

Global Conservation Consortium for Magnolia

Annual Report 2023



ATLANTA BOTANICAL GARDEN





TABLE OF CONTENTS

Overview	3
Networking & Communications	4
Prioritization & Species Data	6
Conservation & Research Activities	7
Funding & Resources	9
Looking Ahead	10



Overview

Led by Atlanta Botanical Garden, in collaboration with Botanic Gardens Conservation International and other partners from across the genus's range, The Global Conservation Consortium for Magnolia (GCCM) has been initiated to address the conservation needs of wild Magnolia species.

The GCCM aims to mobilize a coordinated network of institutions and experts who work collaboratively to develop and implement a comprehensive conservation strategy to prevent the extinction of the world's Magnolia species..

The programmatic objectives of the Global Conservation Consortia are to:

- Foster new and existing network(s) of experts;
- Identify species of greatest conservation concern and prioritize conservation action;
- · Ensure effective in situ species conservation;
- Establish, expand and manage ex situ collections of high conservation value;
- Foster applied research (e.g. conservation biology, ecology, horticulture, population genetics, taxonomy) to support species conservation;
- Build capacity to empower and mobilize in-country partners in diversity centers and across species' ranges;
- Increase public awareness and engagement with species conservation issues; and
- Collaboratively fundraise to scale-up conservation action.

We would like to share last year's accomplishments here and provide our view for the year ahead. The Consortium has grown to include 53 registered Affiliates and 6 registered Species Stewards. In 2023, the GCCM hosted regional meetings for 2 regions (US/Canada and South & Southeast Asia) and GCCM members participated in workshops and conferences, including the IX World Magnolia Symposium (Honduras), CPC Annual Meeting (Phoenix, AZ), American Public Gardens Association Annual Conference (Fort Worth, TX) and the 8th Southeast Asia Botanic Gardens (SEABG) Network Conference (Philippines). This year, the GCCM has begun to develop conservation action plans for priority species and published plans for Magnolia ashei and Magnolia fraseri in 2023. Species stewards have been developing metacollections for these and other species, using gap analysis data to guide collecting and collection monitoring. This year, the GCCM has successfully received funding for at least 5 projects, including from the Institute for Museum and Library Services (IMLS), to continue to expand the GCCM and support the use of metacollection tools by gardens of all sizes. Read more about the successes of the GCCM throughout this report.

Thank you for collaborating with and supporting the Global Conservation Consortium for Magnolia. We look forward to continuing to work with you to conserve Magnolias in the year ahead.

- Jean Linsky (GCCM Coordinator) & Emily Coffey (GCCM Lead)





Networking & & Communications

- The <u>GCCM Consortium Steering Committee</u> meets annually to discuss consortium activities. This year, CSC members have been involved in organizing and hosting virtual and in-person regional meetings, presenting on the GCCM at international conferences, and <u>fundraising for</u> <u>species conservation projects</u>.
- The GCCM work plan continues to guide the activities of the consortium. Please take a look and see how you can contribute to our goals as a global network. This work plan will be reviewed and updated for the 2024-2026 period, and the Steering Committee will be requesting input from GCCM Affiliates in early 2024.
- Information about the GCC onboarding and sign-up process is <u>available online</u>. A folder with resources on <u>Roles & Responsibilities</u> <u>within the GCCM</u> can be found here. The GCCM has <u>53 registered Affiliates and 6 registered</u> <u>Species Stewards</u> signed up as of the end of 2023. <u>Sign up as an affiliate here</u>.

- In 2023, the GCCM hosted virtual meetings for 2 regions: update meetings for the U.S. & Canada region and the first meeting for the South & Southeast Asia region. During these meetings, project updates were shared, and discussions were held on priority actions and next steps for each region. Information, including meeting recordings, is shared on a resource page for each regional group, and additional resources are shared via Google Drive and are accessible to participants.
- The GCCM has been presented at the following national & international meetings in 2023:
 - Center for Plant Conservation <u>2023 Annual</u> <u>Meeting</u> - Desert Botanical Garden
 - <u>IX World Magnolia Symposium</u> UNACIFOR, Siguatepeque, Honduras
 - American Public Garden Association 2023
 Annual Conference Fort Worth, Texas
 - 8th Southeast Asia Botanic Garden Network
 Conference Philippines
 - 'Tools for Tree Conservation' workshops, hosted by The Morton Arboretum and BGCI -Queen Sirikit Botanic Garden, Thailand and Vietnam National University of Forestry, Vietnam
 - 2023 Conservation Planning Specialist Group Annual Meeting - San Diego, California
 - The GCCM has continued to engage in multiconsortia working groups under the <u>Cryopreservation</u>, <u>Conservation Genetics</u> & Propagation themes. All GCCM partners globally are invited to join these working groups to discuss and solve current problems in these thematic areas. Contact the GCCM Coordinator to receive invites to future meetings of these groups.



