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Scott Alan Mori (1941—2020): An Appreciation

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Abstract

Scott Alan Mori (1941—2020) was among the most distinguished and prolific botanists in the 129-year history of The New York Botanical Garden (NYBG). He spent nearly 40 years of his career at NYBG before retiring in 2014 as Nathaniel Lord Britton Curator of Botany, and then serving as Curator Emeritus until his death on August 12, 2020. Over the course of his career he collected more than 27,000 herbarium specimens, described and named 125 new taxa, had at least 70 new taxa named in his honor, wrote more than 130 scientific papers and dozens of popular articles and blog posts, authored or edited 18 books or monographs, and was the major professor for 11 graduate students. His decades of professional accomplishments brought him many of the most prestigious awards in botany. He was awarded the Engler Medal in Silver from the International Association of Plant Taxonomy for the best publication in systematic botany in 2002. He received the David Fairchild Medal for Plant Exploration in 2007 from the National Tropical Botanical Garden. He won the Asa Gray Award in 2007 from the American Society of Plant Taxonomists. This article examines the multi-faceted legacy of Scott Mori as a great neotropical plant explorer, botanical scholar, author, educator, mentor, conservationist, colleague, and friend. This article also reviews the places that he visited, the projects on which he worked, and the people with whom he collaborated, with appreciative commentaries provided by some of the many individuals he profoundly influenced over the years.

Keywords Scott Alan Mori · Appreciation · Remembrance · Legacy

Scott Mori in 1995 collecting specimen of a Bignoniaceae in Amazonian Brazil. Photo by Carol Gracie.

Introduction

Scott Alan Mori, who passed away on August 12, 2020, at the age of 78, was one of the most prolific and distinguished botanists to ever have served on the scientific staff of

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The New York Botanical Garden (NYBG). He spent nearly 40 years of his career at NYBG before retiring in 2014 as Nathaniel Lord Britton Curator of Botany, and then serving as Curator Emeritus for six more years. The metrics of success in his career, by any measure, are outstanding. For example, he collected more than 27,000 herbarium specimens. He wrote more than 130 scientific papers and dozens of popular articles and blog posts, and authored or edited 18 books or monographs. He described and named 125 new plant taxa (Appendix 1). He had at least 70 new plant taxa named in his honor (Appendix 2). He was the major professor for 11 graduate students, and served as an educator or mentor to countless undergraduates, interns, and volunteers. His professional accomplishments brought him many of the most prestigious awards in botany. He, with co-authors, was awarded the Engler Medal in Silver from the International Association of Plant Taxonomy for the best publication in systematic botany in 2002. He later received the David Fairchild Medal for Plant Exploration in 2007 from the National Tropical Botanical Garden. Also in 2007, he won the Asa Gray Award from the American Society of Plant Taxonomists.

In this article, I attempt to move beyond the quantitative metrics of Scott's professional accomplishments, and focus more upon an appreciation for the societal impacts of his legacy. I explore this appreciation from his legacy as a neotropical plant explorer, botanical scholar, author, educator, mentor, conservationist, colleague, and friend. I take this approach because I know Scott was motivated to excel in his career in large part because he understood and championed the great roles that botanical science plays in ensuring societal and ecosystem wellbeing. I am confident in taking this approach because I knew Scott for 40 years, from the summer of 1980 when I arrived at NYBG as a beginning doctoral student and Scott became my major professor, and then during subsequent years as colleagues at NYBG. I am also emboldened to attempt this approach because I am fortunate to have testimonials from a number of Scott's former colleagues, students, and friends sent to me for Scott's retirement celebration from active duty at NYBG in the autumn of 2014. I am thus able to utilize direct quotations from a wide diversity of Scott's associates to communicate a sense of the passionate appreciation that many people had for Scott's own passion about plants.

This article begins with Scott's formative years in the state of Wisconsin (USA), from his high school years through 1974, mostly involving the University of Wisconsin, and then continues with discussion of his early positions as Curator, Summit Herbarium, Canal Zone, Panama (1974—1975), and then as Curator, Herbário Centro de Pesquisas do Cacau, Itabuna, Bahia, Brazil (1978—1980). The article then focuses on Scott's time at The New York Botanical Garden as a Research Associate (1975—1978), Associate Curator (1980–1982), Curator (1982—1991), Senior Curator, Institute of Systematic Botany (1991—1995), Director, Institute of Systematic Botany (1995—2001), Nathanial Lord Britton Curator of Botany, Institute of Systematic Botany (1998—2014), and Curator Emeritus, Institute of Systematic Botany (2014—2020). The topics of discussion of Scott's legacy at NYBG are not always clear-cut, as, for example, some projects may be primarily floristic in focus, but specimens and data for monographic research would be contemporaneously collected. Nonetheless, for the most part a useful way to organize the NYBG years is as follows: Monographic Studies, Floristic Studies, Ecological Studies, Ecotours, Botanical Art, Educational Impact, and Conservation Impact.

Wisconsin, USA, 1941—1974

Scott was born in 1941 in the southeastern Wisconsin town of Janesville, and he grew up in the nearby town of Milton. Scott never talked with me much about his early years. Fortunately he did write about this phase of his life in a fascinating and informative article printed as a brochure (*Careers in Botany*) and published online by the Botanical Society of America (BSA), entitled *How I Became a Tropical Botanist*[1] in BSA's *Careers in Botany* series. From this article, we learn that from an early age, Scott became interested in natural history through camping experiences with the Boy Scouts and hunting with his father, an uncle and a neighbor. He also developed an interest in conservation, through the influence of a local game warden and serving as President of the Conservation Club at Milton Union High School. Upon graduating from high school, Scott enrolled in the University of Wisconsin at Stevens Point to pursue an undergraduate degree in Biology and Conservation. Scott did well in his studies, and one of his teachers encouraged him to go to graduate school for an advanced degree. Scott applied to the University of Wisconsin at Madison to work for a M.S. degree in Biology. His career goal at the time was to become a high school biology teacher and a coach of football and wrestling, sports in which he had excelled during high school.

Scott's career plans took a sudden change his first semester in Madison, when he enrolled in a Phytogeography course taught by Professor Hugh Iltis, who Scott recalled was "a fiery teacher and an avid conservationist." Hugh Iltis was impressed with Scott due to the work ethic and attitude he exhibited on a field trip to the Smoky Mountains, and he gave Scott the opportunity to assist his doctoral student, Keith Roe, on an expedition to Mexico in the summer of 1966, which was to be Scott's first tropical experience (Fig. 1). Scott recalls in this article the exact place and time he decided to become a botanist on that trip to Mexico:

> *It was along a swiftly flowing stream through undisturbed forest in Tabasco where Keith had assigned me to collect while he and his wife Eunice explored elsewhere for species of* Solanum. *Everywhere I looked there was a different plant and as I collected them—often watching hummingbirds visiting the red-flowered ones—I marveled at the amazing diversity of flower types. Because of that glorious day, I resolved to change my research project from looking at the systematics of the temperate genus* Gnaphalium *to some, as-yet unknown, tropical plant.*

Hugh Iltis was very impressed with the plant specimens that Scott had collected in Mexico, and this led to an opportunity for Scott to travel to Costa Rica in 1967 (Fig. 2). On this trip, Scott first encountered species of Lecythidaceae (Brazil nut family) and brought some of the large woody fruits of one of these species, known by the common name "monkey pots" (*Lecythis pisonis*) back to Madison as souvenirs. Subsequently, Hugh Iltis showed Scott a list of plants that John Wurdack of the Smithsonian said were in need of taxonomic revision. On the list, Scott spotted a group of trees in the Lecythidacae, and he knew the curious monkey pot souvenir fruits he had collected in Costa Rica belonged to that plant family, and he decided immediately that the Brazil

