

# STUDENT SUCCESS PLAN ARCHITECTURE

# OVERVIEW

---

- Intro
- Structure
- Dependencies
- APIs
- Data Integrations
- Reports
- Building a SSP Tool
- Resources

# INTRO

ME

# SOFTWARE ARCHITECT AT UNICON, INC

PLENTY OF SAKAI

LITTLE BIT OF  
UPORTAL, CAS, ETC

RECENTLY \*LOTS\* OF  
SSP

 UNICON®

# OPEN SOURCE CONSULTING

# COMMERCIAL AND EDU

1993

# OPEN SOURCE

# SUPPORT

# HOSTING AND MANAGED SERVICES

**SSP**





ORIGINALLY  
COLDFUSION+FLEX  
APPS



## Caseload Assignment Form

[? Help](#)

## ADD STUDENT: Robert R Little

To add a new student record click the Clear Form button, add the student data and click Save. The asterisk denotes a required field.

## \* Personal Information

## \* Appointment Information

Assigned Counselor/Coach *	<input type="text" value="Gormley, Shawn"/>
Office	13023 P
Phone	512-2293
Department	Web Systems
Department Form	<input type="text" value="Counseling Services"/>
Student Type *	<input type="text" value="CAP"/>
Appointment Date *	<input type="text" value="04/11/2011"/>
From *	<input type="text" value="9:00"/> <input type="text" value="AM"/>
To *	<input type="text" value="10:00"/> <input type="text" value="AM"/>

## Special Service Groups

## Referral Sources

## Reason for Services

## Ability To Benefit/Anticipated Start Date

[Clear Form](#)[Save](#)[Save and Print](#)[Delete](#)

IN USE IN ONE FORM  
OR ANOTHER FOR 10+  
YEARS

ORIGINALLY  
DEVELOPED BY  
SINCLAIR COMMUNITY  
COLLEGE (DAYTON, OH)

“According to Sinclair statistics from 2005 – 2011, students using SSP were five times more likely to graduate. For quarter to quarter retention rates ... transitioned SSP students ... had a 37% higher rate of retention compared to students who qualified for the program but did not participate and a 26% higher rate of retention than students not designated “at risk”.

[http://www.studentsuccessplan.org/index.php?option=com\\_content&view=article&id=81:ssphistory&catid=43:main&Itemid=110](http://www.studentsuccessplan.org/index.php?option=com_content&view=article&id=81:ssphistory&catid=43:main&Itemid=110)

**CONSOLIDATION AND  
JAVA RE-WRITE OVER  
LAST ~1.5YRS**

# JASIG INCUBATION

TWO MAIN FEATURE  
SETS

# **1. CASELOAD MANAGEMENT**

## Students

Students						>> Student: Joseph Mumford Jackson - ID#: jjackson10		Coach: Chris Garcia		Coaching History		Edit	
Active						Tools	Dashboard	Details	Transcript	Placement	Contact	Coach	Schedule
    <b>Change Status:</b>   						<a href="#">Main</a> <a href="#">Intake</a> <a href="#">Action Plan</a> <a href="#">Journal</a> <a href="#">Early Alert</a> <a href="#">MAP</a> <a href="#">Accommodations</a>  <a href="#">Config Link</a> <a href="#">Program View</a> <a href="#">MAP Help</a>	 <b>NO PHOTO</b>	Full Name: Joseph Tartan ID: jjackson10 DOB: 08/20/1983 Phone: 480-775-2 Email: 1@unicon. Student Type: ILP SSP Status: Active	GPA: 2.33 Comp Rate: null% Standing: null Restrictions: null Reg: Payment: FA Award: SAP: F1: Early Alerts: 1/1 Action Plan: 0/0	<b>Service Reasons</b>  Service Reason 1			
 						<a href="#">Service Groups</a> 	Group 1						
First	MI	Last	Type	Tartan ID	Alerts								
Aaaron		Alabama	CAP	92983	0								
Taylor		Arkansas	EAL	392994	0								
Lisa		California	CAP	39929034	0								
Jason		Colorado	CAP	3284910	0								
Pablo		Connecticut	EAL	38829	0								
Zunker		Dakota	EAL	39202334	0								
Tim		Delaware	CAP	99939999	0								
James		Florida	ILP	39203929	0								
Curtis		Georiga	EAL	93828	0								
Jim		Hawaii	EAL	398293	0								
Kerry		Idaho	EAL	39203	0								
Iggy		Indiana	EAL	839283	0								
Adam		Iowa	CAP	93284239	0								
Joseph	Mu...	Jackson	ILP	jjackson10	1								
John	Mu...	Johnson	EAL	042	5								
Quentin	Mar...	Kansas	EAL	2384923	0								
Jenkins		Kentucky	EAL	39281	0								
Victor		Louisiana	CAP	92834923	0								
Heather		Maine	EAL	8349201	0								
Dan		Michigan	CAP	932883	0								

**INCLUDES “EARLY  
ALERT” PROCESSING...**

...STUDENT  
PROFILES...

...ADVISOR SESSION  
JOURNALING...

...ADVISOR RESOURCES  
AND PLANNING...

...AND YET MORE TO  
COME

## 2. MAP

» Student: Joseph Mumford Jackson - ID#: jjackson10

Coach: Chris Garcia

Coaching History

Edit

Tools

Main

Intake

Action Plan

Journal

Early Alert

MAP

Accommodation

Config Link

Program Viewer

MAP Help

Filter by Program

New Plan

Load Saved Plan

Load Template

Save ▾

Filter by Tag



View All



Plan Notes



Email Plan



Print Plan

Plan Title: New Plan

Current Total Plan Cr Hrs: 9 Dev Cr Hrs: 0

Filter by Term

Filter By:



Summer 2013



Term Cr. Hrs: 0

Fall 2013



Spring 2014



Summer 2014

ACCT3000

3

ACCT4940

3

Term Cr. Hrs: 3

Term Cr. Hrs: 3

Term Cr. Hrs:

Fall 2014



Spring 2015



Summer 2015

ACCT3310

3

Course	Title	Credit	Tags
ACCT3000	Financial Statement A...	3	
ACCT3010	Cost Acct for Nonacct...	3	
ACCT3030	Tax Acctg for Nonacct...	3	ON30
ACCT3100	Financial Acctg and S...	3	
ACCT3110	External Financial Re...	3	
ACCT3210	Individual Taxation	3	
ACCT3310	Accounting Informati...	3	
ACCT4120	External Financial Re...	3	
ACCT4130	External Fina Reporti...	3	
ACCT4310	Internal Reporting	3	
ACCT4410	Govt and Not-for-Profi...	3	
ACCT4420	Auditing	3	
ACCT4940	Internship	3	
ACCT4990	Ind Study: Readings a...	3	
ACTG1040	Prin of Financial Acco...	3	
ACTG1050	Principles of Manage...	3	
ACTG1060	Technical Financial Ac...	2	
ACTG1200	QuickBooks	3	
ACTG1250	Spreadsheet Applicati...	2	
ACTG2100	Intermediate Account...	3	

# COURSE PLANNING

NOT SCHEDULING

ROUGHLY 2/3  
COMPLETE

# 7 ACTIVE DEVS

# STRUCTURE

Clients



APIs

Services

DAOs



# Clients



DTOs

Controllers

APIs

# Services

Entities

DAOs



# Clients



DTOs

Controllers

Factories

# Services

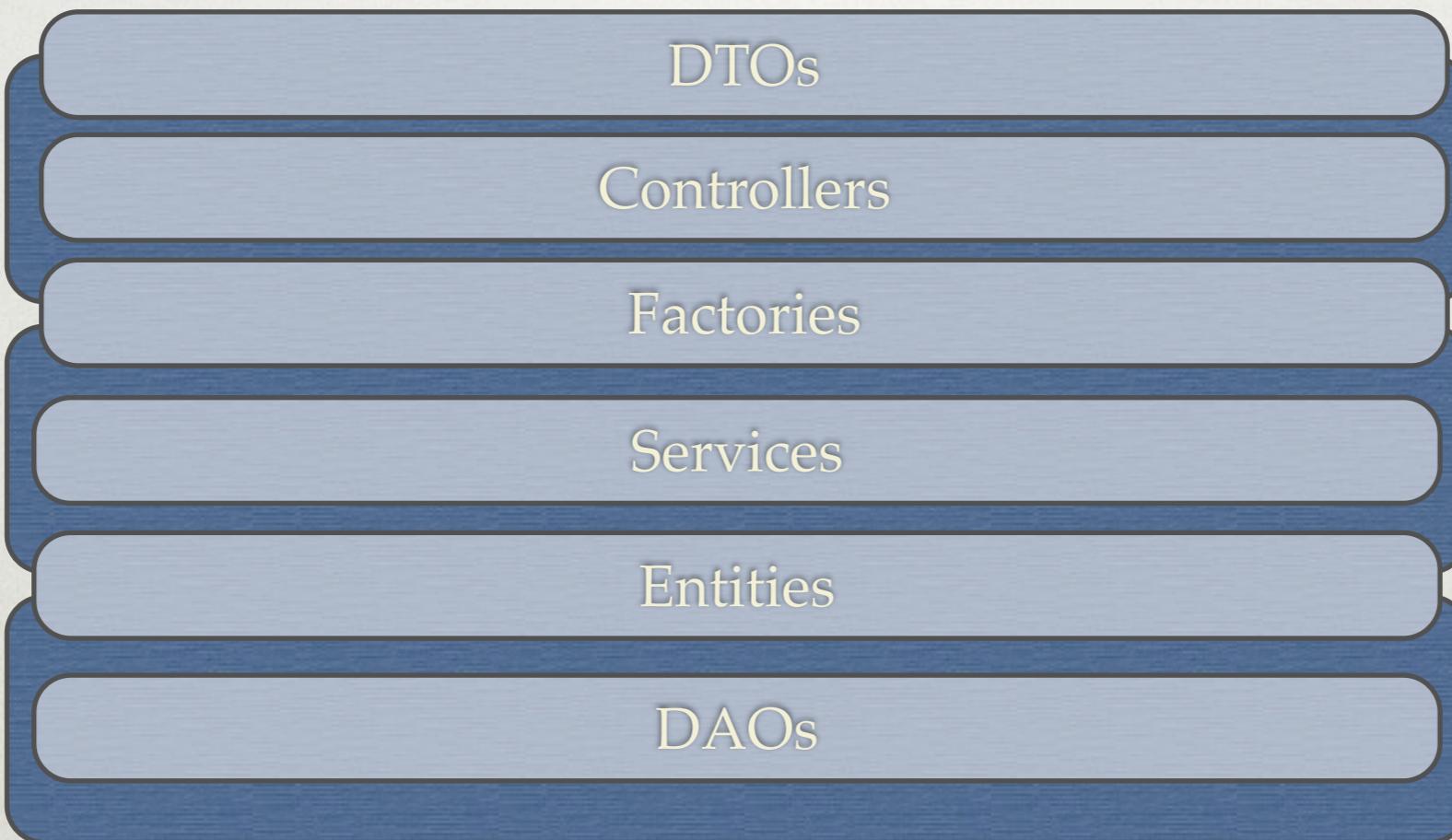
Entities

DAOs

# APIs



# Clients



Clients

APIs

Security

Services

DAOs

Transactions



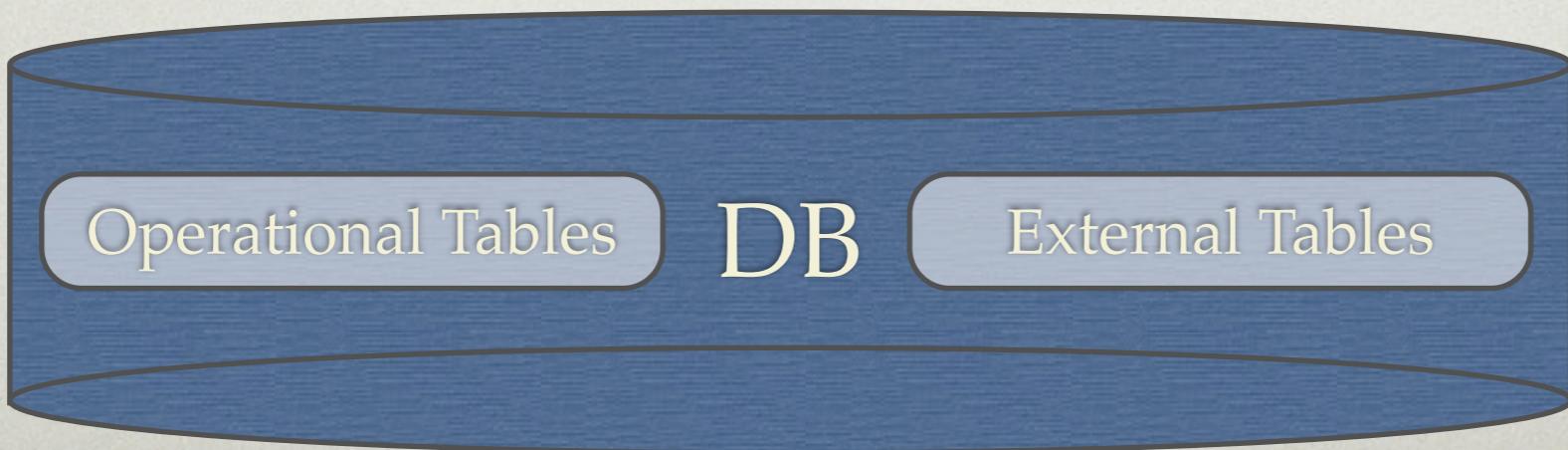
Clients

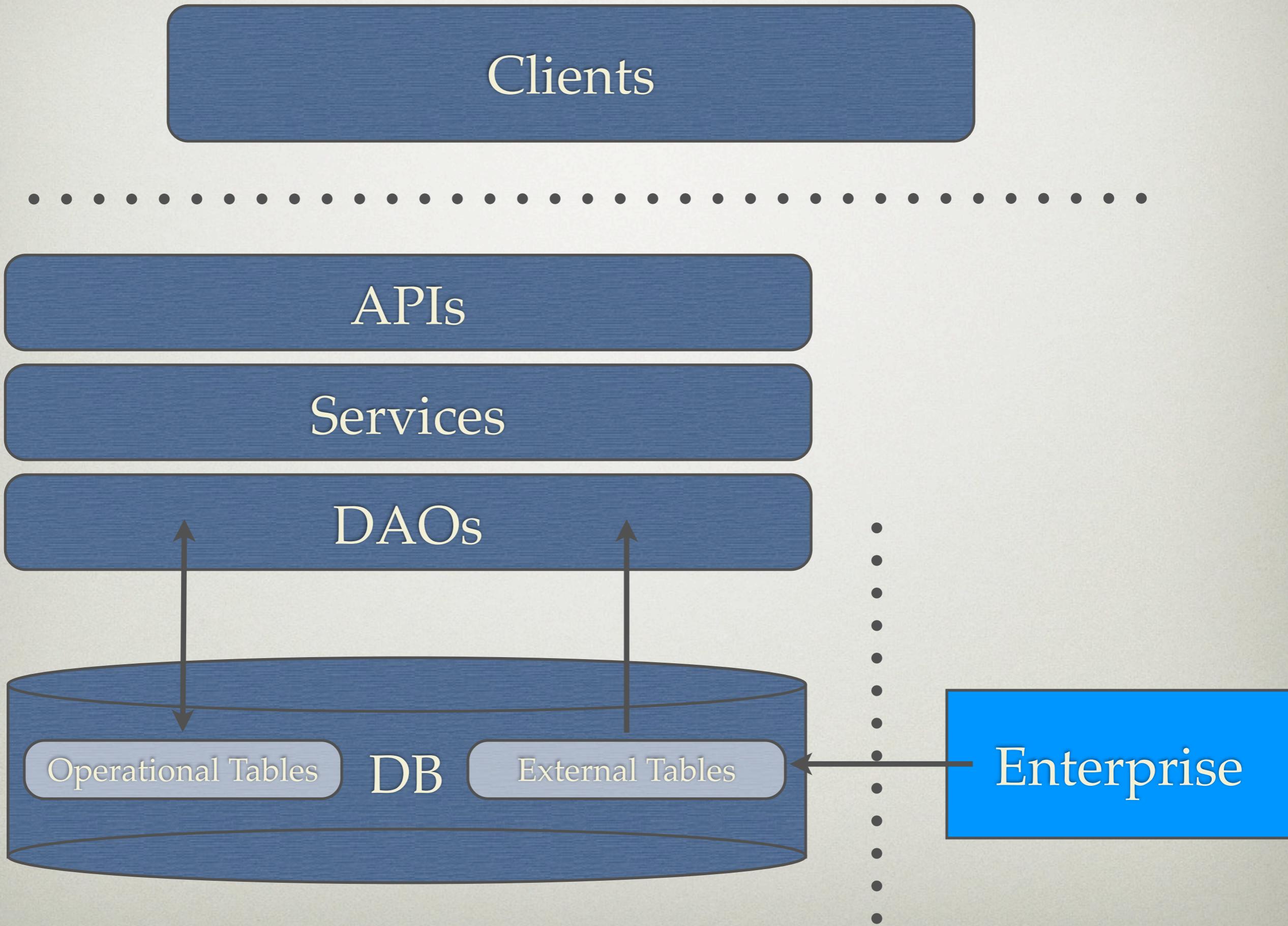


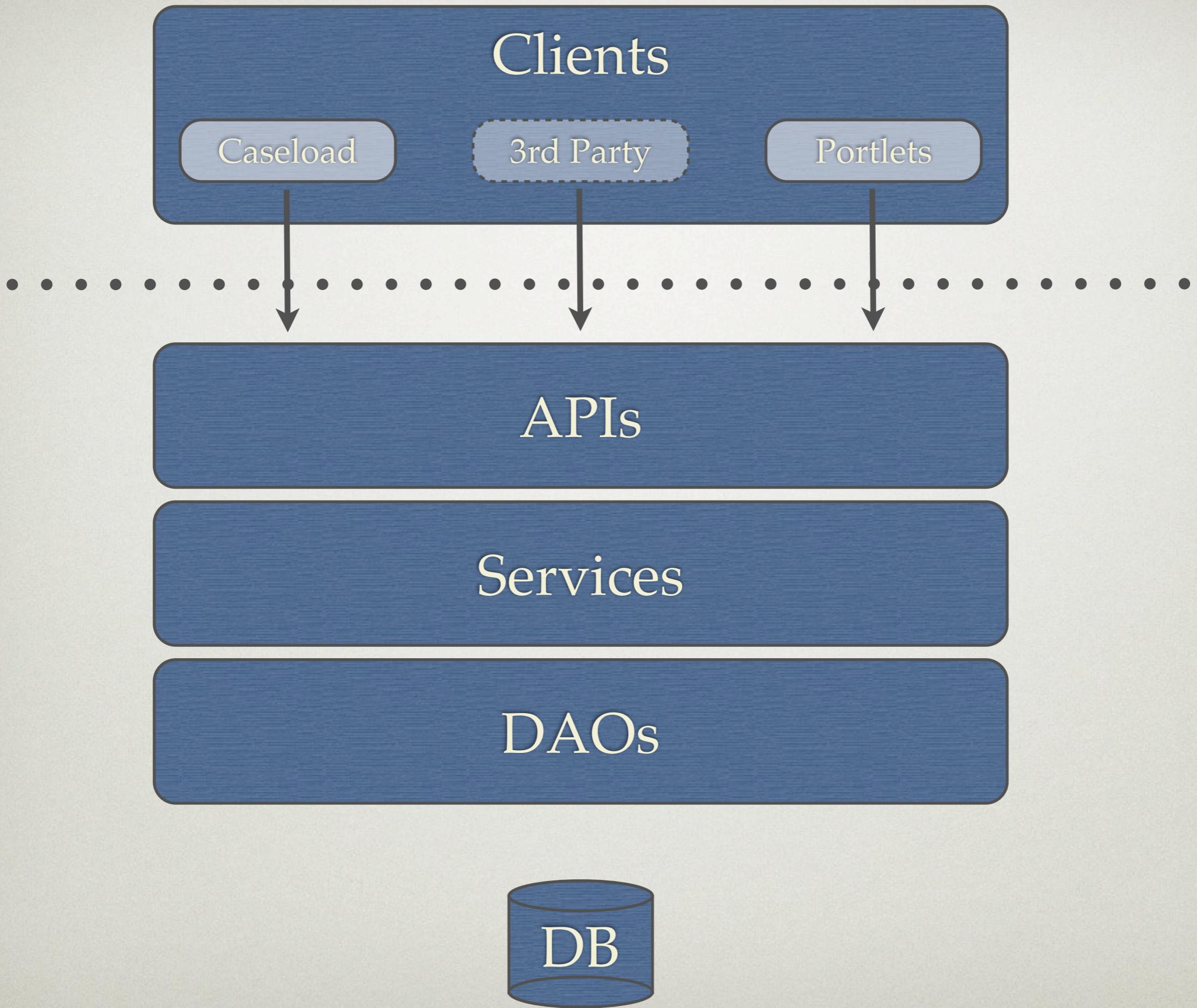
APIs

Services

DAOs







# DEPENDENCIES

MOST OF THE USUAL  
SERVER-SIDE  
SUSPECTS

Clients



APIs

Services

DAOs



Clients

APIs

Services

DAOs

Spring



Clients

APIs

Services

DAOs

Spring

Hibernate



Clients

.....

APIs

Spring  
Web MVC

Services

Spring

DAOs

Hibernate



Clients

.....

