

# Questionnaire for institutions

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## 1. Respondent background

[See responses](#)

- 1.1 Institution name
- 1.2 Department name
- 1.3a Respondent#1: Name and title
- 1.3b Respondent #2: Name and title
- 1.4 May we publish your name and institution on the survey results website?

- 1. Yes
- 2. No

## 2. SOA maturity of your organization

[See responses](#)

2.1 Can you describe the SOA maturity of your organization using the terminology developed in the HP SOA capability model?

	Ad-hoc	Basic	Standardized	Managed	Adaptive
Business 2007					
2012					
Program management 2007					
2012					
Governance 2007					
2012					
Architecture 2007					
2012					
Operations 2007					
2012					
People 2007					
2012					
Enabling technologies 2007					
2012					

2.2 If you have indicated a significant change in your maturity level, can you describe the projects that have done most to advance that maturity?

2.3 If there has been a significant change, can you identify the top 3 drivers for that change?

- The need for enterprise integration of back-end administrative systems (HR, Finance, Student)
- The need for better Master Data Management
- The need for greater agility
- The need to integrate learning technologies
- The de facto result of acquiring middleware bundled with other products
- Executive leadership (CIO or Enterprise Architecture)
- Other:

2.4 Are there any additional comments you would like to add to elaborate on the SOA maturity of your organization?

## 3. Industry (vertical) standards

[See responses](#)

### 3.1 PESC: Admissions application

- Used to receive applications
- Used for internal application integration
- There is an enterprise-wide commitment to the standard
- The standard is used as a guideline for design

### 3.2 PESC: Educational Test Scores

- Used to receive test scores from agencies
- Used for internal application integration
- There is an enterprise-wide commitment to the standard
- The standard is used as a guideline for design

3.3 If you have checked one or more items in 3.2, please list the tests (eg SAT, TOEFL, GRE etc)

### 3.4 PESC: High School Transcript

- Used to receive transcripts
- Used for internal application integration
- There is an enterprise-wide commitment to the standard
- The standard is used as a guideline for design

### 3.5 PESC: College transcript

- Used to receive transcripts
- Used to send transcripts
- Used for internal application integration
- There is an enterprise wide commitment to the standard
- The standard is used as a guideline for design

3.6 Do you use any of the following IMS standards (in any capacity)

- IMS: e-Portfolio
- IMS: LIS (Learning Infrastructure Services)
- IMS: LTI (Learning Tools Interoperability)

3.7 Are you using any XML standards in your administrative systems?

- Financial Information Exchange (<http://www.fixprotocol.org/>)
- HR XML (<http://www.hr-xml.org/>)
- Other?

3.8 Please list any other industry (vertical) standards that do not appear in the lists above

## 4. Web Service Integration Capabilities

[See responses](#)

4.1 Are you using the web service integration capabilities of any of the following:

- PeopleSoft Integration Broker and Web Services
- Sungard SCT Banner: Banner Web Services
- Sakai Web Service
- Kualu Student Web Services
- Kualu Enterprise Workflow Web Services
- Kualu Identity Web Services

4.2 Do you have any additional comments on the use of these capabilities?

## 5. SOA Governance

[See responses](#)

Note: in this section the word service is used in the narrow technical sense of a capability that is available through a machine readable interface (web service RMI

etc) rather than service in the broader ITIL sense.

5.1 Does your organization include architectural reviews in its project methodology  
1=not at all 5=consistently

5.2 Are the principles of SOA applied during architectural reviews?  
1=not at all 5=consistently

**5.3** Do you have processes for documenting and publishing service contracts?

1=not at all 5=consistently

**5.4** Do you have a change management process for service contracts?

1=not at all 5=consistently

**5.5** Is there a central (enterprise wide) repository for service contracts?

- Yes
- No

**5.6** Please add any additional information on the management of service contracts

**5.7** Has SOA changed your IT governance? If so, how?

## 6 Data governance

[See responses](#)

Successful SOA depends on a clearly articulated ontology. Service endpoints need to understand the data contained in messages. Maturity around data architecture is

a precondition for SOA maturity.

**6.1** Do you have a conceptual enterprise data model?

1=none at all 5=a complete model

**6.2** Do you have well documented logical data models?

1=none at all 5=a complete model

**6.3** Do you have well documented physical data models?

1=none at all 5=a complete model

**6.4** Have you developed governance structures around data?

1=None at all 5=Mature governance

## 7. Identity and access management

[See responses](#)

Services need to be built on mature identity and access management practices. Successful IAM is another precondition for successful SOA.

**7.1** Do you have an enterprise Identity and Access Management roadmap?

- Yes
- No
- We are in the process of creating one

**7.2** When applications invoke services on behalf of a user, are requests represented as coming from the user?

- This is not a goal
- This is an architecture goal but it is only sometimes implemented
- This is generally implemented for services in the local domain
- This is generally implemented for services in the local domain and in the cloud
- Other:

**7.3** When applications invoke services, how do services authenticate the requests?

- Locally developed solution for mutual authentication
- An n-tier solution such as Shibboleth ECP or CILogon
- Other:

**7.4** After requests are authenticated, do services access another service to determine what the requestor is authorized to do?

