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Contract Management Process and Mentorship Analysis of United States Special Operations Command's (USSOCOM) Special Operations Acquisition and Logistics Directorate of Procurement (SOAL-K)

09 December 2009

by

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Abstract

This research assesses the contract management process capability of the United States Special Operations Command's (USSOCOM) Special Operations Acquisition and Logistics Directorate of Procurement (SOAL-K). The assessment uses two cross-sectional surveys covering contract management processes and mentorship/information-sharing.

The purpose of this research is to analyze SOAL-K's contract management processes, provide a current assessment of the contract management process maturity level for each procurement division within SOAL-K, and recommend areas for improvement through application of the Contract Management Maturity Model (CMMM) to SOAL-K's senior leadership. A mentoring/information-sharing survey is used to examine the current mentoring/information-sharing practices of SOAL-K.

Keywords: Contracting, Maturity Model, Mentorship, Information Sharing

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List of Acronyms and Abbreviations

ALMBOS	Acquisition, Logistics, Management, and Business Operations Support
CAs	Civil Affairs
CINC	Commander in Chief
CMMAT	Contract Management Maturity Assessment Tool
CMMI	Capability Maturity Model Integration
CMMM	Contract Management Maturity Model
CS	Contract Specialists
DAWIA	Defense Acquisition Workforce Improvement Act
DoD	Department of Defense
DoP	Directorate of Procurement
GAO	Government Accountability Office
HOA	Head of Agency
IDIQ	Indefinite Delivery Indefinite Quantity
IG	Inspector General
IIS	Intelligence and Information Systems
IST	Information Societies Technology
KH	SOAL-K Headquarters
KI	SOAL-K Intelligence
KMMM	Knowledge Management Maturity Model
KP	SOAL-K Programs
KR	SOAL-K Warrior

KW	SOAL-K Wing
MTPS	Mission Training and Planning Systems
NS	Naval Systems
OCO	Overseas Contingency Operation
PEO	Program Executive Office
PSYOP	Psychological Operations
QMMG	Quality Management Maturity Grid
SEI	Software Engineering Institute
SOAL-K	Special Operations Acquisition and Logistics Directorate of Procurement
SOF	Special Operations Forces
SOFARS	Special Operations Federal Acquisition Regulation
SP	Special Programs
SPE/AE	Senior Procurement Executive/Acquisition Executive
UCA	Undefinitized Contract Actions
USC	United States Code
USCINCSOC	Commander in Chief, United States Special Operations Command
USD(AT&L)	Under Secretary of Defense for Acquisition Technology and Logistics
USSOCOM	U.S. Special Operations Command

Executive Summary

This research assesses the contract management process capability of the United States Special Operations Command's (USSOCOM) Special Operations Acquisition and Logistics Directorate of Procurement (SOAL-K). The assessment uses two cross-sectional surveys covering contract management processes and mentorship/information-sharing.

The purpose of this research is to analyze SOAL-K's contract management processes, provide a current assessment of the contract management process maturity level for each procurement division within SOAL-K, and recommend areas for improvement through application of the Contract Management Maturity Model (CMMM) to SOAL-K's senior leadership. A mentoring/information-sharing survey is used to examine the current mentoring/information-sharing practices of SOAL-K.

The contract management maturity assessment was conducted at the division level within SOAL-K. The majority of divisions scored a maturity level of "Basic" in each of the contract management key process areas. The exceptions to this are the SOAL-KI, SOAL-KP, and SOAL-KR divisions. The SOAL-KI division scored a maturity level of "Ad-Hoc" in all six of the contract management key process areas. The SOAL-KP division scored a maturity level of "Structured" in the Procurement Planning and Source Selection key process areas. The SOAL-KR division scored a maturity level of "Integrated" for Procurement Planning and a maturity level of "Structured" for Solicitation Planning. All other maturity scores for the SOAL-KP and SOAL-KR divisions were "Basic."

The mentorship/information-sharing assessment was conducted at the organizational level within SOAL-K. The assessment examined the mentorship/information-sharing characteristics of the organization in the categories

of demographics, information-sharing, mentorship, leadership, and training. The research concludes with recommendations to SOAL-K for improving its contract management processes and mentorship/information-sharing practices.

I. Introduction

A. Chapter Introduction

This chapter presents an overview of the research. This chapter specifically outlines the background, purpose of study, problem statement, conceptual framework, research questions, research benefits, limitations, research significance, and the research methodology.

B. Background

MacDill AFB, in Tampa, Florida, is home to U.S. Central Command (USCENTCOM) and to U.S. Special Operations Command (USSOCOM). USSOCOM was formally established as a unified combatant command at MacDill AFB, FL, on 16 April 1987, and is commanded by a four-star general with the title of Commander, United States Special Operations Command (CDR, USSOCOM). USSOCOM, one of nine unified commands in the U.S. military's combatant command structure, is composed of Army, Navy, and Air Force SOF (Special Operations Forces). USSOCOM's mission is to support the geographic Commander, ambassadors and their country teams, and other government agencies by preparing Special Operations Forces (SOFs) to conduct special operations successfully, including Civil Affairs (CAs) and Psychological Operations (PSYOPs).

SOAL-K is the procurement directorate that supports USSOCOM. Its mission is "Contracting Professionals teaming with acquisition and industry professionals to rapidly transform acquisition strategies into superior technologies, equipment, and services for USSOCOM and its Special Operations Forces" (USSOCOM (SOAL-K), 2008). Its vision is to be USSOCOM's contracting provider of choice by delivering competent, rapid, dedicated and innovative contract management.

C. Purpose of Study

The Department of Defense (DoD) is facing many issues that are also prevalent in federal government procurement. Two of the issues currently affecting the DoD are an aging workforce and impending retirements from the large population of retirement-eligible acquisition workforce members. Additionally, President Obama's administration plans to hire 20,000 new members to the government acquisition workforce. The fact that a large population of the current acquisition workforce is retiring at the same time the government is hiring 20,000 new acquisition workforce members makes it difficult to retain corporate knowledge within the acquisition workforce. This affects DoD's contracting offices and their ability to retain skilled employees and knowledge in its workplace.

The purpose of this research is to assess the maturity of the contract management processes and procedures at USSOCOM. This research will establish understanding in two areas: 1) contract management process capability and mentorship process foundations and 2) guidelines for USSOCOM leadership to use when conducting future assessments. The Contract Management Maturity Model (CMMM) will give USSOCOM leadership a definitive understanding of the contract management process areas which may require process improvement. USSOCOM SOAL-K leadership will also become more informed of organizational process strengths and then have the ability to leverage those strengths against noted weaknesses. This knowledge can enhance employment of best practices and encourage knowledge sharing between divisions.

Additionally, this research will give insight into the information sharing and mentorship culture of SOAL-K. This research will provide both a clear understanding of the organization's contract management process maturity levels and what actions need to be taken to enhance those processes, as well as insight into how to better utilize knowledge sharing and mentoring to help achieve the goal of contract management process improvement.

D. Problem Statement

There are two areas at issue for USSOCOM. The first area at issue is that according to the Government Accountability Office (GAO) federal acquisition is a "high risk" area for DoD. GAO specifically lists the areas of contract management, weapons systems acquisition and business transformation, all of which affect strategic human capital management (GAO, 2009). In 2007, the House Armed Services committee stated this about defense acquisition:

> Simply put, the Department of Defense (DoD) acquisition process is broken. The ability of the Department to conduct the large scale acquisitions required to ensure our future national security is a concern of the committee. The rising costs and lengthening schedules of major defense acquisition programs lead to more expensive platforms fielded in fewer numbers. The committee's concerns extend to all three key components of the Acquisition process including requirements generation, acquisition and contracting, and financial management. (Chadwick, 2007)

With these critical words, the problem statement is clear. If the DoD acquisition process is broken, then their processes are not capable. DoD must improve its contract management processes. From this assessment, a unit can learn what it needs to do to make their contract management processes more capable and therefore more mature.

USSOCOM, by virtue of falling under the command of DoD, may also be deficient in its acquisition processes. This research gives USSOCOM the opportunity to assess its contract management processes, learn where its contract management process capability lies and use the research recommendations to improve the contract management process maturity of SOAL-K.

The second area at issue for USSOCOM is its high operations tempo. The high operations tempo creates a high rate of personnel turnover within SOAL-K. This phenomenon is bolstered by President Obama's plan to convert more contracting support positions to government positions. These newly created positions offer more growth potential at higher-paid positions; this may cause an

influx of new government contracting personnel within SOAL-K. In order to minimize the effects of a high operations tempo and hiring new personnel, SOAL-K should have a program in place for mentorship and knowledge sharing that allows it to maintain its organizational knowledge and to train new staff.

E. Conceptual Framework

The goal of this research is to assess the maturity of the contract management processes of SOAL-K and also to examine SOAL-K's mentorship process. These are qualitative assessments. Research garnered from the authors' site visit and candid responses from the CMMM and mentorship surveys are evaluated and presented in the form of recommendations for contract management process improvement and organizational development.

F. Research Questions

This research will assess both the maturity of the contract management processes and the mentoring/information-sharing culture present at USSOCOM (SOAL-K). Information about the organization's current contract management processes will be gathered using the Contract Management Maturity Assessment Tool (CMMAT) and by administering a survey of 62 questions to SOAL-K personnel. The researchers will also evaluate the six phases of the contract management process individually: Procurement Planning, Solicitation Planning, Solicitation, Source Selection, Contract Administration and Contract Closeout. A maturity level will be assigned to each of the six phases of the contract management process in the CMMM portion of this study. In conducting this research, the authors focused on the following questions.

- What is the maturity level for each of the contract management processes within SOAL-K?
- How can SOAL-K improve its contract management process capability?
- How can SOAL-K leadership leverage mature contract management processes within the various divisions?

Information about the mentoring/information-sharing culture is gathered through the administration of a survey consisting of 28 questions. This survey is administered to the contracting personnel within SOAL-K. The data is analyzed in relation to the culture of the organization. The following questions are answered in the mentoring/information-sharing portion of the research.

- What are the policies, standards and/or guidelines in place within SOAL-K regarding mentoring/information-sharing?
- What is the relationship between SOAL-K's contract management maturity level and its mentorship/information-sharing characteristics?
- What areas of SOAL-K's mentoring/information-sharing culture need to be improved or developed?

G. Benefits of the Research

Results from this research may be used by SOAL-K leadership to understand the current maturity level of the organization's contract management processes. These results can also help focus process improvement initiatives in any of the six phases of the contract management process, based on the maturity level of each phase. This research will also provide SOAL-K with a better understanding of their mentorship and information-sharing processes and how those processes can improve their contract management capability.

H. Limitations

The main limitation of this research is that it is centered on the honest, sincere comments from the members of SOAL-K. The surveys are only as valid and accurate as the responses given. Appropriate time for members to take both surveys was extremely important. To enhance research "buy-in," the researchers traveled to SOAL-K to visit directorate leadership. The purpose of our visit was to encourage honest, sincere feedback from participant members of SOAL-K. The researchers reinforced this message through SOAL-K leadership, and it was passed on to survey respondents.

A second limitation of the research lies in putting the recommendations into action. The results of the survey are only useful if the organization puts them into practice. When put into practice, the results of this research and the recommendations contained herein will assist SOAL-K leadership in developing mature contract management processes and formalizing their mentorship/information-sharing program.

I. Significance of Research

Contract management processes, information sharing and mentorship are related in an organization. Over time, employees will be hired, retired or moved to other agencies. Contract management is a high risk area for the DoD. Contract management is viewed with scrutiny from the President, members of Congress, and even common citizens. It is because of this scrutiny that mature contract management processes have to be in place to outlive the change in personnel.

Currently, there is no DoD-wide method that measures contract management process maturity. However, there are typically post-award inspections focused on documentation and compliance. Inspections that are used include the Inspector General, organizational inspections and procurement management reviews (which are highly used in SOAL-K). The CMMM is a tool that can assess organizations and give them a current measurement of how capable their contract management processes are.

This research will also provide insight as to the information sharing and mentorship processes in SOAL-K. Specifically, the research looks at how members of the organization view the mentoring process within the organization and what the members of the organization think of the leadership's views on mentoring. This research will enable leadership to develop ways for the organization to retain knowledge that has been leaving the organization when personnel depart.

This research also provides contract management training topics for the training manager. The research provides insight as to each division's contract management process strengths, the areas that need the most training, and how to tailor training for each division. The training manager can leverage a division's strengths in order to pass their knowledge on to other divisions.

J. Methodology

This research assesses the contract management process capabilities of USSOCOM using a survey that covers key contract management processes and procedures. A standardized, 62-question survey titled the Contract Management Maturity Assessment Tool (CMMAT) was used to assess contract management process maturity. This research uses qualitative data gathered from the CMMAT to identify the contract management maturity level of each division within the organization. The CMMAT will help identify strengths, weaknesses and recommended areas for improvement.

In addition, a 28-question information sharing/mentorship survey was used to identify patterns in demographics, information sharing, management, mentorship and training in SOAL-K. The results are examined for opportunities to further develop information sharing and mentorship and establish what the current mentoring culture is for management and staff.

K. Overview of Research

This research is organized into five chapters. Chapter I provides the purpose, background, problem statement, research questions and the significance of the research. Chapter II is the literature review. It provides background information on the CMMM and on mentorship/information-sharing. Chapter III describes the organization of USSOCOM and SOAL-K. Chapter IV presents the assessment results, analysis of the results and recommendations

for the organization. Results for both CMMAT and the mentorship/information-sharing surveys are included in this chapter. Chapter V contains the summary, conclusion and recommendations for further research.

L. Summary

This chapter presented an overview of the entire body of research. This chapter outlined the purpose, background, problem statement, research questions, limitations and the significance of the research. Chapter II will provide a literature review on the background of the CMMM and similar assessment tools, as well as research results from previous studies on mentoring and information-sharing.

II. Review of the Literature

A. Introduction

Today, more so than at any point in United States military history, the Department of Defense is outsourcing for vital supplies and services. This is recognized by the Government Accountability Office (GAO) in one of its 2007 reports: “The Department of Defense is relying more and more on contractors to provide billions of dollars in services” (2007b, p. 1).

These facts support the statement made by Garrett and Rendon (2005b) that “The contract management process is now increasing in importance as contractors and suppliers become virtual extensions of the buying organization” (p. 50).

Given the frequency of DoD acquisitions, it is more important than ever for DoD organizations to have highly capable, mature contract management processes. In order to determine whether or not an organization has a mature contract management process, it must be analyzed by unbiased researchers outside of the organization. For this purpose, the researchers are using the Contract Management Maturity Model (CMMM) and its accompanying Contract Management Maturity Assessment Tool (CMMAT). Additionally, the researchers are exploring the mentorship aspect of a DoD organization (specifically, United States Special Operations Command or USSOCOM) in order to analyze the extent processes are shared among the work force. This is important because in mentoring, the organization benefits as future leaders are developed. The organization may also find that employees who are mentored are more satisfied and committed than those who are not (Burke, McKeen & McKenna, 1994).

This chapter provides a literature review on the CMMM, as well as discusses the researchers’ reasons for choosing the CMMM. This chapter also

provides a literature review on mentorship and information sharing within organizations. Additionally, this chapter provides background information on maturity models and potential problem areas in the DoD's acquisition work force.

B. Contract Management Process Improvement Through Assessment

Contract management in the DoD is a very complex and highly regulated process. There are thousands of pages of regulations (for example, the *Federal Acquisition Regulation* and the *Defense Federal Acquisition Regulation*) and *United States Codes* that provide explicit, detailed rules and guidelines for contracting with the U.S. Government. An effective DoD organization must be able to synthesize these rules and regulations and integrate them into its day-to-day contract management operations. This is not an easy task; as GAO recently stated, "From fiscal years 2001 and 2008, DOD's obligations for contracts have more than doubled to $387 billion, but its workforce that manages and oversees contracts grew by only about one percent" (GAO, 2009). This is one of the reasons why contract management continues to be a "high risk" area for DoD.