[1] https://www.botany.org/Profiles/Scott_Mori.php

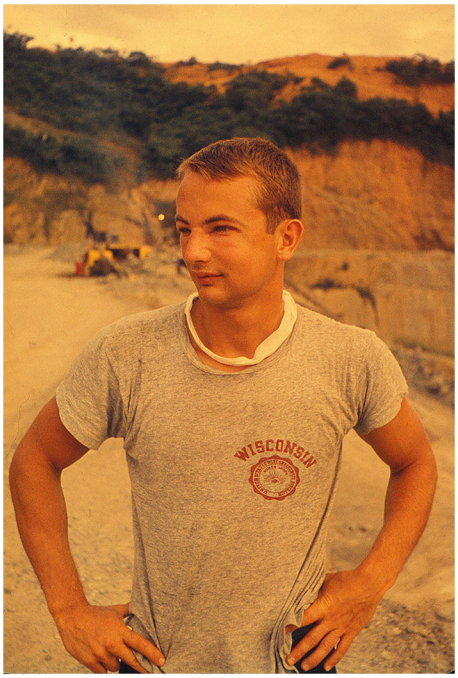

Fig. 1 Scott Mori just after being stung by bees in Mexico in 1965 on his first expedition to Latin America. Photo by Eunice Roe

Nut family would be focus for his M.S. thesis. He completed this M.S. thesis, entitled, *The genus* Lecythis *in Central America*, in 1968 under the mentorship of Hugh Iltis. Scott went on to complete a Ph.D. dissertation entitled *Taxonomic and Anatomic Studies of* Gustavia *(Lecythidaceae)* in 1974, also under the direction of Hugh Iltis.

While he was pursuing his doctoral degree, 1969—1974, Scott also held the position of Instructor of Botany and Zoology, University of Wisconsin Center System at Marshfield. I believe it is impossible to overestimate the extent to which Scott was influenced and inspired by Hugh Iltis' passionate teaching style and zeal for promoting conservation (Fig. 3). I think that anyone who knew both Hugh and Scott would agree about the intellectual synergy that developed between the two of them around, among other things, the vital roles of plant science in fostering the wellbeing of society and ecosystems alike.

Summit Herbarium, Panama, 1974—1975

From 1974—1975, Scott Mori served as Curator of the Summit Herbarium, in Panama. During this period, he, together with Jacquelyn A. Kallunki (September 1974—May 1975), collected 5557 herbarium specimens[2] (Fig. 4). The best account of how

[2] *Panama: The Biological Bridge of the Americas, A History of the Discovery of its Plants* by Thomas B. Croat, September 4, 2018. Slides 31 and 32. https://www.missouribotanicalgarden.org/Portals/0/staff/PDFs/croat/PanamaBiologicalBridgeOfAmericas08_31_2018FINAL%281%29edits.pdf.

Fig. 2 Scott Mori doing field work for his M.S. degree in Costa Rica in 1967, holding a Lecythidaceae specimen. Photographer unknown

Scott came to this position, and of what he accomplished in it, comes from the person who hired Scott for this assignment, Thomas B. Croat of the Missouri Botanical Garden (T. Croat, pers. comm.):

> *My first actual experience with Scott Mori was in summer of 1971 in Panama when Scott came with Mike Nee to Panama during his Ph.D. studies, which involved the Taxonomy of Lecythidaceae beginning with a revision of* Gustavia*. Scott was following up on an interesting population of* Gustavia *that both Bob Dressler and I had seen along the Panama Railroad north of Gamboa. The plant*

Fig. 3 Scott Mori (left) and Hugh Iltis in Madison, Wisconsin, September 28, 2008. Photo by Carol Gracie

was obviously different from the common Gustavia superba *(Kunth) O. Berg, which I knew well from Barro Colorado Island. I had spotted this plant because I made several trips per week to Barro Colorado Island where I was then working on my Flora of Barro Colorado Island. Scott also suspected that it was a new species and wanted to see a living plant. At the time, I was living at Summit Gardens where I had taken up my position as the 1st Curator of Summit Herbarium and head of the Missouri Botanical Garden field station. I took Scott to Gamboa and we walked north several kilometers up the tracks in the direction of Frijoles until we found the population of* Gustavia*. It did prove to be a new species.*

Scott fell in love with Panama because it was an exciting area to collect and was logistically so ideal for shipping material at the time when the Panama Canal Company was still under U.S. Control. So, when a position became available to work in Panama as our field program manager and Curator of Summit Gardens, Scott enthusiastically came to work for me in September, 1974. Mike Nee immediately preceded Scott as Curator of Summit Herbarium, and had told Scott about the job. At the time, I was in charge of the Flora of Panama Project and thus responsible for keeping our field station staffed. It was basically a voluntary role but we had many graduate students more than willing to spend a year in Panama since we provided them with housing and a vehicle and thus time to work on their respective research projects. Others who worked for us there included Helen Kennedy, Tom Antonio, Sandy Knapp, John Witherspoon and Ken Sytsma.

Scott was a tremendous asset for the Flora of Panama Project, regularly visiting and revisiting some of the well-known but species-rich sites like Cerro Jefe, Santa Rita Ridge, Cerro Campana, El Valle de Antón, and various areas in Chiriquí Province. But he was also the first person to explore a number of new areas for the first time including participating in an expedition to Cerro Tacarcuna with Al Gentry. He was an excellent collector and found many new species. Scott was the best person working for me in this position because he regularly reported on his activities and told me about his plans for new field trips. I appreciated this information and in those days of more than two-week turn-around in correspondence by airmail letters I immediately responded to his requests for assistance and advice as well as payment of his expenses….

…. I am proud to have known Scott and to have played a small part in his career. He truly has been a great explorer, a tremendous taxonomist, a teacher and guide to his students and to the public who wanted to learn more about plants. The projects he started or was involved with would fill a book. Indeed Scott's book[3] *written toward the end of his career and which covers all aspects of his career and his research projects is an imperative read for all developing graduate students in systematics.*

[3] Mori, S.A., A. Berkov, C.A. Gracie, and E.F. Hecklau (Editors). 2016. Tropical plant collecting: from the field to the internet. Bronx, New York, USA: New York Botanical Garden Press, 332 pages

Fig. 4 Scott Mori collecting plants along the El Llano-Cartí Road in Panama, 1974 or 1975. Photo by Jacquelyn Kallunki

The New York Botanical Garden, 1975—1978

Scott Mori's M.S. and Ph.D. research on the systematics of neotropical Lecythidaceae had caught the attention of Ghillean T. Prance at The New York Botanical Garden, who was himself researching neotropical Lecythidaceae. Prance invited Scott to join him in New York as a Research Associate so they could collaborate on these shared research interests. Scott published prolifically during this period, including several key papers co-authored with Ghillean Prance, such as Prance and Mori (1977), Prance and Mori (1978), and Mori et al. (1978), thus establishing a successful research partnership that would blossom into what would be a decades-long professional relationship.

Herbário, Centro de Pesquisas do Cacau, Brazil, 1978—1980

After Scott Mori had spent 3 years at NYBG working with Ghillean Prance, he had the opportunity to serve for 2 years (1978—1980) as the Curator of the herbarium at the Cacao research center in Itabuna, Bahia, Brazil. Similar to the work he had performed at the Summit Herbarium in Panama, his mission at the Centro de Pesquisas do Cacau was to curate the herbarium at the Center and to develop the collection through botanical exploration of the highly endangered flora of the Brazil's Atlantic Coastal forest region. He launched into this assignment with the same energy and enthusiasm as he had with the position in Panama. He quickly published accounts of the status of the collection of the CEPEC herbarium in English (Mori & Silva, 1979) and in Portuguese (Mori & Silva, 1980), and initiated extensive plant collection in the region, mostly in Bahia state (Fig. 5). Importantly, Scott became fluent in Portuguese and successfully

built genuine collaborations with Brazilian botanists, thus establishing professional relationships based on mutual respect needed to accomplish his mission of research and conservation, and also laying the groundwork for what would be the next major phase of his career back in New York.

