

INSTRUCTIONAL --- ARCHITECT™

Instructor's Guide - 45 min - 1 Hour Curriculum

Notes on delivery:

This curriculum is designed for delivery in a face-to-face environment using primarily a Problem-Based Learning (PBL) approach. Through our experiences, we have found it is crucial to present the face-to-face workshop in a computer lab where everyone has their own computer with Internet access. It is also helpful if the facilitator has a projector to show the participants systematic keystrokes and mouse movements. The curriculum has been modified from the full 5-7 hour delivery time to 1 hour. There is limited time to conduct some of the typical "Before the Workshop" activities, such as the pre-survey and an ice-breaker exercise. If there is time and if you think it would be useful, you may want to ask about participants' comfort with technology and how often they use it in the classroom. Also, I found it useful to have a relatively tech-savvy assistant "driving" the computer that's connected to the projector while you talk. It does not matter if they are familiar with IA, just as long as they are comfortable learning in a highly visible way. This allows you to provide instruction without having to stop talking to click or type.

The numbered sections below correspond to the sections on the student handout.

Instructor's Guide: Day One

1.0 Introduction to the Instructional Architect (IA) (15 min)

- Introductory questions to ask:
 - What do you do when you find a cool website or something online? How do you save it?
 - When you want to use the cool thing you found, what do you have to do?
 - How do you share what you've found with other teachers?

- What is the Instructional Architect? Very simply, an online tool that helps organize stuff you find online. It is free. **It was developed at Utah State University in 2002 with funding from the National Science Foundation.** (*Very important to say.*) It was developed for teachers to use with their students, but students could also use it to create projects. The purpose of this short session is to show participants:
 - the types of projects they can create with IA
 - how to find projects in IA

- how to create projects in IA

Introduction to the National Science Digital Library (NSDL)

- Give a brief explanation about the NSDL, specifically that it is a portal to other libraries with online resources. At the beginning of 2007, there were over 2 million resources from over 800 participating libraries. AMAZING!!! And all designed for educational purposes. The majority of the stuff in NSDL is free. Things to highlight quickly:
 - **First Time Users:** http://nsdl.org/resources_for/first_time_users/
 - **K12 Teachers:** http://nsdl.org/resources_for/k12_teachers/
 - **K12 Concept Maps:** <http://strandmaps.nsdl.org/>
 - **NSDL Just-in-Time handout:** walk through the steps
 - Mention the short list of sample resources from Resource List handout
 - Allow participants to explore on their own
- Big Picture Demonstration: Give the participants a demonstration of an Instructional Architect project by having them login as your student. *Emphasize that they will be setting up a similar account for their students to use and that what they are seeing is what students will see.* This gives participants the “big picture.” Give the participants time to explore and experiment with the outstanding online learning resources you have included. Providing exciting resources, which are targeted to your audience, will help motivate the participants and increase the quality of the projects they will create at the end of the workshop.

Write your student login name here: _____

(Note: the text is case-sensitive.)

- What's the difference between Project Info & Projects? Information in the Project Info is provided by the teacher who created the project. They can provide this information as part of their profile, so it will automatically be associated with every project they create. Or, they can modify and add information at the "Publish" step of creating a project. Projects are what you create. They have a title, introduction and a place to put links to online stuff.
- IA Feature Demonstration: This step shows participants how to find projects like the one just demonstrated. Make sure that participants know that there are non-science projects created in IA. Allow participants to explore on their own after walking them through these steps.
 - From the homepage: <http://ia.usu.edu>
 - Project Showcase: Projects listed here change regularly. This page provides different ways of seeing the types of projects in IA. They are organized by number of hits, recently created and number of resources.
 - Go back to the homepage

- Browse Teacher Projects: This screen shows many ways to find projects on a specific topic
 - Search by: Keyword: when you search by keyword, the Project Info and the text within the project are being searched. **Astronomy**
 - Browse by: Author's Last Name, Title, or ProjectID (the last four numbers of the project URL, Ex. **ia:3352; Lanfear; Organic Chemistry Lab**). When you browse, you are searching only the Project Info, which is provided by the teacher who created the project.
 - Browse by subject and grade level: again, you are searching Project Info

The workshop shifts at this point from a style of overview and sample searches with the workshop facilitator doing most of the talking to demonstrating specific activities with IA, primarily registering, creating projects and selecting content. The facilitator will still do most of the talking, but with such a tight timeframe, it is important that the participants keep up as you work through these steps. It might be good to have another person who is familiar with IA to walk around the room and help participants in addition to the facilitator.

2.0 Register with IA (5 min)

- I am a Guest vs. Register: There are two ways to create projects in IA. 1) Participants interested in testing the system can click the "I am a Guest" button on the homepage. They can create projects and add online resources to them; however, anyone else using the Guest login can modify those projects. Also, there is not a student login associated with the Guest login. 2) Participants can register for free. This allows them to create and later modify a personalized list of useful online resources and projects, comment on resources, and associate a student login with their projects. IA has a privacy policy that includes never sharing email addresses with a third party. **Here is the privacy policy:** <http://ia.usu.edu/privacypolicy.php>
- Walk participants through the registration process. From the homepage, click on "I Am a Teacher," and then click on "Register." Although participants only need to complete the "Login Info" box to complete the registration process, filling in the information on the rest of the page allows IA to personalize services for participants and will streamline the process for publishing projects. Much of this information explaining these features is contained on the left side of the screen. Talk through this with participants to help them make informed choices about the information they input. Important: Make sure teachers understand difference between teacher and student login
 - *In the short form this is the most likely spot to get behind on time. Every minute spent here is less time for participants to work on their own projects, but they may get really frustrated if you breeze through this section. One option might be for you to "demo" here without the expectation of them following along, then be ready to help them as they*

create their own. Make sure you pause frequently and ask for questions if you go that route.