In order for an organization to be efficient in contract management, its processes must be mature. Maturity, as defined by Garrett and Rendon (2005b), is "a measure of effectiveness or capability in any specific process" and "is usually described in terms of levels of effectiveness or capability" (p. 48). The researchers will discuss the specific levels of maturity as defined in the CMMM later in this chapter, but for now it is sufficient to state that the higher the level of maturity in which an organization is rated, the more capable its contract management process will be. This is important because within the DoD, better contract management benefits the organization through cost savings (to the government and ultimately the tax-payers), streamlined acquisition schedules, increased performance for the end user and greater adherence to public policy standards.

USSOCOM is no different in this aspect. A detailed review of the USSOCOM organization is presented in Chapter III, but it is worth noting here that like any other organization or DoD entity, improvements to USSOCOM's contract management process capability is highly desirable. The DoD Inspector General (IG) noted that, "USSOCOM contracting officials did not always comply with the FAR when performing and documenting fair and reasonable price determinations" (DoD IG, 2009). Organizational contract management process assessment will improve these and any other deficiencies in contract management process capability.

USSOCOM is a unique organization with a complex mission. A look at its procurement division's mission statement from its Web site (USSOCOM, 2009) provides some insight to these complexities:

> The mission of USSOCOM's Directorate of Procurement (DoP) is to provide contracting and acquisition support for acquiring SOF-peculiar weapon systems, equipment, and services in direct support of the Overseas Contingency Operation(s) (OCO). To meet this challenging mission, the DoP utilizes the most innovative, streamlined, and expedited acquisition practices available, while maintaining strict compliance with required statutes and regulations.

This mission statement clearly shows that all contracting officers at USSOCOM have a difficult mission to accomplish and support. If its processes are not mature, then they will not be able to accomplish its mission effectively.

The DoP is a value-added organization under USSOCOM's Special Operations Acquisition and Logistics division. As business process management—the practice of continually optimizing business processes through analysis, modeling, and monitoring—can help businesses meet their financial goals, so can contract management assessment help DoD organizations make improvements related to acquisition cost, schedule, and performance (Levinson, 2006). In this respect, by increasing its contract management process maturity level, the DoP increases its value to USSOCOM.

In addition to adding value to the organization, process improvement also helps an organization maintain its competitive advantage. Competitive advantage is important in the civilian sector. In addition to the previously mentioned advantages in the areas of cost, schedule and performance, an increase in competitive advantage is also essential for DoD organizations. Previous Naval Postgraduate School researchers Bennett Burton and Andrew Nordin (2007) noted correctly that if a DoD organization were to lose its competitive advantage, "its mission could be absorbed by another unit, or in some instances, outsourced to a contractor through an *OMB Circular A-76* efficiency study" (p. 11). Clearly, outsourcing procurement activities to a contractor is the least desirable option for USSOCOM because of its complex mission. A much more viable option would be to increase the capability of its contract management process through assessment and then implement the results of the assessment.

Process improvement through assessment is vital for organizational progression and adaptation to an ever-changing global work environment. This is true not only for private-sector companies, but for the DoD as well. We will now look at the various maturity models available to conduct process assessments.

C. Maturity Models

Due to the previously stated importance of process improvement, private industries have created maturity models in order to help their organizations maintain or increase their competitive advantage over their peers. We will describe three maturity models in this section to use as a basis of comparison to the CMMM. These maturity models are Crosby's "Quality Management Maturity Grid" for quality management, the Software Engineering Institute's "Capability Maturity Model Integration," and Siemen's "Knowledge Management Maturity Model."

According to Information Societies Technology (IST) (2003), maturity models describe the evolution of an entity over time. As IST states in its report (2003), the entity that a maturity model evaluates can be anything of interest,

such as a human being, an organizational function, technology, etc. As we look at the following maturity models, we will be comparing them based on the following criteria.

- The development of a single entity is simplified and described with a limited number of maturity levels (usually four to six).
- Levels are characterized by certain requirements, which the entity has to achieve on that level.
- Levels are sequentially ordered, from an initial level up to an ending level (the latter is the level of perfection).
- During development, the entity is progressing forward from one level to the next one; no levels can be left out (Information Societies Technology, 2003).

It is worth noting that while these criteria should be apparent in the maturity models mentioned in this section, we will also see similar criteria as we look at the CMMM in the next section.

The Quality Management Maturity Grid (QMMG) was developed by businessman and author Philip B. Crosby. The QMMG was first published in Crosby's book, *Quality Is Free,* in 1979. In the QMMG, Crosby lists five stages of management maturity with relation to quality issues. These stages are Uncertainty, Awakening, Enlightenment, Wisdom, and Certainty. The five stages are then measured against six dimensions to complete the grid. These dimensions are: 1) Management understanding and attitude, 2) Information quality/organization status, 3) Information quality/problem handling, 4) Cost of information quality as a percent of revenue, 5) Information quality-improvement actions, and 6) Summation of company information quality posture (Crosby, 1979, p. 21). Within each dimension, the entity under evaluation must meet certain requirements in order to progress to the next stage—ultimately progressing to the certainty stage within each dimension. The QMMG meets all of the four criteria previously mentioned for a quality maturity model and provides

a very good basis of comparison for what a sound maturity model should look like based on the IST criteria, even though it was one of the first maturity models introduced to the business world.

Carnegie Mellon's Software Engineering Institute (SEI) developed the Capability Maturity Model Integration (CMMI). The SEI-CMMI is a collection of best practices that help organizations improve their software development processes. The CMMI was originally developed as a joint venture by a product team from industry, government, and SEI for the application of process improvement in the development of products and services covering the entire product lifecycle—from conceptualization through maintenance and disposal (SEI, 2009). The SEI-CMMI recognizes three critical dimensions of an organization, as depicted in Figure 1 below.

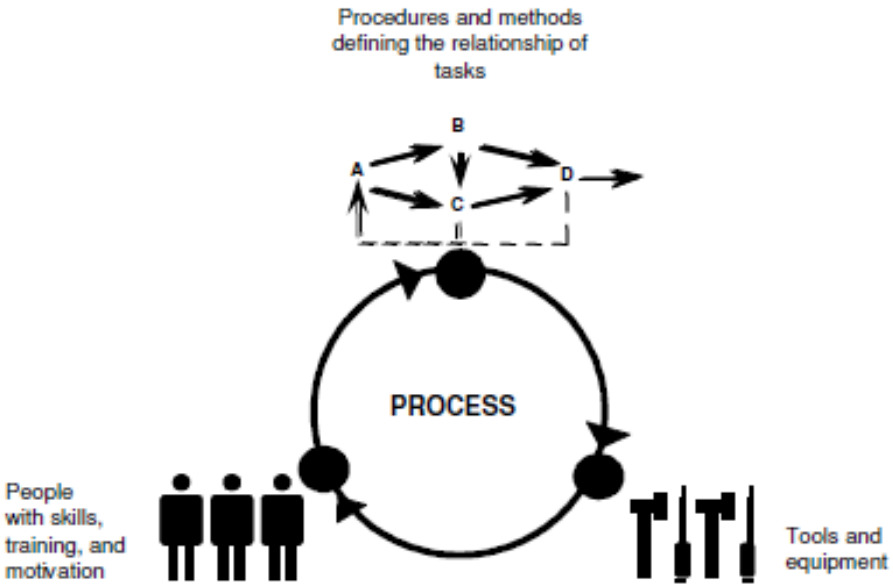


Figure 1. SEI-CMM
(From: SEI, 2009, p. 4)

As the graphic depicts, process is what ties the three critical dimensions together.

The SEI-CMMI uses five maturity levels to evaluate an organization's software development process maturity. These levels are as follows.

- Level 1: Initial—processes are considered Ad-Hoc and occasionally chaotic.
- Level 2: Managed—project's processes define a project strategy, create project plans, and monitor and control the project to ensure the service/product is delivered as planned.
- Level 3: Defined—service providers use defined processes for managing projects.
- Level 4: Quantitatively Managed—service providers establish quantitative objectives for quality and process performance and use them as criteria in managing processes.
- Level 5: Optimizing—an organization continually improves its processes based on a quantitative understanding of the common causes of variation inherent in processes (SEI, 2009).

The SEI-CMMI also meets the aforementioned IST criteria of a sound maturity model. The model gives definitive criteria for advancing through each level. The fact that this model has been used successfully throughout the world in improving organizational processes is a testament to its effectiveness.

Siemans' Knowledge Management Maturity Model (KMMM) is a structured tool used to assess an organization's level of knowledge management. The levels contained in this model are based on the SEI-CMMI. The names of each level are similar to those in the SEI-CMMI; however, by venturing into the domain of knowledge management, Siemans' KMMM represents a completely new idea.

The KMMM is composed of an analysis model, a development model, and a defined assessment process. As Karsten Ehms and Manfred Langen state in their 2002 paper,

> The analysis model helps the KMMM consultant to take account of all important aspects of knowledge management and reveals *which* key areas and topics should be developed in the future. The development model provides information as to *how* the respective

> key areas and topics can be best developed to reach the next maturity level. The assessment process structures all relevant steps from assessment definition to result interpretation. (Ehms & Langen, 2002, p. 2)

The KMMM allows for qualitative and quantitative data pertaining to knowledge management within an organization.

The development model contains five maturity levels of knowledge management. These are defined as follows.

- Initial—KM Activities are non-systematic and Ad-Hoc. No language exists for describing organizational phenomenon from a knowledge point of view.
- Repeated—Pilot projects and single activities are labeled as KM.
- Defined—Standardized processes make creation, sharing and use of knowledge different from other organizations.
- Managed—Creation, sharing and usage of knowledge is organizationally integrated and improved.
- Optimizing—KM is developed continuously and self-organized by different departments within an organization (Ehms & Langen, 2002).

The KMMM suggests that organizations concentrate on reaching the next higher maturity level. This model does not allow for skipping a level; an organization must first improve its weak areas before it can move on to a more advanced level.

After a maturity leveled is assessed in the development model, the next step in the KMMM is the application of the analysis model. The analysis model allows for the classification of four "key distinctions." These distinctions help define an initial assignment of organizational phenomena and activities; the distinctions lead to a rough classification within one of Siemens' eight key areas of knowledge management (Ehms & Langen, 2002). These key distinctions and key areas are shown in the table below.

Table 1. Knowledge Management Key Distinctions and Key Areas
(From: Ehms & Langen, 2002, p. 3)

Perspective	Key distinction				Key area pair		
Time horizon	strategic	vs.	operative	→	Strategy, Knowledge Goals	vs.	Leadership, Support
Knowledge	external	vs.	internal	→	Environment, Partnerships	vs.	Knowledge Structures, Knowledge Forms
Actor	people	vs.	technology	→	Staff, Competencies	vs.	Technology, Infrastructure
Rules	informal	vs.	formal	→	Cooperation, Culture	vs.	Processes, Roles, Organization

After application of the analysis model, the KMMM calls for an assessment process based on the developmental and analysis models. In the assessment process, maturity ratings for individual topics are condensed into a single maturity level for each key area. The maturity levels of the eight key areas are represented in a polar diagram that produces the organization's maturity profile. This profile provides the organization with indications for key areas to be developed and the maturity level at which they should initially aim (Ehms & Langer, 2002).

In this section, we have discussed three maturity models. These models provide a basis of comparison for the Contract Management Maturity Model. Additionally, the three models discussed here provide an evolutionary perspective for how maturity models were first standardized and how they are constructed and applied today. We will now examine the Contract Management Maturity Model to see how it is similar to the previously discussed models and the unique role it plays in organizational assessment.

D. CMMM Background Information

The research team chose to use the Contract Management Maturity Model (CMMM) and the associated Contract Management Maturity Assessment Tool (CMMAT) to assess USSOCOM's contract (procurement) management processes. The researchers chose the CMMM because it was specifically designed to assess the capability and maturity of an organization's contract

management processes (Rendon, 2003). This model is relevant to USSOCOM, as it is one of the few Major Commands with acquisition authority. Additionally, with an acquisition budget of over $1.6 billion (USD), USSOCOM has the task of quickly acquiring everything its customers (Soldiers, Sailors, Airmen, and Marines) need to accomplish its highly complex missions, all at a reasonable cost (GAO, 2007a).

Before discussing the details of the CMMM and CMMAT, we must first review common definitions. A contract, for purposes of this research, is "a relationship between two parties, such as a buyer and a seller that is defined by an agreement about their respective rights and responsibilities" (Garrett, 2007, p. 390). Contract management is "the art and science of managing a contractual agreement(s) throughout the contract management process" (p. 390). Maturity (again, for purposes of this research) is defined as "a measure of effectiveness or capability in a specific process" (Garrett & Rendon, 2005b, p. 48). Finally, Garrett and Rendon (2005a) define the CMMM and CMMAT as follows. CMMM—"A research-based model designed to enable a buying or selling organization to assess [its] contract management process capability, in comparison to benchmarked best practices," and CMMAT—"A research-based survey tool composed of two 60-question surveys, one for buying organizations and one for selling organizations, to assess contract management capabilities" (p. 270).

As stated in the definition, the CMMM can be used to analyze an organization from the buyer or seller's perspective. In our study, USSOCOM is analyzed from the buyers' perspective. The CMMM utilizes six key process areas when analyzing an organization from the buyer's perspective. These areas are 1. Procurement Planning, 2. Solicitation Planning, 3. Solicitation, 4. Source Selection, 5. Contract Administration, and 6. Contract Closeout.

Procurement Planning is “the process of identifying which business needs can be best met by procuring products or services outside the organization” (Garrett & Rendon, 2005a, p. 55). The Procurement Planning key process area includes such activities as requirements analysis, acquisition planning, stakeholder analysis, market research, outsource analysis, and business case analysis.

Solicitation Planning is “the process of preparing the documents needed to support the Solicitation” (Garrett & Rendon, 2005a, p. 55). Solicitation Planning includes the activities of determining the procurement method, evaluation strategy, contract type/incentive and terms and conditions. Additionally, contracting personnel will document the competition environment and develop the Solicitation documents in this key process area.

Solicitation is “the process of obtaining information (bids and proposals) from prospective sellers on how project needs can be met” (Garrett & Rendon, 2005a, p. 55). Activities within the Solicitation key process area include advertizing procurement activities, conducting conferences, such as pre-Solicitation and pre-proposal, and amending Solicitation documents as required.

The Source Selection key process area is “the process of receiving bids or proposals and applying evaluation criteria to select a provider” (Garrett & Rendon, 2005a, p. 55). During Source Selection, contracting personnel conduct the following: evaluate proposals, apply evaluation criteria, negotiate contract terms, select a contractor and manage protests, disputes, and appeals.

Contract Administration is the next key process area and it is “the process of ensuring that each party’s performance meets contractual requirements” (Garrett & Rendon, 2005a, p. 55). Activities in this key process area consist of conducting conferences (post-award, pre-performance), complying with contract terms and conditions, managing government furnished property, monitoring the

contractor's management of subcontractors, monitoring and measuring contractor performance, managing the contract change process, managing the contractor payment process, and managing protests, disputes and appeals.

The final key process area is Contract Closeout. Contract Closeout is "the process of verifying that all administrative matters are concluded on a contract that is otherwise physically complete" (Garrett & Rendon, 2005a, p. 55). The following activities take place during the Contract Closeout key process area: verifying contract completion, verifying contractor compliance, ensuring contract completion is documented, making final payments, processing contract terminations (if applicable), disposing of buyer-furnished property/equipment and processing Contract Closeout procedures.

