this study, however, the response rate was quite good as the bid team is very interested in having the bid process developed and want to give their input on it.

4.3.1 Questionnaire Design

The collected data in this study relates both to the problem statement and what the customer considers to be critical to quality. This data was used both as baseline data for development and to calculate the current state process sigma, and the data was then graphed to have a visual representation of the data.

According to Marsden & al (2010, 266) one of the first decisions to be made when designing a survey question is whether to make it open or closed. In this study both types of questions are being used; open questions which are qualitative and closed questions which are quantitative.

The questionnaire was constructed within the principles of ITIL, The Information Technology Infrastructure Library, hence the division into Discover, Design, Transition & Implement, Support & Manage; and Review phases. ITIL was selected as the basis to construction of the questionnaire as it is the basis of all the case company's business, and it is a known and familiar standard to the recipients.

The questionnaire was divided into two separate areas; the present state and the development proposal. First the opinions on the present state of the process were inquired by using quantitative questions and straight afterwards development proposals on the same question/area were asked by using qualitative questions. This way the respondents' point of view on both questions was obtained; how they see things being now, and how things could be developed.

Quantitative questions

The aim of the quantitative questions in this study was to reveal the respondent's opinions on the present state of the international bid process. The questions were closed-ended with one option to choose from, and the rating was done in a Likert scale. The

Likert scale is a good example of organizing and analyzing survey data to generate objective results, it is a metric used to measure customers' attitude or preferences about a product or service (Bass & Lawton 2009, 20). In many survey related studies the wanted level is said to have been achieved or exceeded if its average score is greater than or equal to 5 when the survey is conducted using a Likert scale of 1 to 10 (1 being not satisfied and 10 being extremely satisfied). (Website of I Six Sigma 2014)

The scale of the Likert scale in this study was from 1 to 5. There were two different answer options in different questions, from very bad to excellent, and from very hard & unclear to very easy & clear. See the used Likert scales below.

Excellent (5)	Good (4)	Neutral (3)	Bad (2)	Very bad (1)

Very easy & clear (5)	Easy & clear (4)	Neutral (3)	Hard & un-clear (2)	Very hard & unclear (1)

Qualitative questions

The aim of the qualitative open-ended questions in this study was to reveal the respondents' ideas on development in each area. The qualitative questions followed the quantitative ones in each question area; first the opinions on the present state of the process were inquired by using quantitative questions and straight afterwards development proposals on the same question/area were asked by using qualitative questions. See an example below.

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a. Quantitative question: How well do we know the customer's purchase process?

Excellent (5)	Good (4)	Neutral (3)	Bad (2)	Very bad (1)

b. Qualitative question: Development proposal(s) on knowing the customer's purchase process:

4.3.2 Analyzing the Data

The analysis on quantitative and qualitative data in this study had to be done separately as they cannot be analyzed with the same tools.

Quantitative Analysis

The sample in this study was quite small, 17 persons of which 14 replied, which made it possible to analyze and calculate the findings in a simple way with no other electronic tools than Microsoft Excel so no use of data entry software was needed. The statistical analysis on the quantitative results of this study was conducted by using a mean. The mean takes into account the values of each case in a distribution - it is a weighted average which in algebraic notation has an equation of $X=\Sigma x_i /N$ (Schutt 2014, 165). After reviewing the results it was decided that there was no need for the use of standard deviation as the results were very much in line.

Qualitative Analysis

The analysis of qualitative data is harder than that of quantitative data, it requires creativity, discipline and a systematic approach and there is no single or best way (Taylor-Powell & al 2003, 1). The technique used in this study to analyze qualitative data was data narration and it was done according to the process described by Taylor-Powell & al (2003, 2-5) who divide the narration process into five steps; get to know your data, focus the analysis, categorize information, identify patterns and connections between categories, and interpretation - bringing it all together.

4.3.3 Validity of Data

There are errors practically in every survey measurement, but they can be minimized by taking into account the following factors; questions asked are relevant and formulated so that respondents understand what is requested, respondents have access to that information, they can retrieve the information from memory, they are motivated to report the information accurately, and the response categories allow them to communicate this information (Marsden & al 2010, 406). The questionnaire and the questions

in this study have been formulated in a manner where all the above-mentioned factors have been taken into account in order to have as valid results as possible.

5 THEORETICAL FRAMEWORK - SIX SIGMA AS A DEVELOPMENT PHILOSOPHY

The philosophy used in this study to develop the international bid process in the case company is Six Sigma and it was chosen because it has been proven to be very successful in process development and improvement. As Gygi & al (2005, 1) well describe it; Six Sigma is the most effective problem-solving philosophy for improving organizational performance.

5.1 Background

Six Sigma was invented by Motorola in the 1980s and it was designed to reduce manufacturing defects into less than 3.4 defects per million opportunities saving millions of dollars in the process. Hundreds of companies have adopted Six Sigma as a way of doing business and it can be seen as “a vision, a philosophy, a symbol, a metric, a goal, and a methodology”. (Website of Six Sigma Online 2014; Website of I Six Sigma 2014.)

The Six Sigma methodology creates improvements by managing variation and reducing deficits in the processes. There are two scenarios used in Six Sigma; DMAIC and DFSS. The first one stands for define, measure, analyze, improve, and control and these elements focus on significant process improvements. The second, design for six sigma, focuses on process design and utilizes IDOV: identify, design, optimize, and verify. (Website of I Six Sigma 2014.) The approach used in this study is DMAIC as it is suitable for developing and improving existing processes, and the purpose of the approach as well as the before-mentioned steps - define, measure, analyze, improve, and control - are being described and analyzed more closely in the following chapters.

5.2 DMAIC Approach

DMAIC is a classic Six Sigma problem-solving process in which variation is the enemy, and it is often called the process improvement methodology which suits the purposes of this study very well. DMAIC identifies key requirements, deliverables, tasks, and standard tools to be used when tackling a problem and it resolves issues of defects, deviation from a target, excess cost or time, and deterioration. It offers improvements to productivity (how many), financial (how much money), quality (how well) and time (how fast) - PFQT. DMAIC has three main principles; it is results-focused, driven by data, facts, and metrics; the work is project-based and project-structured; and it combines tools, tasks and deliverables that vary in each step of the method. The steps are usually sequential but some activities may occur concurrently or may be iterative, and in order to gain gate review approval the deliverables of each step must be completed. (Hambleton 2008, 13-15.) The five steps of DMAIC are being described in more detail in the following chapters.

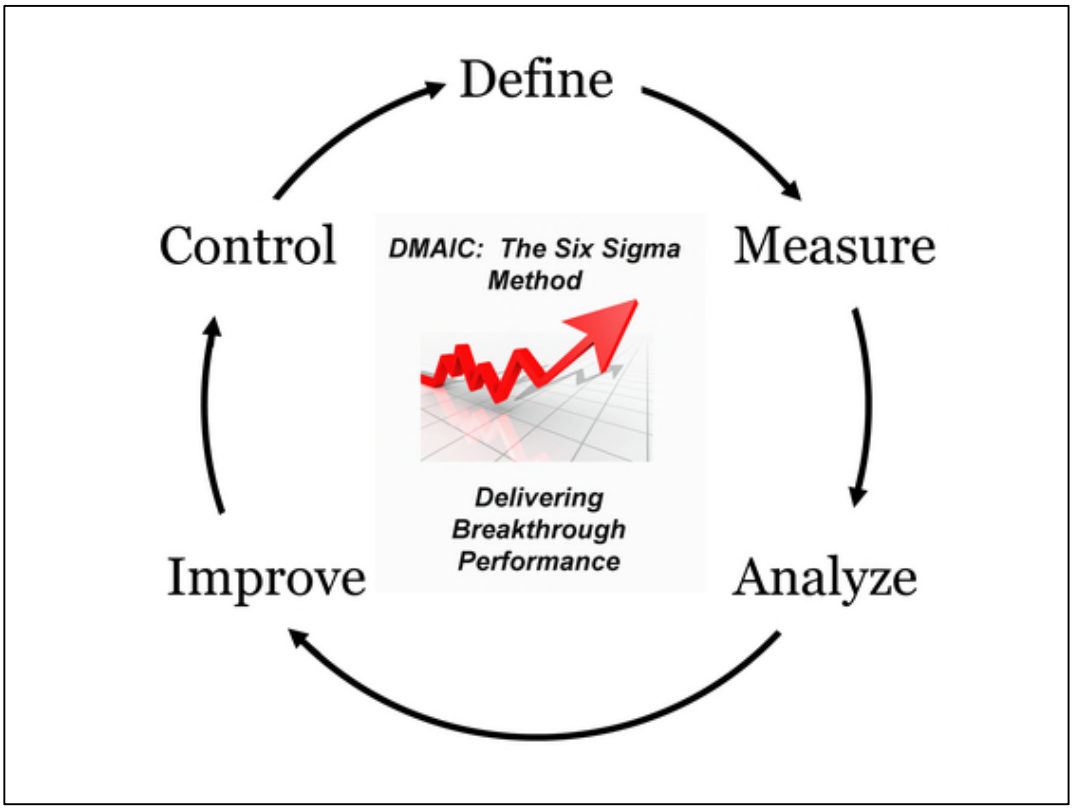

Figure 5. DMAIC Five-Step Approach (Website of DMAIC Tools 2014)

Define Phase

The purpose of the define phase is to define the problem and scope of the work, hence identify the customer(s) and project goals. The problems have an unlimited scope and scale, from different employee problems to issues with the production or marketing etc. and regardless of problem type the approach should always be systemic, part of an existing process where the problem occurs more than once or twice. (Hambleton 2008, 15.)

Measure Phase

The purpose of the Measure phase is to gather baseline information about the process in need of development. This information is used to clarify what happens in the process, what are the customer expectations, and where the problems are. The data collection is performed in a passive manner using historical data. In this phase the researcher should measure the current performance, identify what data is available and from what source, develop a plan to gather the data, then gather the data and summarize it; all this by the help of graphical tools. Four things in the measure phase need completion; understanding the activities in the process by creating a process map of the current state, understanding where the risk are by using failure mode and effects analysis (FMEA), determining how well the process meets customer expectations by calculating process capability, and assessing the measurement system to ensure that reported data is accurate and there is no inherent variation. (Shankar 2009, 11; Hambleton 2008, 15.)

Analyze Phase

According to Carroll (2013, 153) we are now in the middle of define, measure, analyze, improve, and control (DMAIC). The purpose of the analyze phase is to evaluate and reduce variables with the help of graphical analysis and hypothesis testing, and to identify the vital few factors in order to find the root cause(s) of the defects. The issues affecting the CTQ's (Critical to Quality) are examined and it is decided which X's are the vital few that are then controlled in order to gain improvement in the Y's. Statistics are used to analyze what has been measured, sampling is done to confirm the analyses,

and then both continuous and discrete short-term and long-term Zs are being examined. Carroll (2013, 153) defines three analyze steps: “1. Establishing target process capability (what it can do), 2. Establishing a process and project objective (what we intend to make it do), and 3. Identify specific sources of variations to address”. (Brue 2006, 201; Carroll 2013, 153.)

Improve Phase

The purpose of the improve phase is to get rid of the problem or minimize it’s affects by selecting a solution, based on the identified root cause(s) an improvement is addressed to each of them. The improvement solutions could be found by the help of brainstorming, and they should then be prioritized based on customer requirements. Last a selection is made and tested to see if the solution actually resolves the problem. (Hambleton 2008, 15.)

Control Phase

In the last phase the improved process or product is controlled to ensure that the target(s) are met, and once the solution has resolved the problem the improvements are to be standardized and sustained over time. In addition a control plan should be done to monitor the performance. After these actions have been taken the project is closed and the improvements are taken into action in the process. (Hambleton 2008, 15.)

5.3 Process Development Tools

There are several various tools to be used in process development and quite many are used in this study, all with the help of Six Sigma’s DMAIC principles. The tools used are being introduced in the chapters below.

SIPOC Diagram

According to Shankar the next step after having selected a problem for development is to determine the problem scope. It can be depicted with the help of SIPOC which stands for supplier, input, process, output, and customer, and gives a high-level view

of the process. A SIPOC is depicted from start to finish and every process starts with Suppliers, who provide Inputs to the Process, which results in an Output that is delivered to Customers. (Shankar 2009, 3; Website of Go Lean… 2014.) See an example of a SIPOC Diagram in figure below.

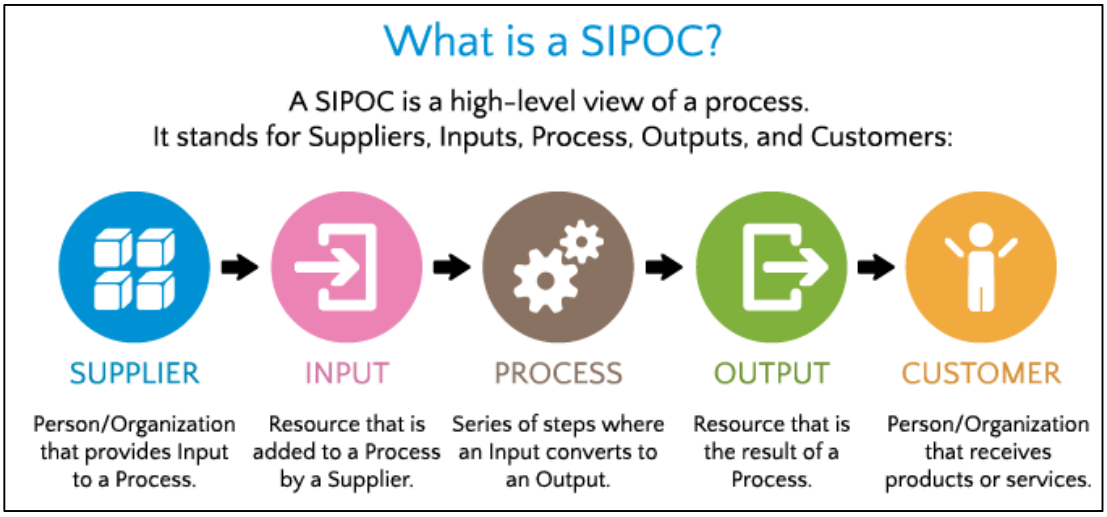

Figure 6. SIPOC Diagram (Website of Go Lean… 2014)

Process Map and Process Flowchart

Even though advanced methodologies, such as Six Sigma, are good to be used in development operations, their time is not in the very beginning but the foundation needs to be set first. A Process map should be the first thing to do when aiming to process improvements, it would shows how where improvements can be made. The flowchart can be used to *create* a procedure and it shows more details and decision points in the process than the SIPOC. (Website of I Six Sigma 2014; Shankar 2009, 12.)

Voice of the Customer Gathering

All production processes aim at satisfying customers and their needs and any process development should start with capturing the voice of the customer in order to know what they expect of the process. There are many different techniques to capture the voice of the customer; surveys, customer service data collection, interviews, and focus groups are among these tools. (Bass & Lawton 2009, 17-18.) The technique used in this study is a survey, more precisely a mixed-methods questionnaire, sent to the bid team.

The first thing to determine in capturing the voice of the customer is who the customer is and they can be divided in two groups, internal or external. Internal customers are the ones who know the process best. (Bass & Lawton 2009, 18-19.) This study concentrates on the internal customers; the bid team, as they are the ones who know the process – its strengths and weaknesses – the best.

Process Sigma and Weighted DPMO

When using Six Sigma the goal for an organization is to reach a sigma level of six, or the objective of 3.4 defects per million opportunities (DPMO), such an organization is described as being world class (Website of I Six Sigma 2014).

Website of I Six Sigma (2014) defines a five-step process to calculate the process sigma:

Step 1: Define the Opportunities - an opportunity is the lowest defect noticeable by a customer.
Step 2: Define the Defects - a Six Sigma defect is defined as anything outside of customer specifications.
Step 3: Measure the Opportunities and Defects - the tools used in measurement in this study are Defects Per Million Opportunities (DPMO) and Failure Mode and Effects Analysis (FMEA). The first one is the method used for measuring results as we proceed through a project, and the second one refers to preventing defects before they occur (Website of Tutorials… 2014).
Step 4: Calculate the Yield - the process yield is calculated by subtracting the number of defects from the number of opportunities, dividing by the number of opportunities, and finally multiplying the result by 100.
(Step 5: Look Up Process Sigma) - the final step is used to look up the sigma on a sigma conversion table, but only if the Six Sigma Process Sigma Calculator is not used. The fifth step is not used in this study as a Six Sigma Calculator is being used.
(Website of I Six Sigma 2014)

When doing a process sigma calculation it is necessary to take into account the assumptions that have been made. In the above steps, there have been the following assumptions made; “the standard sigma shift of 1.5 is appropriate, the data is normally distributed, and the process is stable. In addition, the calculations are made with using one-tail values of the normal distribution”. Eckes (2001, 101) advocates collecting continuous data for the following reasons: it tells the magnitude of variation in the process; it can tell what type of variation exists in the process; it results in less data to collect when we sample; and calculating sigma from discrete data, while valid, can be misleading in certain cases. (Website of I Six Sigma 2014; Eckes 2001 101.)

Organizations often have difficulty telling exactly what its sigma level is. This is due to the fact that some of its critical processes are more important to its operations than others. This problem can be tackled by weighting each of the critical processes; this method creates a link between each critical process and DPMO and reveals a weight-based sigma level. (Website of I Six Sigma 2014.)

Table 1. Organization Classification Using Sigma Level (Website of I Six Sigma 2014)

Sigma Level	DPMO	Category
6	3.4	World Class
5 4 3	230 6,200 67,000	Industry Average
2 1	310,000 700,000	Noncompetitive

Fishbone Diagram

An effective tool in a problem-solving process is the fishbone diagram by Karoru Ishikawa, this technique helps to visually display the potential causes for a specific problem. The constructing of a fishbone starts with stating the problem in the form of a question and each root cause idea should answer the question. The brainstorming team should agree on the problem statement and place this question in the “head” of the

fishbone. The rest of the fishbone then consists of “bones” that are labeled with different categories, coming out vertically from the main line drawn horizontally in the middle. (Website of I Six Sigma 2014.)

Root Cause Analysis

Six Sigma root cause analysis tool is all about locating and eliminating the root causes of the problem rather than finding quick-fix solutions. After the problem is identified, the root causes are sought and an understanding of the relationship with each other is acquired. This is usually conducted by collecting sample data and using the root cause analysis tool to find the main factors responsible for the defined problem. The aim is not only to solve the problem, but also ensure that the problem does not reoccur. Multiple solutions are usually suggested and their applicability tested, and from these the best solution is selected for final implementation. (Website of Six Sigma Online 2014.)

Pareto Principle

The Six Sigma team rarely attacks all of the root causes of a problem but it is better to focus on the most important ones to measure, analyze, improve and control. in Six Sigma cases Vilfredo Pareto’s 80/20 principle is often used; “20 percent of the causes are responsible for 80 percent of the effects”. Within the Pareto principle the team must recognize the “vital few” factors that make up most of the problems. Data is then used to create a graphic display of the causes in order of importance and tracks the cumulative effects. (Brue 2006, 148-149.)

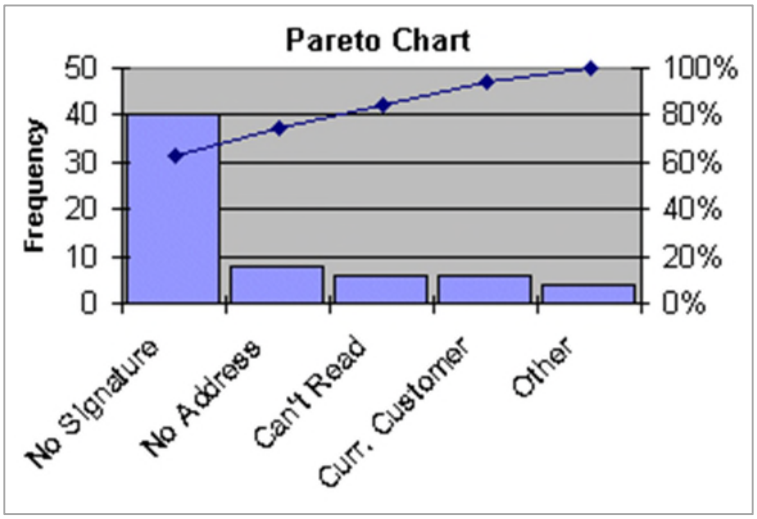

Chart 1. Example of a Pareto Chart (Website of I Six Sigma 2014)

Benchmarking

Benchmarking is a management tool for process improvement that is used in systematic measuring of organization's own products, services or processes against the ones that are recognized the best practitioners in the world. There the information collected from the company's own processes is analyzed against the best-in-class practices, which gives guidance on the actions the company could take to improve its performance. (Website of I Six Sigma 2014.)

Six Sigma Phases and Tools in a Nutshell

As it becomes clear from the sections above, there are many Six Sigma tools and methods used in this study. Therefore, it was decided to depict the phases, and tools used within them, phase by phase in order to make it easier to understand the entirety. The phases and tools can be seen in the figure below.