Spring Security

APIs

Spring  
Web MVC

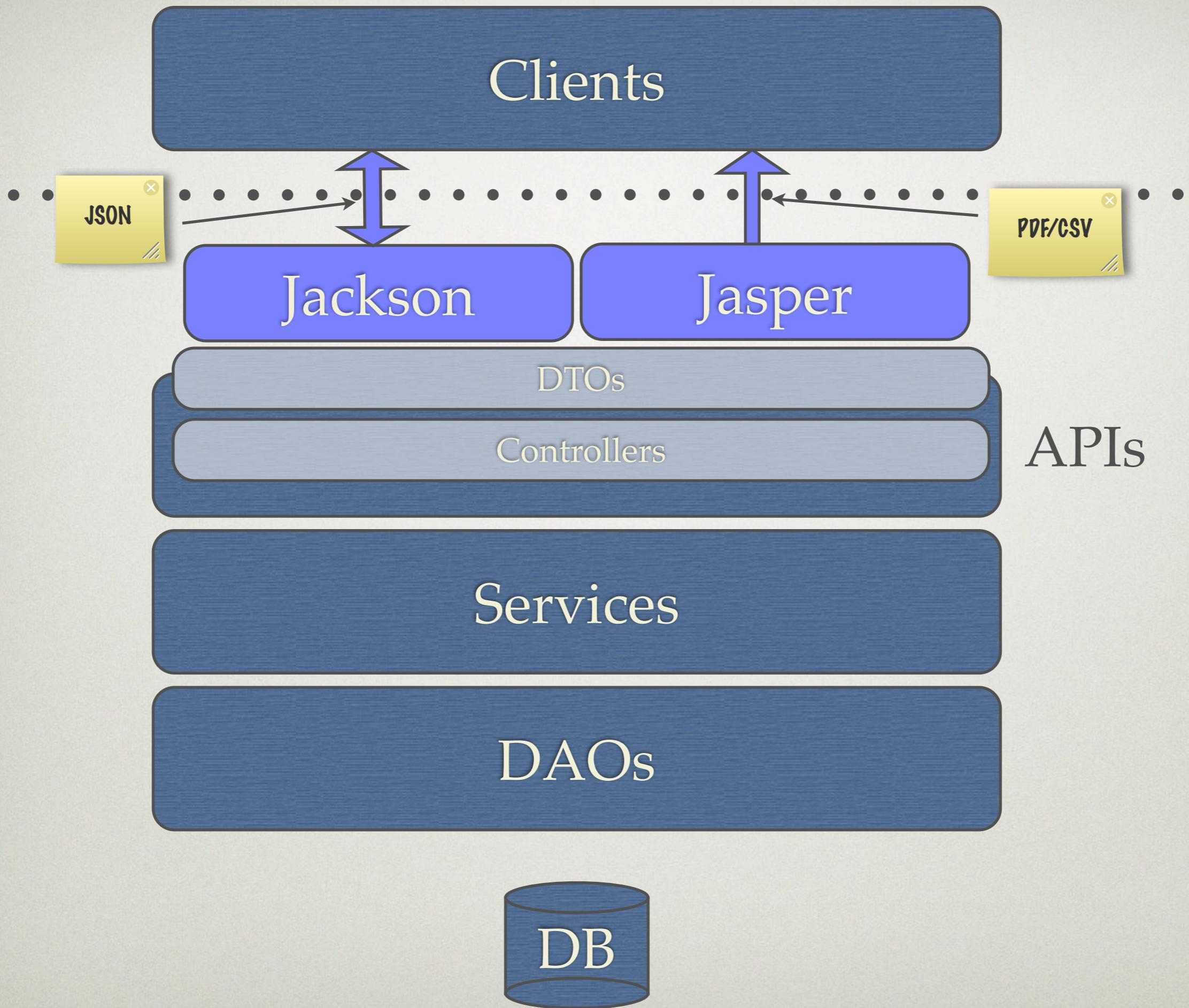
Services

Spring

DAOs

Hibernate





# DB MIGRATIONS VIA LIQUIBASE

(MOST OF THE) CLIENT  
IS A FAT EXT.JS (4.1)  
APP

REMAINDER SPLIT  
INTO THREE PORTLETS

# 1. EARLY ALERT SUBMISSION

← → C ec2-23-20-222-7.compute-1.amazonaws.com/ssp-platform/f/u25l1s4/normal/render.uP

Holly (17) Read Later in pinboard Add To pinboard.in Pinboard: bookmark Java SE 6 Documents Groovy JDK Confluence - Unicon

 STUDENT SUCCESS PLAN SSP Early Alert Martinez David

Early Alert

## Course Roster

PHY315 - Enterprise Physics - FA12

Click a student from the Course Roster to send an Early Alert.

< previous 1 next > Viewing page 1. Showing records 1 - 9 of 9 items. 10 per page

First Name	Middle Name	Last Name	Status
John	Mumford	Jackson	E
Robert	Mumford	Jackson	E
Susan	Mumford	Jackson	E
Thomas	Mumford	Johnson	E
Mary	Mumford	Jones	E
Elizabeth	Mumford	Martin	E
Dorothy	Mumford	Robinson	E
Chris	Mumford	Simth	E
Michael	Mumford	Simth	E

## 2. REPORTS

[SSP](#)[Early Alert](#)[My GPS](#)[Reports](#)[Manage Users](#)

## SSP Reports

### Reports and Forms

Select a report: [Current Caseload Statuses Report](#)

#### Current Caseload Statuses Report

Home Department: [Not Used](#)

Student Type: [Not Used](#)  
CAP  
EAL  
ILP

Service Reason: [Not Used](#)  
Service Reason 1  
Service Reason 1  
Test Service Reason

Special Service Groups: [Not Used](#)  
Group 1  
Group 2  
Test Service Group

Output Type:  pdf  
 csv

[submit](#)

# 3. MYGPS

(THIS ONE ESCAPES  
THE PORTAL ENTIRELY)



## Tools for Your Success

**Self Help Guides**



**Search for Resources**



## Welcome

This self help tool will assist you in identifying and overcoming challenges or barriers to your success at this college. Please use the Self Help Guides to begin the process of identifying the challenges you might face, and discovering the solutions available to meet those challenges. The tool will assist you in building a Personal Road Map that will guide you on your journey to success. Good luck on that journey!

## Tasks

Active	Completed	All
\$100 Pell Transfer to Tartan Card  If have Pell Grant transfer up to \$100 per quarter of your financial aid award to your tartan card to purchase bus pass(es) academic expenses and daily		