The CMMM uses a small purposive sample from an organization because it is only focused on the organization's contract management processes (Garrett & Rendon, 2005a). Thus, only individuals knowledgeable of the organization's contract management processes should take the survey. The CMMM is only administered to warranted contracting personnel who are *Defense Acquisition Workforce Improvement Act (DAWIA)* Level II-Contracting certified. According to Nash, Schooner, and O'Brien's *Government Contract Reference Book*, "warranted contracting officers are specially designated employees of the U.S. Government with the authority to bind the government legally by signing a contract instrument" (Garrett & Rendon, 2005a, p. 78). According to the 1995 DoD 5000.52 instruction memorandum, for personnel to be DAWIA Level-II Contracting certified, they must hold a Bachelor's degree with at least 24 credit hours in business administration courses, complete the required DoD contracting and acquisition courses, and have at least two years of contracting experience (Garrett & Rendon, 2005a, p. 78).

As stated previously, the CMMAT is a 62-question survey. The 62 questions are divided evenly among the six key process areas with each area having 10 questions except for the key process areas of Source Selection and

Contract Administration, which have 11 questions. These questions are evaluated using a Likert scale, with responses ranging in value from 1 (Never) to 5 (Always). The answer of “Don’t Know” is also an option; it has a numerical value of 0. Each individual response is recorded and totaled for each question. Each question total is then divided by the total number of survey participants to create a mean score per question. These scores are then added together to obtain a maturity-level score for each key process area.

The maturity scores for each of the key process areas are categorized into one of five levels. These levels are (from lowest to highest): Ad-Hoc, Basic, Structured, Integrated, and Optimized. The following paragraphs contain a complete narrative description for each of the CMMM maturity levels.

The Level 1 (Ad-Hoc) maturity level “acknowledges that contract management processes exist, that these processes are accepted and practiced throughout various industries, and the organization’s management understands the benefit and value of using contract management processes” (Garrett & Rendon, 2005a, p. 53). Although some established contract management processes and informal documentation of contract management processes may exist within the organization, they are only used on a sporadic basis (Garrett & Rendon, 2005a). Additionally, “organizational managers and contract management personnel are not held accountable for adhering to, or complying with, any contract management processes or standards” (Garrett & Rendon, 2005a, p. 53).

The Level 2 (Basic) maturity level states that “some basic contract management processes and standards have been established within the organization, but are required only on selected complex, critical, or high-visibility contracts, such as contracts meeting certain dollar thresholds, or contracts with certain customers” (Garrett & Rendon, 2005a, p. 53). Within this maturity level, “some formal documentation has been developed for established contract management processes and standards;” however, “the organization does not

consider these contract management processes or standards institutionalized throughout the entire organization (Garrett & Rendon, 2005a, p. 53). Additionally, the organization does not have a policy requiring the consistent use of contract management processes or standards other than on the required contracts mentioned above (Garrett & Rendon, 2005a).

The Level 3 (Structured) maturity level states that "contract management processes and standards are fully established, institutionalized, and mandated throughout the entire organization" and that "formal documentation has been developed for contract management processes and standards" (Garrett & Rendon, 2005a, p. 53). Level 3 also states that "since these contract management processes are mandated, the organization allows the tailoring of processes and documents, allowing consideration for the unique aspects of each contract" (Garrett & Rendon, 2005a, p. 53). Also at this level, "senior management is involved in providing guidance, direction, and even approval of key contracting strategy, decisions, related contract terms and conditions, dollar value and type of requirement (product or service)" (Garrett & Rendon, 2005a, p. 53).

The Level 4 (Integrated) maturity level is the first maturity level in which "the procurement project's end-user is an integral member of the procurement team" (Garrett & Rendon, 2005a, p. 53). Also at this level, "basic contract management processes are integrated with other organizational core processes, such as cost control, schedule management, performance management, and systems engineering" (Garrett & Rendon, 2005a, p. 53). Additionally, management within the organization use "efficiency and effectiveness metrics to make procurement-related decisions" and management also "understands its role in the procurement management process and executes the process well" (Garrett & Rendon, 2005a, p. 53).

The Level 5 (Optimized) maturity level is the highest maturity level that an organization can achieve. Within this maturity level, the "contract management processes are evaluated periodically using efficiency and effectiveness metrics" and "continuous process improvement efforts are implemented to improve the contract management process" (Garrett & Rendon, 2005a, p. 53). At this maturity level, the organization also demonstrates that "lessons learned and best practice programs are implemented to improve the contract management processes, standards, and documentation" and that "procurement process streamlining initiatives are implemented" (Garrett & Rendon, 2005a, p. 53).

The CMMM has been used successfully in DoD, international and private industry organizations. These organizations include, but are not limited to the Oklahoma City Air Logistics Center, the Naval Facilities Engineering Command, Ogden Air Logistics Center, Space and Missile Systems Center, and the United Nations. Each time, the CMMM has provided decision-makers valuable insight into their organization's contract management process capability by providing quantitative feedback on the organization's contract management process maturity level. The CMMM also provides organizations with recommendations for areas of improvement and how to progress to the next maturity level within the model. It should be noted that CMMM results should be validated by document reviews within the organization.

Table 2 depicts the CMMM results from Ogden Air Logistics Center. The table depicts the assessment of five procurement divisions; the 508th, the 84th, the 75th, the 526, and the procurement directorate (PK). This example shows how the CMMM ranks an organization's divisions on the maturity scale. Once the leaders of an organization see where each of their procurement divisions ranks on the maturity scale, it is easy for them to work with the CMMM survey consultants to implement their recommendations for improving their organization's contract management processes.

Table 2. Ogden ALC Key Process Areas
(From: Moats, Sheehan & VanAssche, 2007, p. 26)

CONTRACT MANAGEMENT MATURITY MODEL©						
MATURITY LEVELS	CONTRACT MANAGEMENT KEY PROCESS AREAS					
	Procurement Planning	Solicitation Planning	Solicitation	Source Selection	Contract Admin	Contract Closeout
5 Optimized						
4 Integrated						
3 Structured	84 75 508 526 PK	84 75 52 PK	75 PK 84	84 75 526 PK	84 75 526 PK	84 75 526 PK
2 Basic		508	508 526	508	508	
1 Ad Hoc						508

E. Acquisition Workforce Sustainment

As we evaluate USSOCOM's contract management processes, it is also necessary to examine other factors that may contribute to process maturity. A key factor that may influence process maturity at USSOCOM is its ability to sustain and build a base of qualified acquisition workforce personnel. This section explores what recent literature states concerning these aspects of what DoD commonly refers to as "human capital."

In July of 2007, Under Secretary of Defense for Acquisition Technology and Logistics (AT&L) published version 3.0 of its *Human Capital Strategic Plan*. This document is the latest version of a detailed plan that outlines how the USD(AT&L) plans to deal with three distinct workforce challenges.

- Potential loss of retirement-eligible personnel and their knowledge
- Understanding the differences in workforce generations
- The depleting U.S. workforce pool with increasing competition for talent (USD(AT&L), 2007, p. 10)

The research evaluation of USSOCOM is concerned with the first challenge listed above. Specifically, the research is concerned with the loss of personnel and how USSOCOM is retaining knowledge within its procurement divisions. Figure 2 clearly shows there is a future potential gap in the USD(AT&L) workforce as a whole. This research takes a deeper look to see if this potential gap also applies to USSOCOM.

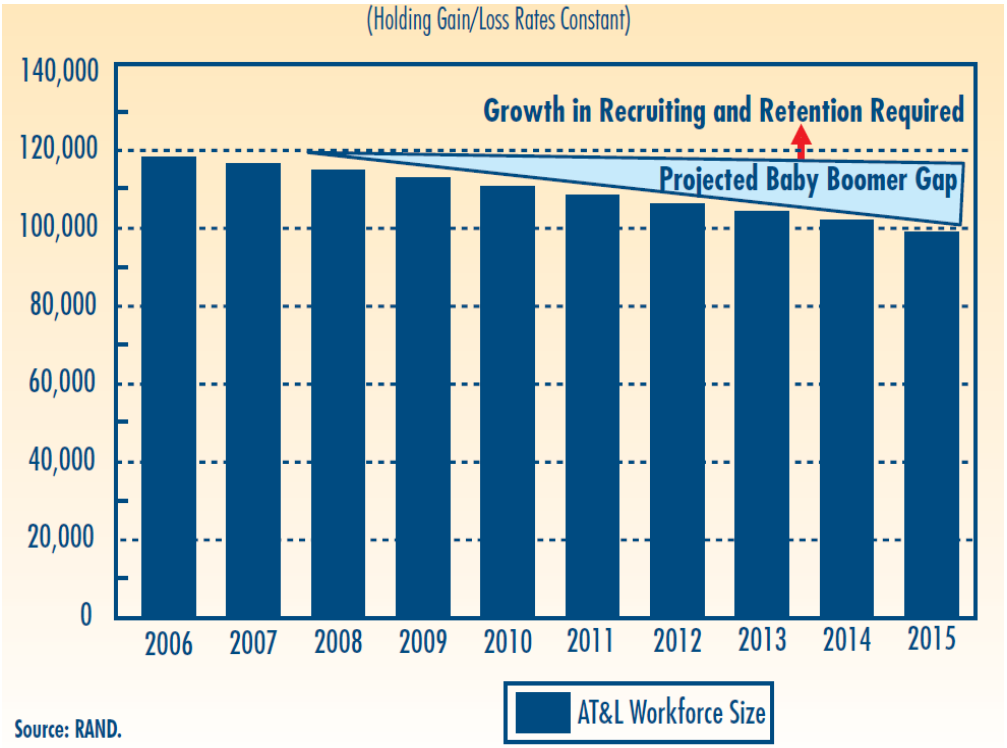


Figure 2. Projected AT&L Civilian Workforce Gap
(From: RAND, as cited in USD(AT&L), 2007, p. 10)

Recent and relevant GAO reports do allude to a potential personnel shortage among USSOCOM's AT&L workforce. First, in a July 2006 report, the GAO states the following.

> [T]he Commander of the Special Operations Command is responsible for training assigned special operations forces, and developing and acquiring special operations-peculiar equipment. Accordingly, the Command believes that it has a commensurate need for additional headquarters staff to perform these responsibilities to support the increased number of war-fighters necessary to win the Global War on Terrorism. (GAO, 2006, p. 15)

While this statement alludes to a future potential shortage in acquisition workforce personnel at USSOCOM to fulfill potential future mission requirements, the GAO is even more specific in a 2007 report when it states that:

> USSOCOM has encountered workforce challenges such as being able to hire civilian personnel in reasonable time frames […] USSOCOM plans to expand its governmental acquisition workforce to about 300 employees [from the current 185 employees]. Currently, the governmental workforce is heavily supplemented by contractors. Specifically, contractors comprise about two-thirds of the overall workforce supporting USSOCOM's acquisition activities. The contractor support includes logistics, training, education, and testing support, and engineering and technical services. In order to prepare for the upcoming workforce expansion, USSOCOM is conducting a manpower study. The study, which is scheduled to be completed in fiscal year 2008, is designed to assess the composition of the workforce and determine workloads associated with each USSOCOM position—including all acquisition positions—to aid USSOCOM officials in their placement of newly hired government employees. Also, to lower costs, USSOCOM's acquisition executive anticipates a reduced reliance on contractors in conjunction with the expansion of the governmental acquisition workforce. (GAO, 2007a, p. 24)

The GAO reports allude not only to potential acquisition workforce losses at USSOCOM, but also challenges in training newly hired acquisition personnel. Our research aims to provide potential means to mitigate these potential future problems by examining USSOCOM's mentorship/information-sharing processes within its procurement directorates.

F. Mentorship/Information-Sharing Literature Review

Mentorship and information sharing are a part of a dynamic, rapidly growing segment in today's business world. That segment is knowledge management. This concept has been around since the early 1990s, but has quickly become an essential focal point for an organization's competitive advantage.

A definition of knowledge management that is highly applicable is from Walczak (2005, pp. 330–331): "knowledge management is not really about managing knowledge, but rather managing and creating a corporate culture that

facilitates and encourages the sharing, appropriate utilization, and creation of knowledge that enables a corporate strategic competitive advantage." Sandra Kerka with Educational Resources Information Center defines mentorship as "a relationship between an experienced and a less experienced person in which the mentor provides guidance, advice, support and feedback to the protégé" (Kerka, ERIC No. 194, 1998, p. 2). Hendriks (1999, p. 92) explains that "knowledge sharing presumes a relation between at least two parties, one that possesses knowledge and the other that acquires knowledge. The first party should communicate its knowledge, consciously and willingly or not, in some form or other (either by acts, by speech, or in writing, etc.)." This research links contract management process maturity, mentorship and information sharing with process improvement.

Table 3. Paradigms in Knowledge Management
(From: Lloria, 2007, p. 81)

Old paradigm	New paradigm
Organization discipline	Organizational learning
Vicious circles	Virtuous circles
Inflexible organizations	Flexible organizations
Management administrators	Management leaders
Distorted communication	Open communication
Strategic business units drive product development	Core competencies drive product development
Strategic learning occurs at the apex of the organization	Strategic learning capacities are widespread
Assumption that most org members are untrustworthy	Assumption that most org mbrs are trustworthy
Most organization members are disempowered	Most organization members are empowered
Tacit and local knowledge of most members of the organization must be disciplined by managerial prerogative	Tacit and local knowledge of all members of the organization is the most important factor in success, and creativity creates its own prerogative

Table 3 shows succinctly how knowledge management has evolved and how mentorship and information sharing play a part in its existence. Further explanation from Lloria states that "knowledge management is a broad concept and is made up of *different* categories (which are of great importance for this research) among them: knowledge creation, development, sharing and application" (Lloria, 2007, p. 79). The understanding of knowledge management is paramount to linking mentorship and information sharing with the contract management process assessment. These two parts are critical to a contracting unit's process improvement.

1. Age Matters in Mentorship/Information Sharing

To take full advantage of mentorship and information-sharing, one must analyze the demographics of the workforce. Since so much information is cross-generational, from long-tenured to younger employees, an understanding of different learning styles based on age facilitates the process. By understanding generational learning preferences and adapting how knowledge is conveyed, leaders can make a difference between merely harvesting knowledge and actually using it (Piktialis & Greenes, 2008). This is a perfect way for organizations to utilize those personnel that are close to retirement or those who are not, but have the majority of the experience to share.

There are four generations in the workplace today with distinct learning styles.

- **Matures or Veterans (born 1925-1945) and Baby Boomers (born 1946-1964)—**They were educated through formal classroom instruction and by reading printed text and remain comfortable with both. They are verbally adept.
- **Gen X-ers (born 1965-1979)**—Adapt easily to both formal and informal learning, although they strongly prefer the latter. Their highest priority is for action learning in the workplace, where they are finding real solutions to real problems. Having adopted computers in their adolescence, these employees are more visual than verbal.

- **Gen Y-ers or Millennials (born 1980-1995)**—Referred to as "digital natives," they were born into the computer world. They want to do, not be told. Jumping right in, trial and error, and connectivity are hallmarks of this generation. They value group and team learning and connect through new social media, from blogs to virtual collaboration environments. (Piktialis & Greenes, 2008, pp. 9–10)

Frank Budd states that in his Air Force perspective on mentoring, "many of the mentors are baby boomers and many of the mentees are from Generation X" (Budd, 2007, p. 18). Technology has created a larger gap between the outgoing and incoming workforces than employers have ever experienced. Employers need not build generational considerations into every aspect of information sharing in their organization, but adaptations should be made when the receiver is likely to have specific generational learning preferences. Companies considering or using knowledge-transfer processes should assess their readiness for Instant Messaging, blogs, wikis, RRS feeds, podcasts and virtual realities (Piktialis & Greenes, 2008). Thus, generations learn differently; to assume these generations will automatically overcome this barrier is naïve. Information sharing can be a great multiplier of success for a unit or company. By addressing these concerns, leaders may lure members who were once reluctant to mentor or train others to start a mentoring program.

2. Mentorship Studies

This research highlights those aspects mentorship that apply to process improvement and information sharing. Mentoring has been seen as a need in the federal government at least as far back as 1999, when Army Major General Lon Maggart stated, "Leadership success in the immediate future will depend on mentoring more than any other process" (Budd, 2007, p. 16).

