

黑脸琵鹭全球同步普查 2014

The Hong Kong Bird Watching Society 香港观鸟会

Organized by 统筹





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Black-faced Spoonbills *Platalea minor* at Mai Po Nature Reserve, Hong Kong.

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### **CONTENTS**

English Report	
Abstract	Error! Bookmark not defined.
Introduction	Error! Bookmark not defined.
Method	Error! Bookmark not defined.
Results and discussion	Error! Bookmark not defined.
Overview	Error! Bookmark not defined.
Taiwan	Error! Bookmark not defined.
Pearl River Estuary	Error! Bookmark not defined.
Mainland China and Hainan Island	Error! Bookmark not defined.
Red River Delta, Vietnam	Error! Bookmark not defined.
Japan	Error! Bookmark not defined.
Republic of Korea	Error! Bookmark not defined.
Cambodia	Error! Bookmark not defined.
Thailand	Error! Bookmark not defined.
The Philippines	Error! Bookmark not defined.
Palau	Error! Bookmark not defined.
Conclusion	Error! Bookmark not defined.
Acknowledgments	Error! Bookmark not defined.
References	Error! Bookmark not defined.
Maps	
Map 1a. Locations of wintering Black-faced Spoonbills	s in winter 2013-1425
Map 1b. Locations of wintering Black-faced Spoonbills	s in winter 2013-1426
Tables	
Table 1. Number of Black-faced Spoonbills in dis	fferent locations of East Asia, winter
2013-2014	28
Table 2. Sites visited with no Black-faced Spoonbill period.	-
Table 3. Numbers of Black-faced Spoonbills in Taiwar	
Table 4. Numbers of Black-faced Spoonbills in	the Pearl River Estuary during the
international censuses.	33

## 黑脸琵鹭全球同步普查 香港观鸟会

### 目錄

中文报告	
撮要	Error! Bookmark not defined.
引言	Error! Bookmark not defined.
普查方法	Error! Bookmark not defined.
结果及讨论	Error! Bookmark not defined.
综观	Error! Bookmark not defined.
台湾	Error! Bookmark not defined.
珠江河口(包括香港和深圳的后海湾,以及澳门凼仔路环)	Error! Bookmark not defined.
中国大陆和海南岛	Error! Bookmark not defined.
越南红河口	Error! Bookmark not defined.
日本	Error! Bookmark not defined.
韩国	Error! Bookmark not defined.
柬埔寨	Error! Bookmark not defined.
泰国	Error! Bookmark not defined.
菲律宾	Error! Bookmark not defined.
帕劳	Error! Bookmark not defined.
总结	Error! Bookmark not defined.
鸣谢	Error! Bookmark not defined.
参考文献	Error! Bookmark not defined.
<b>地图</b> 地图 1a. 2013-14 年黑脸琵鹭冬季栖息地点	
图表	
表 1. 2013-2014 年冬季东亚各地的黑脸琵鹭数量。	
表 2. 2014 年全球同步普查期间曾进行调查但未有录得琵鹭的地	
表 3. 全球同步普查期间在台湾录得的黑脸琵鹭数量。	
表 4. 全球同步普查期间在珠江河口录得的黑脸琵鹭数量。	
表 5. 全球同步普查期间在中国大陆及海南岛录得的黑脸琵鹭数	[量。34
表 6. 全球同步普查期间在越南红河口录得的黑脸琵鹭数量。	34

	表 7. 全球同步普查期间在日本录得的黑脸琵鹭数量。	34
	表 8. 全球同步普查期间在韩国济州岛录得的黑脸琵鹭数量。	34
	表 9.全球同步普查的黑脸琵鹭总数及百分比增加。	35
图片	<u>.</u> 1	
	图 1.1989-90 至 2013-14 年冬季已知的黑脸琵鹭数量。	37
	图 2.2014 全球同步普查期间黑脸琵鹭在不同越冬地的全球百分比。	37
	图 3. 比较全球同步普查的已知黑脸琵鹭数量,以及四个重要聚集地点(台湾台南、香港深	圳后
	海湾、越南红河口和海南岛)的数量趋势。	38
附录	₹	
	附录 1.2014年黑脸琵鹭全球同步普查香港及深圳结果。	40

