

MISSION SUPPORT ALLIANCE

"WE WILL MEASURE OUR SUCCESS BY OUR CUSTOMERS' SUCCESS"



Monthly Performance Report October 2016

W. K. Johnson
President

U.S. Department of Energy
Contract DE-AC06-09RL14728



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This list of acronyms is intended as a reference for the reader to provide definitions that are not readily available away from the Hanford Site.

TERMS

AMB	Assistant Manager for Business and Financial Operations
AMMS	Assistant Manager for Mission Support
AMRP	Assistant Manager for River and Plateau
AMSE	Assistant Manager for Safety and Environment
BCR	Baseline Change Request
BO	Business Operations
CHPRC	CH2MHILL Plateau Remediation Company
CTD	Cost-to-Date
CV	Cost Variance
DART	Days Away Restricted Transferred
DLA	Direct Labor Adder
DOE	U.S. Department of Energy
ECOLOGY	State of Washington, Department of Ecology
EM	Office of Environmental Management
ES	Emergency Services
ES&H	Environment, Safety, and Health
FY	Fiscal Year
FYTD	Fiscal Year to Date
HAMMER	Volpentest Hazardous Materials Management and Emergency Response Training and Education Center
HCAB	Hanford Contract Alignment Board
HLAN	Hanford Local Area Network
HQ	Headquarters
HRIP	Hanford Radiological Instrumentation Program
HSPD	Homeland Security Presidential Directive
IH	Industrial Hygiene
IM	Information Management
IIP	Integrated Investment Portfolio
ISAP	Infrastructure and Services Alignment Plan
ISMS	Integrated Safety Management System
LMSI	Lockheed Martin Services, Inc.
MSA	Mission Support Alliance, LLC
MSC	Mission Support Contract

ACRONYMS LISTING



NEPA	National Environmental Policy Act
OCCB	Operational Change Control Board
ORP	Office of River Protection
PFM	Portfolio Management
PFPP	Plutonium Finishing Plant
PMB	Performance Measurement Baseline
PMTO	Portfolio Management Task Order
PNNL	Pacific Northwest National Laboratory
PO	Presidents Office
POSP	Parent Organization Support Plan
PPE	Personal Protection Equipment
PTA	Patrol Training Academy
PW	Public Works
RHP	Risk Handling Plan
RL	Richland Operations Office
SAS	Safeguards & Security
SS&IM	Site Services and Interface Management
SV	Scheduled Variance
T&CO	Training and Conduct of Operations
TRC	Total Recordable Case
UBS	Usage-Based Services
VoIP	Voice over Internet Protocol
VPP	Voluntary Protection Program
WBS	Work Breakdown Structure

1.0 INTRODUCTION

The Executive Overview section is intended to provide an executive-level performance overview. Included herein are descriptions of the Mission Support Alliance, LLC (MSA) significant accomplishments considered to have made the greatest contribution toward safe, environmentally sound, and cost-effective, mission-oriented services; progress against the contract with U.S. Department of Energy (DOE) Richland Operations Office (RL); project cost summary analysis; and overviews of safety. Unless otherwise noted, all data provided is through October 2016.

1.1 KEY ACCOMPLISHMENTS

Technical Improvement & Efficiency Opportunities – Portfolio Management (PFM) provided assistance with the documentation and submittal of new technical improvements for the RL Plutonium Finishing Plant project. Additionally, PFM supported the October 19, 2016, RL Groundwater Project review of technical improvements, the aim of which is to move them through the decision process, close-out those that have been implemented, and document the lifecycle cost savings.

Light-Emitting Diode (LED) Street Lights Installed at Central Plateau – Electrical Utilities (EU) personnel continued work on various Central Plateau lighting upgrades. In some locations, past projects removed old regulated output lighting circuits, and per code, they could not be reinstalled. As these older perimeter lighting systems are being eliminated, EU is looking to install more energy-efficient LED lighting. LED pole lights are brighter, use less energy, produce less waste, and operate longer than fixtures with low-pressure or high-pressure sodium lamps.



Lighting upgrades include installation of energy efficient LED lights

Pole Removal to Assist Tank Farm Access Gate – EU continues to support Central Plateau contractors as they plan for future work. Lineman removed two power poles for Washington River Protection Solutions (WRPS) to prepare for installation of a new 241A Tank Farm access gate along Buffalo Street. WRPS needs long-length equipment to enter and exit the area, and the power poles were in the way. Originally, the poles were going to be moved, but after much planning, the span of wire was adequately supported and only removal was required.



Power poles removed to support cleanup efforts

Footprint Reductions – EU personnel continued footprint reductions as they removed three transformers from a recently de-energized 11-mile section of 13.8kV line. These three transformers once fed the 100F Reactor, 100F Meteorological Tower/Air Monitor, and Hanford Town Site’s Meteorological Tower/Air Monitor. Approximately eleven miles of power lines and 300 poles are proposed removals for FY 2017 footprint reductions.



Removing transformers from de-energized line

Sanitary Water Line Cut and Cap Work – With demolition beginning at the Plutonium Finishing Plant (PFP), MSA Water & Sewer Utilities (W&SU) operators are working with CH2M HILL Plateau Remediation Company (CHPRC) Maintenance personnel to cut and cap various lines going into the PFP Complex. W&SU will support a total of 13 cut and caps as CHPRC brings PFP to slab-on-grade. On October 26, 2016, the first cut and cap was successfully completed at the Plutonium Reclamation Facility (PRF). MSA’s Licensed Operators disinfected new parts that were added to the system and

collected Bacti samples to ensure there was no impurities introduced into the system during the cut and cap. W&SU will continue to support the PFP demolition throughout the next year.

MSA Fundraiser for Breast Cancer – MSA Cares raised more than \$7,300 for the “Making Strides Against Breast Cancer” campaign, making MSA the top fundraising team for the October 15, 2016 event.



MSA Cares Fundraising Team

Annual Pump Testing – Hanford Fire Department (HFD) personnel conducted its annual pump testing of HFD apparatus pumps on October 12-13, 2016.

The annual pump testing is performed by the Underwriter Laboratories subcontractor with assistance from HFD personnel. The testing allows the HFD to meet National Fire Protection Association 1911 Standard for the Inspection, Maintenance, Testing and Retirement of In-Service Automotive Fire Apparatus recommendations.

Archaeological Inventory Survey – Public Safety & Resource Protection (PSRP) Cultural and Historic Resource Program (CHRP), in conjunction with Wanapum tribal members, performed an Archaeological Inventory Survey of previously un-surveyed areas on the Hanford Site. The Archaeological Survey was conducted to meet the provisions of Section 110 of the National Historic Preservation Act, which requires federal agencies to assume responsibility for the stewardship of Federal-owned or controlled of historic properties. The survey was conducted to identify archaeological sites in areas that had not been previously surveyed.

Smart Card Personal Identity Verification (PIV) Project Continues Moving Forward - MSA Information Management completed configuration of smart card PIV authentication for privileged users in the Hanford management domain. Administrators are now able to log in to this system the same way they have been able to on the main Hanford Local Area Network (HLAN) system.

Plutonium Finishing Plant (PFP) Demo Camera Project – MSA installed seven network cameras in support of the demolition project at the PFP. Five of the cameras were Pan, Tilt and Zoom cameras, which will provide the customer enhanced oversight for its project. For this effort MSA pulled two new fiber optic cables, installed two HLAN network switches and three new power supplies, as well as other miscellaneous hardware. It was a large endeavor within a short turn-around timeframe.

Volpentest HAMMER Federal Training Center (HAMMER) Support to DOE After

Hurricane Matthew – During October, HAMMER supported DOE’s Emergency Support Function #12 (ESF #12) Energy Response Team’s response to Hurricane Matthew. On Tuesday, October 4, 2016, HAMMER staff began deploying team members to Federal Emergency Management



Region IV response coordination center in Atlanta, Georgia

Agency response centers ahead of the storm to ensure readiness to assess the damage after landfall. ESF#12 team members were deployed to the National Response Coordination Center in Washington, D.C., Region IV Regional Response Coordination Center (RRCC) in Atlanta, Georgia, and Region III RRCC in Philadelphia. Additionally, responders were sent to assist energy restoration in the Emergency Operations Centers in Florida, Georgia, North Carolina, and South Carolina.

HAMMER Hosts 45th Steering Committee Meeting – Eric Dean, General President, International Association of Bridge, Structural, Ornamental and Reinforcing Iron Workers and Dan Stepano, General President, Operative Plasterers and Cement Masons, chaired the 45th HAMMER Steering Committee Meeting at HAMMER on October 27, 2016. The meeting focused on celebrating the Secretary’s Best Practices, preparations for administration and contract changes, and the progress of the DOE Training Institute. The meeting was attended by members of the Steering Committee, as well as the following guest speakers: David Foster, Senior Advisor representing the Secretary of Energy; Glenn Podonsky, Director, Office of Enterprise Assessments; Joe Franco, RL Assistant Manager for Mission Support; Karen Boardman, Director, National Training Center; Mari-Jo Campagnone, Director, Office of Outreach and Analysis; and Jimmy Hart, President, Metal Trades Department, American Federation of Labor-Congress of Industrial Organizations. Natasha Campbell, Senior Advisor to the Secretary of Energy, was also present.

Upgrades to 318 Lift Station – On October 3, 2016, Maintenance Services, with support from MSA’s Water Utilities, Crane & Rigging, Motor Carrier Services, and Safety & Health functions, began upgrades to the 318 Lift Station in the 300 Area. This was a high priority job for Water Utilities because it supports the eventual transfer of the system to Pacific Northwest National Laboratory (PNNL). Activities included removal

of sewage pumps and piping, installation of the pumps and bases, installation of a tie-in between the new pumps and the existing discharge piping, setting and anchoring of the guide rails, and preparing the tank for the new lid.



Crews removed piping and installed pump/bases at the 318 Lift Station

Nozzles Installed and Mechanical Installation Completed on 283W Filter Beds –

During October, Maintenance Services workers, with support from MSA’s Water Utilities, Safety & Health, and Crane & Rigging staff, installed 10 trial nozzles into filter bed #4 at the 283W Water Plant and completed the mechanical installation for filter beds #3 and #4. Activities included replacement of the 8-inch butterfly valve on the pipe gallery elevation; removal and replacement of the 12-inch hydraulic gate valve; removal and replacement of the hydraulics and removal of grout; and installation of the stand, electric actuator, and stem assembly. The filter under the drain was



cleaned and the floor hatch installed on the nozzle bed. On October

Mechanical installation for filter beds



29, 2016, crews completed removal of the majority of media in filter bed #3, with the final cleaning of the filter bed completed on October 31, 2016. This was a high-priority project for Water Utilities

because it allowed for the rebuilding of filter beds without significantly impacting operations.



Final vacuuming of filter beds

2.0 ANALYSIS OF FUNDS

Table 2-1. Mission Support Alliance, LLC Funds Management (dollars in thousands).

Funds Source PBS	Title	DOE Expected Funds	** Funds Received	FYTD Actuals	Remaining Available Funds from Funds Received
ORP-0014	Radiological Liquid Tank Waste Stabilization and Disposition Operations	\$52.7	\$446.4	\$131.6	\$314.8
HSPD (RL11,12,13,30)	Homeland Security Presidential Directive 12	\$1,204.0	\$1,143.9	\$187.2	\$956.7
RL-0020	Safeguards & Security	\$70,000.0	\$19,203.1	\$4,083.1	\$15,120.0
RL-0040	Reliability Projects/HAMMER/ Inventory	\$52,748.3	\$19,086.0	\$1,049.8	\$18,036.2
RL-0041	B Reactor	\$2,334.8	\$4,438.4	\$168.6	\$4,269.8
SWS	Site-Wide Services	\$206,270.6	\$49,995.8	\$11,070.8	\$38,925.0
Total		\$332,610.4	\$94,313.6	\$16,691.1	\$77,622.5

FYTD = Fiscal Year to Date.

HAMMER = Volpentest HAMMER Training and
Education Center.

PMTO = Portfolio Management Task Order.

EAC = Estimate at Completion.

PBS = Project Baseline Summary.

SWS = Site-Wide Services.

PD = Project Development.

** Funds received through Contract Modification 562, dated November 4, 2016

The remaining uncosted carryover balance will fund SWS through January 11, 2017 and RL20 through January 16, 2017 based on a burn rate utilizing FYTD 2017 actual costs.





3.0 SAFETY PERFORMANCE

MSA experienced no injuries that fell under the classification of “recordable” during the month of October.

Therefore, the fiscal year 2017 total recordable case (TRC) and Days Away, Restricted or Transferred (DART) rates are both 0.0 and well below the EM performance goals of 1.1 and 0.60, respectively. At the end of October, MSA has achieved 1.3 million work hours without a lost work day injury.

MSA remains diligent in monitoring First Aid injury cases as these non-reportable precursors are a leading indicator to reportable events. An increase in the number of First Aid cases could indicate a potential increase of more significant incidents. October concluded with eight reported First Aid injury cases which is about average for MSA in a given month.

The safety awareness campaign continued through another month with efforts to enhance hazard awareness and implementation of controls for workplace injuries by focusing on the Integrated Safety Management System (ISMS), Voluntary Protection Program (VPP), MSA Safety Improvement Plan and "Walking Through Life" injuries and prevention. The campaign includes the following activities:

- Issuing safety bulletins for emergent hazardous conditions that require immediate attention,
- Addressing injury statistics and actions at Employee Zero Accident Council (EZAC)/President’s ZAC, and all-manager and all-employee meetings,
- Developing Weekly Safety Starts that target specific safety discussion topics, and
- Increasing safety communications by exercising various distribution methods throughout the workforce.



Table 3-1. Total Recordable Case Rate, (TRC)

Objective

To monitor the Total Recordable Case (TRC) rate for MSA employees and subcontractors (Note: does not include independent subcontractors)

Measure

The TRC is measured in accordance with OSHA guidelines for reporting and calculating. The rate is calculated by multiplying the number of Recordable cases by 200,000 and dividing by the total number of work hours.

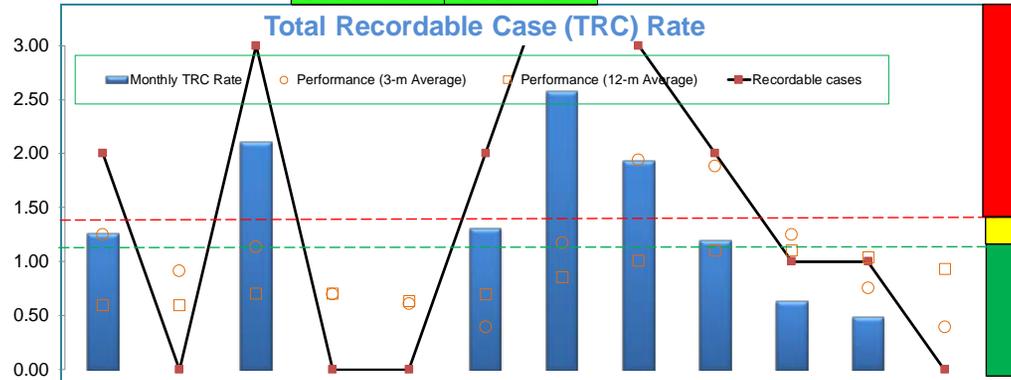
Performance Thresholds

Adverse	> 1.3
Declining	1.1 - 1.3
Meets	< 1.1

Performance Data

	Nov-15	Dec-15	Jan-16	Feb-16	Mar-16	Apr-16	May-16	Jun-16	Jul-16	Aug-16	Sep-16	Oct-16
Monthly Recordable Cases	2	0	3	0	0	2	4	3	2	1	1	0
Monthly TRC Rate	1.25	0.00	2.11	0.00	0.00	1.31	2.57	1.94	1.20	0.63	0.49	0.00
Performance (3-m Average)	1.25	0.92	1.13	0.70	0.61	0.40	1.17	1.94	1.88	1.25	0.76	0.40
Performance (12-m Average)	0.60	0.60	0.71	0.70	0.63	0.70	0.85	1.01	1.11	1.10	1.04	0.93

FY16 = 0.00 CY16 = 0.98



Specific Goal to Achieve

The MSA goal is to "do work safely" and achieve target zero by reducing injuries, accidents and incidents. The DOE-EM goal is to maintain a TRC rate below 1.1.

Leading Indicator Description

TRC is a lagging indicator.

Performance Indicator Information

PI Owner:	Lanette Adams
Data Analyst:	Ron Wight
Data Source:	MSMET
PI Basis:	MSC-MP-003, Sect. 4.0
Date:	11/3/2016

Analysis

During the month of October, there were no injuries classified as 'Recordable'.

2017 FYTD TRC Cases: 0
 2016 FY TRC Cases: 20
 2015 FY TRC Cases: 10

Types of injuries MSA experienced during FY 2016 that were classified as Recordable:

- Nine caused by struck by an object, four caused by overexertion, four by a trip/fall, one by foreign object in the eye, one by a vehicle accident, one contact with
- Nine different body parts have been affected: Finger (6), knee (3) head (4), ankle (2), whole body, shoulder, hip, eye, and back

Action

Injury Prevention Actions:

- MSA continuously reviews and discusses progress on Safety Improvement Plan (SIP) actions and upcoming requirements. These discussions occur within the senior management team and Employee Zero Accident Council (EZAC)/Integrated Safety Management System (ISMS), POCs and safety representatives.
- MSA has initiated and will continue for the next few months a safety awareness campaign that focuses on SIP initiatives, VPP, 10CFR851 and "walking through life" injuries.
- Increased distribution and discussion on safety incidents and Lessons Learned, as applicable, at Presidents' Zero Accident Council (PZAC)/EZAC meetings.
- Recent Back-to-Work meetings have discussed the following safety topics: health & wellness - avoiding the flu; eye protection; changing seasons; and, avoiding deer and elk on the roadways.

Additional Info

None

Table 3-2. Days Away, Restricted, Transferred, (DART)

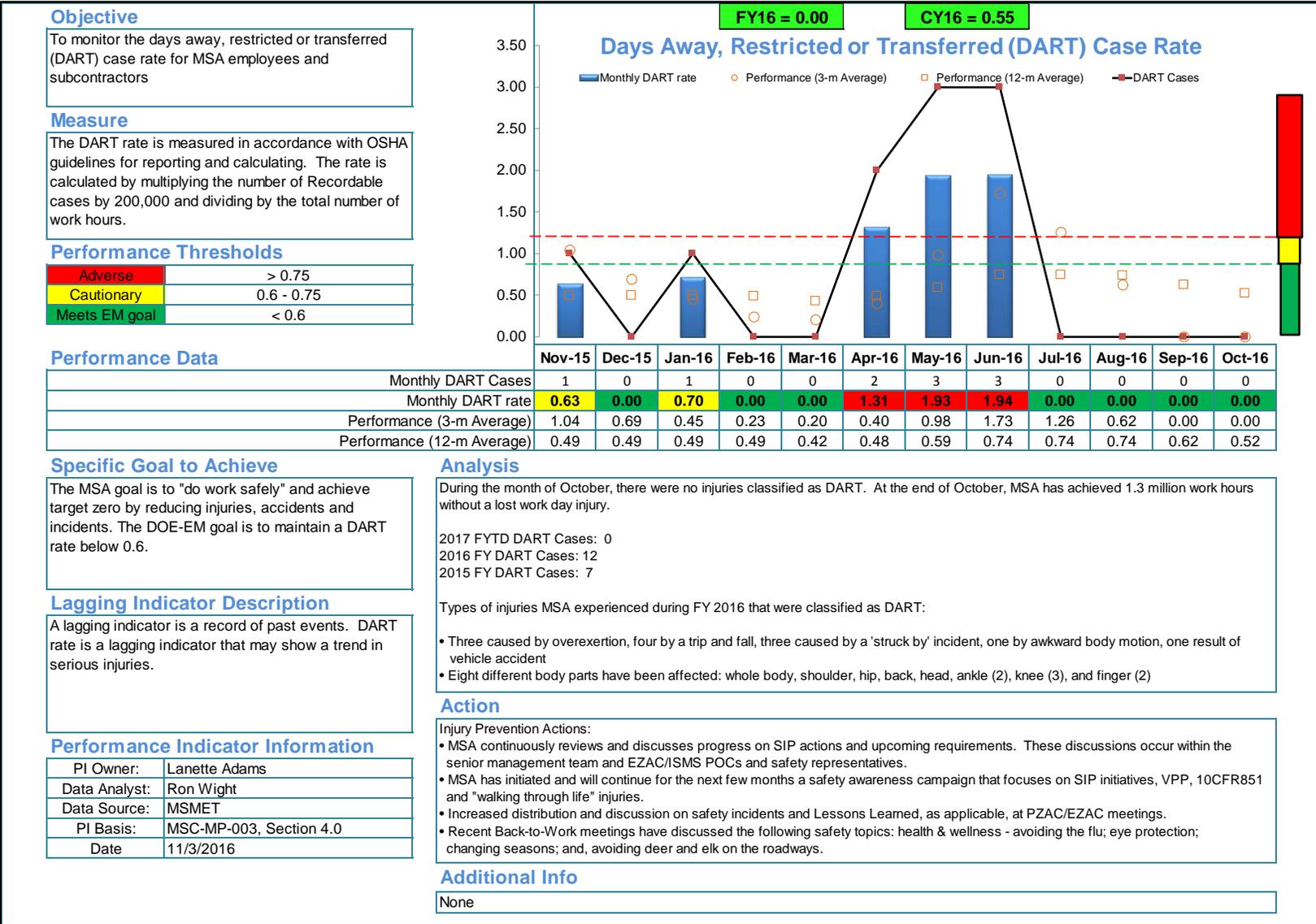
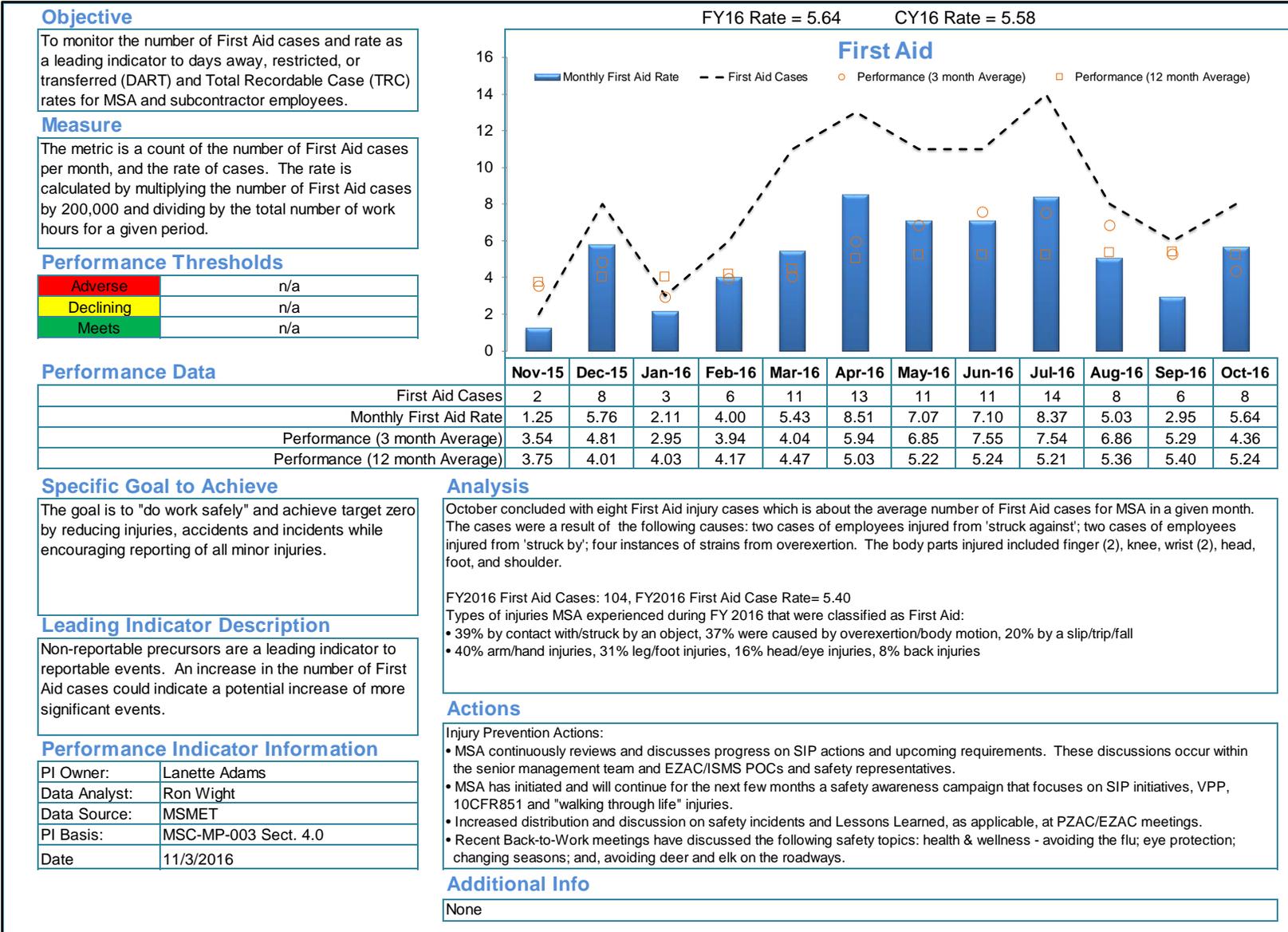


