



**State of Oklahoma
Office of Management and Enterprise
Services
Information Services Division**

Amendment of Solicitation

Date of Issuance: March 24, 2014 Solicitation No. 0900000124
 Requisition No. 0900002686 Amendment No. 2

Hours and date specified for receipt of offers is changed: No Yes, to: _____ CST/CDT

Pursuant to OAC 580:15-4-5©, this document shall serve as official notice of amendment to the Solicitation identified above. Such notice is being provided to all suppliers to which the original solicitation was sent. Suppliers submitting bids or quotations shall acknowledge receipt of this solicitation amendment prior to the hour and date specified in the solicitation as follows:

- (1) Sign and return a copy of this amendment with the solicitation response being submitted; or,
- (2) If the supplier has already submitted a response, this acknowledgement must be signed and returned prior to the solicitation deadline. All amendment acknowledgements submitted separately shall have the solicitation number and bid opening date printed clearly on the front of the envelope.

ISSUED BY AND RETURN TO:

Office of Management and Enterprise Services
 ISD Procurement Attn: 0900000124
 3115 N. Lincoln Blvd.
 Oklahoma City, OK 73105

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 Contracting Officer

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 E-Mail Address

Description of Amendment:

a. This is to incorporate the following:

Amendment 2 is issued to answer questions asked via the Wiki from 03/10/2014 – 04/03/2014:

1. Is there an incumbent or will this be considered new business?
a) No incumbent, this is considered new business.
2. Will the place of performance initially be only one location or various State government locations?
a) The place of performance for State agencies not explicitly excluded under 62 O.S. §,34.12 Part B will be through the Office of Management & Enterprise Services. All other entities, including affiliates and political sub-divisions of the State of Oklahoma will have the option to utilize Statewide shared resources through the Office of Management & Enterprise Services or statewide contracts through the OpenRange initiative.
3. Is your current video management system (VMS) Lenel?
a) Access Control Systems for physical building security are out of scope for this solicitation. This solicitation is only concerned with application, system, or data interconnectivity identity management. It is possible that an Identity Management System would be compatible or connectable through Industry recognized standards to a physical Access Management systems, but not required.
4. Who manufactures the current Access Control System for the target building?
a) Access Control Systems for physical building security are out of scope for this solicitation. This solicitation is only concerned with application, system, or data interconnectivity identity management. It is possible that an Identity Management System would be compatible or connectable through Industry recognized standards to a physical Access Management systems, but not required.
5. I see some 700k to 1M identities in the specs, could you provide some idea of how many disconnected data bases the proposed IdM system is to interface with?
a) Initially, the proposed IdM system is slated to connect with some 100-200 databases through multiple applications. The State of Oklahoma wishes to solicit bids that indicate a scalable solution with options and pricing for future growth.
6. Are there badging stations included in this bid, the solicitation kind of states that in the specs, but it was not very clear.



- a) **Access Control Systems for physical building security are out of scope for this solicitation. This solicitation is only concerned with application, system, or data interconnectivity identity management. It is possible that an Identity Management System would be compatible or connectable through industry recognized standards to a physical Access Management system, but not required.**
7. Ultimately, will the State wish to host the new IdM system, or own a run the system?
- a) **The solicitation is requesting pricing options for either State-entity Hosted options or Vendor (cloud-based) hosted options, or both, depending on availability.**
8. What was the compelling event which brought the State to this point of acquisition?
- a) **Ongoing changes to 62 O.S. §,34.12 and IT consolidation strategic direction.**
9. Our engineer is concerned this entire spec reads as if it is only concerned with information management identities (data systems). Please verify if there is a physical identity management aspect/need as well, or is the State only looking for a "single sign on" to identify access to data systems.
- a) **Access Control Systems for physical building security are out of scope for this solicitation. This solicitation is only concerned with application, system, or data interconnectivity identity management. It is possible that an Identity Management System would be compatible or connectable through industry recognized standards to a physical Access Management system, but not required.**
10. Please clarify what if any existing source(s) of student, parent, teacher, and Oklahoma employee identity information should be leveraged by the proposed IAM solution. What are the "trusted source" systems of identity information for students, parents, teachers, or employees?
- a) **A large component of the OpenRange initiative is expected to be Oklahoma School Districts. Therefore, there is mention in this solicitation of these types of entities as a potential federation or procurement partner for Identity Management. Districts, as an OpenRange partner, have at their option the ability to purchase off the resultant contract of this solicitation, and may want to implement federated IDs at the student level, as identified on a per-project basis. A State-level implementation of Education federated identity for the purposes of accessing state level data warehouses would include, at the outset, teachers, principals, superintendents, and other district and school level users, as well as State education employees. Parents and/or Students would follow. There are 512 school districts in the State and each would be required to be a source of an identity for such a system at the student level, but this deployment would be identified as a discrete project with clearly defined deliverables and a statement of work. For any potential connections to education-related systems, supplier should propose the connection to authoritative or trusted sources based on authentication industry standards. The state will identify these sources at either the State or school district level in cooperation with local education authorities.**
11. We did not detect requirements for registering and credentialing student/parent/school district staff identities.
- a) **A large component of the OpenRange initiative is expected to be Oklahoma School Districts. Therefore, there is mention in this solicitation of these types of entities as a potential federation or procurement partner for Identity Management. Authoritative sources of credentialed teachers, school district staff, students and parents exist and would be identified as part of a discrete project with clearly defined deliverables and a statement of work.**
12. Please clarify if: 1) the proposed IAM solution will leverage an existing enrollment/credentialing system; OR 2) bidders should provide recommendations to address this critical process.
- a) **For education related federated identity management, credentialing and enrollment systems exist at the state level. For student level data, federation already exists for the purposes of data warehousing of uniquely identifying students. Additional details for a deployment for education federated identity management would be identified as part of a discrete project with clearly defined deliverables and a statement of work.**
13. Provisioning/Identity Administration: For initial phase of the implementation, please clarify the target business applications/systems (Ex: PeopleSoft HCM, PeopleSoft Financials, Active Directory, Exchange, Databases, ERP, CRM etc...) that require role management and user provisioning functionality (Ex: Create / Modify / Delete/roles etc...) Are these systems controlled/maintained by the State? Are any of the in scope systems controlled/maintained by an external third party?
- a) **All sources are controlled by the State.**
14. Web Access Management (authentication/authorization): For initial phase of the implementation, please clarify the



target business applications/systems (Ex: Java, .NET, PeopleSoft, etc...) that require web access management functionality. Are these systems controlled / maintained by the State? Are any of the in scope systems controlled/maintained by an external third party?

a) All target business applications at the State level would be required to meet specifications to communicate with the IdM system, and could include, but not be limited to, third-party applications (including PeopleSoft or other back-office applications, third-party or internally managed line-of-business applications (including .Net, PHP, Java, etc.).

15. Directory Services: Please clarify what (if any) directory services are in scope for this initial implementation. Please describe what users (employees, students, parents, School district staff) reside within these respective directory services.

a) It is anticipated that LDAP compliant directory services will be in scope for most deployments. Other potential sources of users may communicate via SAML as a potential source.

16. C.2.2 Please provide more detailed explanation on "security level assignment, modification, and revocation"

a) The solution should be able to place a group or individual role based access profile. The profiles or individuals should be able to be created, modified, or revoked in an intuitive manner using the solution.

17. C 2.4.2.8 Is there an existing Native App for the state services? Is the new solution expected to be provide a mobile app as well? Reference also to C.4.3.2

a) There is no current solution in place.

18. C.3.2. Is the User Access Analysis component confined to IDM System only or other target systems as well? If there are other systems please specify.

a) As the primary access systems for systems within scope, providers may identify analysis tools that would track target systems as well.

19. C.4.3.4 of the RFP states 1 Million Concurrent users whereas the RFP for the solution is for 700 K Users. Please clarify if 1 Million users are total users for the state wide implementation? Also clarify the no. of concurrent users.

a) A potential initial implementation would need to support a minimum of 700k users

20. C.4.2 Are there user/identity attributes that need to be presented within the Identity and Access Management end user interface that requires "hashing". For example, present only the last 4 digits of a user's Social Security Number to a customer service agent/helpdesk.

a) Yes

21. C.4.4.6 Please clarify "demographic information". For example, reporting of user location/city/country? Please clarify "any other data". Specifically, should bidders assume the scope of reporting to just the proposed Identity and Access Management solution, or to additional Oklahoma IT systems as well?

a) Demographic information includes basic reportable personal data, including but not limited to geographic location, but also potentially including gender, location of birth, date of birth, and other personally identifiable information necessary for record linking and matching. Reporting on other systems would be considered "value-add".

22. C.4.7.10 Documentation/description is appreciated regarding the State's change control procedures.

a) The State has an internal process for change management. The process includes documenting the change, submission to a change group, review in a group of change impact, scope, purpose and benefits as well as the plan for fall back if the change creates undue impacts.

23. Does state require single data center High-availability and multi datacenter deployment disaster recovery? If so: 1) how many data centers; 2) should bidders assume high-availability and disaster recovery site configuration for the initial implementation phase?

a) The state has a primary site and offsite data centers, the ideal solution would support a fail-over environment.

24. C.4.2.8 Please clarify, which applications and authentication methods if multi-factor authentication is required for the initial implementation phase.

a) The ideal solution should present support for multi-application environments and as much flexibility and options for methods for multi-factor authentication.

25. Please clarify what if any existing source(s) of student, parent, teacher, and Oklahoma employee identity information should be leveraged by the proposed IAM solution.

a) District level access data sources for parents, teachers, and students could include local student



information systems and/or directory structures based on LDAP or other authoritative systems communicating via SAML (such as other federated identity management systems). Primary sources for Oklahoma employee identity information will be identified on a per project basis, but could include HR systems, and LDAP directory services systems.