- This is not a goal
- This is an architecture goal but it is only sometimes implemented
- This is consistently implemented for services in the local domain
- This is consistently implemented for services in the local domain and in the cloud
- Other:

**7.5** More generally, how do you manage trust between distributed components ?

## 8. SOA design principles

**8.1** Is SOA part of your Software Development Life-cycle?

1=Not at all 5=Consistently

**8.2** If SOA is part of your SDLC, please explain how

**8.3** Do you use any high level design artifacts such as capability maps, service decompositions or enterprise ontologies? If so, could you describe them?

**8.4** Do you version your service contracts during the design process?

- Yes
- No
- n/a

**8.5** How do you publish (document) your service contracts?

- Textual descriptions in documents (not available on the web)
  - Textual descriptions on the web
  - XML schema
  - api's in javadoc
  - Other:
- 8.6** What kinds of meta data do you maintain about your services
- Assumptions
  - Intended use
  - Glossaries
  - Other:

**8.7** What message structures do you use?

- SOAP
- REST
- POX (Plain Old XML)
- Other:

## 9. Technologies

**9.1** Are you using an integrated commercial SOA suite, or any of the components in the suites listed below?

- Oracle SOA suite
- IBM Websphere
- Microsoft Biztalk
- Red Hat JBoss Enterprise SOA Platform
- SAP NetWeaver 7.3
- TIBCO ActiveMatrix 3.0
- Other:

**9.2** Please indicate whether you are a) exploring the product, b) implementing a pilot or, c) have an enterprise implementation

**9.3** Are you using one or more of the following service bus applications?

- Mulesoft
- WSO2 ESB
- Fuse (built on Apache ServiceMix)
- Apache ServiceMix
- JBoss ESB
- KSB (Kuali Service Bus)
- Other:

**9.4** Please indicate whether you are a) exploring the product, b) implementing a pilot or, c) have an enterprise implementation

**9.5** Please indicate which enterprise services are connected via a bus

**9.6** Which of the following technology standards do you use?

- XML binding: JAXB, JAX-WS
- WS-Transaction
- BPEL
- Other:

**9.7** Which of the following security related standards do you use?

- SAML
- WS-Security
- WS-Trust
- WS-Policy
- Other:

**9.8** How would you describe the logical topology of your SOA

- Bus (endpoints only connect via a bus)
- Hub and spoke
- Point-to-point
- Federated
- A mixture of the above
- Other:

\*9.\*9 Has the introduction of SOA related technologies altered your enterprise technology road-map?

## 10. Cost benefit analysis

**10.1** Indicate whether you think that SOA has led to an increase in strategic value in any of these areas

- Process improvement
- The deployment of new capabilities
- Simplification of access to enterprise data
- Lowering costs
- Other:

**10.2** Metrics

- Yes: in theory the cost of developing and deploying a service could be calculated
- Yes: there have been cost savings in terms of service re-use
- Other:

**10.3** Are there any other comments you might like to add on the topic of SOA and cost-benefit

## **11. Individual projects and initiatives that illustrate SOA principles**

In this section we would like to collect some detailed information about individual SOA projects or initiatives that you have undertaken in the last 18 months. The

section allows for up to 2 projects. However, if there are more you would like to share, there is a freeform text box at the end of the section.

Project #1

**11.1a** Name of the project

**11.2a** Project URL (if public)

**11.3a** Where is the project at on the project lifecycle?

- Investigation
- Planning
- Execution
- Review
- In production

**11.4a** What are the goals of the project (technology goals and business goals)

**11.5a** Is there any additional information about the project you would like to supply

**11.6a** What business domains does this project address?

- Learning tools ecosystem (LMS, e-Portfolio, learning objects)
- Student (enrollment, planning, records, awards)
- Research admin (grants, ethics, accounting, publications)
- Back-end administration (HR, Payroll, Finance)
- Enterprise infrastructure (workflow, identity, business rules management)
- Other:

Project #2

**11.1b** Name of the project

**11.2b** Project URL (if public)

**11.3b** Where is the project at on the project lifecycle?

- Investigation
- Planning
- Execution
- Review
- In production

**11.4b** What are the goals of the project (technology goals and business goals)

**11.5b** Is there any additional information about the project you would like to supply

**11.6b** What business domains does this project address?

- Learning tools ecosystem (LMS, e-Portfolio, learning objects)
- Student (enrollment, planning, records, awards)
- Research admin (grants, ethics, accounting, publications)
- Back-end administration (HR, Payroll, Finance)
- Enterprise infrastructure (workflow, identity, business rules management)
- Other: