Project Name: EDCA Workforce Development KPI Software Project ID: DE9197KP

Department: Economic	c Development	& Community	ty Division: Workforce Development								
Affairs	-										
Project Sponsor: Jenn Llewellyn	ifer	Date Reques	ted: 3/16/18	PM Customer No. 197							
Request Type:	New Develo	<u>pment</u>	Enhanceme	nt Cu	stomer Support						
Planned System Maintenance or Upgrade											
IT Team Name: eGove	rnment		IT Team No: E								
Project Manager/Leade	r: Sherry Yagi	ela									
Account 95670 Number:	Account Description:		Development	Customer Name:	Workforce Development						
Grant Funded? Yes	<u>No</u>	N	landate?	Yes	<u>No</u>						
		N	landate Source:								

### Project Goal

To implement a configurable case management and analytics system so that the system can provide a comprehensive view of all participants, manage employer relationships, and demonstrate program achievements to funders and communities.

## **Business Objective**

Identification and implementation of the most efficient case management software that will provide the following information:

- Employment indicators
- Education indicators
- Allocation efficiency
- Participation engagement
- Employer engagement
- Staffing efficiency
- Cost management
- WIOA engagement and efficiency
- PATH engagement and efficiency
- Wagner-Peyser engagement

#### **Major Deliverables**

- Project Schedule
- RFP Document
- Vendor Selection Criteria Matrix
- Vendor Selection Decision Document

Project Name: EDCA Workforce Development KPI Software Project ID: DE9197KP

- Vendor Statement of Work
- Vendor Approved Contract
- Coordinate implementation with vendor

#### **Approach**

- Develop detailed project schedule
- Develop the RFP document
- Coordinate and review of vendor responses
- Define the vendor selection criteria
- Coordinate and attend vendor demonstrations
- Identify hardware requirements
- Conduct Technical Reviews of the final vendors with Oakland County
- Participate in vendor selection
- Draft the Statement of Work
- Assist Corp Council with vendor contract negotiation
- Coordination with vendor on all implementations at Michigan Works! locations

## Research & Analysis

Gartner Research Recommendation; none at this time

#### **Benefits**

See Return on Investment (ROI) Analysis Document

## <u>Impact</u>

**Number of Users** 8 Michigan Works! Locations – all located within Southeast

Michigan

**Divisions** Planning & Economic Development

Leadership Groups Finance/Admin

## Risk

**Business Environment** Medium: Project will require some changes to existing business

processes

Project Name: EDCA Workforce Development KPI Software Project ID: DE9197KP

**Technical Environment** Low: Previously implemented technologies with new aspects

and/or new requirements.

## **Assumptions**

**Staffing** IT Staffing: resources will be available for the hours indicated per the attached

project plan.

Other Staffing: additional staffing will be available as follows:

Role: Name Hours per Day

Project Sponsor: Jennifer Llewellyn As Needed

#### **Facilities**

 Michigan Works! Locations in Southeast Michigan and Workforce Development administration.

#### **Technical**

- Systems need to be compatible with workforce agencies, community colleges, and social services agencies.
- Michigan Works! locations will supply/maintain their own software/ hardware and licensing. Either PC or touch screen device such as tablet or iPad.

#### **Funding**

Workforce development grant funding

#### Other

None

#### **Priority**

TBD

## **Constraints**

Availability of hardware at Michigan Works! locations

Project Name: EDCA Workforce Development KPI Software Project ID: DE9197KP

## **Exclusions**

• None at this time

Project Name: EDCA Workforce Development KPI Software Project ID: DE9197KP

#### **PROJECT PHASE AUTHORIZATION**

Phase(s): All							
Total Estimated Application Services	Hours: 776						
Total Estimated Technical Systems	Hours:						
Total Estimated CLEMIS	Hours:						
Total Estimated Internal Services	Hours:						
IT Application Services Division Manager Approval:		Date:					
IT Technical Systems Division Manager Approval:		Date:					
IT CLEMIS Division Manager Approval:		Date:					
IT Internal Services Division Manager Approval:		Date:					
IT Management Approval:							
Approved: Yes No		Date:					
Reason:							
Project Sponsor Approval:							
Title:		Date:					

#### **PROJECT SUMMARY**

Authorized Development (see above)	Hours: 776	
Preliminary Estimated Development for Future Phases	Hours:	
Grand Total Estimated Development	Hours: 776	Cost: \$128,040