Table 3-3. First-Aid Case Rate





4.0 FORMAT 1, DD FORM 2734/1, WORK BREAKDOWN STRUCTURE

Table 4-1. Format 1, DD Form 2734/1, Work Breakdown Structure

CONTRACT PERFORMANCE REPORT													DOLLARS IN Thousands		FORM APPROVED OMB No. 0704-0188		
FORMAT 1 - WORK BREAKDOWN STRUCTURE																	
1. Contractor		2. Contract			3. Program				4. Report Period								
a. Name Mission Support Alliance		a. Name Mission Support Contract			a. Name Mission Support Contract				a. From (2016/10/01)								
b. Location (Address and Zip Code) Richland, WA 99352		b. Number RL14728			b. Phase Operations				b. To (2016/10/23)								
c. TYPE CPAF		d. Share Ratio			c. EVMS ACCEPTANCE No X Yes												
5. CONTRACT DATA																	
a. QUANTITY N/A		b. NEGOTIATED COST \$3,420,958		c. ESTIMATED COST OF AUTHORIZED UNPRICED WORK \$275		d. TARGET PROFIT/FEE \$210,035		e. TARGET PRICE \$3,630,993		f. ESTIMATED PRICE \$3,803,946		g. CONTRACT CEILING N/A		h. ESTIMATED CONTRACT CEILING N/A		i. DATE OF OTB/OTS N/A	
6. ESTIMATED COST AT COMPLETION													7. AUTHORIZED CONTRACTOR REPRESENTATIVE				
		CONTRACT BUDGET BASE (2)			VARIANCE (3) ¹		a. NAME (Last, First, Middle Initial) <i>William K Johnson, Robert E Johnson</i> 11/2/16				b. TITLE MSC Project Manager						
a. BEST CASE		\$3,421,233					c. SIGNATURE <i>[Signature]</i>				d. DATE SIGNED 11/2/16						
b. WORST CASE		\$3,773,607															
c. MOST LIKELY		\$3,593,911			3,421,233		(172,678)										
8. PERFORMANCE DATA																	
Item (1)	Current Period					Cumulative to Date					At Completion						
	Budgeted Cost		Actual Cost Work Performed (4)	Variance		Budgeted Cost		Actual Cost Work Performed (9)	Variance		Budgeted (12)	Estimated (13)	Variance (14)				
	Work Scheduled (2)	Work Performed (3)		Schedule (5)	Cost (6)	Work Scheduled (7)	Work Performed (8)		Schedule (10)	Cost (11)							
a. WORK BREAKDOWN STRUCTURE ELEMENT																	
3001.01.01 - Safeguards and Security	3,452	3,452	3,555	0	(102)	408,557	408,557	421,429	0	(12,872)	542,303	566,219	(23,915)				
3001.01.02 - Fire and Emergency Response	1,187	1,187	1,798	0	(610)	142,163	142,163	160,675	(0)	(18,513)	188,038	220,915	(32,877)				
3001.01.03 - Emergency Management	376	376	271	0	105	39,036	39,036	32,590	0	6,446	53,540	45,970	7,570				
3001.01.04 - HAMMER	194	194	405	0	(211)	44,143	44,143	51,734	(0)	(7,591)	51,502	64,201	(12,699)				
3001.01.05 - Emergency Services Management	186	186	181	0	5	7,862	7,862	8,751	(0)	(889)	12,952	15,290	(2,338)				
3001.02.01 - Site-Wide Safety Standards	23	23	66	0	(43)	4,733	4,733	5,869	(0)	(1,137)	5,621	7,642	(2,021)				
3001.02.02 - Environmental Integration	278	278	282	0	(4)	46,331	46,331	41,874	0	4,457	57,225	56,017	1,209				
3001.02.03 - Public Safety & Resource Protection	732	732	422	0	310	51,787	51,787	45,868	0	5,918	78,150	71,123	7,028				
3001.02.04 - Radiological Site Services	1	1	1	(0)	(0)	3,828	3,828	4,767	0	(939)	3,837	5,307	(1,470)				
3001.02.05 - WSCF Analytical Services	63	63	0	0	63	54,777	54,777	50,457	(0)	4,320	57,139	51,972	5,167				
3001.03.01 - IM Project Planning & Controls	272	272	124	0	148	31,573	31,573	27,939	0	3,634	42,123	36,345	5,778				
3001.03.02 - Information Systems	800	800	474	0	325	93,429	93,429	90,376	(0)	3,053	123,254	119,943	3,311				
3001.03.03 - Infrastructure / Cyber Security	243	243	168	0	75	26,291	26,291	29,248	(0)	(2,957)	35,013	38,002	(2,989)				
3001.03.04 - Content & Records Management	497	497	409	0	88	56,270	56,270	51,247	0	5,022	75,181	69,072	6,108				
3001.03.05 - IR/CM Management	22	22	52	0	(30)	3,809	3,809	9,700	0	(5,891)	4,658	11,119	(6,461)				
3001.03.06 - Information Support Services	138	138	66	0	72	12,908	12,908	9,958	0	2,950	18,208	14,714	3,494				
3001.04.01 - Roads and Grounds Services	201	201	189	0	12	21,037	21,037	19,159	0	1,878	28,790	27,756	1,034				
3001.04.02 - Biological Services	233	233	231	0	2	25,254	25,254	26,232	0	(979)	34,198	36,001	(1,803)				
3001.04.03 - Electrical Services	417	417	779	0	(361)	52,146	52,146	74,170	0	(22,025)	68,400	100,905	(32,505)				
3001.04.04 - Water/Sewer Services	479	479	1,023	0	(544)	46,902	46,902	78,113	(0)	(31,211)	65,425	108,364	(42,939)				
3001.04.05 - Facility Services	0	0	0	(0)	0	7,909	7,909	7,900	(0)	9	7,909	7,900	9				
3001.04.06 - Transportation	0	0	23	0	(23)	7,974	7,974	9,744	(0)	(1,770)	7,974	10,068	(2,094)				



Table 4-1, cont. Format 1, DD Form 2734/1, Work Breakdown Structure

CONTRACT PERFORMANCE REPORT FORMAT 1 - WORK BREAKDOWN STRUCTURE												DOLLARS IN Thousands		FORM APPROVED OMB No. 0704-0188											
1. Contractor		2. Contract				3. Program				4. Report Period															
a. Name Mission Support Alliance		a. Name Mission Support Contract				a. Name Mission Support Contract				a. From (2016/10/01)															
b. Location (Address and Zip Code) Richland, WA 99352		b. Number RL14728		b. Phase Operations		b. To (2016/10/23)																			
c. TYPE CPAF		d. Share Ratio		c. EVMS ACCEPTANCE No X Yes																					
Item (1)	Current Period					Cumulative to Date					At Completion														
	Budgeted Cost		Actual Cost Work Performed (4)	Variance		Budgeted Cost		Actual Cost Work Performed (9)	Variance		Budgeted (12)	Estimated (13)	Variance (14)												
Work Scheduled (2)	Work Performed (3)	Schedule (5)		Cost (6)	Work Scheduled (7)	Work Performed (8)	Schedule (10)		Cost (11)																
a. WORK BREAKDOWN STRUCTURE ELEMENT (Cont'd)																									
3001.04.07 - Fleet Services	40	40	(2)	0	42	7,148	7,148	7,319	0	(171)	8,729	8,345	385												
3001.04.08 - Crane and Rigging	0	0	0	0	0	2,187	2,187	2,187	(0)	(0)	2,187	2,187	(0)												
3001.04.09 - Railroad Services	0	0	1	0	(1)	370	370	371	(0)	(1)	370	471	(101)												
3001.04.10 - Technical Services	210	210	249	0	(39)	32,213	32,213	34,192	0	(1,979)	40,338	44,318	(3,980)												
3001.04.11 - Energy Management	205	205	104	0	101	13,630	13,630	7,377	(0)	6,253	21,836	14,374	7,461												
3001.04.12 - Hanford Historic Buildings Preservation	55	105	186	51	(81)	18,846	18,552	18,234	(294)	317	21,219	22,177	(958)												
3001.04.13 - Work Management	71	71	118	0	(47)	9,004	9,004	12,096	(0)	(3,091)	11,732	15,835	(4,103)												
3001.04.14 - Land and Facilities Management	430	430	356	(0)	74	35,662	35,662	30,727	(0)	4,936	51,169	46,601	4,568												
3001.04.15 - Mail & Courier	87	87	70	0	17	7,551	7,551	5,303	(0)	2,248	10,829	8,057	2,772												
3001.04.16 - Property Systems/Acquisitons	392	392	328	0	64	39,974	39,974	40,689	0	(715)	54,987	56,468	(1,481)												
3001.04.17 - General Supplies Inventory	9	9	158	0	(148)	2,193	2,193	1,387	0	806	2,548	1,458	1,090												
3001.04.18 - Maintenance Management Program Implem	139	139	136	0	4	6,992	6,992	7,351	0	(359)	12,364	13,039	(675)												
3001.06.01 - Business Operations	242	242	365	(0)	(123)	35,808	35,808	2,715	0	33,093	45,160	14,075	31,086												
3001.06.02 - Human Resources	172	172	183	(0)	(11)	17,325	17,325	16,765	(0)	561	23,998	23,730	268												
3001.06.03 - Safety, Health & Quality	841	841	1,039	0	(197)	108,860	108,860	127,284	(0)	(18,424)	141,237	165,643	(24,406)												
3001.06.04 - Miscellaneous Support	511	511	346	(0)	166	49,284	49,284	37,185	(0)	12,099	69,059	56,461	12,598												
3001.06.05 - Presidents Office (G&A nonPMB)	0	0	0	0	0	16	16	16	0	0	16	16	0												
3001.06.06 - Strategy	0	0	0	0	0	959	959	2,529	0	(1,570)	959	2,529	(1,570)												
3001.07.01 - Portfolio Management	361	361	251	0	111	52,775	52,775	47,733	(0)	5,041	68,573	62,418	6,156												
3001.08.01 - Water System	419	173	117	(246)	57	20,866	20,526	10,226	(340)	10,300	21,663	11,599	10,064												
3001.08.02 - Sewer System	127	123	55	(4)	68	6,220	6,252	9,525	33	(3,273)	6,991	10,202	(3,211)												
3001.08.03 - Electrical System	(9)	65	185	74	(120)	15,087	15,100	16,174	13	(1,074)	16,664	17,593	(928)												
3001.08.04 - Roads and Grounds	0	13	2	13	11	3,982	3,832	3,258	(150)	574	3,982	3,299	683												
3001.08.05 - Facility System	0	0	0	0	0	5,611	5,611	5,652	(0)	(41)	5,611	5,652	(41)												
3001.08.06 - Reliability Projects Studies & Estimates	267	267	200	0	67	4,191	4,191	6,248	(0)	(2,057)	12,984	15,039	(2,055)												
3001.08.07 - Reliability Project Spare Parts Inventory	0	0	16	0	(16)	86	86	2,405	0	(2,320)	86	2,496	(2,410)												
3001.08.08 - Network & Telecommunications System	344	269	109	(76)	160	10,224	10,158	14,786	(65)	(4,628)	11,203	16,001	(4,797)												
3001.08.09 - Capital Equipment Not Related to Construct	0	0	0	0	0	9,034	9,034	8,844	(0)	190	9,034	8,844	190												
3001.08.10 - WSCF - Projects	0	0	0	0	0	979	979	810	0	169	979	810	169												
3001.08.11 - Support of Infrastructure Interface to ORP	0	0	0	0	0	965	965	725	0	240	965	725	240												
3001.08.12 - Reliability Projects Out Year Planning	0	0	0	0	0	0	0	0	0	0	104,759	104,759	0												
3001.90.04 - MSA Transition	0	0	0	0	0	5,868	5,868	5,868	0	0	5,868	5,868	0												
3001.B1.06 - Projects	0	0	0	0	0	(0)	(0)	0	(0)	(0)	(0)	0	(0)												
b. COST OF MONEY																									
c. GENERAL AND ADMINISTRATIVE																									
d. UNDISTRIBUTED BUDGET															0										
e. SUBTOTAL (Performance Measurement Baseline)													14,710	14,522	15,087	(189)	(566)	1,712,627	1,711,823	1,743,782	(803)	(31,958)	2,349,541	2,445,931	(96,390)



Table 4-1, cont. Format 1, DD Form 2734/1, Work Breakdown Structure

CONTRACT PERFORMANCE REPORT FORMAT 1 - WORK BREAKDOWN STRUCTURE													DOLLARS IN Thousands		FORM APPROVED OMB No. 0704-0188	
1. Contractor		2. Contract			3. Program			4. Report Period								
a. Name Mission Support Alliance		a. Name Mission Support Contract			a. Name Mission Support Contract			a. From (2016/10/01)								
b. Location (Address and Zip Code) Richland, WA 99352		b. Number RL14728			b. Phase Operations			b. To (2016/10/23)								
c. TYPE CPAF		d. Share Ratio			c. EVMS ACCEPTANCE No X Yes											
Item (1)	Current Period						Cumulative to Date					At Completion				
	Budgeted Cost		Actual Cost	Variance			Budgeted Cost		Actual Cost	Variance		Budgeted (12)	Estimated (13)	Variance (14)		
	Work Scheduled (2)	Work Performed (3)	Work Performed (4)	Schedule (5)	Cost (6)	Work Scheduled (7)	Work Performed (8)	Work Performed (9)	Schedule (10)	Cost (11)						
a2. WORK BREAKDOWN STRUCTURE ELEMENT																
3001.01.04 - HAMMER	633	633	800	0	(166)	99,571	99,571	99,785	0	(214)	121,238	127,070	(5,832)			
3001.02.04 - Radiological Site Services	879	879	460	0	419	54,911	54,911	39,217	(0)	15,694	87,635	67,691	19,943			
3001.02.05 - WSCF Analytical Services	829	829	0	(0)	829	82,172	82,172	53,176	0	28,996	113,653	73,593	40,060			
3001.03.02 - Information Systems	163	163	199	0	(36)	1,872	1,872	1,706	0	166	8,034	7,802	232			
3001.03.04 - Content & Records Management	56	56	49	0	7	582	582	541	0	41	2,670	2,665	5			
3001.03.06 - Information Support Services	0	0	0	0	0	4,726	4,726	4,043	(0)	683	4,726	4,043	683			
3001.03.07 - Information Technology Services	1,993	1,993	2,006	(0)	(13)	12,095	12,095	12,402	(0)	(308)	87,530	88,779	(1,249)			
3001.04.05 - Facility Services	456	456	744	0	(288)	46,735	46,735	52,052	0	(5,318)	64,312	72,735	(8,423)			
3001.04.06 - Transportation	127	127	311	0	(185)	19,779	19,779	33,623	0	(13,844)	24,570	42,009	(17,438)			
3001.04.07 - Fleet Services	538	538	978	0	(440)	82,840	82,840	98,726	0	(15,886)	102,971	124,380	(21,409)			
3001.04.08 - Crane and Rigging	653	653	797	(0)	(145)	80,931	80,931	86,362	0	(5,431)	106,027	114,638	(8,611)			
3001.04.10 - Technical Services	4	4	120	0	(117)	4	4	1,136	0	(1,132)	149	3,735	(3,586)			
3001.04.13 - Work Management	0	0	49	0	(49)	595	595	2,724	0	(2,130)	595	3,348	(2,753)			
3001.04.14 - Land and Facilities Management	489	489	710	0	(221)	46,932	46,932	45,655	(0)	1,277	65,481	65,662	(181)			
3001.04.15 - Mail & Courier	14	14	13	0	1	1,043	1,043	1,086	0	(43)	1,590	1,657	(67)			
3001.06.01 - Business Operations	621	621	572	(0)	50	77,909	77,909	82,279	(0)	(4,369)	101,571	107,993	(6,422)			
3001.06.02 - Human Resources	117	117	229	(0)	(112)	15,747	15,747	20,706	(0)	(4,959)	20,209	27,056	(6,847)			
3001.06.03 - Safety, Health & Quality	128	128	146	(0)	(17)	12,193	12,193	9,717	(0)	2,476	17,156	14,954	2,203			
3001.06.04 - Miscellaneous Support	60	60	89	(0)	(29)	9,032	9,032	11,077	(0)	(2,045)	11,298	14,382	(3,084)			
3001.06.05 - Presidents Office (G&A nonPMB)	246	246	184	(0)	62	22,697	22,697	18,512	(0)	4,185	32,001	27,455	4,546			
3001.06.06 - Strategy	18	18	17	0	1	2,767	2,767	2,395	(0)	372	3,456	3,070	386			
3001.A1.01 - Transfer - CHPRC	4,730	4,730	4,421	0	309	573,345	573,345	504,411	0	68,933	750,618	677,106	73,512			
3001.A1.02 - Transfer - WRPS	959	959	3,246	0	(2,287)	116,748	116,748	177,918	0	(61,171)	152,357	243,969	(91,612)			
3001.A1.03 - Transfers - FH Closeout	0	0	1	0	(1)	175	175	201	0	(26)	184	227	(43)			
3001.A1.04 - Transfers - CHG Closeout	0	0	0	0	0	12	12	13	0	(0)	12	13	(0)			
3001.A2.01 - Non Transfer - BNI	0	0	11	0	(11)	1,188	1,188	2,811	0	(1,623)	1,188	2,952	(1,764)			
3001.A2.02 - Non Transfer - AMH	10	10	0	0	10	1,549	1,549	954	(0)	595	1,919	1,191	728			
3001.A2.03 - Non Transfer - ATL	13	13	0	0	13	1,052	1,052	702	0	350	1,541	1,013	528			
3001.A2.04 - Non-Transfer - WCH	255	255	10	0	245	39,336	39,336	41,572	0	(2,236)	48,597	47,567	1,030			
3001.A2.05 - Non-Transfers - HPM	0	0	42	0	(42)	3	3	1,591	0	(1,588)	3	2,152	(2,149)			
3001.A2.06 - Non-Transfers - BNI Corp	0	0	0	0	0	0	0	1	0	(1)	0	1	(1)			
3001.A2.07 - Non-Transfers-WAI	0	0	28	0	(28)	0	0	301	0	(301)	0	675	(675)			
3001.A4.01 - Request for Services	279	279	332	0	(54)	67,899	67,899	93,980	0	(26,082)	78,442	105,218	(26,776)			
3001.A4.02 - HAMMER RFSS	2	2	298	0	(295)	7,059	7,059	26,501	0	(19,443)	7,149	30,532	(23,383)			
3001.A4.03 - National Guard RFSS	0	0	0	0	0	1,601	1,601	1,550	0	52	1,605	1,552	53			
3001.A4.04 - PNNL RFSS	14	14	27	0	(12)	6,814	6,814	9,903	(0)	(3,089)	7,319	10,573	(3,254)			
3001.A5.01 - RL PD	44	44	21	0	22	2,873	2,873	4,882	0	(2,009)	4,567	6,263	(1,696)			
3001.A5.02 - ORP PD	0	0	41	0	(41)	37	37	6,504	0	(6,468)	37	7,053	(7,016)			



Table 4-1, cont. Format 1, DD Form 2734/1, Work Breakdown Structure

CONTRACT PERFORMANCE REPORT													DOLLARS IN Thousands		FORM APPROVED OMB No. 0704-0188	
FORMAT 1 - WORK BREAKDOWN STRUCTURE																
1. Contractor			2. Contract			3. Program			4. Report Period							
a. Name			a. Name			a. Name			a. From (2016/10/01)							
b. Location (Address and Zip Code)			b. Number			b. Phase			b. To (2016/10/23)							
c. TYPE			d. Share Ratio			c. EVMS ACCEPTANCE										
Item (1)	Current Period					Cumulative to Date					At Completion					
	Budgeted Cost		Actual Cost	Variance		Budgeted Cost		Actual Cost	Variance		Budgeted (12)	Estimated (13)	Variance (14)			
	Scheduled (2)	Work Performed (3)	Work Performed (4)	Schedule (5)	Cost (6)	Scheduled (7)	Work Performed (8)	Work Performed (9)	Schedule (10)	Cost (11)						
3001.A5.03 - RL Project Funded	40	40	192	0	(152)	606	606	2,715	0	(2,109)	2,081	6,214	(4,132)			
3001.A5.04 - ORP Project Funded	0	0	125	0	(125)	0	0	1,570	0	(1,570)	0	3,241	(3,241)			
3001.A6.01 - Portfolio PMTOs	(11)	(11)	0	0	(11)	210	210	161	0	49	210	161	49			
3001.A7.01 - G&A Liquidations	(1,217)	(1,217)	(1,499)	0	282	(141,285)	(141,285)	(146,775)	0	5,490	(187,291)	(199,887)	12,596			
3001.A7.02 - DLA Liquidations	(802)	(802)	(1,311)	0	510	(69,043)	(69,043)	(87,252)	(0)	18,210	(99,595)	(124,347)	24,752			
3001.A7.03 - Variable Pools Revenue	(6,074)	(6,074)	(6,254)	0	180	(465,293)	(465,293)	(442,874)	0	(22,419)	(691,095)	(670,258)	(20,837)			
3001.B1.01 - UBS Assessments for Other Providers	2	2	0	0	2	111	111	0	0	111	184	0	184			
3001.B1.02 - UBS Other MSC - HAMMER M&O	9	9	0	0	9	505	505	0	(0)	505	843	0	843			
3001.B1.03 - Assessment for Other Provided Services	92	92	0	0	92	5,151	5,151	0	(0)	5,151	8,612	0	8,612			
3001.B1.04 - Assessment for PRC Services to MSC	51	51	0	0	51	3,062	3,062	0	(0)	3,062	4,977	0	4,977			
3001.B1.07 - Request for Services	1	1	0	0	1	244	244	0	(0)	244	274	0	274			
a2. WORK BREAKDOWN STRUCTURE ELEMENT																
b2. COST OF MONEY																
c2. GENERAL AND ADMINISTRATIVE																
d2. UNDISTRIBUTED BUDGET													0			
e2. SUBTOTAL (Non - Performance Measurement	6,420	6,420	8,203	(0)	(1,783)	829,090	829,090	878,261	0	(49,171)	1,071,609	1,147,897	(76,288)			
f. MANAGEMENT RESERVE											83	83	0			
g. TOTAL	21,131	20,942	23,291	(189)	(2,349)	2,541,716	2,540,913	2,622,043	(803)	(81,130)	3,421,233	3,593,911	(172,678)			
9. RECONCILIATION TO CONTRACT BUDGET BASE																
a. VARIANCE ADJUSTMENT																
b. TOTAL CONTRACT VARIANCE																



5.0 FORMAT 3, DD FORM 2734/3, BASELINE

Table 5-1. Format 3, DD Form 2734/3, Baseline

CONTRACT PERFORMANCE REPORT															FORM APPROVED OMB No. 0704-0188	
FORMAT 3 - BASELINE															DOLLARS IN Thousands	
1. Contractor			2. Contract			3. Program			4. Report Period							
a. Name			a. Name			a. Name			a. From (2016/10/01)							
Mission Support Alliance			Mission Support Contract			Mission Support Contract			b. To (2016/10/23)							
b. Location (Address and Zip Code)			b. Number			b. Phase										
Richland, WA 99352			RL14728			Operations										
c. TYPE			d. Share Ratio			c. EVMS ACCEPTANCE										
CPAF						No X Yes										
5. CONTRACT DATA																
a. ORIGINAL NEGOTIATED COST				b. NEGOTIATED CONTRACT CHANGES		c. CURRENT NEGOTIATED COST (a+b)		d. ESTIMATED COST OF UNAUTHORIZED UNPRICED WORK			e. CONTRACT BUDGET BASE (C+D)		f. TOTAL ALLOCATED BUDGET		g. DIFFERENCE (E - F)	
\$2,854,966				\$565,992		\$3,420,958		\$275			\$3,421,233		\$3,421,233		\$0	
h. CONTRACT START DATE				i. CONTRACT DEFINITIZATION DATE			j. PLANNED COMPLETION DATE			k. CONTRACT COMPLETION DATE		l. ESTIMATED COMPLETION DATE				
2009/05/24				2009/05/24			2019/05/25			2019/05/25		2019/05/25				
6. PERFORMANCE DATA																
ITEM (1)	BCWS CUMULATIVE TO DATE (2)	BCWS FOR REPORT PERIOD (3)	BUDGETED COST FOR WORK SCHEDULED (BCWS) (Non-Cumulative)												UNDISTRIBUTED BUDGET (15)	TOTAL BUDGET (16)
			Six Month Forecast By Month													
			Nov FY 17 (4)	Dec FY17 (5)	Jan FY17 (6)	Feb FY17 (7)	Mar FY17 (8)	Apr FY17 (9)	May FY17 (10)	Jun FY17 (11)	Remaining FY17 (12)	FY18 (13)	FY19 (14)			
a. PERFORMANCE MEASUREMENT BASELINE (Beginning of Period)	1,697,916	13,971	16,571	14,606	17,289	15,433	20,612	16,100	15,804	15,456	57,406	312,910	135,511	(43)	2,349,541	
b. BASELINE CHANGES AUTHORIZED DURING REPORT PERIOD	14,710	(13,971)	670	4,346	(4,522)	1,544	(307)	208	580	3,869	(3,466)	(5,119)	1,414	43	(0)	
a. PERFORMANCE MEASUREMENT BASELINE (End of Period)	1,712,627		17,240	18,952	12,767	16,977	20,305	16,308	16,384	19,325	53,940	307,791	136,925	0	2,349,541	



Table 5-1, cont. Format 3, DD Form 2734/3, Baseline

DOLLARS IN Thousands															FORM APPROVED OMB No. 0704-0188	
1. Contractor		2. Contract			3. Program				4. Report Period							
a. Name Mission Support Alliance		a. Name Mission Support Contract			a. Name Mission Support Contract				a. From (2016/10/01)							
b. Location (Address and Zip Code) Richland, WA 99352		b. Number RL14728			b. Phase Operations				b. To (2016/10/23)							
c. TYPE CPAF		d. Share Ratio			c. EVMS ACCEPTANCE No X Yes											
6. PERFORMANCE DATA																
ITEM	BCWS CUMULATIVE TO DATE (2)	BCWS FOR REPORT PERIOD (3)	BUDGETED COST FOR WORK SCHEDULED (BCWS) (Non-Cumulative)											UNDISTRIBUTED BUDGET (15)	TOTAL BUDGET (16)	
			Six Month Forecast By Month													
			Nov FY 17 (4)	Dec FY17 (5)	Jan FY17 (6)	Feb FY17 (7)	Mar FY17 (8)	Apr FY17 (9)	May FY17 (10)	Jun FY17 (11)	Remaining FY17 (12)	FY18 (13)	FY19 (14)			
a2. NON - PERFORMANCE MEASUREMENT BASELINE (Beginning of Period)	822,669	5,799	7,490	6,730	7,280	7,124	9,779	7,321	7,331	7,361	27,294	92,834	62,608	(11)	1,071,610	
b2. BASELINE CHANGES AUTHORIZED DURING REPORT PERIOD	6,420	(5,799)	52	1,640	(1,763)	646	(677)	158	203	1,636	(2,528)	(0)	(0)	11	(0)	
a2. NON - PERFORMANCE MEASUREMENT BASELINE (End of Period)	829,090		7,542	8,370	5,517	7,770	9,103	7,479	7,534	8,998	24,766	92,834	62,608	0	1,071,609	
7. MANAGEMENT RESERVE															83	
8. TOTAL	2,541,716	0	24,782	27,322	18,284	24,746	29,408	23,787	23,918	28,323	78,706	400,625	199,532	0	3,421,233	



6.0 FORMAT 5, DD FORM 2734/5, EXPLANATIONS AND PROBLEM ANALYSIS

Table 6-1, Format 5, DD Form 2734/5, Explanations and Problem Analysis

Contract Performance Report Format 5			
1. Contractor	2. Contract	3. Program	4. Report Period
a. Name Mission Support Alliance	a. Name Mission Support Contract	a. Name Mission Support Contract	a. From (2016/10/01)
b. Location (Address and Zip Code) Richland, WA 99352	b. Number RL14728	b. Phase Operations	b. To (2016/10/23)
	c. Type CPAF	d. Share Ratio	
5. Evaluation			

Explanation of Variance /Description of Problem:

Current Month Cost Variance (CV):

3001.01.02 Fire and Emergency Response – Unfavorable CM CV is primarily due to the approved Integrated Investment Portfolio (IIP) funded scope being divergent from the contract baseline because of a budgeting omission for platoon shift hours in the Hanford Fire Department as well as the bid assumption that multiple fire stations would have been closed.

3001.02.03 Public Safety & Resource Protection – Favorable CM CV is primarily due to fewer subcontractor resources were required than originally planned.

3001.03.02 Information System – Favorable CM CV is primarily due to cost savings associated with the self-performance of Software Engineering Services.

3001.04.03 Electrical Services – Unfavorable CM CV is due to staffing levels that are currently higher than the baseline due to additional maintenance activities required to maintain the electrical distribution system. The system has degraded across the site due to age. Electrical Services is part of the Enhanced Maintenance Program, and has compliance issues that have increased the cost to the program.

3001.04.04 Water/Sewer Services – Unfavorable CM CV is due to staffing levels that are currently higher than the baseline due to additional maintenance activities required to maintain the water and sewer distribution system. The system has degraded across the site due to age. Water & Sewer Utilities (W&SU) is part of the Enhanced Maintenance Program, and has compliance issues that have increased the cost to the program.

3001.A1 – 3001.B1 Non-PMB – Unfavorable CM CV is primarily due to RL approved funding and priority scope being divergent from the baseline for Request for Service (RFS) and Inter-Contractor Work Order (ICWO) activities.

Impacts – Current Month Cost Variance:

MSA has operated at authorized FY 2017 funding levels that exceed the contract budget. There are no impacts associated with this CM negative CV.



Table 6-1, cont. Format 5, DD Form 2734/5, Explanations and Problem Analysis

1. Contractor	2. Contract	3. Program	4. Report Period
a. Name Mission Support Alliance	a. Name Mission Support Contract	a. Name Mission Support Contract	a. From (2016/10/01)
b. Location (Address and Zip Code) Richland, WA 99352	b. Number RL14728	b. Phase Operations	b. To (2016/10/23)
	c. Type CPAF	d. Share Ratio	

Corrective Action – Current Month Cost Variance: None

Current Month Schedule Variance:

3001.04.12 Hanford Historic Buildings Preservation –No BCWS remains because the project has been delayed beyond the scheduled completion date. Progress was made and earned value taken. The result is a favorable CM SV.

3001.08.01 Water System – Unfavorable CM SV is due to completing construction work ahead of the baseline schedule in prior months and realizing the swing effect in the current month on project “L-525, 24in EW Line Replacement - 2901Y to 200E” & project “L-840, 24in EW Line Replacement 2901Y - 200W”.

3001.08.03 Electrical System – Favorable CM SV is due to a point adjustment as a result of a BCR implemented in October that closed all activities to performance and placed project “L-815, Upgrade Transmission/Distribution Access Rds.” on hold.

3001.08.08 Network & Telecommunications System – Unfavorable CM SV is due to the construction mobilization being behind schedule, and a delay in procuring office and break space for project “L-761, Phase 2a Procure, Install, & Closeout”.

Impacts – Current Month Schedule Variance: Impacts are minimal because each Reliability Project is an independent stand-alone project.

Corrective Action – Current Month Schedule Variance: None.

Cumulative Cost Variance: Several key areas contributing to the Cumulative-to-Date CV (CTD CV) are as follows:

Fiscal Year Funding Authorizations: During October of 2011, MSA completed re-aligning the baseline to the negotiated contract, and by using the approved change control process, implemented the re-aligned baseline data for the start of 2012. RL provided approval of the baseline data for reporting progress, and also provided an approved and funded priority list of items for MSA work scope. The CTD CV is primarily due to RL approved funding and priority list scope being divergent from the baseline for FY 2013, FY 2014, FY 2015, FY 2016 and FY 2017.

Labor and Pension costs: After the original submittal of the Forward Pricing Rates (FPR), it was determined that MSA had incorrectly factored the cost of the Hanford Site Pension Plan (HSPP) and the Hanford Employee Welfare Trust (HEWT) into the labor rates. This was disclosed to MSA in the Source Selection Evaluations Board’s (SEB) Debrief of the Mission Support Contract (MSC) in May 2009. MSA received contract modifications associated with pension cost and labor adder adjustments for FY 2009 through FY 2015, which increased the contract value. At the request of RL, the labor and pension proposals are submitted annually at fiscal year-end. The variances associated with labor and pension impacts all WBS elements that include labor.

3001.01.01 Safeguards and Security: Unfavorable CTD CV is primarily due to differences in the baseline budgeting and fiscal year IIP authorizations. For example, Safeguards and Security included a baseline planning assumption that a Graded Security Policy could be implemented at a reduced cost and the bid assumption that Spent Nuclear Material (SNM) would be shipped off the Hanford site by year 3.



Table 6-1, cont. Format 5, DD Form 2734/5, Explanations and Problem Analysis

1. Contractor	2. Contract	3. Program	4. Report Period
a. Name Mission Support Alliance	a. Name Mission Support Contract	a. Name Mission Support Contract	a. From (2016/10/01)
b. Location (Address and Zip Code) Richland, WA 99352	b. Number - RL14728	b. Phase - Operations	b. To (2016/10/23)
	c. Type CPAF	d. Share Ratio NO X YES	

Since fiscal year IIP/funding authorizations adjust for these differences, no mitigating actions are in place at this time to reduce the overall cost variance.

3001.01.02 Fire & Emergency Response: Unfavorable CTD CV is primarily due to a budgeting omission for platoon shift hours in the Hanford Fire Department as well as the bid assumption that multiple fire stations would have been closed. Since fiscal year IIP/funding authorizations adjust for these differences, no mitigating actions are in place at this time to reduce the overall CV.

3001.01.03 Emergency Management: Favorable CTD CV is because work being performed according to RL-directed Contract Baseline Alignment Guidance (CBAG) provides for MSA/RL agreed scope, and a spending target that is different than the Contract Baseline Budget. No mitigating actions are required at this time.

3001.01.04 HAMMER: Unfavorable CTD CV is predominantly due to the assumption that less EM funding would be required because HAMMER could self-fund itself by performing enough services for non-Hanford entities. This assumption has not occurred. As a result of this inaccurate assumption, the EM budget will remain lower than the EM funds authorized. Because of this divergent situation, the CTD CV will continue to increase. Services delivered at HAMMER will not be adversely affected because the services are executed consistent with the approved fiscal year IIP/funding. No other potential contributing performance issues were identified.

3001.02.03 Public Safety & Resource Protection (PSRP): Favorable CTD CV is primarily due to the approved funding and IIP scope being divergent from the baseline for PSRP. No mitigating actions are required at this time.

3001.03.04 Contents & Records Management: Favorable CTD CV is primarily due to the approved funding and IIP scope being divergent from the baseline, but is also due to the cost savings associated with self-performance of the records scope, and a reduction in system administration/software engineering costs from the self-performance of software engineering services.

3001.03.05 IR/CM Management: Unfavorable CTD CV is primarily due to the approved funding and IIP scope being divergent from the baseline, but is also due to the unplanned Information Technology (IT) subcontract transition effort and related software costs.

3001.04.03/04 Electrical/Water & Sewer Services: Unfavorable CTD CV is primarily due to the aging life of the infrastructure on the Hanford Site. More staffing and material procurements than included in the baseline have been authorized through the fiscal year IIP/funding process. These changes have resulted in increased costs for infrastructure repairs, compliance issues, and maintenance activities. In addition, an enhanced maintenance program has been established to better predict future system failures, and predictive maintenance is replacing the preventative maintenance method. Since fiscal year IIP/funding authorizations adjust for these differences, no mitigations are planned at this time.



Table 6-1, cont. Format 5, DD Form 2734/5, Explanations and Problem Analysis.

1. Contractor	2. Contract		3. Program	4. Report Period
a. Name Mission Support Alliance	a. Name Mission Support Contract		a. Name Mission Support Contract	a. From (2016/10/01)
b. Location (Address and Zip Code) Richland, WA 99352	b. Number - RL14728		b. Phase - Operations	b. To (2016/10/23)
	c. Type CPAF	d. Share Ratio	c. EVMS Acceptance NO X YES	
<p>3001.04.11 Energy Management: Favorable CTD CV is primarily due to the approved funding and IIP scope being divergent from the baseline for Energy Management. No mitigating actions are required at this time.</p> <p>3001.06.01 Business Operations: Favorable CTD CV is primarily due to credits associated with affiliate fee on IT scope and training on overtime pending final resolution.</p> <p>3001.06.03 Safety, Health & Quality: Unfavorable CTD CV is primarily due to the IIP scope and approved funding increases in the Radiation Protection, Worker Safety & Health, and Beryllium accounts. Since fiscal year IIP/funding authorizations adjust for these differences, no mitigations are planned at this time.</p> <p>3001.06.04 Miscellaneous Support: Favorable CTD CV is primarily due to MSA Engineering approved funding and IIP being divergent from the contract baseline. Through the annual IIP process, the MSA Engineering organization was authorized/funded to perform much less work than planned in the baseline.</p> <p>3001.07.01 Portfolio Management: Favorable CTD CV is primarily due to less Portfolio Management support required than assumed for integrated planning actions.</p> <p>3001.08.01 Water System: Favorable CTD CV is due to projects L-525, "24in Line Replacement from 2901Y to 200E" & L-840, "24in Line Replacement from 2901Y to 200W" awarding the construction subcontracts for significantly less than initially estimated. The significant construction cost savings is attributable to the contractor's expertise in this type of construction and significantly less difficult site conditions encountered than were assumed when preparing the initial cost estimate.</p> <p>3001.A1 – 3001.B1 Non-PMB: Unfavorable CTD CV is primarily due to other Hanford contractors and government agencies requesting more usage-based services (i.e., Training, Crane & Rigging, Fleet Services, Occupancy, etc.) than planned in the baseline. Since this work scope is providing services as requested, and is fully authorized through the Inter-Contract Work Orders/Request for Services process, no mitigations are planned at this time. Note that for the Non-PMB, the WBS elements 3001.01.04 - 3001.06.06 represent the Usage-Based Pool, General and Administrative (G&A), and Direct Labor Adder (DLA) accounts which are offset by the liquidation of services to customers as identified with WBS 3001.A7.01 – 3001.A7.03.</p> <p>Impacts - Cumulative Cost Variance: CTD CV is primarily due to approved funding and priority list scope being divergent from the baseline during FY 2013 – FY 2017. Because the work scope is primarily level of effort, the CTD CV is not a predictive indicator for future performance. The amount of support provided in the future will be dependent upon the RL approved funding and priority list scope.</p>				



Table 6-1, cont. Format 5, DD Form 2734/5, Explanations and Problem Analysis

1. Contractor	2. Contract	3. Program	4. Report Period
a. Name Mission Support Alliance	a. Name Mission Support Contract	a. Name Mission Support Contract	a. From (2016/10/01)
b. Location (Address and Zip Code) Richland, WA 99352	b. Number - RL14728	b. Phase - Operations	b. To (2016/10/23)
	c. Type CPAF	d. Share Ratio NO X YES	

Corrective Action - Cumulative Cost Variance:

For FY 2009 – FY 2012, MSA has incorporated negotiated contract variance proposals into the contract baseline. For FY 2013 through FY 2017, MSA will continue to monitor the delta values between the contract baseline and RL funding values to determine if change proposals are warranted. Until then, the divergent data will continue.

Cumulative Schedule Variance:

3001.04.12 Hanford Historic Buildings – Unfavorable CTD SV is primarily due to the release of the sub-tier masonry contractor because it could not meet requirements of the Historic Treatment Plan. Additional SV is due to the bid, submittal and training process for the replacement masonry contractor. Construction was further delayed due to the masonry contractor’s inability to meet construction material requirements set by the historic A/E.

3001.08.01 Water System – Unfavorable CTD SV is due to engineering design completing behind schedule which impacted successor activities that led to delays in material delivery of valves/actuators and control panels, and delays to work performance due to Filter Plant issues on project “L-830, Filter Plant Filter Control System Upgrade”.

3001.08.04 Roads and Grounds – Unfavorable CTD SV is due to delays in road survey completion (including drawings) on road projects “L-775, Chip Seal Rt 4S Canton Ave to Y Barricade”, “L-776, Chip Seal Rt 4S Y Barricade to 618 Waste Site” and “L-777, Chip Seal Rt 4S 618-10 Waste Site to HR Road”.

Impacts - Cumulative Schedule Variance: Hanford Historic Buildings Preservation – This project will finish behind schedule, but impacts to Reliability Projects are minimal because each is an independent stand-alone project.

Corrective Action - Cumulative Schedule Variance: Hanford Historic Buildings Preservation – no corrective action.

Variance at Complete:

During October of 2011, MSA completed re-aligning the baseline to the negotiated contract, and using the approved change control process, implemented the re-aligned baseline data for the start of FY 2012. RL provided approval of the baseline data for reporting progress and also provided an approved and funded priority list of items for MSA work scope. The CTD variance is primarily due to the RL approved funding and priority list scope being divergent from the baseline for FY 2013, FY 2014, FY 2015, FY 2016 and FY 2017.



Table 6-1, cont. Format 5, DD Form 2734/5, Explanations and Problem Analysis

1. Contractor	2. Contract	3. Program	4. Report Period
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b. Location (Address and Zip Code) Richland, WA 99352	b. Number - RL14728	b. Phase - Operations	b. To (2016/10/23)

After the original submittal of the FPR, it was determined that MSA had incorrectly factored the cost of the Hanford Site Pension Plan (HSPP) and the Hanford Employee Welfare Trust (HEWT) into the labor rates. This was disclosed to MSA in the Source Selection Evaluations Board’s (SEB) Debrief of the Mission Support Contract (MSC) in May 2009. MSA received contract modifications associated with pension cost and labor adder adjustments for FY 2009 through FY 2016 which increased the contract value. At the request of RL, the labor and pension proposals are submitted annually at fiscal year-end. For FY 2017, the labor and pension variances will continue to increase during the remainder of this fiscal year.

Impacts – At Complete Variance:
CTD CV is primarily due to the approved funding and priority list scope being divergent from the baseline during FY 2013 – FY 2017. Because the work scope is primarily level of effort, the CTD CV is not a predictive indicator for future performance. The amount of support provided in the future will be dependent upon RL approved funding and priority list scope.

Corrective Action - At Complete Variance:
For FY 2009 – FY 2012, MSA has incorporated negotiated contract variance proposals into the contract baseline. For FY 2013 through FY 2017, MSA will continue to monitor the delta values between the contract baseline and RL funding values to determine if change proposals are warranted. Until then, the divergent data will continue.

Negotiated Contract Changes:
The Negotiated Contract Cost for October 2016 did not change, remaining at \$3,420.9M.

Changes in Estimated Cost of Authorized / Unpriced Work: The Authorized Unpriced Work (AUW) remained unchanged at \$0.275M for October.

Changes in Estimated Price:
The Estimated Price of \$3,803.9M is based on the Most Likely Management Estimate at Completion (MEAC) of \$3,593.9M and fee of \$210.0M. The Most Likely MEAC reflects recognition of significant additional work scope in FY 2009 through FY 2012 related to American Recovery and Reinvestment Act of 2009 (ARRA) support activities to site contractors, and other DOE-authorized activities beyond the original contract assumptions. BCRs were implemented for the Cost Variance Contract Modifications received for FY 2009 thru FY 2012 in January 2015. Since FY 2013, FY 2014, FY 2015, and FY 2016 were within a 10 percent variance, proposals have not yet been processed to increase the Negotiated Contract Cost. Since FY 2017 funding is higher than the Contract Budget Base, there is a significant increase for this fiscal year.



Table 6-1, cont. Format 5, DD Form 2734/5, Explanations and Problem Analysis

1. Contractor	2. Contract	3. Program	4. Report Period
a. Name Mission Support Alliance	a. Name Mission Support Contract	a. Name Mission Support Contract	a. From (2016/10/01)
b. Location (Address and Zip Code) Richland, WA 99352	b. Number - RL14728	b. Phase - Operations	b. To (2016/10/23)

Differences between Current Month and Prior Month EAC's Format 1, Column (13) (e):

During October 2016, the Estimate at Completion (EAC) increased by \$100.6M from \$3,493.3M to \$3,593.9M; (\$65.7M in the Performance Measurement Baseline (PMB) and \$34.9M in the Non-PMB). Increases in the PMB were primarily due to FY 2017 funding being higher than Performance Measurement Baseline/Contract Budget Base. The significant increases are due to: Safeguards and Security funding implementing a Graded Security Protection Policy, Hanford Fire Department omission of platoon shift in the original proposal and Water/Electrical Utilities costing more because of an aging degraded system and implementation of an enhanced maintenance program. The Non-PMB increase is due to FY 2017 funding being higher than baseline costs primarily to support an Other Hanford Contractor, Washington River Protection Project (WRPS). In addition, the FY 2017 forecasts include the estimated costs for the labor adder and pension costs. The labor adder and pension costs impact every PMB and Non-PMB account with budgeted labor. In FY 2016 the PMB and Non-PMB labor adder and pension cost growth impact was approximately \$34.2M. At RL's request, a change order for these costs will be submitted at the end of FY 2017.

Changes in Undistributed Budget: The Undistributed Budget increased by \$0.05M for October 2016 from (\$0.05M) to \$0.0M due to BCR VMSA-17-003 – *Move Mod 547 and 549 for Closure of PMTOs 15-001 and 16-001 Out of Undistributed Budget to Applicable Accounts and Correct an Error on BCR VRL41PM-16-002.*

Changes in Management Reserve: The Management Reserve of \$0.083M did not change this reporting period.

Differences in the Performance Measurement Baseline: This reporting period the Performance Measurement Baseline did not change, with BAC remaining at \$2,349.5M.

Differences in the Non - Performance Measurement Baseline:

The Non-PMB did not change, with the BAC remaining at \$1,071.6M. The FY17 six-month forecast in September's CPR Format 3, Section 6, a.2, was incorrectly reported and has been corrected.

Table 6-1, cont. Format 5, DD Form 2734/5, Explanations and Problem Analysis

1. Contractor	2. Contract	3. Program	4. Report Period
a. Name Mission Support Alliance	a. Name Mission Support Contract	a. Name Mission Support Contract	a. From (2016/10/01)
b. Location (Address and Zip Code) Richland, WA 99352	b. Number - RL14728	b. Phase - Operations	b. To (2016/10/23)

		Oct FY 17 (4)	Nov FY17 (5)	Dec FY17 (6)	Jan FY17 (7)	Feb FY17 (8)	Mar FY17 (9)	Apr FY17 (10)	May FY17 (11)	Remaining FY17 (12)
Original:	a2. NON - PERFORMANCE MEASUREMENT BASELINE (End of Period)	11,629	6,137	7,555	6,611	7,818	7,136	9,450	7,399	41,403
Correction:	a2. NON - PERFORMANCE MEASUREMENT BASELINE (End of Period)	5,799	7,490	6,730	7,280	7,124	9,779	7,321	7,331	34,656

Although the Non-PMB end of period forecast was incorrect, the CPR Format 3 header data was correct.

Best/Worst/Most Likely Management Estimate at Completion (MEAC):

The Best Case MEAC assumes the completion of the approved work scope at the current negotiated contract value consistent with the Contract Budget Base. The Most Likely MEAC reflects the EAC including management reserve. The Worst Case Scenario assumes a 5 percent increase to the Most Likely MEAC case scenario.





7.0 USAGE-BASED SERVICES/DIRECT LABOR ADDER SUMMARY

The Direct Labor Adder (DLA) (motor carrier, facilities and janitorial) collects the cost of centralized management, support from other, craft indirect time, and non-labor cost like facilities maintenance. These costs are distributed via a rate on direct labor. Usage-Based Services (UBS) are services liquidated to customers (internal and external). The UBS cost is associated with a service and distributed on a unit rate to the customer based upon requests (“pay by the drink”).

Table 7-1. Usage-Based Services/Direct Labor Adder Summary (dollars in thousands).

Fiscal Year 2017 to Date – October 2016					
Account Description	BCWS	BCWP	ACWP	CV	Liquidation
Direct Labor Adder					
Software Engineer Services DLA (3001.03.02.03)	\$162.5	\$162.5	\$198.7	\$(36.2)	\$(136.9)
Content & Records Management DLA (3001.03.01.04)	\$55.6	\$55.6	\$49.0	\$6.6	\$(42.9)
Transportation DLA (3001.04.06.02)	\$121.0	\$121.0	\$307.6	\$(186.6)	\$(450.2)
Maintenance DLA (3001.04.05.02)	\$388.4	\$388.4	\$656.1	\$(267.7)	\$(622.1)
Janitorial Services DLA (3001.04.05.03)	\$67.5	\$67.5	\$87.6	\$(20.1)	\$(59.4)
Total Direct Labor Adder	\$795.0	\$795.0	\$1,299.0	\$(504.0)	\$(1,311.5)

ACWP = Actual Cost of Work Performed. CV = Cost Variance BAC = Budget at Completion.
 BCWP = Budgeted Cost of Work Performed. BCWS = Budgeted Cost of Work Scheduled.



Table 7-1, cont. Usage-Based Services/Direct Labor Adder Summary (dollars in thousands).

Fiscal Year 2017 to Date – October 2016					
Account Description	BCWS	BCWP	ACWP	CV	Liquidation
Usage Based Services					
Training (3001.01.04.02)	\$633.4	\$633.4	\$799.7	\$(166.3)	\$(676.1)
HRIP (3001.02.04.02)	\$434.5	\$434.5	\$134.4	\$300.1	\$(259.9)
Dosimetry (3001.02.04.03)	\$445.0	\$445.0	\$325.7	\$119.3	\$(401.2)
Information Technology Services (3001.03.07.01)	\$1,993.0	\$1,993.0	\$2,005.8	\$(12.8)	\$(2,434.0)
Work Management (3001.04.13.01)	\$-	\$-	\$48.6	\$(48.6)	\$(20.8)
Courier Services (3001.04.15.02)	\$14.2	\$14.2	\$13.4	\$0.8	\$(12.7)
Occupancy (3001.04.14.06)	\$488.9	\$488.9	\$710.1	\$(221.2)	\$(699.1)
Crane & Rigging (3001.04.08.02)	\$652.7	\$652.7	\$797.3	\$(144.6)	\$(1,007.5)
Guzzler Trucks (3001.04.06.03)	\$5.5	\$5.5	\$3.7	\$1.8	\$-
Fleet (3001.04.07.02)	\$538.3	\$538.3	\$978.0	\$(439.7)	\$(742.3)
Total UBS	\$5,205.5	\$5,205.5	\$5,816.7	\$(611.2)	\$(6,253.6)
Total DLA / UBS	\$6,000.5	\$6,000.5	\$7,115.7	\$(1,115.2)	\$(7,565.1)

ACWP = Actual Cost of Work Performed.

CV = Cost Variance

BAC = Budget at Completion.

BCWP = Budgeted Cost of Work Performed.

BCWS = Budgeted Cost of Work Scheduled.

FYTD Cost Variance (-\$1.1M) – Transportation DLA costs have increased in response to Stevens Center and DOE moves. Occupancy volume has increased due to the recent inclusion of 2261 Stevens and 1981 Snyder, per the LMSI/MSA scope transition. Crane & Rigging costs have increased due to support of Tank Farms and PFP. Overall, the Usage Based and Direct Labor Adder service demand is far in excess of contract baseline assumptions, especially in Fleet count/services and Training support scopes.



8.0 RELIABILITY PROJECT STATUS

Activity in October was centered on continuing progress on projects carried over from FY 2016. (Table 8-1 below.) For further information concerning accomplishments and issues related to the Reliability Projects, refer to the Site Services and Interface Management Service Area section of this report.

Table 8-1. Current Active Reliability Projects Summary

Projects to be Completed (\$000's)																
Work Scope Description (ORP-14 Projects)	Contract to Date - Performance								Project Lifecycle				Complete Dates			VAC Cost
	BCWS	BCWP	ACWP	SV	CV	SPI	CPI	CSPI	BAC	EAC	VAC	% Complete	Complete Date	Forecast Date	Schedule at Complete	
L-780, 200E 13.8kV ED Sys Mods	7,541.5	7,570.2	7,604.4	28.7	(34.2)	1.0	1.0	1.0	7,608.8	7,618.5	(9.7)	99.5%	1/11/17	12/8/16	G	G
ORP-14 Subtotal	7,541.5	7,570.2	7,604.4	28.7	(34.2)	1.0	1.0	1.0	7,608.8	7,618.5	(9.7)					
L-612, 230kV Transmission System Reconditioning and Sustainability Repairs	921.5	912.7	499.7	(8.8)	413.0	1.0	1.8	1.4	1,098.0	729.0	369.0	83.1%	6/26/17	6/26/17	G	G
L-761, Phase 2a Procure, Install, & Closeout	1,182.7	1,117.3	800.4	(65.4)	316.9	0.9	1.4	1.2	2,162.2	2,014.9	147.3	51.7%	12/29/16	12/29/16	G	G
L-789, Prioritize T&D Sys Wood PP Test & Replace	175.1	164.5	165.9	(10.6)	(1.4)	0.9	1.0	1.0	1,446.3	1,446.3	0.0	11.4%	1/18/18	1/18/18	G	G
L-815, Upgrade Transmission/Distrib Access Rds	91.1	95.0	138.2	3.9	(43.2)	1.0	0.7	0.9	153.0	163.2	(10.2)	62.1%	12/29/16	12/29/16	G	G
L-830, Filter Plant Filter Ctrl Sys Upgrade	1,050.6	730.1	1,161.8	(320.5)	(431.7)	0.7	0.6	0.7	1,050.6	1,825.4	(774.8)	69.5%	9/19/16	2/28/17	R	R
L-525, 24in Line Replacement 200E	3,265.9	3,259.6	1,727.1	(6.3)	1,532.5	1.0	1.9	1.4	3,618.9	2,004.5	1,614.4	90.1%	3/2/17	2/15/17	G	G
L-840, 24in Line Replacement 200W	3,222.4	3,289.8	1,700.1	67.4	1,589.7	1.0	1.9	1.5	3,467.6	1,860.3	1,607.3	94.9%	1/27/17	1/27/17	G	G
L-775, Overlay RT 4s, Canton Ave to Y Barricade	156.4	105.3	112.4	(51.1)	(7.1)	0.7	0.9	0.8	156.4	127.6	28.8	67.3%	9/21/16	12/14/16	R	G
L-776, Chip SI Rt 4S Y Brrcd to 618 Wst St Ntrnc	101.3	51.6	39.9	(49.7)	11.7	0.5	1.3	0.9	101.3	53.3	48.0	50.9%	9/21/16	12/14/16	R	G
L-777, Overlay RT 4s, 618-10 Wst Site to HR Road	123.6	74.7	77.3	(48.9)	(2.6)	0.6	1.0	0.8	123.6	89.8	33.8	60.4%	9/21/16	12/14/16	R	G
L-853, 200E Sewer Flow Equalization Facility	560.5	580.2	613.7	19.7	(33.5)	1.0	0.9	1.0	996.8	999.1	(2.3)	58.2%	5/24/17	5/24/17	G	G
L-854, 200E Sewer Consolidations	357.9	370.9	410.8	13.0	(39.9)	1.0	0.9	1.0	693.3	702.4	(9.1)	53.5%	5/24/17	5/24/17	G	G
L-868, Raw Water Fire Protection Loop for LAWPS	289.2	286.7	111.9	(2.5)	174.8	1.0	2.6	1.8	386.6	284.1	102.5	74.2%	9/18/17	9/18/17	G	G
L-894, Raw Water Cross Connection Isolation 200E/W	198.5	120.0	39.6	(78.5)	80.4	0.6	3.0	1.8	300.0	139.6	160.4	40.0%	11/17/16	11/17/16	G	G
RL-40 Subtotal	11,696.7	11,158.4	7,598.8	(538.3)	3,559.6	1.0	1.5	1.2	15,754.6	12,439.5	3,315.1					
Total	19,238.2	18,728.6	15,203.2	(509.6)	3,525.4	1.0	1.2	1.1	23,363.4	20,058.0	3,305.4					

Variance at Complete Cost Performance		Schedule at Complete Performance	
OK - G	Underspent or 1-10% over	OK - G	On schedule
Over Spent Y	11-30% or 100K Over Spent	Behind Y	Within 30 days
Over Spent R	>30% or 300K Over Spent	Behind R	Greater than 30 days

RELIABILITY STATUS, CONT.

Reliability Projects Variance Explanations

Contract-to-Date (CTD) Schedule Variances (SV):

- L-761, *Replace RFAR, Phase 2a - Procure, Install, & Closeout*: Unfavorable SV is due to the Construction Mobilization ramp-up due to delay in hiring of the construction crew and procurement of the office and mobile break trailers.
- L-830, *Filter Plant Filter Control System Upgrade*: Unfavorable SV is because engineering design completed behind schedule impacting successor activities, delays in material delivery of valves/actuators and control panels, and delays to work performance due to Filter Plant issues. Work planning and construction inefficiencies increased the variance. The SV is not recoverable, and will increase until the project completes.
- L-840, *24 Inch Line Replacement 200W*: Favorable SV is due to a combination of completing excavation and pipe installation ahead of schedule (because of the contractor's expertise in this type of construction), and because less complicated site conditions have been experienced.
- L-775, *Overlay RT 4s, Canton Ave to Y Barricade*: Unfavorable SV is due to delays in road survey work. The road survey data is not anticipated until November and work completion is anticipated for December.
- L-894, *Raw Water Cross Connection Isolation 200E/W*: Unfavorable SV is attributable to Planning and Studies requiring more time to complete than originally scheduled.



RELIABILITY STATUS, CONT.

Reliability Projects Variance Explanations

CTD Cost Variances (CV):

- L-612, *230kV Transmission System Reconditioning and Sustainability Repairs*: Positive CV is due to the award of the construction subcontract for significantly less than the initial estimate.
- L-761, *Replace RFAR, Phase 2a - Procure, Install, & Closeout*: Favorable CV is due to design costs being less than planned and because of a Construction Mobilization delay resulting in reduced current month costs.
- L-830, *Filter Plant Filter Control System Upgrade*: Unfavorable SV is due to additional design costs to resolve comments provided at the initial 90% design submittal, additional in-house engineering required to complete material procurement, increased work package planning cost, and unanticipated construction cost, (scaffolding, outage costs, confined space efficiencies, and delays due to weather/fires). Cost continues to increase due to as-found asbestos issues and redesign of support racks.
- L-525, *24 Inch Line Replacement, 200E*: Favorable CV is due to the award of the construction subcontract for significantly less than the initial estimate.
- L-840, *24 Inch Line Replacement 200W*: Favorable VAC is due to modest savings for site clearing work due to favorable site conditions, and the construction subcontract award for significantly less than the initial estimate. The significant construction cost savings are attributable to the contractor's expertise in this type of construction, and significantly less difficult site conditions currently being encountered than was assumed when preparing the initial cost estimate.
- L-868, *Raw Water Fire Protection Loop for LAWPS*: Favorable CV is due to the project support and conceptual design/definitive design contract costing less than planned.
- L-894, *Raw Water Cross Connection Isolation 200E/W*: Favorable CV is due to the Planning and Studies task requiring a much smaller effort than anticipated.



Reliability Status, Cont.

Reliability Projects Variance Explanations

- L-612, *230kV Transmission System Reconditioning and Sustainability Repairs*: Favorable VAC is due to the conceptual design subcontract award, Environment Assessment contract, and planning costs being less than planned.
- L-761, *Replace RFAR, Phase 2a - Procure, Install, & Closeout*: Favorable VAC is due to accelerating out-year procurement and design, while utilizing existing design underruns within the project to perform those activities.
- L-830, *Filter Plant Filter Control System Upgrade*: Unfavorable VAC is due to increased costs for design work and engineering support during procurements and construction, and equipment and construction not adequately scoped.
- L-525, *24-Inch Line Replacement, 200E*: Favorable VAC is due to modest savings for site clearing work due to favorable site conditions, and the construction subcontract award for significantly less than the initial estimate. The significant construction cost savings are attributable to the contractor's expertise in this type of construction, and significantly less difficult site conditions currently being encountered than was assumed when preparing the initial cost estimate.
- L-840, *24 Inch Line Replacement 200W*: Favorable VAC is due to modest savings for site clearing work due to favorable site conditions, and the construction subcontract award for significantly less than the initial estimate. The significant construction cost savings are attributable to the contractor's expertise in this type of construction, and significantly less difficult site conditions currently being encountered than was assumed when preparing the initial cost estimate.
- L-868, *Raw Water Fire Protection Loop for LAWPS*: Favorable VAC is due to project support costing less during planning and the design bid coming back lower than planned.
- L-894, *Raw Water Cross Connection Isolation 200E/W*: Favorable CV is due to due to the Planning and Studies task requiring a much smaller effort than anticipated.



Reliability Status, Cont.

Reliability Projects Variance Explanations (Threshold: +/- \$750K)

- L-612, *230kV Transmission System Reconditioning and Sustainability Repairs*: Favorable VAC is due to the conceptual design subcontract award, Environment Assessment contract, and planning costs being less than planned.
- L-761, *Replace RFAR, Phase 2a - Procure, Install, & Closeout*: Favorable VAC is due to accelerating out-year procurement and design, while utilizing existing design underruns within the project to perform those activities.
- L-830, *Filter Plant Filter Control System Upgrade*: Unfavorable VAC is due to increased costs for design work and engineering support during procurements and construction, and equipment and construction not adequately scoped.
- L-525, *24-Inch Line Replacement, 200E*: Favorable VAC is due to modest savings for site clearing work due to favorable site conditions, and the construction subcontract award for significantly less than the initial estimate. The significant construction cost savings are attributable to the contractor's expertise in this type of construction, and significantly less difficult site conditions currently being encountered than was assumed when preparing the initial cost estimate.
- L-840, *24 Inch Line Replacement 200W*: Favorable VAC is due to modest savings for site clearing work due to favorable site conditions, and the construction subcontract award for significantly less than the initial estimate. The significant construction cost savings are attributable to the contractor's expertise in this type of construction, and significantly less difficult site conditions currently being encountered than was assumed when preparing the initial cost estimate.
- L-868, *Raw Water Fire Protection Loop for LAWPS*: Favorable VAC is due to project support costing less during planning and the design bid coming back lower than planned.
- L-894, *Raw Water Cross Connection Isolation 200E/W*: Favorable CV is due to due to the Planning and Studies task requiring a much smaller effort than anticipated.

Table 8 -2. Reliability Projects Schedule

RPSUM CU - Summary RP Schedule for Melodee - Current Layout: MSA - Summ RP Sched - Melodee - CU		Mission Support Alliance							Page 1 of 2											
Activity ID	Activity Name	OD	RD	% Comp	Baseline Start	Baseline Finish	Forecast Start	Forecast Finish	2015			2016			2017					
L-525	L-525, 24"Line Renovation/Replacement from 2901Y to 200E	152	77	90.1%	01-Apr-15	02-Mar-17	01-Apr-15 A	15-Feb-17												
L-612	L-612, 230kV Transmission System Reconditioning and Sustainability Upgrades	352	168	83.1%	31-Aug-15	26-Jun-17	31-Aug-15 A	26-Jun-17												
L-761 Ph2a	L-761, Replace RFAR Phase 2a	154	44	51.7%	20-Jul-15	29-Dec-16	20-Jul-15 A	29-Dec-16												
L-775	L-775, Chip Seal RT 4s, Canton Ave to Y Barricade	186	35	67.3%	10-Aug-15	21-Sep-16	10-Aug-15 A	14-Dec-16												
L-776	L-776, Chip Seal Rt 4S Y Brrcd to 618 Wst St Ntrnc	72	35	50.9%	15-Jun-16	21-Sep-16	21-Jun-16 A	14-Dec-16												
L-777	L-777, Chip Seal RT 4s, 618-10 Wst Site to HR Road	186	35	60.4%	24-Aug-15	21-Sep-16	10-Aug-15 A	14-Dec-16												
L-780	L-780, 200E Area 13.8kV Electrical Distribution System WFD Modifications and Upgrades	203	31	99.5%	19-Jan-15	11-Jan-17	01-Oct-14 A	08-Dec-16												
L-789	L-789, Prioritized T&D System Wood Pole Upgrades	203	309	11.4%	10-Aug-15	18-Jan-18	10-Aug-15 A	18-Jan-18												
L-815	L-815, Upgrade Transmission/Distrib Access Rds	411	296	62.1%	16-Feb-16	29-Dec-17	02-Feb-16 A	29-Dec-17												
L-830	L-830, Filter Plant Filter Control System Upgrade	125	85	69.5%	29-Jun-15	19-Sep-16	29-Jun-15 A	28-Feb-17												
L-840	L-840, 24"Line Renovation/Replacement from 2901Y to 200W	461	64	94.9%	01-Apr-15	27-Jan-17	01-Apr-15 A	27-Jan-17												
L-853	L-853, 200E Sewer Flow Equalization Facility	309	146	58.2%	17-Aug-15	24-May-17	17-Aug-15 A	24-May-17												
L-854	L-854, 200E Sewer Consolidations	283	146	53.5%	17-Aug-15	24-May-17	17-Aug-15 A	24-May-17												



MSC - Reliability Projects
Summary Schedule
Data Date: 23-Oct-16

Remaining Work
Baseline

Table 8-2, cont. Reliability Projects Schedule

RPSUM CU - Summary RP Schedule for Melodee - Current Layout: MSA - Summ RP Sched - Melodee - CU		Mission Support Alliance							Page 2 of 2											
Activity ID	Activity Name	OD	RD	% Comp	Baseline Start	Baseline Finish	Forecast Start	Forecast Finish	2015 2016 2017											
L-868	L-868, Raw Water Fire Protection Loop for LAWPS	155	226	74.2%	04-Jan-16	18-Sep-17	14-Dec-15 A	18-Sep-17												
L-894	L-894, Raw Water Cross Connection Isolation 200E/W	23	19	40%	29-Aug-16	17-Nov-16	29-Aug-16 A	17-Nov-16												



MSC - Reliability Projects
Summary Schedule
Data Date: 23-Oct-16



Remaining Work
Baseline

9.0 BASELINE CHANGE REQUEST LOG

Baseline Change Request Log for October

Eight Baseline Change Requests (BCRs) were processed in October.

Four BCRs relate to Reliability Projects:

- VRL40RP-17-001 –Create a Level 5 WBS for Reliability Project Management & Strategic Planning and Move Budget from SWS Accounts and Reliability Project Out Year Planning Package (FY 2017 – FY 2019)
- VRL40RP-17-002 – Create a Level 5 WBS for FY 2017 Studies, Estimates & Planning and Move Budget from Reliability Projects Out Year Planning Package
- VRL 40RP-17-012 –Create Two Level 5 WBSs for Project L-761, RFAR Phase 2a Procure, Install & Closeout & Move RL-40 Reliability Projects Out Year Planning Budget to Initiate Construction Procurement and Work Package Preparation
- VRL40RP-17-020 – Administrative BCR – Place L-815, Upgrade Transmission/Distribution Roads Baseline On Hold Due to Roads Not Being Currently Defined

Four BCRs are Administrative in Nature:

- VMSA-17-001 – Administrative BCR – Implementation of FY 2017 Base Year Shift, Blended Calendars and Blended Forward Pricing Rates
- VMSA-17-002 – Administrative BCR – FY 2017 MSA Organizational Re-Alignment
- VMSA-17-003 – Move Mod 547 and 549 for Closure of PMTOs 15-001 and 16-001 Out of Undistributed Budget to Applicable Accounts and Correct an Error on BCR VRL41PM-16-002
- VMSA-17-004 Rev 0 – Administrative BCR – Create Lower Level Task Order (LLTO) WBSs for Cost Collection Established in the Month of October

Table 9-1. Consolidated Baseline Change Log

Consolidated Baseline Change Log											
§ in thousands											
						POST CONTRACT BUDGET					
PBS / Other	Reporting Baseline	Contract PMB	Contract PMB Mgmt Reserve	Contract Performance Budget (CPB)	Cum Contract Period	FY17 Budget	FY17 Management Reserve	Post Contract Budget	Post Contract Mgmt Reserve	Total Lifecycle	Cum Lifecycle Budget
Prior PMB Total	Sep 2016	1,230,506		1,230,506	1,230,506	203,247		1,119,023		2,349,529	2,349,529
VMSA-17-001						0		0		0	2,349,529
VMSA-17-002						0		0		0	2,349,529
VMSA-17-003						11		11		11	2,349,541
VMSA-17-004						0		0		0	2,349,541
VRL40RP-17-001						1,566		0		0	2,349,541
VRL40RP-17-002						1,350		0		0	2,349,541
VRL40RP-17-012						1,314		0		0	2,349,541
VRL40RP-17-020						(526)		0		0	2,349,541
	Oct 2016	1,230,506		1,230,506	1,230,506	206,962		1,119,035		2,349,541	
Prior Non-PMB Total	Sep 2016	604,007		604,007		93,510		467,614		1,071,621	1,071,621
VMSA-17-003						(11)		(11)		(11)	1,071,610
Revised Non-PMB Total	Oct 2016	604,007		604,007		93,498		467,603		1,071,610	
Total Contract Performance Baseline	Oct 2016	1,834,513		1,834,513	1,834,513			1,586,638		3,421,150	
Management Reserve	Sep 2016		0	0		0	83		83	83	83
Revised Management Reserve	Oct 2016		0	0		0	83		83	83	
Total Contract Budget Base				1,834,513				1,586,720		3,421,233	
Prior Fee Total	Sep 2016	109,961		109,961		21,526		100,074		210,035	210,035
Revised Fee Total	Oct 2016	109,961		109,961		21,526		100,074		210,035	
Change Log Total	Oct 2016			1,944,473				1,686,794		3,631,268	





10.0 RISK MANAGEMENT

October risk management efforts, aiding in completing the overall MSA risk determination, included the following:

- The Risk Management Board (RMB) was held to review and approve the proposed new and closed risks, and review the overall company risk posture associated with September data. The following items were approved:
 - One closed Mission Risk related to Information Management.
 - One significant Mission Risk Re-characterization related to Public Works.
 - Two Project risks for the HSPD-12 Multifactor Authentication Acceleration project (HSPD-12/MFA) were significantly re-characterized.
 - 1 new Reliability Project risk for project L-830, *Filter Plant Filter Control System Upgrade (Valves)*.
 - Nine closed Reliability Project risks for Projects L-525, *24" Line Renovation / Replacement from 2901Y to 200E (west leg)*; L-612, *230kV Transmission System Sustainability Upgrades (Options Study)*; and L-840, *24" Line Renovation /Replacement from 2901Y to 200W*.
 - Eleven Reliability Project risks were significantly re-characterized for Projects L-525, *24" Line Renovation / Replacement from 2901Y to 200E (west leg)*; L-612, *230kV Transmission System Sustainability Upgrades (Options Study)*; L-830, *Filter Plant Filter Control System Upgrade (Valves)*; and L-840, *24in Line Replacement 200W*.
- In accordance with the MSC-MP-42375, *Hanford Mission Support Contract Risk Management Plan*, the monthly Risk Management report was submitted to the RL Contracting Office. This report consisted of September data.
- Project Risk Analysis:
 - A risk elicitation was held for project L-789, *Prioritized T&D System Wood Pole Upgrades*. Risks associated with the currently baselined portion of the project (through 30% design) were developed and will be included in the next Risk Management Board for approval.