黑脸琵鹭全球同步普查 2014

English Report 英文报告

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#### **Abstract**

The annual International Black-faced Spoonbill Census was conducted on 17-19 January 2014. This is an important project to acquire comparable figures to assess the health and the distribution range of the wintering population of Black-faced Spoonbill on an annual basis. The census in 2014 recorded a total of 2,726 Black-faced Spoonbills, embracing a mild increase by one individual from 2013. The count in 2014 reached a record high since the inception of this census in the early 1990s. As in the past censuses, Tsengwen River estuary of Tainan as well as Deep Bay between Hong Kong and Shenzhen are the two largest wintering sites of Black-faced Spoonbill. Apart from these two sites, in 2014, 215 individuals and 157 individuals were recorded at Chiayi and Kaoshiung respectively, probably an expansion from the nearby wintering flock at Tsengwen estuary area; 128 and 68 individuals were also observed respectively at Haifeng in Guangdong and Fuqing Bay in Fujian. These sites have become more important in recent years for the wintering of the globally endangered Black-faced Spoonbill.

#### Introduction

Black-faced Spoonbill *Platalea minor* is listed as a globally endangered species due to its small known population in a restricted range. The overall population is expected to decline in the near future from the loss of habitat to industrial development, land reclamation and pollution (BirdLife International 2014). This species inhabits along the coastal areas on the eastern fringe of Asia (Hancock et al. 1992, del Hoyo et al. 1992, Yu and Swennen 2004, BirdLife International 2014). In early 1990s, this species, with fewer than 300 individuals, confined to a few sites in the East Asian region (Kennerley 1990), and drew the attention of conservationists. Subsequently, this annual census was inaugurated in 1993 with a view to assessing the wintering population of Black-faced Spoonbill. Since then, the wintering population was found to be recovering through natural population expansion and conservation efforts in some of the sites. The number of individuals recorded has exceeded 1,000 since 2003 (Yu 2003), soaring further to over 2,000 since 2009, with an exception in 2011 (Chan & Yu 2012).

This annual census is of high priority in the conservation plans of this endangered species (Severinghaus et al. 1995, Chan et al. 2010) because it has been proven to be an effective means to gather annual figures of the population and distribution of wintering Black-faced Spoonbills through international collaboration.

The Hong Kong Bird Watching Society began to spearhead this census from 2003 onwards. This report aims to present the results of the census undertaken in January of 2014.

#### Method

Past censuses were unanimously held in mid-winter when the wintering population of spoonbills apparently remained stable. The dates scheduled for the censuses usually coincided with the dates of high tides in the Red River Delta in Vietnam and Deep Bay between Hong Kong and Shenzhen, given that high tide facilitates the counting in these sites. In 2014, the census period was scheduled on 17-19 January 2014. Geographical area covered by this census is shown in map 1. Guidelines on the technical basis were sent to the surveyors in advance of the census. Most of the field counts were done within the census period. For some sites in close proximity such as Mai Po and Futian in the Deep Bay area, where the spoonbills can fly between these sites within an hour, counts were conducted at the two sites simultaneously. All the counts in the census were made with binoculars and telescopes.

Counting of spoonbills is indebted to the voluntary efforts by observers who are experienced bird watchers, conservationists, researchers, ornithologists, government officers working in reserves and many enthusiastic local volunteers. Census results were summarized by coordinators in the respective regions or individual counters before transmission to the international coordinator for in-depth analysis and announcement.

#### Results and discussion

#### Overview

This census in 2014 recorded a total of 2,726 Black-faced Spoonbills in the East Asia region where the majority was sighted along the coast. This figure accounts for a mild growth of a single individual (0.04%) from the census in 2013 (table 1 and 9). The average annual population growth rate in the last 21 years is 11.1% (with SD = 13.8, table 9). Though there were significant increases in the numbers of Black-faced Spoonbills recorded in the largest wintering site, Tainan area and in Japan, a drop was observed in Pearl River Estuary and mainland China in 2014, details of which are discussed below.

Black-faced Spoonbills were found in 62 sites in the census of 2014, an increase from the 53 sites in 2013. All the main wintering sites, which are sites with more than 1% of the overall wintering population, are included in the surveys for almost all the years, thereby allaying the chance of missing any considerable groups of wintering Black-faced Spoonbills. As the population figures fluctuated in recent years, the figures from the last five years were averaged to yield a 1% population level of this species, i.e. 25 individuals out of 2,466 individuals. Sites with more than 25 Black-faced Spoonbills are therefore considered as important sites for this species. The findings of each of the sites are elaborated below.