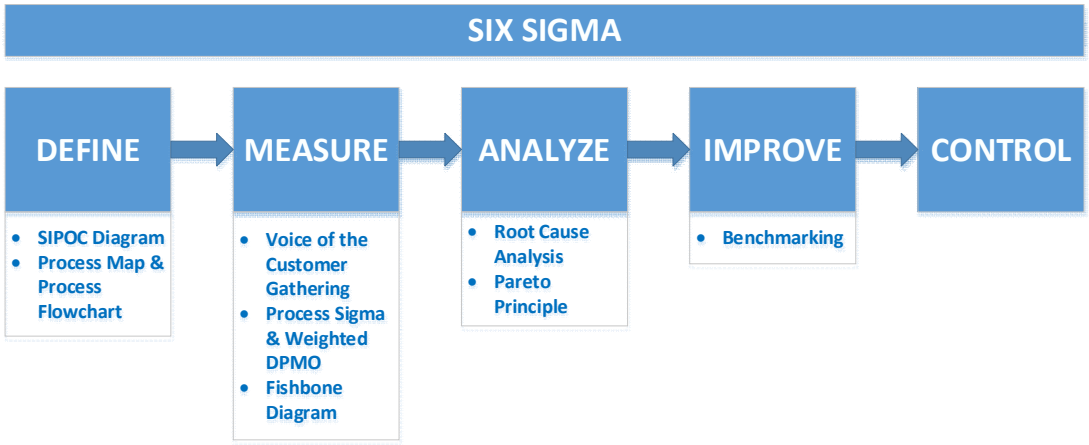

Figure 7. Six Sigma Phases and Tools (adapted from website of Six Sigma)

6 DEVELOPMENT PROCESS

6.1 Define Phase

The define phase concentrates on the purpose and scope of the study, and the present state of the international bid process in the case company; the as-is state. These matters will be addressed in the following chapters.

6.1.1 The Purpose and Scope of the Study

As already stated in the purpose and objectives section of this study, the purpose of this study is to discover the present state of the international bid process in the case company, and to resolve how the process could be improved. The overall purpose is to create an effective international bid process that is easy to implement and manage, and to gain a competitive advantage over the competitors. These goals are to be reached by conducting a survey to the bid team and by benchmarking to best practices, and finally by using these methods to produce a renewed process model and process description that better serve the purposes of the case company.

As stated in the introduction section of this study, the scope of this study is the international bid process in the case company, where there is more than one country in scope and the case company acts as a leading country. The scope concerning the process itself covers the actions all the way from customer relationship management before the RFP comes out, to entering into the contract if awarded. The scope of the study was depicted by using a SIPOC diagram which shows a high-level view of the international bid process in the case company.

Figure 8. The Scope of the Study

As can be seen in the figure above, the supplier of the input is the customer, the input to the process is the Request for Proposal (RFP), the name of the process is the international bid process, the output of the process is the bid, and the customer of the output is the customer who provided the case company with the RFAs it can be seen, the process comes a full circle as it starts and ends with the very same customer.

6.1.2 The As-Is International Bid Process

To clarify the case company's business and its processes, the core processes are illustrated in the process map below. The core processes of the case company are Direct

Sales, Re-sales, Retail Sales and Professional Sales and they are depicted in the figure below. The core process under examination in this study is the first one from the left; the Direct Sales business process which includes both national and international. In this study the focus is on the international side of the business.

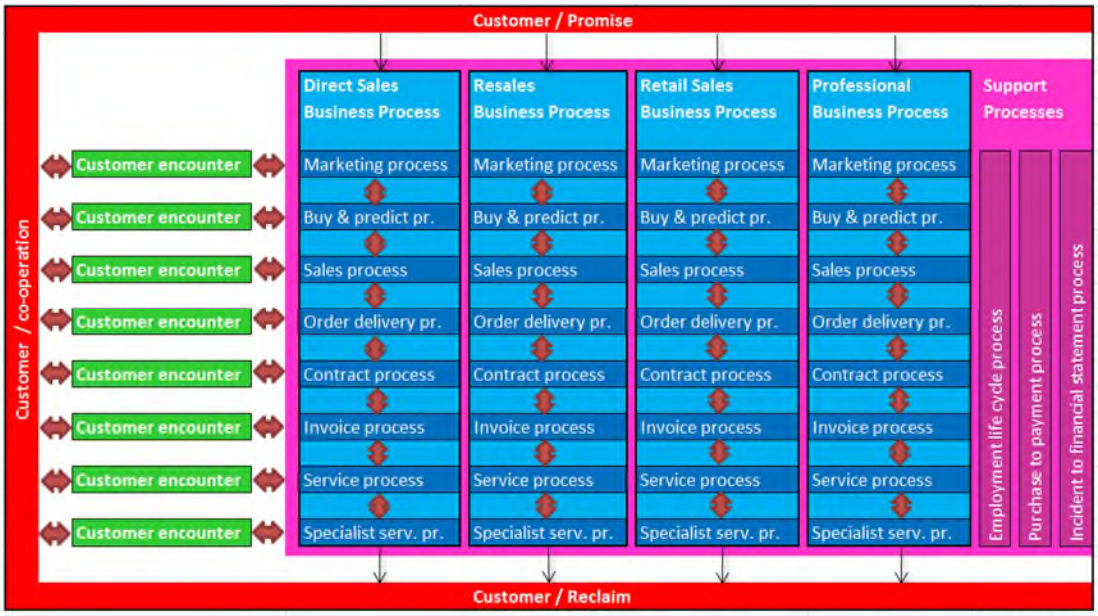

Figure 9. The Core Processes of the Case Company (adapted from Case Company's Core Processes).

The present state of the process is critical to determine before any development plans or attempts are being made. As there was no existing process model and description of the international bid process, or any bid process for that matter, in the case company, it had to be created from scratch based on the researcher's own experience. The as-is model can be seen below and can also be found in appendix 2.

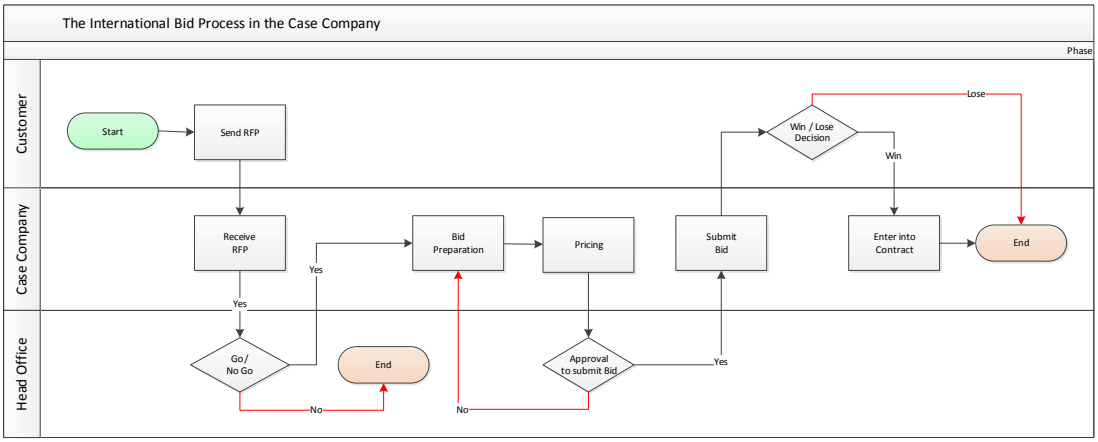

Figure 10. The As-Is International Bid Process

At present the international bid process in the case company starts with the customer sending an RFP to the case company. After arrival the RFP is sent to the head office for appraisal after which a decision on whether to proceed with the bid competition or not is made. If decided to continue, the bid is being prepared and pricing based on the offered solution is being done. After the bid and pricing are ready, the final bid documents are sent to the head office for approval. If they are not approved as they are, the bid preparations continue and the pricing is amended if necessary. When the final approval is received the bid is sent to the customer who will then decide who, if anyone, to choose as their supplier. If the case is won, the case company and the customer will enter into a contract which is the ultimate goal of the process.

6.2 Measure Phase

In the measure phase the present state of the international bid process in the case company is being analyzed. The measurement is based on the analyzed voice of the customer survey results and conducted by using Process Sigma Calculation and its tools.

6.2.1 Data Collection by Voice of the Customer Survey

The process development in this study starts with capturing the voice of the customer which in this case are internal customers; the bid team in the case company. They were chosen as the recipients of the survey as they know the present state of the process best, its strengths and its weaknesses, and how it could be developed. The technique used was a mixed methods survey sent to the recipients via email. The mixed questionnaire was chosen over the qualitative and quantitative ones as the present state of the process would be easier to investigate and analyze by using quantitative questions, and the development part would better be resolved by using qualitative questions. The principles and results of the survey are being explained in the following chapters.

The questionnaire was constructed within the principles of ITIL, The Information Technology Infrastructure Library, hence the division into Discover, Design, Transition & Implement, Support & Manage, and Review phases. ITIL is a set of IT service management practices that aligns IT services with the needs of business and is used to

demonstrate compliance and to measure improvement (Website of ITIL 2014). ITIL was selected as it is the basis of all the case company's business, and as it is a familiar standard to the survey recipients.

The questionnaire was divided into two separate areas; the present state and the development proposal. First the opinions on the present state of the international bid process were inquired by using quantitative questions and straight afterwards development proposals on the same question/area were asked by using qualitative questions. This way the respondents' point of view on both questions was obtained; how they see things being now, and how things could be developed in their opinion.

The questionnaire was addressed to sales, sales management, and constituencies involved in the process, which are: finance, marketing, services and managed services. The number of recipients was 17 persons. The response percentage was expected to be good since the development of the process is a common concern throughout the sales and constituencies.

The aim of the survey was to find out how the respondents experience the present state of the international bid process being at present, and to have them propose how the process could be developed. Based on the findings of this study the case company can start developing its international bid process and consequently win more bid competitions, get better cross profits, as well as improve inner and outer customer satisfaction.

The questionnaire can be found in appendix 3.

6.2.2 Voice of Customer Survey Results

The voice of the customer survey was sent to 17 recipients. The response percentage was very good as expected, 14 out of 17 recipients answered the questionnaire, and only three persons from the services department did not answer. This proves that there is a common need for development of the process and everyone wants to contribute. The division on the respondents can be seen in the figure below.

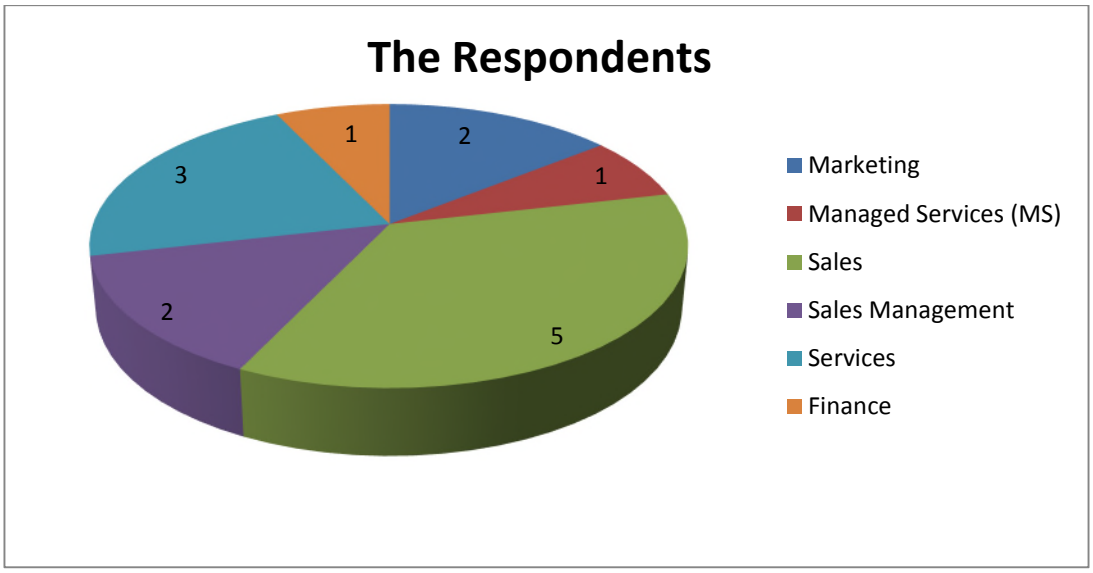

Figure 11. Survey Respondents

The findings recovered from the survey were presented by utilizing the ITIL sphere which is divided into Discover, Design, Transition & Implement, Support & Manage and Review phases. Each chapter is divided into the present state and the development proposals. The present state is disclosed in figures in a scale from 1 – 5, 1 being either "bad" or "very hard & unclear", and 5 being either "excellent" or "very easy & clear", and the development proposals in a text form.

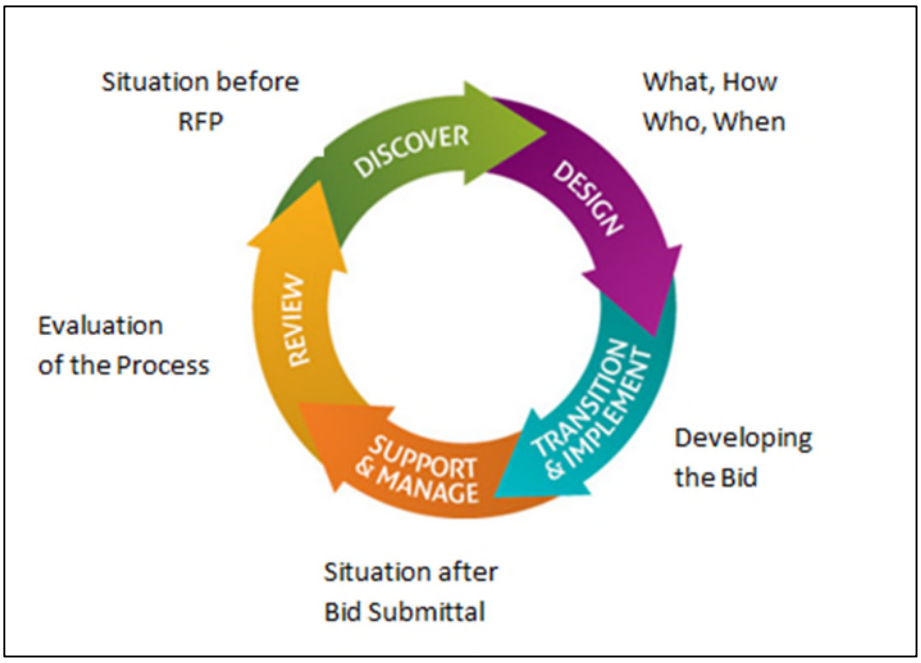

Figure 12. ITIL Sphere on the International Bid Process (adapted from Case Company's ITIL Sphere)

The individual results on every question can be seen in appendix 4 which is confidential. In the appendix all the questions are opened both on the present state and the development proposals. In this report only the high level results are revealed as well as conclusions and key development proposals drawn from these results. The high level results are stated in the following chapters.

Conclusions on the Voice of the Customer Survey

When comparing the survey results between ITIL phases it can be seen that the Transition & Implement phase received the best evaluations by far, the average on this phase was 3,42. The worst evaluations were clearly given for the Discovery phase where the average was only 3,08. The ones in between; Design phase and Support & Manage phase were quite even with the results of 3,22 and 3,29. The overall process average in the Review phase was 3,14.

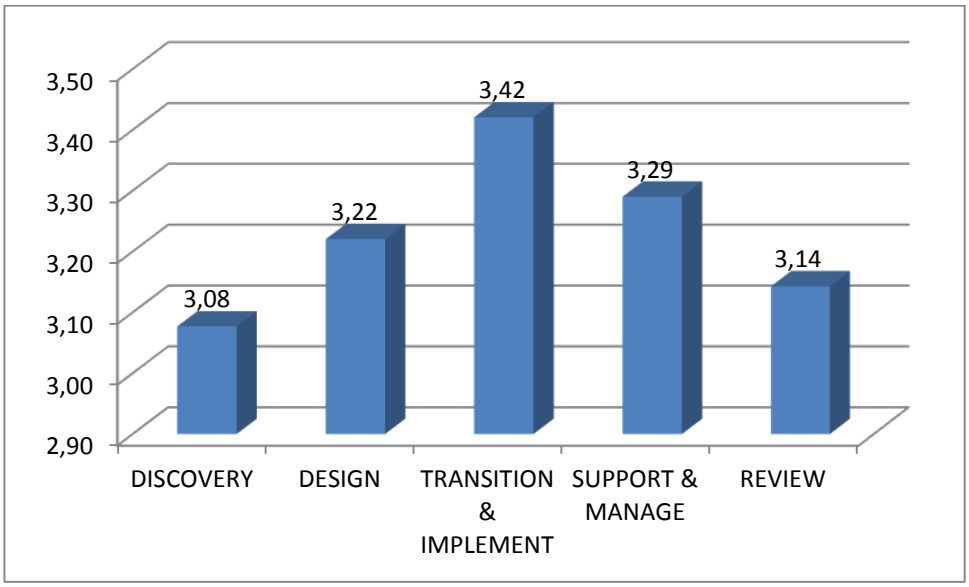

Chart 2. Survey Results by ITIL Phase

From these results it can be concluded that the respondents felt most comfortable with the development of the actual bid, and that influencing the situation before the RFP comes out was seen as hard and unfamiliar.

The best evaluations on specific areas were given to identifying the offering, defining and constructing the layout, defining the structure of the bid, and the expectations towards participants. All the above mentioned received an average of over 3,5, one even

a full 4. These areas are on a moderately good level and they need to be maintained and even developed further.

The worst averages on specific areas were given to knowing the customer's purchase process, acknowledging the Win Themes, the internal timelines of the process, bearing responsibilities, and information on ROI calculations. All the above mentioned had an average under 3,1 and the information on ROI calculations only had an average of 2,54 which is disappointingly low. These areas have to have a keen focus on in order to enhance them.

Key Development Proposals

There were several good suggestions made by the respondents in each phase, but there were a few main subjects that stood out in many of them.

The thing that stood out the most was the need for a bid manager / project manager, who would manage the project; timetables, resources, division of responsibilities, and in addition see to it that everything gets done as agreed.

Another thing mentioned many times was that the use of the key account management system (KAM) and the tools used in implementing it, such as Miller & Heiman's strategic customer analysis tool Gold Sheet and project analysis tool Blue Sheet, should be enhanced. The respondents also felt it to be important that the sales person should establish relationships with many, at least 6 – 9, decision-makers and power players in order to be able to influence the contents of RFP. Most of the respondents also thought that the work focusing on influencing the RFP should start no later than 18 – 24 months before there is even a promise of an up-coming RFP.

Many respondents thought that the services department, and other regular participants of the process, should have the bid process support in their job description and provision matrix. This would encourage them to work for the common goal and be more committed.

It was suggested that more training on different areas is needed, for example, key account management system implementation, question techniques, products, services & solutions, creation of materials and text etc.

Many respondents suggested that there should be a centralized place where all the bid related documentation was stored, a so called “material bank”. This bank could be, for example, in some web application and in addition to finding the needed materials it would help in document management and versioning.

Many experienced that there should be standard roles at use and the responsibilities should be clarified and opened. In addition it would be good to have a so called manager for each area, who could make sure that the tasks and responsibilities in the area in question were fulfilled.

6.2.3 Measuring the Data

At this stage the quantitative data gathered from the survey is being measured by using the by using Process Sigma Calculation and its tools Defects per Million Opportunities (DPMO) and Failure Mode and Effects Analysis (FMEA). The first one is the beginning point that enables the location of the cause and effect, and seeking of the defect point so that the procedure can be developed, and the second one refers to preventing defects before they occur (Website of Tutorials… 2014).

After careful evaluation of the individual areas of the survey it was decided that only the first three phases; Discovery, Design and Transition & Implement would be investigated in more detail. The reasoning behind this choice was that Support & Manage and Review phases had only one question each, and are, therefore, not measurable in a reliable manner. Hence, Discovery, Design and Transition & Implement phases are the three main categories measured and analyzed in this study. The main categories were depicted with the cause and effect diagram, also called a fishbone diagram.

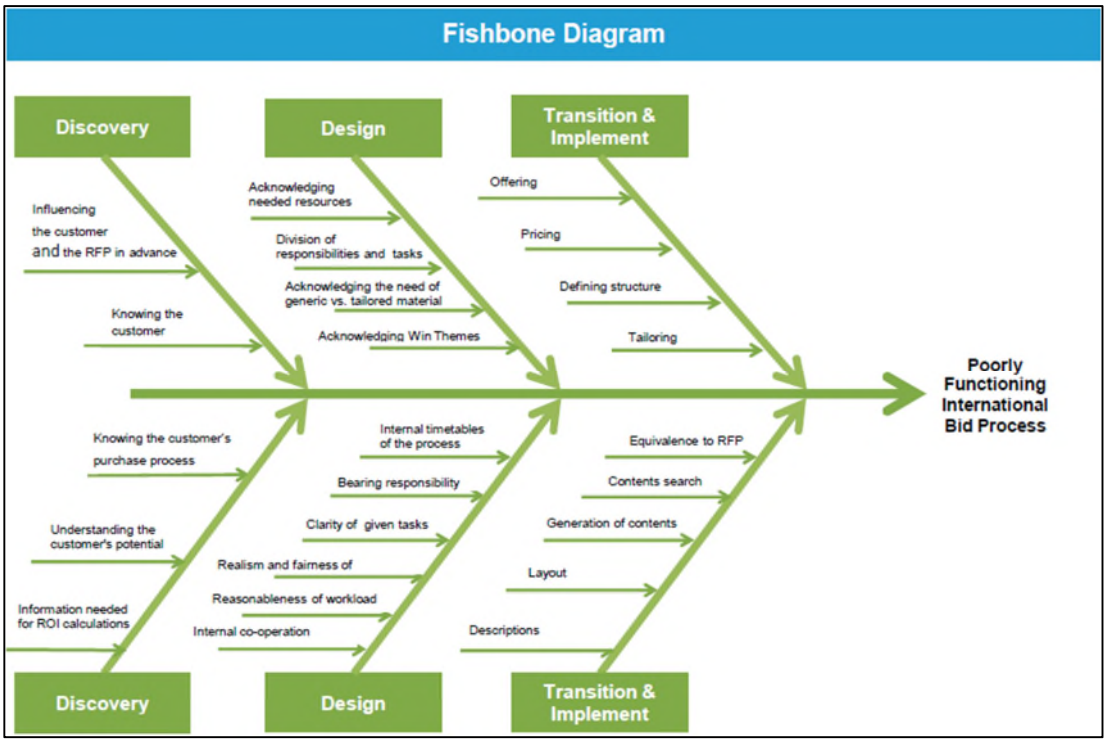

Figure 13. Fishbone Diagram on the Main Categories

There are three different main categories, or dimensions, in calculating the sigma in the international bid process of the case company. The three dimensions – Discovery, Design and Transition & Implement - concern the input of the process, the process itself and the output of the process, and they are based on the survey results, hence they are the opinions of the participants. The calculation starts with defining three items that are being measured; unit, defect and opportunity, where number of defects is total number of defects found, number of units is the number of units produced or being serviced, and number of opportunities is the number of ways to generate defects. In these dimensions the number of units is either 13 or 14 as there were 13 to 14 respondents in the survey, depending on the phase. The number of opportunities varies in each dimension as there is a different number of ways to generate defects in them, in other words a different number of questions per each dimension in the survey. An opportunity is defined to be a defect when the score is lower than the average which is 3 in a Likert scale; hence a defect is the score of 1 and the score of 2.

1. Discovery Phase

The first dimension, Discovery phase, has five opportunities under it; influencing the customer and the RFP in advance, knowing the customer, knowing the customer's purchase process, understanding the customer's potential, and information needed for ROI calculations.

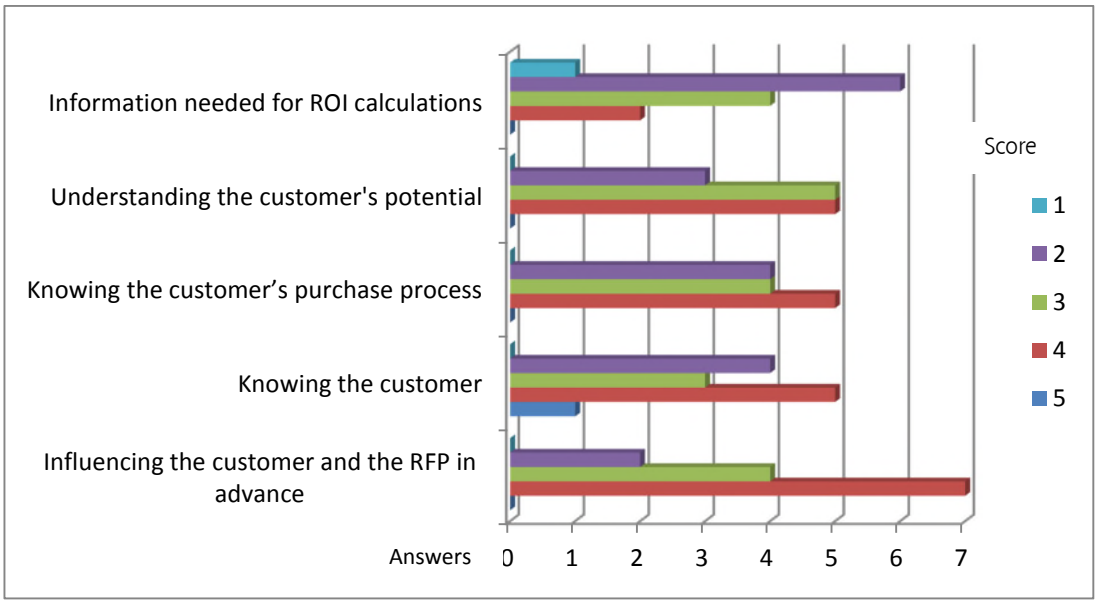

Chart 3. Discovery Phase Survey Results

Based on the survey results above the DPMO and FMEA for the dimension "Discovery phase" were being calculated below.

DPMO:

Unit	Number of respondents	13
Defect	Scores of 1 and 2	20
Opportunity	Number of questions	5

$$\frac{20}{13 \times 5} \times 1{,}000{,}000 = 307692{,}31$$

FMEA:

Failure Rate	0,3077
Accuracy Rate	0,6923
Sigma Level	0,5024
Long Term Sigma Level	**2,0024**

2. Design Phase

There are quite many opportunities under the second dimension, Design phase, but they are all required in order to have a clear image of the condition of this dimension. The ten opportunities are; acknowledging needed resources, division of responsibilities and tasks, acknowledging the need of generic vs. tailored material, acknowledging Win Themes, internal timetables of the process, bearing responsibility, clarity of given tasks, realism and fairness of expectations aimed towards participants, reasonableness of workload, and internal co-operation.

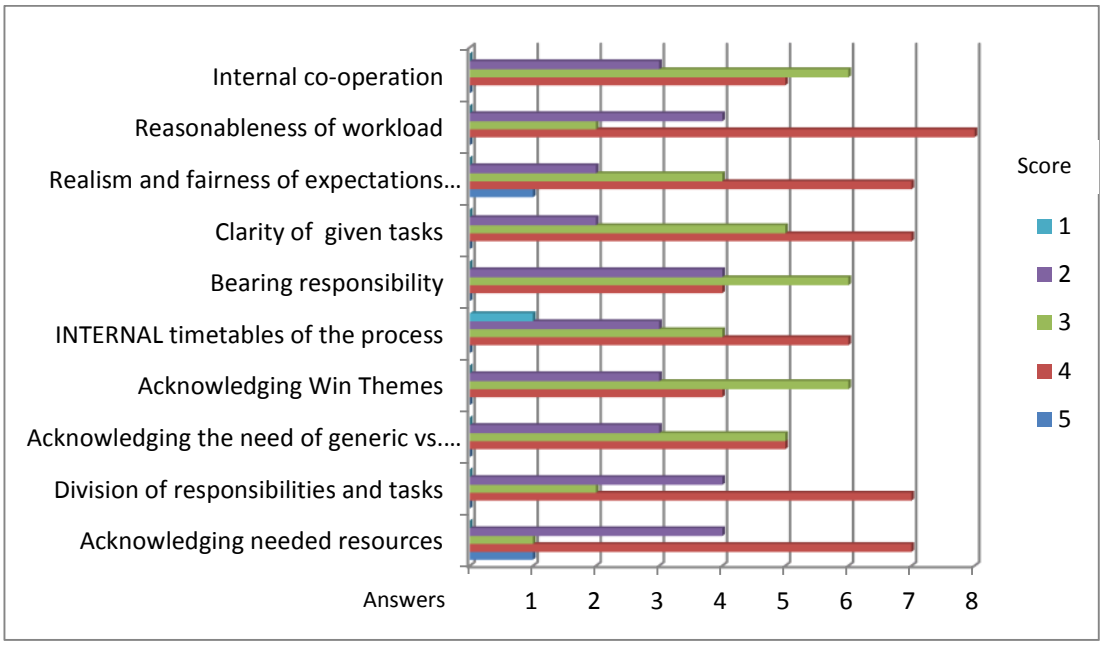

Chart 4. Design Phase Survey Results

Based on the survey results above the DPMO and FMEA for the dimension “Design phase” were being calculated below.

DPMO:

Unit	Number of respondents	13
Defect	Scores of 1 and 2	33
Opportunity	Number of questions	10

$$\frac{33}{13 \times 10} \times 1{,}000{,}000 = 253846{,}15$$

FMEA:

Failure Rate	0,2538
Accuracy Rate	0,7462
Sigma Level	0,6624
Long Term Sigma Level	**2,1624**

3. Transition & Implement Phase

The third dimension, Transition & Implement phase, also has quite a lot of opportunities under it, nine of them; offering, pricing, defining structure, tailoring, equivalence to RFP, contents search, generation of contents, layout, and descriptions.

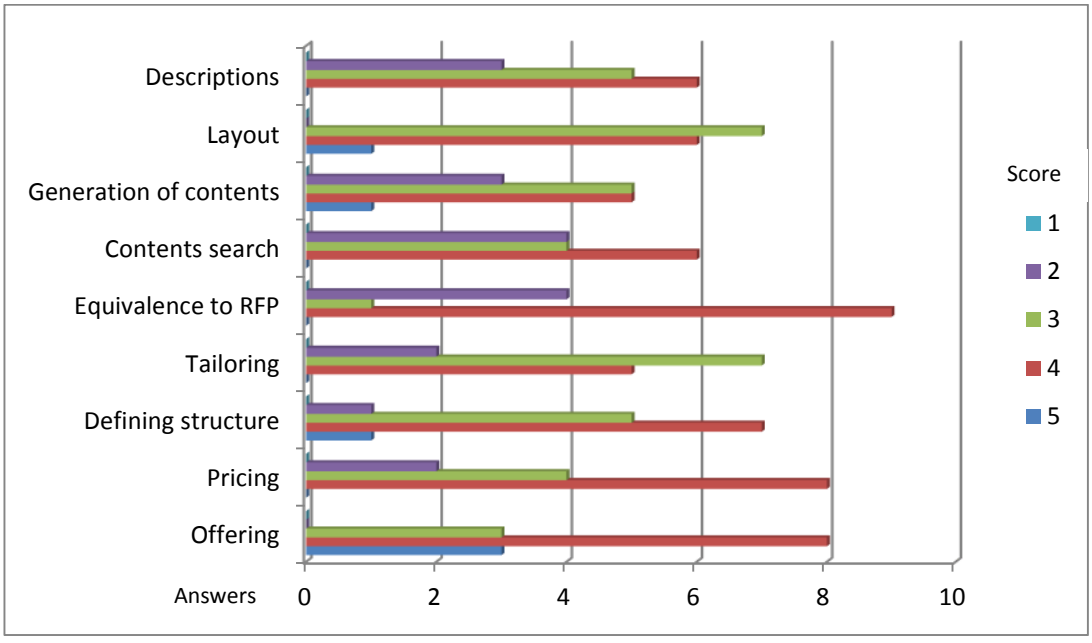

Chart 5. Transition & Implement Phase Survey Results

Based on the survey results above the DPMO and FMEA for the dimension “Transition & Implement phase” were being calculated below.

DPMO:

Unit	Number of respondents	14
Defect	Scores of 1 and 2	19
Opportunity	Number of questions	9

$$\frac{19}{14 \times 9} \times 1{,}000{,}000 = 150793{,}66$$

FMEA:

Failure Rate	0,1508
Accuracy Rate	0,8492
Sigma Level	1,0330
Long Term Sigma Level	**2,5330**

4. Calculating the Overall Sigma Level

After having measured the individual main categories – Discovery phase, Design phase, and Transition & Implement phase – the overall Sigma level was be calculated by using Weighted-DPMO.

The weighting was conducted because the main categories were not seen as equally important factors with reference to process performance. The Discovery phase was seen as the most important agent, as knowing the customer and all affecting its behavior and decision making is seen as critical to the process performance, hence the weight of 40%. The two other dimensions – Design phase and Transition & Implement phase – even though they are very important in order for the process to succeed, were weighted with a little less, 30% each. These decisions were based on the fact that without the proper knowledge on the customer and the ability to affect its behavior before

and after the process, there is practically no chance in winning the bid competition. The weighted DPMO calculations can be seen in the table below.

Table 2. Weighted DPMO calculations

Main Category (x)	Weight (w)	Sigma Level (k)	DPMO	Weighted DPMO (w) * (DMPO)
Discovery	0.40 (40%)	2	307692,31	123076,92
Design	0.30 (30%)	2,16	253846,15	76153,85
Transition & Implement	0.30 (30%)	2,53	150793,66	45238,10

The total weighted DPMO was calculated from the figures in table above by summing the weighted DPMO's together;

Total weighted DPMO
123076,92 + 76153,85 + 45238,10 = 244468,87

Having unraveled the weighted DPMO value the next step is to calculate the sigma level for the international bid process with the following formula;

q = 244468,87 / 1000000 = 0,24446887
k =1.5 + NORMSINV (1 – 0,24446887) = 1.5 + 0,756= 2,256

The sought level in Six Sigma is 6 which means that the company is classified as a world class company, the same goes with processes. As it can be concluded of the figures above, the sigma level of the international bid process is not at a desired level with the score of 2,256 which falls in between of categories of noncompetitive and industry average. Hence, the assumptions on the poor state of the process were accurate and the need for development is indeed valid.

6.3 Analyze Phase

Coming to the analyze phase the problems have been defined and the attributes of the international bid process in the case company have been measured. Next the vital few factors are being sought in order to find the root cause(s) of the defects and this is done with the help of Pareto charts.

A root cause analysis was conducted in order to find out which categories affect the state of the international bid process the most, and thereby which ones should be examined and analyzed more closely. As stated in the measure phase earlier, the three main categories are divided in different amount of variables each, and there is a different amount of defects under each of them. The following Pareto chart demonstrates the number of defects under each of the main categories and the effect they have on the output.

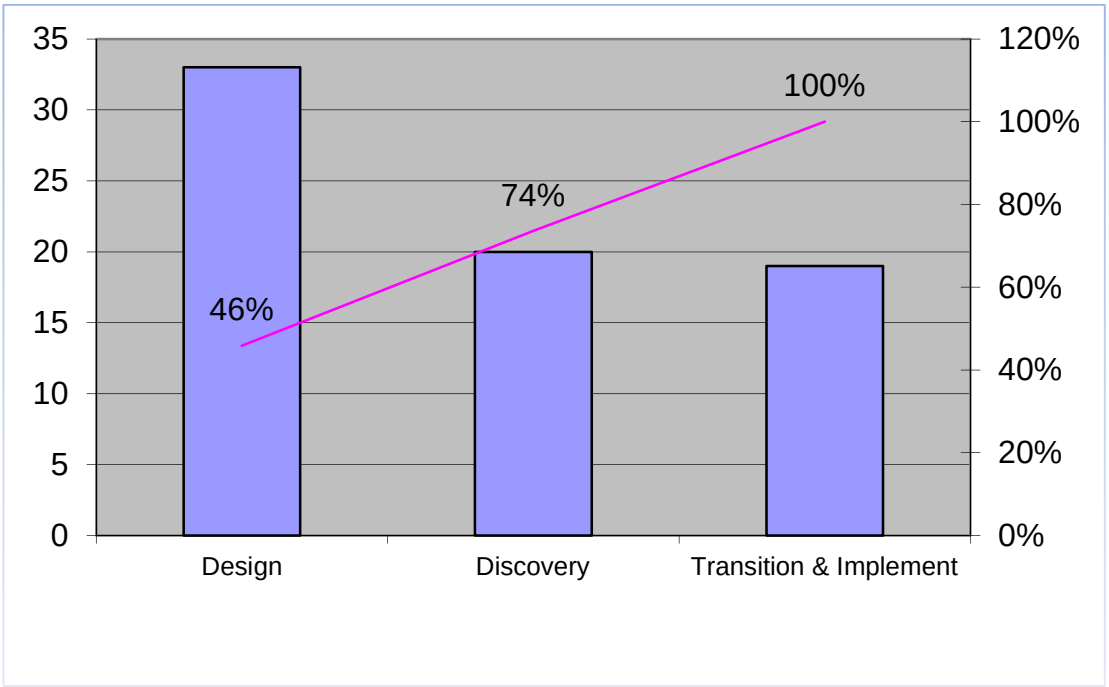

Chart 6. Pareto Chart on the Main Categories

As the Pareto chart illustrates the Design phase received the largest amount of defects by far; 33 defects which produce 46 % of the overall defects. The second came the Discovery phase with 20 defects and the two main categories add up to 74 % of all the defects generated. The last of the three main categories with the least defects, 19 of them, was Transition & Implement phase even though this category had the largest

number of questions under it. Based on this information it was decided that Design phase and Discovery phase would be used in the investigation for root causes, and Transition & Implement phase would be left out of the scope as it would seem to be in better condition. This leaves us with 15 defects to analyze.

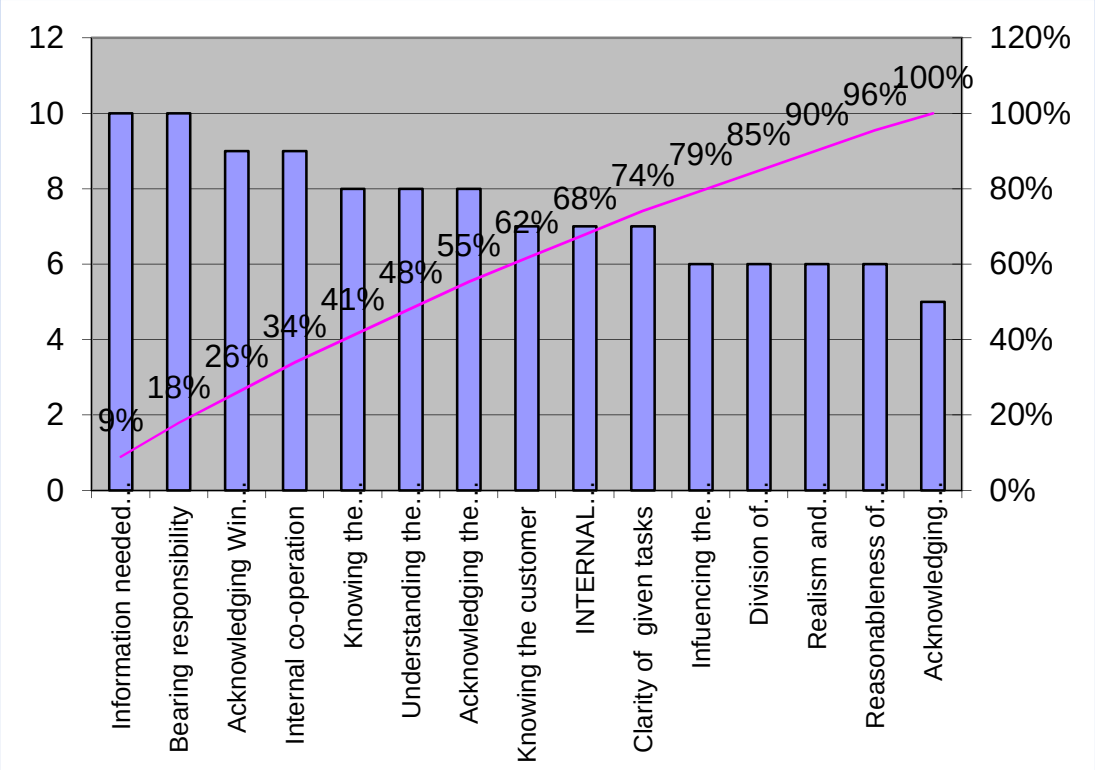

Chart 7. Pareto Chart on the Vital Few

The Pareto principle suggests that 80% of the output is produced by 20% of the input (p. 25). The 80/20 theory does not quite apply here, as it does not in many surveys, as the results on the categories are quite even. According to the Pareto chart above, 11 categories produce the 80 % of the output but it was decided to concentrate into 10 categories that produce altogether 74 % of the output for the sake of reducing the amount of observable categories. The categories to have a keen focus on are; information needed for ROI calculations, bearing responsibility, acknowledging Win Themes, internal co-operation, knowing the customer's purchase process, understanding the customer's potential, acknowledging the need of generic vs. tailored material, knowing the customer, internal timetables of the process, and clarity of given tasks.

6.4 Improve Phase

As the purpose of the improve phase is to identify a solution to the research problem, information on best practices were sought and utilized in order to find the best solution/solutions to enhance the international bid process in the case company, this was done by using benchmarking to best practices of bid process management. The benchmark in this study was Shipley Associates' Business Development Lifecycle and based on it suggestions for developing the international bid process in the case company were made. Also the development proposals of the survey respondents were taken into account as it is very important to acknowledge the opinions of the process participants as they know the process and its problem areas the best.

6.4.1 Benchmarking to Best Practices

In order to have a functional and effective international bid process there is a need for a framework to operate within. It needs to be acknowledged that being successful in bid competitions does not only entail constructing a bid and submitting it to the customer, but one must see the bigger picture and several other issues are to be taken into account, both earlier and later on in the process. The framework chosen as the main benchmark in this study is Shipley Associates' Business Development Lifecycle as it covers the process all the way from market segmentation to the post-submittal activities.

Introduction

The most successful sales companies follow framework processes based on their fundamental principles, this offers the following benefits: reduced costs and risks of capturing business, increased productivity and staff morale, improved sales forecasting, increased management visibility and control, and more competitive solutions and bids. A flexible and scalable business development process can be adapted to different types of markets, opportunities, and customer requirements and to differing sizes of opportunities, schedules, resources, and budgets.

Shipley Associates has observed, studied, and recommended business development best practices since 1972. The Business Development Lifecycle is a business development process comprising of 96 steps divided into seven phases; marketing segmentation, long-term positioning, opportunity assessment, capture planning, bid planning, bid development, and post-submittal activities. The companies are advised to adapt, scale, and tailor this 96-step process to the types and sizes of business opportunities encountered. Companies pursuing both large and small opportunities in commercial, export, and government sectors have successfully adapted this process to their unique business environments and circumstances.

The guidelines of the Shipley Associates' Business Development Lifecycle are based on fundamental principles of their consulting practice: align one's process to the customer's process, using a disciplined business development process that emphasizes planning, scheduling the process and maintaining schedule discipline, basing one's strategy and tactics on the customer's perspective, maintaining customer focus through every step and using decision gate reviews to have senior management decide whether to advance the opportunity or not, and using color team reviews to improve the quality of the business development work product.

Process Framework

According to the website of Shipley Associates (2014) the framework process is aligned with the potential customer's buying cycle and the framework process is divided into seven phases stated in the figure below. As stated before in this chapter, the main focus in this study is on the latter steps as the first ones are pre-determined by the case company. The focus is, therefore, on capture planning, bid planning, bid development, and post-submittal activities.

Figure 14. Business Development Lifecycle (Adjusted from the Website of Shipley Associates 2014)

There are management milestones set in between every selling phase. Even though the milestones are firm, the process always needs to be tailored to fit into the supplier's company and business. (Newman 2003, 134.)

