READING (AMONG) THE TREES:
THE CAMPUS PLANTS AS A LIVING LIBRARY

DAVID Strauch, CURATOR, UH CAMPUS ARBORETUM
What makes a library?

Materials
What makes a library?

Materials

What makes an arboretum?
What makes a library?

Materials

Records

What makes an arboretum?
What makes a library?

- **Materials**
- **Records**

What makes an arboretum?
What makes a library?

Materials

- **Materials**

What makes an arboretum?

Records

- **Records**

Interpretation

- **Interpretation**
What makes a library?

Materials

Records

Interpretation

What makes an arboretum?
King Prajadhipok of Siam planted Chaulmoogra (*Hydnocarpus anthelmintica*) in honor of Alice Ball for her work on Hansen’s Disease using this tree. Botanists and horticulturalists added plants collected on their work in the Pacific and beyond; the golden variety of *Delonix regia* shown in the background was originally collected at the Papeari Botanical Garden on Tahiti in 1975, by Horace Clay, whose name it now bears. Visiting scholars who came to give lectures at UH, like Carl Sandberg, often planted a tree while they were here.
Building an inventory

A botanical garden is more than a collection of plants — it is also a set of carefully kept records about the plants.

We had the plants, but not the records, so...

in 2011, Roxanne Adams, Director of UH Buildings and Grounds Management (BGM) initiated an inventory of the existing plants and a project to map and collect information.
Records

Classing attributes
Records

Attributes understood as metadata

DarwinCore is a modified DublinCore schema used for biological collections
Records

Metadata in a digital library

A working Greenstone Library prototype of the dedicated trees
Campus map shows > 5000 plants
Allows multiple kinds of queries
Gives scientific and cultural info
Provides links to other databases

http://manoa.hawaii.edu/landscaping/plantmap.html
Records —> Interpretation

Metadata, searching and users

Records (Metadata)

Search Tools

Interpretation (Usability)

Organization of metadata structures types of searches available to users
Interpretation

Special Collections
Interpretation

Special Collections

Let’s look at some tools...

Namesake, Memorial, and Commemorative Trees

UH Mānoa has several kinds of special, celebrated trees, which commemorate people and events important to the university.

In 1949, UH President Gregg M. Sinclair (for whom the library was named) sponsored a ceremony to celebrate the 25th anniversary of an early tree planting initiative on campus, antecedent David Starr Jordan. The program for this ceremony included the “namesake trees,” which were trees associated with the people who planted them. Later this tradition of tree-planting was continued by luminary contributors, including Johnson, and the crown prince and princess (later emperor and empress) of the Japanese Empire. Some graduating classes have also planted trees of their time on the campus.

Other trees were planted as “memorial trees” to honor the memory of people who had passed on. A few of these date to the early years of the university, and have remained on campus for the last several decades. Similarly, “commemorative trees” were planted to honor occasions or institutions, and were often planted on the anniversary of a special event.

Celebrated Trees

In addition to the thematic collections, which are comprised of species (or other taxa), UH Mānoa also has a couple of special collections of trees whose importance belongs to the individual tree, which are remarkable for their planting history or their particular character. Trees which were planted by particular people, or as memorials to people or occasions, are listed on the namesake trees page. We also have seven state-listed Exceptional Trees, described below (largely from the UHM Campus Heritage Report).

<table>
<thead>
<tr>
<th>Exceptional Trees</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Baobab</strong></td>
</tr>
<tr>
<td>Adansonia digitata</td>
</tr>
<tr>
<td>Bombacaceae</td>
</tr>
<tr>
<td>Located near the Art Building, this tree is one of the largest on campus. Native to Africa, it dominates the landscape with its enormous trunk. Many useful products can be created from this tree. From the fruit comes an exotic drink and from the seeds, a red dye. The bark, can be made into rope and medicine.</td>
</tr>
</tbody>
</table>

| **Cannonball tree** |
| Couroupita guianensis |
| Leguminosae |
| Planted in 1933 by the playwright Thornton Wilder on the makai side of Sinclair Library, the Cannonball tree is nearing extinction in the wild. Native to northeastern South America, the tree is named for the dozens of round, cannonball-like bocconia fruits that it produces. |
Interpretation

Hawai‘i Librarians’ Association (HLA) Poster Conference

The Campus Plant Digital Library Project

David Strauch
Matthew Kānekoa
Cynthia Engle

Systems Analysis for Information Management
Focus on Creating Digital Libraries
with emphasis on our project
and to our project manager,
Roxanne Adina, Eileen Herring

Background

The goal of this project is to create a digital library of plant information for the University of Hawai‘i at Mānoa. This project aims to provide a centralized and accessible platform for researchers, students, and the general public to access plant information.

The Information Problem

Currently, plant information is scattered across various departments and is often difficult to access and integrate. The project seeks to address this by creating a comprehensive digital library that integrates and enhances the existing plant knowledge.

University of Hawai‘i

Researcher

Campus Plants

Our Analysis

The project involves developing an interface that allows users to search and access plant information. The system will be designed to be user-friendly and accessible to a wide range of users.

Campus Plant Project

Areas of Focus:

- Database Management
- Information Architecture
- User Experience

The Data Flow Diagram (right) shows relationships of the Campus Plant Project with other components of the University.

- The current Campus Plant Map (below) provides a graphical interface to a library of information collected on individual plants as well as plant species.

- Interfaces for different users can provide information through a map (left) or a catalog (right) while drawing on the same underlying data.

- The same set of metadata can be described schematically (below left) or listed (below right), before being formatting into a visible record.

Note: Room/resized and graphic resources which show features at multiple views simultaneously.