#### **Taiwan**

#### 2014: 1,659 birds

Taiwan always has the largest congregation of wintering Black-faced Spoonbills in the world (figure 2). The 2014 figure demonstrates an increase of 2.2% from the record of the previous year. Chi-ku and Sitsao of Tainan area are jointly the largest wintering ground in the world, where a total of 1,246 individuals were recorded during the 2014 census, representing 45.7% of the total count. In particular, it is worthwhile to note that a total of 215 birds were recorded at Chiayi County in 2014, indicating the emergence of another large congregation site from the assemblage nearby Tainan County. In addition, another group of 157 Black-faced Spoonbills was recorded in Kaoshiung, adding up to a total of 1,621 individuals (59.5% of the global population) wintering in Southern Taiwan. Smaller groups were scattered in other parts of Taiwan, including Taichung and the outlying islands. More details of the counts in Taiwan are available in tables 1, 2 and 3.

#### Pearl River Estuary (including Deep Bay between Hong Kong and Shenzhen, Taipa-Coloane in Macao)

2014: 312 birds, including 252 birds in Deep Bay and 60 birds in Taipa-Coloane wetland

The number of wintering Black-faced Spoonbills in the Pearl River Estuary area dropped consecutively in the past censuses, with a significant decrease of 21.8% in 2014. The decrease this year is mainly attributed to the fall in the number of birds in the Deep Bay area, where a total of 252 birds were present in 2014, showing a drop of 28.2% from the previous year. The reason of this decline is still unknown. Same as in the previous census, the latest census covered various sites in the Deep Bay area including Mai Po Nature Reserve, Lok Ma Chau fishponds, Tsim Bei Tsui intertidal area, Hong Kong Wetland Park and Futian National Nature Reserve at Shenzhen. The figure of Deep Bay represents 9.2% of the global wintering population in 2014. This is the first time that the number of wintering Black-faced Spoonbills in the Deep Bay area is lower than 10% of the global wintering population since this census started in 1989-90 winter.

In Macao, a total of 60 birds were counted in Taipa-Coloane wetland during the census in 2014, showing an increase of 25% from the previous year. The figure also represents 2.2% of the global wintering population this year. While the feeding area of these birds is still uncertain, the main loafing area of the spoonbills wintering in Macao has been deteriorating because of the ambitious development paving way for the tourism industry. The conservation of the wintering site of Black-faced Spoonbills will be a challenge in Macao.

#### Mainland China and Hainan Island

**2014:** 339 birds

The number of wintering Black-faced Spoonbills in mainland China (including Hainan Island) fluctuated in recent years. In the 2014 census, a peak count of 339 Black-faced Spoonbills was recorded in this area, being a decrease of 6.6% from the previous year (table 5). This figure represents 12.4% of the global population in

2014.

This year, only 68 and 3 birds were counted in Fuqing Bay and Xinhua Bay of Fujian province respectively, whilst there were 141 and 43 individuals recorded at the same sites during the 2013 census. Therefore, both sites had a considerable decrease of 52% and 93% respectively. Surveyor also reported that the fishponds for wintering Black-faced Spoonbills to loaf had been reclaimed in both sites. It is speculated that some of the birds wintered in Fujian last year migrated to Guangdong this year because there was an increase of Black-faced Spoonbill in Haifeng, Guangdong from 72 to 128 individuals. This was the largest group of wintering Black-faced Spoonbills in mainland China. There was also a new site found at Leizhou, Zhanjiang, Guangdong where 4 Black-faced Spoonbills were recorded.

#### Red River Delta, Vietnam

**2014:** 40 birds

A total of 40 Black-faced Spoonbills were recorded in the Red River Delta in 2014, one individual more than that of 2013. Same as in the past censuses, all birds were recorded in the Xuan Thuy area in the Red River Delta. Surveys were also carried out in Thai Thuy IBA, another site in the Red River Delta area. Yet no Black-faced Spoonbill was found there.

#### Japan

**2014:** 350 birds

More than 300 birds were recorded in the western part of Japan including Nansei-shoto Islands this year. The count of 350 individuals in 2014 was the highest record in Japan (table 7). This represents an increase by 26.3% from 2013, as well 12.8% of the global population in 2014. Black-faced Spoonbills were found wintering in 32 sites in the 2014 census (table 1). Kumamoto Prefecture held the largest flock of the wintering Black-faced Spoonbills, with 35 birds at Kagami River estuary and 23 birds in the area of Kumamoto Port at Shirakawa River estuary. In 2014, 2 individuals were counted in Ibaraki and Tokyo in eastern Japan, the most eastern and northern sites of the Black-faced Spoonbill wintering distribution range ever recorded.

#### Republic of Korea

**2014:** 26 birds

In 2014, a total of 26 individuals were recorded at Jeju Island (8 at Hado-ri, 10 at the area between Seongsanpo and Hado-ri and 8 at Seongsanpo), representing 1% of the world population in 2014. This is an increase of 13% from 2013 but has still not yet reached the high count of 40 individuals in 2012, which might be an exceptionally high figure.

#### [Cambodia

**2014**: 0

A new wintering site of the Black-faced Spoonbill at Cambodia was found from satellite-tracking study in the winter of 2011 (van Zalinge *et. al.* 2013). Though researchers surveyed the same area during this census, no Black-faced Spoonbill was found.]

#### [Thailand

#### 2014:0

None was reported during the census period. Nevertheless, small number of Black-faced Spoonbills, especially the young individuals, could be regularly found in the Inner Gulf of Thailand during winter months.]

#### [The Philippines

**2014: 0** (3 birds outside the census period)

Three were recorded at Candaba, Luzon during the last week of December 2013 but none was reported in the Philippines during the census period. Black-faced Spoonbill was only recorded irregularly in recent years. Survey coverage of waterbirds was still low in the Philippines.]

#### [Palau

**2014: 0** (1 unidentified spoonbill outside the census period)

A single spoonbill was found and subsequently photographed at Palau, Western Pacific in December 2013. Its identification has yet to be resolved to Black-faced or Royal Spoonbill *Platalea regia*. Either species will be a new record for Palau. The distribution range of Royal Spoonbill would be closer to this site. Nevertheless, it could not completely rule out the chance for Black-faced Spoonbill as there was also one confirmed record of Black-faced Spoonbill at Palawan, the Philippines, indicating that Black-faced Spoonbill, particularly the young individuals, could also be found far away from its main wintering grounds along the East Asia coast.]

#### Conclusion

The number of Black-faced Spoonbills had increased only slightly in the three latest censuses. Significant decrease is observed in mainland China and Hong Kong, especially in the Deep Bay area where the number continued to decrease since 2011. The figures show that a huge flock of Black-faced Spoonbills has stayed in the eastern part of their wintering area this year, especially in Japan and Taiwan. Habitat destruction and degradation might be the main threats of the wintering population along the China coast. Unfortunately, two important sites in Fujian province, China were found destroyed by reclamations.

The decline of the number of wintering Black-faced Spoonbills in the Deep Bay area, Hong Kong and Shenzhen is of both global and regional concerns to the conservation of this endangered species. This area is the second largest wintering ground for this species and many conservation measures from the local

government and NGOs have been undertaken in order to safeguard this site. Despite that, the number of birds has dropped from the peak of 462 individuals recorded in 2010 to 252 individuals this year, and the percentage of the total wintering population has also dropped from 20% to 9% from 2010 to 2014 in five consecutive years. The reason was not fully understood as no large number of spoonbills was found dead or injured in the site in recent winters. Coincidentally, the total number of wintering waterbirds in the Deep Bay area has also declined in the same period (Anon. 2014).

The increase of numbers in Taiwan and Japan and the decreases in Deep Bay and other sites along the South China coast (e.g. Fujian and Hainan provinces) might be revealing that the Black-faced Spoonbills chose to stay away from the South China coastal area. It leads to speculate that the habitat quality along the South China coast might have deteriorated. Black-faced Spoonbill is dependent to several sites of the intertidal area in the East Asia region only (Yu and Swennen 2004). Whilst degradation and destruction of the coastal habitat as well as hunting are still happening in many places in the region, this species is still facing considerable risk of extinction in the near future.

Sites with more than 1% of the world population of Black-faced Spoonbills (i.e. 25 out of 2,466 individuals – a 5-year average of the total wintering population) from the census are listed below. They are considered as important sites for the conservation of the spoonbills.

