inBloom – *Environment Specification*

Release 1.8.81

July 19, 2013

**Copyright © 2012 inBloom, Inc., and its affiliates.**

**inBloom is a trademark of inBloom, Inc.**

This document and the information contained herein is provided on an "AS IS" basis and inBloom, Inc. DISCLAIMS ALL WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY WARRANTY THAT THE USE OF THE INFORMATION HEREIN WILL NOT INFRINGE ANY RIGHTS OR ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

1. Purpose 3

2. Migration Scripts 3

2.1. Parent Default Roles Migration Script 3

2.2. Language Data Migration Script 3

2.3. SecurityEvent Index Migration Script 4

3. Infrastructure Configuration Changes 5

3.1. MongoDB (Data Store Layer) 5

3.2. Ingestion 5

3.2.1. Landing Zones 5

3.2.2. GlusterFS 5

3.2.3. ActiveMQ 5

3.2.4. Ingestion servers 5

3.3. Portal 5

3.4. API 5

3.5. Data Browser 5

3.6. Admin Tools 5

3.7. Simple IDP 5

3.8. Search 6

4. Suggested Base Configuration Changes 6

4.1. sli.properties 6

4.2. Portal Application sli.properties 6

4.3. portal-ext.properties 6

4.4. Admin config.yml 6

4.5. Data browser config.yml 6

4.6. Apache Tomcat 6

4.7. ActiveMQ 6

# Purpose

This document is intended to provide operations with information necessary to update from a previous release to a current release in the inBloom™ Production and Sandbox environments.

This document provides minimum deployment footprints for this release, as well as an estimated footprint necessary for 5M students, and the Sandbox developer environment.

This document assumes deployment and growth within an Amazon AWS environment.

# Migration Scripts

The sections that follow include instructions for running migration scripts when updating to this version.

## Parent Default Roles Migration Script

A migration script is provided to add a default parent role to every realm defined in the system. This script should be **run in both Sandbox and Production** environments.

Location: *sli/sli/opstools/migration/81\_custom\_roles\_migration.rb*

Usage: *ruby opstools/migration/81\_custom\_roles\_migration.rb*

This script assumes mongos is running on [localhost:27017](http://localhost:27017/).

## Language Data Migration Script

A migration script is provided to update language fields in the student and studentAssessment collections from the pre-1.5 release format to the 1.5 release format.  In release 1.5, language values were converted from an enumeration to a map of strings with 'language' and 'identificationSystem' elements.

This script performs the following steps:

* Updates the languages and homeLanguages fields in the student collection to the new format.
* Updates the administrationLanguage field in the studentAssessment collection to the new format.

The script can be re-run. Data that has already been updated will be ignored.

Location: *sli/sli/opstools/migration/81\_language\_migration.rb*

Usage: *To migrate language data for student and studentAssessment collections, use argument(s) as follows:*

*--all                                 Migrate against all tenant dbs  
            --OR--  
           <tenant1> [<tenant2> ...]         Migrate only database(s) in the list  
  
           myhost:myport                Optional hostname and port defaults to localhost:27017*

*For example:*

*ruby opstools/migration/81\_language\_migration.rb  --all mongo\_host:mongo\_port*

*ruby opstools/migration/81\_language\_migration.rb <tenant1> [<tenant2> ...]  mongo\_host:mongo\_port*

## SecurityEvent Index Migration Script

A migration script is provided to add a new required index on the securityEvent collection of pre-existing sli databases.

This script performs the following step:

* Creates an index on the "body.targetEdOrgList" field in the securityEvent collection

Location: *sli/sli/opstools/migration/81\_securityevent\_index\_migration.rb*

Usage: To apply the index to the securityEvent collection, give argument(s) as follows:

*myhost:myport               Optional hostname and port defaults to localhost:27017*

*For example:*

*ruby opstools/migration/81\_securityevent\_index\_migration.rb*

*ruby opstools/migration/81\_securityevent\_index\_migration.rb mongo\_host:mongo\_port*

# Infrastructure Configuration Changes

## MongoDB (Data Store Layer)

No changes.

## Ingestion

Each section of ingestion requirements covers one service or application that is part of the ingestion system.

### Landing Zones

No changes.

### GlusterFS

No changes.

### ActiveMQ

No changes.

### Ingestion servers

No changes.

## Portal

No changes.

## API

No changes.

## Data Browser

No changes.

## Admin Tools

No changes.

## Simple IDP

No changes.

## Search

No changes.

# Suggested Base Configuration Changes

The configuration examples provided below detail a running system.  Email addresses and URLs that are imbedded in the configuration should be validated prior to go-live.

## sli.properties

No changes.

## Portal Application sli.properties

No changes.

## portal-ext.properties

No changes.

## Admin config.yml

No changes.

## Data browser config.yml

No changes.

## Apache Tomcat

No changes.

## ActiveMQ

No changes.