



BIODIVERSITY AND CONSERVATION SYSTEM OF
GUANGXI SHIWANDASHAN NATURE RESERVE

广西十万大山自然保护区 生物多样性及其保护体系

图书在版编目(CIP)数据

广西十万大山自然保护区生物多样性及其保护体系 / 谭伟福主编. —北京: 中国环境科学出版社, 2005.7

ISBN 7-80209-172-1

I. 广… II. 谭… III. 自然保护区—生物多样性—环境保护—研究—广西
IV.S759.992.67

中国版本图书馆 CIP 数据核字 (2005) 第 074236 号

出版发行 中国环境科学出版社
(100062 北京崇文区广渠门内大街 16 号)
网 址: <http://www.cesp.cn>
电子信箱: cespress@sina.com
电话 (传真): 010-67112738

印 刷 北京东海印刷有限公司

经 销 各地新华书店

版 次 2005 年 8 月第一版

印 次 2005 年 8 月第一次印刷

印 数 1 000

开 本 880×1230 1/16

印 张 24.75 插页 40

字 数 634 千字

定 价 68.00 元

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序

广西是一个很有特色的地方，生物多样性丰富，而且独具特色。最早去广西是在 2000 年，作为国务院国家级自然保护区的评委，到现场考察猫儿山自然保护区和大明山自然保护区，对广西中亚热带和南亚热带的生物多样性有了初步的了解。今年有机会多次到广西考察，对广西的生物多样性有了更多的了解，特别是广西的喀斯特地区和热带北缘的生物多样性，留下深刻的印象。相对而言，外界对广西的生物多样性了解不够，这与广西相对薄弱的研究有一定关系。可喜的是，近年来广西的林业主管部门加大了工作力度，有关专家积极努力，新作不断涌现。七月中旬有幸为谭伟福副院长主编的《广西岑王老山自然保护区生物多样性保护研究》一书撰写序言，向广大读者介绍他们的研究成果。今天再向大家介绍他们的新作《广西十万大山自然保护区生物多样性及其保护体系》。通过阅读该书，丰富了我对十万大山自然保护区的知识。

广西十万大山自然保护区是 1982 年 6 月经广西壮族自治区人民政府批准设立的自治区级自然保护区，2003 年 6 月，国务院批准十万大山自然保护区晋升为国家级自然保护区。十万大山自然保护区是十万大山的核心地区，范围涉及上思县和防城区，保护区东西最长 74.4km，南北最宽 45.0km，地理坐标在东经 $107^{\circ} 29' 59'' \sim 108^{\circ} 13' 11''$ ，北纬 $21^{\circ} 40' 03'' \sim 22^{\circ} 04' 18''$ 之间，总面积 $5\,8277.1\text{hm}^2$ 。十万大山地处我国南部沿海地区，是广西南部最高的山地，属北热带季雨林地带，又是中越边境地区，地理位置特殊。十万大山山体庞大，地层古老，地貌复杂，以中山为主，海拔 1000m 以上的山峰共有 82 座，地势陡峭，切割强烈，沟谷发育；濒临热带海岸，热量丰富，雨量充沛。十万大山自然保护区保存着较大面积的、在广西乃至我国为数不多的具有全球意义的热带森林，孕育着丰富的生物多样性。据调查统计，该保护区有维管束植物 2 233 种、陆栖脊椎动物 397 种、大型真菌 129 种；该书报道了广西动植物新记录种（不含中国大陆新记录种）36 种，包括维管束植物 10 种、陆栖脊椎动物 2 种、大型真菌 24 种；发现中国大陆动植物新记录种 12 种，其中维管束植物 4 种；发现昆虫新种 27 种。在短短的 3 个月时间里，考察队就能取得如此丰富的成果，实属难能可贵。我国在热带亚热带地区建立了多个自然保护区，但面积近 6 万公顷的不多，生物多样性具有明显热带性质的也不多见。根据我的粗略统计，分布在十万大山自然保护区的植物，有 27 种列入 IUCN 红色名录，其中极危种(Critically endangered) 2 种，濒危种(Endangered) 5 种，易危种(Vulnerable) 14 种。在保护国际(Conservation International)确定的世界 25 个生物多样性保护热点地区中，十万大山属于其中的印缅(Indo-Burma)热点地区的一部分，说明其生物多样性在国际上具有重要意义。希望广西的朋友们能够珍爱这一宝贵的自然遗产，细心呵护，为全国，为国际生物多样性保护事业做出贡献。