Project Name: EDCA Workforce Development KPI Software Project ID: DE9197KP

#### PROJECT COMPLETION AUTHORIZATION

Customer Acceptance of Product:								
Title:	Date:							
Project Office Review:	Date:							

EDCA Workforce Development KPI Software - Size Estimate (+/- 10% to 50%)

1	Type	ID	Task Name	Estimated	Estimate Notes
2				Hours	
3	3	000000-0	PROJECT MANAGEMENT	194	
4	Phase	100000	DEFINE BUSINESS REQUIREMENTS	16	
5	Phase	200000	REQUEST FOR PROPOSAL	198	
6	Phase	300000-0	VENDOR SELECTION	69	
7	Phase	400000-0	CONTRACT NEGOTIATION	48	
8	Phase	500000	DESIGN SYSTEM ARCHITECTURE	64	
9	Phase	600000	DEVELOP APPLICATION	63	
10	Phase	700000	IMPLEMENTATION PHASE	103	
11	Phase	800000	POST-IMPLEMENTATION SUPPORT PHASE	21	
12	1		*	776	

Return on Investment Analysis

## **Project Summary**

Description	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Total
Benefits/Savings:							
Tangible Benefits Subtotal:	0	0	0	0	0	0	0
Cost Avoidance Subtotal:	214,800	214,800	214,800	214,800	214,800	214,800	1,288,800
Costs:							
Development Services Subtotal:	128,040	0	0	0	0	0	128,040
Hardware Subtotal:	0	0	0	0	0	0	0
Software Subtotal:	24,000	24,000	24,000	24,000	24,000	24,000	144,000
Infrastructure Subtotal	0	0	0	0	0	0	0
Training Subtotal:	0	0	0	0	0	0	0
Other Subtotal:	0	0	0	0	0	0	0
Annual Statistics:							
Annual Total Savings	214,800	214,800	214,800	214,800	214,800	214,800	1,288,800
Annual Total Costs	152,040	24,000	24,000	24,000	24,000	24,000	272,040
Annual Return on Investment	62,760	190,800	190,800	190,800	190,800	190,800	1,016,760
Annual Costs/Savings Ratio	70.78%	11.17%	11.17%	11.17%	11.17%	11.17%	1,010,700
Project Cumulative Statistics:							
Cumulative Total Savings	214,800	429,600	644,400	859,200	1,074,000	1,288,800	1,288,800
Cumulative Total Costs	152,040	176,040	200,040	224,040	248,040	272,040	272,040
	.02,0.0	,	200,010		,	,	
Cumulative Return on Investment	62,760	253,560	444,360	635,160	825,960	1,016,760	1,016,760
Cumulative Cost/Savings Ratio	70.78%	40.98%	31.04%	26.08%	23.09%	21.11%	21.11%
Year Positive Payback Achieved	Year 1						Year 1
State or Federal Mandate?							
Signatures:							
Benefits Reviewed By Project Sponsor				Date:			
Costs (including IT Resources) Reviewed By							
Information Technology Project Manager				Date:			
information recriniciogy r roject Manager				Date.			

Return on Investment Analysis

## Savings Detail

Benefit/Savings Description	Project Savings Category	Category/Funding Source	Unit Desc	Units	Rate per Unit	Total Savings	Annual Multiplier
Performance data would be calculated							
consistently across all stakeholders							
and provide clear indicators of results							
and impacts of services and costs.	Intangible Benefit						
Oakland County Michigan Works							
Offices would have data to help them							
measure and adjust where to put							
resources to improve programs and							
processes to better serve businesses							
and residents.							
						_	
	Intangible Benefit					0	
Elimination of manual data entry and	Cost Avoidance						
calculation. Estimated that staff at 8							
centers spend 2 hours a day working							
with data to provide the proper							
statistics. 261 working days per year @ \$50/hour for each staff member.			EA	4 476	50.00	200 000	
\$50/nour for each stall member.			EA	4,176	50.00	208,800	
Elimination of manual data entry and							
calculation by administrative staff							
(director) in the workforce development							
office. Estimated that spends 10 hours							
a month working with data to provide							
the proper statistics collecting data							
from each center. 12 months in per							
year * 10 hours @ \$50/hour.	Cost Avoidance		EA	120	50	6,000	
,			- ·	1.20	00	0,000	
						0	