In a recent article in *Defense Daily* that discusses President Obama's *Weapon Systems Acquisition Reform Act of 2009*, a former Under Secretary of Defense for Acquisition and Technology (Paul Kaminski) is quoted as saying that:

> we will find ourselves hiring a number of junior people, and we have to give some attention to our mentoring process to be able to train, educate and build domain experience […] and that takes time and an organized effort to do […] It's building the right experience base over time […] Mentoring programs are needed. (Rutherford, 2009, p. 1)

President Obama's new law, in effect, tells the acquisition community to do what they should be already doing. Policy analysts are of the same opinion as the President. In that same *Defense Daily* article, Travis Sharp, a military policy analyst at the Center for Arms Control and Non-Proliferation in Washington, is cited: "The Pentagon doesn't need new rules; the Pentagon needs to enforce the rules that already exist" (Rutherford, 2009, p. 3).

It is this intense scrutiny that will help federal organizations shed more light on mentoring and utilizing the experience of their members before they retire. Piktialis and Greenes (2008) discuss the purpose of mentoring, as it "facilitates the transfer of a wide range of knowledge between people from different but related backgrounds, generations, or departments" (p. 47). This pertains to any contracting organization, as all are made up of a considerably older, more experienced workforce that is prime for mentoring relationships. Further, applying it to the contracting community, Piktialis and Greenes explain,

> Mentorship is a dynamic, reciprocal relationship in a work environment between an advanced career incumbent (mentor) and a novice (mentee) aimed at promoting the career development of both. Mentoring encourages a mentee to manage his or her own career growth, maximize potential, develop skills, and improve performance. (Piktialis & Greenes, 2008, p. 47)

In a report from the Educational Resources Information Center (ERIC No. 194, 1998), Sandra Kerk states that,

> In the past, mentoring typically just "happened" as experienced people recognized and developed new talent or as new beginners sought the counsel of knowledgeable elders [...] a new mentoring paradigm describes today's protégé's as better educated but still need a mentor's practical know-how and wisdom that can only be acquired by experience. (Kerka, 1998, p. 2)

The federal workforce may age; however, older generations have experience. An organization cannot immediately replace job experience if members retire or find other employment opportunities. The aging federal workforce further highlights the need for mentoring programs in DoD communities, whether such mentoring is formal or informal.

Organizations may have varying ways to identify whether a mentoring program is formal or informal. Management Mentors, Inc., (a leader in designing and implementing corporate mentoring programs for over 20 years) discusses these differences on its Web site.

Formal mentoring programs include the following.

- Connection to a strategic business objective of the organization
- Established goals
- Measurable outcomes
- Open access for all who qualify
- Strategic pairing of mentors and mentees
- Mentoring engagements lasting 9–12 months
- Expert training and support
- Direct organizational benefits

Informal mentoring programs include the following.

- Unspecified goals
- Unknown outcomes
- Limited access to the program

- Self-selection of mentors and mentees
- Long-term mentoring
- No expert training or support
- Indirect organizational benefits (Management Mentors, 2009)

There are many differences between a formal mentoring program and an informal one, much like there are a wide variety of actions that mentor/mentees can take in both programs. However, "mentoring should be kept informal only when there are documented performance outcomes demonstrating that mentoring is happening and is happening in an effective manner […] The danger of informal mentoring programs is that mentoring is happening in the mind of the mentor and not in the behavior of the mentee" (Budd, 2007, p. 21).

To show just how positive a mentoring program can be, the American Society for Training and Development conducted a study. One of the findings of that research states:

> When a supervisor states an expectation for a change in behavior, […] as many as 18% do the opposite behavior and as many as 37% do nothing different at all. However, with training added in, productivity increased 24% [...] but when combined with mentorship, the study found productivity increased by 88%. This shows significant improvement when mentorship is part of the organization. (Business Mentor Center, 2009)

Other tips that will increase growth are "give every high performer a mentor, identify the development of others as a key skill for a successful manager, and recognize and reward managers and individual contributors for their commitment to mentoring" (Piktialis & Greenes, 2008, p. 48).

3. Knowledge Management Models

The following models describe some of the basic tenets of knowledge management and information sharing. These models are very similar, but they do have key differences between them.

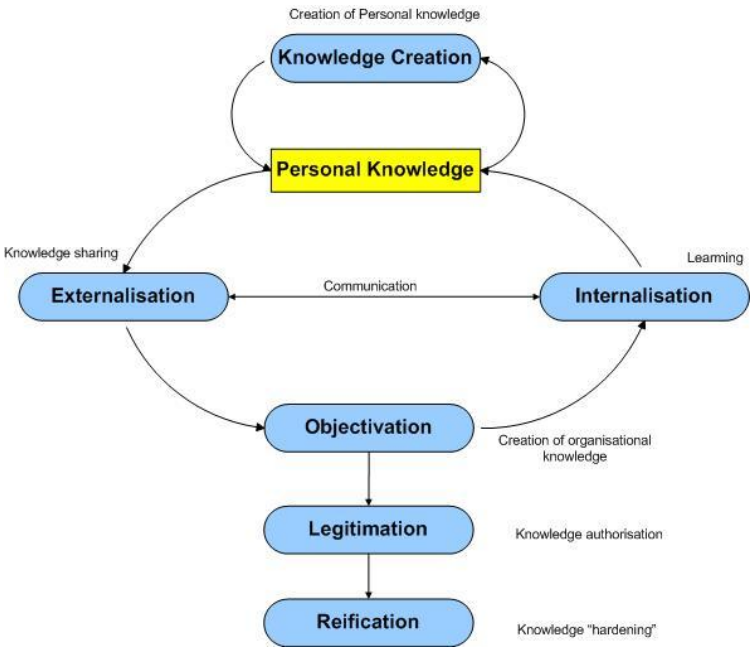


Figure 3. The Knowledge Sharing Model
(From: Jackson & Klobas, 2007, p. 331)

The Jackson and Klobas Knowledge Sharing Model relates to contract management processes in that personal knowledge is what is shared. A member learns how to complete a certain task and through the stages of this model, the information is then compared to what the group knows. The information is then shared with others. This ensures that valid information is passed from the group to others. Jackson and Klobas further define the aspects of their model here.

> **Personal knowledge**, what an individual knows, consists of "typifactory schemes," which are the frameworks used to interpret and make sense of the actions of other people and the physical world and recipe knowledge, which is "know–how," or "knowledge limited to pragmatic competence in routine performance". This personal knowledge is constructed through a number of processes, the major ones being: **Internalization**, which describes the absorption of knowledge by a recipient. **Personal knowledge creation**, which can be done through habituation (the development of knowledge into useful routines through repetition of work or tasks) or transformations. **Externalization**, is the expression of knowledge in a symbolic form such as speech, artifacts or gestures into the physical world, such that others can perceive and internalize it. **Objectivation** is the creation of shared social constructs that represent a group's, rather than an individual's, understanding of the world. This objective knowledge is "stored" in physical symbols such as language,

behavior or artifacts which are endowed with social significance and which can be shared. **Legitimation** is a process whereby knowledge is authorized by people or groups who have power, and meanings are validated and accepted as "correct" or "standard" by others. **Reification** is "the apprehension of human phenomena . . . as if they were things." (Jackson & Klobas, 2007, p. 331)

Figure 4. The Knowledge Life Cycle
(From: Access Systems Consulting, 2009, p. 1)

Meyer and Sugiyama (2007, p. 19) ask "who differentiates between implicit (produced by action) and explicit (produced through communication) knowledge?" As Figure 4 shows above, when explicit information is accessed and is acted upon, it turns into implicit knowledge for a person or group. When that implicit knowledge is then stored in a format that is accessible to others, it returns to explicit information, ready to be used by others (Access Systems Consulting, 2009, p. 1). This diagram illustrates one of the critical parts of the knowledge-sharing process: that it does not stop flowing.

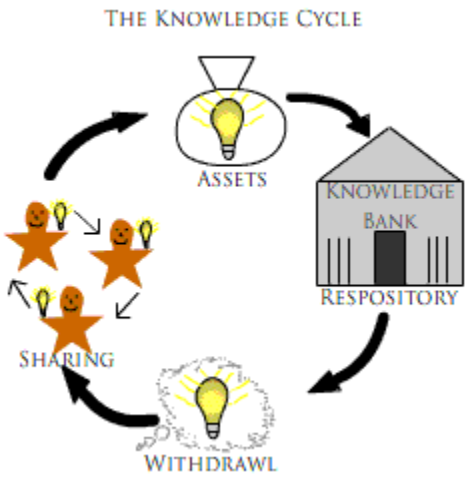


Figure 5. The Knowledge Cycle
(From: Anderson, 2006, p. 2)

Figure 5 focuses on information sharing as it applies to contract management processes. A member gets the asset (information), stores it until needed, then withdraws it and shares it with others—only to begin the cycle again if someone else requires that knowledge. This knowledge is shared repeatedly. In contract management, many people may need some information (i.e., a certain type of contract action) for reference. In accordance with Anderson's Knowledge Cycle, a contracting officer with information regarding certain types of contract actions could repeatedly share that information with members of his or her contracting team.

4. Need for Information Sharing

Information sharing may help a company to increase its position in the marketplace. As mentioned previously, information sharing affects an organization's quest for competitive advantage. As our society gets more complex, so does our need for information and the need to share it. Per Kock (1999, p. 46),

> The use of knowledge is building as our society becomes more and more complex […] As knowledge becomes more specialized, so does the need for information and knowledge sharing, which can be achieved through oral and written communication among those who possess different

pieces of specialized knowledge. This need is motivated by the fact that even though knowledge has grown very specialized (or precisely because of it) most processes in society require the engagement of several individuals, each of them contributing their own expert knowledge.

The following chart explains knowledge exchanges and information exchanges and whether they are routine processes or improvement processes (non-routine).

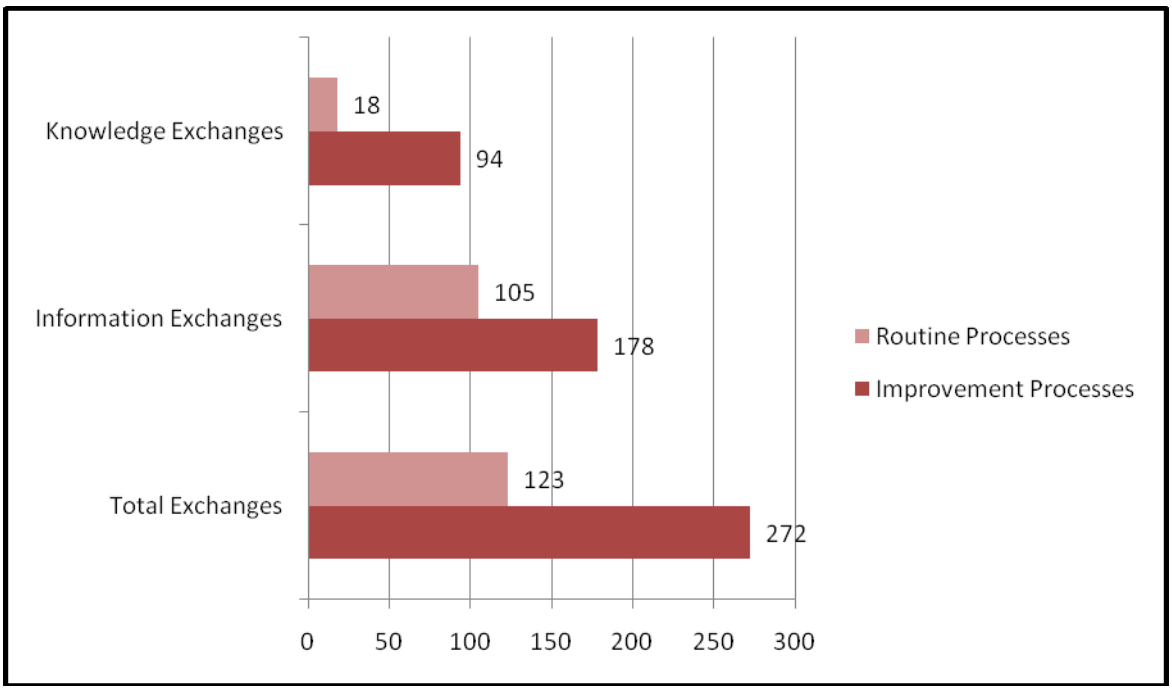


Figure 6. Knowledge and Information Flowing across Different Types of Processes
(From: Kock, 1999, p. 52)

This chart shows that interactions between individuals are more than just simple information exchanges. They are about improving processes. People are sharing information.

Huseman and Goodman (1998, p. 184) state that:

> There is no *right* way to transfer knowledge. It could be training, coffee breaks, or Internet-distributed databases, depending on the unique cultural and systematic factors at work in the organization. Davenport and Prusak tell the story of when companies started to move away from mainframe computers. IBM suddenly needed to reinvent itself, and employees were thrust into a time of great change. Then-chairman John Akers upbraided employees in a memo to stop congregating at water-coolers and get back to work. In fact, the workers were exchanging knowledge, trying to come up with means for making the transition.

According to Piktialis and Greenes (2008), there are 15 methods to transfer information. Each of these methods can be used when the opportunity is appropriate. One method does not fit all situations. These methods are listed in Table 4.

Table 4. Methods for Information Transfer
(From: Piktialis & Greenes, 2008, p. 24)

1. Action Review (simple team-learning process while the work is being performed)
2. Blogs
3. Communities of Practice
4. Instant Messaging
5. Knowledge Capture (book, Web site, or an online knowledge asset)
6. Knowledge Elicitation (gathers knowledge that others might find useful)
7. Knowledge Distillation (gathers data from conversations, interviews, etc.)
8. Knowledge Self-capture (documented personal knowledge, lessons learned)
9. Leadership Transition Workshop
10. Mentoring
11. Peer Assist
12. Podcasts
13. Retrospect (team meeting held after an event)
14. Storytelling (water-cooler conversation)
15. Wikis (web pages for people to add knowledge, Wikipedia.org)

Some of these methods are very important: mentoring, peer assisting and communities of practice. The key for sharing information is actually to engage in it. Information does no good if one person has it all.

G. Summary

This chapter discussed the value of using assessments to understand an organization's contract management processes. This chapter discussed why the CMMM and CMMAT are used to assess an organization's contract management process maturity. Additionally, the background of the CMMM and different maturity models were discussed. This chapter also discussed USD (AT&L) personnel workforce issues and potential USSOCOM issues with their acquisition workforce personnel. The final portion of this chapter discussed the background of information sharing and mentorship and the ways in which these areas may help organizations. Chapter III will discuss USSOCOM, its procurement organization and why it was chosen for this research.

III. USSOCOM Special Operations Acquisition and Logistics Center, Directorate of Procurement (SOAL-K)

A. Introduction

This chapter discusses the organization and mission of USSOCOM SOAL-K and why an assessment of their contract management maturity processes is important. Additionally, this chapter discusses how SOAL-K derives its contracting authority and how participants for this research were selected.

B. USSOCOM SOAL-K

MacDill AFB, in Tampa, FL, is home to U.S. Special Operations Command (USSOCOM). USSOCOM was formally established as a unified combatant command at MacDill AFB, FL, on 16 April 1987, and is commanded by a four-star general with the title of Commander in Chief, United States Special Operations Command (USCINCSOC). USSOCOM, one of nine unified commands in the U.S. military's combatant command structure, is composed of Army, Navy, and Air Force SOF (Special Operations Forces). USSOCOM's mission is to support the geographic Commander in Chief (CINC), ambassadors and their country teams, and other government agencies by preparing Special Operations Forces (SOFs) to conduct special operations successfully, including Civil Affairs (CAs) and Psychological Operations (PSYOPs).

SOAL-K maintains acquisition support for USSOCOM. The official mission statement of SOAL-K reflects this support: "To provide contracting and acquisition support for acquiring SOF-peculiar weapon systems, equipment, and services in direct support of the Overseas Contingency Operation(s) (OCO)" (USSOCOM, 2009). SOAL-K further states that they accomplish this by "utilizing the most innovative, streamlined, and expedited acquisition practices available, while maintaining strict compliance with required statutes and regulations" (USSOCOM,

2009). The directorate has 20 contracting offices located throughout the continental United States. Each office provides support to a particular USSOCOM Program Executive Officer, Headquarters Directorate, service component, or unit. The Directorate of Procurement Headquarters is co-located with Headquarters, USSOCOM in Tampa, FL, and directly supports the Acquisition Executive, the Acquisition and Logistics Center, and other headquarters centers. The Directorate of Procurement also manages continuous contingency contracting operations in support of Operations Iraqi Freedom, Enduring Freedom, and the OCO (USSOCOM, 2009).

The support functions SOAL-K performs include competition advocate, small business advocate, procurement management, headquarters procurement, and field assistance. In providing support for USSOCOM, SOAL-K procures myriad goods and services. In fiscal year (FY) 2007 alone, SOAL-K spent $737 million on goods and $1.143 billion on services. These services include Research and Development ($149.6 million), Equipment-related Services ($425.8 million), Knowledge-based Services ($563.7 million), Medical Services ($1.5 million), Construction Services ($.2 million), Transportation Services ($1 million), and Facility-related Services ($1.9 million) (H. Register, personal communication, January 8, 2009). The goods procured by SOAL-K include such items as SILENT KNIGHT radar, Ground Penetrating Radar, Multi-role Anti-armor Antipersonnel Weapon System, Anti-structure Munitions, Advanced Lightweight Grenade Launcher, Multiband Inter/Intra Team Radio, and the Dynamic Optimal Tag System (USSOCOM (SOAL-K), 2008).

The vision of SOAL-K is “to be USSOCOM’s contracting provider of choice by delivering competent, rapid, dedicated, and innovative contracts management” (USSOCOM (SOAL-K), 2008). This vision helps narrow the focus of our research and provides insight as to which divisions of SOAL-K specifically conduct contract management. In other words, although SOAL-K provides several types of acquisition support, our focus for this research lies in the five Procurement Divisions because of their specific duties in regards to contract management. The remainder of this

section will describe the five Procurement Directorates. The data pertaining to each of the directorates comes from an internal Procurement Management Review report dated 25 January 2008 (USSOCOM (SOAL-K), 2008).

SOAL-K Headquarters (SOAL-KH) supports USSOCOM Headquarters and its components. It is composed of a Division Chief, 10 government contract specialists (CSs), and one contractor contract specialist. SOAL-KH supports numerous command-wide service contracts, such as Enterprise Information Technology; Acquisition, Logistics, Management, and Business Operations Support (ALMBOS); Foreign Language and Cultural Training; and Media. SOAL-KH primarily supports unclassified requirements, and it predominantly uses large Indefinite Delivery Indefinite Quantity (IDIQ) contracts.

SOAL-K Intelligence (SOAL-KI) supports the Program Executive Office (PEO) for Intelligence and Information Systems (PEO-IIS). It is composed of a Division Chief and seven government CSs, three contractor CSs, and one contractor general administrator. SOAL-KI supports six major programs: Communications, Psychological Operations, Recon and Surveillance, Strategic/Tactical Local Area Networks, Special Applications for Contingencies, and Intelligence. SOAL-KI supports both classified and unclassified requirements and predominantly uses IDIQ contracts (cost-plus-fixed-fee, time-and-materials, and firm-fixed-price) with a five-year period of performance.

SOAL-K Programs (SOAL-KP) supports the PEO for Special Programs (PEO-SP). It is composed of a Division Chief, six government CSs, and one contractor CS. SOAL-KP supports both classified and unclassified requirements for weapons support, equipment, and services. It predominantly uses large IDIQ contracts (cost-plus-fixed-fee, time-and-materials, and firm-fixed-price).

SOAL-K Warrior (SOAL-KR) supports Special Operations Forces (SOF) Warrior (PEO-SW). It is composed of a Division Chief, seven government CSs, and two contractor CSs. It supports several specific programs, such as SOF vehicles, SOF Equipment Advanced Requirements, SOF Weapons, and Special Operations Visual Augmentation System. SOAL-KR primarily supports unclassified requirements using predominantly large IDIQ contracts. SOAL-KR is unique from the other divisions in that it routinely performs rapid acquisition using undefinitized contract actions (UCAs) and Letter contracts.

SOAL-K Wing (SOAL-KW) supports PEO Naval Systems (PEO-NS), PEO Fixed-wing (PEO-FW), PEO Mission Training and Planning Systems (PEO-MTPS), and the Advanced Technology Directorate (SOAL-T). It is composed of a Division Chief and 11 government CSs but does not employ a contractor CS. SOAL-KW supports several specific programs, including Standoff Precision Guided Munitions, Advanced Tactical Laser, Unmanned Aerial Vehicles, Rigid Inflatable Boat, Special Operations Riverine Craft, and Small Business Innovative Research Efforts. SOAL-KW primarily supports unclassified requirements using some cost-plus-award-fee and incentive-fee type contracts. However, a majority of their requirements are supported via large IDIQ contracts.

Three of the Procurement Divisions (KP, KR, and KW) are located on MacDill AFB, FL. The other two Procurement Divisions (KH and KI) are located in separate off-base facilities in Tampa, FL. Two of the Procurement Divisions are co-located with their customer (KP and KI) (USSOCOM (SOAL-K), 2008).

C. Contracting Authority

USSOCOM received acquisition authority in 1991. Specifically, according to Title 10 *United States Code* (*USC*), Section 167, paragraph 4:

> A) The commander of the special operations command shall be responsible for, and shall have the authority to conduct, the following:

(i) Development and acquisition of special operations-peculiar equipment.

(ii) Acquisition of special operations-peculiar material, supplies, and services.

Since 1991, "the level of acquisition and contracting support required has significantly increased from the 1990s' annual average of under $400 million in contract obligations to over $2.4 billion in fiscal year 2007" (USSOCOM, 2009).

USSOCOM's acquisition authority is unique in that it is the only United States Combatant Command with acquisition authority. The other combatant commands must rely on the services for acquisition authority. This authority stems from the responsibilities placed on the commander of USSOCOM, as stated in Title 10 *USC* above. The flow of this authority is depicted in Figure 7 below:

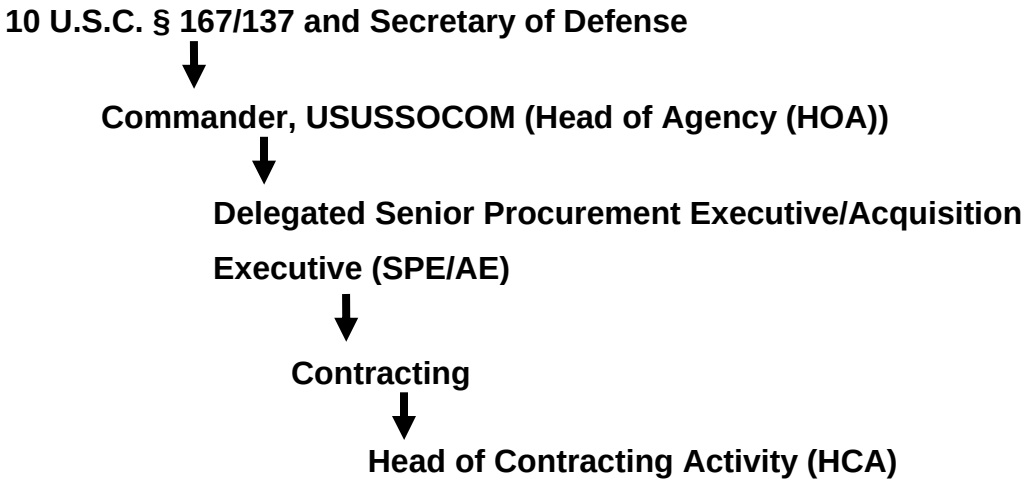


Figure 7. USSCOM Authority
(From: USSOCOM (SOAL-K), 2008, p. 4)

The chart above shows that the Commander, USSOCOM, gains his procurement authority from the Secretary of Defense. The Commander, USSOCOM, has since delegated this authority to the Acquisition Executive (AE); currently, that is Dr. Dale Uhler. The AE has further delegated all procurement authorities (to the maximum extent he can by law) to the Director of Procurement (DOP). The current

DOP is Colonel John Cannaday, and he serves as the Head of Contracting Activity (HCA). The HCA appoints and terminates all warranted Contracting Officers at all USSOCOM component contracting activities operating under USSOCOM procurement authority (USSOCOM (SOAL-K), 2008). All of the procurement divisions used in our research (SOAL-KH, KI, KP, KR, and KW) receives their procurement authority and warrants from the HCA.

SOAL-K is an excellent organization for our research because it provides the researchers with an organization that conducts a high volume of contract management and is responsible for high-dollar procurements. Additionally, the organization is large enough that our research can focus on the extent to which individuals are mentored within their current divisions.

D. Survey Participant Selection

For the purpose of our research, we chose to follow the method of using a small, purposive sample (Garrett & Rendon, 2005a). Our survey sample size for the Contract Management Maturity Model (CMMM) is 49 participants. This sample size meets the intent of the CMMM by surveying "only fully qualified Contracting Officers and their supervisors, as opposed to lower level and inexperienced contract specialists" (Rendon, 2008, p. 839). The survey sample size for the mentorship survey was sixty. This survey sample includes not only those Contracting Officers and their supervisors, but also the lower-level and inexperienced government contract specialists. We included this demographic because, in an examination of professional development (mentorship), feedback from everyone in the divisions we surveyed is warranted. Contractor personnel were not included in these samples due to their temporary employment status within the organization.

The CMMM survey was administered to a pool of military and government civilian Contracting Officers that have obtained at least Level II contracting certification according to the *Defense Acquisition Workforce Improvement Act*.

Within SOAL-K, 34 of the participants are Level II certified, while an additional 15 are also Level III certified. This provides proof that each participant has met the education, training, and experience requirements as set forth by the DoD and the *Special Operations Federal Acquisition Regulation* (*SOFARS*) 5601.601.

The mentorship survey was administered to all military and government civilian personnel within each of the procurement divisions studied. This met our intended purpose because, in order to obtain an accurate reflection of the mentorship processes within an organization, 360-degree feedback is required—that is, from superiors, peers, and subordinates alike.

All participants in the survey were from the SOAL-KH, KI, KP, KR, or KW divisions. The CMMM and mentorship surveys were administered individually to the respective survey samples from each division over a two-week period. The personnel took the survey online via the www.surveymonkey.com Web site. All survey results are anonymous, and the results are delivered in aggregate in order to maintain anonymity. However, results for both surveys are broken down by the respective procurement division in order to provide thorough analysis and allow valid examination of the contracting and mentorship processes across the organization. The surveys' results provide a qualitative assessment of organizational contract management and mentorship processes.

In addition to the surveys, the researchers conducted in-person interviews with four of the five division chiefs and the HCA on 3-4 August 2009. The results of the surveys and the interviews are discussed in Chapter IV.

E. Summary

This chapter provided an overview of USSOCOM SOAL-K and explained why we chose SOAL-K for our research. This chapter also discussed the composition of

SOAL-K, how it derives its acquisition authority, the survey participant selection, and how the survey was administered. Chapter IV will discuss the results of the CMMM and mentorship surveys, as well as assessments and recommendations for USSOCOM SOAL-K.

IV. Assessment Results, Analysis of the Results, and Recommendations

A. Introduction

This chapter discusses the results of the CMMM and mentorship surveys, as well as assessments derived from those surveys. Additionally, this chapter discusses recommendations for contract management process capability improvement and recommendations for improving the organization's mentorship/information sharing programs.

B. Contract Management Maturity Model Survey Results

As listed in Chapter II, the Contract Management Maturity Model is separated into six key contract management process areas. As a review, these areas are the following.

- Procurement Planning: Determining what to procure and when
- Solicitation Planning: Documenting program requirements and identifying potential sources
- Solicitation: Obtaining quotations, bids, offers, or proposals as appropriate
- Source Selection: Choosing from among potential offerors
- Contract Administration: Managing the relationship with the contractor
- Contract Closeout: Completion and settlement of the contract, including resolution of any open items (Garrett & Rendon, 2005a)

Within each of the six key contract management process areas, each division within SOAL-K receives a maturity score based on the survey results. These maturity scores are classified as either Level 1—Ad-Hoc, Level 2—Basic, Level 3—Structured, Level 4—Integrated, or Level 5—Optimized. Complete definitions of each of these maturity scores are listed in Chapter II. Table 5, depicted below, provides a listing of each key contract management process, the maturity score for each division within SOAL-K, and the corresponding level of process capability

maturity. The response rate for the survey was 70% (34 respondents out of 49 potential respondents) across the small, purposive sample of potential respondents within SOAL-K.

Table 5. USSOCOM SOAL-K Contract Management Maturity Assessment Tool Results
(From: Garrett & Rendon, 2005a)

CONTRACT MANAGEMENT MATURITY MODEL©						
MATURITY LEVEL	PROCUREMENT PLANNING	SOLICITATION PLANNING	SOLICITATION	SOURCE SELECTION	CONTRACT ADMIN	CONTRACT CLOSEOUT
5 OPTIMIZED						
4 INTEGRATED	KR-43					
3 STRUCTURED	KP-37	KR-42		KP-41		
2 BASIC	KH-34 KW-36	KP-35 KH-33 KW-32	KR-33 KP-35 KH-34 KW-35	KR-38 KH-34 KW-36	KR-32 KP-35 KH-33 KW-29	KR-30 KP-30 KH-27 KW-26
1 AD HOC	KI-20	KI-21	KI-19	KI-24	KI-17	KI-17

As shown in Table 5, the survey scores for SOAL-K indicate similar scores for each division when compared to one another. The following paragraphs will provide an in-depth explanation of each division's results and steps that each division can take to improve its contract maturity level within each key process area. Additionally, steps for general improvement in all areas and a discussion of the discrepancies between division chiefs' perceptions of performance in their divisions and scores on the survey are discussed at the end of this chapter.

1. SOAL-KH

The SOAL-KH division's scores were in the "Basic" rating category range across all six-contract management key process areas. A "Basic" rating indicates that within SOAL-KH "some basic contract management processes and standards have been established, but are required only on selected complex, critical, or high-visibility contracts, such as contracts meeting certain dollar thresholds, or contracts with certain customers" (Garrett & Rendon, 2005a, p. 53). Additionally, SOAL-KH has developed some formal documentation for established contract management processes and standards, however, there is no organizational policy requiring the consistent use of these contract management processes and standards other than on the required contracts (Garrett & Rendon, 2005a). If such organizational policies do exist, the survey indicates that they are not being adhered to within the SOAL-KH division.

SOAL-KH should seek to advance to the next maturity level of "Structured" and once achieved, then towards the next highest level of "Integrated." In order to reach a "Structured" maturity level, SOAL-KH should consider implementing the best practices as listed in Garrett and Rendon Contract Management Maturity Model (CMMM). These practices may include, but are not limited to, the following.

- Fully establish, institutionalize, and mandate contract management processes and standards throughout SOAL-KH.
- Develop formal documentation for contract management processes and standards; potentially begin to automate some of the processes.
- Once contract management processes are mandated, SOAL-KH should allow for the tailoring of processes and documents to the unique aspects of each contract (for example: contracting strategy, contract type, terms and conditions, dollar value, and type of requirement).
- Senior management should become involved in providing guidance, direction, and possibly even approval of key contracting strategy, decisions, related contract terms and conditions, and contract management documents. (Garrett & Rendon, 2005a)

Additional factors that will help SOAL-KH move to the maturity level of "Structured" were brought about during interviews with SOAL-KH personnel. These factors are as follows: 1. They need to spend more time with the end-user to further identify and refine requirements. This would more easily allow SOAL-KH to implement the Garrett and Rendon best practice of tailoring processes and documents to the unique aspects of each contract; 2. They should implement senior management's recommendations in regards to in-house training sessions. This would allow senior management to provide guidance and direction via recommended training in areas where they see their divisions as deficient. SOAL-KH can make significant progress in improving their contract management maturity scores in each of the key process areas by implementing these factors along with the best practices espoused by Garrett and Rendon.