相信读者朋友会通过本书可以比较全面地了解十万大山自然保护区的生物多样性，由此去了解广西北热带的生物多样性。希望广西的同行们积极努力，有更多的反映广西生物多样性的论著

问世，让更多的人了解广西的生物多样性，理解和支持广西的生物多样性保护工作。作为热爱广西的朋友，我衷心祝贺《广西十万大山自然保护区生物多样性及其保护体系》一书的正式出版发行，祝贺谭伟福副院长等取得的新的成就。

马克平

2005年8月18日于北京香山

Preface

Guangxi is a very characteristic and unique region for abundant bio-diversity. In 2000, I first visited Guangxi as a member of the national-level nature reserve committee of the State Council, to do field investigation among Maoershan Nature Reserve and Damingshan Nature Reserve. There made me with preliminary understanding to Guangxi's biodiversity featured with middle sub-tropic and south sub-tropic. This year I had opportunities to visit Guangxi many times, that let me know more about bio-diversity of Guangxi, especially its biodiversity characterized with Karst area and northern fringe of tropic, which is really impressive. Comparatively speaking, the less understanding of Guangxi's bio-diversity by the external was related with less research work in this field in the past. Gladly, as Guangxi forestry competent authorities enhance their work, combined with relevant experts great efforts, new works are emerging constantly. It is honor for me to write preface for the book *Study on Biodiversity Conservation in Guangxi Cenwanglaoshan Nature Reserve*, edited by Tan Weifu--Deputy director of Guangxi Forestry Survey and Design Institute, to introduce their research results to mass readers in mid-July. Today I would like to introduce their another new book *Biodiversity and Conservation System of Guangxi Shiwandashan Nature Reserve*. Through reading, this book has enriched my knowledge to Shiwandashan Nature Reserve.

The Guangxi Shiwandashan Nature Reserve was established in July of 1982, got approval for provincial level nature reserve by Guangxi Zhuang Autonomous Region government. Later, it was promoted to national-level nature reserve by the State Council in the June of 2003. Situated in the core area of Shiwandashan region, the Reserve is between Shangsi county and Fangcheng district, with the longest length of 74.4km from West to East, and longest width of 45.0km from North to South. It's longitude is between $107^{\circ} 29' 59'' \sim 108^{\circ} 13' 11''$ east and latitude $21^{\circ} 40' 03'' \sim 22^{\circ} 04' 18''$ north while the total area is 58277.1 hm^2 . As the highest hill land in the South of Guangxi, Shiwandashan is located in the coastal area of southern China. Being a part of North tropical season rainforest region and in border area between China and Vietnam, its location is unique in geography. Its typical characteristics include huge mountain body, old stratum, complicated landform, mostly middle mountain landform with 82 mountain peaks at an elevation of more than 1000m, steep topography with cliffs, good development of ravine, close to tropical coast, abundant heat and plentiful rainfall. The Reserve has large area of tropical forest that is few in Guangxi, and even in China, and has rich biodiversity. According to statistics, there are 2233 species of vascular plants, 397 species of terrestrial vertebrates, and 129 species of large size fungi are identified in Reserve; this book reports 36 new recorded species of plants and animals to Guangxi (not including new recorded species to mainland China), among them, there are 10 species of vascular plants, 2 species of

terrestrial vertebrates, and 24 species of large size fungi; Meanwhile, 12 new record species to mainland China, including 4 species of vascular plant were found; 27 species of new species of insect were also found. It is not easy for the survey team to make such huge achievement in only 3 months.

