REPORT TO THE SECRETARY OF DEFENSE

Transforming Department of Defense's Core Business Processes for Revolutionary Change



Defense Business Board

Report FY 15-01

Transforming the Department of Defense's Core Business Processes for Revolutionary Change



PREFACE

This report is a product of the Defense Business Board (DBB). Recommendations by the DBB are offered as advice to the Department of Defense (DoD) and do not represent DoD policy.

The DBB was established by the Secretary of Defense in 2002 to provide the Secretary and the Deputy Secretary of Defense with independent advice and recommendations on how "best business practices" from the private sector's corporate management perspective might be applied to the overall management of DoD. The DBB's members are corporate leaders and managers with demonstrated executive-level management and governance expertise. They possess a proven record of sound judgment in leading or governing large, complex corporations and are experienced in creating reliable solutions to complex management issues guided by best business practices.

Secretary of Defense Donald Rumsfeld, in accordance with the provisions of the Federal Advisory Committee Act (FACA) of 1972 (5 U.S.C., Appendix, as amended) and 41 C.F.R. § 102-3.50(d), established the DBB. The DBB members are unpaid special government employees appointed by the Secretary of Defense.



DEFENSE BUSINESS BOARD 1155 DEFENSE PENTAGON WASHINGTON, DC 20301-1155

February 9, 2015

The Honorable Ashton B. Carter The Honorable Robert O. Work 1000 Defense Pentagon Washington, D.C. 20301

Dear Secretary Carter and Deputy Secretary Work,

The Defense Business Board (DBB) is pleased to submit its report of findings and relevant and actionable recommendations to help transform the Department of Defense's six core business processes.

On October 15, 2014, Deputy Secretary Work, asked the DBB to form a Task Group to review the Department of Defense's ("the Department") six core business processes: human resource management, healthcare management, financial management, acquisition and procurement, logistics and supply, and real property management; and supporting information technology (IT).

The objective of the study was to provide actionable recommendations on private sector best business practices that the Department could adopt and implement in order to modernize its business processes and supporting systems to create an agile enterprise shared services organization with improved efficiency and sustained system security. See Section A for a copy of the Terms of Reference outlining the scope and deliverables for the Task Group.

The study had two focal points. The first focal point was data collection and analysis. A critical element of the Task Group's approach was the receipt of data from the Office of the Deputy Chief Management Officer that was collected and analyzed across the six core business processes within the Department (Army, Air Force, Department of the Navy, and the Fourth Estate). The data for the Combatant Commands was embedded in all the six core business processes. The focus of the data collection and analysis was on the workforce

labor and costs (FY 2013 actuals) within each agency, across the business functions, as depicted in Section B, page 19 (slide 3) of the executive summary. This was the first time the Department used this methodology, aimed at targeting productivity gains in order to identify cost savings that could be used for Military Services' modernization and readiness efforts during a dire budget environment.

The second focal point was change management and strategic communications. The workforce is the fundamental enabler to successfully achieve productivity gains through business process re-design, innovation, and technology. The very top senior leader must have a clear vision that is aligned with a strategy and widely communicated. Every employee must understand the intent, purpose, and effects of organizational change in order to feel as though they are a part of the process and embrace new ways of doing business. Given the Department's uniqueness, external communications is equally as important as internal communications, especially in gaining Congressional support.

Ms. Roxanne Decyk and Mr. Kenny Klepper served as the Task Group Co-Chairs. The other Task Group members were Mr. Phillip Odeen and Mr. Emil Michael. Ms. Kelsey Keating served as the staff analyst and Colonel Leslie Caballero, U.S. Army, served as the military representative.

The Task Group's draft findings and recommendations were presented to the DBB for deliberation at their January 22, 2015 quarterly meeting where the DBB voted to approve the recommendations. See Section B for an executive summary of the study with findings and recommendations and Section C for a copy of the complete study which was approved by the DBB.

In addition to drawing on their own expertise, the Task Group interviewed over 85 individuals from government, think tanks, and private industry, including current and recent Department senior military and civilian leaders. See Appendix D for list of interviews. The Task Group also reviewed reports on the Department's business operations and best practices from industry, academia, think tanks, and Federal agencies.

The Department is operating in an uncertain world under a declining and unpredictable budget. There are many potential threats to the country's national security. To effectively respond to global crises, the Department must have a stable and appropriately-sized budget. By rapidly adopting and implementing the DBB's recommendations, a potential savings of \$75-150 billion in the next five years could be realized. Recommendations

for productivity gains were identified in four areas: 1) Contract Spend Optimization; 2) Labor Optimization; 3) IT Modernization; and 4) Business Process Re-engineering. The greatest contributions to the savings are contract optimization and labor optimization. Early mobilization is the single biggest lever – every billion saved in 2016 is worth five billion in fiscal years 2016 to 2020 due to the compounding effect.

Respectfully submitted,

Robert Stein, DBB Chair

Roxanne Decyk, Task Group Co-Chair

KM

Kenny Klepper, Task Group Co-Chair

TABLE OF CONTENTS

Terms of Reference1	1
Executive Summary1	5
Complete Study	5
Appendix A – Information Documents	6
» Business Process Re-design8	7
» Reference Architecture 8	8
» Cost-conscious Culture8	9
Appendix B – Case Studies9	0
» Internal Revenue Service	1
» Logistics Support Agency	3
» Defense Integrated Military Human Resources System	5
» Expeditionary Combat Support System	8
» IBM	1
» PepsiCo 10	3
» Hewlett Packard 102	8
» Lockheed Martin11	0
Appendix C – Footnotes and References 11	2
Appendix D – List of Interviews	7
Task Group Biographies	5
List of Acronyms 13	1
List of Acronyms	1 5

Terms of Reference





DEPUTY SECRETARY OF DEFENSE 1010 DEFENSE PENTAGON WASHINGTON, DC 20301-1010

OCT 1 5 2014

MEMORANDUM FOR CHAIRMAN, DEFENSE BUSINESS BOARD

SUBJECT: Terms of Reference – "Transforming Department of Defense Core Business Processes for Revolutionary Change"

The Department of Defense (DoD) spends about \$100B annually on core business processes (i.e., human resource management, healthcare management, financial management, acquisition and procurement, logistics and supply, and real property management) that support our mission. Private sector businesses, particularly large global corporations with business process challenges analogous to those of DoD, have experienced significant cost savings through the implementation of process redesigns and agile reference architectures. While DoD has improved its core processes and the supporting information technology (IT) hardware and software over the last decade, the Department still lags behind the commercial sector. The application of commercial sector lessons learned, combined with modern, commercially-derived IT approaches, may enable the Department to save money and resources while improving mission performance.

My goal is to modernize our business processes and supporting systems and create an agile enterprise shared services organization in order to reduce costs, maximize return on investment, and improve performance while ensuring we maintain system security. To ensure our efforts leverage best practices, I am establishing a Task Group under the Defense Business Board (DBB) to review and recommend changes to the Department's current plans for enterprise modernization. The task group's recommendations should be specific and actionable in order to enable the creation of an agile enterprise shared services organization. The Task Group should:

- Identify how private sector enterprises create a cost conscious culture and propose how DoD might do the same. Your analysis should include how private sector enterprises consolidate IT "utilities" to create efficient and agile organizational performance. Consider the use of third parties to evaluate and recommend ways to best reconfigure all or part of DoD's supporting business processes and their associated IT. Consider ways a vender analysis work product might be used to derive needed financial and transaction data for application to DoD.
- Consider a conceptual roadmap that will support a staged modernization of an OSD Principal Staff Assistant organization. Recommend how best to enable the construction and operation of the new technology "stack" to support redesigned business processes.
- Recommend an approach for the Department to establish a means (such as a cash flow model) to identify and quantify the economic value of modernization on a productivity basis. Propose how enterprise modernization can best be structured to bring innovation and agility to the "end user" community to gain additional efficiencies.





- Make recommendations to the DoD Enterprise Roadmap to address shared approaches to IT services and all of the above.
- Consider utilizing the results and analyses of previous studies relevant to this analysis.

The DBB will provide its findings and recommendations to the Secretary of Defense or the Deputy Secretary of Defense, informed by the Task Group's work, no later than its January 2015 quarterly meeting. The Offices of the Deputy Chief Management Officer; Chief Information Officer; and Under Secretary of Defense for Acquisition, Technology and Logistics will serve as DoD liaisons for this project and provide technical assistance as needed. The Joint Chiefs of Staff will also support, as required.

In accordance with DoD policy, Ms. Roxanne Decyk and Messrs. Kenny Klepper, Philip Odeen, and Emil Michael are appointed as members of the Task Group, pursuant to 5 U.S.C. § 3109, to serve as special and government employee members for the life of this study. Ms. Decyk is also designated as the chair of the Task Group. These four individuals are also currently appointed as members of the DBB.

As a subcommittee of the DBB, and pursuant to the Federal Advisory Committee Act of 1972, the Government in the Sunshine Act of 1976, and other appropriate federal statutes and regulations, this Task Group shall not work independently of the Board's charter and shall report its recommendations to the full DBB for public deliberation and approval. The Task Group does not have the authority to make decisions on behalf of the Board, nor can it report directly to any federal representative. The members of the Task Group are subject to 18 U.S.C § 208, which governs conflicts of interest.

cc:

Chairman of the Joint Chiefs of Staff Under Secretary of Defense for Acquisition, Technology and Logistics Deputy Chief Management Officer Department of Defense Chief Information Officer

Executive Summary

Section B



The Bottom Line

- We are spending a lot more money than we thought
- We can see a clear path to saving over \$125 billion in the next five years
- The greatest contributors to the savings are early retirements and reducing services from contractors
- Early mobilization is the single biggest lever . . . Every billion saved in 2016 is worth 5 billion FY16-FY20 due to the compounding effect
- Retaining institutional knowledge (keeping the "masters") within the organization is important. We propose granting "retention bonuses" in 2016 and 2017 to these key players as a powerful enabler
- Significant legacy technology obsolescence must be addressed to achieve agility and innovation going forward

6 Core Business Processes (CBP) Admin costs ~\$670 billion FY 16-20

	INNOVATIO	N AND ACILI				
Business functions	Army	Air Force	DoN	4 th Estate	Totals (workforce / cost	
HR Management	\$4.9B	\$2.18	\$3.1B	\$1.3B	84k workforce \$11.4B	
Health Care Management	\$1.6B	\$0.5B	\$0.7B	\$1.3B	30k workforce \$4.1B	
Financial Flow Management	\$1.1B	\$1.4B	\$1.1B	\$1.8B	41k workforce \$5.4B	
Supply Chain & Logistics	\$14.8B	\$10.1B	\$16.9B	\$10.2B	457k workforce \$52.1B	
Acquisition & Procurement	\$12.2B	\$8.5B	\$12.9B	\$4.2B	207k workforce \$37.5B	
Real Property Management	\$8.8B	\$4.2B	\$8.3B	\$1.9B	192k workforce \$22.6B	
Totals (workforce / cost)	337k \$43.4B	216k \$26.8B	345k \$43.28	116k \$20.6B	1,013k baseline workforce \$134B baseline cost	