2. SOAL-KI

The SOAL-KI division scored a maturity level of "Ad-Hoc" throughout all of the six of the CMMM key process areas. An "Ad-Hoc" maturity level indicates that SOAL-KI "acknowledges that contract management processes exist, that the processes are accepted and practiced" and SOAL-KI's senior leaders "understand the benefit and value of using contract management processes" (Garrett & Rendon, 2005a, p. 53). Additionally, the survey indicates that some established contract management processes do exist and are used within SOAL-KI; however, they are used only on a sporadic basis with various contracts (Garrett & Rendon, 2005a).

SOAL-KI should use the best practices suggested by Garrett and Rendon in order to achieve the next highest maturity level of "Basic." Once a maturity level of "Basic" has been achieved, then SOAL-KI can continue to progress up the maturity rating scale. The best practices suggested in order to reach the maturity level of "Basic" are as follows.

- Establish some basic contract management process standards. These standards should be applied (at a minimum) to complex, critical, or

high-visibility contracts, such as those meeting certain dollar thresholds, or contracts with certain customers.

- Document the basic contract management process standards stated above.
- Develop plans and programs within the SOAL-KI division to ensure that the standards are institutionalized.
- Develop a policy within SOAL-KI which mandates that consistent use of contract management process standards are to be used (at a minimum) on complex, critical, or high-visibility contracts. (Garrett & Rendon, 2005a)

In addition to implementing the best practices stated by Garrett and Rendon, implementing internal recommendations for improvement from personnel within the SOAL-KI division will aid in improving SOAL-KI's maturity score. The researchers gathered the following recommendations for improvement from SOAL-KI personnel.

- Recognizing that SOAL-KI was recently re-organized, SOAL-KI must work with the senior leadership within USSOCOM SOAL-K to minimize turnover. There has been a ninety percent turnover of personnel in this division over the past 3.5 years. This fact alone is one of the primary reasons for SOAL-KI's "Ad-Hoc" maturity score. The senior leadership should do everything in their power to incentivize the top proven performers within the acquisition workforce to stay in SOAL-KI in order to minimize personnel turnover.
- Younger acquisition workforce personnel should be encouraged to conduct continuous learning during their off-duty time. Ways in which SOAL-KI can encourage these endeavors are faster promotion rates for those who complete the training and show satisfactory job performance, compensation time of the individual's choosing, and/or possible positive recognition within the workplace (i.e., Acquisition Professional of the Month award, etc.).
- Ensure that each acquisition professional hired to work within SOAL-KI receives initial counseling within their first 30 days in his or her job. Admittedly, USSOCOM SOAL-K is not an easy place to work as people in general are not used to the high operations tempo. However, an initial outline of individual expectations and what an individual can expect during their time with USSOCOM SOAL-K may alleviate any initial concerns new personnel may have. Counseling may also help retain quality personnel.

SOAL-KI will improve its maturity rating if the division can successfully implement the best practice suggestions of Garrett and Rendon along with the internal recommendations stated above.

3. SOAL-KP

The SOAL-KP division scores in the CMMM key process areas of Procurement Planning and Source Selection were "Structured." SOAL-KP had a maturity score of "Basic" in all other CMMM key process areas (Solicitation Planning, Solicitation, Contract Administration, and Contract Closeout). In the near term, SOAL-KP should seek to improve its maturity score in the area of Procurement Planning and Source Selection to that of "Integrated." In all other CMMM key process areas, SOAL-KP should seek to improve its maturity score to that of "Structured."

SOAL-KP can move up to the maturity score of "Integrated" in the areas of Procurement Planning and Source Selection if it institutes the following best practices outlined by Garrett and Rendon.

- Ensure that the end-user customer is an integral part of the procurement team.
- Ensure that basic contract management processes are integrated with other core SOAL-KP functions, such as cost control, schedule management, performance management, and systems engineering.
- SOAL-KP leadership must ensure that efficiency and effectiveness metrics are used in all procurement-related decisions.
- Ensure that SOAL-KP leadership understands its role within the procurement management process and executes that role properly (Garrett & Rendon, 2005a).

In the CMMM key process areas of Solicitation Planning, Solicitation, Contract Administration, and Contract Closeout, SOAL-KP can move up to a maturity score of "Structured" by instituting the following best practices.

- Fully establish, institutionalize, and mandate contract management processes and standards throughout SOAL-KP.
- Develop formal documentation for contract management processes and standards, potentially begin to automate some of the processes.
- Once contract management processes are mandated, SOAL-KP should allow for the tailoring of processes and documents to the unique aspects of each contract (for example, contracting strategy, contract type, terms and conditions, dollar value, and type of requirement).
- Senior management should become involved in providing guidance, direction, and possibly even approval of key contracting strategy, decisions, related contract terms and conditions, and contract management documents (Garrett & Rendon, 2005a).

In making these changes, SOAL-KP will increase their maturity level in all CMMM key process areas. SOAL-KP should also implement or maintain (where appropriate) the critical success factors listed as part of the CMMM survey. A portion of these success factors are listed at the end of this section in Table 6.

4. SOAL-KR

The SOAL-KR division scores varied in a few of the CMMM key process areas. In the area of Procurement Planning, SOAL-KR's maturity level is "Integrated." An "Integrated" rating indicates that "basic contract management processes are integrated with other organizational core processes, such as cost control, schedule management, performance management, and systems engineering" (Garrett & Rendon, 2005a, p. 53). In the area of Solicitation Planning SOAL-KR's maturity level is "Structured." A structured rating indicates that "contract management processes and standards are fully established, institutionalized, and mandated throughout the entire organization" and that "formal documentation has been developed for contract management processes and standards" (Garrett & Rendon, 2005a, p. 53). For all other CMMM key process areas (Solicitation, Source Selection, Contract Administration, and Contract Closeout), SOAL-KR's maturity level is "Basic." A "Basic" rating indicates that within SOAL-KR "some basic contract

management processes and standards have been established, but are required only on selected complex, critical, or high-visibility contracts, such as contracts meeting certain dollar thresholds, or contracts with certain customers" (Garrett & Rendon, 2005a, p. 53).

SOAL-KR should first strive to improve its maturity level in Procurement Planning to that of "Optimized." This can be accomplished by implementing the following best practices espoused by Garrett and Rendon.

- Evaluate contract management processes on a periodic basis using efficiency and effectiveness metrics.
- Implement continuous process improvement efforts (this area is already enacted within SOAL-K as a whole with the periodic Procurement Management Reviews and the implementation of this Naval Postgraduate School research).
- Implement lessons learned and best practice programs in order to improve the contract management processes, standards, and documentation.
- Implement procurement streamlining initiatives as part of the process improvement program (Garrett & Rendon, 2005a).

The next areas in which SOAL-KR should seek to improve is in Solicitation Planning. In this area, SOAL-KR should seek to improve its maturity level from "Structured" to "Integrated." This can be accomplished by implementing the following best practices.

- Ensure that the end-user customer is an integral part of the procurement team.
- Ensure that basic contract management processes are integrated with other core SOAL-KR functions, such as cost control, schedule management, performance management, and systems engineering.
- SOAL-KR leadership must ensure that efficiency and effectiveness metrics are used in all procurement-related decisions.
- Ensure that SOAL-KR leadership understands its role within the procurement management process and executes that role properly (Garrett & Rendon, 2005a).

In all other CMMM key process areas, SOAL-KR should seek to improve its maturity level to that of “Structured.” This is best accomplished by implementing the best practices suggested by Garrett and Rendon, similar to the other divisions mentioned previously. These best practices are as follows.

- Fully establish, institutionalize, and mandate contract management processes and standards throughout SOAL-KR.
- Develop formal documentation for contract management processes and standards; potentially begin to automate some of the processes.
- Once contract management processes are mandated, SOAL-KR should allow for the tailoring of processes and documents to the unique aspects of each contract.
- Senior management should become involved in providing guidance, direction, and possibly even approval of key contracting strategy, decisions, related contract terms and conditions, and contract management documents (Garrett & Rendon, 2005a).

In addition to the best practices listed above, SOAL-KR should also implement procedures suggested by personnel within SOAL-KR. The following procedures and practices were gathered from members of SOAL-KR during interviews.

- Sustain the Procurement Planning continuity book for all incoming personnel; this may be part of the reason for the strong maturity score in the area of Procurement Planning.
- Continue to leverage contactor personnel to help improve their weakest area, Contract Closeout. This has worked well since its initial implementation.
- The operations tempo will continue to be high; in order to maintain quality personnel, the division must continue to provide them ample time for continuing education in order to meet DAWIA standards.
- Continue to share best practices and lessons learned within the division; begin to share and seek information from other divisions.

If SOAL-KR implements the internal suggestions above with the best practices of Garrett and Rendon, they will improve their contract management maturity score.

5. SOAL-KW

The SOAL-KW division has a CMMM maturity level of "Basic" across all key contract management maturity processes. A "Basic" rating indicates that within SOAL-KW "some basic contract management processes and standards have been established, but are required only on selected complex, critical, or high-visibility contracts, such as contracts meeting certain dollar thresholds, or contracts with certain customers" (Garrett & Rendon, 2005a, p. 53). The short-term goal of SOAL-KW should be to improve its maturity score to the "Structured" level by implementing the best practices of Garrett and Rendon, similar to those suggested previously for the other SOAL-K divisions. Once SOAL-KW has achieved a maturity level of "Structured," the division can then work to progress through the upper echelon of the maturity levels; ultimately reaching the level of "Optimized."

SOAL-KW should implement the following best practices in order to reach the contract management process maturity level of "Structured."

- Fully establish, institutionalize, and mandate contract management processes and standards throughout all key process areas in SOAL-KW.
- Develop formal documentation for contract management processes and standards; potentially begin to automate some of the processes.
- Once contract management processes are mandated, SOAL-KW should allow for the tailoring of processes and documents to the unique aspects of each contract (for example: contracting strategy, contract type, terms and conditions, dollar value, and type of requirement).
- Senior management should become involved in providing guidance, direction, and possibly even approval of key contracting strategy, decisions, related contract terms and conditions, and contract management documents (Garrett & Rendon, 2005a).

SOAL-KW should not only implement the best practices listed above, but would also do well to implement the following suggestions from its workforce personnel.

- Continue to leverage its core experienced personnel to mentor the younger acquisition workforce employees; formalize this process to the maximum extent possible.
- Continue to leverage internal training programs in order to provide professional training to the younger acquisition workforce; this will aid in maintaining and even creating quality personnel.
- Internal training must be leveraged in order to educate younger personnel on the complex tasks required within SOAL-KW.

SOAL-KW will quickly improve its contract management maturity scores if they can successfully integrate the best practices of Garrett and Rendon along with the recommendations from its internal personnel.

The last section of the CMMAT asks survey respondents to list their top five critical success factors for their organization. There were one-hundred thirty total responses for critical success factors. These critical success factors are divided into the following categories: Relationships, Workforce, Processes, Policy, Requirements, Resources, and Results. Of the one-hundred thirty total responses for critical success factors, thirty-eight are in the category of Relationships, twenty-five are in the category of Workforce, eighteen are in the category of Processes, eighteen are in the category of Policy, eight are in the category of Requirements, seventeen are in the category of Resources, and six are in the category of Results. The critical success factors listed by SOAL-K personnel correspond to the best practices listed in Garrett and Rendon's CMMM. Table 6 lists the most common critical success factors from the CMMAT and the corresponding best practice suggested by Garrett and Rendon.

Table 6. SOAL-K Critical Success Factors and Garrett and Rendon Best Practices
(From: Garrett & Rendon, 2005a)

SOAL-K Critical Success Factors	Garrett and Rendon Best Practice
Senior Leadership Support (remove barriers/provide top cover)	From level 4, "Integrated" - Management understands its role in the procurement process and executes the process well.
Management support on key decisions	
Streamline and shorten review process in all phases within legal and policy regulations	From level 3, "Structured" - Since the contract management processes are mandated, the organization allows the tailoring of processes and documents, allowing consideration for the unique aspects of each contract, such as contracting strategy, contract type, terms and conditions, dollar value, and type of requirement (product or service).
Provide room for a more speedy process if needed or required	
Streamlined review/approval process	
Innovative contracting approaches	
Acquisition lead time long enough to choose best business solutions	
Effective review process (Legal, Policy)	From level 5, "Optimized" - Continuous process improvement efforts are implemented to improve the contract management process.
Continue to refine our toolbox "portal" (i.e., SOFARS Sol. provisions and contract clause Matrix, and incorporate lessons learned link)	
If someone finds a better way, share more information between Divisions.	

Table 6 demonstrates the close relationship between the critical success factors listed by SOAL-K personnel and the best practices suggested by Garrett and Rendon. SOAL-K will be best served by implementing not only the best practices of the CMMM, but also the internal recommendations from its personnel. This will greatly improve each division's CMMM maturity level.

The next section will discuss the results of the mentorship survey and recommendations pertaining to SOAL-K's mentorship program.

C. Mentorship/Information Sharing Assessment

This section presents the survey questions and results of the mentorship/information sharing assessment. The assessment was administered on-line for all members of SOAL-K. Data were collected via the Survey Monkey Web site. There were 28 questions on the survey. Forty-one surveys were completed, out of a field of sixty possible respondents, for a sixty-eight percent completion rate. The sections specifically addressed within the survey were demographics, information sharing, leadership, mentorship and training.

D. Discussion of Information Sharing/Mentoring Survey Questions

The sections mentioned above were chosen based on the research for the information sharing/mentorship literature review in Chapter II. Some survey sections were modeled after Stonerock's research on knowledge sharing between defense departments. A description of each survey section follows.

1. Demographics

The target audience was all Government Service employees in SOAL-K. The assessment included both military and civilian members. Demographics, such as years a person worked in contracting, civil service or the military and whether survey respondents held a contracting officer's warrant, were collected to see if these offered any discriminating information.

2. Information Sharing

For information sharing, the questions were constructed with the purpose of determining if there is any information sharing activity occurring within the organization. If there is activity, the researchers wanted to find what the prevailing attitude towards information sharing is within SOAL-K. Also, the questions hope to

determine whether or not members of the organization willingly share information with others within SOAL-K and if there are informal processes in place for leadership to build upon.

3. Mentorship

For mentorship, the questions were constructed with the purpose of determining if mentoring is being conducted within the organization. If mentoring is taking place, the researchers wanted to find if survey respondents view mentoring as beneficial to their professional development. Also, the questions hope to determine how subordinate personnel feel the SOAL-K leadership values mentoring and if the leadership takes initiative in mentoring junior members of the organization. If mentoring is not taking place, the survey hopes to reveal whether or not personnel would use a mentor if one was provided.

4. Leadership

The leadership section of the survey is intended to determine the level of support for information sharing and mentoring activities among the organization's leadership. Specifically the researchers hope to determine the following: the extent to which organizational leadership encourages new ideas and techniques, the extent to which leadership encourages subordinates to seek out best practices from other contracting activities, and the extent to which sharing contracting knowledge is valued by the leadership.

5. Training

This section deals with contracting training; both formal and informal. Initial contracting training is standardized throughout federal government and DoD. This survey section is constructed using questions pertaining to the common federal government and DoD training resources and how effective those resources are for the members of SOAL-K.

6. Summary of Questions

The overall purpose of the information sharing/mentorship survey is for SOAL-K leadership to obtain an awareness of the activities taking place within the organization in regards to information sharing and mentoring.