Many nature reserves have been established in tropic and sub-tropic in China, among which, few with area of nearly 60000 hm² and with obvious tropical biodiversity. As my rough statistics, among the plant distributed in Shiwandashan Nature Reserve, 27 species are listed into IUCN red name list, including 2 critically endangered species, 5 endangered species, and 14 vulnerable species. Shiwandashan belongs to part of the Indo-Burma hot spot, one of the 25 conserved biodiversity hot spots in the world identified by the Conservation International, which indicates that biodiversity in Guangxi plays an important role in the world. Hopefully friends in Guangxi could treasure this valuable natural legacy, take good care of it, and make more contribution to the career of national and international biodiversity conservation

It is believed that readers and friends would entirely understand biodiversity of Shiwandashan Nature Reserve, and further to understand the bio-diversity of the north tropic of Guangxi through reading this book. I sincerely hope Guangxi colleagues will have more works published by making great efforts actively, so as to let more people know biodiversity in Guangxi, and get understanding and supporting biodiversity conservation there. As a friend who loves Guangxi, I heartily congratulate the formal publication of book *Biodiversity and Conservation System of Guangxi Shiwandashan Nature Reserve*, also congratulate on such new achievement made by Deputy director Tan WeiFu and his colleagues.

Mr. Ma Keping

Botanical Research Institute of China Academy of Sciences

Aug. 18th, 2005 Xiangshan, Beijing

前 言

生物多样性保护是当前国际社会非常重视的一个问题，因为它是人类赖以生存和发展的基础。而自然保护区是保护、利用、监测和研究包括生物多样性在内的自然资源和自然环境的特定自然区域，它既是人类认识、利用和改造自然的科学研究基地，是保护、发展和研究野生生物资源及自然历史遗产的主要场所，也是自然生态系统和生物种源的储存地和基因库。加强自然保护区的建设，对保护生物多样性具有十分重要的意义。

广西十万大山自然保护区是1982年6月经广西壮族自治区人民政府批准设立的自治区级自然保护区。保护区位于防城港市上思县与防城区交界处，主要保护对象为水源涵养林和季雨林、山地常绿阔叶林模式标本产地。

十万大山地处我国南部沿海地区，是广西南部最高的山地，耸立于上思、防城、钦州、宁明四县（市、区）之间，地处北热带，属北热带季雨林地带，又是中越边境地区，地理位置特殊；十万大山山体庞大，地层古老，地貌复杂，以中山为主，海拔1000m以上的山峰共有82座，地势陡峭，切割强烈，沟谷发育，濒临热带海岸，热量丰富，雨量充沛。

十万大山自然保护区位于十万大山地区的核心位置，保护区保存了许多孑遗、古老植物及种群，分布着许多珍稀、濒危动植物物种，具有很强的特有性、典型性和珍稀性，其生态地位具有全球意义和特殊的保护价值。这里保护着较大面积的广西乃至我国为数不多的具有全球意义的热带森林，孕育着十分丰富的植物和植被资源及其丰富的生物多样性，成为广西乃至全国热带地区重要的生物基因库和水源林区。在2000年《全国林业系统自然保护区体系规划》中，十万大山地区被列为我国16个热点地区之一。