The phases are being opened visually in the beginning of each section below but are there only to demonstrate the steps and contents visually. For the sake of being able to examine the phases in more detail they are also being depicted in appendix 5.

0. Marketing Segmentation Phase

It is good to acknowledge the marketing segmentation in the beginning of the new business capture as that is where everything begins, therefore, also this phase is shortly introduced in this section. The website of Shipley Associates (2014) describes marketing segmentation as including activities that helps the company to evaluate its marketplace and identify segments of the market it wants to compete in. In order for development of new business to be successful it needs to be in accordance to corporate long-term plans, these plans then ensure management and marketing focus and precede opportunity targeting.

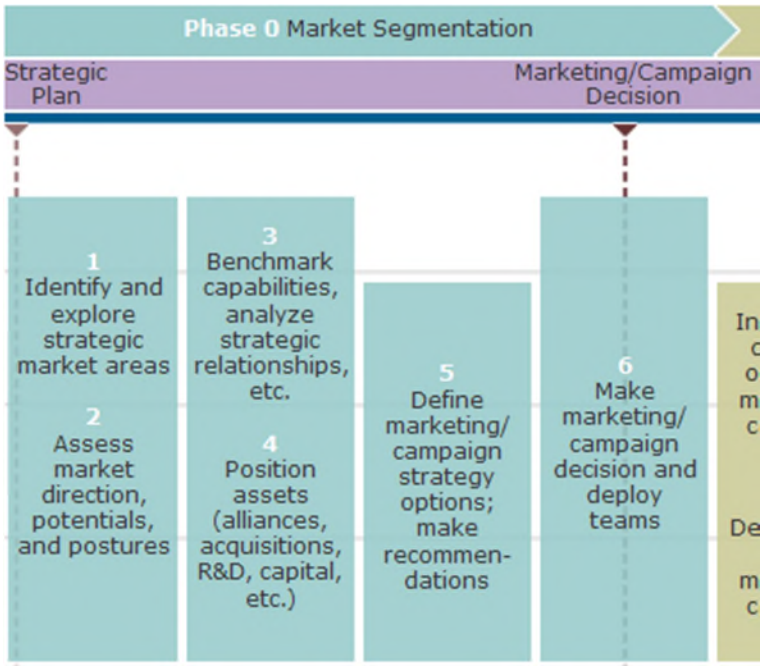

Figure 15. Market Segmentation Phase (Website of Shipley…2014)

The Shipley Associates suggests the company to take the following actions in the marketing segmentation phase; target new customers and markets that support the company's long-term strategic business plan; use research and intelligence gathered on new and existing customers and markets to focus resources on the right markets; assess the company's capabilities and assets to establish credibility in strategic markets; develop processes and strategies; use the gathered information to develop a strategic marketing plan that emphasizes the company's strengths; and employ marketing teams to identify potential opportunities and gather relevant information within approved market segments. The milestone of this phase is the marketing decision (Website of Shipley…2014.)

1. Positioning Phase

Positioning, according to Newman (2003, 134), aims at identifying leads and it is done by establishing the company's presence and capabilities with different marketing activities.

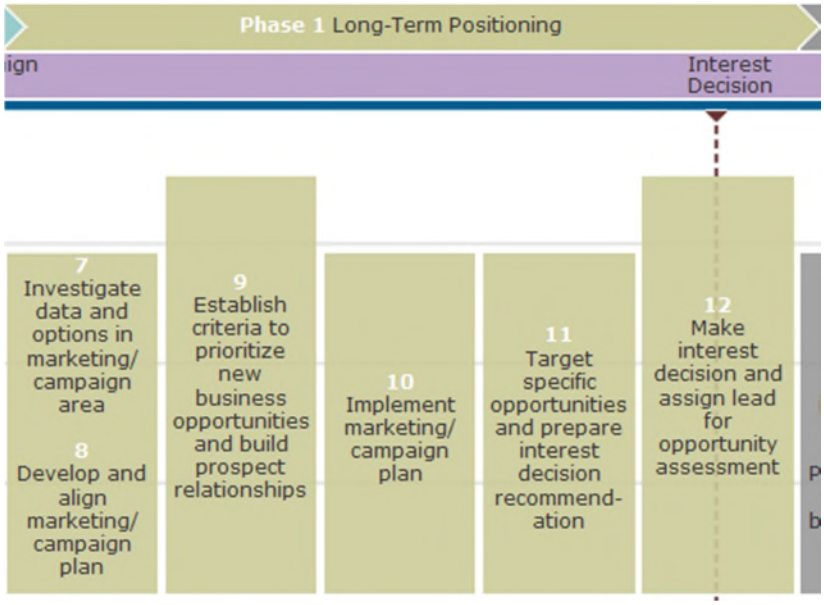

Figure 16. Long-Term Positioning Phase (Website of Shipley…2014)

In long-term positioning, according to the Shipley Associates, the company should act according to the following guidelines; interpret and analyze the gathered marketing data to ensure data is correct in order to have the company achieve the desired position in the right market areas; use this data to develop a marketing plan package that aligns

with your mission, vision, and strategic plan; prioritize new business opportunities and begin building customer relationships; target potential business opportunities and build customer relationships and establish trust; concentrate time and money on business opportunities that have a high win probability; and decide which opportunities to pursue. The milestone of this phase is the interest decision (Website of Shipley…2014.)

2. Opportunity Assessment Phase

In the opportunity assessment phase the company makes decisions about the opportunity, decides whether to pursue it, and assigns the resources for it (Website of Shipley…2014).

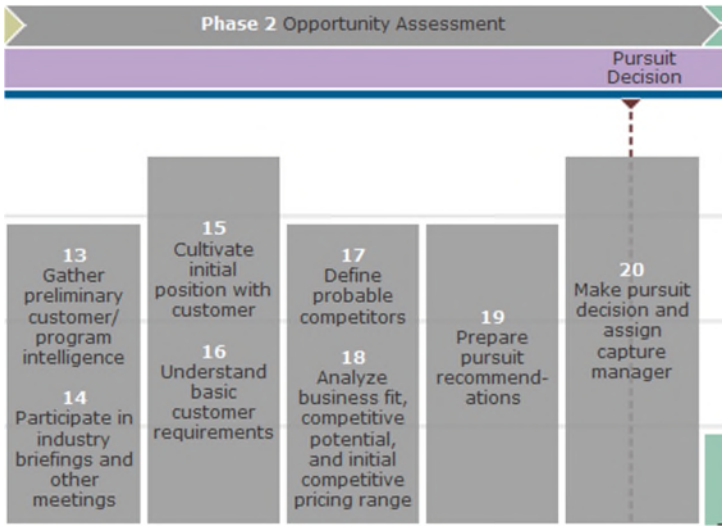

Figure 17. Opportunity Assessment Phase (Website of Shipley…2014)

The Shipley Associates suggest that in the opportunity assessment phase the company should; gather preliminary customer intelligence to favorably align the company's solution with the customer's needs; use marketing events to target opportunities and meet with potential teaming partners and decision makers; nurture potential customers with frequent visits, presentations, and demonstrations to build trust and understanding and when possible one should try and shape customer requirements; analyze customer needs and requirements before making the pursuit decision; identify probable competitors and their strengths and weaknesses as perceived by the customer; use decision milestones to determine if the company's capital and resources are adequate to pursue the opportunity; and prepare an initial capture plan and assign a capture manager for

identified opportunities. The milestone of this phase is the pursuit decision (Website of Shipley…2014.)

3. Capture Planning Phase

The aim of capture planning is to have an opportunity to influence the customer before the bid is submitted and based on it the preliminary bid decision is made. Influencing at this phase is very important because as much as 40 to 80 percent of the decision making is done in the earlier stages of the process. Capture planning is used when pursuing large complex opportunities that are of high value, usually millions, where there is a buying team against one's sales team, and where the sales cycle is long, usually from months to years. (Newman 2003, 12.)

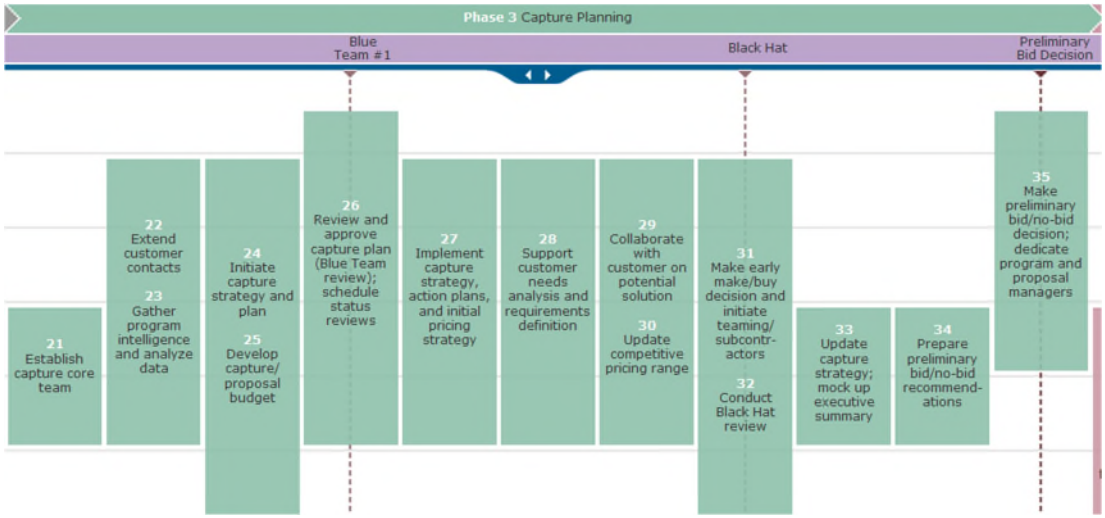

Figure 18. Capture Planning Phase (Website of Shipley…2014)

The first thing to do in the capture planning phase is to select members for the capture team. First of all it is vital to have the senior management's approval and support for the plan in order for it to succeed. It is also important to acknowledge and commit the right people to the capture team; someone to the role of capture manager and the specialists from the required areas. The capture manager should be a person with good customer and market knowledge, sales knowledge, bid experience, leadership skills, good technical understanding, and knowledge of the company. As for the rest of the team and their performance, it is very important to have the approval and commitment of their department managers in order to have the team member's full co-operation. (Newman 2003, 15-16; Website of Shipley… 2014.)

It is important to gather information from different customer contacts before the final RFP is released and communication channels are restricted. The earlier this is done, the better the understanding and potential influence on the customer's requirements. Customers are often willing to share information, but they worry about perceptions of favoritism. (Website of Shipley…2014.)

The capture team should use program and customer intelligence to assess the probability of winning. The more you know about the customer's key issues and biases, the better your capture planning positioning activities. It is important to ask key questions before the RFP is prepared, requirements are defined, and RFP is released. (Website of Shipley…2014.)

The next step is to implement the Shipley process, in other words to populate - complete what you think you know, validate - check and confirm, update - add and correct data, and implement, to develop capture plans. The capture plan details what will be done to capture the business, it must be specific, stating who will do what and when they will do it. A detailed capture plan includes customer analysis, competitive analysis, capture strategy and action plans. The data from the capture plan can and should be used in the upcoming bid plan. Information on the potential customer, the requirements, and competitors transfers directly and only the bid outline, bid preparation schedule, and the writer's packages need to be created. (Newman 2003, 16; Website of Shipley… 2014.)

Management reviews should be used to determine realistic budgets for capture activities and bid development. Most capture managers set initial capture planning and proposal preparation budgets based on historic costs based with the value of the opportunity. (Website of Shipley…2014.)

In the capture process a team of senior managers (Blue Team) should be used to review, refine, and approve the capture plan. The Blue Team validates the capture strategy and solution and suggests improvements. (Website of Shipley…2014.)

The capture team should update the capture plans at least weekly and report progress particularly on “must-win” opportunities. The capture manager manages implementation tactics, evaluates feedback, assesses progress, and repeatedly updates implementation tactics. Influencing takes time and collaboration with the customer, and persuading many individuals in the customer organization requires coordinated actions of the individuals in the supplier company so that they can deliver aligned, customer-focused messages. The capture team works with the customer to refine their needs and identify specific requirements, when these are acknowledged it is more likely that that the company is on target with its bid. Through collaboration with the customer the supplier should be able to identify, understand, and validate customer hot button issues and requirements while simultaneously pre-selling its solution. This collaboration also builds the customer’s trust in the company’s solution. (Website of Shipley…2014.)

A competitive pricing range should be established in the capture planning phase. As the capture team collects and analyzes competitive intelligence, a price to win should develop and refine with considering not only the knowledge on the customer but also the knowledge on competitors. (Website of Shipley…2014.)

It is important to make the decision about using potential sub-contractors already in the capture planning phase as the ones chosen as partners should be preferred or at least acceptable to the customer. An early decision gives more time to influence the customer’s view of teammates and your entire team. (Website of Shipley…2014.)

Conducting a Black Hat review is done by using persons outside the capture team who are experts on your competitors’ strategies and solutions. They try to anticipate competitors’ strategies and solutions and test the chosen strategy and solution of the supplier. (Website of Shipley…2014.)

At this stage of the capture planning phase the capture plan should be updated and a mock-up executive summary should be developed to jump-start the bid effort and provide win strategy direction. Using a customer-focused approach the customer’s hot button issues are aligned with the elements of the company’s solution, this way the focus is on the customer. (Website of Shipley…2014.)

At the end of capture planning phase a preliminary bid/no bid gate review should be used to determine if an opportunity is worth pursuing. It is good to pre-define preliminary bid decision gate review inputs and outputs for the company, but always scale and adapt the requirements to the market, selling environment, customer, and competitive situation. The updated capture plan is used in this review. If the company decides to advance, a bid manager and program manager, either the same person or two different persons, should be identified and assigned if not done previously. The program manager is responsible for delivering a successful good-quality solution to the customer and he/she is program- and delivery-team focused, frequently reviewing resumes for program personnel; structuring the program organization and functions; resolving teaming relationships and agreements; and coordinating with the customer and subcontractors. The bid manager is focused on bid development which includes maintaining schedules, coordinating inputs, conducting reviews, implementing strategy, and resolving internal problems. The milestone in this phase is to make the bid/no-bid decision (Website of Shipley…2014.)

4. Bid Planning Phase

It is vital to put together the bid team before the final RFP comes out. The core teams gather intelligence and use that information to develop a strategy, gather and tailor boilerplate, and draft strawman volumes. This way most of the work is already done when RFP arrives. (Website of Shipley…2014.)

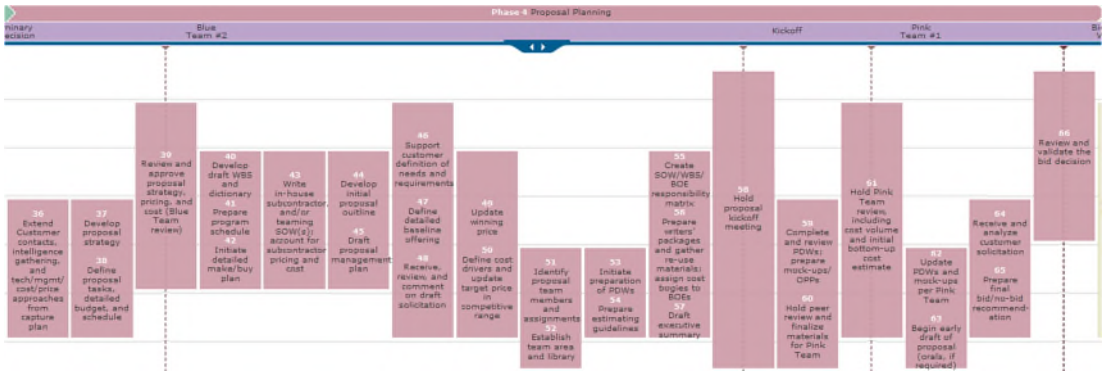

Figure 19. Bid Planning Phase (Website of Shipley…2014)

After extending customer contacts and intelligence gathering, as in the capture phase before, a bid strategy is developed by extending the capture strategy. The bid strategy consists of a series of statements that state your point and how you plan to make that

point in your bid. The next step is to assign each bid strategy by using writers' packages. (Website of Shipley…2014.)

Early on in the bid planning phase a bid project schedule is developed by the bid manager, it is a crucial bid development and management tool. Bid managers, core team members, and section writers use the schedule to manage themselves and others. The length of the bid schedule depends on the customer's given timeframe; the shortest schedules include only the essential tasks; as the bid preparation time grows longer, tasks and reviews are added; and large scale bid processes often include bid team training; detailed solution, strategy, and price-to-win reviews, and multiple team reviews. See an example of all three, the short, the typical and the extended bid schedules, in the figure below. (Website of Shipley…2014.)

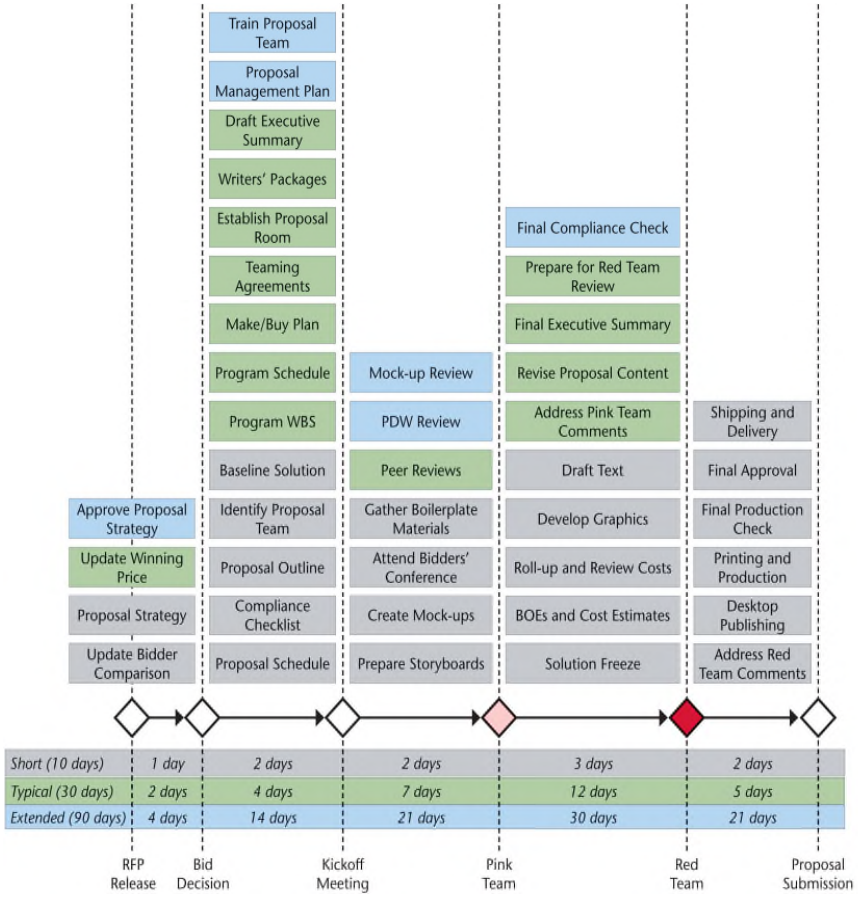

Figure 20. Scalable Bid Schedules (Website of Shipley…2014)

If an RFI (Request for Information) has not been given, one should estimate the submittal date and time based on prior, similar RFP's issued by this customer, and it should be adjusted when the final RFP is issued (Website of Shipley…2014).

At this point, again, the Blue team should review the technical, management, and pricing solution against the customer's needs and requirements as well as the alignment with the capture strategy and competitive focus. After this a draft WBS and dictionary should be developed. The WBS identifies and links the hardware, services, and data elements of the solution to the supplier. Also a master program schedule should be developed at this stage. Writers need this schedule to determine task sequence and to place the cost estimate in the appropriate time period. The detailed make/buy plan should also be initiated at this point. (Website of Shipley…2014.)

Next an in-house, subcontractor, and/or teaming SOW (Statement of work) should be written. Each RFP task should be identified, it should be described what will be done, and who will be responsible in managing and completing these tasks. It is extremely important to include all tasks, eliminate overlapping tasks, and define the interfaces among tasks. The subcontractor SOW defines the tasks and responsibilities of the subcontractors and an early issuance of it will save time and make the complete offer more competitive. (Website of Shipley…2014.)

At this point of the bid planning phase an initial bid outline is developed. The outlining should be adjusted based on customer guidelines, if given, and the importance of the opportunity. A top-level, topical outline that follows the customer's organizational priority should be prepared; the numbering system, naming conventions, and order listed in the RFP should be followed exactly and all other response requirements within the topical outline should be assigned or allocated; the headings should be informative and at section levels below those specified by the customer; the pages should be allocated according to the importance of the topic to the customer; the outlines should be developed collaboratively with the customer, based on discussion with the customer, or logically; the outlines should be annotated as needed to guide writers; the outline should be extended into a Bid Responsibility Matrix to help manage the bid; and lastly it is good to remember that when deviating from the RFP, always explain the deviation. (Newman 2003, 119; Website of Shipley… 2014.)

The next thing to do is to draft a Bid Management Plan (PMP) which documents the roles, responsibilities, tasks, and deadlines before the writers start developing bid sections, volumes, and the complete bid. A PMP should always be prepared and it should be completed and reviewed prior to the kickoff meeting, distributed at the kickoff meeting and at all times kept current. There should be a standard template at use at the company and it should contain the following; bid project summary, customer profile, competitive analysis, bid strategies and themes, staffing roles and responsibilities, and bid operations; and as attachments the following; bid schedule, bid outline, writers' information, bid strategy, executive summary, work breakdown structure (WBS), and WBS dictionary. Even though a PMP is described as a single document, most PMP's are a series of documents that are prepared, posted, shared, and updated on a secure web site. This virtual environment is very handy especially when the team members are virtual and not co-located. (Newman 2003, 160-164; Website of Shipley… 2014.)