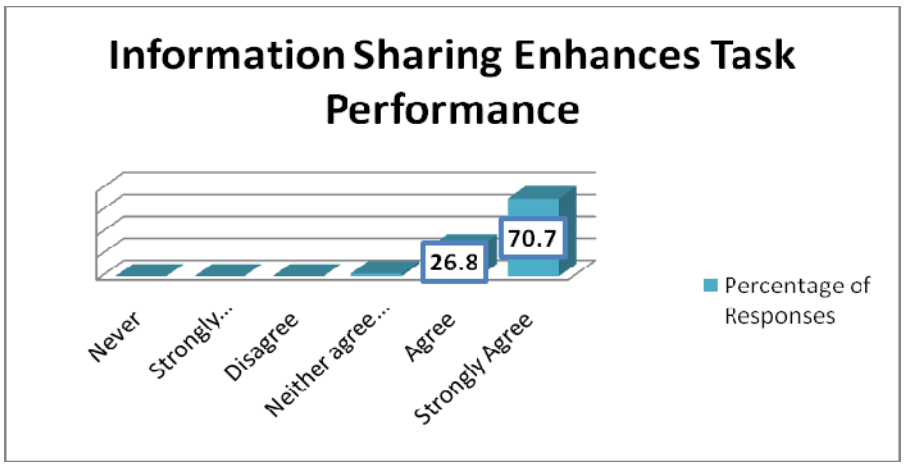
E. Discussion of Information Sharing/Mentoring Results

1. Demographics

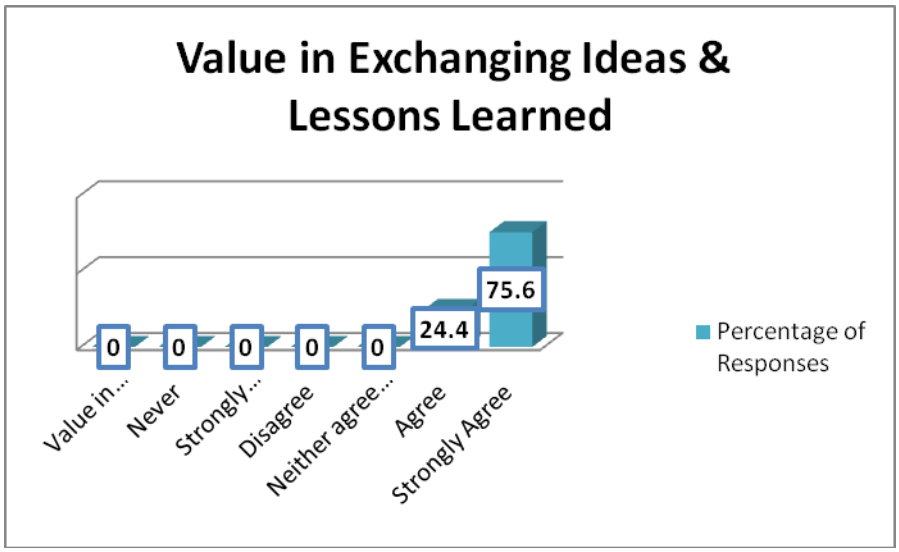
The demographics collected provide background pertaining to the contracting workforce of SOAL-K. DoD civilians make up ninety-three percent of the survey respondents while seven percent of the respondents are active duty military. The civilian workforce has a variety of years of experience in federal contracting, with thirty-two percent of the workforce having six to ten years of service and thirty-four percent having more than twenty years of service. Within SOAL-K, fifty-three percent of members of the acquisition workforce hold a warrant; while forty-seven percent of the survey respondents do not.

2. Information Sharing

Information sharing is a process that SOAL-K views positively. As depicted in Graph 1, a majority of the respondents (ninety-eight percent) believe information sharing enhances task performance. The following statements (depicted in Graph 2) show SOAL-K's openness to information sharing: seventy-five percent of respondents believe there is not a lack of perceived willingness of colleagues to share ideas if asked. One hundred percent of respondents believe there is value in exchanging ideas, initiatives and lessons learned.



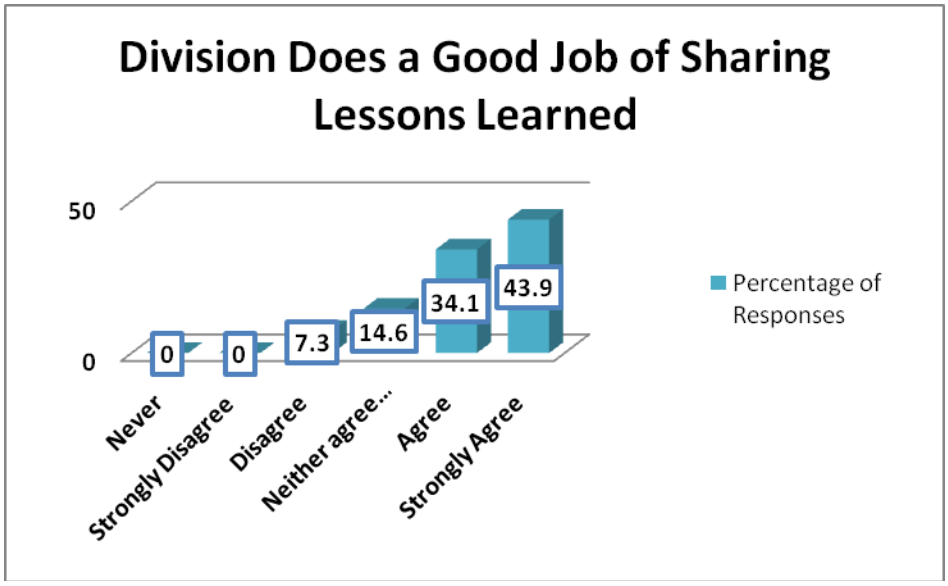
Graph 1. Mentorship Survey Response to Information Sharing Enhances Task Performance Question



Graph 2. Mentorship Survey Response to Value in Exchanging Ideas and Lessons Learned Question

When discussing whether or not lessons learned are shared in the division, there is room for improvement. As depicted in Graph 3, seventy-eight percent of the respondents believe that their division shares lessons learned adequately, while twenty-two percent believe it does not. According to CMMM survey results, lessons learned are "usually" implemented within the organization. When comparing the two surveys, sharing lessons learned appears to be valued, however, the

implementation of those lessons learned does not appear to be an on-going procedure. In addition, it is noted that sharing lessons learned and implementing them into organizational procedures are not the same activity.



Graph 3. Mentorship Survey Response to Division Does a Good Job of Sharing Lessons Learned Question

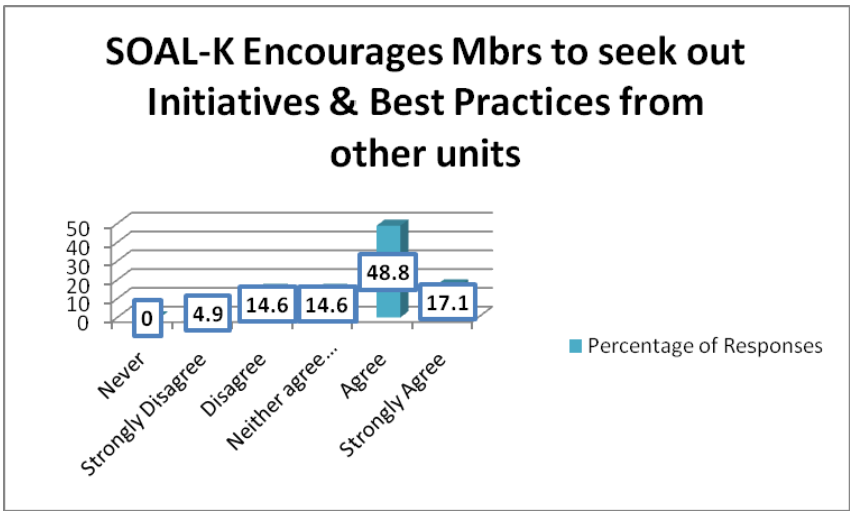
The next aspect of information sharing evaluated is the consideration of time. In questioning whether lack of time hinders the survey respondents' ability to obtain contracting knowledge from other members of the organization, the answers are mixed: thirty-seven percent agree, fifty-three percent disagree and ten percent are neutral. This shows that a slight majority of the respondents will ask for help despite perceived lack of time to do so. However, a large minority of the survey respondents do not feel comfortable asking for help either due to a perceived lack of time or for possible other reasons (not wanting to seem unknowledgeable to coworkers, etc.).

The next information-sharing question asks if the organization is lacking convenient means to obtain contract assistance from other members of the organization. The responses here are also mixed: thirty-seven percent agree, fifty-three percent disagree and ten percent are neutral. Those respondents that agree may be doing so because of the fact that three of the five divisions are not co-

located with the others. This separation could add obstacles to information sharing. In speaking with the member responsible for training, training is given in person and on CD-ROM to those locations not co-located. However, this may bring up the necessity for a USSOCOM-specific on-line Community of Practice (CoP).

3. Leadership

Support from organizational leadership is an important part of any information sharing or mentorship program. Sixty percent of survey respondents believe that SOAL-K leadership openly encourages new ideas, while ten percent believe that SOAL-K leadership does not openly encourage new ideas and thirty percent are unsure as to whether or not SOAL-K leadership encourages new ideas. According to Graph 4, sixty-six percent of the survey respondents believe that SOAL-K leadership encourages them to seek out and apply initiatives and/or best practices from other contracting organizations. This implies that thirty-four percent of the respondents do not believe that their leadership encourages them to seek out and apply initiatives and/or best practices from other contracting organizations. Seeking out best practices from other organizations and encouraging new ideas are the best means to incorporate new, updated processes to a contracting unit. SOAL-K should continue to ensure that a majority of its leadership encourages these aspects of information sharing/mentoring.



Graph 4. Mentorship Survey Response to SOAL-K Encourages Members to Seek Out Initiatives and Best Practices from Other Units Question

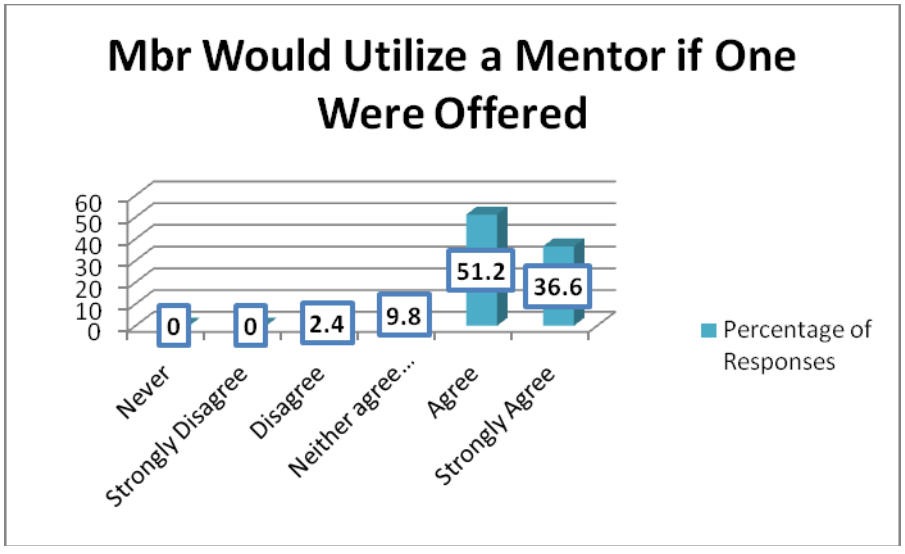
An example of how best practices can be successfully incorporated into a contracting unit comes from Ms. Patsy Reeves, a former Contracting Director at Warner Robins Air Logistics Center. Ms. Reeves "implemented a Procurement (PK) University at Warner Robins after she learned of it at another base" (Reeves, 2008, p. 8). The origin of PK Universities and a model for an Air Force best practice comes from Space Missile Center at Los Angeles AFB and then active-duty Air Force Lieutenant Colonel Rene Rendon (USAF, 2003). For Ms. Reeves, adopting a best practice from the Space Missile Center led to improvements in her unit's contract management processes. SOAL-K leadership should continue to encourage its personnel to adopt best practices from other units as a means to continue to improve their contract management processes through information sharing.

4. Mentorship

The survey results indicate that there is not a formal mentorship program in SOAL-K. If mentoring is conducted, it is on an informal basis. The focus of this research is to give leadership insight pertaining to mentoring-type activities that are

on going within the organization and the attitudes about mentoring in general. This research is not wide enough in scope to provide recommendations on whether or not to build a mentorship program.

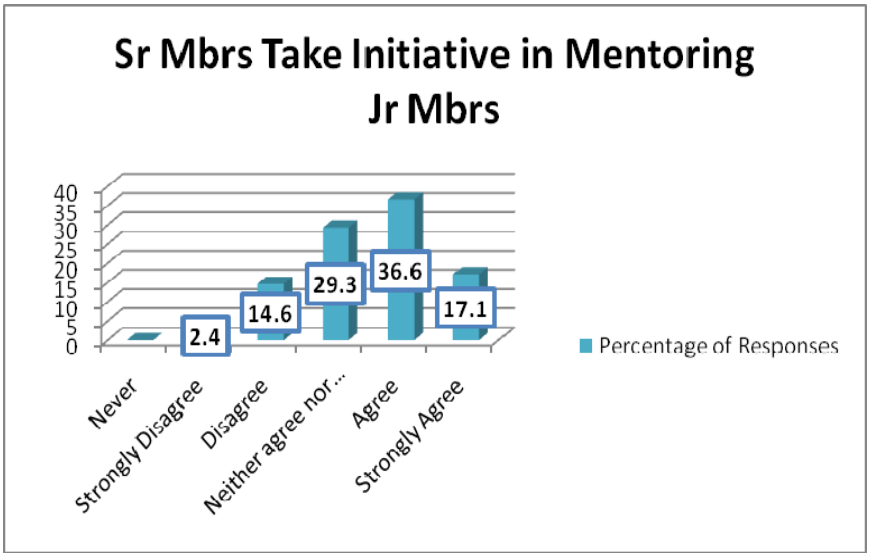
According to the Graph 5, eighty-nine percent of survey respondents state they would utilize a mentor if one was made available. This implies that a large majority of survey respondents do not have a mentor in the organization. Another potential issue within the organization is mentorship support from senior leaders. Fifty-three percent of survey respondents believe that senior leaders take initiative in mentoring junior members; while twenty-nine percent have no strong opinion in regards to the support from their leaders. The latter number implies that almost one-third of the survey respondents are unsure if senior leaders are taking the necessary time to mentor junior members of the organization. Additionally, twenty-seven percent of survey respondents are unsure if senior leadership is showing an active interest in the professional development of their subordinates.



Graph 5. Mentorship Survey Response to Member Would Utilize a Mentor if One Were Offered Question

The results depicted in Graph 6 indicate that over one-third of the organization feels that senior leadership does not take a strong interest in the

professional development of subordinates. In order to increase organizational capability, senior leadership should actively participate in the development of subordinates. Additionally, leadership should establish a formal mentoring program so that subordinates understand their path for career development.



Graph 6. Mentorship Survey Response to Senior Members of the Organization Take Initiative in Mentoring Junior Members of the Organization Question

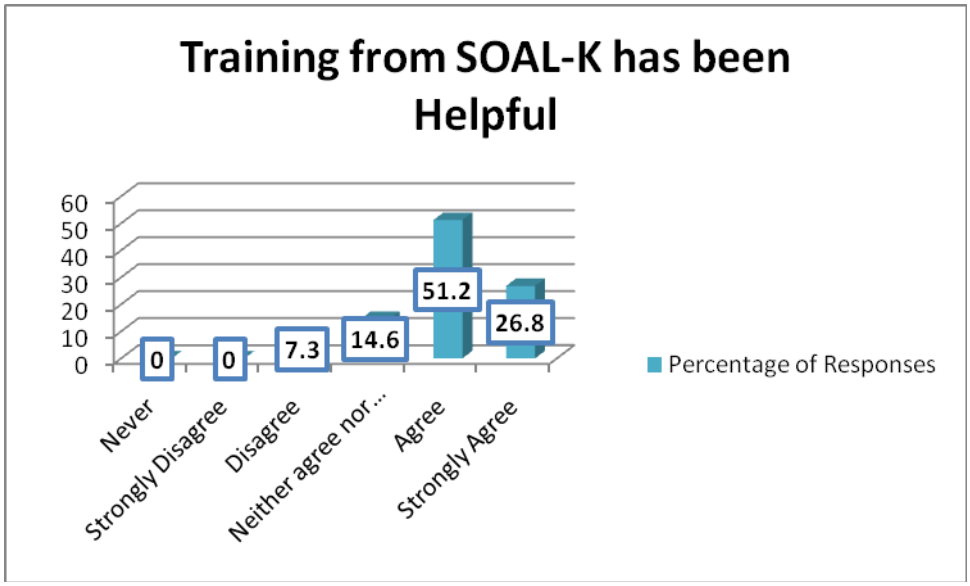
5. Training

The training section of the survey deals with the types of training respondents have received and if it was helpful in performing daily contracting duties. In this section, survey respondents are asked questions regarding the following types of training: Defense Acquisition University (DAU), formal SOAL-K training, and training from other sources (i.e., Web sites, books, etc.).

A majority of survey respondents views DAU as their primary training source and they also find DAU helpful in completing daily contracting duties. Members of the SOAL-K contracting workforce receive training from DAU to complete their DAWIA (Defense Acquisition Workforce Improvement Act) certifications. This Act

improved the training of the DoD contracting workforce by establishing mandatory certification levels and training standards.

Formal training is training that is conducted by SOAL-K's staff and/or senior leadership. Seventy percent of the survey respondents have relied on formal training to build their contracting knowledge. According to Graph 7, seventy-seven percent of survey respondents believe that formal training aids them by increasing their capability to accomplish their daily contracting duties. SOAL-K should maintain its focus on formal training as a large majority of the survey respondents feels that it increases their capability to accomplish their contracting duties.



Graph 7. Mentorship Survey Response to Training from SOAL-K has been Helpful Question

Ninety percent of survey respondents have completed training from other sources, such as Web sites, books, etc. These results show that a large majority of survey respondents seek contracting knowledge through alternative sources (other than DAU and formal training). This demonstrates that members of SOAL-K take

personal initiative to develop their own knowledge base. Additionally, ninety-five percent of survey respondents believe that training through other sources is beneficial to increasing their ability to accomplish their daily contracting duties.

The contracting official responsible for training within SOAL-K is aggressive and forward thinking in developing new training material and conducting training for divisions that are geographically separated from the headquarters. By continuing to develop and conduct new training while incorporating the results of this survey into their training plan, SOAL-K will ensure that productive training continues to improve their organizational capability.

F. Summary of Information Sharing/Mentoring Results

The purpose of this study is not to prescribe a mentorship program or a system to better share information. Prescribing either of these is outside the scope this research. Rather, the purpose of this study is to increase the organizational leadership's level of awareness in regards to on-going practices and potential areas of improvement that pertain to mentorship and information sharing. When the senior leadership becomes more aware of the status of information sharing and mentorship in the organization, they can then work to improve these areas and increase the capability of their organization.

G. Chapter Summary

This chapter discussed the results of the CMMM and mentoring/information sharing surveys. The discussion of the CMMM and information sharing/mentorship results included best practices and suggestions as to how leaders can utilize the information given to increase the capability of their respective divisions and SOAL-K as a whole. Chapter V will summarize the research conducted in this study, answer research questions and discuss recommended areas for future research.

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V. Summary, Conclusion, and Areas for Further Research

A. Introduction

Since September 11, 2001, USSOCOM SOAL-K has undergone significant transformation not only in the number of contracting employees within the organization, but they have also experienced a significant increase in workload. Due to the high operations tempo and consistent personnel turnover, there is a genuine need to analyze the organization's contract management and mentorship/information sharing processes. This chapter summarizes the research conducted, answers the research questions posed in Chapter I, and suggests areas for further research.

B. Summary

This research assesses SOAL-K's contract management processes using both a contract management process maturity and mentorship/information sharing context. The researchers accomplish this using the CMMM and mentorship/information sharing surveys. The research provides a framework in which SOAL-K divisions can assess the capability of its contract management processes and mentorship/information sharing programs. Additionally, the research provides baseline suggestions and best practices for improving each division's contract management process maturity and SOAL-K's mentorship/information sharing programs.

The following paragraphs review the research questions asked in Chapter I in regards to the contract management processes within SOAL-K and provide summarized answers.

1. What Level of Maturity are the Contract Management Processes within USSOCOM SOAL-K?

CMMM survey results show that SOAL-K's contract management maturity scores for each of its divisions are primarily at the "Basic" level. The division of SOAL-KR did score at the "Integrated" level for Procurement Planning and at the "Structured" level for Solicitation Planning, while the SOAL-KP division scored at the "Structured" level for Procurement Planning and Source Selection. The SOAL-KI division had a score of "Ad-Hoc" for each of the six key contract management processes.

2. How can SOAL-K Improve its Contract Management Process Capability?

SOAL-K can improve its contract management process capability by implementing the best practices suggested by Garrett and Rendon. Each SOAL-K division should concentrate on implementing the best practices associated with next highest maturity level above their current rating. For instance, a majority of the divisions received a maturity rating of "Basic" in the contract management key process areas. Therefore, these divisions should implement procedures, such as the "tailoring of processes and documents, allowing consideration for the unique aspects of each contract, such as contracting strategy, contract type, terms and conditions, dollar value, and type of requirement (product or service)" in order to move into the next highest maturity rating of "Structured" (Garrett & Rendon, 2005a, p. 53). The SOAL-KI division should implement the best practices associated with the "Basic" maturity level in order to improve its current maturity rating of "Ad-Hoc."

3. How can SOAL-K Leadership Leverage Mature Contract Management Processes within Various Divisions?

SOAL-K did not have any divisions receive an "Optimized" maturity rating on the CMMM. However, the SOAL-KR division received a maturity rating of "Integrated" in the key process of Procurement Planning and a "Structured" rating in

the key process area of Solicitation Planning. Additionally, the division of SOAL-KP received a “Structured” rating in the key process areas of Procurement Planning and Source Selection. In addition to implementing the best practices suggested by Garrett and Rendon to improve their contract management process capability, SOAL-K should leverage the more mature contract management processes of the SOAL-KP and SOAL-KR divisions by having them share their current processes with the other divisions. At a minimum, this will help to improve the maturity ratings (and the contract management process capability) of the other divisions in the key process areas of Procurement Planning, Solicitation Planning, and Source Selection.

The CMMM indentifies some knowledge sharing opportunities among the divisions with the higher maturity processes and the divisions with the low maturity processes. Data regarding the information sharing/mentorship practices within SOAL-K were gathered using a survey consisting of twenty-eight questions. The following paragraphs review the research questions asked in Chapter I in regards to the information-sharing/mentoring processes within SOAL-K and provide summarized answers.

4. Are there Policies, Standards or Guidelines within SOAL-K regarding Mentorship/Information Sharing?

Based on the survey results, there appear to be no policies, standards or guidelines in place regarding mentoring/information sharing. If mentoring and information sharing are being conducted within the organization, they are done on an informal basis.

5. Is there a Relationship between SOAL-K’s Contract Management Maturity Level and its Mentorship/Information-Sharing Characteristics?

There is no direct relationship between the contract management maturity level for each division within SOAL-K and the mentorship/information-sharing characteristics of SOAL-K. However, there are similarities in responses on the

CMMM survey and the mentorship/information-sharing survey. Many survey respondents on the CMMM stated that mentorship was a critical success factor for their organization. Eighty-nine percent of the survey respondents on the mentorship/information-sharing survey indicated that they would use a mentor if one were provided to them. While there is not quantitative relationship between the contract management maturity level for each division within SOAL-K and the mentorship/information-sharing characteristics of SOAL-K, the surveys do suggest that the perception among survey respondents is that establishing a mentoring program could help to improve their contract management process capability.

6. What Areas of USSOCOM SOAL-K's Mentoring/Information-Sharing Culture need to be Improved or Developed?

Improving the areas of sharing best practices and lessons learned could immediately help improve SOAL-K's capability. This could also aid in standarding contract management processes across SOAL-K. According to comments from the CMMM survey, respondents would prefer more standard contract management processes within their organization. With process standardization, mentoring and sharing information will be easier to accomplish because all members of the organization would be adhering to common processes. Further development of repositories, such as a local SOAL-K CoP, will give members one place to look to find information on the procedures used by SOAL-K and USSOCOM in accomplishing their daily tasks. This will also help the geographically dispersed divisions to share information.

C. Conclusion

The purpose of this research was to assess the contract management processes and mentorship/information-sharing practices for USSOCOM SOAL-K in order to assist SOAL-K in improving its contract management process capability. The results of the CMMM show that most divisions within SOAL-K have a maturity rating of "Basic" in all contract management key process areas. The exceptions to

this are the SOAL-KI, SOAL-KP, and SOAL-KR divisions. The SOAL-KI division has a maturity rating of “Ad-Hoc” in all contract management key process areas. The SOAL-KP division has a maturity rating of “Structured” in the key process areas of Procurement Planning and Source Selection. The SOAL-KR division has a maturity rating of “Integrated” in the key process area of Procurement Planning and a “Structured” rating in the key process area of Solicitation Planning. Again, it is noted that CMMM results should be validated through organizational document reviews.

These results provide SOAL-K with a current assessment of their contract management processes. Additionally, the mentorship/information-sharing survey provides a current assessment of the mentorship/information-sharing practices within SOAL-K. SOAL-K can now seek to improve its contract management processes by integrating the best practices suggested by Garrett and Rendon with the feedback from survey respondents and the mentorship/information-sharing recommendations put forth in this research. Ultimately, process improvement will lead to an improvement in SOAL-K’s contract management process capability; a worthwhile goal for any contracting organization. Recommendations for areas of further research are provided in the next section.

D. Areas for Further Research

USSOCOM SOAL-K, like any successful military organization, has a strong desire to improve its processes continually. Indeed, as Garrett and Rendon (2005a) suggest, an optimized organization seeks to implement process improvement efforts continuously in order to improve its contract management process. In order to help SOAL-K accomplish its goal of continual process improvement, this study recommends that the following actions be taken by SOAL-K or other researchers.

- Use the CMMM and mentorship/information sharing results to initiate dialogue between SOAL-K divisions in order to improve the entire organization’s processes. The near-term goal should be improved CMMM scores and the establishment of an online USSOCOM-specific CoP.

- Compare the scores of the CMMM to the most recent SOAL-K internal Procurement Management Review Report to aid in identifying common deficiencies that may need corrected in order for process improvement to occur.
- Revisit the SOAL-K divisions in which the CMMM was applied and determine if the organization has improved and to what extent the improvement has resulted in cost savings to the government (may require a cost-benefit analysis).
- Investigate if the establishment of a formal mentoring program within SOAL-K reduces the personnel turnover rate.

Appendix. Mentorship/Information Sharing Survey Questions

1. Which Division are you in?
2. How many years have you worked in Federal Contracting?
3. Are you a member of the Civil Service or an active duty military member?
4. Do you hold a warrant?
5. Information sharing enhances task performance for people in our Division.
6. I think there is a lot of value in exchanging ideas, initiatives and lessons learned.
7. If I ask a colleague in my own Division, I feel confident that he or she will actively engage in problem solving with me.
8. If a member of another Division contacted me for ideas or help, I would gladly help them as much as I could.
9. My Division does a good job of sharing lessons learned.
10. I believe there are ideas, initiatives and lessons-learned being exchanged on a day-to-day basis between Divisions
11. Lack of time to ask a colleague hinders my ability to obtain contracting knowledge.
12. Lack of convenient ways to contact others hinders my ability to obtain contracting knowledge.
13. Lack of perceived need to gather ideas of colleagues hinders my ability to obtain contracting knowledge.
14. Lack of perceived willingness of colleagues to share their ideas if asked hinders my ability to obtain contracting knowledge.
15. SOAL-K encourages me to seek out and apply initiatives or best practices from other contracting organizations in my own work.
16. SOAL-K leadership openly encourages new contracting ideas and techniques.

17. I would utilize a mentor if one were offered to me.

18. Mentoring would be a valued tool in my Division.

19. Senior members in the unit take initiative in mentoring junior members.

20. Members senior to me show an active interest in progress of my contracting knowledge.

21. I believe sharing contracting knowledge is highly valued by SOAL-K leadership

22. I have relied on formal training from Defense Acquisition University (DAU) to build my contracting knowledge.

23. Training from DAU has been helpful in my daily contracting duties.

24. I have relied on formal training offered by SOAL-K to build my contracting knowledge.

25. Training from SOAL-K has been helpful.

26. I have relied on training from other sources (websites, books, etc.) to build my contracting knowledge.

27. Training from other sources has been helpful to build my contracting knowledge.

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- Defense Industry Consolidation
- EU-US Defense Industrial Relationships
- Knowledge Value Added (KVA) + Real Options (RO) Applied to Shipyard Planning Processes
- Managing the Services Supply Chain
- MOSA Contracting Implications
- Portfolio Optimization via KVA + RO
- Private Military Sector
- Software Requirements for OA
- Spiral Development
- Strategy for Defense Acquisition Research
- The Software, Hardware Asset Reuse Enterprise (SHARE) repository

Contract Management

- Commodity Sourcing Strategies
- Contracting Government Procurement Functions
- Contractors in 21st-century Combat Zone
- Joint Contingency Contracting
- Model for Optimizing Contingency Contracting, Planning and Execution
- Navy Contract Writing Guide
- Past Performance in Source Selection
- Strategic Contingency Contracting
- Transforming DoD Contract Closeout
- USAF Energy Savings Performance Contracts
- USAF IT Commodity Council
- USMC Contingency Contracting

Financial Management

- Acquisitions via Leasing: MPS case
- Budget Scoring
- Budgeting for Capabilities-based Planning
- Capital Budgeting for the DoD
- Energy Saving Contracts/DoD Mobile Assets
- Financing DoD Budget via PPPs
- Lessons from Private Sector Capital Budgeting for DoD Acquisition Budgeting Reform
- PPPs and Government Financing
- ROI of Information Warfare Systems
- Special Termination Liability in MDAPs
- Strategic Sourcing
- Transaction Cost Economics (TCE) to Improve Cost Estimates

Human Resources

- Indefinite Reenlistment
- Individual Augmentation
- Learning Management Systems
- Moral Conduct Waivers and First-tem Attrition
- Retention
- The Navy's Selective Reenlistment Bonus (SRB) Management System
- Tuition Assistance

Logistics Management

- Analysis of LAV Depot Maintenance
- Army LOG MOD
- ASDS Product Support Analysis
- Cold-chain Logistics
- Contractors Supporting Military Operations
- Diffusion/Variability on Vendor Performance Evaluation
- Evolutionary Acquisition
- Lean Six Sigma to Reduce Costs and Improve Readiness

- Naval Aviation Maintenance and Process Improvement (2)
- Optimizing CIWS Lifecycle Support (LCS)
- Outsourcing the Pearl Harbor MK-48 Intermediate Maintenance Activity
- Pallet Management System
- PBL (4)
- Privatization-NOSL/NAWCI
- RFID (6)
- Risk Analysis for Performance-based Logistics
- R-TOC AEGIS Microwave Power Tubes
- Sense-and-Respond Logistics Network
- Strategic Sourcing

Program Management

- Building Collaborative Capacity
- Business Process Reengineering (BPR) for LCS Mission Module Acquisition
- Collaborative IT Tools Leveraging Competence
- Contractor vs. Organic Support
- Knowledge, Responsibilities and Decision Rights in MDAPs
- KVA Applied to AEGIS and SSDS
- Managing the Service Supply Chain
- Measuring Uncertainty in Earned Value
- Organizational Modeling and Simulation
- Public-Private Partnership
- Terminating Your Own Program
- Utilizing Collaborative and Three-dimensional Imaging Technology

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