多年来，许多科学工作者曾在这块人为活动轻微的林区进行过各种自然资源的考察和研究，也取得了许多重要的成果。为了全面查清十万大山自然保护区的自然资源现状，为保护区的保护和利用提供科学依据，2001年10月10日，由广西壮族自治区林业局罗永魁副局长携同野生动植物保护处黄福行处长、陈瑚副处长，以及野生动植物和自然保护区管理站苏之力副站长等有关领导，在防城港市林业局组织召开了由上思县林业局、防城区林业局和钦州市钦北区林业局等有关十万大山自然保护区主管部门领导参加的协调会，提出对广西十万大山自然保护区进行一次多学科综合考察。根据这次会议精神，十万大山自然保护区各方主管部门又进行了多次深入的商研，为便于协调和管理等因素考虑，决定将综合考察的范围确定在上思县和防城区范围。综合考察工作由广西林业勘测设计院主持，防城港市林业局、上思县林业局、防城区林业局协助完成。之后，广西林业勘测设计院于2001年11月22日组建了广西十万大山自然保护区综合科学考察队，考察队由广西林业勘测设计院、广西大学、广西自然博物馆、广西科学院、贵州省科学院、广西国土资源厅、广西地矿局、广西师范学院、广西林业科学研究院、香港嘉道理农场暨植物园、中国科学院北京植物园、浙江大

学、华南农业大学、西北农林科技大学、河北大学、广西水文资源钦州分局防城水位站、上思县水电局、上思县气象局、防城港市防城区气象局等单位专家、教授 73 人组成。考察队聘请广西植物界专家苏宗明研究员、钟业聪高级工程师和广西动物界专家周放教授为顾问,对相关专业资料进行审阅。考察内容包括地质矿产、地貌、水文地质、陆地水文、土壤、气候、植物资源、植被资源、森林资源、大型真菌、动物、昆虫等 12 个自然学科内容。考察时间从 2001 年 11 月底开始,到 2002 年 1 月结束野外考察,到 2002 年 3 月底形成考察成果,综合科学考察成果经广西壮族自治区自然保护区评审专家委员会预审后,由自治区人民政府上报国家林业局。2002 年 12 月 8~11 日,国家林业局组织全国林业系统国家级自然保护区评审专家委员会评审后,上报国务院。受国务院委托,国家环保总局组织了全国自然保护区评审专家委员会评审通过后,经国务院办公厅审定,于 2003 年 6 月下旬发布广西十万大山自然保护区晋升为国家级自然保护区。

这次考察,经过全体考察队员的风餐露宿,翻山越岭,共采集了植物标本 3 000 份,大型真菌标本 400 余号,昆虫标本 5 000 头,动物标本 40 号,挖取了 77 个土壤剖面,采集了 1 400 份土样……考察记录到十万大山动植物 3 548 种(尚未包括香港嘉道理农场华南生物多样性调查记录的部分物种),其中包括维管束植物 2 233 种、陆栖脊椎动物 397 种、大型真菌 129 种、昆虫 789 种;发现动植物广西新记录种(不含中国大陆新记录种)36 种,包括维管束植物 10 种、陆栖脊椎动物 2 种、大型真菌 24 种;发现中国大陆动植物新记录种 12 种,包括维管束植物 4 种(石豆兰 1 种 *Bulbophyllum* spp. 疑为科学新种)、昆虫 8 种;发现昆虫新种 27 种。在短短的 3 个月时间里,考察队员就能取得如此丰富的成果,这纯属十万大山自然保护区本身先天因素的赐予,足以说明十万大山自然保护区的自然资源是相当丰富的。

与此同时,为实现科学保护和有序开发十万大山国家级自然保护区的自然资源,实现保护区的可持续发展,实现森林生物多样性的永续利用,取得最佳生态、社会 and 经济效益。广西林业勘测设计院受广西十万大山国家级自然保护区管理局筹建领导小组的委托,承担了《广西十万大山国家级自然保护区总体规划》(以下简称《总体规划》)的编制工作。2003 年 11 月,《总体规划》编制项目组成员和十万大山国家级自然保护区管理局筹建领导小组、防城港市林业局、上思县与防城区林业局及保护区管理处的领导、有关专家及技术人员,就《总体规划》的基本思路进行了座谈讨论,并对项目的落实提出了具体建议,在申报国家级自然保护区的总体规划基础上形成了《总体规划》纲要。经征求广西壮族自治区林业主管部门、有关专家的意见后,依据林计财规字[2000]64 号《国家林业局计资司关于规范国家级自然保护区总体规划和建设程序有关问题的通知》精神,于 2003 年 12 月初形成了《总体规划》送审稿。2003 年 12 月 19 日,广西壮族自治区林业局在南宁主持召开了广西十万大山国家级自然保护区总体规划评审会。会后,项目组根据自治区专家评审委员会的修改意见进行修改完善,于 2003 年 12 月 28 日形成了报送国家林业局评审《总体规划》正式稿。2004 年 3 月 17 日,国家林业局组织有关专家对《总体规划》进行评审,并提出了具体的修改意见。项目组根据国家林业局的评审意见进行修改,于 2004 年 3 月 30 日完成《总体规划》最终稿,2005 年 3 月国家林业局正式批准《广西十万大山国家级自然保护区总体规划》。