The bid manager, program manager, and technical staff craft a solution that supports customer needs and requirements. All customer needs, hot button issues, and requirements need to be addressed in order to be successful. After this a detailed baseline offering is defined. A comprehensive baseline solution includes technical, management, and pricing solutions since focusing only on the technical solution often leads to more costly and less competitive technical solution. Doing this early enables the contributors to describe the solution in storyboards and drafts, and accurately cost tasks. (Website of Shipley…2014.)

If an RFI is issued the company show its interest in solving the customer's problems, but also try and find out who helped the customer draft the RFI, establish the potential solutions to customer requirements, establish the technology as the favored choice, and make sure that the RFI is understood. The customer is not only looking for fulfillment suggestions, but they wish to have improvement. Ideally the response could even influence the customer's requirements to favor areas where the company is strong and thereby gain a competitive advantage. The Shipley Associates offer some guidelines on responding to RFI's; the core team should analyze the documents and formulate the response to them; management should assess the technical, management, and cost elements; specialists in the functional areas should give detailed inputs to the RFI; spe-

cific questions should be asked and specific recommendations made; revisions or clarifications to the RFI should be given in a manner that the customer can easily insert in a revised RFP; and the benefits to the customer for each of the recommended changes to the RFP should be discussed. (Website of Shipley…2014.)

The next thing to do is to update the winning price. This is done based on the collected intelligence and done by the program manager, bid manager, and upper management. The winning price must be within the winning price window, be capable of winning, and project adequate investment for the program. The pricing-to-win analysis focuses on the trade-offs among this customer's requirements, the company's capabilities and costs, and competitors' likely strategies and tactics. In order to understand the customer's price/capability trade-off the company's market knowledge, this customer's budget assumptions, the company's capabilities, and competitors' capabilities, should be considered. The focus should be on the competitors' prior strategies for they tend to recycle them, especially if they have been successful. (Website of Shipley…2014.)

After updating the winning price the cost drivers must be defined and the target price upgraded. The aim is to minimize price against capability, therefore, cost drivers need to be identified early. One should consider the following costing and pricing relationships and issues; costing should be done top-down and bottom-up; top-down costing can be based on the customer's budget or parametrics from a prior case; and competitors' probable pricing strategies influence pricing targets. (Website of Shipley…2014.)

At this point of the bid planning phase the bid team members need to be identified as well as their schedules and individual assignments. It is very important to notify not only the team members but also their immediate supervisors. First one needs to establish a bid management structure with defined roles and responsibilities, the roles may be divided to several persons or some of them may be combined to a single person. Newman suggests that certain roles are required in bid teams of all sizes, see figure below. (Newman 2003, 214-215.)

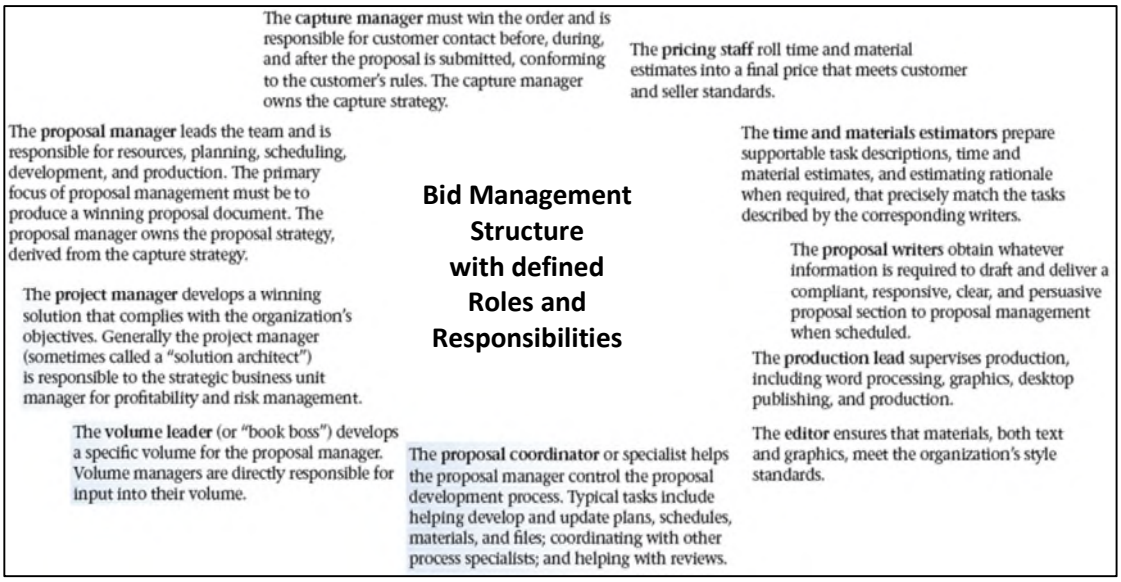

Figure 21. Bid Team Roles and Responsibilities (Adapted from Newman 2003, 214)

The company's approach should be written down in a bid management plan (PMP) and the bid should be managed like other corporate strategic projects in order to be successful. Something that companies often tend to forget is the importance of rewarding for good performance. Good performers should be rewarded and encouraged throughout the bid project; one should commend good performance in daily meetings, make sure that people understand why they are doing something in order to have them exceed the expectations, hold a victory parties or at minimum notify everyone involved in the project, and simply make the effort fun for the attendees. (Newman 2003, 215-216.)

Bid teams need a space to work and a library for information. Both physical presence of the team members and the use of bid rooms offer significant advantages; developing a consistent style is easier, coordination is easier, quality improves, and revisions are reduced. Virtual or partially virtual bid teams are increasingly common in today's business world; they are more flexible to form, execute, and disband; more talented people often become available; logistics costs will be reduced; and response time is reduced by eliminating travel time. Regardless of the operating model, a bid library is essential. The library should include old bids, lessons learned, generic materials, CV's, old RFP's, competitor information, and current versions of the capture and bid management plans. It needs to be determined how the access is controlled and maintained; the

security of physical and virtual team spaces, equipment, materials, and data needs to assured; and version control needs to be taken care of. (Website of Shipley…2014.)

Next the preparation of Bid Development Worksheets (PDWs) needs to initiated to guide the bid writers; The bid management completes as much as possible of the PDW to define writers' assignments which include: section title and number, author's name, page bogey, compliance checklist, section outline, customer issues, references, bid strategy, and other guidance such as technical solution, suggested themes, features and benefits, suggested graphics, and risk management. (Website of Shipley…2014.)

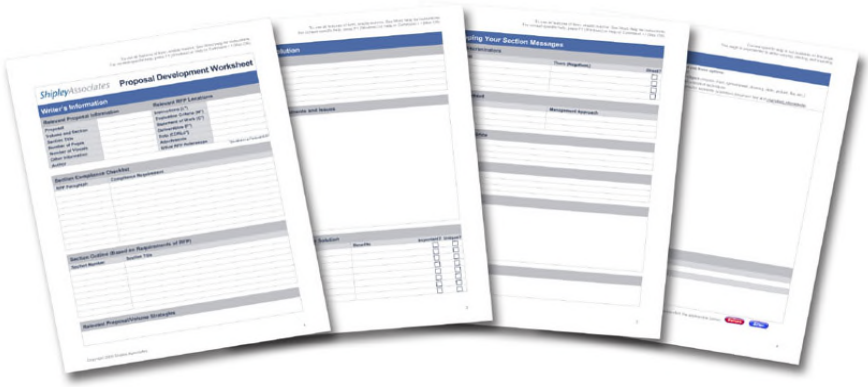

Figure 22. Bid Development Worksheet (Website of Shipley…2014)

At this point the cost volume manager establishes cost estimating guidelines. Estimators should work closely with technical and management contributors in order to have consistent task descriptions and estimates. (Website of Shipley…2014.)

A responsibility matrix should be created to identify and control department/personal responsibilities by task. In addition a cross-reference matrix should be created to ensure compatibility among the technical, management and cost volumes, it can also be used as a checklist to ensure all RFP requirements are addressed. (Website of Shipley…2014.)

PROPOSAL PAR #	PROPOSAL SECTION	RELEVANT BID REQ'ST PAR #	AUTHOR	PAGE LIMIT TARGET	STORYBOARD ASSIGNED	FIRST REVIEW	FINAL DATE	MOCKUP REVIEW DATE	PINK TEAM	GRAPHICS DUE DATE	FIRST DRAFT	RED TEAM DATE
None	Exec Sum	M	S. Ross	4	19 Mar	25 Mar	28 Mar	31 Mar	02 Apr	10 Apr	15 Apr	
1.0	Tech Ov	L.2.1	W. Lou	2	21 Mar	26 Mar	28 Mar	31 Mar	02 Apr	10 Apr	15 Apr	

Figure 23. Responsibility Matrix (Newman 2003, 42)

The team should gather re-use materials and prepare writers' packages in order to make sure that section writers understand their assignments and the tasks. The writers' packages should that include; author assignments; assigned section numbers; page bogeys; compliance checklists; customer issues, features and benefits; strategy at the proposal, volume, and section levels; themes; discriminators; bid style sheet, bid development schedule; draft executive summary; WBS and WBS dictionary; guidelines on how the bases of estimates will be accomplished; team organization chart listing each contributor, organization, and contact information; bid baseline solution; and writers' standards, guidelines, and sources of support. (Website of Shipley…2014.)

At this point either the capture manager or the bid manager prepares a full draft of the executive summary, based on the initial executive summary presented in the preliminary bid decision gate review. The draft executive summary should reflect the win strategy, themes, overall content, and format of the bid. It might not resemble the final bid, but it helps to refine the bid strategy, communicates that strategy to everyone involved, and models what the bid will look like. The executive summary should be written first and edited repeatedly. (Website of Shipley…2014.)

A bid kickoff meeting should always be held to make the process and objectives clear to all attendees. The draft PMP should be used to explain the following bid items: strategy, schedule, format, outline, and baseline design. It is also important to recognize who to invite in the meeting, the Shipley Associates suggest that the following people/departments should be invited; all members of the core team, key management, key marketers, key engineers, and selected members of the extended bid team. A key issue in a virtual kickoff meeting is to explain the team and data management processes. (Website of Shipley…2014.)

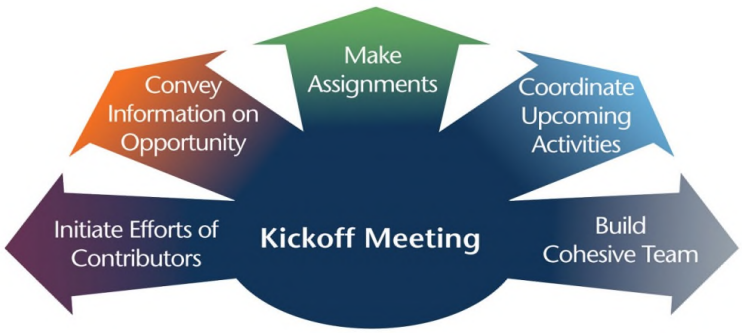

Figure 24. Kick Off Meeting objectives (Website of Shipley…2014)

To save time and improve quality PDWs and mock-ups should be used to plan, develop, and review new content for bid sections before writing text. PDWs list the writers' assignments, RFP requirements, strategies, features, benefits, discriminators, preliminary visuals, and content in bullet list form (Website of Shipley…2014).

Next peer reviews are scheduled to construct a comprehensive package for Pink Team reviewers. The package should include the following; PDWs and mock-up, volume summaries and introductions before the PDWs, the current version of the executive summary, and organization of the materials, facility, and briefing materials. After this a Pink Team review is held to ensure compliance with the customer's requirements, implementation of the strategy and consistency of volumes, it is a means of solving problems before they occur. High-level managers representing technical, management, cost, contractual, and legal issues should be selected to the team and they should be knowledgeable, skilled, experienced, and constructive reviewers. These kinds of reviewers are usually very busy and therefore it is important to set a date in the bid schedule well beforehand to confirm reviewers' participation. The Pink Team mainly critiques the draft bid for compliance, strategy, visuals, themes, space allocation, organizational compliance with the bid outline, and overall cohesiveness. (Website of Shipley…2014.)

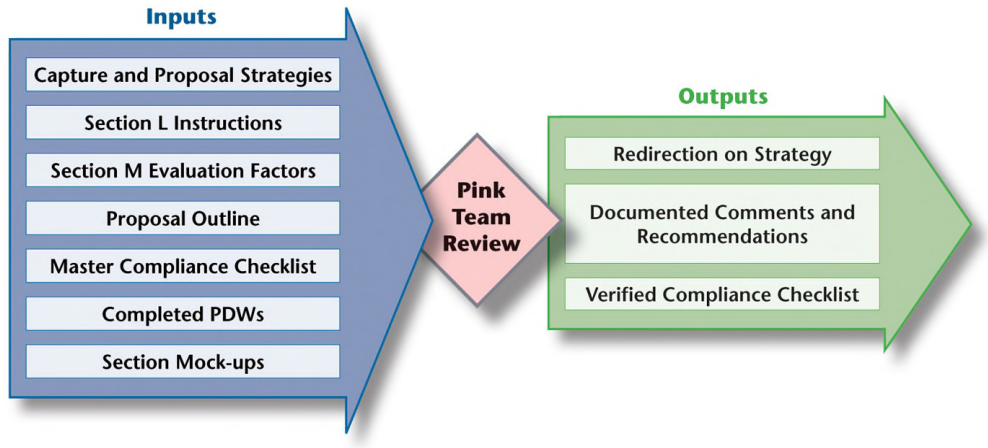

Figure 25. Pink Team Inputs and Outputs (Website of Shipley…2014)

After the Pink Team review the core team should review the recommendations and decides which recommendations are valid, then revises the bid strategy, and tasks volume managers to revise the PDWs and mock-ups (Website of Shipley…2014).

At this point of the bid planning phase an executive summary, at minimum, should be drafted. It is good to focus on writing summaries, theme statements, introductions, and action captions and the body text could be in a form of lists of topics that are planned to be included in the bid. One should also identify the relevant references which involve similar key personnel, services, products, issues, customers, schedules, contract values, team members, and management processes.

When the customer sends the RFP it must be read many times by the bid core team that analyzes it, and in addition it might be good to include experts from sales, marketing and engineering. While reading through the documentation it would be good to make notes in the margins and develop compliance checklists for all areas in the RFP. Especially the following requirements should be taken into account: customer needs and problems, technical performance or operational specifications, deliverables, schedule, bid requirements, and evaluation criteria. The meaning of this step is to understand, analyze and summarize these requirements at the upcoming bid validation decision gate review in which the senior management will decide whether to bid or not. Before this gate review a primary gate review decision is made on whether the opportunity is still worth pursuing and the final bid/no-bid recommendation is prepared. It is important to end the pursuit of opportunities that you are unlikely to win, saving business development costs associated with the opportunity. The final bid validation decision should be done fast, preferably within one day of receiving the RFP. The milestone in this phase is to make the bid/no-bid decision (Website of Shipley…2014.)

5. Bid Development Phase

Final development of the bid starts when the RFP arrives. It should be a systematic team effort based on concurrent activities which ensure that the bid is compliant, responsive, strategically sound, consistent among volumes, and on schedule. (Website of Shipley…2014.)

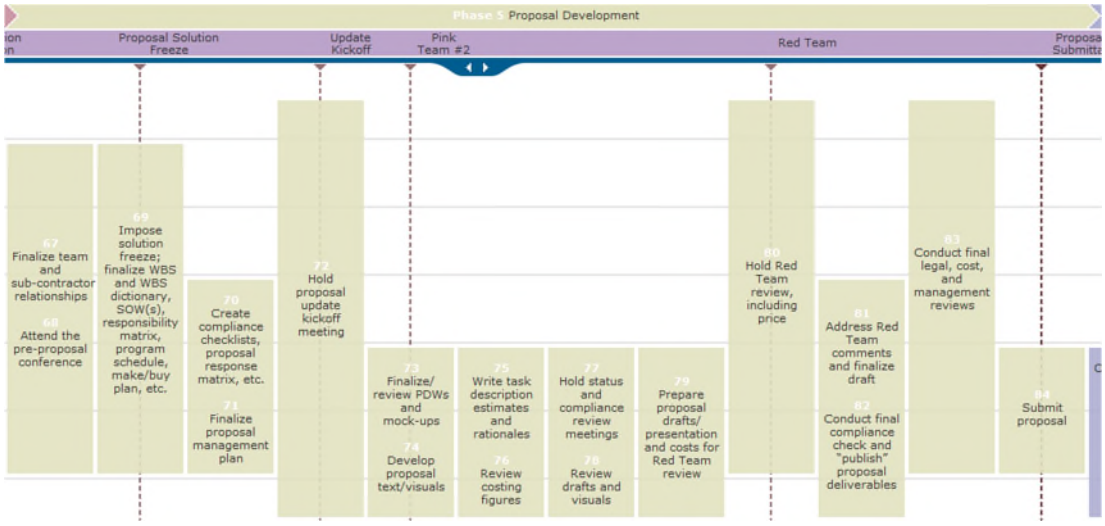

Figure 26. Bid Development Phase (Website of Shipley…2014).

When intending to subcontract with another company, most terms have already been discussed at this point. Now those arrangements should be finalized to be consistent with possible changes in the RFAt least the following issues should be addressed; finalize legal arrangements; finalize teaming-subcontracting arrangements, work share, and bid preparation responsibilities; determine the delivery team structure, key personnel, and management processes needed to prepare the management volume; and verify subcontractors' references and that they are accurate. It is important to protect business confidential information and only give the information that needs to be given and protect it with the contract. If there is a pre-proposal conference held by the customer, one should take advantage of it and ask questions about requirements and other issues that have arisen but it is important, also at this point, not to reveal the company's strategy to the competitors. (Website of Shipley…2014.)

At this point the core capture and bid teams should implement recommended refinements and freeze the solution in order to be able to prepare a clear and persuasive bid, a design-freeze date should be set and marked in the bid preparation schedule. The freeze should be done with the firm support of the senior management. After this a compliance checklist should be updated in case some changes have occurred, the PMP should be finalized, and a bid update kickoff meeting should be held to announce, confirm, and coordinate changes and PDWs should be reviewed and updated. (Website of Shipley…2014.)

It is important to focus on the visual elements and opening bursts of text because the evaluators of the bid, as well the senior management, are always first drawn to them and might not necessarily view anything further. The writers should, therefore, create at least one primary visual for each bid section to convey the section's central theme or selling point, and if the section is long each subsection should have a key visual of its own. (Website of Shipley…2014.)

At this point the task description estimates and rationales should be written. Next the cost volume manager should review individual estimates for credibility, rationale, compliance and completeness, and to note unusual differences, search for an explanation and correct errors. (Website of Shipley…2014.)

The team should hold daily status meetings. They should be kept short and the focus should be on contemporary tasks in order to have the contributors be more productive. The status meeting should accomplish the following objectives: monitor each volume, section and subsection; keep team members informed of project status; discover problems before they grow; and check compliance with both organization and customer requirements. (Website of Shipley…2014.)

The progress on section drafts should be reviewed to help ensure, responsiveness, strategy effectiveness, communication and persuasive messages. The comments ought to be constructive, clear and positive and review dates should be assigned in the project plan in order to keep the project on schedule. When preparing a bid presentation, one should place equal emphasis on the visual elements and the presentation elements. The presenters should be trained and coached not to forget rehearsing. Difficult questions should be anticipated, and responses to those prepared. (Website of Shipley…2014.)

Before presenting the draft bid to the red team for review it, and all its parts, need to be modified for consistency. The Red Team offers the last chance for improvements in the bid before submittal and is, therefore, very important. The members', who must be intimately familiar with the RFP and all pre-RFP intelligence, task is to read and evaluate the draft bid from the customer's perspective and give improvement proposals. The primary goal is to improve the bid's win probability and the secondary

goal is to make sure it is compliant, responsive and enhances the skills of contributors for future bids. (Website of Shipley…2014.)

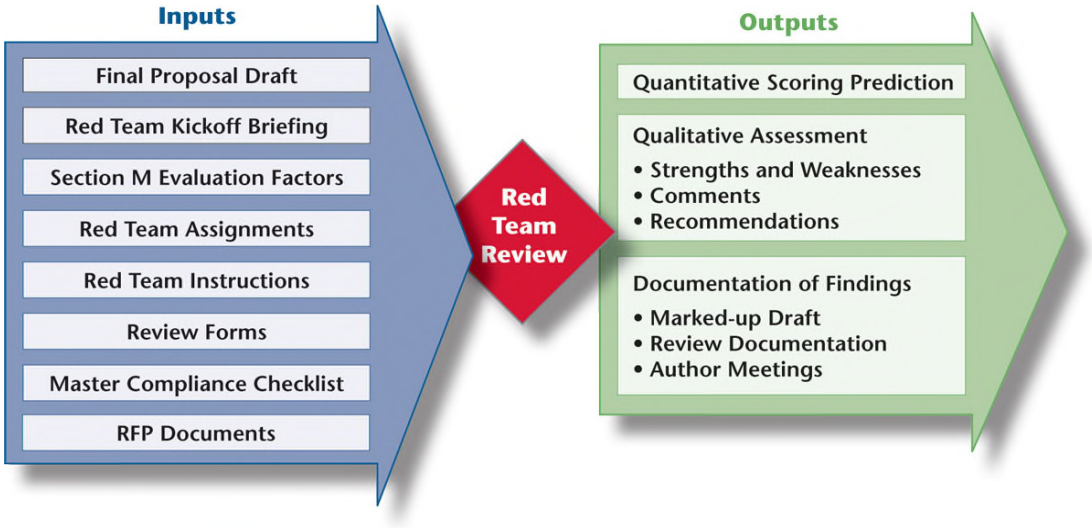

Figure 27. Red team inputs and outputs (Website of Shipley…2014)

After the Red Team review the necessary amendments are made and the bid is finalized. The volume leaders and section writers revise text and the editors re-edit the revised drafts and submit them for production. Well-organized bid materials are easier to evaluate, create less questions and support contract negotiations better. The core team should check the compliance of the entire bid by using the compliance checklist and cross-reference matrix to verify 100 percent compliance. The bid materials should also be checked after the final reproduction and assembly to see that everything is in order. If the submission is also required on CD, the CD should be checked to make sure it is readable and up to standard in every way the customer requires. With electronic submissions similar checks should be done before uploading to the sites. Before submitting any bid a final legal, cost, and management review should be conducted in order to make sure that every important matter in the bid is in order. (Website of Shipley…2014.)

The last thing to do in the bid development phase is to submit the bid to the customer in form of request. The bid should always be submitted on time and a backup delivery method should be planned in case something goes wrong. With electronic submissions there should be an IT expert available to help with potential transmission problems. Also a receipt of delivery should be asked in order to have proof of timely delivery,

whether the delivery is done by email, electronically, personally or via courier. The milestone in this phase is bid submittal (Website of Shipley…2014.)

6. Post Submittal Phase

It is important to acknowledge that the most critical bid work might be done after submitting the bid. Above all the post-submittal work should convince the customer that the company cares about this contract and that it is responsive to the customer's needs and requirements. (Website of Shipley…2014.)

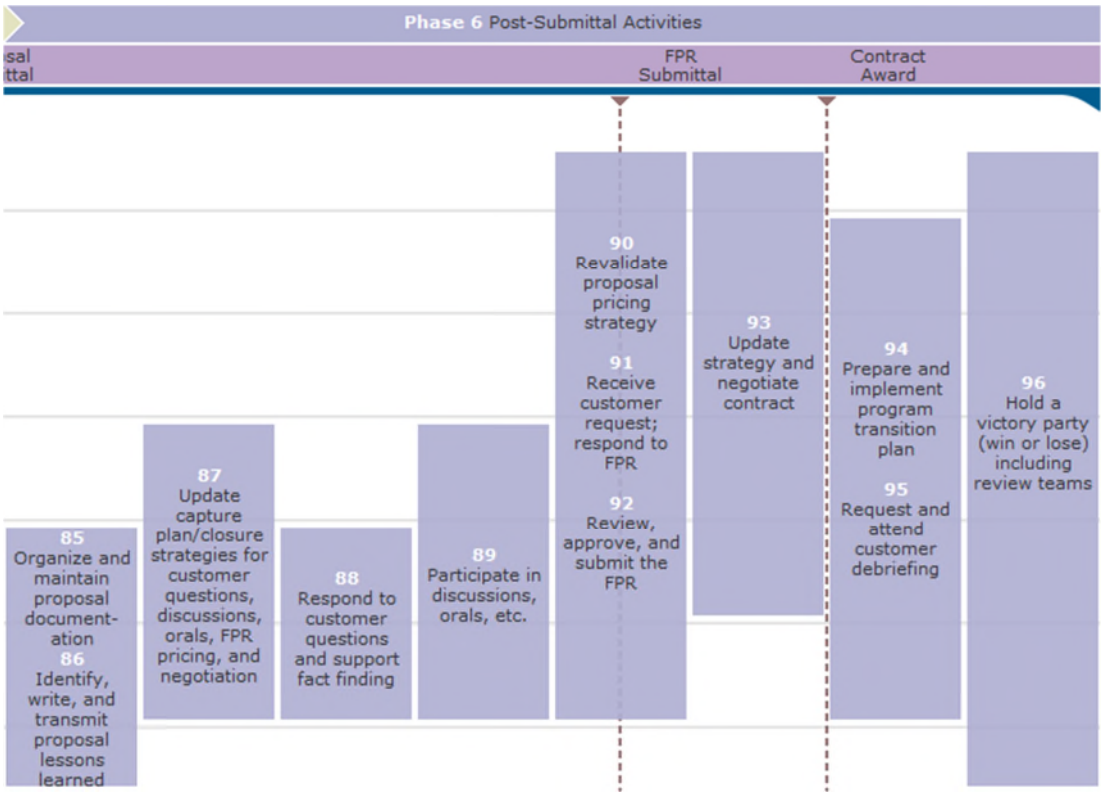

Figure 28. Post-Submittal Phase (Website of Shipley…2014)

All relevant bid materials used should be collected and stored, these materials will be needed for the FPR (Final Proposal Revision), negotiations, and potential protests or post-award activities. A “lessons learned” or White Team review should be conducted as soon as possible to determine how the processes, strategies and activities can be improved. (Website of Shipley…2014.)

Many customers conduct discussions with bidders before making a final decision on who to choose as their supplier. The strategy on these discussions is quite simple: respond fully to customer questions and concerns, and reinforce customer's trust in the company and its solution. The team should appear to be technically competent and well-managed; the members should be familiar with the RFP and the bid and they should be chosen from the relevant areas of business, also rehearsing FPR discussions is very important. When the customer does not fully understand the bid, they may ask questions in writing, in the presentation or both, these questions should be taken seriously as the answers are most likely to affect the evaluation. (Website of Shipley…2014.)

After the FPR discussion, the team should have a better picture of how the price compares with other bidders and the bid pricing strategy should be revalidated. The revision should be written just as the team wrote the original bid and color team reviews should be scheduled. Each change in the bid should be marked so that the evaluators can find the changes easily, only the changes asked by customer should be done at this stage. After the bid is done, the Red Ream should review, approve, and submit the final FPR. (Website of Shipley…2014.)

Net step is to update the strategy and negotiate the contract; it is important to remember that nothing is won until the names are in the contract. The negotiation strategy should be developed based on a thorough understanding of the customer's goals, issues, requirements, and the current situation and the negotiation strategy should be based on the intelligence documented in the capture plan. One should check the facts, prepare the solution approach and justification, have a distinct objective, anticipate arguments the customer will use, and develop responses to these arguments. Usually the program manager and contracts personnel handle the negotiations, but also the capture or bid manager and a member of the cost volume team might be involved. It is important to acknowledge that seemingly small changes in design or schedule could make major differences in production, personnel, and costs, the impact of the changes should be carefully analyzed before accepting them. If the contract is won, the next thing to do is to prepare and implement the program transition plan. (Website of Shipley…2014.)

Whether win or lose, on should always request a debriefing by the customer. It will help the organization and team improve future bids and build a positive relationship with the customer. Information on the winning bids is often the most useful as the case was done well and the ultimate goal – to win – was accomplished. On the other hand, if the contract was lost, one can learn from the mistakes made. (Website of Shipley…2014.)

The last step of the process, not any less important than the others, is to hold a victory party for everyone who contributed to the bid. The team has worked hard and recognizing their efforts, accomplishments, and value to your organization is very important; contributors who feel appreciated are more likely to support the upcoming bid efforts. (Website of Shipley…2014.)

6.4.2 Development Suggestions Based on the Best Practices

As every company and its processes and policies are different, the Shipley Associates' model had to be accommodated to suit the needs of the case company. The following suggestions, yet adapted from this model, are based on the experience of the researcher and the survey results, hence, the process is not a replica of the Shipley Associates' model but an adaption of it best suiting the case company.

Suggested Bid Team

First of all it is important to acknowledge the persons to be involved the bid process; the bid team. The bid team in international bid competitions in the case company consists of multiple persons with differing tasks and responsibilities that can be seen in the figure below. For the sake of enhancing the bid process and especially its management, two new roles are being developed; Bid Consultant and Senior Business Advisor. The Bid Consultant is to manage and oversee the process and the Senior Business Advisor is to advise in major business and pricing related decisions. Their sole job, which is not the case with other participants who also have other responsibilities, is to work with the bids and consistently develop the bid process to respond to the changing

needs both inside and outside the company. Occasionally, depending on the bid competition at hand, there can be are other people involved concerning, for example, quality and processes, environmental and safety issues, and company specific information.

Table 3. Bid Team Roles and Responsibilities

Role	Responsibilities
Sales	o Overall responsibility of the customer and bid o Influencing the customer beforehand o Divide responsibilities together with Bid Consultant o Creation, tailoring and gathering of bid materials o Assess and amend the contents of bid materials provided by the bid team o Submittal of the bid o Prepare bid presentation and present it to the customer o Contract negotiations
Bid Consultant	o Continuous bid process development o Overall process management o Ensure process flow o Divide responsibilities together with sales o Manage schedules o Coordinate activities o Ensure information flow across company o Ensure compliance o Assess and amend the layout of bid materials provided by the bid team o Manage the Bid Bank o Manage biditiimi@canon.fi
Senior Business Advisor (SBA)	o Bring business intelligence o Ensure maximal hitrate o Ensure best possible cost-effectiveness
Sales Management	o Go / No Go decision o Financial decisions concerning sales o Business decisions o Contract negotiations
Service Management	o Financial decisions concerning service o Business decisions concerning service
Senior Management	o Go / No Go decision o Financial decisions o Business decisions
Head Office	o Go / No Go decision o Financial decisions o Business decisions o Consultation and delivery of various bid materials o Coordination with other countries in scope
Business Controller	o Financial calculations and recommendations
Legal Counsel	o Legal consultation
Service	o Creation and tailoring of bid materials concerning Services
Pre-Sales	o Creation and tailoring of materials concerning solutions
Project Management Office (PMO)	o Engineering of master project

Development Suggestions on Other Resources

The first phase - Key Account Management (KAM) - ever too often lies solely in the shoulders of the key account manager who is in charge of the customer. As the aim of this phase is to influence the customer and gather information, there is a need for a wider contact surface; the senior and middle management should also make contact with the customer organization and try to gather critical information as well influence the customer.

As some 40 to 80 percent of the decision making is done before the RFP is constructed (p. 48), the work focusing on influencing the customer and the RFP should start no later than 18 – 24 months before there is even a promise of an up-coming RFP. Relationships should be established with at least 6 – 9 decision-makers and power players in order to be able to influence the contents of RFP and manage to have a positive image in the mind of the customer. These facts are stated in the KAM guidelines, but are often forgotten and neglected. All international sales in the case company is based on the guidelines and the key account managers use different tools in implementing them, above all Miller & Heiman's strategic customer analysis tool Gold Sheet and project analysis tool Blue Sheet. The use of these tools is critical and they should always be used in all sales activities as well as customer relationship management in order to make sure that influencing the customer and the RFP is possible. Even though already in the sales toolkit, the use of these tools, as well as the rules stated above, should be enhanced by training and follow-ups by the sales management.

Training should also be supplied related to other areas, for example; question techniques; products, services & solutions; creation of materials and text; and tailoring. The training, depending on the subject, should not only be for sales but also to other contributors in the process, such as services and pre-sales, who write and tailor a large portion of the bid materials in addition to the key account manager.

A Bid Bank should be created in web application platform Microsoft SharePoint to store bid materials in. Bid Bank should contain generic materials, standard bid-related templates, CV's, process charters, company-specific information, instructions, etc., and also materials from history bids, and is a tool for the bid team to utilize when

developing new bids. The construction of the Bid Bank, as well as keeping it up-to-date, would be the responsibility of the Bid Consultant. SharePoint should also be utilized, when developing the bid, to store and work on the bid documents and all related data, the permissions for these libraries will be managed so that only the relevant people have access.

Standard templates should be created and taken into use. The templates created are at least the following: business case template, risk analysis template, responsibility matrix, templates for the bid – small, medium, and large - and its appendices, templates to share information with finance – what is needed for financial calculations – and with Project Management Office (PMO) – what is needed for master project engineering. The creation of these templates would be the responsibility of the Bid Consultant. There should also be a cohesive layout created for all bid related materials in order to ensure that everything shown to the customer is similar in appearance. This development would be assigned to a team in marketing department.

A bid team mailbox should be created in order to have a single point of contact (SPOC) for emails, and especially the received RFP's should be sent there immediately after received in order to get them into distribution. The mailbox would be administered by the Bid Consultant who would check the upcoming mail traffic on a daily bases.

There should be a space reserved for international bid competitions; a War Room. It is a locked space so it is safe to leave bid related documents lying around without security risks, the permissions are managed by the Bid Consultant and given by HR department. The room can be used for other purposes as well, but is primarily at the use of the bid team when ever needed.

Only the Kick-off meeting and the possible victory party should involve the entire bid team; all other meeting attendees, such as in check-up meetings, should be carefully assessed in order not to have people that the matters do not concern, attend in vain and lose valuable work time.

An analysis on why the case was lost should be made every time a case is lost in order to find out why the customer chose another supplier over the case company or no supplier at all. The results would help to recognize possible flaws or mistakes made, and would prevent making them in the future. The analysis could be done by meeting with the customer face to face and asking straight-forward questions, they usually answer quite honestly at this point.

To-Be International Bid Process Model

The purpose of the international bid process is to win the bid competition and enter into a contract with the customer. All the stages in the to-be process model are necessary in order to achieve this goal and by following the new model the process can become more efficient and more profitable. The to-be international bid process model is more comprehensive than the old one, mostly due to the fact that there was no model of the process constructed before this study. There are many new steps, and some existing ones have shifted places, in order to make the process more efficient.

A few pointers for reading the flowchart are necessary before presenting it. There are three parties, and therefore three swimlanes, involved: customer, case company and head office; the head office is depicted as a party of its own as it is a completely separate entity from the case company even though it has authority over the case company and its decisions. The starting point is depicted in green, ending points in red, and gateways in blue, to make the flowchart easier to follow. The connectors are depicted in black except for the negative flows from gateways; these are depicted in red as there the flow is not leading towards the desired result - a new contract - but the flow is either backwards when something still needs to be done in order to pass the gateway, or the process ends there. The process steps are being opened in more detail, but still kept short, in the verbal descriptions below the flowchart. The international bid process development proposal flowchart can also be found in appendix 6.

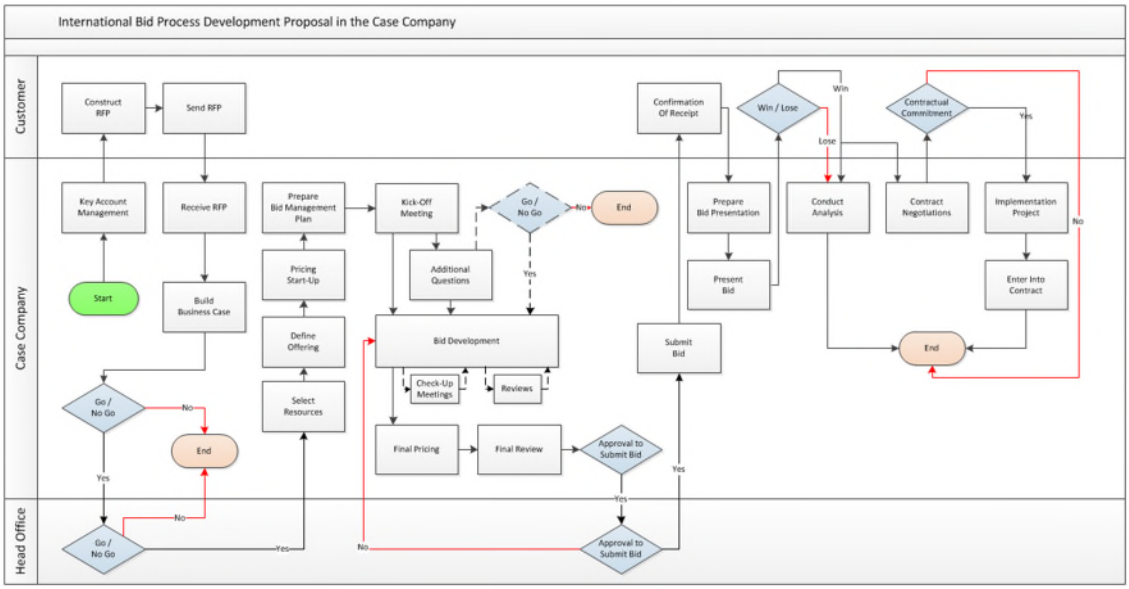

Figure 29. To-Be International Bid Process Model in the Case Company

The process steps, activities within them, the participants thereof, and the tools and templates used in them, are being opened in the tables below. The table is divided into three by using gateways as separators to make it easier to follow.

Table 4. Process Steps

Step	Activities	Participants	Templates/Tools/Outcomes
Key Account Management	o Act according to existing Key Account Management system o Influence customer 18 – 24 months before RFP at the latest o Establish relationships with 6 – 9 decision-makers and powerplayers o Gather information and store it in Gold Sheet and Blue Sheet o Inform CNS and Bid Consultant of an up-coming RFP or other relevant information immediately when obtained o Head Office needs to be informed 6-12 months before RFP comes out and a TSR filled out. o All major cases need to be listed in business plan in advance	Sales Middle Management Senior Management	Key Account Management Plan Blue Sheet Gold Sheet Business Plan
Construct RFP	o Construct RFP o When possible for supplier, be involved in actual construction of RFP	Customer Sales	
Send RFP	o Send RFP to suppliers	Customer	
Receive RFP	o Send RFP immediately to centralized bid team mailbox from where it is taken to web application platform o Read through thoroughly by next business day o Build opportunity in CRM program and mark it international (otherwise no help later from the head office) o Book meetings with people needed in the Business Case and it's approval as well as initial meetings to latter steps o Set up library for materials in web application platform and manage permissions	Sales Bid Consultant	CRM program web application platform
Build Business Case	o Use standard templates and include all information required by Head Office o Do risk analysis (in required cases) o Establish Win Themes and build strategy o Draft initial solution/offering o Estimate bid- and master project resources and give heads-up o Calculate initial pricing estimate o Consult with experts from different areas when needed o Establish whether sub-contractors are needed o Present the Business Case to management	Sales Pre-Sales PMO Business Controller Bid Consultant	Business Case template Pricing instructions for sales Tender Support Request template Profit&Loss template Risk Analysis template and instructions Financial Calculations template
Go / No Go	o Decide whether to proceed with the bid or not o Prepare a memo of the decision and issues affecting it	Sales Management Service Management CNS Senior Management	Go / No Go memo template
Go / No Go	o Decide whether to proceed with the bid or not	Head Office	

Step	Activities	Participants	
Select Resources	o Select bid team with supervisors and inform the team of the upcoming project o Book meetings with both individuals and groups in order to reserve time from the participants o Ensure that the signer of the bid is available at appropriate time and book a meeting o Make reservations for work space o Head Office coordinates possible requests to other countries in scope o Consult sales services on contractual matters such as billing	Sales Bid Consultant Head Office	
Decide Offering	o Decide what products and services to offer o Negotiate with possible sub-contractors o Give heads-up on required products for inventory	Sales CNS Sales Management Service Pre-Sales PMO	
Pricing Start-Up	o Calculate detailed pricing o Fill in in all required templates before pricing start-up meeting o Consult with experts from different areas when needed	Sales Sales Management CNS Service Management Business Controller	Financial Calculations template Tender Support Request template
Prepare Bid Management Plan	o Prepare Responsibility Matrix based on the initial table of contents according to customer guidelines and including: who, what, how, schedule & deadlines. o Determine layout for materials	Sales Sales Management Bid Consultant	Responsibility Matrix Bid material templates
Kick-Off Meeting	o Present case and strategy to attendees o Divide responsibilities based on Responsibility Matrix (who, what, how, schedule & deadlines) o Make sure everyone understands what is expected of them	Entire Bid Team	Business Case template Responsibility Matrix
Additional Questions	o Prepare additional questions to customer in order to get more information and to influence	Entire Bid Team	Additional Questions template
Go / No Go	o Decide whether to proceed with the bid or not o Prepare a memo of the decision and issues affecting it	Sales Management Service Management CNS Senior Management	Go / No Go memo template
Bid Development	o Create and gather bid materials o Tailor materials to be customer specific o Use standard templates o Maintain order, naming and numbering conventions given by customer o Prepare master project	Sales Bid Consultant Service Pre-Sales PMO	Bid Bank Agreed upon templates Master Project information instr. Bid Development checklist
Check-Up Meetings	o Sit down with required individuals / small groups to assess status of their tasks	Sales Bid Consultant	
Reviews	o Assess quality of given materials and send for adjustments or amend yourself when necessary	Sales Bid Consultant	
Final Pricing	o Fill in in all required templates before pricing start-up meeting o Consult with experts from different areas when needed o Determine final pricing based on final offering	Sales Sales Management Service Management CNS Business Controller Senior Management	Financial Calculations template Tender Support Request template
Final Review	o Review final materials o Assure compliance o Make final amendments	Sales Bid Consultant CNS Sales Management	
Approval to Submit Bid	o Approve bid submittal	Sales Management	
Approval to Submit Bid	o Approve bid submittal	Head Office	

Step	Activities	Participants	
Submit Bid	o Submit bid in accordance to customer's instructions o Ask for confirmation of receipt no matter what form of submittal	Sales	Confirmation of Receipt template
Confirmation of Receipt	o Confirm accepted arrival of bid to supplier	Customer	
Prepare Bid Presentation	o Use standard template o Keep it short, tell only main points o Emphasize strengths and customer benefits o Be prepared to customer questions o Rehearse presentation and prep o Decide who will present the presentation to the customer o Craft presentation board and order from supplier	Sales Bid Consultant CNS Sales Management Service Pre-Sales PMO	Bid presentation template Presentation board
Present Bid	o Present bid to customer in given time and place	Sales Sales Management CNS Service PMO	
Win/Lose Decision	o Decide with whom to continue negotiations	Customer	
Make Analysis	o Make analysis whether won or lost in order to learn from it	Sales Sales Management	SpiderWeb Analysis
Contract Negotiations	o Negotiate best possible terms for contract o Consult with experts from different areas when needed	Sales Sales Management CNS Legal Counsel	
Contractual Commitment	o Sign contract	Customer	
Implementation Project	o Carry our Roll-Out	Sales Service PMO	
Enter into Contract	o Hold victory party to bid team o Inform Head Office and other countries in scope o Start to deliver products and services under contract	Entire case company	

Benefits

Expected benefits to be gained by operating within the improved process model are many and substantial; everything is being taken into account, everyone knows their roles and responsibilities, internal contacting is easier and faster, resource management is more efficient, finding up-to-date information is easier and faster, the bids are of higher quality, and lastly and most importantly more bid competitions are expected to be won.