3.0 Creating a Project Framework (10 min)

- *For this section, I like to demonstrate each activity first and have participants watch; then we go through the steps together in a guided activity. I prefer to start with creating the framework of the project. Then I like to go over gathering resources. This gives participants a chance to see where their resources will go. There is an online help sheet that shows the steps of this process: My Projects: <http://ia.usu.edu/viewproject.php?project=ia:2628>*
- Start from the very beginning of creating a project. Log yourself out while you're transitioning to this activity, and begin from the homepage by logging in as a teacher. When you read the My Project page, point out the navigation links in the very top bar. Participants will always know where they are because the yellow bar will underline what step they are on.
- In the top navigation bar, click on Create New Project. When the page is loaded, highlight the navigation bar again, noting that the yellow line is under Step 1 of Author Project. Also point out Save and Save & Add Content buttons at the bottom. These also allow participants to navigate through the project. Each page has these navigation buttons so participants don't have to use the "back" and "forward" buttons in their browser. Remind them to save their work often.
- Proceed to Step 2. Tell participants that for the moment, they will only focus on the right side of the screen, and put information into the text boxes. Enter some text, and after you click Save & Preview...
- ... remind participants again of where they are in the process (Step 3) and note that they can go back and forth between Steps 2 and 3 as many times as necessary while they are creating a project
- Proceed to Step 4, Publish Options. Quickly talk through the publishing options.
 - Clicking Student allows only the participants' students to see the project. To make this feature work, participants should have created a Student Login in their Profile or during the registration process. Clicking Public allows anyone coming to IA to find a participant's project through the various search features. Students can access participants' projects this way, too, but they do not need a login. Clicking neither of those options means the participant's project remains private. The only way to see that project would be for a participant to login and view it through their personalized My Projects page or by typing in the IA Project Number.
 - Selecting Project's Subjects, Grade Level: If participants entered this information when they registered, it will be automatically represented here. If they would like to change it for a specific project, they can do that at this step. Remember: this information goes into the Project Info page and lets people find the project when they're searching or browsing.
 - Core Curriculum Standards: If possible before the workshop, identify whether the state level curriculum standards for your audience are

available online, and provide the link in the resources list. Encourage participants to associate a standard with their project.

- At Step 5, participants will see several pieces of information.
 - Access to the project: Student, Public; if neither are accessible, this means the project is private.
 - Project URL: <http://ia.usu.edu/viewproject.php?project=ia:3811>. The last four digits in the URL are unique to the project; they are the IA Project Number. If a project is private, it is still possible to find the project if a participant knows this number. Every new project participants create will have a new, unique IA Project Number.
 - Email: Send the project URL to someone
 - SCORM: an advanced topic that will be explained in the second session.

4.0 Selecting & Adding Content to a Project (10 min)

- From the final page where projects are successfully created, have everyone click My Projects in the top navigation bar. Their newly created project should be listed. The other features on the My Projects page will be explained in the second workshop. Ask everyone to watch you demonstrate how to find resources, and then you will all do the activity together.
- Click My Resources from the top navigation bar. Explain what participants are seeing:
 - Make a new folder: Participants can put resources into folders. For session one, skip this step, and use the default folder. There will be more detail about this in session two.
 - Gather new resources: These are the three ways to get content into a project
 - Click on Search NSDL: Instead of going to NSDL.org, participants can search it directly from IA. Do a sample search. Show how searches can be limited with the optional search criteria. Show how you can see the resource by clicking on its title. Show a More Info page. When you put in a search term, the More Info page for a resource is being searched. When you are done saving NSDL resources to a folder (see below), click the My Resources link in the top navigation to show how resources look when they are saved to a folder.
 - From that page, select Browse IA projects. The searching and browsing that participants did earlier will be the same here. But now that they are logged in, they will be able to save projects as resources. When you are done with this step, click the My Resources link again to view the saved resources.
 - For searching NSDL and searching IA, show how to select a resource by checking the box next to it, then choose a folder (Default for this demonstration), then click ok. For all of the

resources that are selected on a page, you should save them to a folder before going on to the second page.

- Click Add your own resources. Participants can add online resources that they already have. You must enter a title and a valid URL. Hint: open a separate browser window and check the URL before adding it. Once you click save, you will be taken back to the Manage Resources page.
- Now that you have demonstrated how to find content, demonstrate how to add it to a project.
 - Click the My Projects link in the top navigation. Find the sample project already begun, and click Edit Content from the list beside it. Have participants note that they are at Step 2 of creating a project.
 - Highlight the box at the right, which should contain all of the resources that participants have selected. Click on the three arrows highlighted in green (>>>) to move the link to the resource into the project body. (No more copy and pasting!) Remind participants again to save their work often, and then click Save & Preview to show them how the project looks. When they click Save, there is no need to complete the rest of the steps again to publish the project; it is automatically updated.

5.0 Create individual IA projects (10-20 min)

- Encourage participants to practice creating a project and finding and adding content. The facilitator should walk around the room and be available to answer questions. Given the short timeframe, it would be especially useful to have another person familiar with IA to also help participants. The goal is for every participant to create a project that they can potentially use in their classes but also be able to work on it during the second session.
- During this time, pass around the sign-in sheet and remind people about the listserv and other support available.

6.0 Wrap-up (If there's time...)

- Have a quick (5 min) discussion for participants to share the topics of the projects they created, and ask if there are any questions about how to use IA.
- Mention the Resource List located on the front of the student handout.