- A risk elicitation was held for the Route 4S Chip Seal projects (L-775, *Chip Seal RT 4S, Canton Ave to Y Barricade*; L-776, *Chip Seal Rt 4S Y Barricade to 618 West St*; L-777, *Chip Seal RT 4S, 618-10 West Site to HR Road*; and L-859, *Rebuild of First Street from Canton Ave. to IDF Entrance [in 200E Area]*). A project risk register for each of these projects is in development, and is likely to be included in the next Risk Management Board for approval.
- Risk Management reviewed the monthly Operations Project Reports for each reliability project and any related Key Risks for monthly reporting to DOE.
- Mission Risk Review and Update:
 - The new Risk Analyst was introduced to the director of Real Estate Services. A review of areas of potential risk was performed. There were no new risks to be identified at this time for this scope.
 - The new Risk Analyst was introduced to the director of Roads Maintenance and Sanitation. A review of the existing risk in this area resulted in minor revisions to the register.
 - The new Risk Analyst was introduced to the Environmental, Safety & Health (ES&H) leadership team. A review of the current risk register for ES&H was completed. Several risks were updated to reflect the current status of the associated Risk Handling Plans.
 - Risk Management worked with Emergency Services to begin the identification of potential risks associated with Fire System Maintenance and Self-contained breathing apparatus filling capacity. A follow on meeting was held to discuss and revise a draft risk related to the breathing air compressor capacity.
 - Risk Management met with Information Management (IM) to review and revise the risks associated with business management systems, resulting in one risk being recommended for closure at the next RMB. Risk Management also worked with IM to draft a risk related to emergency sirens that is currently in development.



- Other Support:
 - Contract Change Proposal Support – Risk Management worked with the MSC Contracts department to develop a Sensitivity Analysis Matrix for contract change proposals. This matrix is intended to resolve a finding identified by an internal audit of this process. Future proposals will have formal documentation of the Sensitivity analysis disposition.
 - Request for Services (RFS) Proposal Support – Performed risk review of two RFS proposals. One was associated with the Hanford Site Emergency Alerting System Siren Control Software Change and the other was related to Acquisition Verification Services for National Security Technologies (NSTec). These proposals had appropriate scope assumptions, and no expected risk impacts.
 - Client Interface – Held the first of three pilot meetings for Quarterly RL/MSA Risk Management Interface. As a result of that meeting, several areas of concern will be evaluated for potential risk capture.



11.0 DASHBOARD SUMMARY

Table 11-1. Performance Evaluation and Measurement Plan

October FY 2017 2017 Performance Evaluation and Measurement Plan						
Deliverables	Plan	MSA	Status			
			YTD	Oct		
1.0 Effective Site Cleanup						
1.1 Enable mission contractors to achieve their cleanup mission by delivering timely service and reliable infrastructure that support customer key milestones and regulatory commitments.	1.1.1	Demonstrate that the following performance measure targets were met.	Brockman			
		a Biological Controls – Pest Removal	Synoground			
		b Biological Controls – Tumbleweed Removal	Synoground			
		c Biological Controls – Vegetation	Synoground			
		d Crane and Crew Support	Brockman			
		e Electrical – Power Availability	Synoground			
		f Facilities Maintenance	Brockman			
		g Fire Protection System Maintenance	Walton			
		Fleet Services – Heavy Equipment (Cranes)	Brockman			
		h Fleet Services – Heavy Equipment (Evacuators)	Brockman			
		Fleet Services – Heavy Equipment (General Purpose)	Brockman			
		Fleet Services – Light Equipment (Hanford Patrol)	Brockman			
		Fleet Services – Light Equipment (Hanford Fire)	Brockman			
		Fleet Services – Light Equipment (Special Purpose Trucks)	Brockman			
		j IT - Cyber Security – System Patching	Eckman			
		k PFP Support - Loaned Labor	Brockman			
		l Public Works - Maintenance Backlog	Metzger			
		m RSS - Dosimetry External Services	Wilson			
		n RSS - Instrument Calibration	Wilson			
	o Spent Fuel Activity Support - Loaned Labor	Brockman				
p Water – Potable	Synoground					
Water – Raw	Synoground					
1.1.2	Implement FY17 actions per the approved schedule of the MSC-PLN-ENG-56352 Maintenance Maintenance Program Management Plan Rev 2 and HNF-56046, rev 5 MSA Maintenance Program Five-Year Plan.	9/30/2017	Metzger			
1.1.3	Transition Public Works Maintenance Backlog process to required Deferred Maintenance Management process.	9/30/2017	Synoground			
1.1.4	Complete approved project investment portfolio elements as measured by the cost/schedule performance index, which is calculated as (CPI + SPI)/2.	9/30/2017	Brockman			

LEGEND

= On schedule

= Complete

= In jeopardy

= Objective missed

= N/A



Table 11-1. Performance Evaluation and Measurement Plan, Cont.

2.0 Efficient Site Cleanup					
2.1 Demonstrate MSA's responsiveness and alignment of resources and equipment to meet the cleanup contractors' project requirements in support of key milestones.	2.1.1	Maximize efficient MSA use of resources to meet the other Hanford contractors' changing project needs.	9/30/2017	Brockman	Green, Yellow
	2.1.2	Demonstrate consolidation of the Hanford Site infrastructure footprint to the 75 square miles of the Central Plateau. Submit a plan and schedule for approval by 10/15/16 and implement FY17 actions per the approved schedule.	9/30/2017	Synoground	Green, Green
	2.1.3	Demonstrate effective safety and quality management to include, but not be limited to, a robust Contractor Assurance System.	9/30/2017	Jensen	Green, Green
	2.1.4	Demonstrate effective Hanford Site integration to include, but not limited to, identifying longstanding or emerging issues that affect efficient site operations and provide recommendations for improvement (e.g., WTP integration, WCH transition, contract re-alignments, etc.).	9/30/2017	Brockman	Green, Green
	2.1.5	Apply disciplined work controls to Fire Systems Maintenance by fully emulating Phoenix to maximize safety, compliance, and integration with OHCs for site fire systems.	9/30/2017	Walton	Green, Green
	2.1.6	Provide Hanford contractors with integrated tools to maximize "wrench time."	9/30/2017	Metzger	Green, Green
3.0 Comprehensive Performance					
Execute the balance of contract work scope within the contract requirements, terms, and conditions, demonstrating excellence in quality, schedule, management, cost control, small business utilization, and regulatory compliance.			9/30/2017	Wilkinson	Green, Green
Provide leadership to improve management effectiveness and collaborate and participate proactively with customers.					Green, Green
Work with DOE and the other Hanford contractors in a spirit of cooperation to demonstrate operational excellence to include, but not limited to, the following areas:					Green, Green
o Business and financial management using approved purchasing, estimating, property, budget, planning, billing, labor, accounting, and performance measurement systems, providing visibility and transparency to DOE with respect to each of the foregoing					Green, Green
o Contract change management and subcontract administration and consent activities, e.g., proposal review and negotiation process, including timely and adequate submission of proposals and requests for additional data, timely counteroffers, and attaining small business goals					Green, Green
o Safeguards and security, fire department operations, emergency response, and emergency					Green, Green
o Land Management					Green, Green
o Infrastructure and services program management, operations and maintenance					Green, Green
o Effective contractor human resources management					Green, Green
o Problem identification and corrective action implementation					Green, Green
Performed work safely and in a compliant manner that assures the workers, public, and environment are protected from adverse consequences			Green, Green		

Note: 2.1.1 - The overall Usage Based Services and Direct Labor Adder Pools status for the initial month of Fiscal Year 2017 stands at 6.4% over-liquidated, higher than the 5% goal. Pools are evaluated quarterly to determine if a rate change is warranted.

LEGEND

- = On schedule
- = Complete
- = In jeopardy
- = Objective missed
- = N/A



12.0 CONTRACT DELIVERABLES STATUS

The following itemizes the contract deliverables due to RL in October, and provides a 30-day look ahead through November 2016.

Table 12-1. October – November 2016 Contract Deliverables

CDRL	Deliverable	Responsible	Date Due	Date Submitted to DOE	Action	Response Time	Date Due from DOE	Date Approved by DOE
CD0023	Classified Information System Security Plan (ISSP), one for each classified system or network	Walton	10/5/16	10/5/2016	Approve	45 days	11/20/16	
CD0024	Certification Packages (ref: EM PCSP)	Walton	10/5/16	10/5/2016	Approve	90 days	1/4/17	
CD0123	Monthly Billing Reports for DOE Services - Sep	Eckman	10/5/16	10/4/2016	Information	N/A	N/A	N/A
CD0124	Quarterly Service Level Report	Eckman	10/10/16	10/6/2016	Information	N/A	N/A	N/A
CD0144	Monthly Performance Report - Aug	Olsen	10/10/16	10/6/2016	Review	None	N/A	N/A
CD0051	Milestone Review and IAMIT Meeting Minutes - Aug	Wilson	10/10/16	10/3/2016	Information	N/A	N/A	N/A
CD0041	Emergency Readiness Assurance Plan (ERAP)	Walton	10/15/16	10/13/2016	Approve	45 days	11/28/16	
CD0178	Quarterly Manpower Reports and Budget Forecasts	Walton	10/17/16	10/6/2016	N/A	N/A	N/A	N/A
CD0008	Force-on-Force Test Results	Walton	10/21/16	10/13/2016	Review	45 days	11/28/16	
CD0084	Bonneville Power Administration (BPA) Power and Transmission Service invoice verification and breakdown of site contractor costs - Aug	Synoground	10/30/16	10/27/2016	Review	30 days	11/27/16	
CD0010	Patrol Security Incident Response Plan	Walton	10/31/16	7/11/2016	Approve	45 days	8/26/16	8/9/2016
CD0017a	Human Reliability Program Management Plan	Walton	10/31/16	10/25/2016	Review	N/A	N/A	N/A
CD0018a	Workplace Substance Abuse Program Management Plan	Walton	10/31/16	10/27/2016	Review	N/A	N/A	N/A
CD0106	List of Facilities to be or that have been CAS Inspected, or no longer meet the Useful Life Inspection Criteria	Synoground	10/31/16	10/11/2016	Information	N/A	N/A	N/A
CD0112	GSA Non-Federal Recipients and Exchange Sale Reports	Olsen	11/1/16	10/27/2016	Review	10 days	11/6/16	
CD0113	Inventory Accuracy Reports	Olsen	11/1/16	10/27/2016	Information	N/A	N/A	N/A
CD0114	Disposal of Excess and Surplus Personal Property Report	Olsen	11/1/16	10/27/2016	Information	N/A	N/A	N/A
CD0051	Milestone Review and IAMIT Meeting Minutes - Sep	Wilson	TBD*		Information	N/A	N/A	N/A
CD0123	Monthly Billing Reports for DOE Services - Oct	Eckman	11/5/16	11/2/2016	Information	N/A	N/A	N/A
CD0144	Monthly Performance Report - Sep	Olsen	11/10/16	11/7/2016	Review	None	N/A	N/A
CD0046	Self-Assessment and Corrective Actions	Walton	11/15/16		Review	30 days		
CD0182	Site-Wide Assessment of Institutional Controls	Synoground	11/15/16		N/A	N/A	N/A	N/A
CD0002	Annual Forecast of Services and Infrastructure	Brockman	11/30/16		Review	N/A	N/A	N/A
CD0084	Bonneville Power Administration (BPA) Power and Transmission Service invoice verification and breakdown of site contractor costs - Sep	Synoground	11/30/16		Review	30 days		
CD0189	Site Sustainability Plan	Wilson	11/30/16		Review	N/A	N/A	N/A

NOTE: Areas shaded in gray indicate delivery to DOE, and when the "Date Approved by DOE" is shaded, approval has been received in return. "Review" responses from DOE are not documented with dates, but shaded when complete.

IAMIT = Interagency Management Integration Team. TPA = Tri-Party Agreement.
 N/A = No action.



12.1 GOVERNMENT-FURNISHED SERVICES/INFORMATION AND DOE DECISIONS

There were no Government-Furnished Services and Information (GFS/I) items due to MSA in October 2016. Previously, GF050, *DOE Approval of the DRAFT Hanford Lifecycle Scope, Schedule, and Cost Report*, had been due on October 31, 2017. However, in July 2016, MSA was notified of relief from the Tri-Party Agreement M-036-01 milestone submittal (MSC contract deliverable CD0187b), *Final 2017 Hanford Lifecycle Scope, Schedule, and Cost Report*, due December 30, 2016, thus eliminating the need for GF050 this year.

There are two Government-Furnished Services and Information (GFS/I) items due to MSA in 2017:

- GF049, due June 1, 2017: DOE to provide a Hanford “planning case” budget to prepare the updated *Hanford Lifecycle Scope, Schedule, and Cost Report*, and
- GF050, due October 31, 2017: DOE Approval of the *DRAFT Hanford Lifecycle Scope, Schedule, and Cost Report* (Lifecycle Report).

On-time delivery of both of these items is anticipated.



13.0 SELF-PERFORMED WORK

Table 13-1. Mission Support Contract Socioeconomic Reporting.

Plan Category	MSA Goal	FY 2017 Actual To-Date	Cumulative %
Small Business	50.0%	94.5%	54.7%
Small Disadvantaged Business	10.0%	47.9%	16.3%
Small Women-Owned Business	6.8%	18.3%	11.6%
HubZone	2.7%	12.6%	4.2%
Small Disadvantaged, Service Disabled	2.0%	9.5%	4.4%
Veteran-Owned Small Business	2.0%	10.1%	6.0%

Through October 2016

Prime Contract Targets:

- At least 40% contracted out beyond MSA, LLC = 47% (\$1,370M/\$2,890M)
- Small Business 25% of Total MSC Value = 26% (\$747M/\$2,890M)

Potential fee reduction based on cumulative at Year eight (8) of the MSA contract.



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SERVICE AREA SECTIONS

INDIVIDUAL SERVICE AREA SECTION REPORTS FOR OCTOBER ARE INCLUDED AS FOLLOWS:

- BUSINESS OPERATIONS
- EMERGENCY SERVICES
- ENVIRONMENTAL, SAFETY & HEALTH
- INFORMATION MANAGEMENT
- PORTFOLIO MANAGEMENT
- PRESIDENT'S OFFICE
- PUBLIC WORKS
- SITE SERVICES & INTERFACE MANAGEMENT
- TRAINING & CONDUCT OF OPERATIONS

MISSION SUPPORT ALLIANCE

"WE WILL MEASURE OUR SUCCESS BY OUR CUSTOMERS' SUCCESS"



Business Operations

Rich Olsen, Vice President and Chief Financial Officer

Monthly Performance Report

October 2016



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INTRODUCTION

The Business Operations organization supports the Mission Support Alliance, LLC (MSA) by providing required business administration activities including internal management, Human Resources (HR), contract and subcontract administration, and financial controls to effectively manage the Mission Support Contract (MSC). Business Operations is responsible for activities that include HR, Finance and Accounting (F&A), Program Controls, and Contracts. HR promotes competitive compensation, benefits, and development opportunities for the MSA and its teaming partners, enabling them to provide distinctive service to customers. HR is also responsible for developing and implementing personnel policies; offering creative staffing solutions; facilitating positive interaction and employee relations; and making cost-effective, value-based decisions. F&A includes accounts payable, accounts receivable, general ledger reconciliation, payroll and all payroll services for nine companies, pricing and cost estimating, and validating the timekeeping system. Program Controls includes scope, schedule, and cost baseline management, planning, baseline change, work integration and control, and performance reporting. Contracts includes acting as the primary point of contact for the MSA in all contractual matters with the U.S. Department of Energy (DOE), Richland Operations Office (RL). Contracts supports all MSA functional areas by providing contract administration and management; monitors all aspects of contract performance; provides subcontracting and purchasing support to accomplish the MSC mission and support the Hanford Site; reviews incoming correspondence for contractual impacts; assigns and tracks all open action items to completion; and starting in fiscal year (FY) 2017, provides Property and Warehouse Management services, including Inventory Management, Excess Property, Receiving, Warehousing, Shipping, Stores Delivery, and Courier Services.

KEY ACCOMPLISHMENTS

PROGRAM CONTROLS

Performance Incentive (PI) 2.1.4 Self-Assessment – In October, MSA initiated a self-assessment that evaluates the relationships and functions of MSA’s systems for effective planning, organizing, controlling, and reviewing all activities (PI 2.1.4). The assessment team is interviewing DOE-RL and MSA personnel to identify planning, performance information and business system areas of improvement and strengths. The self-assessment completion date is January 30, 2017.

MSC Monthly Performance Report – The September 2016-status MSC Monthly Performance Report was submitted to RL ahead of schedule on Monday, October 24,



2016. Following a three-working days' period of review, which allowed for corrections/changes by both RL and MSA, the Report was posted to the RL intranet website on Monday, October 3, 2016.

HUMAN RESOURCES (HR)

Dominant, Influence, Steadiness, Conscientiousness (DISC) Teambuilding

Workshop for Software Engineering Service – On Thursday, October 6, 2016, the MSA HR Staffing, Diversity and Development department hosted and facilitated a DISC Teambuilding Workshop for the Software Engineering Services organization. Feedback from the workshop was positive and the Staffing, Diversity, and Development team have been asked to provide additional teambuilding exercises in the future.

Pension Plan Payment Rates for Calendar Year (CY) 2017 – MSA HR and Information Technology Department personnel loaded the lump sum rates for CY 2017 into the Human Resources Integrated System (HRIS). The rates are used to calculate lump sum benefits from the Hanford Site Pension Plan, and are provided each year by the Plan's actuaries. Once received, the rates are loaded into HRIS, then formatted, reviewed, and used to update calculation verification spreadsheets.

Participation in Area Career Fairs – Members of the Staffing Diversity & Development team participated in the Central Washington University (CWU) fall career fair in Ellensburg, WA on October 20, 2016. The job fair was open to all CWU students. HR Staffing personnel met with students and discussed open and future positions with MSA. HR staff also met with the coordinator at the paramedic school and discussed opportunities to partner with the school for hiring graduates of their program to join the Hanford Fire Department.

HR Staffing Diversity & Development personnel also represented and promoted MSA at the 2016 Autumn Work Source Columbia Basin College Job Fair on October 20, 2016, in Kennewick, WA. HR Staffing personnel discussed employment opportunities with many interested job seekers. This career fair was open to the general public, and was attended by both job seekers and employers. HR Staffing is committed to attracting a diverse and inclusive workforce to join the MSA team.

Building Bridges and Breaking Down Barriers Events – Staffing, Diversity & Development team represented MSA at the annual Building Bridges and Breaking Down Barriers educational and recruiting event at Columbia Basin College on October 11, 2016. The event provided sessions to educate employers and providers about the challenges individuals with disabilities face in seeking employment, the benefits to employing individuals with disabilities, and what employers can do to accommodate



individuals with disabilities. This event supports MSA's equal employment opportunity and affirmative action plan goals and promotes MSA's commitment to a diverse and inclusive workforce.

Women Helping Women Event – Members of the Staffing, Diversity & Development team represented MSA and the Synergy Network at the “Women Helping Women” luncheon in Pasco on October 13, 2016. More than 1,000 people from the community attended the event. The Women Helping Women Fund Tri-Cities is a non-profit organization that has been addressing the unmet needs of women and children in the Columbia Basin area for the last 16 years.

CONTRACTS AND PROCUREMENT

Small Business/Strategic Savings – MSA continues to build the success of FY 2017 small business and strategic savings area. Planning and implementation of the FY 2017 procurement plan is underway, with integration meetings held and scheduled with the other Hanford contractors and the Environmental Management Supply Chain Management Center.

PROPERTY AND WAREHOUSE MANAGEMENT

New Addition to Supply Chain Management – The MSA warehouse scope has been integrated into the Supply Chain organization. Work is underway to implement a warehouse working group that will focus on issues and opportunities in the warehousing and logistics function and focus attention of the best utilization of Government facilities and resources. MSA supported a joint operating excellence event on warehouse activities, and is supporting WRPS in the execution of the get to excellence plan.

Warehouse Walkdown – MSA Warehouse Management walked down the 4732A warehouse (now vacated of curation artifacts) with personnel from the MSA Warehouse, Materials Procurement, and Facilities services organizations to determine the highest and best future use of the facility. It was determined that the Warehouse and Materials Procurement organizations will co-locate in the facility, thus allowing additional temperature controlled warehouse storage capacity, and consolidating capabilities to stage MSA work package materials into a single location in support of upcoming major projects.

Walkdown of Pumps – MSA Warehouse Operations completed a walkdown of large pumps stored at the 2101M facility with representatives of WRPS Engineering, MSA Crane and Rigging, and MSA Safety to assess engineering/hoisting and rigging



challenges of off-loading and loading the pumps. Updated direction on handling the pumps is being formulated.

FINANCE AND ACCOUNTING

General Accounting Support – The Business Management System (BMS) close for Fiscal Year (FY) End 2016 was successfully finalized. During this process, MSA did the following:

- Finalized the Business Management System (BMS) close-out for FY 2016. Staff worked closely with the other Hanford contractors to close out the books for FY 2016 and prepare the files for upload.
- Ensured funding and start-up of all Requests for Services for FY 2017.
- Completed setup of BMS for FY 2017.
- Finalized and executed passbacks to MSA and the other Hanford site contractors. Total of this passback was \$6.2M, and \$10.7M for all of FY 2016.

