

## **Progress Report CF 2011-105**

# **Herbarium collections management**

**Plant Science and Herbarium**

### **Project Core Team**

<b>Supervising Scientist</b>	Karina Knight
<b>Data Custodian</b>	Karina Knight
<b>Site Custodian</b>	Karina Knight

### **Project status as of Sept. 12, 2017, 10:23 a.m.**

Approved and active

### **Document endorsements and approvals as of Sept. 12, 2017, 10:23 a.m.**

<b>Project Team</b>	granted
<b>Program Leader</b>	granted
<b>Directorate</b>	granted

## Herbarium collections management

K Knight, C Parker, J Huisman, J Percy-Bower, R Rees, S Coffey, M Falconer, E McGough, E Wood-Ward, M Hislop, R Davis

### Context

The Western Australian Herbarium's Collection provides the core resource for knowledge of the state's plants, algae and fungi. The Collection is growing constantly, through addition of new specimens representing new taxa and new records of existing taxa. The collection is maintained to a high standard, and provides Parks and Wildlife and the community with the fundamental resource providing knowledge of the diversity, distribution and abundance of plants throughout Western Australia.

### Aims

- Fully document and audit the diversity of Western Australia's plants, algae and fungi.
- Maintain in perpetuity a comprehensive, adequate and representative research and archive collection of specimens of all taxa in these groups occurring in Western Australia.
- Contribute to, support and service the research, conservation and decision-making activities of Parks and Wildlife.
- Contribute to, support and service taxonomic research by the world's scientific community.

### Progress

- 8078 specimens were added to the collection, which now stands at 751129, a 1.09% increase in holdings during this period.
- The major plant groups in the collection are as follows:

[Project Table: BL, CF2011-105-major-plant-groups.csv, BL]

- Loans and exchange: loans outward–909 specimens; loans inward–362 specimens; exchange outward–2801; exchange inward–1804 specimens.
- Volunteer participation was significant, totalling 7441 hours.
- Tasks managed by curation staff with the assistance of volunteers were as follows: general curation of specimens; mounting and labelling 5416 specimens; validation of names and distribution of incoming specimens; auditing, maintaining and adding to the Reference Collection.
- Reference Herbarium: maintained the facility, which has over 14643 specimens representing 11683 taxa and also added or replaced 158 specimens. 1088 visitors used this resource to identify plant specimens during this period.
- The Herbarium provided 190 high resolution scans of herbarium specimens to Parks and Wildlife district staff to aid in the identification and location of known and new populations of priority and threatened taxa.
- The Herbarium Identification Program provides identifications to a range of clients and specialises in taxa and specimens that clients find challenging. Our most significant clients included Parks and Wildlife, other government agencies, environmental consultancies, regional herbaria and the public.
- Educational role: provided tours of the herbarium for tertiary institutions, Parks and Wildlife staff, environmental consultancies and community groups.
- Scanned 5155 type specimens for the Global Plants Initiative to make accessible to the world's scientific community plant type specimens and other botanical resources for study.

### Management implications

- Maintenance and curation of the herbarium collections provides an authoritative inventory of the plant biodiversity of Western Australia.

- The collections are drawn upon constantly by Parks and Wildlife staff, consultants and others for validating specimen records from biological surveys and for assessing the conservation status of all native taxa.
- Many taxa in Western Australia are yet undiscovered, but many of these are already represented by specimens in the herbarium, awaiting recognition by taxonomists.

## Future directions

- Complete the scanning of the remaining 1000 type specimens in the collection for the Global Plants Initiative.
- Continue to maintain the collection to an authoritative standard for all users.