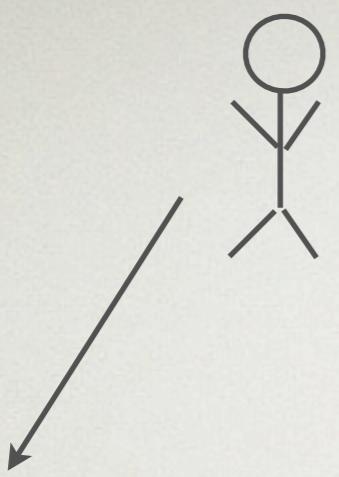
Print



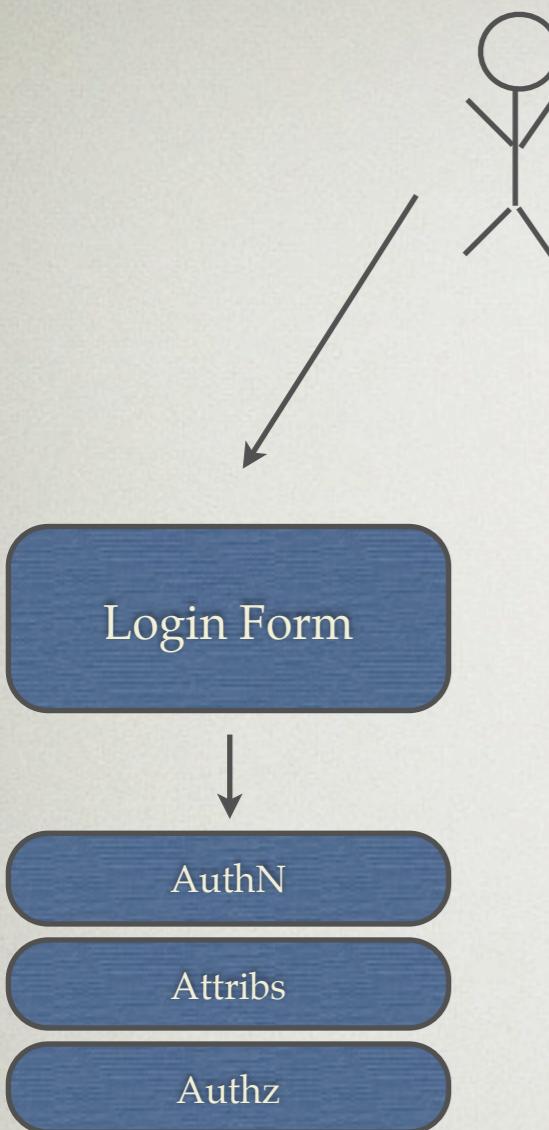
E-mail

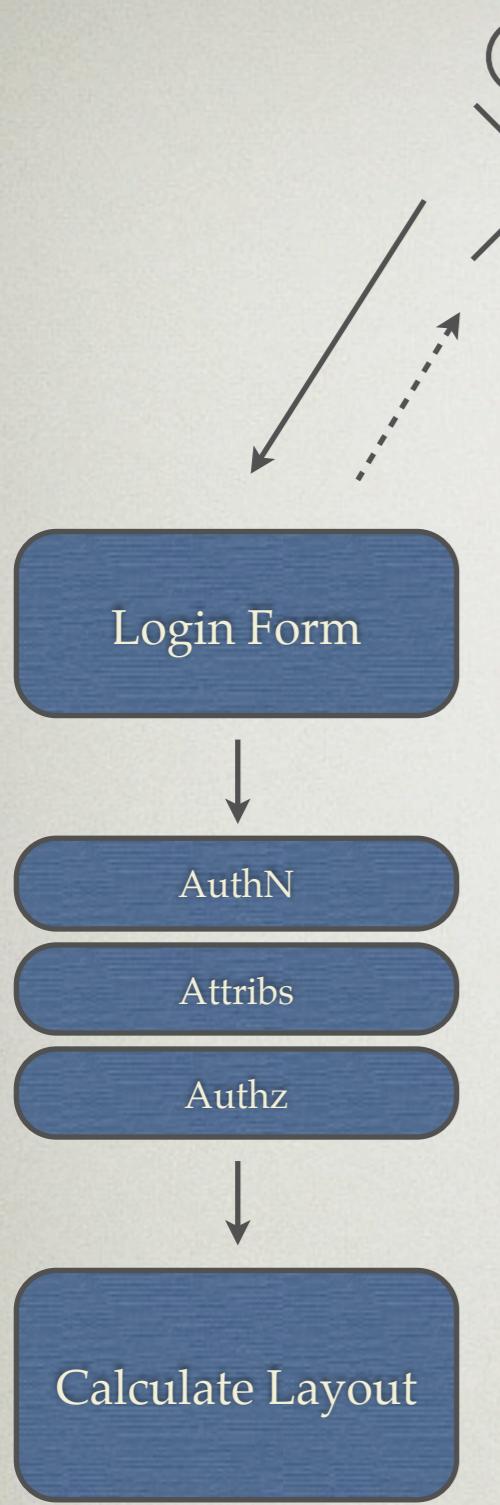
# UPORTAL INTEGRATION

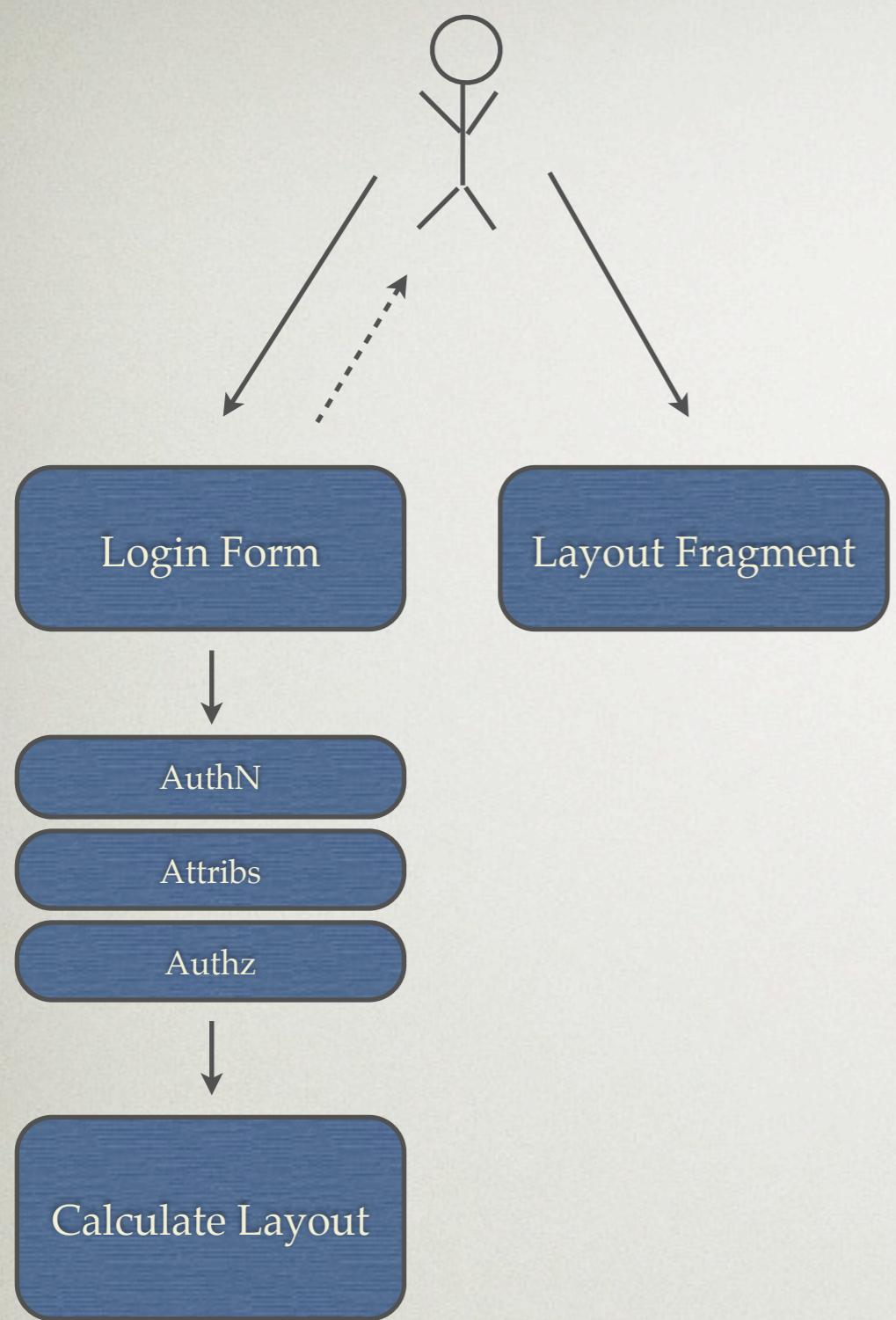
# USERS

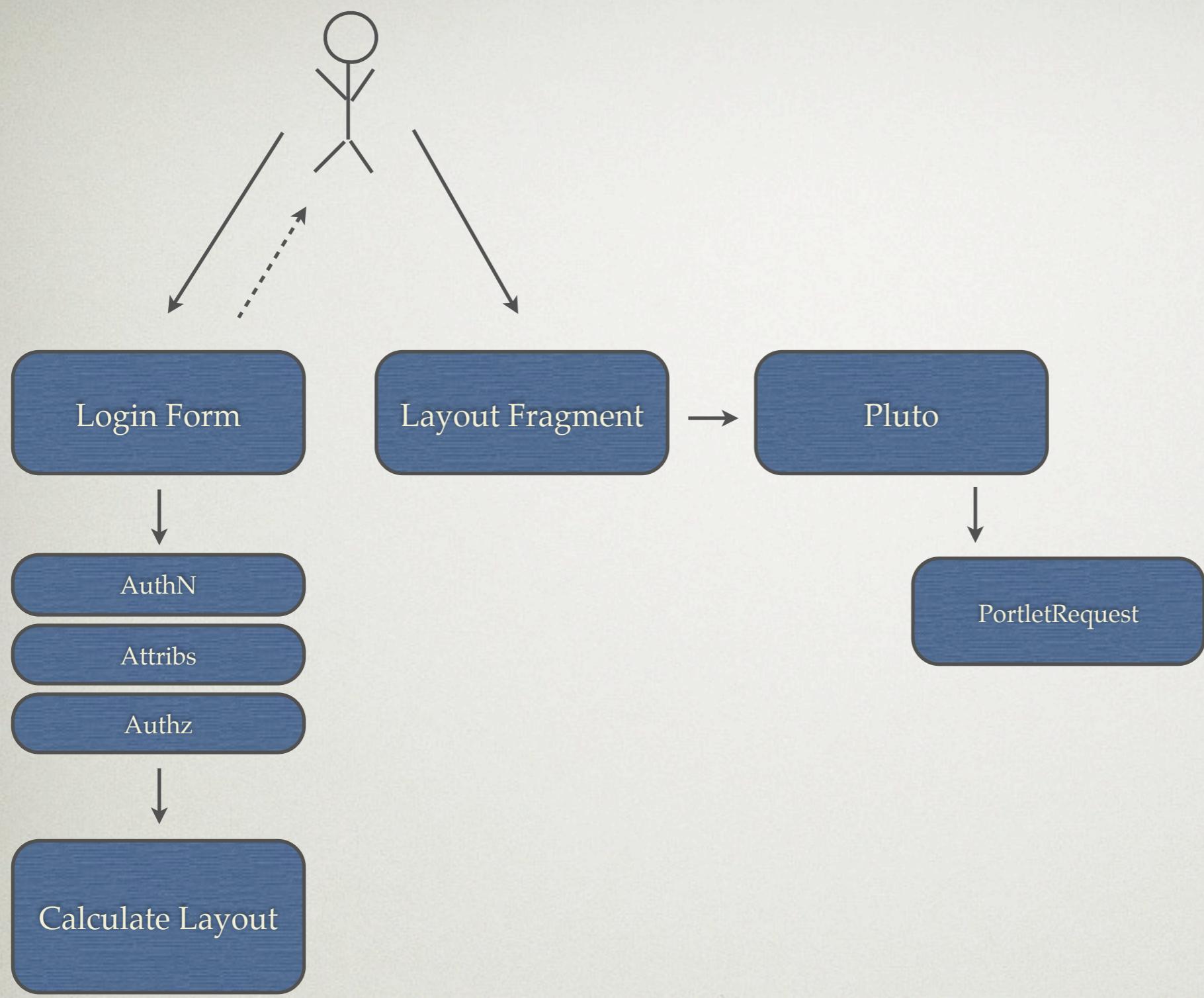


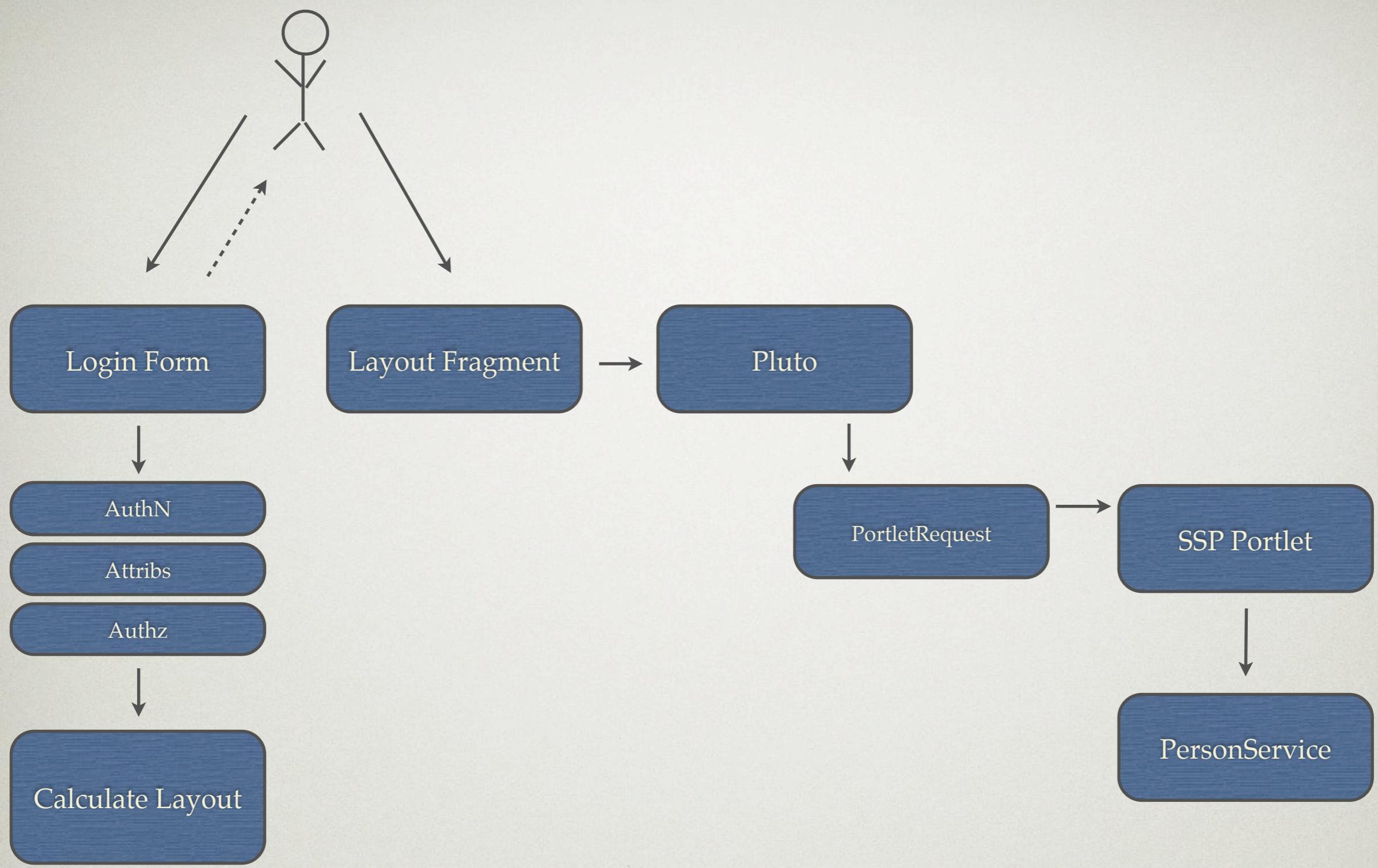
Login Form

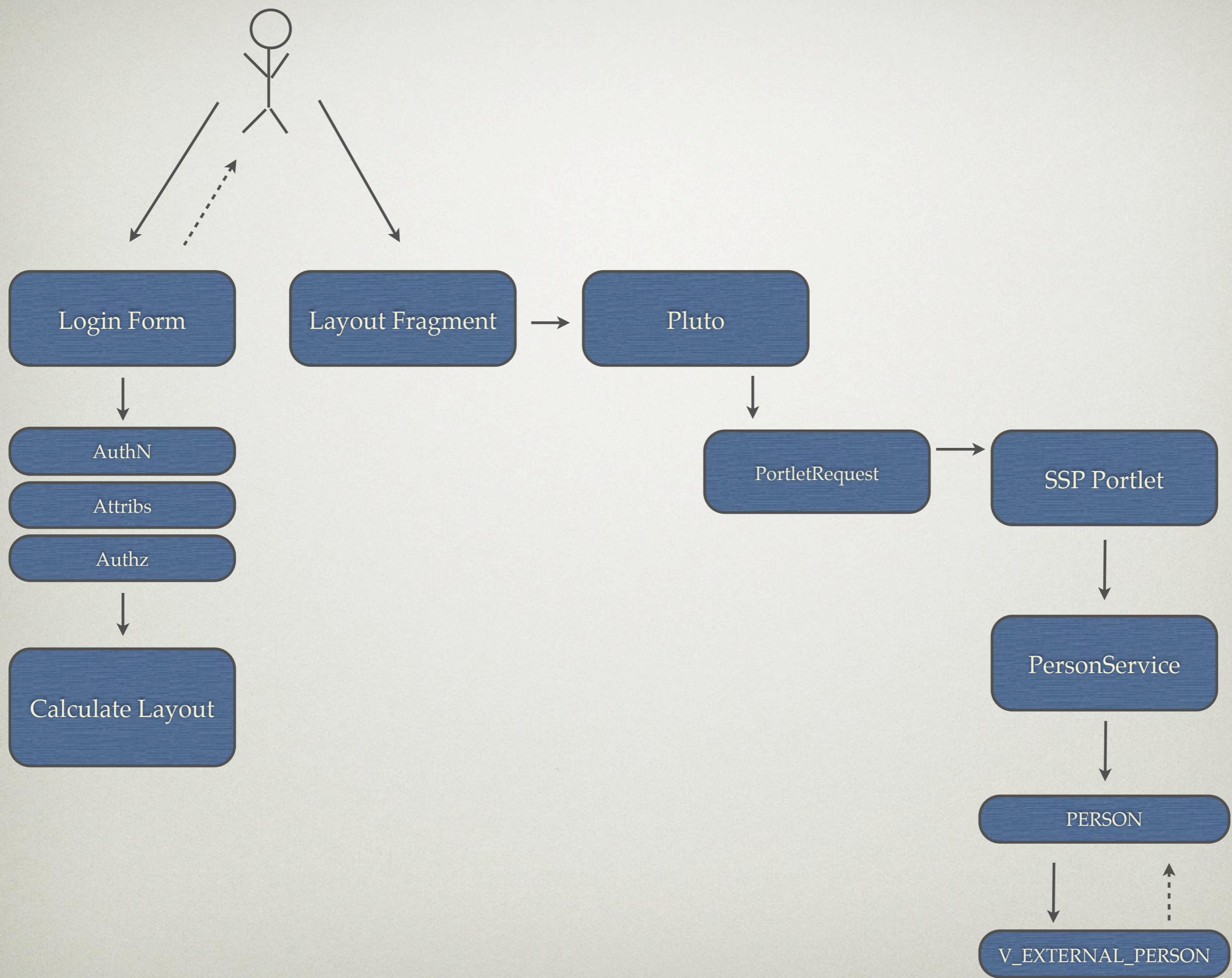


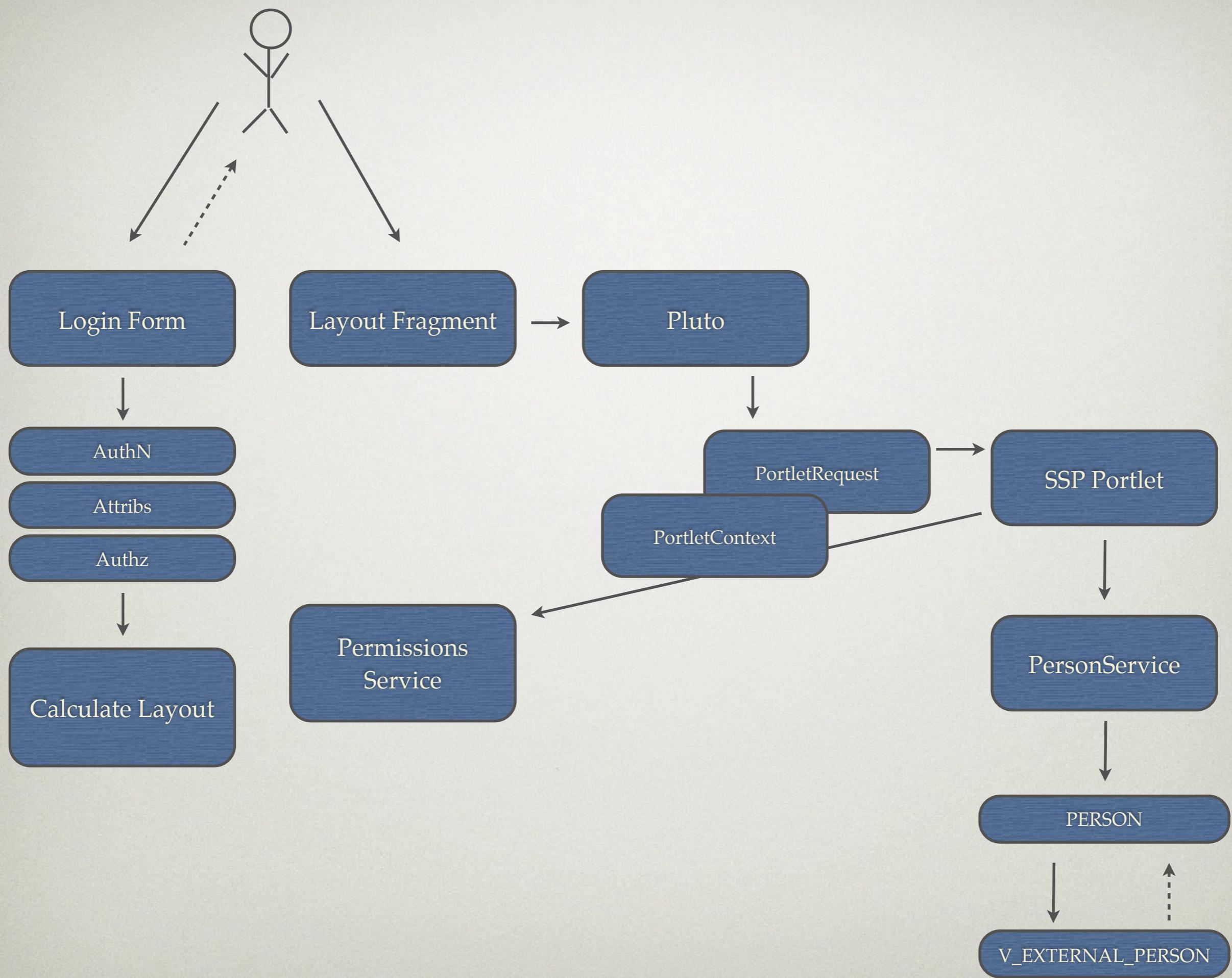


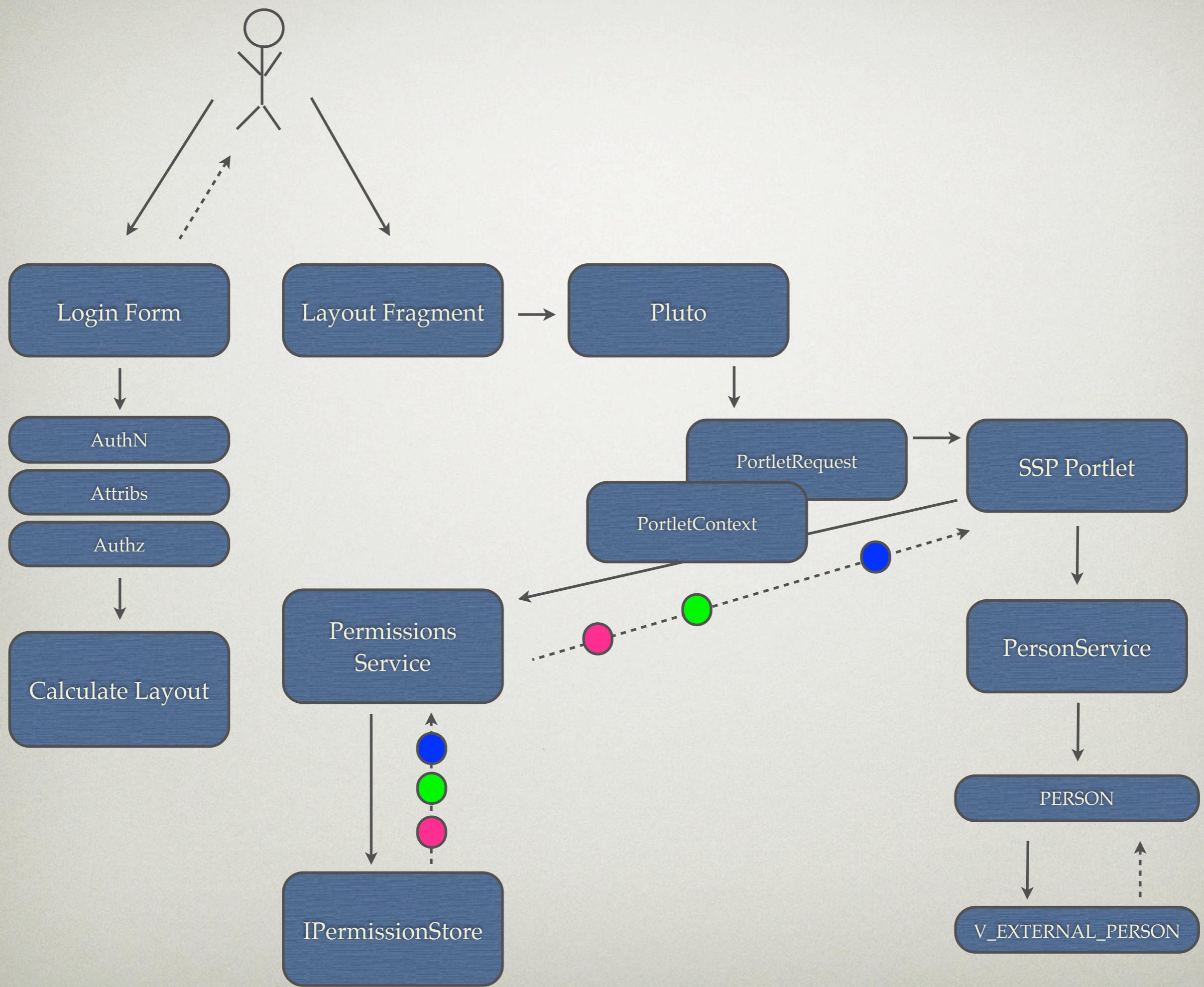


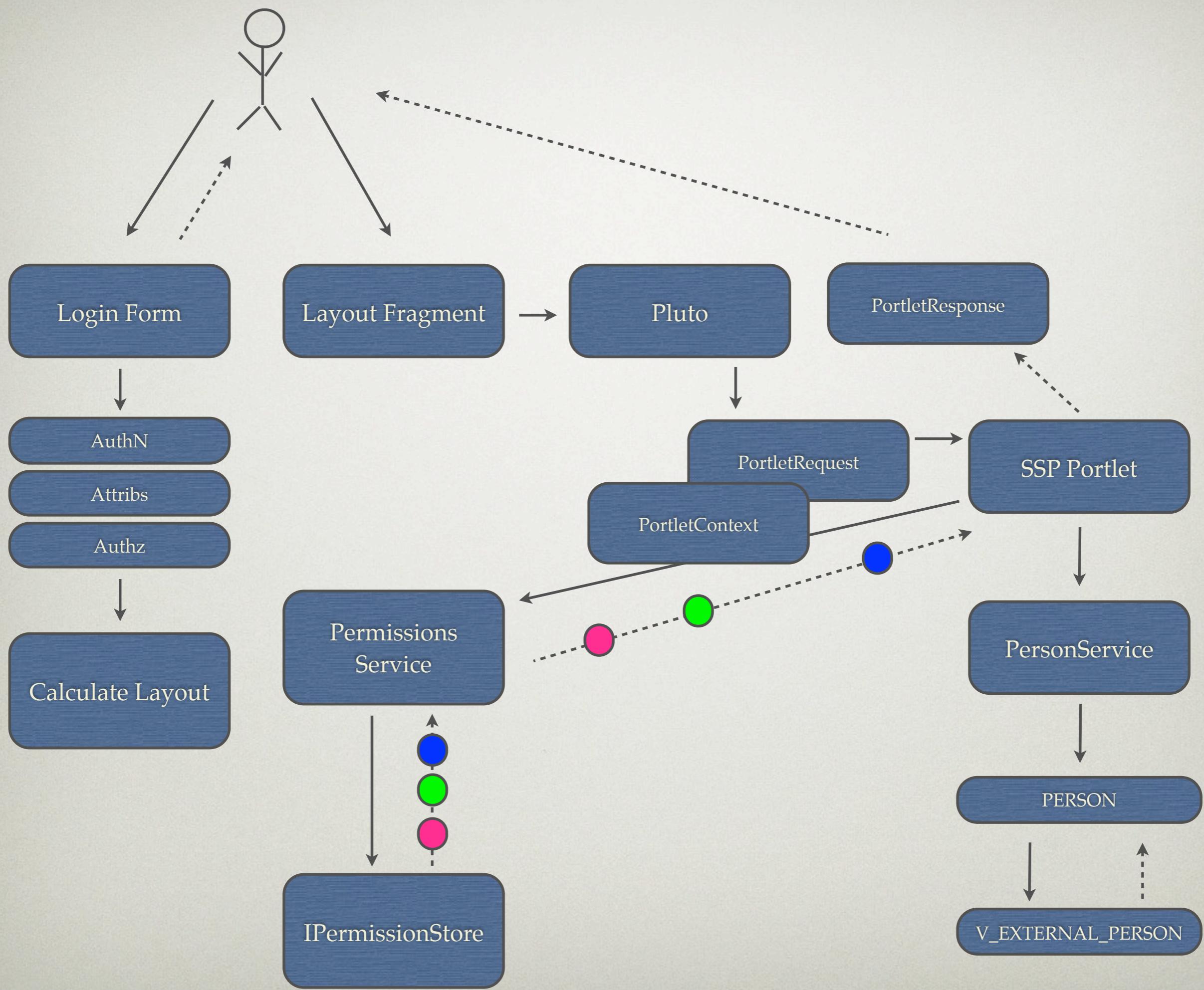












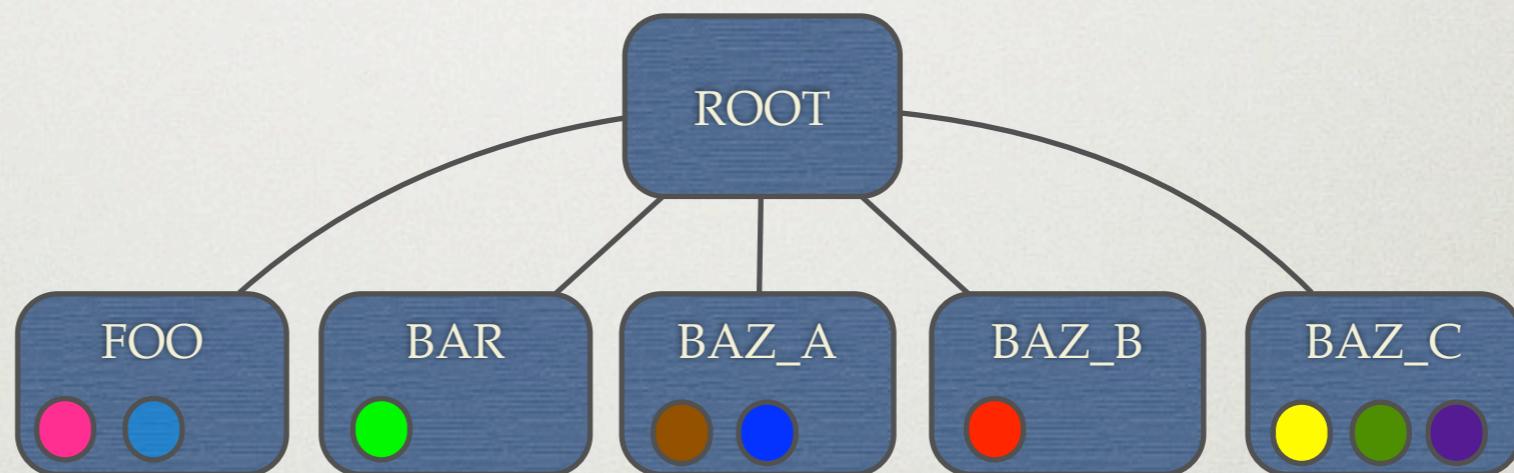
# PERMISSIONS



Attribute	Values
FOO	TRUE
BAR	
BAZ	A,B

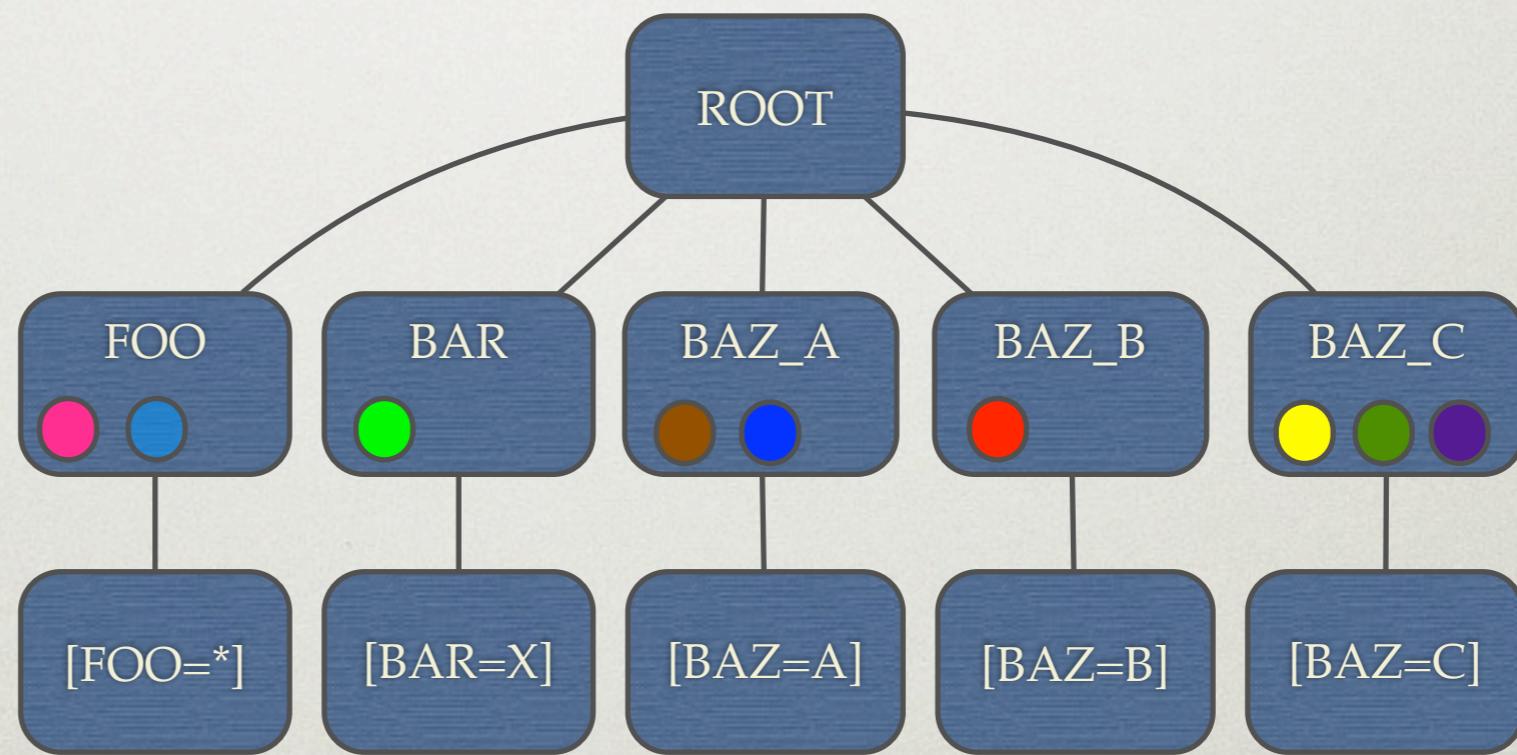


Attribute	Values
FOO	TRUE
BAR	
BAZ	A,B



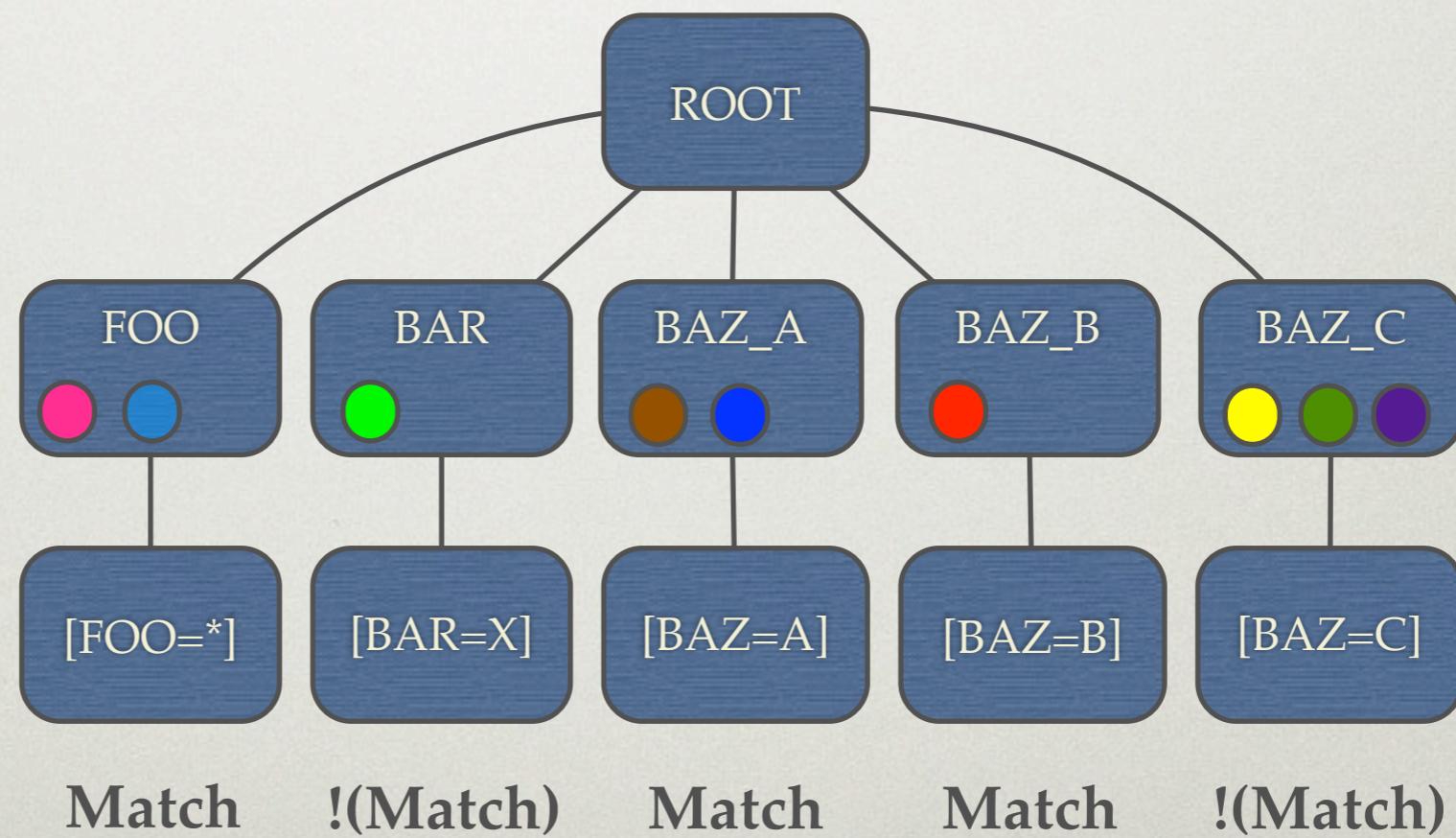


Attribute	Values
FOO	TRUE
BAR	
BAZ	A,B



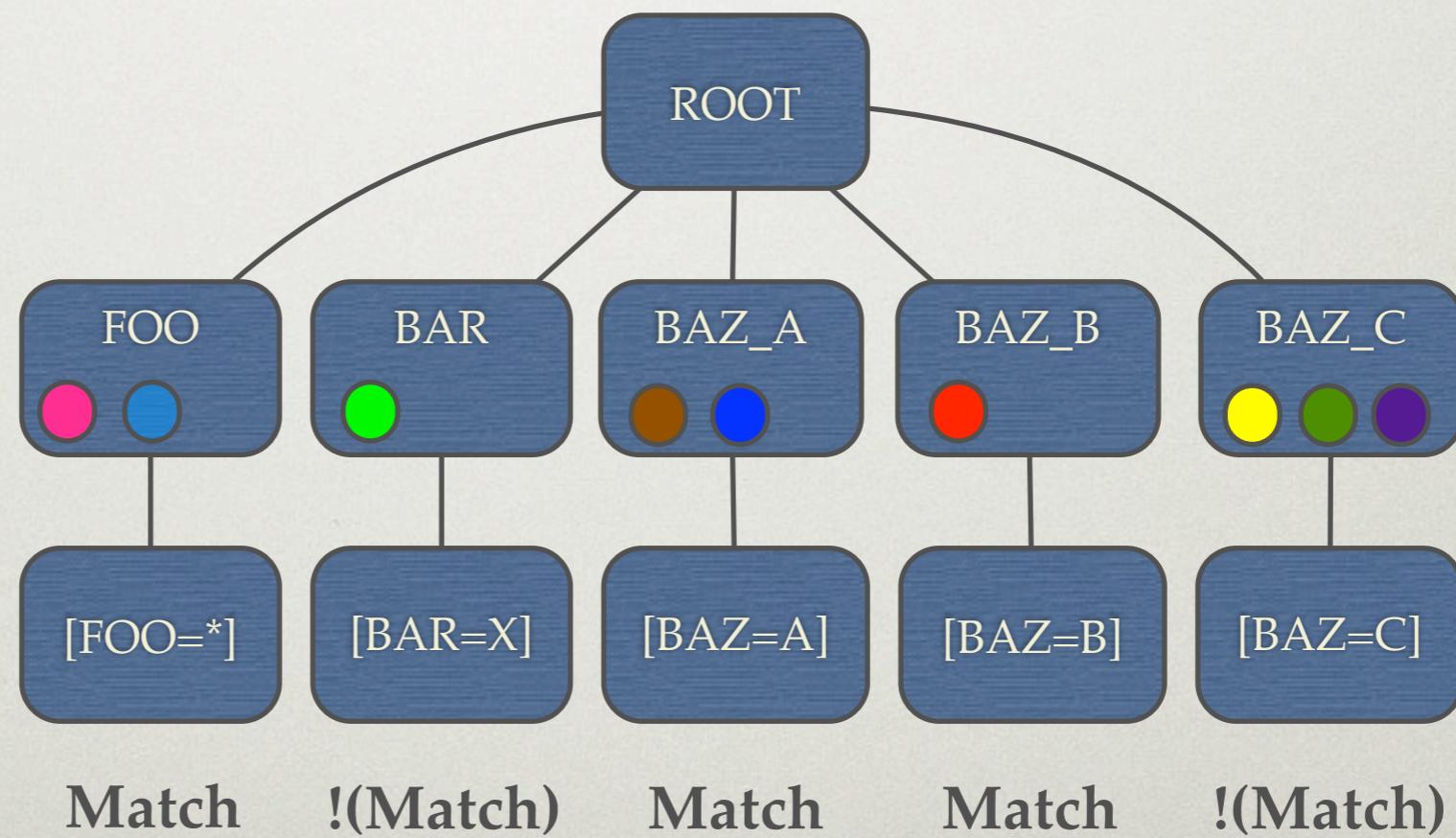


Attribute	Values
FOO	TRUE
BAR	
BAZ	A,B





Attribute	Values	Permissions
FOO	TRUE	● (Pink) ● (Blue)
BAR		
BAZ	A,B	● (Brown) ● (Blue) ● (Red)



BUT COACH LOOKUP IS  
A SPECIAL CASE...

# DEPLOYMENT

RELEASED AS A  
SINGLE WAR

**“STANDALONE MODE”  
REALLY ONLY USABLE  
FOR DEV**