Page 2 REV: January 22, 2018

Return on Investment Analysis

## Savings Detail

Project Savings Category	Y1	Y2	<b>Y</b> 3	.,,	ĺ							
				Y4	Y5	Y6	Y1	Y2	Y3	Y4	Y5	Y6
		İ	İ	İ	İ							
		İ	•	•	İ							
Intangible Benefit		<u> </u>	}	}								
		į	į	į	İ							
		•	į	į	İ							
		İ	į	į	į							
		-	ļ	ļ								
			ļ	ļ								
		į	į	į	İ							
		1	į	į								
•		<u> </u>										
Cost Avoidance		İ	•	•	İ							
		•	ŀ	ŀ	•							
			ļ	ļ								
		İ	į	į	İ							
		ĺ	ĺ	ĺ	İ							
	Х	Х	Х	Х	Х	Х	208,800.00	208,800.00	208,800.00	208,800.00	208,800.00	208,800
		į	į	į	İ							
		İ	į	į	İ							
		ĺ	ĺ	ĺ	İ							
		1	ŀ	ŀ	•							
			ļ	ļ								
Cost Avoidance	х	х	х	х	х	х	6,000.00	6,000.00	6,000.00	6,000.00	6,000.00	6,000
		į –			<u> </u>							
		<u> </u>	<u> </u>	<u> </u>	<u> </u>	<u> </u>						
		i	<u> </u>	<u> </u>		<u> </u>						
		Intangible Benefit Cost Avoidance	Intangible Benefit Cost Avoidance	Intangible Benefit Cost Avoidance  x x x	Intangible Benefit Cost Avoidance  x x x x	Intangible Benefit Cost Avoidance  x x x x x	Intangible Benefit Cost Avoidance  x x x x x x	Intangible Benefit Cost Avoidance  x x x x x x 208,800.00	Intangible Benefit Cost Avoidance  x x x x x x x 208,800.00 208,800.00	Intangible Benefit  Cost Avoidance  x x x x x x x 208,800.00 208,800.00 208,800.00	Intangible Benefit  Cost Avoidance  x x x x x x x 208,800.00 208,800.00 208,800.00 208,800.00	Intangible Benefit  Cost Avoidance  x x x x x x x 208,800.00 208,800.00 208,800.00 208,800.00 208,800.00

REV: January 22, 2018

Return on Investment Analysis

## Savings Summary

Benefit/Savings Description	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Total
Tangible Benefit:							
Tongible Denesite Cubtatel							
Tangible Benefits Subtotal:							
Cost Avoidance:							
Elimination of manual data entry and							
calculation. Estimated that staff at 8 centers							
spend 2 hours a day working with data to							
provide the proper statistics. 261 working							
days per year @ \$50/hour for each staff							
member.	208,800	208,800	208,800	208,800	208,800	208,800	1,252,800
Elimination of manual data entry and	6,000	6,000	6,000	6,000	6,000	6,000	36,000
calculation by administrative staff (director)							
in the workforce development office.							
Estimated that spends 10 hours a month working with data to provide the proper							
statistics collecting data from each center.							
12 months in per year * 10 hours @							
\$50/hour.							
<b>400</b> ///100							
Cost Avoidance Subtotal:	214,800	214,800	214,800	214,800	214,800	214,800	1,288,800
	,	,	,	,	,	,	,,
Intangible Benefit:							

3/16/18

Return on Investment Analysis

## Savings Summary

Benefit/Savings Description	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Total
Performance data would be calculated							
consistently across all stakeholders and							
provide clear indicators of results and							
impacts of services and costs.							
Oakland County Michigan Works Offices							
would have data to help them measure and adjust where to put resources to improve							
programs and processes to better serve							
businesses and residents.							
Savings Total:	214,800	214,800	214,800	214,800	214,800	214,800	1,288,800

Return on Investment Analysis

								Af	fect	s Pro	oiec	t RO	?
	Project Cost	Budget Category/Funding	Unit		Rate per		Annual				<i>-</i>		
Cost Description	Category	Source	Desc	Units	Unit	<b>Total Cost</b>	Multiplier	Y1	<b>Y2</b>	Y3	<b>Y4</b>	Y5	Y6
IT Hours - New Development	Development Svcs	Workforce development grant		776	165	128,040		Х					
		funding									ŀ	. !	
IT Hours - System Maintenance	Development Svcs				165	0					i	i	
IT Hours - Customer Support	Development Svcs				165	0							
IT Hours - Planned Maintenance	Development Svcs				165	0							
User Hours - New Development	Development Svcs					0							
User Hours - PTNE/OT	Development Svcs					0						i	
Contractor Professional Services	Development Svcs					0					i		
KPI Software Cost	Hardware		ANN	24,000	1	24,000		Х	Х	Х	Х	Х	х
PC System - Maintenance	Hardware				2,304	0							
Notebook - Acquisition	Hardware				1,223	0					Ī		
Notebook - Maintenance	Hardware				2,372	0					Ĭ		
Tablet Notebook - Acquisition	Hardware				2,012	0					į		
Tablet Notebook - Maintenance	Hardware					0					į		
Laserprinter - Acquisition	Hardware				1,432	0					ŀ		
Laserprinter - Maintenance	Hardware				1,104	0					į		
Image Workstations - Acquisition	Hardware					0							
Image Workstations - Maintenance	Hardware				3,496	0							
PC Maintenance User Owned	Hardware				2,304	0							
Printer Maintenance User Owned	Hardware				1,072	0							
File Space (100GB)	Hardware		ANN		173	0							
Internet Bandwidth per MB	Hardware		ANN		750	0							
Package Software - Acquisition	Software					0							
Package Software - Maintenance	Software					0							
Business Objects Access	Software					0					Ī		
Term Emulation SFTW-Acquisition	Software					0							
Term Emulation SFTW-Maintenance	Software					0							
Server - Acquisition/Upgrade	Infrastructure				8,000	0					Ī		
Server - Maintenance	Infrastructure				360	0							
Server Sftwre - Acquisition/Upgrade	Infrastructure				335	0					Î	i	
Server Sftwre - Maintenance	Infrastructure					0							
Server Rack Mount	Infrastructure				400	0					į		
Oracle Enterprise Per Processor -											į		
Includes Year 1 Maintenance	Infrastructure				21,372	0							

Return on Investment Analysis

								Af	ect	s Pro	iect	RO	?
	Project Cost	Budget Category/Funding	Unit		Rate per		Annual	- 1		- [	<u> </u>		
Cost Description	Category	Source	Desc	Units	Unit	<b>Total Cost</b>	Multiplier	Y1	Y2	Y3 '	<b>Y4</b>	Y5	Y6
Oracle Enterprise Per Processor - Year								1			T		
2 and Beyond	Infrastructure				3,432	0					- 1		
SQL Server Enterprise - Per Processor													
(4 cores) - Purchased Sept 2016-Aug											- 1	- 1	
2017 - Includes Maintenance thru Aug												į	
2019	Infrastructure				24,533	0		i			<u> </u>	<u>i</u>	
SQL Server Enterprise - Per Processor								i		i			
(4 cores) - Purchased Sept 2017-Aug									ļ	İ	- 1	İ	
2018 - Includes Maintenance thru Aug										İ	į	į	
2019	Infrastructure				20,759	0		į		į		<u>i</u>	
SQL Server Enterprise - Per Processor									ļ	İ	- 1	İ	
(4 cores) - Purchased Sept 2018-Aug											- 1		
2019 - Includes Maintenance thru Aug											- 1	- 1	
2019	Infrastructure				16,985	0		i		į	<u> </u>	i	
SQL Server Enterprise - Maintenance,								1	ļ	-		-	
Per Processor (4 cores) - Sept 2019											į	- 1	
and Beyond	Infrastructure				4,218	0		į		į		<u>i</u>	
SQL Server Standard - Per Processor									ļ	İ	- 1	İ	
(4 cores) - Purchased Sept 2016-Aug											- 1		
2017 - Includes Maintenance thru Aug											- 1	- 1	
2019	Infrastructure				6,398	0		İ		į	ı	į	
SQL Server Standard - Per Processor									ļ	ļ	- 1	ł	
(4 cores) - Purchased Sept 2017-Aug										į	- !	į	
2018 - Includes Maintenance thru Aug										İ	į	ı	
2019	Infrastructure				5,414	0		1		<u> </u>	<u> </u>		
SQL Server Standard - Per Processor											į	- 1	
(4 cores) - Purchased Sept 2018-Aug											- 1	- 1	
2019 - Includes Maintenance thru Aug											- 1	- 1	
2019	Infrastructure				4,429	0		į		ļ			
SQL Server - Standard Maintenance,								[	]		[	Ţ	
Per Processor (4 cores) - Sept 2019											- 1	İ	
and Beyond	Infrastructure				1,100	0		Li	i	i	i	i	
Websphere Basic Per Processor											Ţ		
Single/Dual Core - Includes Year 1											-	į	
Maintenance	Infrastructure				3,506	0				į		i	