Monetary Benefits and Costs

The monetary benefits and profit gained from the development of the international bid process can be quite substantial from thousands achieved from the savings gained from

the use of the right resources in the right way, to several millions achieved from winning the bid competitions; the size of the bids varies from hundreds of thousands to tens of millions of euros.

There are no major costs factors and investments required in the change of the bid process as the change is mostly done in the behaviour and working methods of the bid team. The only larger costs are in the recruitment of the Bid Consultant and the Senior Business Advisor; the costs come from the recruitment itself and their salary expenses. The cost drivers of the bid process are the number of participants and the amount of hours spent in the bid process. The less people needed, and the less time spent, in the process, the less it costs as more resources are released to other work. There are some other, quite minor, costs in addition to the above mentioned, such as materials.

Implementation

There is no need for an actual implementation plan from the current “As is” -situation to targeted “To be” –situation. The changes shall be educated to the bid team by the Bid Consultant who oversees and manages the process as a whole. Especially in the beginning it is vital to ensure that everyone understands the new operational model and everything goes as described in the process description.

6.5 Control Phase

The purpose of the control phase is to ensure that the international bid process continues to work as planned. It must be made sure that everyone knows how the process should be carried out and that everyone acts according to it; this is called standardization. The performance shall be monitored continuously and in case any deviations occur, immediate action to correct them is to be taken and when necessary the process shall be amended. A new survey on the present state of the international bid process is to be carried out after a year of its launch in order to have a better understanding of whether the performance has improved in opinion of the bid team. The survey results shall also be measured with Six Sigma in order to obtain the new process sigma level. All the above mentioned are the responsibility of the Bid Consultant as he/she is responsible for the continuous development of the process.

7 CONCLUSIONS

The main conclusion of this study is that the assumptions on the poor state of the process were accurate and the need for development is indeed valid. This is proven both by the humble evaluations given by the survey respondents and by the poor results of Six Sigma calculations which indicate that the as-is international bid process is only at 2,256 level, which falls in between of categories of noncompetitive and industry average, when world class organizations' processes are at 6 level. Hence, there is much room for improvement.

The research method used in this study - mixed-methods research – and the development philosophy Six Sigma blended very well together and delivered in every phase of the study all the way from collecting the data through a mixed methods survey, measuring the baseline data to discover the performance level of the as-is process, analyzing both quantitative and qualitative data, improving the process with the help of the benchmark Shipley Associates' Business Development Lifecycle and survey respondents' input, to controlling the to-be process and its performance. All the tools and instructions needed, and more, were available in books and online sources.

As the international bid process development was based on the input given by the bid team, the expertise and experience of the researcher, and ideas derived and adjusted from the benchmark Shipley Associates' Business Development Lifecycle, the outcome is expected to serve the needs of the case company within established methods, and to help the company in its journey to build a culture of winning.

It is apparent that the case company is committed to achieve this goal as support from the entire organization all the way to the senior management has been available throughout the development process. In order to achieve the set goal this commitment is vital in the future as well.

The importance of continuous reviews is crucial in order to have the process serve its purpose. The reviews are to uncover any issues within process performance, and revisions are to be made upon these issues. Without continuous development the international bid process would soon become obsolete and the development would have been

done in vain; hence it is important to remember that the development work never ends but is an ongoing project.

The development of the international bid process has been highly successful and it has generated a need for further process development projects. As the international side of bid projects has been addressed, there is a valid need to do the same for national bid projects; hence the national bid process should be developed. This process is very similar to the international bid process and much of this study can be utilized in that as well. Another process in need of development is the sales process for large accounts. It is a process of which the international bid process is a large part of, and in order for them to be in line and also up-to-date, this process needs to be depicted anew.

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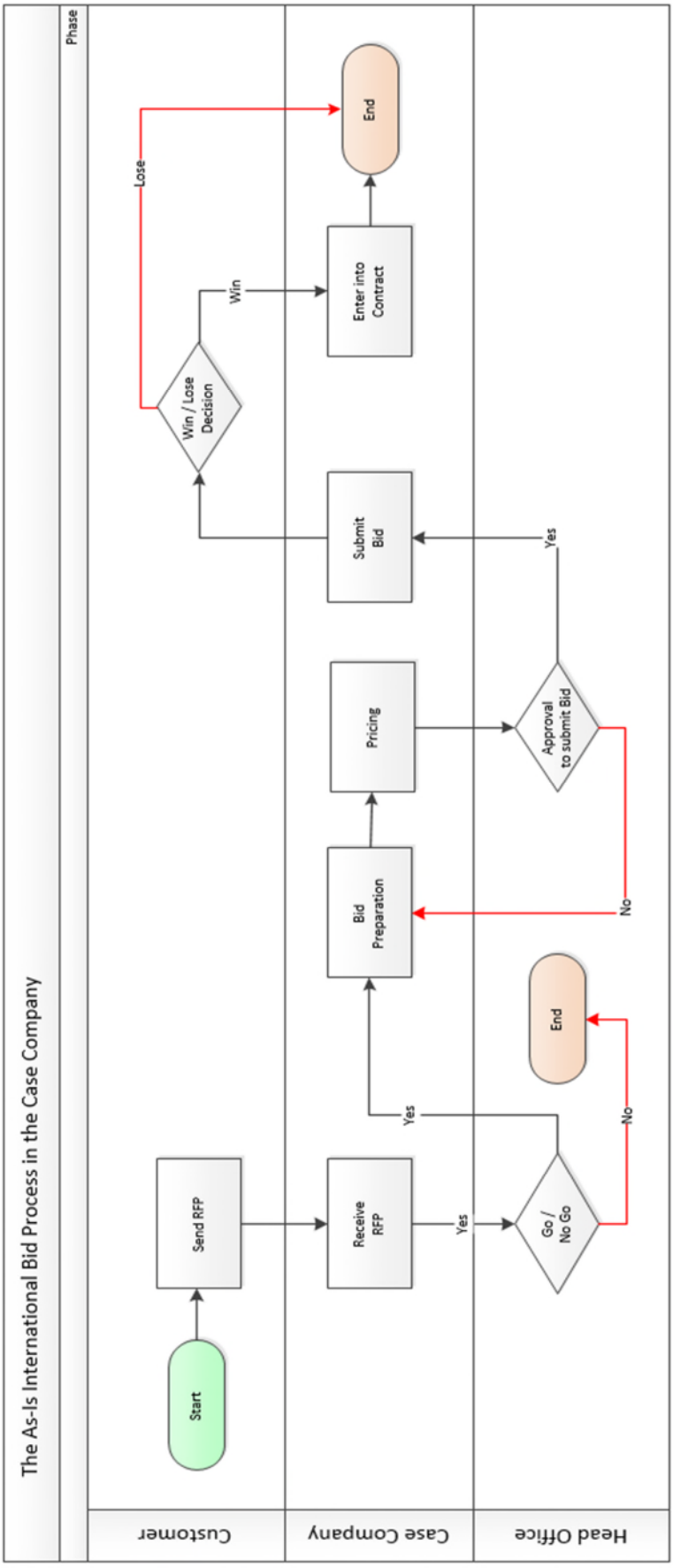
APPENDIX 2


The As-Is International Bid Process in the Case Company
Phase
Customer
Case Company
Head Office
Start
Send RFP
Receive RFP
Yes
Go / No Go
No
End
Yes
Bid Preparation
Pricing
Approval to submit Bid
No
Yes
Submit Bid
Win / Lose Decision
Win
Lose
Enter into Contract
End

APPENDIX 3

Questionnaire on International Bid Process Development

Background information						
Department	Finance	Managed Services	Marketing	Sales	Sales Management	Services

Phase 1: Discover					
Evaluate the present state of each area	Excellent (5)	Good (4)	Neutral (3)	Bad (2)	Very bad (1)
Influencing the RFP in advance					
Knowing the customer					
Knowing the customer's purchase process					
Understanding the customer's potential					
The information needed for ROI calculations					
Give development proposals on each area					
Influencing the RFP in advance					
Knowing the customer					
Knowing the customer's purchase process					
Understanding the customer's potential					
The information needed for ROI calculations					

Phase 2: Design					
Evaluate the present state of each area	Excellent (5)	Good (4)	Neutral (3)	Bad (2)	Very bad (1)
Acknowledging the needed resources					
The division of the responsibilities and tasks					
Bearing the responsibility					
Acknowledging the need of generic vs. tailored material					
Acknowledging the Win Themes					
The INTERNAL timetables of the process					
The clarity of the given tasks					
The realism and fairness of the expectations aimed towards participants					
Reasonableness of the workload					
Internal co-operation					
Give development proposals on each area					
Acknowledging the needed resources					
The division of the responsibilities and tasks					
Bearing the responsibility					
Acknowledging the need of generic vs. tailored material					
Acknowledging the Win Themes					
The INTERNAL timetables of the process					
The clarity of the given tasks					
The realism and fairness of the expectations aimed towards participants					
Reasonableness of the workload					
Internal co-operation					

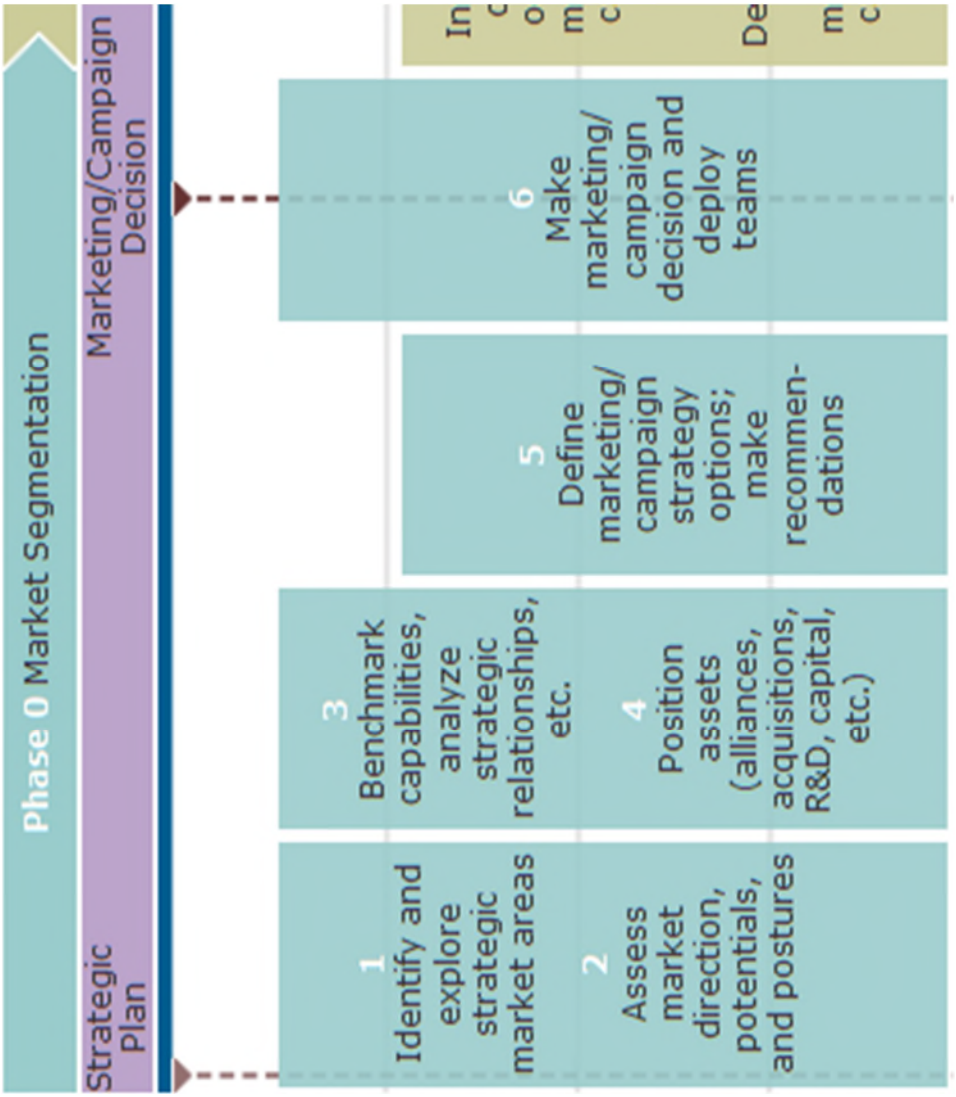
Phase 3: Transition & Implement					
Evaluate the degree of difficulty on each area	Very easy & clear (5)	Easy & clear (4)	Neutral (3)	Hard & unclear (2)	Very hard & unclear (1)
The offering (services, solutions, products etc.)					
The pricing					
Defining the structure					
The tailoring					
Equivalence to the RFP					
Contents search					
Generation of the contents					
The layout					
The descriptions					
Give development proposals on each area					
The offering (services, solutions, products etc.)					
The pricing					
Defining the structure					
The tailoring					
Equivalence to the RFP					
Contents search					
Generation of the contents					
The layout					
The descriptions					

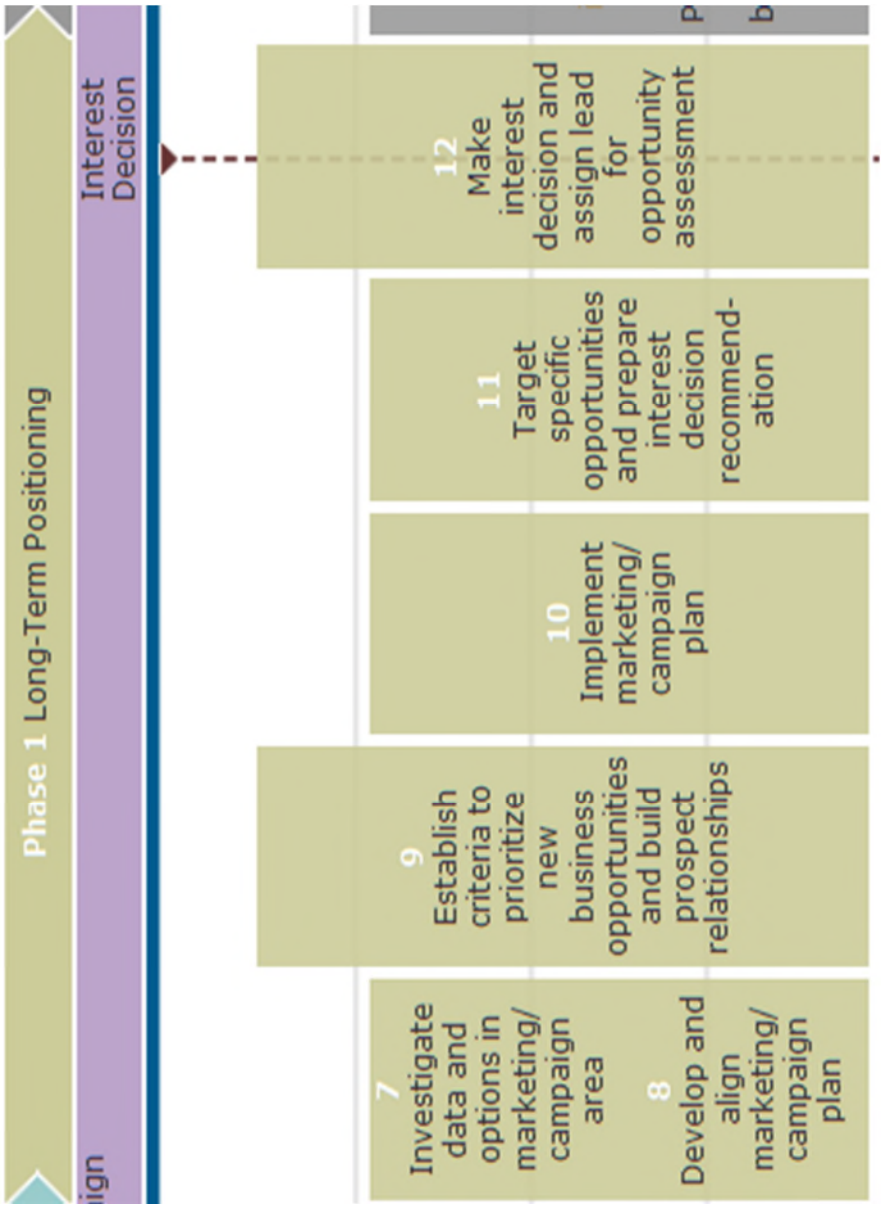
Phase 4: Support & Manage					
Evaluate the degree of difficulty on this area	Very easy & clear (5)	Easy & clear (4)	Neutral (3)	Hard & unclear (2)	Very hard & unclear (1)
Post-bid tasks and responsibilities					
Give development proposals on this area					
Post-bid tasks and responsibilities					

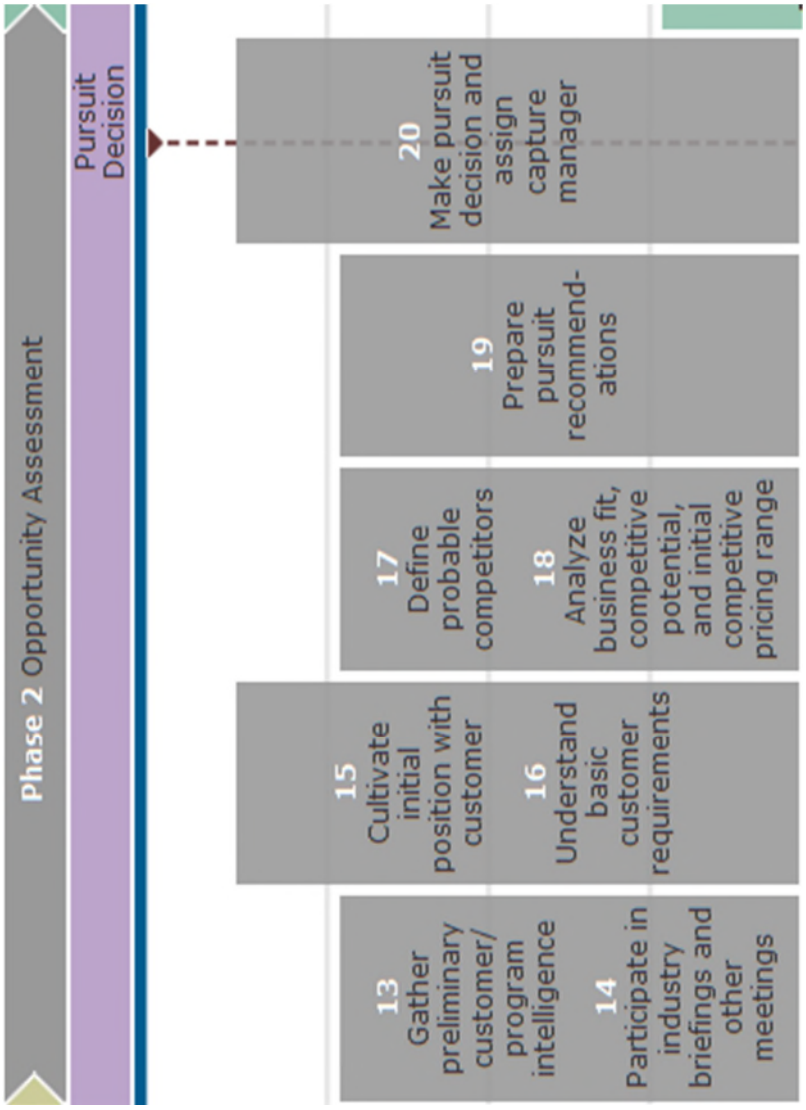
Phase 5: Review					
Evaluate the present state of the process	Excellent (5)	Good (4)	Neutral (3)	Bad (2)	Very bad (1)
Evaluation of the process at present					