**NO EA. NO REPORTS.**

COULD  
THEORETICALLY  
DEPEND ON LDAP FOR  
AUTHN AND AUTHZ

ALL CURRENT  
DEPLOYMENTS RUN  
SSP AS AN OVERLAYERED  
PORTLET APP

# UPLATFORM/SSP PLATFORM

← → C GitHub, Inc. [US] https://github.com/Jasig/uPortal/tree/ssp-master/uportal-portlets-overlay/ssp ⭐ 📁 🌐 🎯 ⏹

Holly (17) Read Later in pinboard Add To pinboard.in Pinboard: bookmark Java SE 6 Documents Groovy JDK Confluence – Unicon »

This repository Search or type a command ⚙ Explore Gist Blog Help dmccallum ⌂ ⌄ ⌅ ⌆

PUBLIC Jasig / uPortal Pull Request Unwatch Star 72 Fork 82

Code Network Pull Requests 9 Graphs

Enterprise open source portal built by and for the higher education community.

<http://www.jasig.org/uportal>

Clone in Mac ZIP HTTP SSH Git Read-Only git@github.com:Jasig/uPortal.git Read+Write access

branch: ssp-master Files Commits Branches 18 Tags 130

uPortal / uportal-portlets-overlay / ssp / + History

NOJIRA Update version to 1.2.0-b2-SNAPSHOT

dmccallum authored a month ago latest commit b0c3718097

..

pom.xml a month ago NOJIRA Update version to 1.2.0-b2-SNAPSHOT [dmccallum]