Note: Fully burdened rate for CIVPERS and MILPERS based on CIVPERS Fringe Benefits Rates & Service Composite Rates. Includes active military personnel only. Numbers may not add due to rounding

Over 1 million people work in these six processes

The workforce equivalent of 40 Pentagons are involved in the six processes



4-8% annual productivity gain for DoD is a realistic goal





Savings Scenarios

Savings by Leve	r - Bas	e Cas	e	-			
	Estimat	led Annu	al Savin	gs (\$B)		Total	% savings
Contracto	2016	2017	2018	2019	2020		4007
Determent	3	1	10	1.5	1d	40	13%
Neuremani	1	2	1 1	- 4	- 10	10	0.76
Agago	- 1		4	- 2	0	10	4.26
u	U	0		1	1	3	14/26
Total	5	11	17	21	22	75	11%
% savings from FY14	3%	8%	12%	15%	16%		
% productivity gain	-	5%	4%	3%	1%		-
Savings by Leve	- Mo	derate					
Davings by Leve	Estimat	led Annu	al Savin	os (SB)		Total S	& savings
	2016	2017	2018	2019	2020		
Contracis	6	10	16	18	21	71	27%
Retirement	3	4	4	5	6	23	10%
Attation	2	3	5	Ê	7	23	10%
T	2	2	2	2	2	9	25%
		_	-	_		-	11245
Total	12	20	27	31	36	125	19%
% savings from FY14	9%	15%	20%	23%	27%		
% productivity gain	~	5%	5%	3%	3%		_
Savings by Leve	- Ag	aressiv	/0			-	
	Estimal	led Annu	al Savin	gs (8B)		Total ?	& savings
	2016	2017	2018	2019	2020		
Contracts	13	13	16	21	26	89	34%
Retirement	5	5	6	后	7	29	19%
Attnilion	2	3	5	6	7	23	4%
T	2	2	2	2	2	9	25%
Total	21	23	28	35	42	150	22%
% savings from FY14	16%	17%	21%	25%	31%	-	
a second damage of the		1000	ALC: N	1000	Sec. 2		

- Implies an initial 3% Year 1 savings and annual productivity gain ranging from 1%-5% over time
 - Modest 5% savings in contracted spend
 - 100% backfilled personnel at lower GS levels

Implies an initial 9% Year 1 savings and annual productivity gain ranging from 3%-5% over time

- 10% Year 1 savings in contracted spend
- Modest early retirement adoption
- Limited backfill of retirements and attrition

Implies an initial 16% Year 1 savings and annual productivity gain ranging from 2%-5% over time

- Aspirational 25% Year 1 savings in contracted spend
- Greater adoption of early retirement
- Limited backfill at lower GS levels

"Warfighter Currency"

Moderate savings scenario of \$125 billion over 5 years could fund the below activities for 5 full years



Potential \$46-89 billion in productivity gains from Contract Spend Optimization FY16-20



\$23-53 billion in productivity gains can be absorbed through retirement & attrition FY16-20







Contract Optimization FY15 Mobilization Timeline

rioritize ontracts	Creat comp	e prioritized lexity and co	set of cont intract term	racts base	d on size.			
tand un				15	2010-001-001-001-001-001-001-001-001-001			
eams	Crea Ensu	te full-time ire resources nizations (e.	teams to in span funct g., Military I	plement ef tions and c Depts and	ffort ross-DoD 4 ^{1h} Estate)			
	Pilot Co Optimi and tra	ontract zation pro in teams	gram 2	Pilot • Crea • Cond	the methodo te playbooks luct intensiv	ology in 3- , template: e training (5 contracts in s, tools, and m program for fi	each category odels ull-time teams
	Full-time ter the methodo priority cont	ams would ir logy cross tl racts	nplement ne high-	Impler Top 10	nent contr 00+ contr	ract opti acts in e	mization p ach busine	rogram acros ss process
			 Begin to renegotiate or take other actions to capture value (e.g., cancel or re-baseline contracts) 				Validate begin rei contracts	savings and negotiating s
	Track s	avings in ce	ntral data	base and r	neasure va	ue captur	e on ongoing	i basis



Accelerate IT Network and Data Center consolidation with Shared Services

Findings:

- Current organization separates IT and business staff into different reporting structures
- IT staff are independent entities spread across the agencies with inconsistent standards, quality, security and strategies, and often lack transparency
- Capital constraints often make basic improvements unachievable. Increasingly expensive to maintain and secure legacy systems*
- Industry resource pool to support legacy code is diminishing (new tech graduates don't want to be COBOL programmers)

Recommendations:

- Establish Information Technology Core Services as a shared-services organization
- Provide cloud provisioning and data pools to Innovation and Agility Support Services and Action Centers using selfservice
- Manage large data pools, mastering key data records, and provide big data analytics and predictive insights across all enterprise business processes
- Use commercial business models to set targets and manage expectations
 - Establish and track metrics to ensure compliance with intended goals
 - Track savings and allow relocations to fund additional modernization efforts*

* See DBB Report FY12-01, "DoD Information Technology Modernization: A Recommended Approach to Data Center Consolidation and Cloud Computing"



Consolidate print services and eliminate/ automate forms

Findings:

- Unmanaged and costly office output environment (copy/fax/print)
 - Low device to employee ratios (1:1, 1:2)
- Decentralized/unmanaged print acquisition across many vendors
- Multiple sub-optimized internal mail and print facilities
- Inconsistent records management policies for retention/destruction compliance
- Reduce/eliminate massive manual forms use that are the result of poor systems and process automation

Recommendations:

- Move to Managed Print Services -20-30% savings opportunity [1]
- Consolidate to print management center of excellence with savings guarantees (25-50%)
- Establish composition and document management center of excellence internally or outsource to trusted partner
- Exploit plummeting cost of digital storage:
 - Migrate from paper to digital archives
 - Scan to searchable pdf's
 - Update paper and electronic destruction policy and capabilities

Reduce risk - concentrate skills with Legacy Migration Shared Services

Findings:

- Considerable business process and application obsolescence
- Inconsistent performance metrics and reporting
- Poor operational, technical and financial transparency
- Substantial waste due to lack of standardization and territorial isolation
- Siloed data results in conflicting analytical views; no single-point-oftruth for data
- Pockets of excellence exist where new technologies have been successfully deployed
- Past implementation failures of largescale technology projects is a resistance multiplier to major change projects

Recommendations:

- Establish legacy migration production lines as a shared service. Build competency centers and best practices to dramatically reduce risk and accelerate change
- Adopt a "coexistence" strategy of old with new data to enable a "run the business while you change the business" approach. Existing systems remain intact and gradually decommissioned as legacy data migrates to a new platform to be virtualized and enhanced
- Adopt a modern adaptive enterprise architecture to provide the tools for dramatically accelerated and lower cost business process modernization
- Adopt a Multi-cloud architecture for ultra scale interfacing through a single, open source cloud foundry foundation, supported by a single DoD enterprise data architecture

Accelerate results - Concentrate skills with Process Redesign Factory

Findings:

- Defense Agencies and military departments (Military Depts) have demonstrated "pockets of excellence" which need to be leveraged
- Few personnel are currently qualified for process redesign; have limited tools
 - Training programs need to be expanded and accelerated
- Historically, successful redesign has required more effort and longer than expected time frames and has been "tribal" in nature
- Substantial business process suboptimization. Lack of inter-Service and Agency collaboration is a major obstacle to high performance modernization
- Capitol Hill constituency and regulations are critical design components

Recommendations:

- Establish Business Process Application Factory as a shared service. Build competency centers and best practices to dramatically reduce risk and accelerate change
- Create business "Process Champions" for each enterprise business process with responsibility for end to end performance, prioritization and productivity
- Focus on the 80/20. Each enterprise business process is comprised of many sub processes. Prioritize these sub processes for redesign by opportunity
- Establish "bold goals," i.e. 50% reduction in cycle time, 30% improvement in productivity, and multi year plans. Don't think incrementally, adopt big ideas
- Create hybrid business process innovation and agility centers staffed with business and technology domain experts, with Defense Business Council (DBC) oversight
- Establish DBC Innovation and Agility "Academy" to accelerate business process redesign skills development
- Align what gets recognized, reinforced, and rewarded with the business process performance improvement goals
Dramatically reduce execution risk with Legacy Migration - App Factory shared services



ω

Legacy Migration Production Lines

Business Process Application Factory



Innovation must be supported by culture change

- Technical solutions are an enabling tool for more efficient, effective and streamlined business processes <u>but will not</u>, by themselves, achieve the savings and process improvements envisioned
- Even in the private sector, only about 17% of fundamental change projects deliver their full potential [2]
- Large organization change experience over decades confirms that success is highly correlated to a few critical project dimensions:
 - Strong, consistent top leadership
 - Clear vision, aligned with strategy and widely communicated
 - Effective governance structure with clear decision-making authority
 - Defined accountability at all levels with reward and enforcement mechanisms
 - Engaged workforce and supportive stakeholders

Design and Implement a DoD Change Strategy to Support Core Business Process Transformation

22

Findings:

- Consistent, committed, visible leadership, the sine qua non for driving successful change is challenging in the DoD environment. Sustained leadership of change is very different from private sector given the short tenure of both civilian and military top leaders
- A trans-DoD strategy and vision for change is extremely difficult in an environment of subcultures among Military Depts and defense agencies
- Governance structures are diffused, clear decision-making authority is often fragmented or nontransparent
- Despite decades of change programs, including some notable success, DoD has no institutionalized agenda or process for change management

- The DEPSECDEF and Service Under Secretaries commit to continued visible and powerful role leading transformation. Consider altering tenure policy for key project leaders
- The top governance structure is confirmed. Roles, authorities and accountabilities are established and widely communicated
- Business case is clearly articulated, and project scope, objectives, metrics and timetable are established, communicated and reinforced
- Leadership identifies and retains appropriate change management experts, internally and externally, to support organizational effectiveness, communications, external relations
- See DBB Report FY11-01, "A Culture of Savings: Implementing Behavioral Change in DoD"

Design and Implement a DoD Change Strategy to Support Core Business Process Transformation (cont.)

Findings:

ω

- There are few performance measures and performance management practices in general use and they are inconsistent across civilian and military workforces
- Legacy of partially successful and unsuccessful programs, together with lack of wide recognition of successful projects, has created a cynical and change-resistant culture
- Experienced and trained experts in critical change components organizational dynamics, communications, stakeholder mapping, strategic external relations - in short supply for major change efforts

- Identify performance management policies least supportive of change objectives and develop strategies to improve them. Set goals and targets for affected populations and actively use existing incentive programs to reward success
- Defuse negative perceptions of change by focusing on user/employee experience.
- Establish two-way communications channels (horizontal and vertical) within DoD, commit to transparent and frequent communication
- Identify skills gaps and provide technical training
- Actively manage natural attrition trends to reduce workforce anxiety.
- Recruit change leaders at all levels of affected organizations and engage user community
- Consider strategies for early "quick wins" and publicize success, including celebrating change champions
- Build internal change management expertise



Design and Implement a DoD Change Strategy to Support Core Business Process Transformation (cont.)

Findings:

- Policies, regulations, protocols and politics, often controlled by external stakeholders and difficult to influence, can represent barriers to trans-DoD change efforts
- But there are some examples of successful large-scale change programs in the public sector and the government - e.g., Internal Revenue Service, Business Systems Modernization

- Revitalize training in LEAN/Six Sigma and other efficiency improvement techniques across core business processes
- Identify policies, practices and artificial constraints that handicap mission-critical improvements and develop influencing strategies to revise them
- Reset critical third-party relationships, including unions and suppliers, based on transparency, shared purpose, collaboration
- Create a detailed stakeholder map of external stakeholders and develop specific strategies for each to communicate, educate and influence as appropriate
- Identify DoD change management successes and use as case studies to describe critical success factors and integrate them into CBP Transformation plan

Critical Success Factors

- Fundamental redesign of core business processes what is the ideal future state?
- Committed and visible leadership
- Powerful vision statement
- Bold Core Business Process Transformation Change plan*
- Clear targets, objectives and metrics
- Dynamic two-way communication strategy with workforce and critical stakeholders
- Implementation of early retirement program*
- Incentives to retain critical talent during transition
- Focus on guick wins
- Acceleration of existing efficiency projects
- Organizational restructuring that creates permanent efficiencies*
- Strategies to break through internal and external obstacles

* See DBB Report FY14-01, "Implementing Best Practices for Major Business Processes in the DOD," pp. 61-69 for 'Human Capital Management '

Rapid mobilization grounded in change management strategy in FY15 required to achieve the FY16 moderate scenario





COMPLETE STUDY WITH FINDINGS AND RECOMMENDATIONS

PROVIDED TO THE BOARD ON JANUARY 22, 2015





Transforming DoD's Core Business Processes for Revolutionary Change

January 22, 2015

Agenda and Task Group Members

- Task Group
- Terms of Reference Overview
- Approach
- Data Analysis Core Business Processes
 - Findings and Recommendations
- Change Management Practices
 - Findings and Recommendations
- Appendices

- Members
 - Ms. Roxanne Decyk (Co-Chair)
 - Mr. Kenny Klepper (Co-Chair)
 - Mr. Philip "Phil" Odeen
 - Mr. Emil Michael

The Bottom Line

- We are spending a lot more money than we thought
- We can see a clear path to saving over \$125 billion in the next five years
- The greatest contributors to the savings are early retirements and reducing services from contractors

- Early mobilization is the single biggest lever . . . Every billion saved in 2016 is worth 5 billion FY16-FY20 due to the compounding effect
- Retaining institutional knowledge (keeping the "masters") within the organization is important. We propose granting "retention bonuses" in 2016 and 2017 to these key players as a powerful enabler
- Significant legacy technology obsolescence must be addressed to achieve agility and innovation going forward

Terms of Reference Overview

Provide Recommendations for:

- Modernizing our business processes and supporting systems
- Creating an agile enterprise shared services organization
- Leveraging industry best practices
- Consolidating IT "utilities" into a shared service
- Conceptual roadmap for staged modernization of an OSD principal staff assistant organization
- Enterprise cash flow model for business process economic and performance optimization
- Enterprise organizational structures to accelerate innovation and agility to end user communities
- Leveraging previous study recommendations

Approach

- Reviewed relevant literature and past DoD studies and reports
- Created a baseline of DoD labor costs across the six core lines of business and conducted analysis of the data
- Interviewed 85+ private industry and current/recent DoD senior military and civilian leaders on business process redesign and enterprise architecture
- Researched "best business practices" private sector, academia, think tanks, DoD, and Federal agencies
- Make actionable recommendations per Tasking from Deputy Secretary of Defense (DEPSECDEF)

6 Core Business Processes (CBP) Admin costs ~\$670 billion FY 16-20



Note: Fully burdened rate for CIVPERS and MILPERS based on CIVPERS Fringe Benefits Rates & Service Composite Rates. Includes active military personnel only. Numbers may not add due to rounding

52

Over 1 million people work in these six processes



Industry "Best Practices" Productivity Gains

Industries with the most rapid change in output

Per Hour, 2000-2010

Wireless communications carriers (except satellite)

Computer and peripheral equipment manufacturing

Electronics and appliance stores

Commercial equipment merchant wholesalers

Employment placement agencies

Electronic shopping and mail-order houses

Semiconductor and other electronic component manufacturin

Travel arrangement and reservation services

Other transportation equipment manufacturing

Photofinishing

Manufacturing and reproducing magnetic and optical media Drugs and druggists' sundries merchant wholesalers Officer supplies, stationary, and gift stores

Video tape and disc rental

Electrical and electronic goods merchant wholesalers Fabric mills

Lawn and garden equipment and supplies stores Cable and other subscription programming Iron and steel mills and ferroalloy manufacturing Motor vehicles manufacturing Private sector assumes annual productivity gain driven by technology, processes improvement and innovation

SOURCE: U.S. Bureau of Labor Statistics

Labor productivity (average annual percent change)

8

4-8% annual productivity gain for DoD is a realistic goal





Savings Scenarios

	Estimated Annual Savings (\$B)					Total % savings		
	2016	2017	2018	2019	2020	1200	and a second	
Contracts	3	7	10	13	13	46	18%	
Retirement	1	2	E	- 4	4	14	6%	
Attrition	1	1	2	2	3	9	4%	
ir.	0	ű	1	1	1	5	14%	
Total	5	11	17	21	22	75	11%	
% savings from FY14	3%	8%	12%	15%	16%			
% productivity gain	-	5%	4%	3%	1%	_	-	
Savings by Leve	r - Moo	derate						
	Estimat	ed Annu	al Savin	gs (\$B)		Total % savings		
	2016	2017	2018	2019	2020			
Contracts	5	10	16	18	21	71	27%	
Retirement	X	4	4	5	6	23	10%	
Attation	2	3	5	6	7	23	10%	
IT .	2	2	2	2	2	9	25%	
Total	12	20	27	31	36	125	19%	
% savings from FY14	9%	15%	20%	23%	27%			
% productivity gain	-	5%	5%	3%	3%	_		
Savings by Leve	- Age	ressi	/e		1 1 1 1	-		
	Estimated Annual Savings (\$B)					Total % savings		
	2016	2017	2018	2019	2020		1000	
Contracts	13	13	16	21	26	89	34%	
Rebrement	5	5	6	6	7	29	19%	
Attetion	2	3	5	6	7	23	4%	
r.	2	2	2	2	2	9	25%	
Total	21	23	28	35	42	150	22%	
% savings from FY14	16%	17%	21%	26%	27%			
% productivity gain	100	2%	3%	5%	5%			

- Implies an initial 3% Year 1 savings and annual productivity gain ranging from 1%-5% over time
 - Modest 5% savings in contracted spend
 - 100% backfilled personnel at lower GS levels

Implies an initial 9% Year 1 savings and annual productivity gain ranging from 3%-5% over time

- 10% Year 1 savings in contracted spend
- Modest early retirement adoption
- Limited backfill of retirements and attrition
- Implies an initial 16% Year 1 savings and annual productivity gain ranging from 2%-5% over time
 - Aspirational 25% Year 1 savings in contracted spend
 - Greater adoption of early retirement
 - Limited backfill at lower GS levels

"Warfighter Currency"

Moderate savings scenario of \$125 billion over 5 years could fund the below activities for 5 full years







Contract Optimization - Team Options



Contract Optimization FY15 Mobilization Timeline

Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	
Prioritize contracts	2	Creat comp	e prioritized lexity and co	set of cont intract term	tracts base 15	d on size,					
Stand up teams	2	Creat Ensur organ	e full-time to e resources iizations (e.g	eams to im span funct ., Military [plement ef ions and cr Depts and 4	fort ross-DoD 4 th Estate)					
		Pilot Co Optimiz and tra	ontract zation pro in teams	gram 2	 Pilot the methodology in 3-5 contracts in each category Create playbooks, templates, tools, and models Conduct intensive training program for full-time teams 						
	• Fu	Full-time teams would implement the methodology cross the high- priority contracts				Implement contract optimization program across Top 100+ contracts in each business process					
				• Beg act car	gin to rene ions to cap icel or re-l	gotiate or ta oture value (baseline con	ke other e.g., tracts)	Validat begin i contra	te saving: renegotia cts	s and ting	
		Track s	avings in c	entral da	tabase ar	nd measur	e value c	apture on	ongoing l	basis	
					15						

Potential \$75-150 billion from productivity gains in FY16-20



Note: These savings assumptions are net of any reinvestments estimates (>10%)

* See DBB Report FY14-01, "Implementing Best Fractices for Major Business Processes in the DOD," pp. 61-69 for 'Human Capital Management - Staffing, Layers, and Spans of Control" 16

Each process has different levers for optimization



17

Capital

Potential \$46-89 billion in productivity gains from Contract Spend Optimization FY16-20



\$23-53 billion in productivity gains can be absorbed through retirement & attrition FY16-20





Accelerate IT Network and Data Center consolidation with Shared Services

Findings:

- Current organization separates IT and business staff into different reporting structures
- IT staff are independent entities spread across the agencies with inconsistent standards, quality, security and strategies, and often lack transparency
- Capital constraints often make basic improvements unachievable. Increasingly expensive to maintain and secure legacy systems*
- Industry resource pool to support legacy code is diminishing (new tech graduates don't want to be COBOL programmers)

Recommendations:

- Establish Information Technology Core Services as a shared-services organization
- Provide cloud provisioning and data pools to Innovation and Agility Support Services and Action Centers using selfservice
- Manage large data pools, mastering key data records, and provide big data analytics and predictive insights across all enterprise business processes
- Use commercial business models to set targets and manage expectations
 - Establish and track metrics to ensure compliance with intended goals
 - Track savings and allow relocations to fund additional modernization efforts*

* See DBB Report FY12-01, "DoD Information Technology Modernization: A Recommended Approach to Data Center Consolidation and Cloud Computing"



Consolidate print services and eliminate/ automate forms

Findings:

- Unmanaged and costly office output environment (copy/fax/ print)
 - Low device to employee ratios (1:1, 1:2)
- Decentralized/unmanaged print acquisition across many vendors
- Multiple sub-optimized internal mail and print facilities
- Inconsistent records management policies for retention/destruction compliance
- Reduce/eliminate massive manual forms use that are the result of poor systems and process automation

- Move to Managed Print Services -20-30% savings opportunity [1]
- Consolidate to print management center of excellence with savings guarantees (25-50%)
- Establish composition and document management center of excellence internally or outsource to trusted partner
- Exploit plummeting cost of digital storage:
 - Migrate from paper to digital archives
 - Scan to searchable pdf's
 - Update paper and electronic destruction policy and capabilities

Reduce risk - concentrate skills with Legacy Migration Shared Services

Findings:

- Considerable business process and application obsolescence
- Inconsistent performance metrics and reporting
- Poor operational, technical and financial transparency
- Substantial waste due to lack of standardization and territorial isolation
- Siloed data results in conflicting analytical views; no single-point-oftruth for data
- Pockets of excellence exist where new technologies have been successfully deployed
- Past implementation failures of largescale technology projects is a resistance multiplier to major change projects