The New York Botanical Garden, 1980—2020

Scott Mori concluded his assignment in Bahia in 1980, and was welcomed back to NYBG that same year as an Associate Curator, however his engagement with the Bahian flora was by no means concluded, as will be discussed below. With the exception of a six-month sabbatical as a Mellon Fellow at the Smithsonian Institution (1990–1991) to extend his research on central Amazonian Lecythidaceae, Scott was continuously on the NYBG staff until his retirement in 2014 as Nathanial Lord Britton Curator of Botany, and then as Curator Emeritus until 2020. An appreciation of his contributions during this four-decade time span are organized herein into categories of endeavor.

Monographic Studies

From the period at the University of Wisconsin and Central America that Scott worked on the genera *Lecythis* and *Gustavia* for his M.S. and Ph.D. theses, respectively, and for the entirety of his career to follow, he focused his attention like a laser beam on

Fig. 5 Scott Mori in Bahia, Brazil, December 2, 1979, holding the leaves and fruits of *Swartsia reticulata* (*Mori et al., 13,060*). Photo by Don Halloran

understanding neotropical Lecythidaceae. Even when his primary objective of an expedition was to further a floristic, educational, or ecotour goal, he was assiduously observing, recording data, and thinking about the Brazil nut family. His ability to sustain this focus and to organize and interpret the resulting data and specimens is attested to by the prolific publications that resulted. NYBG's Founding Director-in-Chief, Nathanial Lord Britton would have been very proud of Scott's ability to "Get It Into Print!" as Britton famously exhorted his curators to publish their research results. As Arthur Cronquist would have commented, Scott had a well-developed "terminal capacity" with respect to getting his research to a satisfactory conclusion and published.

Scott Mori's monographic opus, co-authored by Ghillean Prance, was the two-parted *Flora Neotropica* publication, comprising Lecythidaceae–Part I. The actinomorphic-flowered New World Lecythidaceae (Prance & Mori, 1979) and Lecythidaceae–Part II. The zygomorphic-flowered New World genera (Mori & Prance, 1990). Much of the field research for Part II of the Lecythidaceae *Flora Neotropica* monograph took place in central French Guiana, where Scott and Ghillean Prance had an opportunity to study Lecythidaceae trees in situ together (Fig. 6); I was privileged to be part of the research team there for 5 months (August–December, 1982). In reality, the completion of the *Flora Neotropica* monograph of Lecythidaceae in 1990 provided the baseline for knowledge of the family in the Neotropics, and set the stage for Scott and his collaborators to build on this knowledge for the next 30 years. As additional specimens and data were collected, and as information technology evolved, *The Lecythidaceae Pages* were established on NYBG's web site (Mori et al., 18 March 2010 onward). The authors state, "this web site has been developed to: 1) ensure that the information (including images), that we have collected about Lecythidaceae is passed on to current and future botanists, 2) provide easy access to difficult to find literature, 3) increase real time collaboration between us and botanists in areas where Lecythidaceae are found, 4) make data available for conservation, especially in the form of distribution maps for each species, 5) educate others about Neotropical plants, and, 6) increase appreciation for the diversity and ecological relationships of tropical plants." *The Lecythdaceae Pages* are a living legacy of Scott's monographic prowess and his commitment to engaging with other scholars and stakeholders in the botanical and conservation communities, about which more will be said later. Terry Pennington, Honorary Research Fellow at the Royal Botanic Gardens, Kew, wrote the following testimonial on the occasion of Scott's retirement from NYBG in 2014 (Pennington, pers. comm.):

> *It is a pleasure to write this contribution on the occasion of Scott's retirement, as I have known him for most of his long and productive career, and during nearly 40 years I have got to know him well during memorable field trips in Bahia, French Guiana and Manaus. His key contributions to the taxonomy, biology and ecology of the Lecythidaceae are widely known through many publications, and his wider floristic studies through such landmark books as the Guide to the Vascular Plants of Central French Guiana. Scott was at the forefront of the great collecting era of the 1980's and 1990's when random 'general collecting' of fertile specimens, which had been practised for the past 200 years, was replaced be more scientific forest inventory methods based on the collections of all individuals in large plots or from 1000 tree line-transects. This approach*

resulted in huge quantities of specimens (mostly sterile and therefore denigrated by herbarium curators), which provide a great source of data for taxonomists analysing species diversity and distributions and for ecological vegetation analysis, and which also provide a future source of genetic information. Scott specialized in collecting that most difficult of plant groups – large rain forest trees, where a single tree might take an hour or two to collect, and he was unrivalled at it. Although specializing in the study of Lecythidaceae, he also has the widest general interest and knowledge of the complete flora and fauna, so a few weeks in the field with him was always a great educational (and often hilarious) experience. By staying in the same post at the New York Botanical Garden throughout his career, resisting the temptations of an easy life in 'admin', he has had one of the most productive and successful careers of any biologist I have known.

Floristic Studies

Scott became known at least equally well for his prowess as a general plant collector and author of floristic studies as he was for his monographic studies. Naturally, neotropical floristic study sites were primary locations for collection of data and specimens for his Lecythidaceae monographic works. His interest in general collecting was manifested, and his techniques honed, during his first two positions after obtaining his doctorate, when he was the curator of the Summit Herbarium in Panama and the CEPEC Herbarium in Brazil, as a primary assignment at both posts was to conduct an ambitious specimen collecting program to document the flora of those regions. As someone who collected plant specimens with Scott over many months in Brazil, Ecuador, and French Guiana, I can attest that he was most excited about collecting specimens from large lowland rainforest trees and lianas. Of course, he collected specimens of all growth forms during his floristic studies, but large trees and lianas appealed to him the most, because they are among the least well represented in herbaria

Fig. 6 Ghillean Prance (left) and Scott Mori discuss the fruits of a Lecythidaceae tree on Mont La Fumée near the village of Saül, French Guiana in 1983. Photo by Brian Boom

due to their relative difficulty to acquire, and precisely because they were difficult to collect, which appealed to Scott's athleticism and his quests for physical challenges.

Bahia, Brazil

Scott's first floristic project upon being appointed as Associate Curator at NYBG in 1980, was to return to Bahia, Brazil to continue the program of plant collecting he had initiated in 1978.This project had a distinctive conservation motivation, as the research was funded by a grant from the World Wildlife Fund. The grant was entitled "Botanical survey of the endangered moist forests of eastern Brazil," and Scott asked me to serve as his field assistant, which as a beginning doctoral student at NYBG I was overjoyed to accept. For 3 months, April – June 1981, we collected about 1200 plant specimens and conducted an ecological tree inventory in collaboration with two excellent CEPEC botanists, Andre M. de Carvalho and Talmon S. dos Santos. The research's results were reported to the World Wildlife Fund and in an issue of *Botanical Review* 2 years later (Mori et al., 1983). Scott's floristic project in Bahia help set the stage for another NYBG scientist, Wm. Wayt Thomas, to launch a few years later major floristics and conservation research initiatives in the Atlantic Coastal Forests of Brazil, thus continuing NYBG's engagement with this highly endangered neotropical floristic region.

French Guiana

Scott's fascination with the flora of French Guiana can be traced to 1976, when as a Research Associate at NYBG he had the opportunity to make a brief plant collecting trip to this department of France in northern South America. The expedition was undertaken as part of Ghillean Prance's National Science Foundation (NSF) grant to study Lecythidaceae and the Office de la Recherche Scientifique et Technique Outre-Mer (ORSTOM), today known as the Institut de Recherche pour le Développement (IRD). Based on known herbarium specimens at the time, central French Guiana seemed to be a neotropical center of diversity for that plant family and Scott's mission was to explore that idea further. Scott collected 130 specimens with French botanist Jean-Jacques de Granville over a 16-day period (December 8—23). The results led Ghillean Prance and Scott to decide that central French Guiana, in an area around the village of Saül, would be the focus for a long-term project to collect specimens and data on Lecythidaceae for their monographic studies and of the forest biota to understand the ecological context for the Lecythidaceae occurring there. The forest was spectacular, the French collaborators were excellent, and the logistics for field work very good. So, the stage was set for what would become Scott's most productive research site of his career.

Beginning in 1982, and extending to 2000, Scott led an additional 22 expeditions to central French Guiana involving scores of other professional biologists, students, and volunteers (Fig. 7). For most of these trips, Scott's most consistent research collaborator was his wife and nature photographer *par excellence*, Carol Gracie (Fig. 8). Scott, true to his penchant for details, recorded the following statistics for his central French Guiana expeditions: 526 total days in the field, 5186 collection numbers with 19,310 total duplicates, 9.9 collections/day, 3.7 duplicates/collection. In addition to

documenting the diversity of the flora of the region, Scott conducted, often with specialists he hosted, ecological studies on bees and bats that were involved in pollination of Lecythidaceae flowers or dispersal of fruits. Myriad scientific and popular articles documented the intensive and sustained focus on the forest around Saül, particularly of Mont La Fumée, the most important first synthesis being Mori & collaborators (1987), which not only focused on the Lecythidaceae but also included an extensive ecological description of Mont La Fumée. Scott published a web site to account for the progress on documenting fungal and plant diversity of central French Guiana through his 2000 expedition to Pic Macheco, a 20-day expedition, September 5—24, on which 156 collection numbers were made (Mori, 2000). Dutch botanists Paul and Hiltje Maas reflected on times they had been with Scott in the field, especially in central French Guiana (Paul & Hiltje Maas, pers. comm.):

> *My (Paul) first meeting with Scott Mori was in Panama (in September 1974), where I did some collecting with Bob Dressler, Helen Kennedy, and with Scott Mori. One day we had planned a joined field trip and I am normally used to start at 7 or 8 hours in the morning, but no, with Scott that is very different: awaking in the middle of the night and leaving in the dark, so being at the place where we wanted to collect at the moment that it became light. Yes, early starting work is always the case with Scott and Carol as we noticed during our various stays with them in New York. The alarm clock always going off at 4.30 hrs. in the morning was their daily custom (Scott yelling: "Paul, you have to awake")!*
> *In our opinion Scott Mori is most famous for his unstoppable enthusiasm for the taxonomy of plants. The result of this (among a lot of other things) is his Flora of Saül, a formidable work, both scientifically sound, and beautifully executed (thanks to Carol?). Especially memorable is the fact that he managed to invite numerous botanists to take part in this project. He organized them to travel to French Guiana and explore the Saül area themselves, which is extremely stimulating and rewarding for them as we ourselves experienced in 1993. At a certain moment Scott announced proudly that during this trip he brought together on the stairs of Carbet Carol 250 years of botanical experience….*

The highlight of floristic efforts around Saül for Scott and his collaborators was the publication of the *Guide to the Vascular Plants of Central French Guiana*: *Part 1. Pteridophytes, Gymnosperms, and Monocotyledons* (Mori et al., 1997) and *Part 2. Dicotyledons* (Mori et al., 2002). Not authored or edited by Scott, but certainly part of his legacy of coordinating floristic activities in central French Guiana, were the volumes published on mosses (Buck, 2003) and liverworts and hornworts (Gradstein & Ilkiu-Borges, 2009), comprising Part 3 and Part 4 of the series, respectively.

With the field work for his major floristic research on central French Guiana completed, Scott turned his attention for the next decade to several locations in French Guiana nearer the coast, particularly Montagne de Kaw, Nouragues Field Station, Trésor Nature Reserve, and the French Agricultural Research Centre for International Development (CIRAD) Experimental Research Station. As with his work in central French Guiana, Scott continued his practice of inviting professional colleagues, students, and volunteers to accompany him and contribute to the floristic research efforts. As a way to consolidate and make available the floristic information on French Guiana,

Fig. 7 Participants in Scott Mori's 1993 expedition to central French Guiana. Top row: Paul Maas, David Read, Terry Pennington. Middle row: Tom Croat, Hiltje Maas, Scott Mori, George Cremers. Bottom row: Carol Gracie, Bernard Jadin, Frieda Billiet, Jean-Jacques de Granville. Photo by Carol Gracie

Scott and collaborators set up a web site for the French Guiana e-Flora Project (Mori et al., 15 December 2007 onward). Among the many species named in honor of Scott that were discovered in French Guiana, *Philodendron scottmorianum* (Croat & Moonen, 2007) is among the more dramatic (Fig. 9).

Central Amazonia, Brazil

Most botanists would have been fully occupied with a floristic project the scope of what Scott and collaborators launched in central French Guiana. However, for Scott the lure of the opportunity to study Lecythidaceae within the context of the massive Biological Dynamics of Forest Fragments Project (BDFFP) (Laurance et al., 2011) in central Amazonia, was too great to resist. Besides, Scott was not most botanists! Scott had collected plants in Amazonas, Brazil as a doctoral student at the University of Wisconsin, Madison, in 1971, and then in 1977 while a Research Associate at NYBG on a Projeto Flora Amazônica expedition along the Rio Solimões, and then on another Projeto Flora Amazônica expedition to Reserva Ducke in 1985 as a Curator at NYBG.

An opportunity for Scott to study Lecythidaceae at the BDFFP reserves developed in 1988, and he, accompanied by Carol Gracie, visited the project in October of that year, the first of many visits. It had become a common practice for the scientific leaders of the BDFFP to invite other scientists to study at the reserves, and likewise many specialists wanted to have access to the forest, data, and research infrastructure provided by project in the reserve network located to the north of Manaus. Trees in the reserves had been marked, and specimens of them collected and sent to taxonomic specialists. Those specialists could subsequently visit a specific tree of interest to them and collect additional samples to fill in the gaps of what is known about the species in question. Scott took full advantage of such a convenient and efficient circumstance, and

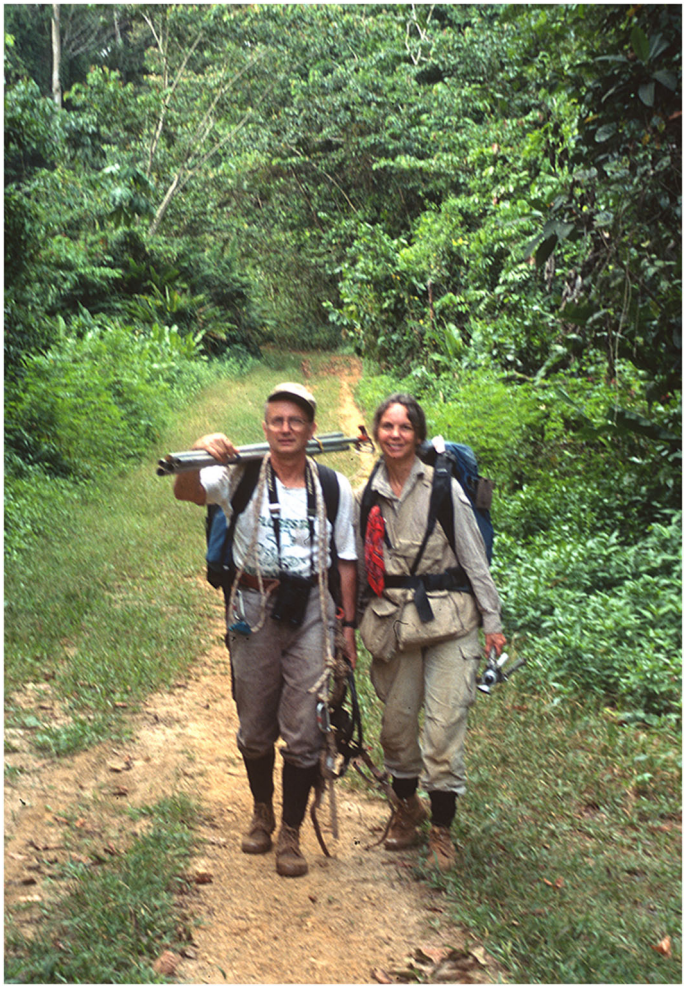

Fig. 8 Scott Mori and Carol Gracie in Saül, French Guiana, September 27, 1995. Photo by Carol Gracie

he was able to publish extensively on the Lecythidaceae of central Amazonia as a result. Representative publications from the phase of Scott's career focused central Amazonian floristics include Mori (1992), Mori and Lepsch-Cunha (1995), Mori (1995), Olivera and Mori (1999), and Mori et al. (2001). As was Scott's practice, he routinely engaged students, interns, and other scientists in the research he conducted with the BDFFP, both in the field and as co-authors of the resulting publications (Fig. 10). One such testimonial is from Ted Gill (pers. comm.) who wrote in 2014, on the occasion of Scott's retirement from NYBG, about his experiences with him in Amazonia and then at Western Connecticut State University, where Ted Gill was an undergraduate student in the early 1990s:

> I was always interested in the Amazonian rainforest and while a Biology/Ecology undergraduate student in 1993, I was presented the opportunity to visit Brazil on a New York Botanical Garden's tour, led by Dr. Scott Mori and his wife, Carol. I

Fig. 9 Scott Mori next to *Philodendron scottmorianum* Croat & Moonen in cultivation at Emerald Jungle Village, French Guiana. Photo by Joep Moonen

turned this unique experience into an independent ethno-botany study project. The sites and learning experience were amazing and Dr. Mori's knowledge, patience and willingness to teach made the study and public presentation a success; I could not have been more thrilled and my teachers and student body were also rewarded with Scott and Carol's attendance at the event. To have such a distinguished guest at an undergraduate presentation shows Scott's dedication.

Costa Rica – Osa Peninsula

In 2008, Scott, in collaboration with Reinaldo Aguilar, Xavier Cornejo, Catherine Bainbridge, and Melissa Tulig, initiated an e-flora of the Osa Peninsula of Costa Rica (Aguilar et al., 2017 onward). The lead botanist on this project, Renaldo Aguilar, was admiringly profiled by Scott within the context of this e-flora (Mori, 2017). Scott's role was principally in identifying Lecythidaceae and specimens from other plant families of particular interest to him collected by Aguilar and colleagues in Costa Rica, although he did make a brief collecting trip with N. P. Smith and J. González to the Osa Peninsula in 2004 (Fig. 11), during which he collected a specimen of *Couratari scottmorii* Prance (NY Barcode 690269). Scott also collaborated on a publication about the phytogeography of the trees of Osa Peninsula, (Cornejo et al., 2012). Two of Scott's collaborators on the Osa Peninsula e-flora and other projects, Xavier Cornejo of

Fig. 10 Scott Mori with Lecythidaceae team at Biological Dynamics of Forest Fragments Project in August 1989. Photo by Carol Gracie

Ecuador and Nate Smith of Brazil, sent the following statements of appreciation in 2014 at the time of Scott's retirement from NYBG.

> *Scott Mori is a fine botanist who has accomplished an outstanding contribution to the knowledge of Neotropical plants during the past four decades. His work on Lecythidaceae is unsurpassable, and the floras of Central French Guiana, Saba and Peninsula de Osa, nowadays are much better known mainly thanks to Scott's dedication and efforts. Hardly could I think about finding another botanist like him to work at that level of reliability and productivity as has been done with Scott.* (Cornejo, pers. comm.)
>
> *Congratulations on your long and prosperous career at NYBG and thank you for being such a great mentor and wonderful friend. Our long discussions about plants, the books and articles we have worked on, botanizing while floating down the Amazon, exploring central French Guiana, the night we spent lost in the forest on Pic Matécho, you saving me as I was nearly swept away by a flooding river in Costa Rica, and searching for rare species in the Atlantic Forest are only a few of the experiences we have shared and they are some of my best memories. Your generosity, enthusiasm, and willingness to share your knowledge have had a lasting impact on the lives of so many and I am honored to be among those people.* (Smith, pers. comm.)

Saba

Scott's interests in the flora of the island of Saba, in the Netherlands Antilles, was piqued by Michael Smith of Conservation International, who had the idea of creating

Fig. 11 Scott Mori on an expedition to the Osa Peninsula, Puntarenas, Costa Rica, May 2004. Photo by Nate Smith

virtual natural history museums for the many islands in the Caribbean region that were probably too small to have physical natural history museums. In February 2006, Conservation International, in conjunction with the Saba Conservation Foundation launched a project to survey the terrestrial and marine biodiversity of the island; NYBG was to lead on the survey of plants and lichens, and the Department of Botany of the Smithsonian Institution surveyed the marine algae. In 2006 and 2007, the plants and lichens survey team consisted of Bill Buck, bryophytes (NYBG); Carol Gracie, photographer (NYBG); Paul Hoetjes, Project Coordinator, Department of Environment and Nature (MINA), Netherlands Antilles; James Johnson, guide, Saba Conservation Foundation; Scott Mori, flowering plants (NYBG); Michael Smith, Project Leader (Conservation International); and Harrie Sipman, lichens (Botanischer Garten und Botanisches Museum Berlin-Dahlem). In the course of the project, Scott balanced his time between meeting with residents of Saba to discuss the importance of plants and their conservation (Fig. 12), and collecting about 1000 specimens to document the flowering plants of the island (Fig. 13). Scott and colleagues created a web site for the Plants and Lichens of Saba (Mori et al. 2007 onward) to document their survey results. Paul Hoetjes (pers. comm.) sent me the following appreciation statement on the occasion of Scott's retirement in 2014:

> *It was my privilege to accompany you and the NYBG group that came to Saba in 2006 and 2007 to survey the plants of the islands. I still fondly remember those days driving around in that bright yellow mini-schoolbus generously provided by the island for the use of the survey team, and hiking all over the island with James "Crocodile" Johnson as our guide. Your patience in teaching us non-botanists accompanying the survey team was amazing and I never learned more about the*

plants on the island. Thanks to you and your team, Carol, Bill, and Harrie, the first online herbarium for Saba was realized, a unique tool both for subsequent botanical work and for the inhabitants of the island, allowing them to easily explore their island's flora. Thank you so much for making the time to visit our tiny island and helping us know and appreciate our flora better.