The GCCM participated in the IX World Magnolia Symposium in Siguatepeque, Honduras (May, 2023)

The GCCM participated in the American Public Garden Association 2023 Annual Conference (June, 2023)



Communications:

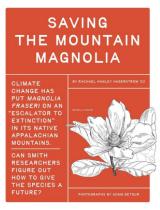
- **GCCM** Four issues of the newsletter were circulated in 2023. These newsletters included 6 regional update stories from partners, general consortium information, opportunities, and events. A total of 352 individuals are currently subscribed to the newsletter and received the December 2023 issue.
- The newsletter archive is here. can subscribe to newsletter here. We have also created a Google Group listserv to facilitate communication amongst the global GCCM community. Contact the GCCM Coordinator if you would like to join the Google Group.

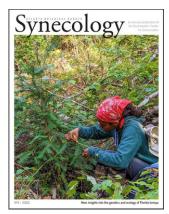
- The GCCM Twitter account The GCCM has been featured in (@GCCMagnolia) has posting consortium news, events and resources. We shared 87 posts in 2023 and have 278 followers.
- funding In October 2023, the GCCM launched a Facebook group. This is an interactive place where all group members are welcome to share Magnolia conservation content!

been the following newsletters/outlets in 2023:

- Magnolia The Journal of the Magnolia Society International Volume 58 Issue Spring/Summer 2023
- Smith Alumnae Quarterly Fall 2023
- <u>Synecology #4</u>, 2022

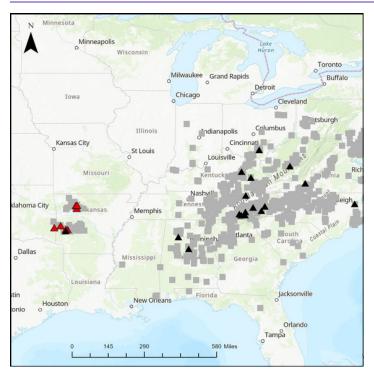






Prioritization & Species Data

- The GCCM maintains a working species checklist of Magnolia (s.l.), using the 2016 Red List publication as a taxonomic basis and including more recently published species. This was last updated December 2023. This currently includes 361 species. This list includes taxonomic, conservation status and range country information. Additionally, a Data Deficient species list is managed and shared to highlight species requiring additional information for assessment.
- In 2023, a total of 16 <u>IUCN Red List</u> <u>assessments</u> were published through the work of GCCM partners. These assessments were compiled by species experts, some with the help of Atlanta Botanical Garden Conservation and Research interns.
- The Global Conservation Gap Analysis of Magnolia & Conservation Gap Analysis of Native Magnolias of the US & Canada act as main guiding documents for the GCCM to highlight priority in situ and ex situ conservation actions for species of conservation concern.



Map showing existing (black triangle) and new (red triangle) collection localities of M. tripetala.

- Ex situ survey data gathered for the <u>Conservation Gap Analysis of Native Magnolias of the US & Canada</u> has been used to guide collecting efforts. GCCM partners have been sharing accession data which has been used to update the ex situ metacollection maps for 3 species in the US: M. ashei, M. fraseri and M. tripetala. These maps track the increased geographic coverage of these species in ex situ collections.
- IUCN Red List Assessments published in 2023:

Magnolia granbarrancae
Magnolia chiriquiensis
Magnolia emarginata
Magnolia enepeceana
Magnolia frontinoensis
Magnolia javieri
Magnolia mixteca
Magnolia montebelloensis
Magnolia morii

Magnolia oscarrodrigoi
Magnolia pilocarpa
Magnolia quangninhensis
Magnolia reynelii
Magnolia sambuensis
Magnolia talpana
Magnolia veliziana
Magnolia wilsonii
Magnolia zotictla



Conservation & Research Activities

Highlights from the consortium:

- Species conservation action plans have been published for Magnolia ashei and Magnolia fraseri. These plans were developed with the leadership of Species Stewards, the Botanic Garden of Smith College, and US National Arboretum and will act to guide conservation action for these species in the coming years. Read more about these plans here.
- A team from the <u>Botanic Garden</u> and the Dept. of Biological Sciences at Smith College is conducting <u>on-going research</u> into the ecological condition of Magnolia fraseri.
- Efforts to conduct field surveys and update the assessments for DD species in Indonesia (Magnolia banghamii, M. calophylloides, M. sumatrae) have been supported by <u>The Magnolia Society International</u> and <u>The Mohamed bin Zayed Species Conservation Fund</u>. This work is led by researchers from the Research Center for Plant Conservation, Botanic Gardens and Forestry BRIN and Universitas Samudra.
- The <u>IX World Magnolia Symposium</u> and Conservation Workshop was held from May 29th to June 3rd, 2023 in Siguatepeque, Honduras. The event was a great success for knowledge and experience exchange in the research and conservation of Magnolias as well as an opportunity to network with new and old colleagues alike. Objectives and work of the GCCM were presented through the <u>Prioritize, Plan, Act, and Monitor</u> framework, encouraging the use of <u>Conservation Planning</u> principles using good information, working towards well-defined and achievable goals, and incorporating multiple perspectives. Presentations during the symposium and discussion during the workshop highlighted great opportunities for collaboration on conservation at local, national, and international scales.