Recommendations:

- Establish legacy migration production lines as a shared service. Build competency centers and best practices to dramatically reduce risk and accelerate change
- Adopt a "coexistence" strategy of old with new data to enable a "run the business while you change the business" approach.
 Existing systems remain intact and gradually decommissioned as legacy data migrates to a new platform to be virtualized and enhanced
- Adopt a modern adaptive enterprise architecture to provide the tools for dramatically accelerated and lower cost business process modernization (see slide 26)
- Adopt a Multi-cloud architecture for ultra scale interfacing through a single, open source cloud foundry foundation, supported by a single DoD enterprise data architecture

Accelerate results - Concentrate skills With Process Redesign Factory

Findings:

20

- Defense Agencies and military departments (Military Depts) have demonstrated "pockets of excellence" which need to be leveraged
- Few personnel are currently qualified for process redesign; have limited tools
 - Training programs need to be expanded and accelerated
- Historically, successful redesign has required more effort and longer than expected time frames and has been "tribal" in nature
- Substantial business process suboptimization. Lack of inter-Service and Agency collaboration is a major obstacle to high performance modernization
- Capitol Hill constituency and regulations are critical design components

- Establish Business Process Application Factory as a shared service. Build competency centers and best practices to dramatically reduce risk and accelerate change
- Create business "Process Champions" for each enterprise business process with responsibility for end to end performance, prioritization and productivity
- Focus on the 80/20. Each enterprise business process is comprised of many sub processes. Prioritize these sub processes for redesign by opportunity
- Establish "bold goals," i.e. 50% reduction in cycle time, 30% improvement in productivity, and multi year plans. Don't think incrementally, adopt big ideas
- Create hybrid business process innovation and agility centers staffed with business and technology domain experts, with Defense Business Council (DBC) oversight
- Establish DBC Innovation and Agility "Academy" to accelerate business process redesign skills development
- Align what gets recognized, reinforced, and rewarded with the business process performance improvement goals
Dramatically reduce execution risk with Legacy Migration - App Factory shared services



Legacy Migration Production Lines

Business Process Application Factory



Innovation must be supported by culture change

- Technical solutions are an enabling tool for more efficient, effective and streamlined business processes <u>but will not</u>, by themselves, achieve the savings and process improvements envisioned
- Even in the private sector, only about 17% of fundamental change projects deliver their full potential [2]
- Large organization change experience over decades confirms that success is highly correlated to a few critical project dimensions:
 - Strong, consistent top leadership

- Clear vision, aligned with strategy and widely communicated
- Effective governance structure with clear decision-making authority
- Defined accountability at all levels with reward and enforcement mechanisms
- Engaged workforce and supportive stakeholders

Best Practices in Change Management Starts with Strong Leadership & Clear Governance

Strong Leadership and Governance Structure

- Leadership at the highest level, actively and visibly engaged is key
- Leader needs small team of highly competent advisors in change management, human resources, communications and stakeholder management available throughout the project
- Senior "business" leaders as well as functional leaders form the governance committee
- Strong project manager reports directly to highest leader

- High level committee or council appointed with relevant senior "business" and functional leaders
- Priority accountability for all members no deputies or substitutes
- Clear accountability for decisions, widely understood decision-making and dispute resolution rules
- Adequate resources (budget and expertise) to support change
- Full-time, experienced project manager with widely-recognized authority

Clear Vision & Defined Accountability are Key

Clear Vision

- Leader crafts the vision for change, aligned with organization's strategy and supported by a powerful case for change
- Vision is widely, frequently and consistently communicated
- Need to communicate with external stakeholders is recognized; the vision and case for change is communicated clearly and frequently to critical external stakeholders

Defined Accountability

- What gets measured gets done; leadership defines key metrics and milestones
- Accountability should be defined at all levels of execution. Key internal stakeholders must clearly understand their responsibilities
- Change champions throughout organization identified and supported
- Early successes are celebrated and rewarded
- Individuals resisting change are identified early and addressed swiftly and consistently
- Pay for performance tools actively applied

Success depends on an engaged workforce and collaboration with stakeholders

Engaged Workforce and Stakeholders

- Key external stakeholders identified, mapped and engaged as appropriate through communication, collaboration and partnership
- Communications with affected workforce and stakeholders is frequent, consistent and two-way - leadership listens and responds to feedback
- Transparency is critical project metrics and milestones, decision rules, progress, reward and enforcement structure
- Benefits to user community "what's in it for me" and recognition of the employee experience – "employee-focused" – are a priority and are made explicit
- User community actively engaged in redesigning work practices in collaboration with relevant functional and technical colleagues

- Successes are rewarded and celebrated. Champions are recognized
- Impact of communications is measured, qualitatively and quantitatively, to test if messages "are sticking"

Design and Implement a DoD Change Strategy to Support Core Business Process Transformation

Findings:

- Consistent, committed, visible leadership, the sine qua non for driving successful change is challenging in the DoD environment. Sustained leadership of change is very different from private sector given the short tenure of both civilian and military top leaders
- A trans-DoD strategy and vision for change is extremely difficult in an environment of subcultures among Military Depts and defense agencies
- Governance structures are diffused, clear decision-making authority is often fragmented or non-transparent
- Despite decades of change programs, including some notable success, DoD has no institutionalized agenda or process for change management

Recommendations:

- The DEPSECDEF and Service Under Secretaries commit to continued visible and powerful role leading transformation. Consider altering tenure policy for key project leaders
- The top governance structure is confirmed. Roles, authorities and accountabilities are established and widely communicated (see slide 32)
- Business case is clearly articulated, and project scope, objectives, metrics and timetable are established, communicated and reinforced
- Leadership identifies and retains appropriate change management experts, internally and externally, to support organizational effectiveness, communications, external relations
- See DBB Report FY11-01, "A Culture of Savings: Implementing Behavioral Change in DoD"

Possible Core Business Process Transformation Governance Structure



Design and Implement a DoD Change Strategy to Support Core Business Process Transformation (cont.)

Findings:

- There are few performance measures and performance management practices in general use and they are inconsistent across civilian and military workforces
- Legacy of partially successful and unsuccessful programs, together with lack of wide recognition of successful projects, has created a cynical and change-resistant culture
- Experienced and trained experts in critical change components – organizational dynamics, communications, stakeholder mapping, strategic external relations – in short supply for major change efforts

Recommendations:

- Identify performance management policies least supportive of change objectives and develop strategies to improve them. Set goals and targets for affected populations and actively use existing incentive programs to reward success
- Defuse negative perceptions of change by focusing on user/employee experience.
- Establish two-way communications channels (horizontal and vertical) within DoD, commit to transparent and frequent communication
- Identify skills gaps and provide technical training
- Actively manage natural attrition trends to reduce workforce anxiety.
- Recruit change leaders at all levels of affected organizations and engage user community
- Consider strategies for early "quick wins" and publicize success, including celebrating change champions
- Build internal change management expertise

Design and Implement a DoD Change Strategy to Support Core Business Process Transformation (cont.)

Findings:

- Policies, regulations, protocols and politics, often controlled by external stakeholders and difficult to influence, can represent barriers to trans-DoD change efforts
- But there are some examples of successful large-scale change programs in the public sector and the government - e.g., Internal Revenue Service, Business Systems Modernization

Recommendations:

- Revitalize training in LEAN/Six Sigma and other efficiency improvement techniques across core business processes
- Identify policies, practices and artificial constraints that handicap mission-critical improvements and develop influencing strategies to revise them
- Reset critical third-party relationships, including unions and suppliers, based on transparency, shared purpose, collaboration
- Create a detailed stakeholder map of external stakeholders and develop specific strategies for each to communicate, educate and influence as appropriate
- Identify DoD change management successes and use as case studies to describe critical success factors and integrate them into CBP Transformation plan

Critical Success Factors

- Fundamental redesign of core business processes what is the ideal future state?
- Committed and visible leadership
- Powerful vision statement
- Bold Core Business Process Transformation Change plan*
- Clear targets, objectives and metrics
- Dynamic two-way communication strategy with workforce and critical stakeholders
- Implementation of early retirement program*
- Incentives to retain critical talent during transition
- Focus on quick wins

81

- Acceleration of existing efficiency projects
- Organizational restructuring that creates permanent efficiencies*

* See DBB Report FY14-01, "Implementing Best Practices for Major Business Processes in the DOD," pp. 61-69 for 'Human Capital Management '

Critical Success Factors (cont.)

- Strategies to address identified obstacles, including:
 - Internal practices and policies
 - Supervisor training
 - Use of performance management tools and incentives
 - Better communication channels across the Military Depts
 - External regulations, Congressional and Administrative practices and policies, long-standing relationships
 - Title 10 -re-interpretation to reduce stove-piping and inefficiencies across Military Depts
 - Tenure of senior leaders large-scale change requires 5-7 years of consistent top leadership
 - OPM regulations address constraints on civilian workforce management
 - Longstanding relationships with core business process system suppliers who are key Congressional constituents – needs of the Department must come before parochial interests

The Prize

Rapid adoption of these recommendations will accelerate existing initiatives and introduce complementary programs that can achieve **\$125B**+ in savings over 5 years – money that can be redirected to critical warfighter priorities







Business Process re-design improves Tools and support for the work force





Create a cost-conscious culture

Findings:

- Government employee performance management policies and regulations are in theory more restrictive than those for contractors
- Regulations require civilian compensation be linked to performance. But this is ineffective because performance metrics are not widely adopted
- Military personnel can seldom be linked to performance via compensation and are rewarded with indirect benefits (e.g., decorations and promotions)
- Departmental productivity increases can be rewarded through savings reinvestment into other areas of the department
- Lack of cash flow and staffing transparency for current processes inhibit redesign business case development

Recommendations:

- Build "base case" process performance metrics; prioritize areas with potentially high savings
- Liberally use available means of recognition (performance bonus, decorations, promotions)
- Develop financial understanding of enterprise business process optimization targets and the relevant transactional drivers
- Enterprise "process champ ons" lead the development of the business case, demonstrating self funding of modernization through productivity improvements
- Deploy productivity targets to the redesign teams and link to compensation
- Establish process redesign schedule to leverage workforce retirement trends to absorb productivity gains. Consider additional multi-year productivity bonuses to achieve this schedule
- See DBB Report FY11-01, "A Culture of Savings: Implementing Behavioral Change in DoD," for a more detailed analysis of obstacles to change and recommendations for achieving a cost-conscious culture

DEFENSE BUSINESS BOARD



Appendix B: Case Studies

- Internal Revenue Service (IRS)
- Logistics Support Agency (LOGSA)
- Defense Integrated Military Human Resources System (DIMHRS)
- Expeditionary Combat Support System (ECSS)
- IBM
- PepsiCo
- Hewlett Packard (HP)
- Lockheed Martin

Case Study: IRS Business Systems Modernization (BMS)