New York – Westchester Wilderness Walk/Zofnass Family Preserve

After Scott retired as Nathaniel Lord Britton Curator at NYBG in 2014, he continued as Curator Emeritus adding to and refining *The Lecythidaceae Pages* (Mori et al. 18 March 2010 onward) and attending to other online projects. He also focused on a new a new floristic project that Robert F. C. Naczi and he had launched in 2013 at the Westchester Wilderness Walk/Zofnass Family Preserve, a 150-acre protected area in the Pound Ridge area of Westchester County, New York. The project had two goals: first, to develop specimen-based inventories of the fungi and plants of the Preserve so that visitors could learn about and enjoy the plants and fungi they encountered there, and second, to document the mycota and flora so changes over time could be monitored. The project was envisioned as part of NYBG's much larger project, the *New Manual of Vascular Plants of Northeastern United States and Adjacent Canada.* The team created a web site for the project to provide a portal for users to consult specimens that were collected at the Preserve and to learn about their natural history (Mori & Naczi, 2015 onward). Scott enlisted the assistance of a number of botanists and mycologists from NYBG and elsewhere to make collections and to identify species for the project. He also recruited a similarly large number of volunteers, students, and interns to assist with the collecting and processing of specimens (Fig. 14). A video

Fig. 12 Scott Mori teaching Sea Scouts on Saba, October 2007. Photo by Carol Gracie

Fig. 13 Scott Mori pressing plants on the North Coast Trail, Saba, August 13, 2006. Photo by Carol Gracie

about the experiences on the project of a Taft School student, Camila Jiang, captures the dynamics of the research underway at the Preserve and at NYBG (https://www.youtube.com/watch?v=1Z_Wxd3Cjc4); this video link is also available on the home page of Mori & Naczi (2015 onward). In 2014 on the occasion of Scott's retirement from NYBG, artist and photographer Michael Rothman, who had volunteered with this project, wrote this statement of appreciation (Rothman, pers. comm.):

> *During the last few months Scott, as he has reconfigured his own plans on the threshold of formal retirement from the ISB, has also given me the opportunity to work as field assistant/plant photographer in a new phase of his career in botany: he is now setting up an online database which will function as user portal for identifying plants in the Zofnass Preserve, part of the Westchester Land Trust's holdings to the North of NYC. For me it has the qualities of an apprenticeship, of working under a Master's guidance plus the experience of helping a pal and being useful. (It's also just plain fun). And who wouldn't want to be in debt for being able to participate such a great activity? It is an honor to be Scott's friend.*

Ecological Studies

In the course of Scott's fieldwork for monographic and floristics studies, he routinely conducted ecological research on a wide variety of topics, ranging from determining the density, dominance, and diversity of tree species at a forest research site, to the interactions between plants and animal pollinators and seed dispersers, to documenting detritivores and saprotrophs of the forest floor. Examples of Scott's collaborations on forest inventories include Mori et al. (1983) from Bahia, Brazil; Mori and collaborators (1987) from central French Guiana; and Mori et al. (1989) from the Brazilian Amazon. Examples of Scott's research on pollination and dispersal studies with the

Fig. 14 Scott Mori collecting specimens and data with his field team at the Westchester Wilderness Walk/Zofnass Family Preserve on June 3, 2013. Photo by Carol Gracie

Lecythidaceae include Mori et al. (1980); Knudsen and Mori (1996); and Prance & Mori (1998). His publications on forest decomposers, most of which were catalyzed by his doctoral student Amy Berkov (Fig. 15) include Tavakilian et al. (1997), Feinstein et al. (2007, 2008). Scott's research into bat pollination and dispersal seemed to hold a special place for him. I have vivid memories of the times in French Guiana in 1982 that Scott and I labored to catch the bats that were visiting the white flowers of *Lecythis poiteaui* at night, by stringing mist nets high in the forest canopy. The physical difficulty and danger of the task, and the potential great reward of new scientific discoveries in a plant species Scott adored, made for perfect nights in the French Guiana forest for Scott. As it turned out, for me too, as I was able to learn how to be a tropical botanist from a master practitioner of the art and science of this profession. Important papers on bats and plants in which Scott contributed as a co-author include Lobova et al. (2003) on *Cecropia* as a food resource for bats; Lobova and Mori (2004) on epizoochorous dispersal by bats; and most importantly, the book entitled *Seed Dispersal by Bats in the Neotropics* (Lobova et al., 2009).

Merlin Tuttle, Founder and Executive Director, Bat Conservation International (retired), in 2014 on the occasion of Scott's retirement from NYBG, sent me this touching and humorous message of appreciation (Tuttle, pers. comm.):

> *Scott is a master of Neotropical botany. No one has contributed more prolifically, or with more lasting impact. He never flinched from climbing the tallest tree, or hesitated to endure the most trying of field circumstances in order to find a new plant or make a new discovery. His vast interdisciplinary knowledge was shared generously, both with his students and with the public at large. He was an eloquent communicator whose passion inspired countless others, not just as scientists, but also as conservators of the natural world. I am personally indebted to Scott for his fundamental contributions to knowledge of the essential roles of plant-visiting bats.*

Fig. 15 Amy Berkov and Scott Mori in French Guiana, September 1995. Photo by Carol Gracie

It was my great privilege to several times join Scott in the field, first in French Guiana in 1987, where I vividly remember two incidents. The first occurred as he was climbing a Cecropia *tree in search of material for one of my bat photographs. When he looked down and saw me about to swat a small black bee that was pestering me, he warned, "Whatever you do, don't swat it. If you do it will release a pheromone that will attract lots more." Not going to be intimidated by a mere stingless bee, I ignored his advice, and like magic, I was quickly engulfed in a black cloud of painfully biting bees. Having observed my failure to heed his warning, Scott was laughing so hard he was at risk of falling from his perch above. Luckily at that moment, a brief tropical downpour apparently washed me clean, putting an end to my embarrassment.*

A few days later I inadvertently got the last laugh. I had been photographing a vampire bat in my traveling studio in an old open-air miner's cabin where Scott and his team of botanists had gathered to watch. Seated on a bench in front of an open window, they asked to see the bat close-up, so I brought it out, then gradually opened my hand intending for the released vampire to escape through the window. Nevertheless, when Scott saw me opening my hand, he suddenly yelled an alarm that so frightened the poor bat that instead of flying out the window as planned it jumped down and attempted to find a hiding place in Scott's shorts. I've rarely witnessed such a melee as the bench tipped over leaving half a dozen people in a tangled, writhing mass on the floor! Thankfully, the vampire escaped unharmed as did the humans, and Scott quickly forgave me.

It has been my great privilege to know Scott, not just as an admired colleague, but also as a special friend and partner in conservation who will never be forgotten.

Ecotours

Scott certainly had a solid record of obtaining grants from governmental and private sources over his career to support his research programs. Among the innovative approaches that he and his wife and research collaborator Carol Gracie took to supplement the traditional funding sources was to create an ecotour travel program that simultaneously accomplished two goals. It afforded participants the opportunity to experience exotic and biologically interesting locales in the company of Scott and Carol and local experts, and it also generated revenue for NYBG and research funds for Scott's programs. Scott and Carol were very mindful of the need to use best practices in carrying out ecotourism in terms of the environment and the people who reside in locations visited. Mori et al. (1998) discussed these issues in depth within the context of the situation in central French Guiana. Over the years, Scott and Carol organized more than three dozen ecotours to many destinations, including Hawaii, Mexico, Trinidad (Fig. 16), Italy, France, Greece, Spain, Galapagos, the Brazilian Amazon, Venezuela, Costa Rica, and Andean Ecuador. Hundreds of people signed up for these ecotours, some participating repeatedly because they found the quality of the educational experience was so superb. Three examples of statements of appreciation from ecotour participants that I solicited on the occasion of Scott's retirement from NYBG in 2014 illustrate this assertion. From John Bernstein (pers.comm.), then President of the Leon Levy Foundation, and former staff member in NYBG's Development Department, and currently a Member of the Board of Trustees of NYBG:

> *Having spent only a few short years (thirteen!) working at the Garden, I am always humbled by those that have dedicated their careers to that great institution. Scott Mori always exemplified for me that sense of commitment and dedication, but more than that – his love for the Garden, his work, and the causes for which he so fervently worked was absolutely contagious. You could hardly spend a few minutes talking with Scott without getting completely caught up in his excitement about his studies. My wife Diana and I were fortunate enough to travel to the Amazon with Scott and Carol on one of those wonderful riverboat adventures, this time with a group of interested and hearty members of the Garden's Board. To see Scott "in his element" was one of the great pleasures of my life. To get us all positively enthralled by his enthusiasm at 5 am in a canoe on the Rio Negro is no mean feat, but for Scott – it was just another joyous day doing what he loved: researching the plants of the tropics and, perhaps even more, sharing that love and knowledge with anyone who was interested. I was fortunate enough to work as a colleague of Scott's for 13 years. He taught me that one of the great joys of life is to be passionate about one's work. In that – he is a model for all of us to emulate. Thank you, Scott.*

From Mrs. Thomas J. Hubbard, in 2014, as now, a Member of the Board of Trustees of NYBG, I received this statement of appreciation (Hubbard, pers. comm.):

> *Dear Scott, Thank you for introducing me to the Amazon – the rivers in full flood and the cake mix of colors at the meeting of the waters; the senior palm type orchid, known as* Cattleya*, nestled in the top of trees at high water; the delicate blue orchid that you proceeded to dissect in order to study its structure (some of*

your passengers were almost in tears!); for Roger Tory Peterson whom we met in a small camp in Venezuela, accompanied by his factotum carrying an impressive quantity of equipment – he would only talk through the factotum; for the giant kapok, the largest tree in the forest; for passion fruit pudding; for all the good times we had on our many trips and, last but not least for the Gustavia *you named for Tom and me.*

Finally, from another pair of steadfast participants in the ecotour program, Melite and David Sweet, this appreciation statement for Scott and Carol on the occasion of Scott's retirement from NYBG in 2014 (Sweet, pers. comm.):

We traveled with Scott on a number of occasions through the NYBG travel program which was coordinated by Carol. The participants on these trips ran the gamut from highly credentialed scientists to amateurs like us. Scott was always accessible, imparting his knowledge in a friendly, non-pedantic way, all delivered in his signature soft Midwestern twang. His main teaching tool was that highly technological device, the hand-held magnifying glass. He emphasized concepts and relationships, and taught us that it was more important for us to recognize plant families than to be able to identify specific genera and species along with their botanical names. That way, we would know that we had grasped the underlying essence of a plant. But we were always impressed with the quick identification skills and deep scientific knowledge that came so easily to Scott. He was excited about his work and conveyed a sense of excitement to his fellow travelers.

The trips were fascinating (Amazon, Trinidad, Picos de Europa, Crete, Dordogne). Field work often commenced the moment we stepped off the van, in a parking lot or besides a paved or dirt road before we even reached our study area. No plant was insignificant enough to be overlooked. Nor were weather or terrain ever impediments. We slogged through rain, mud, mist, down rocky canyons, up high mountains, through lush, humid tropical forests. At the end of the day, we were exhausted but exhilarated, our minds heady with the abundance of what we had observed. The day always ended with a relaxing, congenial dinner among friends, with good food and conversation, often with compiling a list of what we had seen that day.

Thanks Scott and Carol, for the memories, for teaching us to appreciate the plant world and for your friendship.

Botanical Art

Scott demonstrated a great interest in photographs, illustrations, and paintings of plants, animals, and natural landscapes, and he formed special relationships with individuals who were masters of their medium. Carol Gracie contributed several thousand photographs of tropical plants for his studies; Bobbi Angell prepared a total of 600 illustrations for him, and Michael Rothman prepared 20 paintings to illustrate the habitats in which he and his fellow curators conduct research (Mori, 21 February 2013b). During

Fig. 16 Scott Mori discussing fruits of sapucaia (*Lecythis pisonis*) with participants on an ecotour to Trinidad in February 2000. Photo by Carol Gracie

the 5 years (1995—2000) that Scott served as the Director of the Institute of Systematic Botany (ISB) at NYBG, he had the idea to commission Rothman to create paintings depicting the plant group(s) that individual ISB curators were most associated with professionally. Scott did this to promote the curators' research and to raise awareness with the general public about the beauty and importance of the plants depicted and of the research being done about them. The paintings can be viewed, and copies were available for sale at Mori & Rothman (2003 onward), with proceeds of the sales to be used for research on the plants of the Neotropics. Scott had the ISB curators' paintings hung outside their offices at NYBG, and arranged for a showing of the artworks at the Taft School in Watertown, Connecticut, *Fields and Forests Afar: A New York Botanical Garden Scientific Expedition in Illustration,* as described by Michael Rothman, who had also accompanied Scott into the field to make sketches for the paintings. Rothman (pers. comm.) reflects on Scott in an appreciation statement he sent me on the occasion of Scott's retirement from NYBG in 2014:

> *Without Scott's unwavering patronage, dating back to the early 1990's, the "Curator Paintings," now gracing the walls of the NYBG-ISB, wouldn't have come into existence. Without Scott's willingness to teach me tree climbing using telephone lineman's spikes I would never have gotten up to the tropical forest canopy (of course, Scott was rigorous in providing equipment instructions, and wouldn't let me unbuckle the safety line to cross into the web of branches within the canopy. Consequently, I was always able to climb down from the canopy in one piece). As a natural science illustrator, learning how to climb up trees and*

scan the forest from above, remains an immensely thrilling artistic inspiration. My way of seeing the world and the sheer phantasmagoria of stuff that can be depicted in a painting was directly, intrinsically, and fundamentally influenced by his instruction. For nearly a quarter century, Scott's help has been instrumental in the development of my career as an artist and I owe a great debt to him for this council and, above all, his friendship. I likely would never have had a one-man exhibit, centered around the Curator Paintings, up at the Taft School in Watertown, CT, without his advocacy.

Educational Impact

Scott was a committed and passionate teacher for all levels of learners from schoolchildren through post-graduate, carrying forward the enthusiastic teaching style he experienced himself as a graduate student of Hugh Iltis at the University of Wisconsin, Madison. For 5 years as an Instructor (1969—1974), he taught undergraduate Botany and Zoology courses at the University of Wisconsin Center System at Marshfield. From 1980, he held an appointment with The City University of New York as Adjunct Professor, from 1997 as an Adjunct Professor at the Center for Environmental Research and Conservation at Columbia University, and from 2000 as Associate Professor Adjunct at Yale University, School of Forestry and Environmental Studies. Scott also taught in NYBG's Adult and Continuing Education Program, presenting courses on Systematic Botany, Advanced Systematic Botany, Tropical Botany, and Tropical Ecology, and gave classes to children in NYBG's GreenSchool Program (Fig. 17). Finally, through the aforementioned ecotour program, Scott had an influential educational impact on hundreds of people.

The eleven graduate students for whom Scott served as their major professor were naturally substantially impacted by that experience. These students, and the year in

Fig. 17 Scott Mori in 1986 speaking with students in the GreenSchool at The New York Botanical Garden. Photo by Carol Gracie

which their degrees were awarded are as follows: Brian M. Boom (Ph.D., 1983), John J. Pipoly (Ph.D., 1986), Pedro Acevedo-Rodriguez (Ph.D., 1989), Chih-Hua Tsou (Ph.D., 1990), Maria Lúcia Kawasaki (Ph.D., 1992), Samuel Kisseadoo (Ph.D.,1993), Amy Berkov (Ph.D. 1999), Amy Litt (Ph.D., 1999), Vanessa Hequet (M.A., 2003), Cullen Geiselman.(Ph.D., 2011), Ya-Yi, Huang (M.A., 2005, Ph.D., 2010). Testimonials of appreciation from two of these former graduate students of Scott – Chih-Hua Tsou and Amy Litt – provide a glimpse of the impact Scott had on them. Both statements were sent to me in 2014 on the occasion of Scott's retirement from NYBG. First, the statement from Chih-Hua Tsou (pers. comm.):

> *It was the summer of 1984, I received a scholarship from the University of Tennessee to pursue my graduate study. My trip arrangement from Taiwan to Tennessee required a stopover at New York City. While visiting friend during my stopover, I met Dr. Jensen at Lehman College, who offered me teaching assistantship and encourage me to stay. I didn't realize that the decision to accept the offer to stay changed my career and my life.*
> *When I went to NYBG to look for possible research topics for my graduate study, a number of curators talked to me about their research areas; the family Lecythidaceae caught my immense interest. As you explained the flowers, pollination, and the fruits, your passion on the research immediately told me that you are the advisor I would like to be under. Indeed, your passion on Lecythidaceae never fades over the past 30 years. The love with Neotropical plants made you a renowned taxonomist and ecologist.*
> *I was fortunate to be your student. The years of my graduate study, from 1984 to 1990, was a fruitful yet memorable time in my life. Your patient guidance and kindly support for a foreign student truly made my graduate study possible. Your profound collections of Lecythidaceae prompted a number of coworkers and me to explore this group of plants from various research aspects, making Lecythidaceae one of the few well studied and documented families; this immense collection also helped me to complete my doctoral thesis.*
> *Your research has been full of excitement and fascinating memories; as a student and life time friend, I sincerely wish you a wonderful retirement and I am sure your passion on plants will continue. With my best regards to you and Carol.*

Second, the statement from Amy Litt (pers. comm.):

> *Here is how Scott Mori changed my life. I was happily teaching high school but in the back of my mind was an unrealized goal of getting a Ph.D. I wanted to explore tropical botany, so I took a trip on the Amazon with Scott and Carol. Scott's unbelievable wealth of knowledge about the plants of the region – along with his boundless enthusiasm and energy – had me in awe. I couldn't get enough of it, everything he said or did amazed me. It seemed to me he knew the name of every living creature we saw, who it was related to, how it made its living. I was thrilled when, upon our return, he agreed to take me on as a student. Scott set me on the course I am still following, so I owe everything I have done for the past 20+ years to him.*

Unknowingly, Scott changed my life again shortly after I started graduate school. We had been planning a project in Lecythidaceae, and I was incredibly excited about it. But one day he called me in on a Saturday. He gave me a slide show introducing me to this strange little family called Vochysiaceae, and told me he wanted me to work on it. I bit back my disappointment – I had become attached to the lecyths – but I knew he would guide me in the right direction, so I agreed. Soon after, the first rbcL phylogeny was published, putting this obscure family next to the Myrtaceae, and shining a spotlight on me and my project. In addition, the floral structure of the family was so incredibly fascinating that I wandered off in that direction and have been there since.

Scott was the perfect mentor – supportive but candid and critical in important ways. He improved my thinking, my writing, my planning – everything. He set the bar with his vast knowledge, his incredible unbelievable organizational skills, his drive and dedication, and his clear sense of right and wrong. I can't live up to his standards, but I know what is possible (for Scott, anyway!) so I can keep trying. I can't thank him enough for everything he did for me. I am sad that he has finally made good on his threat – which he has been tossing around since my graduate days – to retire, but it is well deserved and I bet he will be more productive than ever.

Conservation Impact

One measure of the impact of Scott's work on conservation is the number and nature of the grants he received and the results he produced with those resources. For example, his first grant received in 1981 after he was on the curatorial staff of NYBG was from the World Wildlife Fund (WWF) for a botanical survey of the endangered moist forests of eastern Brazil. These WWF funds resulted in thousands of new herbarium specimens and data from this Biodiversity Hotspot, and a number of publications culminating in the *Botanical Review* volume on Southern Bahian Moist Forests (Mori et al., 1983). Another example was the grant he received from the W. Alton Jones Foundation in 1989 for the project to help define priority conservation areas in Amazonia; another grant from the World Wildlife Fund in 1990 was in support of the same objective of the production of a map showing priority areas. More recently, Scott, together with Barbara Thiers, Vice President and the Patricia K. Holmgren Director of the William and Lynda Steere Herbarium at NYBG, received a grant from the National Science Foundation entitled *Assembly and Evolution of the Amazonian Biota and its environment: An Integrated Approach*. This project, being done in collaboration with Brazilian scientists, is the most integrative investigation of Amazonian biodiversity and its history ever undertaken. Drawing from herbarium specimen data from two important Amazonian plant flowering plant families, Lecythidaceae and Bignoniaceae, this initiative should have profound impact on conservation policy recommendations for Amazonian biodiversity.

Of all of Scott's many expeditions over the years, trips to central French Guiana were most vital to his overall career (Fig. 18). Grants from the National Science Foundation and private foundations enabled research that led to science-based recommendations for protected areas in central French Guiana (Mori & de Granville, 1997).

Perhaps the most substantial conservation impact of Scott and his collaborators was to contribute to making the scientific case for the inclusion of Saül and much of central French Guiana in the immense Guiana Amazonian Park. Established February 27, 2007, under the administration of the Parcs nationaux de France, the 20,300 km^2 (7838 mi^2) Guiana Amazonian Park, together with the contiguous Tumucumaque National Park, covering some 38,800 km^2 (14,980 mi^2) in Brazil, constitute the largest protected rainforest area in the world. This achievement attests to Scott's consistent belief that science should underpin and enable conservation policy decisions.

Scott's popular articles during the latter part of his career, mostly via NYBG's *Plant Talk Blog*, often touched on his belief in the importance of contributions of science to conservation. This is a lesson he learned well from his major professor, Hugh Iltis, in graduate school and that Scott promoted in his research projects throughout his career, from the Guiana Amazonian Park in French Guiana to the Westchester Wilderness Walk/Zofnass Family Preserve in New York State. In his article *The Future of Tropical Forests in the New World* (Mori, 24 January 2013a), Scott wrote:

> *Biologists now have enough knowledge about tropical forests and the conditions under which they grow to determine which areas are appropriate for sustainable agriculture and cattle grazing, which areas should be managed as extractive reserves, and which areas should be set aside as biological reserves. It is no longer the responsibility of botanists, zoologists, and ecologists to demonstrate that tropical rain forests are valuable because they provide ecosystem services to the entire world; it is incumbent upon those who wish to "develop" the forests to demonstrate that the use they propose justifies the accompanying loss of biodiversity and ecosystem services that will occur when they are exploited for human gain.*

Fig. 18 Scott Mori departing from The New York Botanical Garden for an expedition to French Guiana in 1994. Photo by Carol Gracie

Thomas E. Lovejoy, University Professor of Environmental Science and Policy at George Mason University, and Member of the Board of Trustees of The New York Botanical Garden, was with the World Wildlife Fund when, in 1981, the WWF awarded the grant to NYBG for studies on the endangered southern Bahian moist forests. Thus, Tom Lovejoy has been aware of Scott's scientific and conservation impacts for the past four decades. It is a fitting conclusion to this article to quote from the appreciation statement he wrote on the occasion of Scott's retirement from NYBG in 2014 (Lovejoy, pers. comm.). "We salute you!" is the perfect coda to embrace my sentiment too.

> *Dear Scott, Your imprint will be felt forever in the Forest Fragments project north of Manaus, both in terms of field data in the 100 hectare plot and in the herbarium of the project as well as that of INPA, Brazil's National Institute for Amazon Research. That may not seem much for some who don't know the magnitude of the work. For them I would point out that it took the better part of a year, of solid work, day after day, in your usual self-effacing manner. So I thank you for that, but so will future generations of Amazon botanists and ecologists. We salute you!*

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