Continuing Resolution Funding – MSA met with DOE counterparts during the month of October to discuss funding obligations via the monthly mandatory obligations meeting which provides an avenue for MSA and DOE to work through funding issues and concerns. These meetings provide an opportunity for early detection of problems and allows collaboration between the parties to find a common resolution.

Support to Ongoing Audits – MSA is responding to requests from DOE on FY 2009 and FY 2010 Incurred Cost Submissions. Currently, proof of corrective actions submitted on FY 2009 and FY 2010 is being gathered. MSA is also working to respond to the DOE Invoice Audit on two findings. One finding questions per diem cost and the other finding deals with educational cost.

Additionally, MSA Internal Audit's review of Time and Attendance and the Procurement Card (P-Card) purchases continues. Management Responses are being coordinated and submitted to Internal Audit.

LOOK AHEAD

Performance Management – Members of MSA's Systems Controls staff have begun meeting with other Hanford contractors (Washington River Protection Solutions and CH2MHill Plateau Remediation Company) to discuss a path forward for the upcoming Cobra 8 upgrade.



MAJOR ISSUES

None to report.

SAFETY PERFORMANCE

There were no Occupational Safety and Health Administration (OSHA) injury cases reported for Business Operations in October 2016. There was one First Aid injury reported during the month, a case of cumulative trauma/pain in an employee's right wrist and hand.

BASELINE PERFORMANCE

Table BO-1. Business Operations Cost/Schedule Performance (dollars in millions).

Fund Type	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
RL-0011 – Nuclear Mat Stab & Disp PFP	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$1.3	\$1.3	\$1.3	\$0.0	\$0.0
RL-0012 – SNF Stabilization & Disp	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.5	\$0.5	\$0.5	\$0.0	\$0.0
RL-0013 – Solid Waste Stab & Disp	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$1.6	\$1.6	\$1.6	\$0.0	\$0.0
RL-0020 - Safeguards & Security	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.5	\$0.5	\$(4.0)	\$0.0	\$4.5
RL-0030 – Soil & Water Rem-Grndwtr/Vadose	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$1.4	\$1.4	\$1.4	\$0.0	\$0.0
RL-0040 - Nuc. Fac. D&D – Remainder Hanford	\$0.0	\$0.0	\$0.2	\$0.0	(\$0.2)	\$2.7	\$2.7	\$1.0	\$0.0	\$1.7
RL-0041 - Nuc Fac D&D - RC Closure Proj	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
Site-wide Services	\$0.8	\$0.8	\$0.9	\$0.0	(\$0.1)	\$102.3	\$102.3	\$76.1	\$0.0	\$26.2
Subtotal	\$0.8	\$0.8	\$1.1	\$0.0	(\$0.3)	\$110.3	\$110.3	\$77.9	\$0.0	\$32.4

ACWP = Actual Cost of Work Performed
 BCWP = Budgeted Cost of Work Performed
 BCWS = Budgeted Cost of Work Scheduled
 BAC = Budget at Completion

CV = Cost Variance
 CTD = Contract-to-Date
 FYTD = Fiscal Year-to-Date
 SV = Schedule Variance



BASELINE PERFORMANCE VARIANCE

(WBS Elements 3001.06.01 [Business Operations], 3001.06.02 [Human Resources], and 3001.90.04 [MSA Transition])

Current Month Cost Variance (-\$0.3M) – Negative variance in RL-40 due to higher than planned general supplies inventory costs in Warehouse. Offsetting revenue expected in upcoming month to mitigate. Negative variance in SWS partially due to unplanned 2430 Stevens Relocation costs not included in contract baseline. Expenditures will remain in accordance with approved funding and IIP scope.

Contract-to-Date (CTD) Cost Variance (+\$32.47M) – Positive CTD cost variances in RL-20, RL-40 and Site-wide Services are primarily due to September 2016 credits associated with Affiliate Fee on IT scope and Training on Overtime pending final resolution.

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Emergency Services

Craig Walton, Vice President

Monthly Performance Report

October 2016



Hanford Fire Department annual pump testing



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INTRODUCTION

The Emergency Services (ES) organization supports the site environmental clean-up missions by providing protective forces, physical security systems, information security, personnel security, nuclear Materials Control and Accountability, cyber security, program management, fire and emergency response services, and emergency operations.

KEY ACCOMPLISHMENTS

EMERGENCY MANAGEMENT PROGRAM

Independent Evaluation of 283W Drill for Exercise Credit – Emergency Management Program personnel received the U.S. Department of Energy (DOE) Richland Operations Office (RL) Independent Evaluation of 283W Drill for Exercise Credit that was conducted on September 17, 2016. There were no findings or suggestions identified and the overall rating is Satisfactory.

Radiological Assistance Program (RAP) Region 8 supported the annual Mobile Detection Deployment Unit (MDDU) meeting in Washington DC, October 17-19, 2016.

EMP Contract Deliverable – Contract Deliverable CD0041, “Emergency Readiness Assurance Plan”, was submitted to RL on October 12, 2016.

HANFORD FIRE DEPARTMENT

Annual Pump Testing – Hanford Fire Department (HFD) personnel conducted its annual pump testing of HFD apparatus pumps on October 12-13, 2016. The annual pump testing is performed by the Underwriter Laboratories subcontractor with assistance from HFD personnel. The testing allows the HFD to meet National Fire Protection Association 1911 Standard for the Inspection, Maintenance, Testing and Retirement of In-Service Automotive Fire Apparatus recommendations.

SAFEGUARDS AND SECURITY (SAS)

Safeguards and Security Contract Deliverable Submitted – Contract Deliverable CD0178, “*Quarterly Manpower Reports and Budget Forecasts*”, was submitted to RL on October 6, 2016, and Contract Deliverable CD0018a, “*Workplace Substance Abuse Program Management Plan*”, was submitted on October 27, 2016.

LOOK AHEAD

Nothing to report



MAJOR ISSUES

Nothing to report

SAFETY PERFORMANCE

Emergency Services reported no Occupational Safety and Health Administration (OSHA) Recordable injuries in October. There were two minor First Aid injuries reported: one involved a pinched hand and wrist while opening a drawer, and another hand injury which occurred during training.

BASELINE PERFORMANCE

Table ES-1. Emergency Services Cost/Schedule Performance (dollars in millions).

Fund Type	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
HSPD-12 (RL-0011,RL-0012, RL-0013, RL-0030)	\$0.1	\$0.1	\$0.2	\$0.0	(\$0.1)	\$2.4	\$2.4	\$1.9	\$0.0	\$0.5
RL-0020 - SAS	\$3.5	\$3.5	\$3.6	\$0.0	(\$0.1)	\$408.5	\$408.5	\$421.4	\$0.0	(\$12.9)
Site-wide Services	\$1.6	\$1.6	\$2.1	\$0.0	(\$0.5)	\$186.7	\$186.7	\$200.1	\$0.0	(\$13.4)
Subtotal	\$5.2	\$5.2	\$5.9	\$0.0	(\$0.7)	\$597.6	\$597.6	\$623.4	\$0.0	(\$25.8)

ACWP = Actual Cost of Work Performed

BCWP = Budgeted Cost of Work Performed

BCWS = Budgeted Cost of Work Scheduled

CV = Cost Variance

CTD = Contract-to-Date

SV = Schedule Variance

Explanation of Fund Type Assignments by Project Baseline System (PBS) and Work Breakdown Structure (WBS) - HSPD-12 – Work is funded from four different PBSs (RL-0011, RL-0012, RL-0013, RL-0030), and is budgeted under WBS element 3001.01.05.02 in four separate work packages to accommodate cost collection by PBS. Also, RL-0020 work is budgeted under WBS 3001.01.01 and Site-wide Services work is budgeted under WBSs 3001.01.02, 3001.01.03, and 3001.01.05.01.

BASELINE PERFORMANCE VARIANCE:

Current Month (CM) Cost Variance (CV) (-\$0.7M) – CM negative CV is attributed to several baseline differences as described in the Contract-to-Date variance. ES is working to RL-directed contract baseline re-alignment guidance that provides for a higher spending target than the baseline.

Contract-to-Date CV (-\$25.8M) – The primary drivers for the negative CTD CV are the continued storage of Special Nuclear Material on the Hanford Site (not in the original



baseline assumptions); implementation of new Design Basis Threat guidance, which was implemented subsequent to the MSA baseline proposal; and a baseline budgeting omission for platoon shift hours with the HFD. This activity is being worked according to RL-directed contract baseline re-alignment guidance that provides for a higher spending target than the baseline. No mitigating actions are in place at this time to reduce the overall cost overrun.



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Environmental, Safety, & Health

Mike Wilson, Vice President

Monthly Performance Report

October 2016

YOU are at the Intersection of MSA Safety and Environmental Programs

Y Voluntary Protection Program
Integrated Safety Management System

O Environmental Mgmt System
Automated Job Hazard Analysis
Employee Job Task Analysis

U Stop Work Authority
Zero Accident Council

They **DON'T** Work without **YOU!**

2015-10-0116 Rev 0
October 25, 2016



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INTRODUCTION

The Environmental, Safety & Health (ES&H) organization includes the following work groups:

- Worker Protection;
- Integrated & Site Wide Safety Standards;
- Safety & Health Program Support;
- Hanford Atomic Metal Trades Council/Hanford Guards Union (HAMTC/HGU) Safety Representatives;
- Environmental Integration Services (EIS);
- Public Safety & Resource Protection (PSRP); and
- Radiological Site Services (RSS).

This team ensures that all environmental, safety and health requirements are met so that Mission Support Alliance, LLC (MSA) provides its services in a safe and environmentally sound manner. The ES&H organization develops, implements and improves Integrated Safety Management, worker safety and health and radiation safety procedures that govern the work performed by MSA.

KEY ACCOMPLISHMENTS

Annual Dangerous Waste Report – Environmental Integration Services (EIS) provided assistance to the Department of Energy (DOE) and CH2M HILL Plateau Remediation Company (CHPRC) regarding annual dangerous waste reporting. In reviewing the reports for Calendar Years 2013 and 2015, the U.S. Environmental Protection Agency (EPA) noticed a substantial reduction in the waste quantity for one of Hanford’s liquid waste streams. EIS, in coordination with CHPRC, confirmed that the reported quantities were accurate. The waste quantity reduction was attributable to an operational change at the Liquid Effluent Retention Facility/Effluent Treatment Facility.

MSA Subject Matter Expert/Environmental Compliance Officer Quarterly Forum – EIS reinstated the quarterly Subject Matter Expert (SME)/Environmental Compliance Officer (ECO) Forum to assist with open lines of communication and to present latest topics. Topics presented included Resource Conservation and Recovery Act (RCRA) inspection requirements and annual reporting, new-source-reviews applicable to air requirements, and the latest revision to the electronic Environmental Activity Screening Form. The next quarterly SME/ECO Forum will be held in January 2017.



Emergency Planning and Community Right-To-Know Act Kaizen – In October, EIS presented the out-brief for the Emergency Planning and Community Right-to-Know Act (EPCRA) Tier II Reporting Process Kaizen. The goal of the Kaizen was to bring together Hanford Contractors to develop an efficient and effective EPCRA Tier II Reporting process, which will assign accountability and timeliness metrics to the EPCRA Tier II reporting process.

Move of Hanford Collection to Washing State University (WSU) Tri-Cities (TC) Off-Site Curation Facility – Public Safety & Resource Protection (PSRP), Curation Services, and WSU-TC Hanford History Project completed the move of the Hanford collection from the on-site artifact staging facility to the WSU-TC Hanford history project off-site repository. Of approximately 9,300 artifacts, multi-media, photographs, and documents, ninety-five percent of the Hanford collection was cleared for public viewing. The bulk of remaining items require outdated media equipment for viewing or review for export control.

MSA Information Security and Richland Operations Office (RL) conducted a walk down of WSU-TC's repository and WSU-TC provided an Export Control Plan for Hanford Collection items. Potential export control items were transferred to WSU-TC on limited release. Review for Export Control is expected to take place during FY 2017.

Archaeological Inventory Survey – PSRP Cultural and Historic Resource Program (CHRP), in conjunction with Wanapum tribal members, performed an Archaeological Inventory Survey of previously unsurveyed areas on the Hanford Site. The Archaeological Survey was conducted to meet the provisions of Section 110 of the National Historic Preservation Act, which requires federal agencies to assume responsibility for the stewardship Federal-owned or controlled of historic properties. The survey was conducted to identify archaeological sites in areas that had not been previously surveyed.

Ecological Monitoring Support to PNNL – PSRP Ecological Monitoring received approval from DOE RL to provide Pacific Northwest National Laboratory (PNNL) Ecological Monitoring data Geographic Information System (GIS) files in support of their science project focused on microbial processes in the subsurface and hyporheic zone, transport of contaminants, and generation of greenhouse and other gases both below the ordinary high water mark and in adjacent upland areas. MSA provided GIS information for the entire study area that included the Columbia River and its shoreline. Data provided included rare plants, bald eagle administrative buffers, element occurrence boundaries, fall chinook redds, lamprey locations, raptor nests, and steelhead redds.



Mixed Waste Transformer Oil– EIS is working with MSA Electrical Utilities on the disposal of 11 drums containing used transformer oil that are not radiologically releasable, and are hazardous waste for RCRA metals. The 90-day clock for these containers started August 23, 2016. A meeting was held to discuss if these drums can be radiologically released and the path forward for disposal or release. The outcome of the meeting was to dispose of the drums as not radiologically releasable oil, and continue with the path forward for disposal through CHPRC. Another outcome of the meeting was that future disposal of oil that is potentially not radiologically releasable is to be sampled, to verify the oil is releasable or not releasable. These 11 drums were accepted for disposal and will be shipped in early November, 2016. This is well in advance of the 90-Day clock date of November 20, 2016.

Central Milestone Module Update – EIS modified the Central Milestone Module (CMM), which is the Hanford Site’s database for tracking Tri-Party Agreement milestones. This change will allow Portfolio Management’s Milestone Internal Scenario Tool, which pulls data from CMM, to send notifications to appropriate responsible DOE assistant managers, project managers, and leads.

LOOK AHEAD

More Retrofit Projects Coming – EIS identified several new lighting retrofit projects scheduled to take place in FY 2017, including 13 small CHPRC warehouses, the completion of 2750 East D-Wing for Washington River Protection Solutions (WRPS), and the complete retrofit of the 272-AW Tank Farm Support Facility for WRPS. Both DOE and the Bonneville Power Administration were updated on the amount of energy efficiency incentives expected to be applied for this fiscal year.

MAJOR ISSUES

Automated Bar Coding of All Hanford Samples (ABCASH) Database – EIS staff are developing a corrective action management plan in response to the discovery that the ABCASH database was not coded to accept all laboratory qualifier metadata associated with any given sample and its analytical results.

SAFETY PERFORMANCE

ES&H reported no Occupational Safety and Health Administration Recordable injuries in October.



BASELINE PERFORMANCE

Table ES&H-1. ES&H Cost/Schedule Performance (dollars in millions).

Fund Type	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
Site Wide Services	\$1.9	\$1.9	\$1.7	\$0.0	\$0.2	\$206.0	\$206.0	\$208.2	\$0.0	(\$2.2)
Subtotal	\$1.9	\$1.9	\$1.7	\$0.0	\$0.2	\$206.0	\$206.0	\$208.2	\$0.0	(\$2.2)

ACWP = Actual Cost of Work Performed
 BCWP = Budgeted Cost of Work Performed
 BCWS = Budgeted Cost of Work Scheduled

CV = Cost Variance
 CTD = Contract-to-Date
 SV = Schedule Variance

BASELINE PERFORMANCE VARIANCE

SWS – ES&H (WBS 3001.02.01, 3001.02.02, 3001.02.03, 3001.02.04, 3001.04.11 and 3001.06.03)

Current Month (CM) Cost Variance (CV) (+\$0.2M): – CM positive CV is attributed to baseline differences as described in the Contract-to-Date variance. ES&H is working to RL-directed guidance that provides for a higher spending target than the baseline.

Contract-to-Date (CTD) CV (-\$2.2M) – The unfavorable CTD CV is primarily due to the approved funding and work scope continuing at a higher level of support than assumed in the contract baseline. There are no other potential contributing factors. Prior to FY 2014 funds and budget were more closely aligned, resulting in minimal variances. In FY 2014 the Environmental funding was virtually cut in half, resulting in staffing reductions and CTD underruns. In FY 2015 the Environmental funding was restored, and then both Environmental and Safety/Health programs received funding increases to support the level of service required by the Hanford Site. The resulting overruns consumed the prior CTD underrun. In FY 2016, the funding was again significantly higher than budgeted values, resulting in additional CTD overruns.

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Information Management

Todd Eckman, Vice President

Monthly Performance Report

October 2016



Washington Closure Hanford (WCH) Network Transition Team



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INTRODUCTION

Mission Support Alliance, LLC's (MSA's) Information Management (IM) organization brings best-in-class IM services to the Hanford Site. A variety of infrastructure, services, and applications are provided that include support to safety, security, site infrastructure, and cleanup missions; administrative support systems and processes; telecommunications and network infrastructure; records, document, and content management; cyber security; network operations and security center; desktop services; Information Support services including reproduction services; site forms; multi-media services; geospatial information management and site mapping services; and the Mission Service Desk.

The goal of IM is to ensure technology solutions and innovation is supporting every project's success associated with the Hanford Site cleanup mission. IM's goal is achieved by confirming that top quality services and solutions are delivered in a professional and timely manner.

KEY ACCOMPLISHMENTS

INFRASTRUCTURE SYSTEMS

Smart Card Personal Identity Verification (PIV) Project Continues Moving Forward - MSA IM completed configuration of smart card PIV authentication for privileged users in the Hanford management domain. Administrators are now able to log in to this system the same way they have been able to on the main Hanford Local Area Network (HLAN) system.

Failed Disk Drive Repaired – On October 3, 2016 the Hanford Local Area Network (HLAN) storage system reported a failed disk drive, a periodic normal operational occurrence. Vendor support automatically sent a new replacement drive, and it was successfully installed on October 5, 2016. This allowed for continual operations of the HLAN storage system.

CYBER SECURITY

Firewall Rules Successful Migrated – Network analysts successfully migrated firewall rules and rerouted Washington Closure Hanford LLC (WCH) traffic from WCH's firewall to the core Hanford Local Area Network (HLAN) firewall. MSA network analysts now control one set of firewall rules, including those for WCH. This will also allow for WCH to retire its firewall.

Cyber Security Visits Department of Energy (DOE) Savannah River Site (SRS) – The purpose of the October visit was to review the protection of Industrial Control Systems



(ICS) at Hanford with cyber security personnel at SRS. Comparisons were made with protection mechanisms in place at SRS for similar systems to aid in the implementation of controls on ICS in the Hanford Federal Cloud (HFC) System Security Plan (SSP).

Cyber Security attends Cyber Security Conference – The conference, held in Atlanta, Georgia, was titled, “DOE Cyber, An Enterprise Approach: Excellence Through Innovation and Integration.” The focus was on integrating cyber defenses across the DOE enterprise including operations, policy, and programs. Training included anti-phishing, hands-on computer security exercises, and an enterprise incident response plan exercise. There was also a special meeting for DOE Environmental Management (EM) program members.

SOFTWARE ENGINEERING SERVICES

Upgrade to SmartPlant Foundation implemented – The upgrade enhanced the Preventative Maintenance Instruction Document (PMID) and Preventive Maintenance Deferral form with better mapping to Microsoft Word¹ forms, streamlined the associated workflow, and consistency in the displays. There was also a new report added for Engineering Change Notices (ECN) by the Originating Organization.

ENGINEERING

Washington Closure Hanford (WCH) Network Transition Complete - This job was part of the project transitioning WCH to Washington River Protection Services (WRPS). This was a significant effort, with major changes within 22 different buildings. MSA’s team rerouted both fiber and copper lines, and created over a dozen special circuits. Work was completed on October 1, 2016.

Plutonium Finishing Plant (PFP) Demo Camera Project – MSA installed seven network cameras in support of the demolition project at the Plutonium Finishing Plant (PFP). Five of the cameras were Pan, Tilt and Zoom cameras, which will provide the customer enhanced oversight for its project. For this effort MSA pulled two new fiber optic cables, installed two HLAN network switches and three new power supplies, as well as other miscellaneous hardware. It was a large endeavor within a short turn-around timeframe.

¹ Registered trademark to Microsoft Corporation, Renton, WA



LOOK AHEAD

Firewall and Proxy Replacement – The current end-of-life core firewalls and proxies are to be replaced with a new firewall. Work has begun, and completion is expected in Fiscal Year (FY) 2017.

Washington Closure Hanford (WCH) Records Transfer – MSA Content and Records Management (CRM) participated in a customer support meeting with WCH, Records and Information Management, Information Technology, and Human Resources staff to discuss turning over WCH records to MSA at the end of the WCH contract. WCH plans are to transfer approximately 12,000 records to IDMS in two stages. The first stage will occur in October at the end of the contract; the second stage is planned for a few months later to allow for the final records to be completed.

Key Performance Goals Dashboard Revision – IM is working on the development of the FY Work Plan change to the DOE Richland Operations Office Key Performance Goals dashboard. This change will tie the Operations Key Performance Goals into flat file metrics, eliminating the need for the projects to manually enter the data in two places. Once completed, the system will automatically generate the necessary data and calculate the status of completed Fiscal Year Work Plan metrics for the Key Performance Goals.

MAJOR ISSUES

None to report.

SAFETY PERFORMANCE

There were no Occupational Safety and Health Administration (OSHA) recordable injuries reported in October. There were no first-aid injuries reported and no vehicle accidents reported.



BASELINE PERFORMANCE

Table IM-1. IM Cost/Schedule Performance (dollars in millions).

Fund Types	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
RL-0020 - Safeguards & Security	\$0.2	\$0.2	\$0.2	\$0.0	\$0.0	\$12.7	\$12.7	\$15.5	\$0.0	(\$2.8)
RL-0040 - Nuc. Fac. D&D - Remainder Hanford	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.3	\$0.3	\$0.3	\$0.0	\$0.0
Site-Wide Services	\$1.9	\$1.9	\$1.2	\$0.0	\$0.7	\$217.6	\$217.6	\$207.3	\$0.0	\$10.3
Subtotal	\$2.1	\$2.1	\$1.4	\$0.0	\$0.7	\$230.6	\$230.6	\$223.1	\$0.0	\$7.5

ACWP = Actual Cost of Work Performed

BCWP = Budgeted Cost of Work Performed

BCWS = Budgeted Cost of Work Scheduled

CV = Cost Variance

CTD = Contract-to-Date

SV = Schedule Variance

BASELINE PERFORMANCE VARIANCE

Current Month (CM) Cost Variance (CV) (+\$0.7M)

CM Site-Wide Services (SWS) (\$0.7) – The positive CM CV is due to savings associated with the self-performance of Software Engineering Services.

Contract-to-Date (CTD) CV (+\$7.5M) – The majority of the CTD CV in these accounts are due to the approved funding and Integrated Investment Portfolio (IIP) scope being divergent from the baseline. CTD CV will continue and expenditures will be in accordance with approved funding and MSA IIP scope.

RL-20 (-\$2.8M) – The baseline budget did not include Unclassified Cyber Security. Performance of this approved IIP work has resulted in this unfavorable CTD CV.

SWS (+\$10.3M) – The majority of the CTD CV in these accounts are due to the approved funding and IIP scope being divergent from the baseline. CTD CV will continue and expenditures will be in accordance with approved funding and IIP scope. Areas that are divergent from the current baseline include: IM Project Planning & Controls; IM Intranet & Collaboration; IT Cross Functional Services; Information Systems; Business Management Systems; IM System Work Portal; Hanford Site Emergency Alerting



System; Long-Term Storage; Major Collection Management; Inventory & Schedule Management; Information Resources and Content Management; Multi-Media Services; Geospatial; and Mail Services.

Note: IM is beginning to realize the cost savings associated with the self-performance of much of the IT scope.



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Portfolio Management

Steve Young, Vice President

Monthly Performance Report

October 2016



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INTRODUCTION

The Mission Support Alliance, LLC (MSA) Portfolio Management (PFM) organization delivers an integrated planning and information management approach that allows the U.S. Department of Energy (DOE), Richland Operations Office (RL) to make informed decisions on cleanup efforts. This approach aligns and integrates DOE and Hanford contractor planning and performance data and provides the information in meaningful outputs for analysis and action. Through this integration, MSA PFM provides technical support and expertise in project, portfolio, and enterprise management for continual optimization of the cleanup mission lifecycle and achievement of the Hanford End State Vision. As such, the MSA PFM organization supports and performs: Lifecycle Planning; Fiscal Year (FY) Work Planning; Baseline Decision Management; Mission Support Planning; Budget Formulation Planning; Analytical Tool Development; Project Interface; and Analytics. MSA PFM provides analytical and unbiased recommendations to assist DOE cleanup and resource allocation decisions.

KEY ACCOMPLISHMENTS

Analytical Tools –The Mission Support Alliance Internal Planning Assumption Dataset (MIPAD) desktop icon was deployed to selected users. MIPAD was developed and deployed as a tool to integrate project schedules and milestones. MIPAD also displays assumption and decision data related to MSA’s work scope necessary to complete the RL FY 2016-2028 Vision.

FY 2018-FY 2022 Budget Formulation – Several activities were initiated in preparation for FY 2019-FY 2023 budget planning, including:

- PFM restructured the Master Data so the initial starting point was defined and traceable.
- A new change log was developed along with an area for new documents.
- Several new change requests were processed.
- To determine what changes were incorporated in RIPL but, due to timing, were not in BPM, an analysis was performed comparing current data contained in the DOE-Headquarters Budget Prioritization Module (BPM) to the Ranked Integrated Priority List (RIPL).

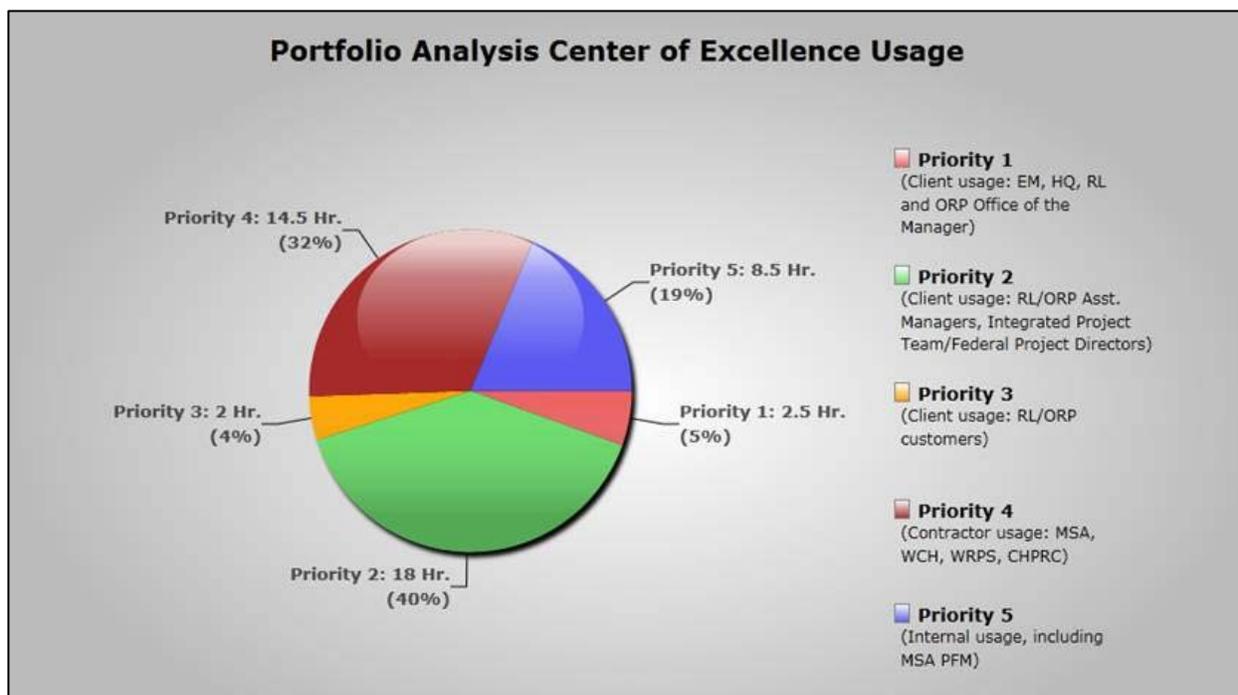
Hanford Lifecycle Report – PFM facilitated a meeting on October 18, 2016, between RL and the DOE Office of River Protection (ORP), to review ORP’s schedule for updating its input for the 2018 Lifecycle Report. By early 2017, ORP will have prepared the baseline case (compliant with the amended Tri-Party Agreement Consent Decree) for the River Protection Project System Plan, Revision 8. One lifecycle issue is that ORP



may only have costs for the Waste Treatment and Immobilization Plant that include the Low Activity Waste/Balance of Facilities/Analytical Laboratory (LBL). This issue resulted because the High Level Waste and Pretreatment Facility technical issues have not been resolved. RL and ORP agreed to meet again on January 17, 2017 to review their status and prepare for the next Lifecycle Report Project Managers Meeting scheduled in March 2017.

Technical Improvement & Efficiency Opportunities – PFM provided assistance with the documentation and submittal of new technical improvements for the RL Plutonium Finishing Plant project. Additionally, PFM supported the October 19, 2016 RL Groundwater Project review of technical improvements, the aim of which is to move them through the decision process, close-out those that have been implemented, and document the lifecycle cost savings.

Portfolio Analysis Center of Excellence (PACE) – The Priority levels and the hours of usage of the PACE for October are displayed in the chart below:





LOOK AHEAD

Dashboards – PFM concluded preliminary development activities and testing on the Contractor Feedback Improvement Tool dashboard in support of the RL Assistant Manager for Safety and Environment. On October 27, 2016, the DOE-RL customer provided additional requirements. Development activities to address these requirements will take place in November. The dashboard is now scheduled for deployment by November 30, 2016.

MAJOR ISSUES

Nothing to report.

SAFETY PERFORMANCE

No Occupational Safety and Health Administration (OSHA) Recordable injury or First Aid injury cases were reported for PFM in October 2016.

BASELINE PERFORMANCE:

Table PFM-1. Portfolio Management Cost/Schedule Performance (dollars in millions)

Fund Type	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
1000HQ – DOE-HQ Funding	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.1	\$0.1	\$0.1	\$0.0	\$0.0
1000PD - Richland Program Direction	-\$0.8	-\$0.8	\$0.0	\$0.0	\$0.0	\$0.4	\$0.4	\$0.3	\$0.0	\$0.1
RL-0011 - Nuclear Mat Stab & Disp PFP	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
RL-0030 - Soil & Water Rem-Grndwtr/Vadose	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.1	\$0.1	\$0.1	\$0.0	\$0.0
RL-0040 - Nuc Fac D&D Remainder Hanfrd	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.1	\$0.1	\$0.0	\$0.0	\$0.1
RL-0041 - Nuc. Fac. D&D RC Closure Proj	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$1.2	\$1.2	\$1.1	\$0.0	\$0.1
Site-Wide Services	\$0.4	\$0.4	\$0.3	\$0.0	\$0.1	\$51.0	\$51.0	\$46.1	\$0.0	\$4.9
Subtotal	\$0.4	\$0.4	\$0.3	\$0.0	\$0.1	\$52.9	\$52.9	\$47.7	\$0.0	\$5.2

ACWP = Actual Cost of Work Performed
 BCWP = Budgeted Cost of Work Performed
 BCWS = Budgeted Cost of Work Scheduled

CV = Cost Variance
 CTD = Contract-to-Date
 SV = Schedule Variance



BASELINE PERFORMANCE VARIANCE

Current Month Cost Variance (CV) (+\$0.1M) – The current month underrun is due to an open position in the Software Engineering Services (SES) team that supports PFM, reduced effort on the part of SES staff because they are supporting other MSA work, reduced support from staff augmentation due to provision of support to others as well as MSA PFM staff temporarily supporting other organizations.

Contract-to-Date (CTD) CV (+\$5.2M) – The positive CTD CV is primarily due to less Portfolio Management support required than assumed for integrated planning actions.

MISSION SUPPORT ALLIANCE

"WE WILL MEASURE OUR SUCCESS BY OUR CUSTOMERS' SUCCESS"



President's Office

W. K. Johnson, President

R. E. Wilkinson, Chief Operations Officer

Monthly Performance Report

October 2016



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INTRODUCTION

The President's Office is comprised of site-wide services consisting of Quality Assurance (QA), Performance Oversight, Mission Support Alliance (MSA) Engineering, and External Affairs.

The QA and Performance Oversight organizations establish quality requirements for MSA and its subcontractors. Acquisition Verification Services (AVS) and QA provide audit and inspection services for the Other Hanford Contractors (OHC), and the Integrated Evaluation Plan for annual operational assessments. It also provides MSA management with the information to evaluate and improve all aspects of the organization through Corrective Action Management.

The MSA Engineering organization provides the technical and engineering skills necessary to plan, review and coordinate all engineering aspects of Mission Support Contract work. It produces consistent, high quality engineering products that enhance the reliability of the mission critical site infrastructure systems and facilities. Monthly project status updates from Engineering are included within the other Functional Organization reports.

The External Affairs department provides a myriad of communication functions for Department of Energy (DOE), Hanford Site contractors, employees, and the public. The group supports Richland Operations (RL), addressing specific contractual objectives, commitments and milestones, and manages the Hanford Speakers Bureau and Hanford Public Tour programs. The External Affairs function also facilitates community outreach on behalf of MSA and its employees.

KEY ACCOMPLISHMENTS

EXTERNAL AFFAIRS

MSA Fundraiser for Breast Cancer – *MSA Cares* raised more than \$7,300 for the “Making Strides Against Breast Cancer” campaign, making MSA the top fundraising team for the October 15, 2016 event.



MSA Cares Fundraising Team



Public Information Repositories: Desk Instruction – MSA Communications staff supported the Tri-Party Agreement agencies in developing a desk instruction for the Public Information Repositories process. The desk instruction establishes the processes, roles, and responsibilities of RL, DOE Office of River Protection, the OHCs, for providing Hanford Site documents to the public.

MSA Provides Tour Support – MSA organized tour logistics for several DOE and university related organizations, including: the Hanford Advisory Board; the Hanford Tank Waste Committee; members of the DOE Small Business Symposium; the Washington State Department of Health; and students from the University of Montana, Evergreen State College (Olympia, WA), Columbia Basin College (Pasco, WA), and the University of Washington School of Public Health.

QUALITY ASSURANCE AND PERFORMANCE OVERSIGHT ACTIVITIES

Activities during the month of October included:

- Attendance at a critique for an event involving a potential personnel exposure to asbestos-containing material at in the 100K Area
- Attendance at a critique for an event involving MSA loaned labor who were involved in a vehicle event near the Waste Receiving and Processing Facility. CH2M HILL Plateau Remediation Company (CHPRC) will lead the associated causal analysis (with support from MSA), and MSA will conduct the associated event investigation.
- Initiated an “R” Occurrence Report on October 12, 2016, in response to a number of recent vehicle events involving MSA personnel.

Acquisition Verification Services (AVS) Activities – MSA’s AVS activities for CHPRC and Washington River Protection Solutions, LLC (WRPS) for October were as follows:

Fiscal Month October

2017	October			Fiscal Year 2017 to date
	CHPRC	WRPS	Others	
Source Inspections	0	8	0	8
Annual Desk Reviews	0	0	0	0
Supplier Evaluations/Audits	0	1	2	3
First Article Inspection	0	0	0	0



LOOK AHEAD

None to report.

MAJOR ISSUES

None to report.

SAFETY PERFORMANCE

There were no Occupational Safety and Health Administration (OSHA) Recordable injury or First Aid injury cases reported for October.

BASELINE PERFORMANCE

Table PO-1. President's Office Cost/Schedule Performance (dollars in millions).

Fund Type	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
Site-wide Services	\$0.6	\$0.6	\$0.4	\$0.0	\$0.2	\$63.7	\$63.7	\$52.7	\$0.0	\$11.0
Subtotal	\$0.6	\$0.6	\$0.4	\$0.0	\$0.2	\$63.7	\$63.7	\$52.7	\$0.0	\$11.0

ACWP = Actual Cost of Work Performed.

CV = Cost Variance.

BCWP = Budgeted Cost of Work Performed.

CTD = Contract-to-Date

BCWS = Budgeted Cost of Work Scheduled.

SV = Schedule Variance.

BASELINE PERFORMANCE VARIANCE

Current Month (CM) Cost Variance (CV) (+\$0.2M) – The favorable CM CV is primarily associated with the MSA Engineering Organization. The approved funding level and Integrated Investment Portfolio (IIP) are significantly less than the contract baseline.

Contract-to-Date (CTD) CV (+\$11.0M) – The favorable CTD CV is primarily attributable to MSA Engineering's approved funding, and IIP being divergent from the contract baseline. Through the annual IIP process, the MSA Engineering organization was authorized/funded to perform less work than had been planned in the baseline.



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MISSION SUPPORT ALLIANCE

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Public Works

Todd Synoground, Vice President

Monthly Performance Report

October 2016



*Remove of obsolete and abandoned
electrical transformers*



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INTRODUCTION

The Mission Support Alliance, LLC (MSA) Public Works (PW) function provides a myriad of services to support a broad base of customers performing their respective Hanford Site missions. PW provides best-in-class operations and support services within a culture of safety, customer service and fiscal responsibility. PW services include: Electrical Utilities (EU), Water and Sewer Utilities (W&SU), B Reactor, Roads and Grounds, Biological Controls, Real Estate Services (RES), and Compliance & Risk Mitigation/Operations Communications. PW's goal is to provide cost-effective and timely services that are centered on customer needs in support of the Hanford environmental cleanup objectives.

KEY ACCOMPLISHMENTS

Light-Emitting Diode (LED) Street Lights Installed at Central Plateau – EU personnel continued work on various Central Plateau lighting upgrades. In some locations, past projects removed old regulated output lighting circuits, and per code, they could not be reinstalled. As these older perimeter lighting systems are being eliminated, EU is looking to install more energy-efficient LED lighting. LED pole lights are brighter, use less energy, produce less waste, and operate longer than fixtures with low-pressure or high-pressure sodium lamps.



Lighting upgrades include installation of energy efficient LED lights

Rightsizing Transformer and Installs Protective Equipment – EU Lineman, Substation Electricians, and Meter-Relay Technicians recently right-sized a padmount transformer serving several 200 Area facilities. A fiberglass crossarm and bird-guard primary components were also installed so that the operator is not exposed to live parts, consistent with EU's continued attempts to enhance system reliability. The original transformer was a 500kVA live-front and was changed out with a smaller and safer 300kVA dead-front



Changing out transformer

300 Area Field Visit – The 300 Area is significantly different from other transition areas due to the amount of infrastructure left in place and the interfaces with adjacent entities. On October 25, 2016, Long-Term Stewardship personnel conducted an initial field visit to the 300 Area to investigate items of interest and observe the general conditions of the area. The field visit was also used to prepare for the more formal site visit with Department of Energy (DOE), Richland Operations Office (RL) planned for November 2016.

Pole Removal to Assist Tank Farm Access Gate – EU continues to support Central Plateau contractors as they plan for future work. Lineman removed two power poles for Washington River Protection Solutions (WRPS) to prepare for installation of a new 241A Tank Farm access gate along Buffalo Street. WRPS needs long-length equipment to enter and exit the area, and the power poles were in the way. Originally, the poles were going to be moved, but after much planning, the span of wire was adequately supported and only removal was required.



Power poles removed to support cleanup efforts

Equipment Removal at Burial Grounds – On October 6, 2016, EU Lineman removed three pole-mounted transformers and two oil switches from the 200 Area Burial Grounds. The equipment had been abandoned for several years. Plans were developed to remove the oil-filled equipment mitigating negative cost and environmental impacts. The transformers and equipment were released to EU, with no removable contamination detected, and staged for disposal and excessing.



Abandoned transformers removed and excessed

Footprint Reductions – EU personnel continued footprint reductions as they removed three transformers from a recently de-energized 11-mile section of 13.8kV line. These three transformers once fed the 100F Reactor, 100F Meteorological Tower/Air Monitor, and Hanford Town Site’s Meteorological Tower/Air Monitor. Approximately eleven miles of power lines and 300 poles are proposed removals for FY 2017 footprint reductions.



Removing transformers from de-energized line

283W Chlorine Cylinder Replacement – Chlorine is used at the 283W Filter plant in the potable water process as a disinfectant in water that comes from the Columbia River. On October 14, 2016, Water and Sewer Utilities (W&SU) personnel and their chlorine serviceman successfully replaced one of the two chlorine cylinders located at 283W. This highly structured process takes place twice yearly to ensure potable water is available to the Hanford Site. As one cylinder runs down through use, another is delivered, installed, and placed into service.



Chlorine cylinder replacement

Fire Hydrant R15A Pressure Test – As the provider of raw and potable water to the central plateau, W&SU supplies the water needed to support fire suppression to the Hanford site. Recently, a raw water fire hydrant located near the 200E AZ tank farm was struck by a vehicle causing the hydrant to be isolated and taken out of service to determine any damage to the hydrant. On October 26, 2016, W&SU operators were able to perform a pressure test on the hydrant to ensure proper operation. The pressure test confirmed the hydrant was not damaged due to the impact, and the hydrant was returned to service.

Sanitary Water Line Cut and Cap Work – With demolition beginning at the Plutonium Finishing Plant (PFP), MSA W&SU operators are working with CH2M HILL Plateau Remediation Company (CHPRC) Maintenance personnel to cut and cap various lines going into the PFP Complex. W&SU will support a total of 13 cut and caps as CHPRC brings PFP to slab-on-grade. On October 26, 2016, the first cut and cap was successfully completed at the Plutonium Reclamation Facility (PRF). MSA’s Licensed Operators disinfected new parts that were added to the system and collected Bacti samples to ensure there was no impurities introduced into the system during the cut and cap. W&SU will continue to support the PFP demolition throughout the next year.

LOOK AHEAD

Nothing to report

MAJOR ISSUES

Nothing to report



SAFETY PERFORMANCE

During the month of October, there were no Occupational Safety and Health Administration Recordable injuries or First-Aid cases reported within PW.

BASELINE PERFORMANCE

Table PW-1. PW Cost/Schedule Performance (dollars in millions).

Fund Type	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
RL-0040 - Nuc. Fac. D&D - Remainder Hanf	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$5.9	\$5.9	\$6.3	\$0.0	(\$0.4)
RL-0041 - Nuc. Fac. D&D - RC Closure Proj	\$0.1	\$0.1	\$0.2	\$0.0	(\$0.1)	\$18.6	\$18.3	\$17.5	(\$0.3)	\$0.8
RL-0044 - B Reactor	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.1	\$0.0	(\$0.1)
RL-0100 - Richland Comm & Reg Supt	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.3	\$0.0	(\$0.3)
Site-Wide Services	\$2.0	\$2.0	\$2.8	\$0.0	(\$0.8)	\$255.0	\$255.0	\$298.8	\$0.0	(\$43.8)
Subtotal	\$2.1	\$2.1	\$3.0	\$0.0	(\$0.9)	\$279.5	\$279.2	\$323.0	(\$0.3)	(\$43.8)

ACWP = Actual Cost of Work Performed
 BCWP = Budgeted Cost of Work Performed
 BCWS = Budgeted Cost of Work Scheduled

CV = Cost Variance
 CTD = Contract-to-Date
 SV = Schedule Variance

BASELINE PERFORMANCE VARIANCE

Note: Reliability Projects have moved to Site Services & Interface Management and are no longer reported under Public Works.

Current Month (CM) Schedule Variance (SV) – N/A

CM Cost Variance (CV) (-\$0.9M):

RL-41 CM CV (-\$0.1M) – B-Reactor Oversight, Services, and Tours have higher than planned costs in October because tours have now been extended into October & November each year.

SWS CM CV (-\$0.8M) – Increased staffing levels for maintenance activities were required to keep **3001.04.04 W&SU** (-\$0.5M), and **3001.04.03 EU** (-\$0.4M) operational; the result is a negative CM CV. These systems have degraded across the site due to age. W&SU and EU are a part of the Enhanced Maintenance Program, and have compliance

issues that have increased the cost to the program. Costs associated with system degradation have caused W&SU and EU to be significantly divergent from the baseline. Additional SWS variances exist in **3001.02.05 Waste Sampling and Characterization Facility Analytical Services (Readiness to Serve)** (+\$0.1M); **Long-Term Stewardship** (-\$0.1M); and **Condition Assessment Surveys** (+\$0.1M).

Contract-to-Date (CTD) SV (-\$0.3M) is within threshold.

CTD CV (-\$43.8M) – Variances exist in RL-40, RL-44, and RL-100 that are individually below threshold. Key drivers to the remaining CTD CV in other areas:

RL-41 CTD CV (+\$0.8M) – The B Reactor CTD CV results from a labor underrun due to lower than planned labor and subcontract support.

SWS CTD CV (-\$43.8M) Variances included:

3001.04.03.01 EU is significantly divergent from the baseline. The CTD CV (-\$22.0M) is primarily due to repairs relating to an aging infrastructure and upgraded staffing requirements. In addition, more material procurements were made due to new requirements that were not included in the baseline. These new requirements included the disposal of Power/Telecommunications lines to the Environmental Restoration Disposal Facility, a trailer mounted load center, bushings to replace the A-9 Transformer (needed for an unplanned outage), spare parts from a vendor who went out of business, an infrared camera, and an analyzer. In addition, the baseline was not adequate for a number of maintenance items that needed to be replaced due to the aging life of the infrastructure on the Hanford site. An Enhanced Maintenance Program has been established to better predict future system failures and Predictive Maintenance is replacing the Preventative Maintenance methodology. Expenditures will remain within approved funding and IIP scope.

3001.04.04 Water & Sewer Utilities – W&SU is significantly divergent from the baseline. The CTD (-\$31.2M) is principally due to extensive infrastructure repairs and implementation of the Preventive Maintenance Program. Also, staffing levels are currently higher than the baseline due to the maintenance activities required to maintain the water and sewer distribution system. The system has degraded across the site due to age. W&SU is also part of the Enhanced Maintenance Program, and has compliance issues that have increased the cost to the program. Expenditures will remain within approved funding and IIP scope.

Other significant SWS CTD variances related to being divergent from the baseline are tied to the 3001.02.05 Waste Sampling and Characterization Facility (+\$3.7M); 3001.04.01 Roads & Grounds (+\$1.9M); 3001.04.02 Biological Services (-\$1.0M); 3001.04.10.01



Sanitary Waste Management and Disposal (+\$1.1M); 3001.04.10.02 Laundry Services (-\$0.7M); 3001.04.10.03 Traffic Management (+\$1.1M); 3001.04.10.04 Site Infrastructure and Logistics Program Management (-\$1.5M); 3001.04.10.06 Public Works Program Planning Management, and Administration (-\$1.0M); 3001.04.14 Land and Facilities Management (+\$5.2M); and 3001.06.04 NEPA Natural Gas Pipeline (+\$0.6M).