本著作是在十万大山综合科学考察以及《总体规划》编制的基础上完成,是集体劳动的结晶,是全体考察队员艰辛劳动的成果。在本著作编写过程中,得到了广西壮族自治区林业局野生动植物保护处、广西壮族自治区林业局野生动植物和自然保护区管理站、十万大山国家级自然保护区管理

局筹建领导小组、防城港市林业局、上思县和防城区林业局、十万大山自然保护区管理处的大力支持，在此一并表示衷心感谢！同时，香港嘉道理农场暨植物园组织的华南生物多样性研究队于 1997 年至 2001 年对十万大山自然保护区也先后做了多次的野外调查观察，并在其成果尚未发表之前特提供给本次考察使用，在此谨致以诚挚的谢意。

生物多样性研究涉及学科广泛，而生物多样性保护则是一项多学科、多专业、综合性强的工作，涉及范围广，技术要求高，难度大，加上我们技术水平和能力有限，难免有不妥和错误之处，敬请有关专家、领导以及广大同仁批评指正。

编者
2005 年 5 月

Preface

As the foundation for survival and development of human being, biodiversity conservation is a big issue attracting much more attention of the world. Nature reserve is a specific natural region to protect, utilize, monitor and study natural resources and natural environment, including biodiversity. It means nature reserve is the scientific research base for people to know about nature, utilize nature and transform nature, it is a main place to protect, develop and study wild living resources and natural historical heritage, also it is the storage place and gene pool of natural ecosystem and biological species sources. To construct reserve has important significance to biodiversity conservation.

Under the approval of government of Guangxi Zhuang Autonomous Region, Shiwandashan Nature Reserve was established as a provincial level Nature Reserve in June, 1982. The Reserve is located at the border between Shangsi County of Fangchenggang City and Fangcheng District. The main protection objects are water source protection forest, monsoon forest, montane evergreen broadleaf forest and origin of model sample.

As the highest hill land in the South of Guangxi, Shiwandashan is located in the coastal area of southern China between Shangsi County, Fangcheng City, Qinzhou City and Ningming County. Together with located in North tropic and border area between China and Vietnam, and being a part of North tropical season rainforest region, its location is unique in geography. Its typical characteristics include huge mountain body, old stratum, complicated landform, mostly middle mountain landform with 82 mountain peaks above 1 000m ASL, steep topography with cliffs, good development of ravine, close to tropical coast, abundant heat and plentiful rainfall.

Situated in the core area of Shiwandashan region, Shiwandashan Reserve lives many relic or old plants and populations, and it is the habitat for many rare and endangered plants and animals, which make its strong endemic, typical and rare characters, and the significant ecological position of Reserve in the world and special value in its protection. Particularly, with the conservation of the large area of tropical forest that is few in Guangxi, or even in China, abundant plant and vegetation resources, and rich biodiversity, the Reserve has become an important biological gene pool and water source protection forest of tropical forest in Guangxi or even in China. Shiwandashan region is classified as one of the key 16 hotspot areas within China in System Planning of Nature Reserve in National Forestry System, 2000.