WITH SOME WORK  
COULD DROP IN TO  
VANILLA UPORTAL

NEEDS LARGE  
QUANTITY OF GROUP/  
PERMS CONFIG

...AND  
PermissionsService

APIS

# REST

ALL JSON, ALL THE  
TIME

**VERY BROAD**

BUT FAIRLY  
CONSISTENT

**DOCS NOT AUTOMATED**

BUT ARE ACTIVELY  
MAINTAINED

[https://wiki.jasig.org/display/SSP/API  
+Documentation](https://wiki.jasig.org/display/SSP/API+Documentation)

# API Documentation

 Edit

 Share

 Add

 Tools

Added by [Alexander Leader](#), last edited by [Jason Elwood](#) on Mar 29, 2013 ([view change](#))

- [Person Data](#)
- [Reference Data](#)
- [Form Data](#)
- [General Notes](#)
  - [API result limits](#)
  - [ObjectStatus](#)

This page documents the various APIs that are available through Student Success Plan.

## Person Data

- [Appointment](#)
- [Caseload](#)
- [Challenge](#)
- [Early Alert](#)
- [Early Alert Response](#)
- [Goal](#)
- [Instruction](#)
- [Journal Entry](#)
- [MAP](#)
- [Person](#)
- [Person Search](#)
- [Program Status](#)
- [Task](#)
- [Transcript](#)

## Reference Data

- [Campus](#)
- [Campus Early Alert Routing](#)