Return on Investment Analysis

							Affects Proj		ject	ROI?		
	Project Cost	Budget Category/Funding	Unit		Rate per		Annual	İ				
Cost Description	Category	Source	Desc	Units	Unit	Total Cost	Multiplier	Y1	Y2	Y3 `	۲4 ۱	/5 Y6
Websphere Basic Per Processor										į		1 1
	Infrastructure				701	0						
Websphere ND Per Processor												
Single/Dual Core - Includes Year 1										•	į	1
Maintenance	Infrastructure				13,180	0				į	į_	
Walantana ND Dan Danasana										İ		
Websphere ND Per Processor	l				0.005	0		ŀ	ļ	ł		
,	Infrastructure				2,635	0		ŀ		- !		_إ
SSL Certificate	Infrastructure				845	0		l i			_ į	
Internet Access	Infrastructure				180	0				i	<u>i</u> _	_i
Imperva Web Application Firewall						_			ļ	- 1	- 1	
	Infrastructure		ANN		500	0		į			- !	
App Code Directories on Consolidated										•	į	
IIS Server (Virtual)	Infrastructure		ANN		415	0		ļ		i	i_	
Database (5 GB) on Consolidated SQL								li	ĺ		- 1	
	Infrastructure		ANN		930	0		ļ				ļ
Database Instance (125 GB DB) on										- !		
Consolidated SQL Server	Infrastructure		ANN		2,395	0		i		- 1		
Database SQL Maint Server	Infrastructure		ANN		834	0					į	
Database SQL Server Physical	Infrastructure		ANN		19,158	0			ļ			
DB Maintenance (Annual Cycle \$610)	Infrastructure		ANN		610	0						
DB Maintenance (Semi-Annual Cycle										•	į	
\$1220)	Infrastructure		ANN		1,220	0						
DB Maintenance (Semi-Annual Cycle									ļ		-	
\$2440)	Infrastructure		ANN		2,440	0						
Dedicated Virtual Server	Infrastructure		ANN		4,150	0		į	j			
DB Instance Setup	Infrastructure				976	0		i	ĺ	1	- [	
DBA MS SQL Database Creation on								i	į	- 1	- 1	
Exisitng Instance	Infrastructure				366	0						
Extra Small - 2 Core 8GB RAM, 500GB										İ		
Drive, 10 GB NIC - Cloud/Virtual = \$601									ļ			
On Premise Physical Server = N/A	Infrastructure		ANN			0						

Return on Investment Analysis

								Af	fect	s Pro	ject	t RO	?
Cost Description	Project Cost Category	Budget Category/Funding Source	Unit Desc	Units	Rate per Unit	Total Cost	Annual Multiplier	Y1	Y2	<b>Y</b> 3	<b>Y</b> 4	Y5	Y6
Small - 4 Core 16GB RAM, 500GB													
Drive, 10 GB NIC - Cloud/Virtual = \$951										į	į	į	
	Infrastructure		ANN			0				į	į	į	
Medium - 8 Core 32GB RAM, 500GB										Î	į	1	
Drive, 10 GB NIC - Cloud/Virtual =										İ	ĺ	İ	
\$1,702 On Premise Physical Server =										ļ	ŀ	ļ	
\$9,751	Infrastructure		ANN			0				į	ŀ	į	
Large - 16 Core 64GB RAM, 500GB											į		
Drive, 10 GB NIC - Cloud/Virtual =										į	į	į	
\$3,167 On Premise Physical Server =										İ	ŀ	İ	
* -, -	Infrastructure		ANN			0							
Extra Large - 40 Core 160GB RAM,										į	į	į	
500GB Drive, 10 GB NIC - Cloud/Virtual										İ	ŀ	İ	
= \$7,564 On Premise Physical Server =											į		
· · ·	Infrastructure		ANN			0					į		
Project Staff Training	Training					0				į	į	į	
User Training	Training					0					į		
											į		
											į		
										į	į	<u>i</u>	