Over years many scientific workers had carried out different investigation and study on natural resources in this nearly untouched forest, and a lot of important achievements had been made. In order to provide scientific basis for conservation and utilization through a thorough investigation of natural

resources in Shiwandashan Nature Reserve, a coordination meeting that focused on Shiwandashan Reserve was held in Fangchenggang Forestry Bureau on 10th Oct, 2001. Mr. Luo Yongkui, deputy general director of Guangxi Forestry Bureau (GFB) organized and attended the meeting. Other attendances are Huang Fuxing, Chief of Wildlife Protection Division (GFB); Chen Hu, Deputy Chief of Wildlife Protection Division (GFB); Su Zhili, Deputy Chief of Wildlife and members of Nature Reserve Administration Station, and relevant leaders from Shangsi County Forestry Bureau, Fangcheng District Forestry Bureau and Qinbei District Forestry Bureau of Qinzhou City. A proposal was to conduct a multi-discipline integrated survey on Shiwandashan Nature Reserve was put forward in this meeting.

Finally, after some further discussion and study on the survey proposed in this meeting, various supervision departments of Reserve decided to define the survey range of the comprehensive investigation in Shangsi County and Fangcheng District based on factors of coordination, management, etc. the investigation was decided to be organized by Guangxi Forestry Survey & Design Institute, with assistance of Fangchenggang City Forestry Bureau, Shangsi County Forestry Bureau and Fangcheng District Forestry Bureau.

On 22nd Nov, 2001, Guangxi Forestry Survey & Design Institute organized Guangxi Shiwandashan Integrated Investigation Team, including 73 specialists from Guangxi Forestry Survey & Design Institute, Guangxi University, Guangxi Nature Museum, Guangxi Academy of Sciences, Guizhou Academy of Sciences, Guangxi Land and Resources Bureau, Guangxi Geosciences & Mineral Bureau, Guangxi Normal College, Guangxi Forestry Science Research Institute, Hongkong Kadoorie Farm & Botanic Garden (KFBG), Institute of Botany under Chinese Academy of Sciences, Zhejiang University, South China Agricultural University, Northwest Agriculture & Forestry University, Hebei University, Fangcheng Water Level Station of Qinzhou Sub-bureau of Guangxi Hydrology Resources, Guangxi Shangsi County Hydropower Bureau, Weather Bureau of Fangcheng District of Guangxi Fangchenggang City, etc. In addition, three Guangxi experts were employed to act as team advisors to examine and approve materials of relevant specialties. They are Mr. Su Zhongming, Researcher of plant; Mr. Zhong Yecong, Senior engineer; and Professor Zhou Fang, Professor in animal specialty.

The content of the investigation covered 12 disciplines, such as geological and mineral resources, landform, hydrogeology, land and geography, soil, climate, plant resources, vegetation resources, forest resources, large size fungi, animals and insects. This investigation began in late Nov. 2001, then fieldwork was finished in Jan. 2002, and finally investigation result was sorted out on 19th Dec, 2002. After the pre-review of Review Expert Committee of Guangxi Provincial Nature Reserve, the investigation result was reported to State Forestry Administration by Guangxi government.

On 8th to 11th of December, 2002, organized by State Forestry Administration, the Review Expert Committee of National-level Nature Reserve of National Forestry System examined the report, and then the result was reported to the State Council. Authorized by the State Council, organized by State Environmental Protection Bureau, the Review Expert Committee of National Nature Reserve examined the report again and approved it. Finally, approved by the document of General Office of State Council, Guangxi

Shiwandashan Nature Reserve was promoted to national-level nature reserve in June 2003.