Background

- Goal: Develop and deliver a number of modernized tax administration and internal management systems and core infrastructure projects intended to replace aging business and tax processing systems
- Cost: Multibillion dollar effort
- Scope: BMS is designed to improve and expand services to taxpayers and create internal business efficiencies; provides more reliable and timely financial management information to justify resource allocation decision and funding requests
- Timeline:
 - 2007 IRS developed a high-level modernization vision and strategy to address program policies, procedures, and tools for developing and managing project requirements; and implemented the initial phase of several key automated financial management systems
 - BMS remained on GAO's High Risk List (since 1995) due to challenges with:
 - Improving processes for delivering modernized IT systems within cost and schedule estimates
 - Developing the cost and revenue information needed to support day-to-day decision making
 - Addressing outstanding weaknesses in information security
 - Early 2011 needed to successfully deliver BMS project Customer Account Data Engine 2 (CADE 2) - its cornerstone tax processing project to move individual taxpayer accounts from weekly processing to daily processing cycles
 - Improved its software development practices using the Capability Maturity Model Integration (CMMI), and in September 2012, IRS reached CMMI maturity level 3
 - CADE 2 named among top seven Federal IT acquisitions
 - Starting in fiscal year 2012, Congress no longer required IRS to submit an annual expenditure plan. Was later removed from the High Risk List [3]

Case Study: IRS (cont.) Business Systems Modernization (BMS)

Why it Worked

- Leadership

- Commissioner went to Congress to request funding for the database, a demonstration
 of commitment to a transformation project not seen before
- Chief Technology Officer's challenge to employees: Declared IRS would be will operate "now" as a World Class IT organization
- Implemented a vision and strategy
- Collaborated with stakeholders "suppliers" to build trust
 - Invited suppliers to executive meetings and over time the suppliers began to work as
 part of the IRS organization and goals, not as competitive vendors
 - Executive meetings were focused on identifying key problems to fix and not to point fingers at each other

Lessons learned

- Horizontal and vertical communications a priority internally and with external stakeholders
- Style of leadership and power of the vision: senior leaders took visible ownership of the project and took responsibility for the outcome
- Find a way to engage and inspire the workforce
- Operate in a metric-driven environment: set goals and deadlines, hold to them

Case Study: LOGSA The Value of Outsourcing

Background

- Goal: LOGSA wanted someone to come in and completely take over running the day-to-day data center, and to totally get out of doing this line of business
- Scope: Primary requirement was access to the data when needed; 24 hours, seven days per week

Why it worked

- To overcome resistance from acquisition and contracting experts, LOGSA educated and convincingly described the benefits of outsource managed services
- Outsourcing allowed LOGSA to divest from buying, owning, and maintaining the Hardware required to run the Logistics Information Warehouse (LIW), to include costs associated with hardware licenses used to manage 28 terabyte of data

Lessons learned

 Private sector is much better at using techniques and programs on the current market than DoD, and quicker to adopt cutting edge concepts and applications providing agility and efficiency

Case Study: LOGSA (cont.) The Value of Outsourcing

Lessons learned

- Achieved 50% cost savings, monthly expenses decreased from approximately \$2M to \$1M*
- Able to transform its workforce
- Flat rate service fee, includes emergencies and associated repair costs; and service provider and be penalized for not fulfilling service agreement
- Managing changes to the applications falls under the opuses of the contract, which the services part is routinely reviewed and updated

48

* Source: Interview with Deputy Commander, LOGSA, Dec 2014

Case Study: DIMHRS ERP Implementation and Acquisition

Background

- Goal:
 - One system, one record of service for Active, Reserve and Guard personnel
 - Largest commercial off the shelf (COTS) HR system and enterprise resource planning (ERP) implementation ever attempted
- Cost:

- Initial software development and deployment cost estimates from an independent source ranged from \$380M to \$1.2B [4]
- September 2003, DoD awarded a \$281M contract to develop DIMHRS [5]
- By December 2008, estimated lifecycle costs rose from \$1.78 to \$16.18 [6]
- Scope:
 - Replace 80 separate legacy systems which processed over 3.4 million employees and retirees [7]
 - Combine payroll and personnel functions for all four Services: Army, Navy, Air Force and Marines
 - Army planned to be first to implement, followed by the Air Force, Navy and Marines

Case Study: DIMHRS (cont.) ERP Implementation and Acquisition

Background (cont.)

- Timeline: Began in 1998 with 10 year completion estimate

- October 2005, the Deputy Secretary of Defense established the Business Transformation Agency (BTA) to assume control the DIMHRS acquisition process
- May 2009, DoD determined DIMHRS will no longer be implemented as a total force capability
- September 2009, decided to allow the Army, Navy, and Air Force to develop separate systems and for the Marine Corps to continue using their Marine Corps Total Force System
- February 2010, DoD cancelled the program after 10 years and \$1B [8]

Why it failed

- Interaction between consultants and user community too little and too late
- Geographical location kept project team distant from user community
- Functional oversight over the development was ineffective
- Leadership did not break down siloed mentality and set priorities for the project. Overlapping
 and competing projects occurred simultaneously
- DIMHRS program lacked disciplined processes that included issue resolution, decision-making, and communication
- Unrealistic cost estimates

Called a "disaster" by Chairman of the Joint Chiefs of Staff ADM Michael Mullen [9]

Case Study: DIMHRS (cont.) ERP Implementation and Acquisition

Lessons learned

- Leadership: Need a champion with longevity
- Change management: Culture can be difficult to change
- Governance: Must have transparency; silos must work together
- Requirements: Must stabilize to stop "requirements creep" and focus on the business process, not the "rules"
- Execution: Must have set milestones, schedules, and managed scope and contract costs. Hold people accountable and responsible
- Data conversion: Data cleansing and data mastery allows for smooth interfaces and prevents "garbage-in and garbage-out" information
- Risk management: Requires candid and frank conversations to make decisive comprehensive decisions
- Congressional oversight: Politics, rather than technology, often sets the limits
 of what is allowed to be achieved [10]

Case Study: ECSS

Business Process Reengineering & Complying with Acquisition Best Practices

Background

- Goal:
 - A fully-integrated logistics system that would replace an unspecified number of older, disparate systems
 - Aimed to overhaul hundreds of computer systems to better manage global logistics and supply chain networks
- Cost: \$1.1B over 8 years [11]
- Scope:

86

- Business Process Reengineering (BPR) guidelines and management principles were mandated by several legislative and internal DoD directives and proven private sector principles to ensure a successful and seamless transition from old methods to new, more efficient ways of doing business
- BPR has proven effective in the private sector, allowing Fortune 500 companies to successfully institute large-scale changes within their business, including changes arising from the merger or acquisition of other businesses. Helped introduce radical innovations and quantum leaps into how an organization does business with the goal to operate more efficiently in furtherance of the organization operations

Timeline:

- Began in 2004 with no approved program baseline; therefore no official estimated cost growth. However, GAO reported that the estimated cost grew from \$3B in 2008 to \$5.2B in their Oct 2010 report [12]
- Cancelled in 2012

Case Study: ECSS (cont.)

Business Process Reengineering & Complying with Acquisition Best Practices

Why it Failed

- Cultural resistance to change within the Air Force users refused to accommodate new ways of performing their day-to-day tasks and not willing to alter their existing business processes in order for ECSS to succeed [13]
- Lack of leadership to implement needed changes no champion for the program within senior Air Force leadership and lack of ownership to oversee implementation from inception to completion. High turnover also contributed to a loss of institutional knowledge [14]
- Inadequate mitigation of identified risks at the outset of the procurement not mindful early on of what business processes it needed to change to properly implement a large commercial off-the-shelf (COTS) business system, costly delays could possibly have been avoided or mitigated [15]

The Air Force lacked a clear objective and the organizational will to implement changes to its internal business practices [16]

Case Study: ECSS (cont.)

Business Process Reengineering & Complying with Acquisition Best Practices

Lessons Learned

- Root cause of failure was lack of leadership [17]
- Customizing commercial software is costly, there were over 150 modifications to the original contract, amounting to approximately \$527M obligated to program costs [18]
- Must stabilize program requirements
- Multiple governance structures led to confusion and duplication
 - Strong governance is also necessary for effective change management keeping operational
 requirements that were defined early in the program from changing excessively [19]
- Air Force conducted its own internal "crash report" to gain lessons learned to ensure not to repeat the same mistakes

Case Study: IBM

The Value of Shared Services and Outsourcing

Background

 Goal: Increasing performance and benefits an organization can gain through the use of service delivery models (SDMs) - defined as shared services, outsourcing or some hybrid combination [20]

Scope:

- Findings from the IBM 2010 Global CFO Study, with over 1,900 participating senior Finance executives, support the notion that adopting SDMs drives better value, scalability, efficiency and controls [21]
- The main driver of finance function efficiency is the adoption of "common" process and data standards
- Three key change enablers to address are;
 - · A flexible SDM, in the form of shared services, outsourcing or a hybrid combination
 - Enterprise process ownership, which is an essential prerequisite for transformation to "common" processes and data
 - · A common financial system that enables and sustains "common' processes and data

Why it worked

- Benchmarking study data analysis
 - Over 350 participants quantified benefits that can be gained through the use of SDMs [22]
 - Experienced material improvements of as much as 100% in efficiency, and reduction of 50% or more in costs associated with performing finance and accounting operations [23]

Case Study: IBM (cont.) The Value of Shared Services and Outsourcing

Lessons Learned

- The use of SDMs can be directly associated with lower process costs and higher transaction volumes across general accounting and reporting, and finance operations
- The top quintile median performance companies in their per group that implemented a SDM are 200% more likely to achieve World Class performance, versus companies without a shared services or outsourcing model [24]
- Across general accounting and reporting, analysis revealed companies that used SDMs have median costs as much as 60% lower and efficiency improvements more that 40% higher [25]
- Analysis of individual processes within the finance payroll report time, revealed the SDM per group's total process costs are 29% lower, and personnel costs are 84% lower [26]
- A SDM by itself is not the whole solution
 - SDMs are optimized when deployed in conjunction with two foundational "enablers" [27]
 - Culture and discipline: Process and data standards, enabled by a global process owner, serve as
 "gatekeepers" to maintain common processes. The SDM design and implementation should be
 a compelling value proposition to encourage enterprise adoption of the service model, process
 standards and underlying technology platform
 - Common technology: Enabling common technology across finance and operations, such as common accounting and transaction processing application environment



Case Study: PepsiCo

Change Management and Communications Strategy

Background

- Goal: Transform PepsiCo's Human Capital Management (HCM) infrastructure and operating model from a decentralized to a harmonized global architecture for ~274,000 employees covering 200 countries. "One Version of the Truth" was a key objective for global headcount tracking and management for full-time, part-time, and contract employees with fully enabled Workforce Analytics [28]
- Cost: Multi-million dollar program with an expected internal rate of return of 25-30%*
- Scope: Involved the following interrelated components: (1) Harmonization and reengineering of core global HR processes, (2) With strategic partners and scalable BPO providers, Shared Service enablement (In-sourcing and Outsourcing) through systems deployment and integration of all transactional work (eg., payroll, benefits and core HR transactions), (3) Retirement of 80-90 legacy systems and global deployment of a single HR instance complete with HCM processes and tools capable of providing transparency and networked services and analytics. For large scale operations (eg., US, Canada, Russia and Mexico) SAP payrol instance was used. Smaller scale operations utilized aggregated payroll BPO providers that were interfaced with the SAP HR infrastructure

* Source: Interview with Executive Vice President, HR & Chief HR Officer, PepsiCo, Nov 2014

Case Study: PepsiCo (cont.) Change Management and Communications Strategy

Background (cont.)