26. How many non-production environments should bidders assume to support the IAM system application lifecycle/release process (ex: Dev., Test, Prod etc...). Do any of these non-production systems require single data center site high-availability?
- a) **At the State level, some current third-party systems are organized with a Test/Prod infrastructure. New implementations, primarily for custom development but also including some third-party systems will be organized in a 3-tiered Software Development Life Cycle. IdM solutions can expect to mirror this non-prod configuration and connect to applications in non-production environments to develop against and test against prior to release to production environments.**
27. Does state has virtualized infrastructure? Please provide state's hosted infrastructure technology?
- a) **The State of Oklahoma relies at least partially on a VMWare. For affiliates and political subdivisions, vendor should describe any virtualized infrastructure compatibility requirements or options.**
28. For a Vendor Hosted Solution, please mention if there are any constraints regarding State deployed applications or data center connectivity.
- a) **Vendor hosted solutions should insure comparable security, service level agreements, and latency to State hosted solutions.**
29. For system/server sizing estimates, beyond total number of users in the system, the main factor driving server CPU requirements is system usage. Any guidance regarding anticipated peak usage estimates is appreciated (e.g. anticipated logins per minute at peak usage times). Are there any unique events during the year where usage volumes are expected to be higher than normal? For example, a registration deadline may produce a usage spike in the days preceding the deadline.
- a) **To be identified on a per-project or deployment basis.**
30. During the submission of the RFP response, do we need to issue certificate of Insurance in favor of State of Oklahoma now, or can we submit if we are awarded. Usually we also submit a sample copy of the certificate of Insurance for reference, which is issued to other customers based on their Certificate of Insurance requirements
- a) **Per Section A.24: The Supplier shall maintain and promptly provide proof to the State of the following insurance coverage, and any renewals, additions or changes thereto, as long as the Supplier has any obligation under a Contract Document:**
- a. **Worker's Compensation and Employer's Liability Insurance in accordance with applicable law.**
 - b. **Commercial General Liability Insurance on a per occurrence basis with limits of liability not less than \$1,000,000 per occurrence and aggregate combined single limit, Personal Injury, Bodily Injury and Property Damage;**
 - c. **Automobile Liability Insurance with limits of liability of not less than \$1,000,000 per occurrence combined single limit including bodily injury and property damage and with coverage, if applicable, for all owned vehicles, all non-owned vehicles, and all hired vehicles;**
 - d. **Professional Errors and Omissions Insurance which shall include Consultant's Computer Errors and Omissions Coverage with limits not less than \$1,000,000 per claim and in the aggregate; and**
 - e. **Additional coverage required by the State in writing in connection with a particular Acquisition.**
31. Would OMES provide a 30day extension for responding to this procurement?
- a) **A 30 day extension is not acceptable; however the evaluation team has extended the solicitation closing date per Amendment 1. The new solicitation closing date and time will be 3:00PM Central Time May 1, 2014.**
32. Does the state already have a specific budget approved for this project? If so, is that information available?
- a) **This information is not available at this time.**
33. Does the state have a designated timeline for implementation of the chosen solution?
- a) **For state-level implementation, timelines will be identified on a per-project/per-engagement level based on pricing, entity buy-in, and strategic direction. For affiliates and political subdivisions, this will be identified by the affiliate or political sub-division on an individual basis.**



34. C.1. Overview – Does the State require the IdM system to have the capacity capable for multiple State Entities and the general public within scope of this solicitation for the initial implementation or does the State only require the ability to scale to that capacity with a follow-on project to extend to that capacity? If it will require capacity in the onset, how many users will need to be supported (700,000?) and how many federation partnerships will be needed?
- a) The state only requires the solution be scalable to the proposed numbers, not for an initial implementation.**
35. C.2.2. Provide a robust role management capability – How many endpoints does the state estimate requiring provisioning to?
- a) The state seeks a scalable solution that can accommodate additional capacity beyond an initial deployment.**
36. C.2.3. Provide a management solution – When referring to “management System” is the State referring to the Identity Management Systems it is seeking? We would like to verify that vendors can propose hosted solutions as well.
- a) The wording for management solution refers to the administration and configuration interface and does not preclude the offering of a hosted solution.**
37. C.2.6. Provide analytical capabilities – Does the State possess a Security Incident and Event Monitoring (SIEM) infrastructure that the vendor could integrate security logs into for trend analysis or shall the vendor provide the service with their responses?
- a) The state possesses the ability to log against APIs for QRadar and Symantec SIM systems. Suppliers are welcome to describe any other APIs they support.**
38. C.3.2. Analysis Component – In this section, when the word “system” is referenced, is the State referring to the new systems deployed by the vendor that perform the Identity Management functions outlined in this solicitation or does the analysis extend beyond the systems that the vendor is implementing?
- a) For C.3.2 and C.2.4, the term “System” is referring to an Identity Management solution that provides access to various user roles. The term system was intended to be an all-inclusive reference to all the functional aspects of the IdM platform. Suppliers are encouraged to identify if their solution logs and provides analysis of access into third-party applications or external systems connected as endpoints into the IdM solution.**
39. C.4.2.8. System should have the ability to enable multi-factor authentication inputs – Will the scope of this solicitation require integration with these multi-factor authentication inputs or does the State require that the system be extensible in nature to support integration, provided that there will be follow-on projects to integrate them? If this solicitation is to be scoped to provide the effort for these integrations, more details will be needed on each of these multi-factor authentication inputs, existing or new.
- a) Any built-in or pluggable multi-factor authentication inputs should be identified with adherence to industry recognized standards or provide partner or internal pricing for extensible modules.**
40. C.4.3.4. System should support access for a large number of users – Given the requirement to support 700,000 users and a minimum support for 1 million concurrent users, there seems to be a missing determination as to how many users of the system there will be. What volume of users should the vendors price the solution for?
- a) Vendors should provide tiered or per-user pricing if vendors license the solution in that manner. The numbers provided illustrate a potential maximum, between 700,000 to 1 million recorded in the system. Statewide deployment will be on an Entity and Project basis and will reference pricing for such rollouts.**
41. C.4.3.6. System should provide a method for a student to be associated to more than one district and or site – Could the State give the vendors an insight as to what the different personas of users there will be (e.g. students, state workers, contractors, business partners,...)? Will students be using federated IDs? How many estimated federation partners will there be?
- a) A large component of the OpenRange initiative is expected to be Oklahoma School Districts. Therefore, there is mention in this solicitation of these types of entities as a potential federation or procurement partner for Identity Management. Districts, as an OpenRange partner, have at their option the ability to purchase off the resultant contract of this solicitation, and may want to implement federated IDs at the student level, as identified on a per-project basis. A State-level implementation of Education federated identity for the purposes of accessing state level data warehouses would**



include, at the outset, teachers, principals, superintendents, and other district and school level users, as well as State education employees. Parents and/or Students would follow. There are 512 school districts in the State and each would be required to be a source of an identity for such a system, but this deployment would be identified as a discrete project with clearly defined deliverables and a statement of work.

42. C.4.5.2. System should allow users to set preferences for how items in a list are sorted or displayed – Could the State provide more details on what list is referred to in this requirement? List of users searched in the Identity Management system?
- a) **Any lists or grids in management interfaces should provide basic searching or sorting to meet basic usability needs.**
43. C.4.5.3. System should use data masks to assist with making sure information entered into a field is in the appropriate format – Is this for account creation input screens? (same for C.4.5.4.)
- a) **Yes, included but not limited to account creation input screens.**
44. C.4.6.2. System should allow for, but not require, electronic (wet e-Signatures) for all reports – Does the State have a “wet e-Signature” capability to integrate with or does the State require the vendors to cost out one for the State? Is the requirement to be able to save reports, from the Identity Management System proposed, in standard PDF format, so that the user can put an e-signature in it through their PDF software?
- a) **No current e-Signature capability exists for documents. If PDF formatted reports are downloadable and a signature can be added to that report that would satisfy this item, though suppliers may provide additional information at their option.**
45. C.4.6.3. System should include a means to create customizable terms of service agreement for Entity use – Is this at the user logon page of the Identity Management System?
- a) **At user login would be appropriate, but supplier should describe other options if they are available.**
46. C.4.7.12. Supplier should specify the approach to data migration activities, if applicable – Please provide details on the amount of records and the type of data to be migrated.
- a) **The number and types of records would be identified on a per-project basis, but could include uniquely identifying state-level IDs, as well as requirements for matching against non-authoritative IDs stored in disconnected systems based on established criteria for record linking and matching.**
47. General – How many agencies will be using this Identity Management, Access Management system initially?
- a) **Initially, the solutions chosen will be available to the State agencies, including the Office of Management & Enterprise Services, and all affiliates and political subdivisions through the OpenRange initiative. This will be a service-by-agency offering with initial deployments identified on a per-project basis.**
48. General – Is there a central identity user registry for these agencies?
- a) **OMES maintains centralized Active Directory (LDAP) and HR (Peoplesoft HCM) systems-of-record for the State as part of the process of IT consolidation. Other systems may be included as either authoritative or downstream depending on a per-project basis.**
49. General – If there is no central user registry, what are the user registries in each agency?
- a) **Affiliates and non-consolidated agencies would identify their central user registries on a per-project basis.**
50. General – For the requirement of managing roles or groups in the RFP, does each agency have its own roles and groups to be managed?
- a) **Some agencies or entities, affiliates, or political subdivisions may have external (public) users to manage, which may or may not be in scope in a per-project basis. Each agency or entity would need to identify requirements specific to their agency’s business needs for deployment on a per-project basis.**
51. General – How many authoritative user source (HR system) are there? If each agency has its own HR system, do we need to integrate with every HR system?
- a) **The state has a centralized authoritative HR user source that would most likely be identified as the authoritative source. However, affiliates and political sub-divisions have the option to manage their own HR system as an authoritative source.**
52. General – Does the Identity Management system need to provision into Unix? What are the different flavors of Unix?



- a) **Vendor should describe adherence to provisioning into industry-recognized Unix standards as an option.**
53. C.3.1.7. System should provide a method of incident escalation using notification based on an escalation process established in the business rules – Is the incident same as access threat? What kind of notification?
- a) **Incident notification and escalation through a defined API connecting into an established Security Incident and Event Management system (such as QRadar or Symantec SIM)**
54. C.3.1.16. System should provide detailed reports on real-time analysis – What types of view would you like to see in real-time analysis?
- a) **To be determined on a per-project basis.**
55. C.4.3.3. System, to include all web specific interfaces, applications, and services, should be fully compatible with mobile device operating systems (Android and iOS). Responsive design principles should be incorporated into all interfaces, applications, and services. – Is it from SSO perspective or IDM functions like approval of requests etc.?
- a) **Vendor should describe responsive design compatibility for either perspective.**
56. C.4.3.10. System should support mobility middleware for secure, remote access over wireless networks. – Can the state please provide an example of a use case so we can better understand what support we will need to provide?
- a) **An example use case would be integration into wi-fi authentication pages utilizing standards for directory services or authentication message passing.**
57. Pg, 22, C.4.2.8. System should have the ability to enable multi-factor authentication inputs such as: fingerprint biometrics, smartcards, smart tokens, proximity cards, PINs, and smart phone carried certificates. – Will the state require the contractor to capture fingerprints as part of an identity enrollment and associate those fingerprints with user's identities?
- a) **The configurability of a system to capture and associate fingerprints should be described if available.**
58. Pg, 22, C.4.2.8. System should have the ability to enable multi-factor authentication inputs such as: fingerprint biometrics, smartcards, smart tokens, proximity cards, PINs, and smart phone carried certificates. – Will the state require the contractor to manage smart cards and/or smart tokens that will be used in multi-factor authentication, from different State Entities?
- a) **Management of smart cards and or smart tokens is out of scope for this RFP. The IdM would merely need to integrate with systems that manage and administer smart cards or smart tokens.**
59. Pg, 22, C.4.2.8. System should have the ability to enable multi-factor authentication inputs such as: fingerprint biometrics, smartcards, smart tokens, proximity cards, PINs, and smart phone carried certificates. – What does the State plan to do with proximity cards? They are mostly used for physical access which is out of scope.
- a) **Currently there are no plans for proximity cards, however, the IdM system should be able to integrate with industry-standard compliant systems utilizing standard communication protocols.**
60. Pg 23, C.4.6.2. System should allow for, but not require, electronic (wet e-Signatures) for all reports. – Does the state plan to require digital signature certificates?
- a) **The state has the capacity to issue digital certificates through its provider and will do so for an implementation if necessary.**
61. Pg 24, C.5.2.1. Face-to-face at State sites – What is the anticipated number and location of sites expected to require face-to-face delivery?
- a) **At this time, example pricing is needed for any affiliates or State agencies electing to utilize the solution.**
62. C.6.1. Cost -The cost for the training should be broken out accordingly. The supplier should provide on-site staff training direct to staff or through train-the-trainer model. Training should include administrative training, in house user support training, and developer training – What is the anticipated number and location of sites expected to require on-site training
- a) **A state-level implementation would be on an agency-by-service deployment basis with pricing to be determined based on the number of users, and most likely to be housed in Oklahoma City for on-site training. Affiliates and political sub-divisions choosing to purchase training would need to coordinate with the State of Oklahoma IT Procurement**
63. General – How many concurrent users are internal Oklahoma state employees/contractors vs. external citizens/partners?