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MISSION SUPPORT ALLIANCE

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Site Services & Interface Management

P.K. Brockman, Vice President

Monthly Performance Report October 2016



*Upgrades to
318 Lift Station in
Progress*





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INTRODUCTION

The Mission Support Alliance, LLC (MSA) and Site Services & Interface Management (SS&IM) function provides numerous services to support a broad base of customers performing their respective Hanford Site missions. SS&IM provides operations, support, and maintenance services within a culture of safety, customer service, and fiscal responsibility. SS&IM services include: Interface Management/Customer Service, Crane & Rigging, Fleet Services, Motor Carrier Services, Maintenance Services, and Projects/Strategic Planning. SS&IM's goal is to provide effective and timely services that are centered on customer needs in support of the Hanford environmental cleanup objectives.

KEY ACCOMPLISHMENTS

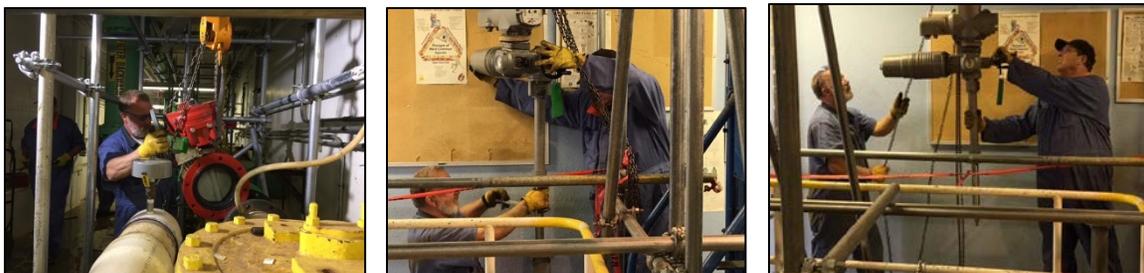
Upgrades to 318 Lift Station – On October 3, 2016, Maintenance Services, with support from MSA's Water Utilities, Crane & Rigging, Motor Carrier Services, and Safety & Health functions, began upgrades to the 318 Lift Station in the 300 Area. This was a high priority job for Water Utilities because it supports the eventual transfer of the system to Pacific Northwest National Laboratory (PNNL). Activities included removal of sewage pumps and piping, installation of the pumps and bases, installation of a tie-in between the new pumps and the existing discharge piping, setting and anchoring of the guide rails, and preparing the tank for the new lid.



Crews removed piping and installed pump/bases at the 318 Lift Station

Installation of Heating, Ventilation, and Air Conditioning (HVAC) Units – The Refrigerated Equipment Services group completed the replacement and installation of five new HVAC units on Mobile Office (MO)-407. Installation included the disconnection and removal of the old units, which were then replaced with modern equipment. Support was provided by Crane and Rigging and sheet metal workers, and was in support of Maintenance Services reutilization efforts to house the newly acquired Custodial Services staff coming from Washington River Protection Solutions (WRPS).

Nozzles Installed and Mechanical Installation Completed on 283W Filter Beds – During October, Maintenance Services workers, with support from MSA’s Water Utilities, Safety & Health, and Crane & Rigging staff, installed 10 trial nozzles into filter bed #4 at the 283W Water Plant and completed the mechanical installation for filter beds #3 and #4. Activities included replacement of the 8-inch butterfly valve on the pipe gallery elevation; removal and replacement of the 12-inch hydraulic gate valve; removal and replacement of the hydraulics and removal of grout; and installation of the stand, electric actuator, and stem assembly. The filter under the drain was cleaned and the floor hatch installed on the nozzle bed. On October 29, 2016, crews completed removal of the majority of media in filter bed #3, with the final cleaning of the filter bed completed on October 31, 2016. This was a high-priority project for Water Utilities because it allowed for the rebuilding of filter beds without significantly impacting operations.



Mechanical installation for filter beds #3 and #4



Final vacuuming of filter beds

Fiscal Year (FY) 2016 Infrastructure & Services Alignment Plan (ISAP) – Copies of the FY 2016 ISAP annual report (Contract Deliverable CD0003) were distributed to all major Site organizations beginning the week of October 3, 2016.

Support for WRPS’s Valve Replacement Project – In providing WRPS with the status of a valve replacement project (Project Z-186) on October 4, 2016, MSA Interface Management was able to facilitate critical communications between the MSA Project



Manager and the WRPS Operations Manager at the 242-A Evaporator. WRPS needs the valve replacement project completed by mid-December to avoid impacts to startup activities for the next 242-A Evaporator campaign, which is planned for early 2017.

LOOK AHEAD

Snow Removal Planning Meeting – MSA Interface Management was a key participant in the annual Snow Removal Planning meeting on October 11, 2016. The meeting was held to discuss MSA’s FY 2017 winter snow plan; update the emergency contact list; verify listed buildings under the Priority 1, 2, and 3 categories; and identify any open issues prior to the winter season. The group discussed CHPRC’s recently acquired facilities in the 300 Area which had been the responsibility of Washington Closure Hanford (WCH). Now that CHPRC has responsibility for the Environmental Restoration Disposal Facility (ERDF) and 618-10, the question was raised whether MSA will provide snow removal services for these locations. MSA will coordinate an upcoming meeting with CHPRC to discuss this request since WCH had previously self-performed these services and was direct funded by the U.S. Department of Energy (DOE) Richland Operations Office (RL) to do so.

222-S Laboratory Street Lighting – MSA Interface Management is working with WRPS in addressing street lighting and safety modification requests near the 222-S Laboratory. WRPS’s request is in support of an Employee Accident Prevention Council safety concern following reports of near-miss vehicle pedestrian incidents due to low light conditions. WRPS’s recommendations to MSA Electrical Utilities included changing the lighting on the south side of the 227-S Building to project onto the roadway, turning the pole-mounted light fixture in the southwest corner of the 2716-S Building, and replacing all remaining pole-mounted light fixtures on the north side of 10th Street for better illumination.

MAJOR ISSUES

None to report.

SAFETY PERFORMANCE

During the month of October, there were no Occupational Safety and Health Administration (OSHA) Recordable injuries reported within SS&IM. There were four minor first aid cases reported: an employee jammed a finger while performing work tasks, another employee felt knee pain while climbing stairs, an employee’s foot was struck by a falling object, and another employee experienced shoulder pain after



performing work. In addition, there was one non-injury vehicle accident reported, involving a minor bumper-to-bumper collision.

BASELINE PERFORMANCE

Table SS&IM-1. Site Services & Interface Management Cost/Schedule Performance (dollars in millions).

Fund Type	October 2016					Contract-to-Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
ORP-0014 - Rad Lqd Tk Wst Stab & Disp Ops	0.1	0.0	0.1	(0.1)	(0.1)	14.4	14.5	12.8	0.1	1.7
RL-0020 - Safeguards & Security	0.0	0.0	0.0	0.0	0.0	1.3	1.3	1.6	0.0	(0.3)
RL-0040 - Nuc Fac D&D - Remainder Hanford	1.1	0.9	0.5	(0.2)	0.4	56.2	55.7	58.4	(0.5)	(2.7)
Site-wide Services	\$0.2	\$0.2	\$0.2	\$0.0	\$0.0	\$39.9	\$39.9	\$43.8	\$0.0	(\$3.9)
Subtotal	\$1.4	\$1.1	\$0.8	(\$0.3)	\$0.3	\$111.8	\$111.4	\$116.6	(\$0.4)	(\$5.2)

ACWP = Actual Cost of Work Performed

CV = Cost Variance

BCWP = Budgeted Cost of Work Performed

CTD = Contract-to-Date

BCWS = Budgeted Cost of Work Scheduled

SV = Schedule Variance

Note: This cost and performance data reflects Site-Wide Services scope for SS&IM reported under the Performance Measurement Baseline (PMB). A large portion of the organization's monthly work scope and listed accomplishments are handled under the Non-PMB via the Usage Based Services (UBS) and Direct Labor Adder (DLA) funding sources. The final costs of these UBS and DLA pools reside with the end customer. Although the work scope and accomplishments listed are completed with the SS&IM labor force and management team.

BASELINE PERFORMANCE VARIANCE

Current Month (CM) Schedule Variance (SV) (-\$0.3M)

ORP-0014 CM SV (-\$0.1M) – Project L-780, 200E 13.8kV ED Sys Mods CM SV is due to taking early performance of post-construction final submittals and processing as-built drawings originally scheduled to be completed in October-December timeframe.

RL-0020 CM SV (\$0.0M) – The RL-0020 SV for October is within threshold.

RL-0040 CM SV (-\$0.2M) – Project L-840, 24in EW Line Replacement 2901Y - 200W CM SV is due to taking performance in a prior period on the excavation & installation of



pipe as well as the completion of tie-ins that was planned (baselined) in the current period. As a result, the prior period showed the project being ahead of schedule on these activities, but the current period shows a negative schedule variance.

Site-wide Services (SWS) CM SV (\$0.0M) – The SWS SV for October is within threshold.

Contract-to-Date (CTD) SV (-\$0.4M)

ORP-0014 CTD SV (+\$0.1M) – The variance is within threshold.

RL-0020 CTD SV (\$0.0M) – The RL-0020 CTD SV is within threshold.

RL-0040 CTD SV (-\$0.5M) – Project L-830, *Filter Plant Filter Control System Upgrade* CTD SV is due to engineering design completing behind schedule impacting successor activities, delays in material delivery of valves/actuators and control panels, and delays to work performance due to Filter Plant issues. Work planning and inefficiencies in construction has increased the variance. Also, Project L-894, *Raw Water Cross Connection Isolation 200E/W* CTD SV is due to the Planning and Studies task requiring a much smaller effort than anticipated.

SWS CTD SV (\$0.0M) – The SWS CTD SV is within threshold.

CM Cost Variance (CV) (+\$0.3M)

ORP-0014 CM CV (-\$0.1M) – Project L-780, *200E 13.8kV ED Sys Mods*, CM CV is due to accruals/actuals/reversals within the Architectural/Engineering, DGR Grant, and White Shield Contracts. In addition, limited labor charges associated with post-construction QA submittals, final waste transport to ERDF, work management package closeout and drawing conversion to MSA Engineering documents, impacted the CM CV.

RL-0020 CM CV (\$0.0M) – The RL-0020 SV for October is within threshold.

RL-0040 CM CV (+\$0.4M) – Project L-761, *Phase 2a Procure, Install, & Closeout*, CM CV is due to the construction mobilization being behind schedule, and a delay in procuring a mobile break trailer. RP management and studies accounts also experienced underruns in the CM.

Site-wide Services (SWS) CM CV (\$0.0M) – The SWS SV for October is within threshold.

CTD CV (-\$5.2M)

ORP-0014 CTD CV (+\$1.7M) – The Project L-858, *200E 13.8kV ED Dsgn & Bse Svc Ld Reconfig*, CTD CV is due to reduced cost, while taking advantage of preliminary



conceptual design activities completed earlier than planned. High quality conceptual design allowed for an abbreviated version of Definitive & Final Design allowing for early award of the Engineering Design Contract. Ecological and cultural reviews took much less effort than planned, because the construction is in a previously disturbed area, and fell under the Tank Farms Environmental Impact Statement. In addition, the construction subcontractor's bid came back significantly lower than planned (+\$1.2M). Variances for other ORP-14 projects total +\$0.5M, and are individually below threshold.

RL-0020 CTD CV (-\$0.3M) – The RL-0020 CTD SV is within threshold.

RL-0040 CTD CV (-\$2.7M) – The CTD CV is primarily due to several prior year Infrastructure Reliability Projects: Project L-691, *Construct Sewer Lagoon in 200W* (-\$3.0M); Project L-506, *Upgrade RTUs & SLAN – CE* (-\$1.4M); Project L-683, *251W Facility Mods for Dispatch Center* (-\$1.5M); Studies, Estimates, & Planning (-\$0.7M); Reliability Project Spares Inventory Change (-\$2.3M); Project ET-51, *HLAN Network Upgrade - Ph. 2* (-\$1.1M); Project L-713, *Records Storage Facility* (-\$2.2M); and Project ET60, *Enterprise Voiceover Internet Protocol (VoIP) Solution, Implementation* (-\$2.5M). These negative prior year CTD CV amounts are offset by the following current project positive CVs: 1) Project L-525, *24in Line Replacement from 2901Y to 200E*, is due to the award of the construction subcontract for significantly less than the initial estimate (+\$1.5M); and 2) Project L-840, *24in Line Replacement from 2901Y to 200W* due to modest cost savings from performing site clearing work for less than planned, and the fixed price construction contract awarded for significantly less than the baseline estimate. The significant construction cost savings is attributable to the contractor's expertise in this type of construction and significantly less difficult site conditions currently being encountered than was assumed when preparing the initial cost estimate (+\$1.6M). In addition, are the following prior year project positive CVs: Project L-449, *Mortar Line 12-in Water Line – Baltimore* (+\$0.9M); Project L-399, *T-Plant Potable & Raw Water Line* (+\$1.5M); Project L-677, *200E/W Raw Water Modifications* (+\$0.8M); Project L-311, *200W Raw Water Reservoir Refurbish* (+\$4.0M); Project L-742, *Rt3/Rt4S Turn Lane & Rt. 4S Turn-Outs* (+\$0.5M); Project L-753, *Maintenance Shelters for Crane & Rigging* (+\$1.1M); and Project L-712, *CCCF and Communications Upgrades* (+\$0.7M).

SWS CTD CV (-\$3.9M) – The SWS CTD CV is due to the deltas between the contract baseline and the approved and funded integrated infrastructure planning of items for MSA FY 2013 – FY 2016 work scope. These items include increased support required for Interface Management including the Service Catalog scope and additional support from others (e.g., Safety Staff, Environmental Personnel, etc.) in the Project Management Account.

MISSION SUPPORT ALLIANCE

"WE WILL MEASURE OUR SUCCESS BY OUR CUSTOMERS' SUCCESS"



Training & Conduct of Operations

Steve Metzger, Vice President

Monthly Performance Report

October 2016



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INTRODUCTION

The Mission Support Alliance LLC (MSA) Training and Conduct of Operations (T&CO) organization is responsible for the management of MSA training activities, programmatic implementation of the Conduct of Operations (CONOPS) principles, and management of the Volpentest Hazardous Materials Management and Emergency Response (HAMMER) Federal Training Center.

The MSA Central Training function is responsible for implementing a training management system to meet the technical, organizational, and professional development training requirements of personnel. This function also meets training related regulations and directives specified in the Mission Support Contract with the U.S. Department of Energy (DOE).

CONOPS evaluates MSA organization processes and procedures for appropriate implementation of DOE Order 422.1, CONOPS Elements and Requirements. This function also assesses and verifies implementation of CONOPS at MSA-managed projects and facilities.

The MSA Maintenance Management program provides reliable and cost-effective infrastructure and site services integral and necessary to accomplish the Hanford Site environmental clean-up mission. This service includes the MSA core value of creating a culture of safe and secure operations through the maintenance of Hanford Site's infrastructure assets and services in accordance with DOE O 430.1B, Chg. 2, *Real Property Asset Management*, and CRD O 430.1b, Chg. 1 (Supplemental Rev. 1). These MSA core values are met by applying availability, reliability and maintainability principles and practices to both the plant upgrade and Operation and Maintenance (O&M) Program phases of Hanford Infrastructure Assets.

MSA Work Management program incorporates the principles of Integrated Safety Management and Environmental Management System at the activity level through the development and use of technical Work Documents (WDs).

HAMMER and Hanford Training provide facilities, training curriculum and training delivery services to Federal, contractor, and sub-contractor employees in support of the Hanford Site, Pacific Northwest National Laboratory and other DOE missions. The organization provides efficient, performance-based training programs and maintains HAMMER in a "ready-to-serve" capacity as the primary training facility for the Hanford Site.

Additionally, HAMMER and Hanford Training provide national and regional assets and services to other local, state and national needs in areas such as disaster recovery,

emergency response, transportation, fire protection, law enforcement and military readiness.

KEY ACCOMPLISHMENTS

HAMMER Support to DOE After Hurricane Matthew — HAMMER supported DOE's Emergency Support Function #12 (ESF#12) Energy Response Team's response to Hurricane Matthew. On Tuesday, October 4, 2016, HAMMER staff began deploying team members to FEMA response centers ahead of the storm to ensure readiness to assess the damage after landfall. ESF#12 team members were deployed to the National Response Coordination Center in Washington, D.C., Region IV Regional Response Coordination Center (RRCC) in Atlanta, Georgia, and Region III RRCC in Philadelphia. Additionally, responders were sent to assist energy restoration in the Emergency Operations Centers in Florida, Georgia, North Carolina, and South Carolina.



Region IV response coordination center in Atlanta, Georgia

HAMMER Hosts 45th Steering Committee Meeting — Eric Dean, General President, International Association of Bridge, Structural, Ornamental and Reinforcing Iron Workers and Dan Stepano, General President, Operative Plasterers and Cement Masons, chaired the 45th HAMMER Steering Committee Meeting at HAMMER on October 27, 2016. The meeting focused on celebrating the Secretary's Best Practices, preparations for administration and contract changes, and the progress of the DOE Training Institute (DTI). The meeting was attended by members of the Steering Committee, as well as the following guest speakers: David Foster, Senior Advisor representing the Secretary of Energy; Glenn Podonsky, Director, Office of Enterprise Assessments; Joe Franco, RL Assistant Manager for Mission Support; Karen Boardman, Director, National Training Center; Mari-Jo Campagnone, Director, Office of Outreach and Analysis; and Jimmy Hart, President, Metal Trades Department, AFL-CIO. Natasha Campbell, Senior Advisor to the Secretary of Energy, was also present.

Lockout/Tagout Utilizes CONOPS Simulator Prop — In October, HAMMER's Lockout/Tagout (LOTO) team created several scenarios utilizing the CONOPS



Simulator (COS) as the main prop. The COS prop is a 3-dimensional system with a full suite of system drawings. It is unlike other current LOTO props which are mounted on portable boards offering only a 2-dimensional scenario. To coordinate a pilot class, the changes will be presented to the Site-Wide LOTO Committee on November 9, 2016. The change will be implemented once it is approved by the LOTO Committee, and the LOTO instructors have been briefed. The usage of the COS will create a more challenging evaluation process for students completing the Controlling Organization refresher training.

Radiological Safety Training Aptitude Tests for – On Thursday, October 20, 2016, HAMMER’s Radiological Safety Training conducted over 100 aptitude tests for candidates who applied for the Health Physics Technician trainee program requested by Washington River Protection Solutions (WRPS). Testing continued the week of October 24, 2016, with approximately 200 tests being administered over a two week span.

Division of Technical Information (DTI) Training Certification – On October 10-13, 2016, HAMMER staff traveled to Pittsburg, Pennsylvania to the United Steelworkers (USW) headquarters. The trip was necessary to review the Tony Mazzocchi Training Center application for Hazardous Waste Operations and Emergency Response (HAZWOPER) reciprocity. USW representatives met with HAMMER and RL staff to showcase their facilities, review course materials and attain final approval for course reciprocity. USW completed DTI certification for HAZWOPER training through the National Institute of Environmental Health Sciences Worker Training grant funded by DOE Environmental Management.

In October, DTI also expanded reciprocity by establishing processes to evaluate Labor apprentice and journey safety training which was successfully piloted. Iron Workers achieved certification for two courses with six additional courses to be completed in November. These courses allow Iron Workers to demonstrate to DOE contractors that they have completed the DTI certified fundamental training which will reduce redundant training and improve worker integration into the actual job or project.

Central Training Baseline Evaluations – In an effort to review training programs for all MSA Central organizations, MSA Central Training is performing baseline evaluations. The evaluations are looking at current coordinator duties, training plans, training products, and to gather issues/concerns in an effort to better provide services to MSA organizations outside of HAMMER. MSA Central Training has performed 35 Initial Training Evaluations.



LOOK AHEAD

Training Programs Migration — MSA Central Training is in the process of taking over several programs currently conducted by HAMMER. Work Management, Job Hazard Analyses (JHA), and the Field Work Supervisor (FWS) programs will migrate to the central training organization over the next few months. The MSA Central Training instructors are attending classes, and will begin team teaching before making the transition in the months ahead.

HAMMER Supports Equipment Trials — HAMMER's Respiratory Protection Program is coordinating the WRPS Self-Contained Breathing Apparatus (SCBA) equipment trial which will be held at HAMMER in late November and early December. The equipment trial has been designed to test the use and applicability of four new SCBA units. Each SCBA unit has features that are different from the SCBA equipment currently used on the Hanford Site, including advanced electronics, weight reduction, battery packs, and variable-fit packs. A hands-on vendor show was held at HAMMER in August 2016, which allowed the workers to try on the equipment and have additional conversations with vendor representatives. HAMMER is working with WRPS and the vendors to ensure the equipment is safely handled during the trials.

Other upcoming Activities –

- Work Management will be issuing the revised Work Management procedure on November 16, 2016.
- Maintenance Management will be revising milestones for FY 2017 following input and concurrence with DOE.
- Formality of Operations mentors will be conducting an effectiveness review of Electrical Utilities CONOPS implementation during the first quarter of FY 2017.

MAJOR ISSUES

None to report.

SAFETY PERFORMANCE

There were no Occupational Safety and Health Administration (OSHA) injury cases reported by T&CO during October.



BASELINE PERFORMANCE

Table T&CO-1. T&CO Cost/Schedule Performance (dollars in millions).

Fund Type	October 2016					Contract to Date				
	BCWS	BCWP	ACWP	SV	CV	BCWS	BCWP	ACWP	SV	CV
RL-0040 - Nuc. Fac. D&D - Remainder Hanford	\$0.2	\$0.2	\$0.4	\$0.0	(\$0.2)	\$44.0	\$44.0	\$51.6	\$0.0	(\$7.6)
Site-Wide Services	\$0.2	\$0.2	\$0.3	\$0.0	(\$0.1)	\$16.2	\$16.2	\$19.6	\$0.0	(\$3.4)
Subtotal	\$0.4	\$0.4	\$0.7	\$0.0	(\$0.3)	\$60.2	\$60.2	\$71.2	\$0.0	(\$11.0)

ACWP = Actual Cost of Work Performed

BCWP = Budgeted Cost of Work Performed

BCWS = Budgeted Cost of Work Scheduled

CV = Cost Variance

CTD = Contract-to-Date

SV = Schedule Variance

BASELINE PERFORMANCE VARIANCE

RL-40 – (WBS 3001.01.04)

Current Month (CM) Cost Variance (CV) (-\$0.2M) – The unfavorable CM CV is similar to the detail listed in the CTD CV explanation. The assumption that less DOE Office of Environmental Management (EM) funding would be required because HAMMER could self-fund itself by performing enough services for non-Hanford entities has not occurred. As a result, the monthly EM budget will remain lower than the EM funds authorized. Because of this divergent situation, a negative cost variance occurs monthly. Services delivered at HAMMER will not be adversely affected because the services are executed consistent with the approved Integrated Investment Portfolio (IIP) scope.

Contract-to-Date (CTD) CV (-\$7.6M) – The unfavorable CTD CV is largely due to the assumption that less DOE Office of EM funding would be required because HAMMER could self-fund itself by performing enough services for non-Hanford entities. This assumption has not occurred. As a result of this inaccurate assumption, the EM budget will remain lower than the EM funds authorized. Because of this divergent situation, the contract-to-date cost variance will continue to increase. Services delivered at HAMMER will not be adversely affected because the services are executed consistent with the approved IIP scope. No other potential contributing performance issues are currently identified.

Site Wide Services (SWS) (WBS 3001.04.10.08)

Current Month CV (-\$0.1M) – Current CV is due to the approved funding and IIP scope being divergent from the baseline in the Work Management Accounts within



T&CO. The variance will continue and expenditures will be in accordance with approved funding and IIP scope.

Contract-to-Date CV (-\$3.4M) – Contract-to-Date CV is due to the approved funding and IIP scope being divergent from the baseline in the Work Management Accounts within T&CO. The variance will continue and expenditures will be in accordance with approved funding and IIP scope.