Timeline:

- 2008-2010: Harmonization and re-engineering of core HR processes in US and Canada. SAP, Accenture and AON Hewitt (2009) contracted for a SAP HCM and Payroll deployment that involved an integrated end-to-end process between PepsiCo, AON Hewitt and other BPO providers with intent to deploy globally
- 2011-2013: NA SAP successfully deployed with a roadmap developed for ROW that included a global networked HR organization structure, and a cost effective service technology strategy that could be scaled as businesses mature
- 2014-2015: ROW deployment underway and on track to meet program milestones

Why it Worked

 Strong interdependent strategic partners focused on achieving aligned program milestones and metrics. Partners early involvement in the scoping process is critical for program accountability and success

Case Study: PepsiCo (cont.)

Change Management and Communications Strategy

Lessons learned

- Leadership

- Transformational change must start at the top with a clear vision, end-state operating metrics and strong integrated functional governance
- The design, development and launch of a major program must be properly invested with strong leadership, appropriate internal/external talent expertise and trained employees capable of operating in the new environment
- Appointment of an influential, disciplined and detail oriented Program Manager (PM) capable of leading a multi-faceted and complex transformation program. Regular program reviews with senior leaders is critical to ensure milestones are met, provide support when required and through their visible involvement, demonstrate to the organization their commitment and importance of the change. Transparency and trust must be fully in place to deal with the complexity and issues that will surface
- For large scale change that involves organization restructuring and process reengineering, utilization of an organization design company can support assurance of both efficiency and effectiveness of the end-state

Case Study: PepsiCo (cont.)

Change Management and Communications Strategy

Lessons learned (cont.)

- Managing Change
 - Key questions to ask and answer
 - What is the degree of change the Leader and/or organization is trying and willing to make?
 - What benefit or deliverables will the change bring to the employees and organization?
 - A multi-discipline Transformation Team must remain in place to provide continuity and see the change through critical inflection points
 - IT and the business leaders must work seamlessly together. The business leaders must take the lead with support from IT in re-engineering business processes. Business leaders must fully support the PM in harmonizing processes and discourage unnecessary customization (one of the key reasons costs spiral in technology enabled transformation programs)
 - Managing the "blockers" of change
 - Leaders must clearly answer and regularly communicate to employees: Why should I? What's in it for me?
 - As part of the change management process, engage wherever possible, managers and employees in the design of the harmonized processes and end state organization structure. Opposing viewpoints are welcome if accompanied by alternative solutions fitting within the defined scope
 - Develop and deploy a capability building agenda for operating in the new model in advance of go-live timelines. Builds support for successful execution of the change
 - If "blockers" are in senior or middle management positions and not capable of embracing the change, they must be reassigned or exited to ensure success of the transformation
Case Study: PepsiCo (cont.)

Change Management and Communications Strategy

Lessons learned (cont.)

- Communications Strategy
 - Communications and HR professionals must be initial and continual members of the Transformation Team as they are a key part of change management
 - Communications must be multi-channeled and frequent. As early as possible, a
 communication strategy must be developed that includes a foundational document to
 articulate the vision, key components of the change and quantification of the benefit
 to the organization and employees. All other regular communications follow from this
 foundational document to ensure consistency of messaging and enable building
 commitment and momentum for the change
 - Frequent leader-led communications and dialogue using aligned consistent messaging from the Transformation Team is one of the most impactful channels of communication to employees throughout the transformation journey

Case Study: Hewlett Packard (HP)

Leadership and Effective Communications

Background

- Goal: Effective communications in a large complex organization and creating a burning desire to embrace change for the good of the entire organization
- Scope: HP, one of the biggest 25 IT companies on the Fortune 500 list was able to effectively manage during a down budget through strong leadership and a communications strategy [29]

Why it worked

- CEO personally led the effort through strong leadership attributes and behavior
- A defined company rally cry, "HP Way Now"
- A set culture and HP values
- Communicated to groups of people; executive level, different tiers of management levels, partners, employees, etc.
- Messaging touched everyone to ensure all understood the purpose

108

Case Study: Hewlett Packard (cont.) Leadership and Effective Communications

Lessons learned

- Clearly articulate the change and the future state, and why the change is happening, how the change will happen, and the benefits of the change
- Communicate early wins and successes to keep employees engaged and positively reinforce the change
- Map out the change journey for impacted audiences; define each stage of the journey in the words of the employee. Identify key moments of truth
- If you want to drive a change in behavior, the manager is critical. Engage managers early in communication activities to position them to be change agents
- Leadership engagement is critical to driving change; ensure your leaders are visible and available during the change
- Identify those who embrace change and use them as ambassadors to endorse and promote change
- In times of change emotions often overrule logic don't discount or ignore how people are feeling

Case Study: Lockheed Martin Strategic Communications Framework

Background

- Goal: Creating employee excitement and raise awareness to drive change
- Scope: Lockheed Martin, one of the world's largest defense contractors, took the
 principles of Lean and Six Sigma beyond the traditional manufacturing applications to help
 improve processes in administrative and support functions; including accounting, business
 development, payroll, human resources and procurement
- Timeline:
 - In 1998, Lockheed Martin introduced its process improvement program, which included Lean and Six Sigma, evolved from a "best practices" approach to help integrate 17 heritage companies to a corporate way of life [30]
 - After five years of Lean and Six Sigma deployment, Lockheed Martin had accrued more than 54B in certified savings and introduced the methodologies to more than 5,000 leaders [31]

Why it worked

- Hired a professional agency to create and implement a strategic communications framework
- Executive leaders and change agents were trained and routinely met to exchanged lessons learned for continual effective messaging throughout the organization

64

- Leadership played a strong active role, "walked the talk" a set of behavior

Case Study: Lockheed Martin (cont.) Strategic Communications Framework

Lessons learned

- Lack of understanding
 - Lean and Six Sigma terms such as "Kaizen," "Takt time," "Muda," and "Green Belt" were completely foreign to Lockheed Martin employees
 - Many employees were also skeptical of the change process, dismissing Lean and Six Sigma as the newest corporate "fad"
 - The language of process improvement needed explanation and context to help change attitudes, perceptions and behaviors

Communicating effectively

- L.M. Dulye & Co. provided a strategic communications framework and a variety of effective and sometimes unconventional tactics [32]
 - Created a strategy that was segmented to effectively address a diverse audience, helping those with less knowledge understand the importance and impact of successes; while supporting change agents with meaningful stories from around the Corporation to help "sell" their improvement strategies to corporate leaders
 - Customized multiple communications resources to capitalize on the prominence of 2-way, face-to-face and electronic media in the workplace
 - Produced information tools to bolster manager's knowledge, both in introducing the initiative and providing frequent progress updates
 - Developed a variety of electronic, virtual and in-person forums for leaders and change agents to share ideas, successes, challenges and to bolster knowledge and expertise on change management



Footnotes & References

- 1) "Xerox MPS Save Costs and Increase Your Office Productivity," Tallinn, 2012 September: p. 13
- "From Now to Next i4cp, Executive Thinksheet: Organizational Change," i4CP Institute for Corporation Productivity: p. 1
- 3) "High-Risk Series An Update," GAO-13-283, February 2013: p. 12
- "The Biggest PeopleSoft Implementation Ever Implications for Systems Engineering," Project Auditors, LLC: p. 8
- 5) "Acquisition Decision Memo for the DIMHRS," DoD IG Report No. D-2010-041, Feb 5, 2010: p. 1
- 6) Ibid., 7
- "The Biggest PeopleSoft Implementation Ever Implications for Systems Engineering," Project Auditors, LLC: p. 1
- "Army personnel database picks up where Pentagon left off," FWC, The Business of Federal Technology, Sean Lyngaas, May 2, 2014: p. 1
- 9) Ibid.
- "The Biggest PeopleSoft Implementation Ever Implications for Systems Engineering," Project Auditors, LLC: p. 13

Footnotes & References (cont.)

- 11) "The Air Force's Expeditionary Combat Support System (ECSS): A Cautionary Tale on the Need for Business Process Reengineering and Complying with Acquisition Best Practices," Staff Report, Permanent Subcommittee on Investigations, US Senate, July 7, 2014: p. 1
- "Expeditionary Combat Support System: Root Cause Analysis," Institute for Defense Analyses, IDA Paper P-4732: p. iii
- 13) "The Air Force's Expeditionary Combat Support System (ECSS): A Cautionary Tale on the Need for Business Process Reengineering and Complying with Acquisition Best Practices," Staff Report, Permanent Subcommittee on Investigations, US Senate, July 7, 2014: p. 2
- 14) Ibid.
- 15) Ibid., 3
- 16) "Senate report blasts Air Force for \$1.2B logistics system failure," Brian Everstine, Jul 10, 2014: p. 2
- 17) "The Air Force's Expeditionary Combat Support System (ECSS): A Cautionary Tale on the Need for Business Process Reengineering and Complying with Acquisition Best Practices," Staff Report, Permanent Subcommittee on Investigations, US Senate, July 7, 2014: p. 20
- 18) Ibid., 24
- 19) Ibid., 28

Footnotes & References (cont.)	
20) "IBM benchmarks demonstrate the effectiveness of Service Delivery Models for Finance Operations functions," IBM Global Business Services, Benchmarking Brief, August 201	:e and .1: p. 1
21) Ibid.	
22) Ibid.	
23) Ibid.	
24) Ibid., 2	
25) Ibid.	
26) Ibid., 5	
27) Ibid., 6	
28) "Global 2000," Forbes, May 2014, http://www.forbes.com/companies/pepsico/	
29) "The 25 Biggest IT Companies On The 2014 Fortune 500," CRN, Rick Whiting, June 13	2, 2014: p. 23
69	0

Footnotes & References (cont.)

30) "Creating Employee Excitement - Lockheed Martin," L.M. Dulye & Co: p. 1

31) Ibid.

32) Ibid.



List of Interviews Private Sector

Amazon:

Paul Bockelman, Senior Solutions Architect, US Federal/DoD Jim Caggy, Solutions Architect Shannon Kellogg, Director Public Policy Steven Spano (BG Ret), General Manager, Defense & National Security

Edelman Associates:

Harlan Loeb, Global Practice Chair, Crisis & Risk Rob Rehg, Regional President, Washington DC

Hewlett Packard:

Gary Angelo, Senior Director, Strategy & Planning Amanda Hume-Arellano, Human Resources Strategy and Employee Experience Caroline Atherton, Vice President, Clobal Talent Acquisition Marilyn C. Crouther, Senior Vice President & General Manager, Enterprise Services – US Public Sector Jason Ferguson, Vice President, Transformation Brian Hoffman, Vice President, Human Resources – Americas Region Dan Meade, Vice President, Total Rewards

List of Interviews Private Sector (cont.)