Return on Investment Analysis

	Potential Cost Extensions								
	Project Cost		3.52	3.50	3.5.5		1.50		
Cost Description	Category	Y1	Y2	Y3	Y4	Y5	Y6		
IT Hours - New Development	Development Svcs	128,040.00							
IT Hours - System Maintenance	Development Svcs								
IT Hours - Customer Support	Development Svcs								
IT Hours - Planned Maintenance	Development Svcs								
User Hours - New Development	Development Svcs								
User Hours - PTNE/OT	Development Svcs								
Contractor Professional Services	Development Svcs								
KPI Software Cost	Hardware	24,000.00	24,000.00	24,000.00	24,000.00	24,000.00	24,000.00		
PC System - Maintenance	Hardware	24,000.00	24,000.00	24,000.00	24,000.00	24,000.00	24,000.00		
Notebook - Acquisition	Hardware								
Notebook - Acquisition  Notebook - Maintenance	Hardware								
Tablet Notebook - Acquisition	Hardware								
Tablet Notebook - Acquisition  Tablet Notebook - Maintenance	Hardware								
	Hardware								
Laserprinter - Acquisition	Hardware								
Laserprinter - Maintenance	Hardware								
Image Workstations - Acquisition									
Image Workstations - Maintenance	Hardware								
PC Maintenance User Owned	Hardware								
Printer Maintenance User Owned	Hardware								
File Space (100GB)	Hardware								
Internet Bandwidth per MB	Hardware								
Package Software - Acquisition	Software								
Package Software - Maintenance	Software								
Business Objects Access	Software								
Term Emulation SFTW-Acquisition	Software								
Term Emulation SFTW-Maintenance	Software								
Server - Acquisition/Upgrade	Infrastructure								
Server - Maintenance	Infrastructure	<b>_</b>							
Server Sftwre - Acquisition/Upgrade	Infrastructure								
Server Sftwre - Maintenance	Infrastructure								
Server Rack Mount	Infrastructure								
Oracle Enterprise Per Processor -									
Includes Year 1 Maintenance	Infrastructure								

Return on Investment Analysis

		Potential Cost Extensions									
Coat Decemention	Project Cost	Y1	Y2	Y3	Y4	Y5	Y6				
Cost Description	Category	TI	1 12	13	14	15	10				
Oracle Enterprise Per Processor - Year				į							
2 and Beyond	Infrastructure		<u> </u>	!	! ! !	! ! !	! !				
SQL Server Enterprise - Per Processor											
(4 cores) - Purchased Sept 2016-Aug			į				i !				
2017 - Includes Maintenance thru Aug											
2019	Infrastructure		ļ	İ	i ! !	i ! !					
SQL Server Enterprise - Per Processor			•		! ! !	! ! !	! ! !				
(4 cores) - Purchased Sept 2017-Aug											
2018 - Includes Maintenance thru Aug			į								
2019	Infrastructure		į								
SQL Server Enterprise - Per Processor			}		i ! !	i ! !					
(4 cores) - Purchased Sept 2018-Aug			}	•	! ! !	! ! !	! ! !				
2019 - Includes Maintenance thru Aug											
2019	Infrastructure										
SQL Server Enterprise - Maintenance,			!								
Per Processor (4 cores) - Sept 2019											
and Beyond	Infrastructure						! ! !				
SQL Server Standard - Per Processor											
(4 cores) - Purchased Sept 2016-Aug			•	İ							
2017 - Includes Maintenance thru Aug											
2019	Infrastructure				! ! !	! ! !	! ! !				
SQL Server Standard - Per Processor											
(4 cores) - Purchased Sept 2017-Aug											
2018 - Includes Maintenance thru Aug				İ							
2019	Infrastructure		•	•	]   	]   	! ! !				
SQL Server Standard - Per Processor											
(4 cores) - Purchased Sept 2018-Aug			•	İ							
2019 - Includes Maintenance thru Aug											
2019	Infrastructure		•		! ! !	! ! !	! ! !				
SQL Server - Standard Maintenance,			<del> </del>								
Per Processor (4 cores) - Sept 2019					İ	İ					
and Beyond	Infrastructure				i I	i I					
Websphere Basic Per Processor			1								
Single/Dual Core - Includes Year 1				į	i	i					
Maintenance	Infrastructure										