Research on M. fraseri carried out by partners at Smith College.

Conservation & Research Activities ... Continued

- GCCM Steering Committee member Marcela Serna is leading a project 'Conserving Magnolia virolinensis, a critically endangered tree from Santander Province, Colombia' The focus of this project is to provide updated information about the conservation status of Magnolia virolinensis, a Critically Endangered species from Santander province, and to establish the first steps for its conservation. That means, 1) to increase public awareness in local communities, 2) to explore forests to find new trees and populations, and 3) to get fruits and seeds for propagation in nurseries near the natural populations.
- Conservation genetics projects have been on-going for several species including M. fraseri, M. pyramidata, M. faustinomirandae, M. montebelloensis, M. quetzal, M. stellata, and M. zenii.
- The Jardín Botánico de Medellín is dedicated to conserving Magnolia urraoensis, a globally endangered species in Colombia. <u>Their work</u>, currently underway, will include the production of an updated conservation status assessment, the development of a robust recovery plan, active engagement, support from the local community, advocacy for policy changes, and heightened awareness through educational workshops.
- After the second year of the project 'Conservation of 3 threatened Magnolia species in the Alto de Ventanas, Colombia", Salvamontes reports 23 new adult trees (12 M. guatapensis, 5 M. polyhypsophylla and 6 M. yarumalensis) for a total of 205 adult trees of these species. From the trees that they have been propagating from seeds, they were able to translocate 70 treelets of M. guatapensis and 40 of M. polyphypsophylla into their natural habitat inside Los Magnolios nature reserve.



M. banghamii cuttings. Photo by Enggal Primananda

Funding & Resources

- A (non exhaustive) list of <u>potential funding sources</u> to support GCCM work is shared and specific calls for applications from various funding sources are regularly circulated using the GCCM Google Group listserv.
- The GCCM has submitted at least 16 project funding proposals in 2023 via written letters of support, proposal review and provision of species ex situ data. This includes projects in Colombia, Costa Rica, Indonesia, USA and Vietnam.
- Funding has been received for 6 proposals in 2023:

Project Title	Lead	Funder
Growing Metacollections and Strengthening Gardens for a Conservation Consortia Future	Atlanta Botanical Garden, USA	Institute of Museum and Library Services
Conservation actions to protect Magnolia urraoensis, the tree of peace in Colombia	Jardín Botánico de Medellín, Colombia	Van Tienhoven Foundation
Conserving Magnolia virolinensis, a critically endangered tree from Santander Province, Colombia	Marcela Serna/Fundación Guanacas, Colombia	BGCI - Global Conservation Consortia Grants
Survey and Conservation of Magnolia banghamii and other endemic Magnolias of Indonesia	BRIN, Indonesia	The Mohamed bin Zayed Species Conservation Fund
Enhancing conservation of understudied and threatened Magnolias in Costa Rica	Osa Conservation, Costa Rica	Association of Zoological Horticulture
Filling gaps in the conservation metacollection of Magnolia pyramidata	Atlanta Botanical Garden & South Carolina Botanical Garden, USA	American Public Gardens Association/USFS Tree Gene Conservation Partnership

Resources:

- The GCCM webpage has expanded in 2023 to include more Resources. These include:
 - o Experience in Growing Fraser and Pyramid Magnolia
 - Population study and conservation of Magnolia banghamii, a narrow endemic tree in Sumatra Island, Indonesia
 - o Magnolias on the Move
 - Magnolias del Alto de Ventanas
 - American Public Gardens Association Workshop, Metacollections Management: new approaches for improving living conservation collections
 - o GCC Interpretation Panels and Species Info Sheets
 - As well as updated regional meeting pages (see Networking for links).

Looking Ahead

In the coming year the GCCM will:

- increase the availability of key resource documents in multiple languages
- identify and support new Species Stewards to take action for priority threatened species
- promote the expansion of conservation metacollections through material collection and sharing
- provide training and resources on metacollection development and conservation gap analysis
- participate in international conferences and workshops to expand collaboration

Acknowledgements:

Prepared by Jean Linsky with contributions from Emily Coffey, the GCCM Steering Committee, Loy Xingwen & Sally Phipps.

Thanks to our funders in 2023:













