IOWA STATE UNIVERSITY

OF SCIENCE AND TECHNOLOGY

Preservation Department

CONSERVATION CONDITION REPORT AND TREATMENT PROPOSAL

Date received: 11/20/2019 **Date of report**: 02/13/2020 **Conservator**: Sonya Barron **Call Number**: 21/07/136

Title: Collection of botanical specimens in various formats

Author/Creator: Cora Keith and others

Imprint/Date of creation: 1875 **Collection:** Cora Belle Keith Pierce

Curator/Archivist: Greg Bailey/ Rachael Acheson

Format: Bound volume, loose pages, loose specimens, loose labels

Materials: Dried plants, leather, book cloth, machine-made paper, cardboard, printing ink, iron gall ink. **Dimensions:** various; when stacked together, approximately **H** 27.9 **cm x W** 21.6 **cm x Th** 10.5 **cm**

Notes: The bound volume contains botanical specimens collected by a class taught by Professor Besse in 1875. Cora Keith was a student in that class, which graduated in 1877. Some of the loose botanical specimens were matched to loose labels by Dr. Deb Lewis, Curator of the Ada Hayden Herbarium. Dr. Lewis recommended that it is appropriate to place moss and lichen specimens into paper pockets rather than to adhere them onto mounting papers. This facilitates identification and study of these particular types of plants.

CONDITION REPORT

Description

The storage box contained a bound volume and a stack of cardboard sheets. The following materials were found in the stack:

- -unmounted dried pressed botanical specimens
- -loose handwritten labels with plant names and collection sites
- -loose sheets from a different bound herbarium volume, with mounted specimens

The bound volume is a standard herbarium album, typical for the late 1800's. The ISU Ada Hayden Herbarium's holdings include several examples of such albums produced at ISU in 1875 and 1877. The label on the library's album reads "Class Collections, I.S.A.C., 1875".

The binding is a three quarter style leather and cloth binding. The textblock is stubbed and wedge shaped. The paper of the textblock is machine-made, medium weight paper. Dried pressed flowers are mounted onto the pages, on the recto only. Botanical collecting labels have been adhered to the bottom right corner of each page. The labels have pre-printed information as well as handwritten information in iron gall ink. Some of the pages had been cut out from the volume and inserted back into it. All pages are numbered at the top right corner in graphite.

The unmounted botanical specimens contain mosses, lichens and flowering plants. The loose pages with mounted specimens did not come from the bound volume, as evidenced by pages numbers printed in blue ink and a difference in paper. These specimens include mosses, a lichen and ferns.

Condition

Bound volume:

There are insect frass and crushed plant fragments in between the pages. The binding is in good condition and does not require repair. The paper of the textblock is in good condition overall. Some of the pages have losses and abrasions, where plants have been forcibly detached from the paper support. Many of the botanical specimens and their collecting labels are missing from the pages, leaving only brown impressions on the paper. Some specimen fragments have become detached and are now stored loose between the pages, near the gutter. In some cases, the detached plant parts are big enough and mostly intact. These can be reattached to the page, using the brown plant impressions as a guide. In other cases, the detached parts are either missing or too are too damaged to reattach. The collecting labels are in good condition. They are securely attached, with some fading of the iron gall ink.

Loose pages and unmounted specimens:

The unmounted specimens are largely intact and in stable enough condition to be mounted or housed in a pocket. The collecting labels are in good condition, with some fading of the iron gall ink. The paper of the loose pages with mounted specimens is brittle and discolored. There are tears, losses and creases along the edges.

TREATMENT PROPOSAL

- 1. Bound volume:
- -Brush away insect frass and crushed plant fragments.
- -Reattach loose fragments of plant specimens, where the original location can be determined.
- -Where an original location cannot be determined, place loose plant fragments in small paper pockets, where appropriate. Leave packets in between pages, where the fragments were found, label each packet with page number.
- -Reinforce damaged areas of the paper, using wheat starch paste and Japanese tissue.

2. Loose pages with mounted specimens:

- -For the two fern specimens, mend tears and reinforce fragile areas, using wheat starch paste and Japanese tissue and place into a folder
- -For the page of mounted moss specimens, cut out specimens with scissors and place each specimen, with paper support, into a foldable paper pocket. Attach the specimen pocket to a mounting paper.

3. <u>Unmounted specimens:</u>

- -Place moss and lichen specimens in paper pockets and attach the pockets to mounting papers.
- -Adhere flowering plant specimens to mounting paper, using wheat starch paste and a brush. Where applicable, attach the matching collecting label to the lower right corner of the mounting paper.
- -Where a plant name is identified by Dr. Lewis, record it in the lower right corner of the mounting paper.

Estimated hours: 15

Photos on file: BT, DT, AT

Curatorial Approval Signature:		
Date signed:		

CONSERVATION TREATMENT REPORT

1. Bound volume:

- -Brushed away insect frass and crushed plant fragments with a soft fan brush.
- -Reattached loose fragments of plant specimens using wheat starch paste. This was done only where the original location of the fragment could be matched to the corresponding stain on the page.
- -Where the original location could not be determined, the loose plant fragments were placed into small paper pockets or larger translucent paper folders. The packets were inserted in between the pages, where the fragments were found. The packets were labeled with the page numbers.
- -Mended tears in the pages with light weight Japanese tissue an wheat starch paste. Filled losses with patches of remoistenable tissue on the verso and shaped fills of heavy weight Japanese tissue on the recto, using wheat starch paste

2. <u>Loose pages with mounted specimens:</u>

- Mended tears in the mounting paper of the two fern specimens and the mounted moss specimen, using wheat starch paste and light weight Japanese tissue. Placed the three specimen sheets into a translucent paper folder.

3. Unmounted specimens:

- -Placed moss and lichen specimens into paper pockets and attached the pockets to mounting papers.
- -Adhered flowering plant specimens to 100% cotton heavy weight mounting paper, using wheat starch paste and a small round brush. Many of the specimens were matched to the loose collecting labels by Dr. Deb Lewis, curator of the Ada Hayden Herbarium. The matched labels were attached to the lower right corner of the specimens' mounting papers.
- -In the absence of a collecting label, the species names identified by Dr. Lewis were recorded in graphite in the lower right corner of the mounting paper.

4. Housing

- -The repaired bound volume was placed back into the existing phase box.
- -All loose pages and packeted specimens were placed into a pre-fabricated 4-flap with a cover, made from 20pt and 40pt archival quality board.
- -The existing phase box and the new 4-flap were housed together in a custom made corrugated board clamshell box.

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Materials used:

Zen Shofu wheat starch paste, remoistenable tissue (5 gsm tengujo pre-coated with 4% methyl cellulose mixed and wheat starch paste, activated with water); heavy weight natural kozo (60 gsm), Uso Mino Japanese tissue (12 gsm), heavy weight mounting paper (100% cotton, Strathmore), medium weight bond paper for pockets (100% cotton, Strathmore), translucent photograph interleaving paper (Light Impressions), pre-fabricated 4-flap enclosure with cover (Archival Products), corrugated blue board (Eflute).

Hours spent: 35

Photos on file: BT, AT

Curatorial Approval Signature:

Date signed:

Photographic Documentation

Before Treatment



Bound volume, p. 15



Bound volume, p. 28

After Treatment





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Photographic Documentation

Before Treatment



Loose flowering plants



Loose mosses

After Treatment