Return on Investment Analysis

	Project Cost Project Cost									
Cost Description	Project Cost Category	Y1	Y2	Y3	Y4	Y5	Y6			
			İ	! !	! !	I I I	l l			
Websphere Basic Per Processor										
	Infrastructure		į			į	į			
Websphere ND Per Processor			Ì			į	į			
Single/Dual Core - Includes Year 1						į				
Maintenance	Infrastructure			! !	! ! !	<u> </u>				
Websphere ND Per Processor			i i			i i	İ			
	Infrastructure									
SSL Certificate	Infrastructure		<u> </u>			!	<u> </u>			
Internet Access	Infrastructure		1			<u> </u>	1			
Imperva Web Application Firewall	minada adiard		1	<u> </u>	<u> </u>	1	<u> </u>			
(External Web Applications Only)	Infrastructure									
App Code Directories on Consolidated			1			<del> </del>	İ			
IIS Server (Virtual)	Infrastructure		!				-			
Database (5 GB) on Consolidated SQL			ļ	<u> </u>	<u> </u>		<u> </u>			
Instance Server	Infrastructure		İ	İ	İ	İ	į			
Database Instance (125 GB DB) on										
Consolidated SQL Server	Infrastructure		ĺ			į				
Database SQL Maint Server	Infrastructure		İ			İ				
Database SQL Server Physical	Infrastructure									
DB Maintenance (Annual Cycle \$610)	Infrastructure			:		1	i			
DB Maintenance (Semi-Annual Cycle			<u> </u>		!		i i			
\$1220)	Infrastructure		ļ			ļ	į			
DB Maintenance (Semi-Annual Cycle										
\$2440)	Infrastructure						!			
Dedicated Virtual Server	Infrastructure									
DB Instance Setup	Infrastructure									
DBA MS SQL Database Creation on						-				
Exisitng Instance	Infrastructure					 				
			!	!	!	!	•			
Extra Small - 2 Core 8GB RAM, 500GB				İ	İ	İ	İ			
Drive, 10 GB NIC - Cloud/Virtual = \$601			İ	į	į	Ì	Ì			
On Premise Physical Server = N/A	Infrastructure		<u> </u>	<u>!</u>	<u>!</u>	<u>!</u>	<u> </u>			

Return on Investment Analysis

	Duningt Onet	Potential Cost Extensions									
Cost Description	Project Cost Category	Y1	Y2	Y3	Y4	Y5	Y6				
Small 4 Care 16CB DAM 500CB											
Small - 4 Core 16GB RAM, 500GB											
Drive, 10 GB NIC - Cloud/Virtual = \$951		<b>=</b>									
· · · · · · · · · · · · · · · · · · ·	Infrastructure						i 				
Medium - 8 Core 32GB RAM, 500GB			•								
Drive, 10 GB NIC - Cloud/Virtual =			}	! ! !	! ! !	! ! !	! ! !				
\$1,702 On Premise Physical Server =			}	! ! !	! ! !	! ! !	! ! !				
¥ - , -	Infrastructure										
Large - 16 Core 64GB RAM, 500GB											
Drive, 10 GB NIC - Cloud/Virtual =			į								
\$3,167 On Premise Physical Server =			•								
\$10,446	Infrastructure										
Extra Large - 40 Core 160GB RAM,											
500GB Drive, 10 GB NIC - Cloud/Virtual			}	! ! !	! ! !	! ! !	! ! !				
= \$7,564 On Premise Physical Server =											
	Infrastructure										
Project Staff Training	Training										
User Training	Training		†			<u> </u>					
			1	<u></u>	<u> </u>	<u></u>	<u> </u>				
			<u>;</u> !	<u>.</u>	<u> </u>	<u>.</u>	<u>.</u>				

Return on Investment Analysis

## **Cost Summary**

Cost Description	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Total
Development Services:							
IT Hours - New Development	128,040						128,040
IT Hours - System Maintenance							
IT Hours - Customer Support							
IT Hours - Planned Maintenance							
User Hours - New Development							
User Hours - PTNE/OT							
Contractor Professional Services							
Development Services Subtotal:	128,040						128,040
Hardware:	·						,
Hardware Subtotal:							
Software:							
KPI Software Cost	24,000	24,000	24,000	24,000	24,000	24,000	144,000
Software Subtotal:	24,000	24,000	24,000	24,000	24,000	24,000	144,000
Infrastructure:	24,000	24,000	24,000	24,000	24,000	24,000	144,000
illiastructure.							
Infrastructure Subtotal							
Training:							
Training Subtotal:							
Other:							
Other Subtotal:							
Costs Total:	152,040	24,000	24,000	24,000	24,000	24,000	272,040

Return on Investment Analysis

#### Assumptions

Date	Assumption Description