IBM:

Anne Altman, General Manager, US Federal Government & Industries Ira Gebler, Partner, Finance, Risk and Fraud Domain Leader Kevin Green (VADM Ret), Vice President, Defense & Intelligence - Federal Ed Lovely, Vice President, Enterprise Transformation Stephen Lubniewski, Partner & Vice President, Defense & Intelligence - Globa Business Services Bruce Morlino, Client Director, Healthcare & Life Sciences Linda Sanford, Senior Vice President, Enterprise Transformation Marc Wangel, Leader, Strategy & Technology Team, Manager & Executive Architect Lisa Yarbrough, Partner, Strategy & Analytics, Public Sector - Global Business Services

Northrop Grumman:

Mark Caylor, Corporate Vice President, President of Enterprise Services & Chief Strategy Officer Karen Lowe, Corporate Director, Army Mission Command, Cyber & Enterprise Robert McCaleb (BG Ret), Corporate Director Government Relations Bernard McVey, Corporate Vice President & Chief Information Officer Linda Mills, Executive Vice President, Northrop Grumman Corporation Kathy Warden, Corporate Vice President and President of Northrop Grumman Information Systems Christina Williams, Director, Enterprise Systems

Pivotal-EMC:

Richard Lamb, Vice President, Field Solutions Team Sudhir Menon, Key Architect, Gemfire & SQLFire Jags Ramnarayan, Chief Architect, "Fast Data" Products

List of Interviews Private Sector (cont.)

Xerox:

Teresa Payne-Nunn, Senior Vice President, Mid-Atlantic & Federal Operations Marlon Miller, Director, Workflow Automation Solutions - Public Sector Mike Zimmer, President, Large Enterprise Operations - US Roy "RG" Conlee, Senior Vice President, Chief Innovation Officer Dr. David Chu, President, Institute of Defense Analyses

Individuals:

David Fisher, Vice President & Business Transformation Officer, SRA International, Incorporation Amy Kates, Managing Partner, Kates Kesler Mark Landy. Vice President, Enterprise Architecture, Johnson and Johnson Terence Milholland, Chief Technology Officer, Internal Revenue Service William Phillips, Principal in Charge of KPMG's Federal Advisory Unit Arnold Purano (MG Ret), Chief Executive Officer, The Punaro Group Dr. Cynthia Trudell, Executive Vice President, Human Resources & Chief Human Resource Officer, PepsiCo Danny Werfel, Director, Public Sector Practice, The Boston Consulting Group Dr. Warren Wilhelm, President, Global Consulting Alliance

List of Interviews Government

OSD:

Manuel Cardenas, Director, C4 & Information Programs Division, Cost Assessment & Program Evaluation Mary Snavely-Dixon, Director, Defense Manpower Data Center HON Alan Estevez, Principle Deputy Under Secretary of Defense for Acquisition LTG Ronnie Hawkins, Director, Defense Information Systems Agency HON Laura Junor, Principal Deputy Under Secretary of Defense for Personnel & Readiness (P&R) Mark Krzysko, Deputy Director, Enterprise Information, Acquisition, Technology and Logistics (AT&L) HON Katrina McFarland, Assistant Secretary of Defense (Acquisition) Teresa McKay, Director, Defense Finance & Accounting Service Michael J. Lincecum, Director, P&R Information Management Christopher Miller, Program Executive Officer, DoD Healthcare Management System Paul Peters, Acting Assistant Secretary of Defense Logistics & Materiel Readiness Philip Rodgers, Principal Deputy Director, Acquisition Resources & Analysis, AT&L Jeffrey Tucker, Program Analyst, Enterprise Information, AT&L

Defense Health Agency (DHA):

David Bowen, Director, Health IT Dr. George Jones, Lead, DHA Pharmacy Operations Division & DoD Pharmacy Benefit COL Guy Kiyokawa, Chief of Staff Joseph Marshall Jr., Director, Business Support Directorate CAPT James Poindexter, Acting Chief, Medical Logistics Division LTG Douglas Robb, Director, DHA Gerard Rutkowski, Facilities Management COL Scott Svabek, Acting Director of Procurement

List of Interviews Government (cont.)

Dept of Air Force:

LTG William Bender, Chief Information Officer Marilyn Thomas, Deputy Chief Management Officer

Dept of Army:

LTG Mark Bowman, Director, Command, Control, Communications & Computers/Cyber, J6 Jeanne Brooks, Director, Technology & Business Architecture Integration David Martin, Deputy Commander, Logistics Support Agency (LOGSA) Brad McCready, Acquisition Management Specialist/Lead Contracting Officer Representative, LOGSA William Smith, Director, Business Transformation Directorate, Office of Business Transformation (OBT) LTG Thomas Spoehr, Director, OBT Robin Swan, Deputy Director, OBT Roy Wallace, Assistant Deputy Chief of Staff G-1

Dept of Navy:

Barbara Hoffman, Former Chief Information Officer

Government Accountability Office:

Cathleen Berrick, Managing Director of Defense Capabilities & Management Carol Chu, Director, IT Acquisition Management Issues David Hinchman, Assistant Director, IT Michael Holland, Assistant Director, IT Eric Winter, Assistant Director, IT

List of Interviews Government (cont.)

American Federation of Government Employee:

J. David Cox Sr., National President John Threlkeld, Assistant Legislative Director Sheila McCready, Defense Consultant

Oak Ridge National Laboratory:

Jeremy Archuleta, Computational Data Analytics Group Jeremy Cohen, Program Manager, Centers for Medicare & Medicaid Services Modernization Project

Task Group Biographies





Roxanne J. Decyk

Former Executive Vice President, Royal Dutch Shell

Roxanne Decyk retired in 2012 from the position of Executive Vice President, Global Government Relations for Royal Dutch Shell.

Previously, she was a member of the Executive Committee of Royal Dutch Shell plc, and served as Corporate Affairs and Sustainable Development Director, Chief of Staff for Shell Oil Company, and head of strategy for Royal Dutch Shell.

Ms. Decyk has also held senior positions with Amoco Oil Corporation and Navistar, formerly International Harvester Company. Early in her career, she practiced law with a major U.S. firm and worked in the advertising and public relations fields.

Active in a number of international industry and community organizations, Ms. Decyk has served on the boards of several companies in both the U.S. and the U.K., and currently is a non-executive director of Petrofac Ltd., Ensco Plc, DigitalGlobe Inc. and ATK. She currently chairs the ATK compensation committee, has chaired remuneration, governance, nominating and audit committees, and has been awarded the Directors Choice Award. She serves as president and a trustee of the Georgia O'Keeffe Museum. In 2013, she was appointed to the Defense Business Board, which advises the Secretary and Deputy Secretary of Defense and other senior government leaders when a private sector perspective is useful. Ms. Decyk has served on the Subcommittee for Capacity Building and Skills Training of the International Council on Women's Business Leadership for the U.S. State Department, and is a member of the Council on Foreign Relations, and the Chicago Council on Global Affairs.

Ms. Decyk graduated from the University of Illinois with a degree in English literature and advertising, and from Marquette University with a Juris Doctor.

In addition to her portfolio of international corporate and philanthropic boards, she continues her research and lecturing on comparative international governance and sustainable development topics, and is a Ford Scholar at the Ford Center for Global Citizenship at Northwestern University.



Kenneth Klepper

Former Present & Chief Operating Officer, Medco Health Solutions

Mr. Klepper is a successful executive with a diverse set of experiences. He served as President and Chief Operating Officer of Medco Health Solutions until 2012.

Mr. Klepper was recruited to Medco Health Solutions in 2003 where he was part of a leadership team that spun the troubled company out from Merck with an initial market cap of \$5.6 billion. Under his leadership, the Fortune 500 company achieved many

financial and industry recognitions, including the No. 1 position in the category "Health Care: Pharmacy and Other Services" on Fortune's Most Admired Companies List from 2007 to 2012. In 2012 Medco was successfully sold for \$29 billion.

From 1995 to 2003 Mr. Klepper was an executive at Empire Blue Cross Blue Shield of New York, the nation's largest Blue Cross franchise. He was the first executive recruited to the CEO's turnaround team to help the company recover from near bankruptcy. Within twelve months, financial stability was achieved and the ensuing years of rapid and profitable growth enabled a successful IPO to a publicly traded company in 2002.

On September 11, 2001, Empire's headquarters was the second largest tenant in the World Trade Center, with 2,000 personnel occupying ten full floors in Tower One and below ground space in Tower Two. Empire lost eleven people in this tragedy. Mr. Klepper was responsible for disaster recovery and the many difficult consequences of the attack. These recovery efforts were singled out and recognized by a Harvard Case Study titled, "The Worst That Could Happen." Overcoming this disaster and recovering the company with minimal lasting operation's disruption was key to the company being positioned for its successful IPO in 2002.

From 1991 to 1995 Mr. Klepper served at CIGNA Health Care where he was responsible for establishing the practice of Business Process Quality Management for CIGNA's California Healthcare operations. Due to the impact of his programs, he was promoted within fourteen months and moved to reporting to the President where he was given national responsibility for CIGNA's provider operations, a critical but troubled part of the company.

Prior to his roles at CIGNA, Mr. Klepper spent nineteen years in the energy industry where he was responsible for Chemical Plant and Refining operations. This experience led to a unique understanding of the intersection of critical process management, advanced computer control, and industrial scale operations.

Mr. Klepper currently serves on the Board of Directors at Diplomat Pharmacy, Inc.

Mr. Klepper is a member of the Defense Business Board and the Chief of Naval Operations Executive Panel, where he has proudly served four CNOs. He also serves on the Board of Directors at the United States Naval Institute.

Mr. Klepper resides in Franklin Lakes, NJ with his wife and has two grown children. He is an avid outdoorsman enjoying sport fishing, motorcycle riding and the study of history.



Emil Michael

Senior Vice President of Business at Uber Technologies, Inc.

Emil Michael is the Senior Vice President of Business at Uber Technologies, Inc., an Internet start-up based in San Francisco, CA. In addition, he is an investor/advisor in and to several other technology companies, including: Boku, Bureau of Trade, ChatID, Codecademy, Evolv, Flipborad, Fonality, IfOnly, GroupMe (sold to Skype), Jawbone, Jelli, Lookout, Picadee, RingCentral, Rockmelt, SignNow, SnipIt, SweetGreen, Swipely, Taser, ThinkFuse (sold to Salesforce.com), Xobni and ZocDoc. Previously, Mr. Michael was

the Chief Operating Officer and member of the Board of Directors of Klout, Inc., Senior Vice President of Field Operations at Tellme Networks, Inc. (sold to Micrsoft) and an associate in Goldman Sachs' Communications, Media and Entertainment Group in New York City.

Mr. Michael served as a White House Fellow to the Secretary of Defense from 2009 through 2011. He is a graduate of Harvard University with an AB degree in Government and Stanford Law School where he received a JD. Emil currently lives in San Francisco.



Philip A. Odeen

Corporate Board Director, Former Chairman AES Corporation & Convergys

Phil Odeen is the non-executive Chairman of AES, an international power company and Convergys, a leading outsourcing company. He is former chairman of Avaya Inc., as well as Reynolds & Reynolds, and served as interim CEO of Reynolds & Reynolds from 2004-2005. From the fall of 2005 until mid 2006, Mr. Odeen served as CEO of QinetiQ North America, a leading U.K. defense technology company and supported the company's expansion. He continues to serve on their U.S. Board.