- [Campus Service](#)
- [Category](#)
- [Challenge](#)

# jasig Person Early Alert API

 Edit  Share  Add  Tools

Added by [Alexander Leader](#), last edited by [Jason Elwood](#) on Mar 24, 2013 ([view change](#))

## Get All Early Alerts for a Person

GET /ssp/api/1/person/{id}/earlyAlert

### Security

PERSON\_EARLY\_ALERT\_READ

### Parameters

status : ALL, ACTIVE, INACTIVE

start : First result (0-based index) to return

limit : Maximum number of results to return

sort : Property name

sortDirection : Ascending/descending keyword (ASC/DESC or ASCENDING/DESCENDING)

### Returns

```
{"success" : "true",
"results" : "100",
"rows" :
[{"id" : "6201b18d-9d1d-48d3-82d4-092e52ad676b",
"createdBy" :
 {"id" : "91f46e39-cea8-422b-b215-00f6bcf5d280",
 "firstName" : "John",
 "lastName" : "Doe"},
"createdDate" : "1332216000000",
"modifiedBy" :
 {"id" : "91f46e39-cea8-422b-b215-00f6bcf5d280",
 "firstName" : "John",
 "lastName" : "Doe"},
"modifiedDate" : "1332216000000",
"objectStatus" : "ACTIVE",
"courseName" : "MTH-100",
"courseTitle" : "Introduction to Math"}]
```