- a) **The state employs approximately 60,000 staff. Members of the public, users of affiliated systems, or other types of users would be identified on a per-project basis.**
64. General – What is the projected onboarding of users per month for the term of the deal?
a) **To be identified on a per-project deployment basis.**
65. General – Can you help us to better understand who will be involved in the Decision Making Process
a) **An evaluation team made up of OMES employees.**
66. General – Can you help us better understand your current and future governance model?
a) **Identity, access, and role governance will be specified on a per-agency or entity model and solutions will need to be flexible enough to support multiple entities with unique governance models.**
67. C.1. / General – Can you help us better understand your vision of how this “service to the State and Interlocal Entities” will work? Specifically are they already committed or mandated to use this service? Or can they opt-out?
a) **The award of a contract from this solicitation will result in a statewide contract which will be available for use as a procurement vehicle for State and Interlocal Entities. Certain State and Interlocal Entities are not mandated to use the statewide contract and may choose to not use it.**
68. What levels of USER concurrency is anticipated from the 700,000 quoted users?
a) **Unknown at this time, to be determined on a per-project basis. Suppliers are encouraged to propose scalable solutions.**
69. What level of security and monitoring would be suitable for this solution and the organization?
a) **The state has a primary site and offsite data centers, the ideal solution would support a fail-over environment. Proposal may indicate failover times, proposals for ideal configurations, and any items necessary to support business continuity and disaster recover planning.**
70. What level of resilience, HA active-active?
a) **The state has a primary site and offsite data centers, the ideal solution would support a fail-over environment. Proposal may indicate failover times, proposals for ideal configurations, and any items necessary to support business continuity and disaster recover planning.**
71. What applications/services do you want to deliver to users and administrators?
a) **Custom, third-party commercial off the shelf software (identified on a per-project basis and only in-scope if standards compliant and configurable), custom internally supported and developed software that can be made to be compliant with standards, and systems designed to be sources or management components, as identified on a per-project basis.**
72. What SLA’s are required around users?
a) **For a State level implementation, SLA’s for end-users are defined on the OMES Support Process pages under Incident and Problem Management at the following URL (http://www.ok.gov/cio/Customer_Portal/Support_Processes_%28ITIL%29/). However, Supplier’s SLA proposal should be the Service Level Agreements between OMES System Administrators and the supplier for system-level support post-implementation. For affiliates or political subdivisions, supplier should propose a baseline SLA for review as part of the statewide contract that will be reviewed by these affiliates or political subdivisions on a per-project basis.**
73. What level of analytics is expected?
a) **Tie-in to existing Security Incident & Event Monitoring platforms (Q-Radar and Symantec), as well as built-in reports of access frequency. Suppliers are encouraged to describe configurable**
74. Is a service desk required as part of the solution to provide an integrated platform?
a) **Supplier’s SLA proposal should be the Service Level Agreements between OMES System Administrators and the supplier for system-level support post-implementation. For affiliates or political subdivisions, supplier should propose a baseline SLA for review as part of the statewide contract that will be reviewed by these affiliates or political subdivisions on a per-project basis.**
75. What are the weightings for the full Evaluation process?
a) **Weights of the best value evaluation will not be given prior to award. Below is a definition of best value criteria:**
“Best value criteria” means evaluation criteria which may include, but is not limited to, the following:
a. the acquisition’s operational cost a state agency would incur,
b. the quality of the acquisition, or its technical competency,



- c. the reliability of the bidder's delivery and implementation schedules,
- d. the acquisition's facilitation of data transfer and systems integration,
- e. the acquisition's warranties and guarantees and the bidder's return policy,
- f. the bidder's financial stability,
- g. the acquisition's adherence to the state agency's planning documents and announced strategic program direction,
- h. the bidder's industry and program experience and record of successful past performance with acquisitions of similar scope and complexity,
- i. the anticipated acceptance by user groups, and
- j. the acquisition's use of proven development methodology, and innovative use of current technologies that lead to quality results;

76. To what applications is the solution to provide IdM and access control?

- a) **Custom, third-party commercial off the shelf software (identified on a per-project basis and only in-scope if standards compliant and configurable), custom internally supported and developed software that can be made to be compliant with standards, and systems designed to be sources or management components, as identified on a per-project basis.**

77. The following requirement seemed to be duplicated, should the duplicate be ignored or should there be a differentiator?

- a) C.3.1.7. and C.3.1.10.
- b) C.3.1.8. and C.3.1.12.
- c) C.3.1.9. and C.3.1.13.

- a) **These items are duplicated**

78. The requirement C.2.1 states initial support of 700,000 users but C.4.3.4 request support of 1 million concurrent users. As most systems will not normally have 100% utilization at any given time, and to accurately size the solution per requirement C.4.1.2.1, what will be the total number of users that the solution needs to support?

- a) **This will be identified on a per-project basis. The state seeks scalable solutions and pricing that can accommodate flexible numbers of concurrent users.**

79. For requirement C.2.4 and C.3.2.1, Is logging and analysis limited to just the proposed vendor's solution or should it encompass all systems and applications that an end user touches?

- a) **For C.3.2 and C.2.4, the term "System" is referring to an Identity Management solution that provides access to various user roles. The term system was intended to be an all-inclusive reference to all the functional aspects of the IdM platform. Suppliers are encouraged to identify if their solution logs and provides analysis of access into third-party applications or external systems connected as endpoints into the IdM solution.**

80. For requirement C.4.2.2, is the vendor to propose a Single Sign-on solution or will it need to integrate with the State's existing solution? If vendor is to propose an SSO solution also, what type of applications will be supported (Web and/or thick client)? If only web, what are the peak login rates per minute? If only web, what are the avg page sizes? If only web, what are the number of pages accessed per normal session?

- a) **If only web, what are the avg page sizes? If only web, what are the number of pages accessed per normal session? Vendor should propose a federated identity management and governance platform that incorporates a web-based SSO solution, however, configurability and compatibility with any existing SSO system can also be identified.**

81. For requirement C.4.5.2, does this mean that each end user should be able to customize their view in the vendor solution or is this a configuration option that allows the State to change the interface for all the OMES administrators?

- a) **Supplier should identify if either options are available in their proposed system.**

82. Can you provide a use case for SAML integration? a) **Use cases will be identified on a per-project basis.**

83. Scope of Work/Page 20 - Please clarify scope related to the RFP:

- i. How many applications will be part of Web SSO solution in the initial phase? **This will be identified on a per-project basis, but 50-60 applications could possibly be expected.**
- b) How many target applications are in scope for user account management for provisioning solution in the initial phase? a) **This will be identified on a per-project basis.**
- ii. Please confirm if Federation and Federated identities are in in scope. If Yes, how many Identity providers and



- service providers are in scope for the initial phase? **a) A state-level implementation of education federated identity for the purposes of accessing state-level data warehouses would include, at the outset, teachers, principals, superintendents, and other district and school level users, as well as state education employees. Parents and/or students would follow. There are 512 school districts in the state and each would be required to be a source of an identity for such a system, but this deployment would be identified as a discrete project with clearly defined deliverables and a statement of work.**
- iii. Which current IdM processes and tools are in scope for migration to the new IdM solution? For e.g., migration of existing users to a new directory platform. **a) This will be identified on a per-project basis.**
84. Scope of Work/Page 20 - Please clarify these few questions on growth of the new IdM platform over the next few years:
- i. How many agencies and users from agencies are planned to be on-boarded on the new IdM platform and what is OMES-ISD's overall multi-year timeline for this initiative? **To be identified on a per-project basis.**
- ii. How many applications are planned to be on-boarded for authentication/SSO functions and what is the overall timeline for application on-boarding? **a) An initial estimate would be approximately 50-60 applications in a single web framework as part of a pilot.**
- iii. What is expected incremental user population growth over next few years from the initial count of 700,000 provided in the Solicitation? **a) Unknown at this time, to be identified on a per-project basis.**
85. Scope of Work/Page 20 - Please clarify if any overall timeline has been established by OMES-ISD for this initiative. Is OMES-ISD targeting any specific project start date and project go-live dates for this new IdM initiative? **a) This will be identified on a per-project basis.**
86. Scope of Work/Page 20 - Please explain if OMES-ISD has any existing IAM or manual solution to manage identities and their access. **a) Currently, identities for State employees are managed through the internal HR and AD/LDAP environment on a manual basis with an internal process.**
87. Implementation/Page 23 - Please clarify if any existing user identity store(s) could be leveraged for authentication and authorization. How many and what type (AD, LDAP etc.) of user identity stores currently exist in OMES-ISD network? **a) OMES maintains centralized Active Directory (LDAP) and HR (Peoplesoft HCM) systems-of-record for the State as part of the process of IT consolidation. Other systems may be included as either authoritative or downstream depending on a per-project basis.**
88. Implementation/Page 23 - Please clarify if integration with OMES-ISD's Human Resource (HR) system such as SAP or People Soft is in scope for this Solicitation. If Yes, please specify type of HR system in use. **a) PeopleSoft HCM may be in-scope for a state-level implementation, to be identified on a per-project basis.**
89. Configurability/Page 24 - Does the OMES-ISD currently have enterprise roles defined? Does OMES-ISD envision an effort to define and create significant number of new roles? **a) State-level enterprise roles are not defined, but would be defined a per-project basis. Other non-State entities connecting into State systems will be identified on a per-project basis (this includes some potential mention of Education user types).**
90. Maintenance & Support/Page 25 - Please clarify following scope of service for Maintenance and Operations:
91. Is OMES-ISD expecting the selected vendor to provide an expected delivery model (e.g. 24X7, 16X5) for maintenance and support of the new IdM solution? **a) Supplier should identify pricing and options for any different or configurable delivery models for review.**
92. Help Desk/Page 25 - Does OMES-ISD currently have a ticketing system for incident management and user requests? Is supplier expected to bring in or propose a ticketing, or incident management system? **a) OMES-ISD offers a ticketing system for internal support. Supplier is expected to identify an internal support structure, point of contact, and issue tracking that is compatible with the State's SLA's and would allow for technical support by OMES-ISD staff and affiliate technical staff in the event of a failure. Suppliers may propose the exposure of a self-service and self-reporting ticketing system to technical staff at the State.**
93. Help Desk/Procedures/Page 26 - RFP requirement on Page 26 section C.8.3.14 appears to be incomplete; please clarify the requirement - "Escalation process for installation service dates and other commitments that are not met for and wireless services". **a) For any deployment to a cellular, wi-fi, or satellite based endpoint or access point, identify estimates or procedures necessary for project planning by the State to estimate project costs and time-frames.**
94. Compatibility Environment/Page 22 - Please provide details on what type of mobility middleware currently exists for Wireless access. **a) An example use case would be integration into wi-fi authentication pages utilizing standards for directory services or authentication message passing. Currently, minimal wi-fi middleware**



exists for authentication purposes.