Earlier, Mr. Odeen was Chairman and CEO of TRW, a major industrial corporation providing advanced-technology products and services primarily in the automotive, defense, and aerospace sectors, which was acquired by Northrop Grumman in 2002. Prior to becoming Chairman, he was a member of TRW's Management Committee and responsible for TRW's \$3 billion Systems and Information Technology business. He also served as executive Vice President of Washington, DC operations.

Mr. Odeen was President and CEO of BDM, which TRW acquired in 1997, and directed its growth and evolution as a multi-national information technology (IT) firm. Under his leadership, BDM grew from under \$300 million in revenue to over \$1 billion in five years. Mr. Odeen served as Vice Chairman Management Consulting Services, at Coopers & Lybrand, where he directed a practice of 2,500 consultants in 30 cities across the United States. Earlier, he served as Managing Partner of the firm's public sector practice for 13 years. From 1973 to 1978, he was Vice President of the Wilson Sporting Goods Company.

Mr. Odeen has served in senior positions with the Office of the Secretary of Defense and the National Security Council staff. He was Principal Deputy Assistant Secretary of Defense (Systems Analysis) and later led the Defense and Arms Control staff for then-National Security Advisor, Henry Kissinger. In 1997, Secretary of Defense William Cohen selected Mr. Odeen to chair the National Defense Panel. He is a member of the Chief of Naval Operations Executive Panel, and was a member and former Vice Chairman of the Defense Science Board. Mr. Odeen is a Fellow of the National Academy of Public Administration.

List of Acronyms



LIST OF ACRONYMS

ADMIN	Administrative
APP	Application
BMS	Business Systems Modernization
BPO	Business Process Outsourcing
BPR	Business Process Reengineering
BTA	Business Transformation Agency
CADE	Customer Account Data Engine
CAPT	Captain
CBP	Core Business Processes
CEO	Chief Executive Officer
CFO	Chief Financial Officer
CIO	Chief Information Officer
CIV	Civilian
CIVPERS	Civilian Personnel
CMMI	Capability Maturity Model Integration
CNAS	Center for a New American Security
CO	Company
COTS	Commercial off the Shelf
CTR	Contract
DBB	Defense Business Board
DBC	Defense Business Council
DCMO	Deputy Chief Management Officer
DEPSECDEF	Deputy Secretary of Defense
DEPTS	Departments
DEV	Development
DEXCOM	Deputy Executive Committee
DIMHRS	Defense Integrated Military Human Resources System
ECSS	Expeditionary Combat Support System
ERP	Enterprise Resource Planning
FF	Financial Flow
FTE	Full-time Equivalent
FY	Fiscal Year
GAO	Government Accountability Office
GS	General Schedule
HC	Human Capital
HCM	Human Capital Management
HP	Hewlett Packard
HR	Human Resource
IRS	Internal Revenue Service
IT	Information Technology

LIW	Logistics Information Warehouse
LOG	Logistics
LOGSA	Logistics Support Agency
MIL	Military
MILPERS	Military Personnel
OPS	Operations
OSD	Office of the Secretary of Defense
PDF	Portable Document Format
PM	Program Manager
PROC	Procurement
ROI	Return on Investment
ROW	Remote Operational Web
RPM	Real Property Management
SAP	Systems Application and Products
SDM	Service Delivery Model
SECDEF	Secretary of Defense
TECH	Technology
US	United States
USG	United States Government
USN	United States Navy
VCJCS	Vice Chairman Joint Chiefs of Staff

Bibliography



BIBLIOGRAPHY

American Print Management, e-LYNXX Corporation. *Print Management Program Offers Compelling Return on Investment Without Up-front Investment or Risk.* 2010.

Army Brigade Combat Team FY14 Estimated Costs. Office of the Deputy Chief Management Officer. January 20, 2015.

Average yearly cost of a combat coded 24 Primary Assigned Aircraft F-16 Squadron. Office of the Deputy Chief Management Officer. January 21, 2015.

Brian Everstine. Senate report blasts Air Force for \$1.2B logistics system failure. July 10, 2014.

Center for a New American Security. *At What Cost a Carrier?* Disruptive Defense Papers. Captain Henry J. Hendrix, US Navy (Ph.D.). March 2013.

Centers for Medicare & Medicaid Services. Section 6402(a) Solution Approaches: Linked Data Application Functionality and Logical Integration to Enable Analytics. Oak Ridge National Laboratory. September 2013.

- » Section 6402(a) Solution Approaches: Software Infrastructure Report Integrating Provider Databases into Linked Structures. September 2013.
- » Section 6402(a) Concept of Operations Evaluation and Toolkit. June 2013.
- » *Big Data' in health care: How good is it?* Sreenivas R. Sukumar, Natarajan Ramachandran, and Regina K. Ferrell. 2014.
- » Concept of Operations for Knowledge Discovery from "Big Data" Across Enterprise Data Warehouses. Sreenivas R. Sukumar, Mohammed M. Olama, Allen W. McNair and James J. Nuta. 2014.

CRN, Rick Whiting. The 25 Biggest IT Companies On The 2014 Fortune 500. June 12, 2014.

Defense Acquisition University. *Introduction to Defense Acquisition Management. Brad Brown.* August 2010.

Defense Business Board. Business Management Modernization Program Report. May 2005.

- » DoD Information Technology Modernization: A Recommended Approach to Data Center Consolidation and Cloud Computing Report. FY12-01.
- » Global Logistics Management Report. FY11-07.

- » Implementing Best Practices for Major Business Processes in the Department of Defense Report. FY14-01.
- » Innovation and Cultural Change Report. May 2006.
- » *Management Information Report.* December 18, 2002.

Defense Science Board. Department of Defense Policies and Procedures for the Acquisition of Information Technology. March 2009.

» The Impact of e-Business on DoD Acquisition Processes. July 2002.

Deloitte. *Tech Trends 2013 Elements of postdigital.* 2013 Technology Trends.

Department of Defense, RefID: F3240A3. 2014 Congressional Report on Defense Business Operations. March 11, 2014.

Department of Defense, RefID: B-C61E52D. *Strategic Management Plan, The Business of Defense, FY2014-2015.* July 1, 2014.

Director, Architecture & Interoperability, Office of the Department Defense Chief Information Officer. *Department of Defense Enterprise Roadmap.* Submission of the Office of Management and Budget. 2013-2014.

Forbes. *Global 2000.* < *http://www.forbes.com/companies/pepsico/* > May 2014.

Gartner, Industry Research G00246516. *Predicts 2013: Government IT will be Disrupted by the Nexus of Forces.* November 15, 2012.

General Raymond Odierno's testimony to the Senate Arms Services Committee. CHARRTS No.: SASC-13-003. April 08, 2014.

Government Accountability Office -13-283. High-Risk Series An Update. February 2013.

i4CP Institute for Corporation Productivity. *From Now to Next – i4cp, Executive Thinksheet: Organizational Change.* Amy Kates. Kates Kesler Organization Consulting. 2014.

IBM. *IBM: Cloud Computing and Open Standards, A Perspective for the U.S. Federal Government.* December 2013.

» DoD Innovation Day 2014. IBM Cloud Capabilities Briefing. Chip McClelland. 2014 IBM Corporation.

- » Global Business Services, Benchmarking Brief. *IBM benchmarks demonstrate the effectiveness of Service Delivery Models for Finance and Operations functions*. August 2011.
- » Global Technology Services, Thought leadership white paper. *The next-generation data center – A software defined environment where service optimization provides the path.* May 2014.

Inspector General, Department of Defense, Report No. D-2010-041. Acquisition Decision *Memo for the DIMHRS.* February 5, 2010.

Institute for Defense Analyses, IDA Paper P-4732. *Expeditionary Combat Support System: Root Cause Analysis.* October 2011.

Office of the Secretary of Defense. A New Approach for Delivering Information Technology Capabilities in the Department of Defense. Report to Congress, November 2010.

Permanent Subcommittee on Investigations, U.S. Senate Staff Report. Defense Acquisition *Reform: Where Do We Go From Here? A Compendium of Views by Leading Experts.* October 2, 2014.

Project Auditors, LLC, Project Management Institute. *The Biggest PeopleSoft Implementation Ever – Implications for Systems Engineering.* 2004.

Response to Section 931(a) of the FY 2013 National Defense Authorization Act (NDAA). *The Department of Defense Strategy for Implementing the Joint Information Environment (JIE).* RefID: 0-2F91712. September18, 2013.

FWC, The Business of Federal Technology. Army personnel database picks up where Pentagon left off. Sean Lyngaas. May 2, 2014.

Staff Report, Permanent Subcommittee on Investigations, U.S. Senate. *The Air Force's Expeditionary Combat Support System (ECSS): A Cautionary Tale on the Need for Business Process Reengineering and Complying with Acquisition Best Practices.* July 7, 2014.

Tallinn. Xerox MPS – Save Costs and Increase Your Office Productivity. September 2010.

TICONDEROGA-Class (CG 47) Cruiser FY14 Estimated Costs. Office of the Deputy Chief Management Officer. January 20, 2015.

Defense Business Board Members

Section G
DEFENSE BUSINESS BOARD MEMBERS

Robert Stein, Chair, President, The Regency Group Nancy Killefer, Vice Chair, Senior Partner, McKinsey & Company, Inc. **Dr. Cynthia Trudell,** Vice Chair, Executive Vice President, Human Resources & Chief HR Officer, PepsiCo, Inc. **Denis Bovin,** Senior Advisor, Evercore Partners Howard Cox, Advisory Partner, Greylock Partners **Roxanne Decyk**, Former Executive Vice President, Royal Dutch Shell **Taylor Glover,** President & Chief Executive Officer, Turner Enterprises, Inc. **Kenneth Klepper,** Former President & Chief Operating Officer, Medco Health Solutions **David Langstaff**, Former President & Chief Executive Officer, TASC, Inc. Shelly Lazarus, Chairman Emeritus, Ogilvy & Mather **Emil Michael,** Senior Vice President of Business, Uber Technologies, Inc. **Thomas Nides,** Managing Director & Vice Chairman, Morgan Stanley **Philip Odeen,** Corporate Board Director, Former Chairman AES Corporation & Convergys Nicholas Pinchuk, Chairman & Chief Executive Officer, Snap-on Inc. William Phillips, Principal in Charge, Federal Advisory Unit, KPMG **Mark Ronald,** Former Chief Executive Officer, BAE Systems, Inc. Kevin Walker, Chief Operating Officer, Iberdrola, USA **HON Daniel Werfel,** Director, Public Sector Practice, The Boston Consulting Group Joseph Wright, Chairman, MTN/Seamobile, Former Chief Executive Officer, Scientific Games, Intelsat HON Dov Zakheim, Senior Advisor, Center for Strategic and International Studies

Jack Zoeller, Chairman & Chief Executive Officer, Bank of Virginia



Business Excellence in Defense of the Nation http://dbb.defense.gov/



Defense Business Board

1155 Defense Pentagon Washington, DC 20301-1155