# API SECURITY STILL AN OPEN ISSUE

EXPECT OAUTH OR  
SOMETHING OAUTH-  
LIKE

FOR NOW, NEED TO  
EMULATE A UP LOGIN

# **SSP API CALLS**

# **BYPASS PORTLET**

# **REQUEST DISPATCH**

<https://gist.github.com/dmccallum/5671968>

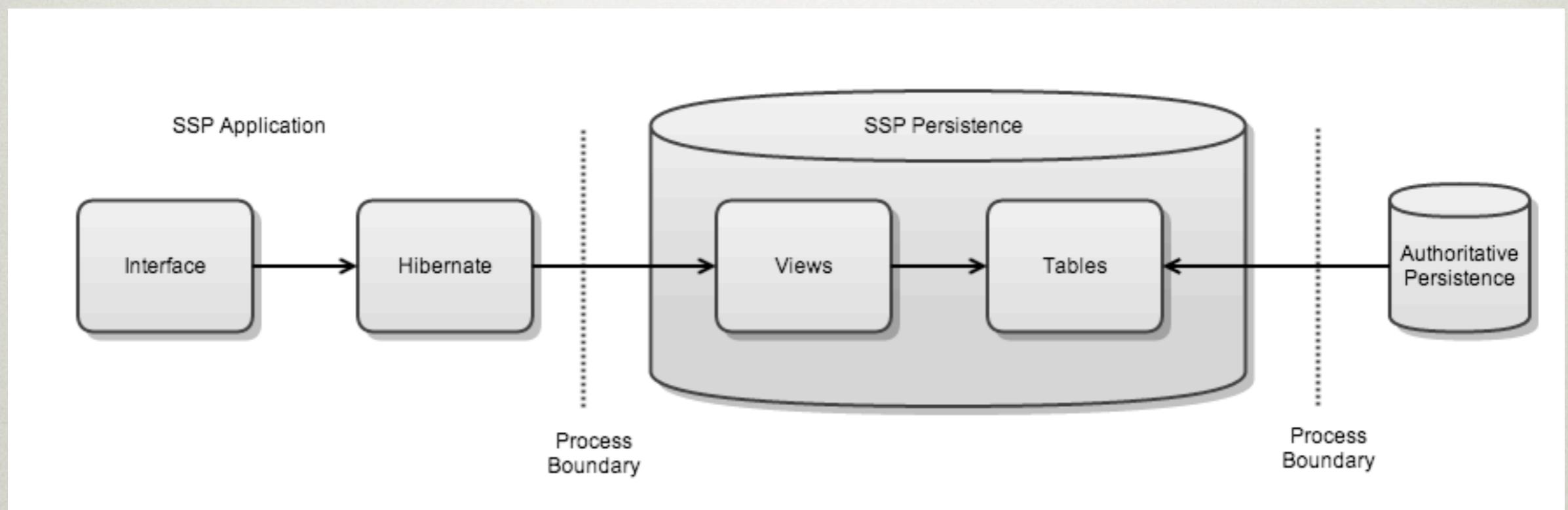
# DATA INTEGRATIONS

<https://wiki.jasig.org/display/SSP/SSP+Data+Integration+Strategies>

# TWO BASIC OPTIONS

# 1. PUSH

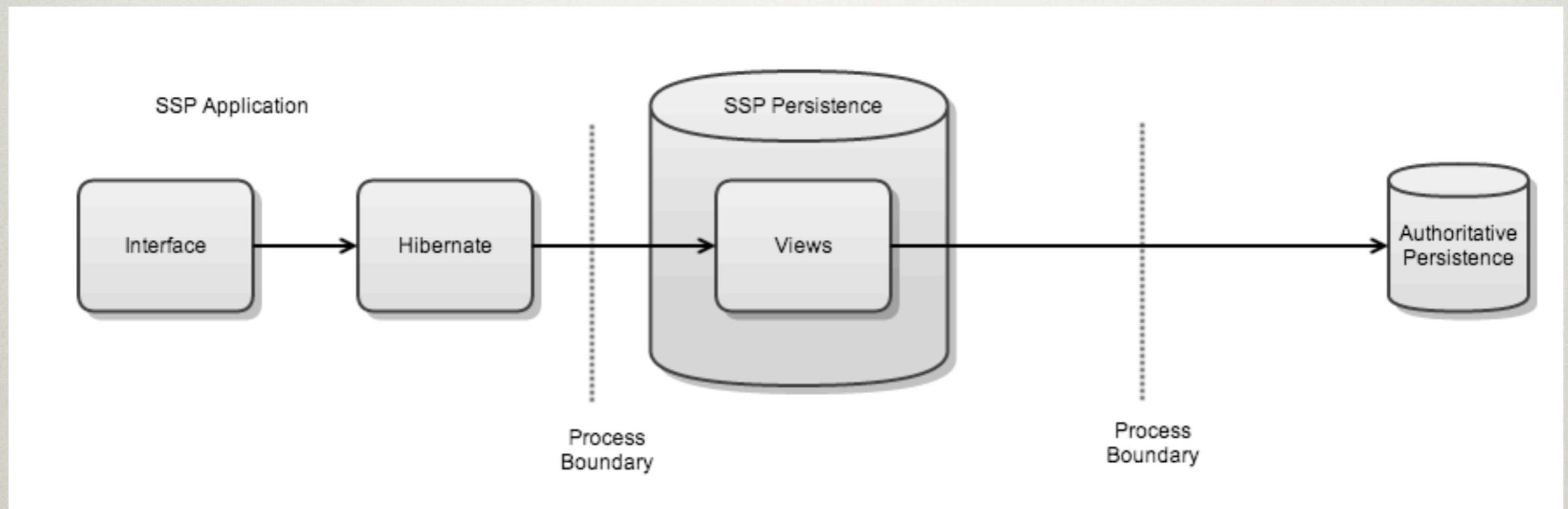
THIS IS WHAT  
EVERYONE ACTUALLY  
DOES



# 2. PULL

NOT HIGHLY  
RECOMMENDED

...AND MIGHT GO AWAY



# DOCS

[https://wiki.jasig.org/display/SSP/SSP+Integration  
+Documents](https://wiki.jasig.org/display/SSP/SSP+Integration+Documents)

			cases. Examples include uu351764, john.smith, jdoe, etc.	
first_name	varchar(50)	No	Student's first name.	John
middle_name	varchar(50)	Yes	Student's middle name.	Michael
last_name	varchar(50)	No	Student's last name.	Doe
birth_date	date	Yes	Format YYYY-MM-DD.	1980-07-01
primary_email_address	varchar(100)	Yes	Student's primary email address. Typically the institution-assigned email address.	<a href="mailto:john.doe80@university.edu">john.doe80@university.edu</a>
address_line_1	varchar(50)	Yes	Student's first address line.	5566 Campus Avenue
address_line_2	varchar(50)	Yes	Student's second address line.	Apt 1A
city	varchar(50)	Yes	City component of student's address.	College Corner
state	varchar(2)	Yes	State component of student's address. Use two character state abbreviation.	AZ
zip_code	varchar(10)	Yes	Zipcode from Student's address. Will accept either XXXXX or XXXXX-XXXX formats.	10001.00
residency_county	varchar(50)	Yes	The county of residence	Hamilton
non_local_address	char(1)	Yes	Indicator that the address is not local	FALSE
home_phone	varchar(25)	Yes	Student's home phone number.	111-555-2222
work_phone	varchar(25)	Yes	Student or staff's work phone number.	111-555-2223
cell_phone	varchar(25)	Yes	Student or staff's cellular/mobile	111-555-2223

# REPORTS

~20 PRE-DEFINED  
REPORTS

EXTENSIVE FILTERING  
OPTIONS FOR EACH

## Reports and Forms

Select a report: General Student Report

### General Student Report

Home Department: Not Used

Assigned Coach: ALL

Program Status: Not Used

Student Type: Not Used  
CAP  
EAL  
ILP

Service Reason: Not Used  
Service Reason 1  
Service Reason 1  
Test Service Reason

Special Service Groups: Not Used  
Group 1  
Group 2  
Test Service Group

Referral Source: Not Used  
Referral Source 1  
Referral Source 2  
Referral Source 3

Date Range Student Entered:

Term: Not Used

**use date range**

Actual Start Term: Not Used

Actual Start Year: Not Used

Anticipated Start Term: Not Used

Anticipated Start Year: Not Used

Output Type: pdf   
csv

**submit**

REPORTS DESIGNED IN  
IREPORT AND  
RENDERED BY JASPER

DEV TEAM KEENLY  
INTERESTED IN A MORE  
GENERIC OLAP  
APPROACH

...AT LEAST FOR A  
SUBSET

**COME SEE THAT TALK  
ON THURSDAY!**

# BUILDING A SSP TOOL

DON'T MISINTERPRET  
TOOLS AS PLUGINS

BUT HERE'S THE  
WORLD'S SIMPLEST  
SSP TOOL...

```
1  /*...*/
19 Ext.define('Ssp.store.Tools', {
20     extend: 'Ext.data.Store',
21     mixins: [ 'Deft.mixin.Injectable' ],
22     inject: {
23         authenticatedPerson: 'authenticatedPerson'
24     },
25     model: 'Ssp.model.Tool',
26     autoLoad: false,
27
28     constructor: function(){
29
30         var me=this;
31         me.callParent( arguments );
32
33         var sspTools = [{ group:'beta', name: "Main", toolType: "profile", active: true },
34                         { group:'beta', name: "Intake", toolType: "studentintake", active: true },
35                         { group:'beta', name: "Action Plan", toolType: "actionplan", active: true },
36                         { group:'beta', name: "Journal", toolType: "journal", active: true },
37                         { group:'rc1', name: "Early Alert", toolType: "earlyalert", active: true },
38                         { group:'rc1', name: "MAP", toolType: "map", active: true },
39                         { group:'rc1', name: "Accommodation", toolType: "accommodation", active: true },
40                         { group:'rc1', name: "", toolType: "earlyalert", active: false },
41                         { group:'rc1', name: "Legacy Remarks", toolType: "legacyremarks", active: true },
42                         { group:'rc1', name: "Documents", toolType: "documents", active: true },
43                         { group:'rc1', name: "-----", toolType: "earlyalert", active: false },
44                         { group:'rc1', name: "Config Link", toolType: "earlyalert", active: false },
45                         { group:'rc1', name: "Program Viewer", toolType: "earlyalert", active: false },
46                         { group:'rc1', name: "MAP Help", toolType: "earlyalert", active: false },
47                         { group:'rc1', name: "-----", toolType: "", active: true },
48                         { group:'rc1', name: "Demo Tool", toolType: "demo", active: true }
49
50         */
51     }
52 }
```

```
JS Demo.js x JS DemoViewController.js x
1  /* */
19 Ext.define('Ssp.view.tools.demo.Demo', {
20     extend: 'Ext.form.Panel',
21     alias : 'widget.demo',
22     mixins: [ 'Deft.mixin.Injectable',
23               'Deft.mixin.Controllable'],
24     controller: 'Ssp.controller.tool.demo.DemoViewController',
25     initComponent: function() {
26         Ext.applyIf(this, {
27             title: 'Demo',
28             defaults: {
29                 labelWidth: 150
30             },
31             items: [
32                 {xtype: 'displayfield',
33                  fieldLabel: 'Server Date',
34                  name: 'serverDate',
35                  itemId: 'serverDate',
36                  renderer: function(val) {
37                      return Ext.util.Format.date(val, 'm/d/Y');
38                  }
39             }, {
40                 xtype: 'displayfield',
41                 fieldLabel: 'Server Timestamp',
42                 name: 'serverTimestamp',
43                 itemId: 'serverTimestamp'
44             }]
45         });
46
47         return this.callParent(arguments);
48     }
49 });
```

← → ⌂ [localhost:8080/ssp/api/1/server/datetime?\\_dc=1370033992529](localhost:8080/ssp/api/1/server/datetime?_dc=1370033992529)

 Holly (17)  Read Later in pinboa  Add To pinboard.in  Pinboard: bookmark  Java

```
{  
    timestamp: 1370034248481,  
    date: "2013-05-31"  
}
```

```
JS Demo.js x JS DemoViewController.js x
1  /* */
19 Ext.define('Ssp.controller.tool.demo.DemoViewController', {
20     extend: 'Deft.mvc.ViewController',
21     mixins: [ 'Deft.mixin.Injectable' ],
22     inject: {
23         apiProperties: 'apiProperties'
24     },
25     control: {
26         serverDateField: '#serverDate',
27         serverTimestampField: '#serverTimestamp'
28     },
29
30     init: function() {
31         var me = this;
32         me.apiProperties.makeRequest({
33             url: me.apiProperties.createUrl( me.apiProperties.getItemUrl('serverDateTime') ),
34             method: 'GET',
35             successFunc: me.renderServerDateTime,
36             scope: me
37         });
38     },
39
40     renderServerDateTime: function(r) {
41         var me = this;
42         var jsonData = Ext.decode(r.responseText);
43         var date = Ext.Date.parse(jsonData.date, 'c');
44         me.getServerDateField().setValue(date);
45         var time = new Date(jsonData.timestamp);
46         me.getServerTimestampField().setValue(time);
47     }
48
49 });

```

Students Admin

**Students**

» **Student: Savannah\_Foo\_Bar Coffey - ID#: scoffey**

Tools

Main  
Intake  
Action Plan  
Journal  
Early Alert  
MAP  
Accommodation

-----  
Config Link  
Program Viewer  
MAP Help  
Demo Tool

**Demo**

Server Date: 05/31/2013  
Server Timestamp: Fri May 31 2013 13:59:52 GMT-0700 (MST)

# RESOURCES

<http://www.studentsuccessplan.org/>

[https://wiki.jasig.org/display/JSG/Student+Success  
+Plan+Lists](https://wiki.jasig.org/display/JSG/Student+Success+Plan+Lists)

<https://wiki.jasig.org/display/SSP/jasig-ssp+IRC+Logs>

<https://wiki.jasig.org/display/SSP/Home>

<https://issues.jasig.org/browse/SSP>

<https://github.com/Jasig/SSP>

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