95. How many operating environments are to be supported (eg. Development, Test, Staging, etc) for each of the identity and access management solutions? **a) At the State level, some current third-party systems are organized with a Test/Prod infrastructure. New implementations, primarily for custom development but also including some third-party systems will be organized in a 3-tiered Software Development Life Cycle. IdM solutions can expect to mirror this non-prod configuration and connect to applications in non-production environments to develop against and test against prior to release to production environments.**
96. What are your high availability requirements for each operating environment? **a) Supplier may propose HA configuration for production environments based off of “9’s” or sigma and appropriate pricing or configuration recommendations to match.**
97. What are your Disaster recovery requirements? **a) The state has a primary site and offsite data centers, the ideal solution would support a fail-over environment. Proposal may indicate failover times, proposals for ideal configurations, and any items necessary to support business continuity and disaster recovery planning.**
98. C.2.1 states: that “this system will be used statewide to serve over 700,000 users “. What kinds of persons will be included in the identity management database (employees, contractors, public, students, students’ parents, etc)? **a) All of the above, including educators, principals, district superintendents, state-level employees, etc. Other users to be identified on a per-project basis.**
99. How many authoritative sources of person data do you anticipate using to create person records? **a) K-12 Education federations would include 512 different school districts, a state level federation would include systems identified during project planning at the State level, other agencies would have their own federations, and affiliates may have different federations. All would be identified on a per-project basis.**
100. What is the current state of person data residing on the State of Oklahoma authoritative data sources that you anticipate using for your identity data feed? **a) Some data is available and necessary data elements would be identified on a per-project basis.**
101. How many what kinds of user accounts do you anticipate managing (Add, Modify, Delete, Suspend, etc)? What do you anticipate in terms of the number of instances/domains of each type of user account? **a) Types of user accounts and number of domains to be identified on a per-project basis.**
102. Will provisioning workflows involve primarily approvals, requests for additional user account data, and notifications, or will they involve more complex operations? **a) Supplier is encouraged to describe configurability of workflows. Workflow complexity may be identified a per-project basis depending on agency or affiliate security policies (e.g., public safety may be required to implement CJIS, whereas education may be required to implement FERPA, while both types of agencies may have additional restrictions based on other state statutes and policies).**
103. Will the integrator or State of Oklahoma be responsible for remediation of orphan accounts (user accounts that don’t map to persons)? **a) The State of Oklahoma would be responsible for mapping orphan accounts, assuming suppliers system allows for this as an administrative function.**
104. What types of self service functions will be required for persons, administrators, infrastructure owners, managers, and other person types? **a) All items listed in Section C.3 should be available for self-service functions.**
105. Section C.4.2.7. states: “System should retain user preferences even when a system update is completed. “. If the proposed solution uses a web browser interface/GUI, should we assume that you are referring to the application configurations and person data being preserved when the identity and access management software is updated? **a) Correct.**
106. Who will be responsible for the procurement and management of all digital certificates, both CA-registered and self-signed certificates? **a) For a State level implementation, OMES-ISD will be responsible. Non-state level will be on a per-project basis.**
107. Will State of Oklahoma act as a Federation Identity Provider (idP) or Service Provider (SP) or both? **a) Potentially both, but to be determined on a per-project basis.**
108. How many federations are required in responding to this RFP? Or is the intent to deploy the federated identity solution without configuring the federations themselves? **a) K-12 Education federations would include 512 different school districts, a state level federation would include systems identified during project planning at the State level, other agencies would have their own federations, and affiliates may have**



different federations. All would be identified on a per-project basis.