In this investigation, the investigation team members collected 3 000 samples of plants, 400 samples of large size fungi, 5 000 samples of insects, 40 samples of animals, 1 400 samples of soil with cutting 77 sections of soil, etc. 3 548 species of plants and animals were recorded in Shaiwandashan (not including some records made by Hongkong Kadoorie Farm & Botanic Garden (KFBG) during biodiversity survey). They include 2 233 species of vascular plants, 397 species of terrestrial vertebrates, 129 species of large size fungi, 789 species of insects. 36 new recorded species to Guangxi plants and animals, including 10 species of vascular plants, 2 species of terrestrial vertebrates, and 24 species of large size fungi (not including new recorded species to mainland China), were found. Meanwhile, 12 new record species to mainland China, including 4 species of vascular plant (one species of *Bulbophyllum* spp. May be a new species in science), 8 species of insects were found and 27 new species of insects were found too. It is enough to prove that the natural resources in Shiwandashan reserve is quite rich by the abundant achievement in the three months.

In the meantime, in order to realize scientific protection and well-regulated utilization of the natural resources in Shiwandashan National Nature Reserve, to realize the sustainable development of the Reserve, to realize continuous utilization of forest biodiversity, and to attain optimal ecological, social-economic benefits, consigned by Leading Group of Planned Reserve administration Bureau, Guangxi Forestry Survey & Design Institute took on the writing of Master Plan of Guangxi Shawandashan National Nature Reserve. In Nov. 2003, a discussion meeting was held, and the attendances included writing group members of Master Plan, leaders, experts and technicians from Leading Group of Planned Reserve Administration Bureau, Fangchenggang City Forestry Bureau, Shangsi County, Fangcheng District Forestry Bureau, Reserve administration office, etc. After discussing the basic idea of Master Plan, a detail proposal of implementation was sorted out, and a outline of Master Plan was figured out based on the overall planning of applying for national-level nature reserve.

Based on [2000] 64 decree of State Forestry Administration - Notice from Bureau of Development, Planning and Finance Management under State Forestry Administration, concerning on Standardizing Master Plan of National-level Nature Reserve and Issues of Construction Procedure, and incorporated with the suggestions and advice from Guangxi forestry administration agencies and relevant experts, the draft of Master Plan was completed in early Dec 2003. On 19th Dec, 2003, Guangxi Forestry Bureau held a review meeting on Master Plan of Shiwandashan National Nature Reserve in Nanning. After the meeting, on 28th Dec, 2003, the writing group submitted a formal version of Master Plan by modifying the draft according to suggestions from provincial expert review committee.

On 17th March, 2004, State Forestry Administration organized relevant experts to examine the Master Plan, and detail suggestions for revision were put forward. The writing group modified the Master Plan according to these suggestions, and then completed the final document of Master plan on 30th March, 2004. In March 2005, Master Plan of Guangxi Shawandashan National Nature Reserve was approved by State Forestry Administration.

This literature is written on the basis of comprehensive scientific investigation to Shiwandashan and the Master Plan. It is result of collective efforts and all team members' hard work. In the course of writing the report, we got supports and helps from Wildlife Protection Division of Guangxi Forestry Bureau, Wildlife and Nature Reserve Administration Station of Guangxi Forestry Bureau, Leading Group of Administration Bureau of Planned Shiwandashan National Nature Reserve, Fangchenggang City Forestry Bureau, Shangsi County Forestry Bureau, Fangcheng District Forestry Bureau, Administration Office of Shiwandashan Reserve, etc. We would like to express our sincere thanks to all the above agencies.

Meanwhile, we also would like to extend our cordial thanks to Hongkong Kadoorie Farm & Botanic Garden (KFBG) for it provided its results of field survey to biodiversity in South China, which was conducted by survey team organized by KFBG, between 1997 to 2001 to Shiwandashan Nature Reserve before their publication of the data.

Many specialties involved, wide work content, strong relationship between biodiversity conservation and policy, high job requirement, great difficulty in work, and inadequateness in knowledge, unavoidably there are something insufficient and even wrong in this research results, we are looking to the feedbacks from readers.

As biodiversity study covers many disciplines, and biodiversity protection involves many disciplines and specialties, and many departments, while due to the high technical requirement and great difficulty in work, and inadequateness in knowledge, unavoidably there are something insufficient and even wrong in this report, we are looking forward to the feedbacks from readers.

Editor

May 2005

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