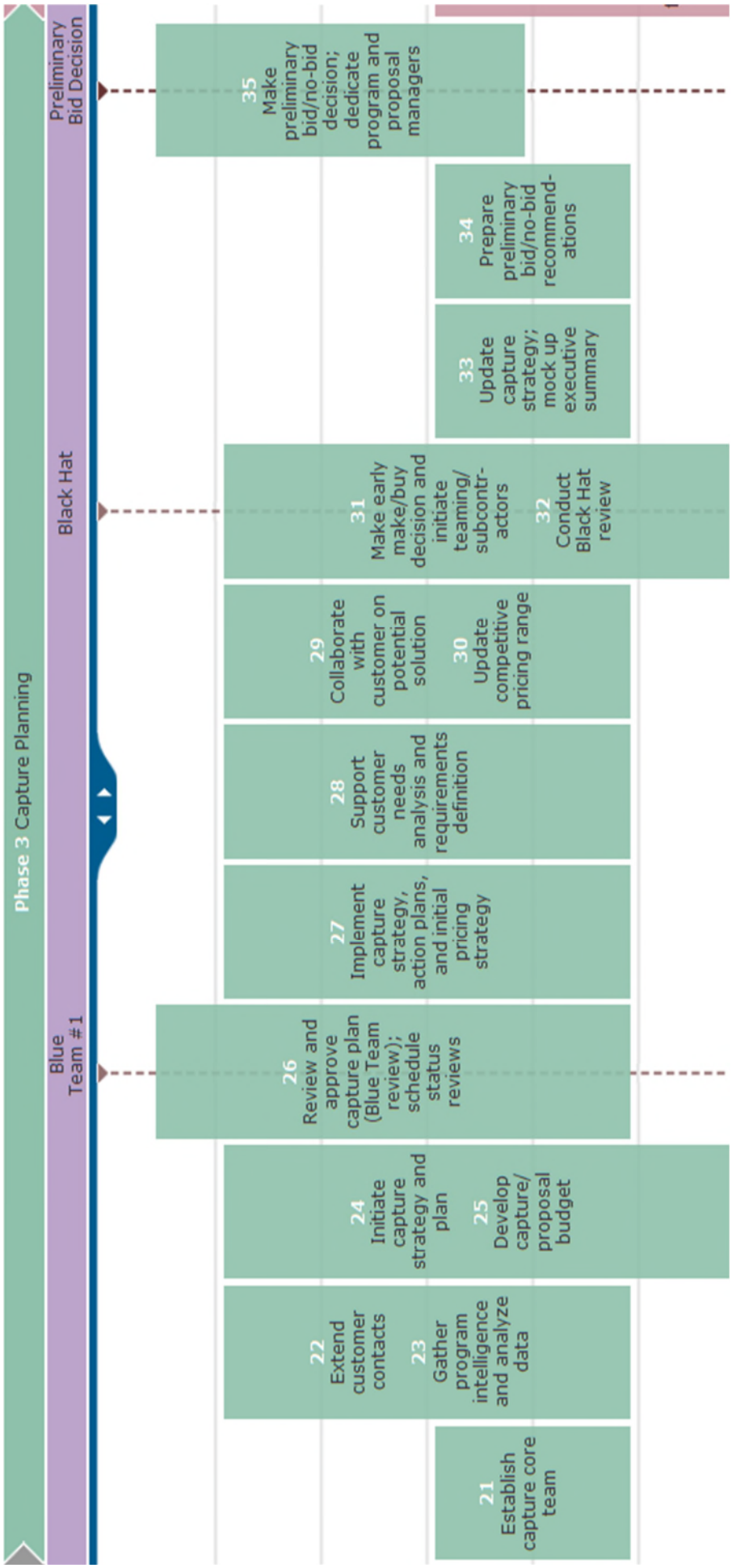
APPENDIX 5

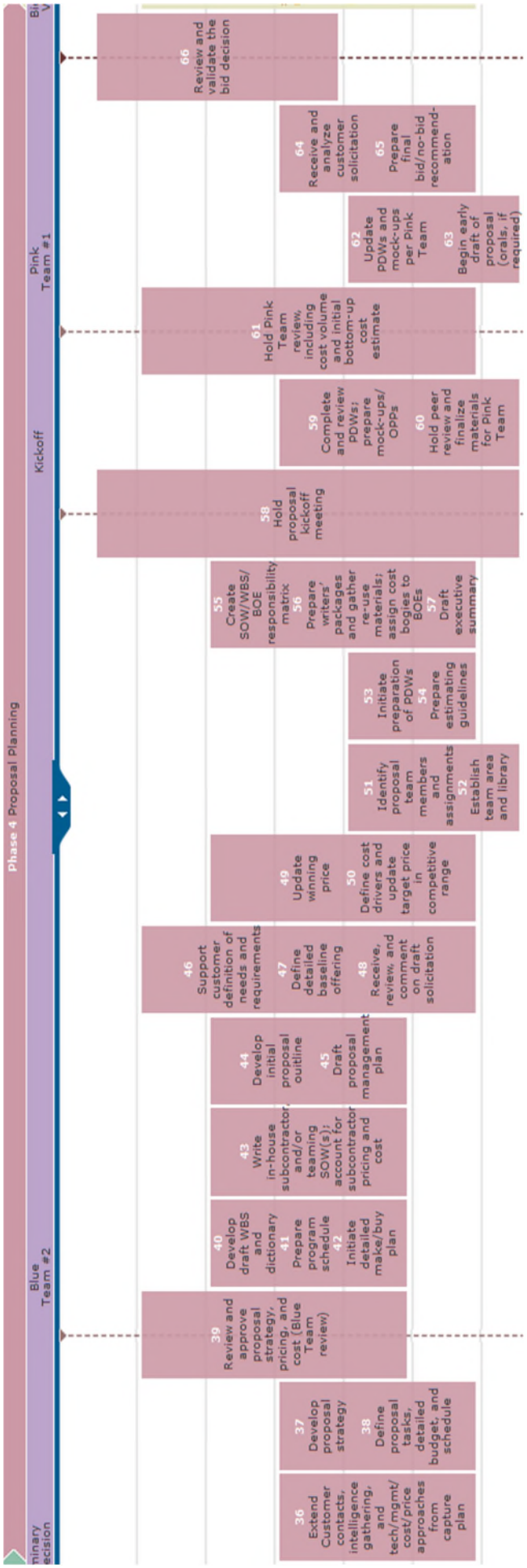
Shipley Associates' Business Development Lifecycle Phases

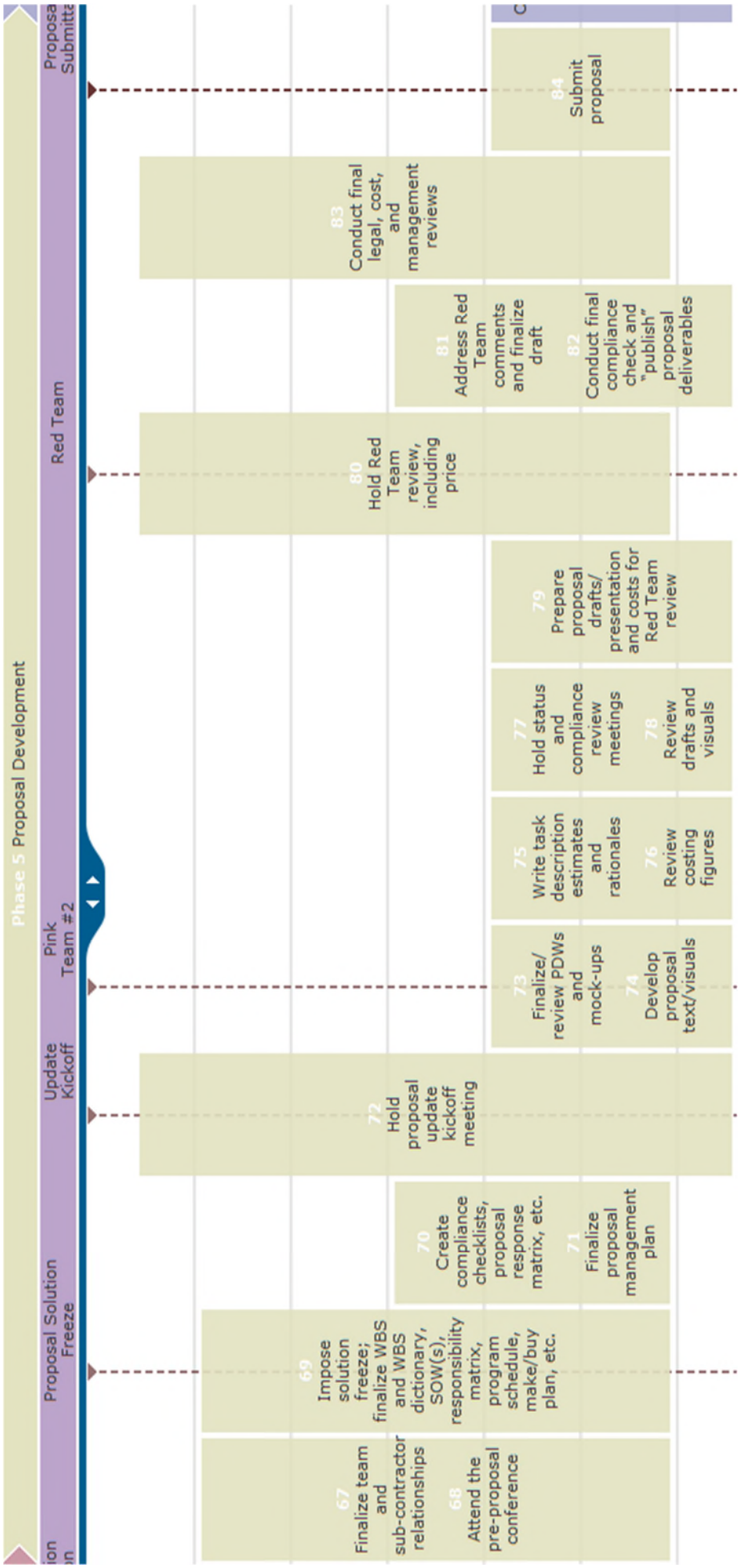


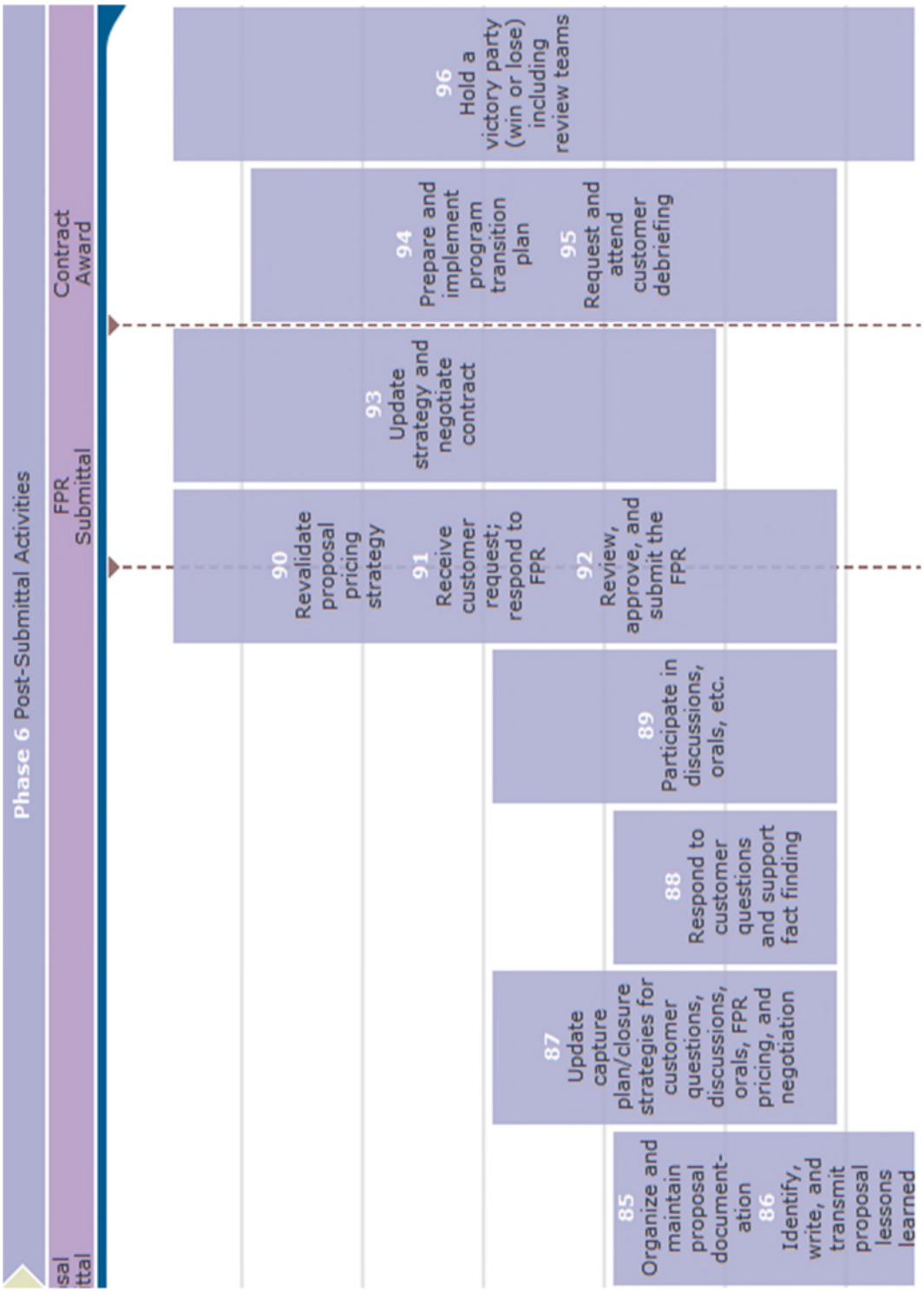

Phase 1 Long-Term Positioning
Interest Decision
7 Investigate data and options in marketing/ campaign area
8 Develop and align marketing/ campaign plan
9 Establish criteria to prioritize new business opportunities and build prospect relationships
10 Implement marketing/ campaign plan
11 Target specific opportunities and prepare interest decision recommend-ation
12 Make interest decision and assign lead for opportunity assessment


Phase 2 Opportunity Assessment
Pursuit Decision
13 Gather preliminary customer/ program intelligence
14 Participate in industry briefings and other meetings
15 Cultivate initial position with customer
16 Understand basic customer requirements
17 Define probable competitors
18 Analyze business fit, competitive potential, and initial competitive pricing range
19 Prepare pursuit recommend-ations
20 Make pursuit decision and assign capture manager

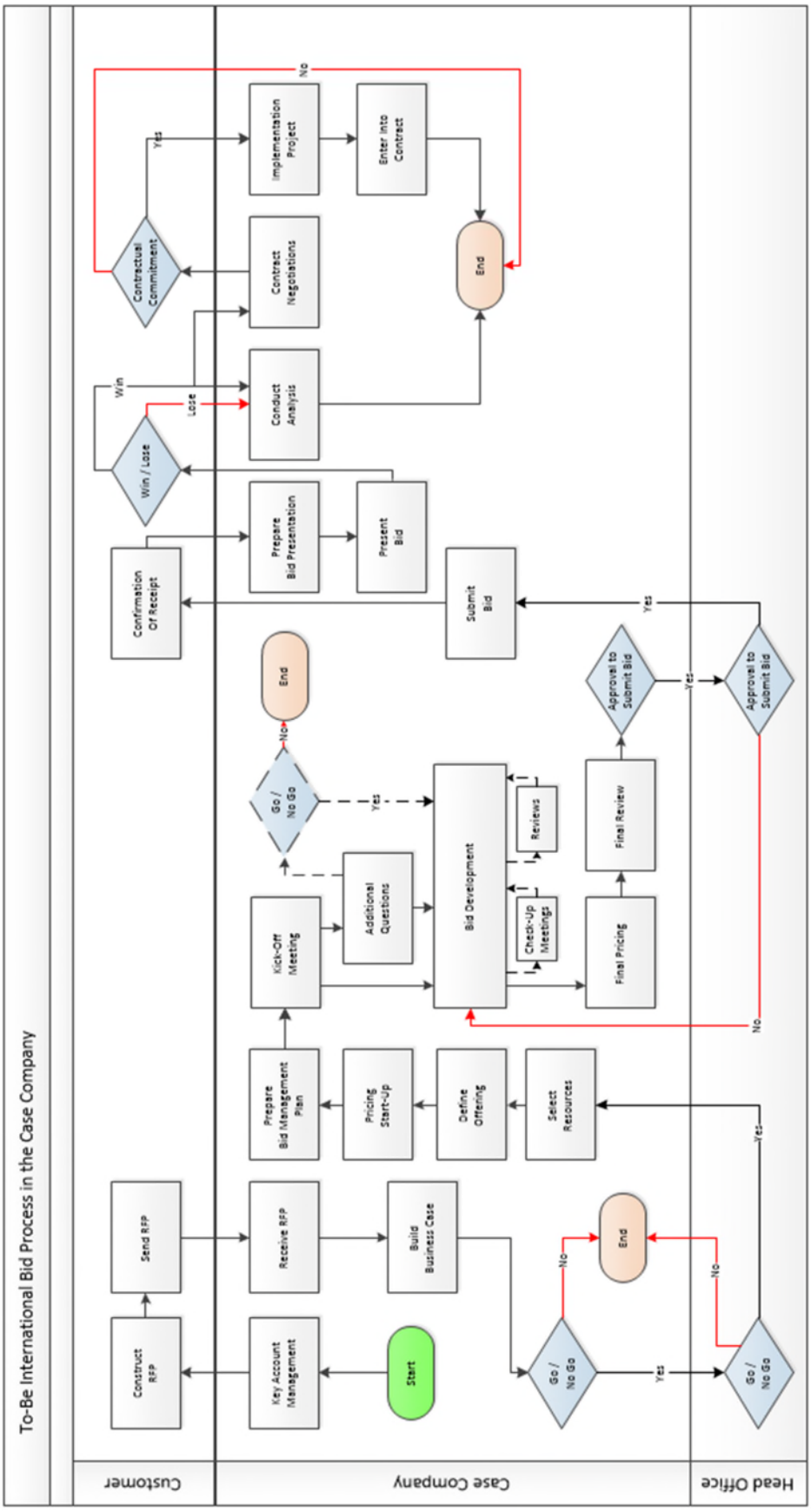

Phase 3 Capture Planning
Blue Team #1
Black Hat
Preliminary Bid Decision
21 Establish capture core team
22 Extend customer contacts
23 Gather program intelligence and analyze data
24 Initiate capture strategy and plan
25 Develop capture/ proposal budget
26 Review and approve capture plan (Blue Team review); schedule status reviews
27 Implement capture strategy, action plans, and initial pricing strategy
28 Support customer needs analysis and requirements definition
29 Collaborate with customer on potential solution
30 Update competitive pricing range
31 Make early make/buy decision and initiate teaming/ subcontr-actors
32 Conduct Black Hat review
33 Update capture strategy; mock up executive summary
34 Prepare preliminary bid/no-bid recommend-ations
35 Make preliminary bid/no-bid decision; dedicate program and proposal managers


Phase 4 Proposal Planning
Blue Team #2
Kickoff
Pink Team #1
36 Extend Customer contacts, intelligence gathering, and tech/mgmt/cost/price approaches from capture plan
37 Develop proposal strategy
38 Define proposal tasks, detailed budget, and schedule
39 Review and approve proposal strategy, pricing, and cost (Blue Team review)
40 Develop draft WBS and dictionary
41 Prepare program schedule
42 Initiate detailed make/buy plan
43 Write in-house subcontractor and/or teaming SOW(s); account for subcontractor pricing and cost
44 Develop initial proposal outline
45 Draft proposal management plan
46 Support customer definition of needs and requirements
47 Define detailed baseline offering
48 Receive, review, and comment on draft solicitation
49 Update winning price
50 Define cost drivers and update target price in competitive range
51 Identify proposal team members and assignments
52 Establish team area and library
53 Initiate preparation of PDWs
54 Prepare estimating guidelines
55 Create SOW/WBS/BOE responsibility matrix
56 Prepare writers' packages and gather re-use materials; assign cost bogies to BOEs
57 Draft executive summary
58 Hold proposal kickoff meeting
59 Complete and review PDWs; prepare mock-ups/OPPs
60 Hold peer review and finalize materials for Pink Team
61 Hold Pink Team review, including cost volume and initial bottom-up cost estimate
62 Update PDWs and mock-ups per Pink Team
63 Begin early draft of proposal (orals, if required)
64 Receive and analyze customer solicitation
65 Prepare final bid/no-bid recommend-ation
66 Review and validate the bid decision


Phase 5 Proposal Development
Proposal Solution Freeze
Update Kickoff
Pink Team #2
Red Team
Proposa Submitte
67 Finalize team and sub-contractor relationships
68 Attend the pre-proposal conference
69 Impose solution freeze; finalize WBS and WBS dictionary, SOW(s), responsibility matrix, program schedule, make/buy plan, etc.
70 Create compliance checklists, proposal response matrix, etc.
71 Finalize proposal management plan
72 Hold proposal update kickoff meeting
73 Finalize/ review PDWs and mock-ups
74 Develop proposal text/visuals
75 Write task description estimates and rationales
76 Review costing figures
77 Hold status and compliance review meetings
78 Review drafts and visuals
79 Prepare proposal drafts/ presentation and costs for Red Team review
80 Hold Red Team review, including price
81 Address Red Team comments and finalize draft
82 Conduct final compliance check and "publish" proposal deliverables
83 Conduct final legal, cost, and management reviews
84 Submit proposal


Phase 6 Post-Submittal Activities
sal
ttal
FPR Submittal
Contract Award
85 Organize and maintain proposal document-ation
86 Identify, write, and transmit proposal lessons learned
87 Update capture plan/closure strategies for customer questions, discussions, orals, FPR pricing, and negotiation
88 Respond to customer questions and support fact finding
89 Participate in discussions, orals, etc.
90 Revalidate proposal pricing strategy
91 Receive customer request; respond to FPR
92 Review, approve, and submit the FPR
93 Update strategy and negotiate contract
94 Prepare and implement program transition plan
95 Request and attend customer debriefing
96 Hold a victory party (win or lose) including review teams

APPENDIX 6


To-Be International Bid Process in the Case Company
Customer
Case Company
Head Office
Start
Key Account Management
Construct RFP
Send RFP
Receive RFP
Build Business Case
Go / No Go
End
No
Yes
Go / No Go
Select Resources
Define Offering
Pricing Start-Up
Prepare Bid Management Plan
Kick-Off Meeting
Additional Questions
Go / No Go
End
No
Yes
Bid Development
Reviews
Check-Up Meetings
Final Pricing
Final Review
Approval to Submit Bid
Yes
No
Approval to Submit Bid
Yes
Submit Bid
Present Bid
Prepare Bid Presentation
Confirmation Of Receipt
Win / Lose
Win
Lose
Conduct Analysis
End
Contract Negotiations
Contractual Commitment
Yes
No
Implementation Project
Enter into Contract