109. Will the integrator be responsible to managing the relationships and technical interchanges with federation partners? **a) No, the State of Oklahoma expects to manage ongoing relationships. Affiliates are unknown at this time, so suppliers are encouraged to bid an end-to-end solution.**
110. Are all federations to be SAML2.0 based? **a) Suppliers should identify which industry standards their solution is compatible with, including SAML2.0, which is known to be needed in some use cases. Other options will be identified on a per-project basis, but could possibly include OAuth, LDAP, and custom SOAP or REST based web services.**
111. Are all federations to be focused on web access single-sign on (SSO)? **a) Not necessarily, some may involve token passing through other systems, federation of LDAP-based directory services, or other options, although web access single-sign on is expected to be a significant component of some deployments to be identified on a per-project basis. Suppliers are encouraged to identify the configurability against industry standards of their solution.**
112. How may protected SSO web resources and types of web resources are to be designed and configured in response to this RFP? Or is the intent to deploy the web access control solution without configuring users and policies as part of this effort? **a) An initial effort may include 50-60 applications. Policies and federations will be identified on a per-project basis.**
113. Will acceptance testing be performed by the integrator or by State of Oklahoma personnel? **a) Ideally, acceptance testing would be a multi-pronged approach to be determined on a per-project basis.**
114. Please elaborate on the meaning of Entity Personnel. Are these individuals IT personnel that 'own' infrastructure integrated with the proposed security systems, agencies, or? **a) Entity Personnel at the State level would primarily indicate agency personnel that set policy and direction for IT staff through project planning processes. Implementation staff would include IT staff through the Office of Management and Enterprise Systems engaging a supplier. Affiliates may organize and manage their projects differently with IT staff integrated more closely with policy-makers.**
115. What degree of involvement will State of Oklahoma personnel be able to contribute to the requirements assessment, design, and deployment of the proposed IdM solution? **a) State of Oklahoma personnel will be expected to participate fully in requirements gathering and design of any system. Suppliers should propose or identify any other necessary services on a per-project basis with information on potential rates and high-level estimates as part of a response.**
116. Does the State of Oklahoma have experienced identity and access management personnel on staff that will be participating in the project? **a) Some expertise exists, however, the State seeks a supplier to provide an end-to-end solution with rigorous expertise as options for consideration.**
117. Is there a requirement to build a Role Engineering system which provides functionalities like Role Mining and Role Consolidation? **a) Supplier is encouraged to identify any capabilities within their system or additional functionality able to support these features as value-add.**
118. Should the Identity Management system have the capability to provide real-time and batch risk analytics to combat fraud and misuse across multiple channels of access? For example, tracking user behavior based on parameters like geographic location and source IP to implement additional constraints. **a) Yes, plus integration with standard SIEM tools such as Q-Radar or Symantec.**
119. Does the State currently have a Disaster Recovery infrastructure? **a) The state has a primary site and offsite data centers, the ideal solution would support a fail-over environment. Proposal may indicate failover times, proposals for ideal configurations, and any items necessary to support business continuity and disaster recovery planning.**
120. Does the State currently have any kind of IDM system? **a) No, this is new business. Some agencies and affiliates may have central repositories or single sign-on systems.**
121. Does the State use any kind of LDAP directory service? **a) OMES maintains centralized Active Directory (LDAP) and HR (Peoplesoft HCM) systems-of-record for the State as part of the process of IT consolidation. Other systems may be included as either authoritative or downstream depending on a per-project basis.**
122. For reporting, does the State expect to develop a web based reporting dashboard with access control on reports? **a) Does the State currently own a reporting tool? The State currently supports Oracle Business Intelligence Enterprise Edition. Out of the box compatibility with other reporting tools may be identified**



by supplier.

123. How many IDM environments does the State expect to be delivered by the implementer? **a) The State expects to implement a multi-award State contract that both the State of Oklahoma Office of Management & Enterprise Services, affiliates, and other entities may purchase off of. Any centralized statewide system would be selected from such an award, if identified as a necessity for a statewide project.**
124. What are some of the major systems that the State would like to integrate with the New IDM system? **a) PeopleSoft HCM, Active Directory/LDAP, and some initial agency-specific custom systems, including potentially education systems, to be identified on a per-project basis.**
125. What is the estimated number of systems for which automated provisioning should be done? **a) To be identified on a per-project basis.**
126. What is the estimated number of systems for Federation Integration? **a) An initial estimate would be approximately 50-60 applications in a single web framework as part of a pilot.**
127. Should the IDM system allow self-service functionality over the web? **a) Yes.**
128. How does the State currently do identity, access, password and role management for its students? Is it manual or is there a system in place? **a) There is currently no identity, access, password, and role management in place for student-level access to data.**
129. What applications have been enabled for Single Sign On? Are there any externally hosted applications which require SSO? **a) There are currently multiple systems that handle consolidated IDs within the State through various different means. Some externally hosted applications may require SSO but will be required to adhere to industry standards to be enabled for single sign-on.**
130. Are wet e-signatures currently being used at the State? **a) On a limited basis but not tracked as part of an identity management system, instead just stored for historical reference.**
131. Are finger biometrics and smart cards being planned to integrate with the IDM system? **a) Finger biometrics or smart cards could be one type of multi-factor authentication, however, this would have to be determined on a per-project basis.**
132. What type of mobile middleware exists for wireless devices? **a) An example use case would be integration into wi-fi authentication pages utilizing standards for directory services or authentication message passing. Currently, minimal wi-fi middleware exists for authentication purposes.**
133. What directory services are being used currently by the state? Which system manages the password for the users? **a) OMES maintains centralized Active Directory (LDAP) and HR (Peoplesoft HCM) systems-of-record for the State as part of the process of IT consolidation. Other systems may be included as either authoritative or downstream depending on a per-project basis.**
134. How many systems are currently being used at the State? **a) This number is not available, the number of systems that would need to be connected to an IdM system would be identified on a per-project basis.**
135. There is a requirement to support 1 million concurrent users, whereas in another section it states that the system will serve 700,000 users. Can you please provide the total user count? **a) Vendors should provide tiered or per-user pricing if vendors license the solution in that manner. The numbers provided illustrate a potential maximum, between 700,000 to 1 million recorded in the system. Statewide deployment will be on an Entity and Project basis and will reference pricing for such rollouts.**
136. Does the State staff have any expertise in Identity Management solutions? **a) Some expertise exists, however, the State seeks a supplier to provide an end-to-end solution with rigorous expertise as options for consideration.**
137. What is the expected level of availability? **a) 24x7x365. Supplier may propose HA configuration for production environments based off of "9's" or sigma and appropriate pricing or configuration recommendations to match.**
138. Does the State have virtualized hardware in place? **a) The State of Oklahoma relies at least partially on a VMWare infrastructure. For affiliates and political subdivisions, vendor should describe any virtualized infrastructure compatibility requirements or options.**
139. Where can amendment 1 be located?
a) It will be posted shortly at the following link:
<http://www.ok.gov/cio/Procurement/Solicitations/0900000124.html>



**State of Oklahoma
Office of State Finance
Information Services Division**

Solicitation

b. All other terms and conditions remain unchanged.

Supplier Company Name (**PRINT**)

Date

Authorized Representative Name (**PRINT**)

Title

Authorized Representative Signature