- Tsengwen River estuary area including Chiku and Sitsao, Tainan 1,246 birds in 2014 (46%),
- Deep Bay, Hong Kong and Shenzhen 252 birds in 2014 (9.2%),
- Chiayi, Taiwan 215 birds in 2014 (7.9%),
- Kaoshiung, Taiwan 157 birds in 2014 (5.8%),
- Haifeng, Guangdong 128 birds in 2014 (4.7%),
- Fuqing Bay, Fujian 68 birds in 2014 (2.5%),
- Taipa-coloane wetland, Macao 60 birds in 2014 (2.2%),
- XuanThuy, Red River Delta, Vietnam 40 birds in 2014 (1.5%),
- Sigang, Changhua River estuary, Hainan 36 birds in 2014 (1.3%),
- Kagami River estuary, Kumamoto, Japan 35 birds in 2014 (1.3%),
- Ilan, Taiwan 28 birds in 2014 (1.1%).

黑脸琵鹭全球同步普查 2014

Chinese Report 中文报告

#### 黑脸琵鹭全球同步普查 2014

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#### 撮要

2014年度的黑脸琵鹭全球同步普查日期为 2014年1月17-19日。这项周年调查非常重要,透过每年搜集相类的数据,按年检视黑脸琵鹭越冬种群的健康和分布状况。2014年共录得 2,726 只黑脸琵鹭,较 2013年的数量轻微上升了1只(0.04%),也是普查自1990年代初开展以来录得的新高。一如过往的普查显示,台南曾文溪口和香港与深圳间的后海湾,仍然是黑脸琵鹭的两大越冬地点。另外,在2014年的普查中,嘉义及高雄分别录得215只及157只黑脸琵鹭,有可能是曾文溪口越冬种群的扩散;广东的海丰和福建的福清湾则分别录得128只和68只黑脸琵鹭,已成为这个全球性濒危物种在中国大陆的重要越冬地点。

#### 引言

黑脸琵鹭 *Platelea minor* 种群细小,分布范围狭窄,加上生境受工业发展、土地开发及污染等破坏,种群数量于可见的将来有下降的危机,因此被列入全球受胁鸟种名单(BirdLife International 2014)。这个鸟种栖息于东亚沿海地区(Hancock et al. 1992, del Hoyo et al. 1992, Yu and Swennen 2004, BirdLife International 2014),于1990 年代初全球数目少于三百只,并仅在东亚几个地点录得,自此在保育方面受到广泛关注(Kennerley 1990)。从1993 年开始,全球同步普查于每年冬季进行,以评估黑脸琵鹭越冬种群的状况。随着种群的自然增长和部份地点努力保育,越冬黑脸琵鹭的数量逐步上升,在2003 年突破1,000 只(Yu 2003),自2009 年开始(2011年除外)更录得超过2,000 只(Chan & Yu 2012)。

全球同步普查是黑脸琵鹭保育计划的优先项目(Severinghaus et al. 1995, Chan et al. 2010),这项国际协作调查已证实能有效提供越冬黑脸琵鹭的数量和分布数据。香港观鸟会于 2003 年起统筹该全球同步普查。本报告会详述 2014 年 1 月普查的结果。

#### 普查方法

过往的普查均选择于隆冬进行,皆因琵鹭数量于冬季中期显然较为稳定。普查进行的日子,也必须是位于香港与深圳间的后海湾和越南春水(河口国家公园)潮涨的日子,因为高涨的潮水有利数算工作。由此,2014年的普查安排在2014年1月17-19日进行。地图1显示全球同步普查的进行地点。在普查之前,本会向各调查员提供普查指引作为技术基础。大部份的实地数算都是在普查期间进行,而部份地点,例如后海湾的香港米埔和深圳福田相隔咫尺,琵鹭可于一小时内飞越两地,因此这些地点的数算工作有需要同步进行。是次普查的所有数算工作均利用双筒和单筒望远镜进行。

琵鹭普查有赖各地资深观鸟者、保育工作者、研究员、鸟类学家和保护区内工作的官员共同义务承担。各地的 统筹员和个别的调查员收集和整理普查纪录后,将结果提交予国际统筹员,作进一步的分析和结果公布。

#### 结果及讨论

#### 综观

2014年的普查在东亚地区共录得 2,726 只黑脸琵鹭,主要在沿海一带录得,较 2013年普查录得的数目轻微上升了 1只(表 1及 9)。以往 21年的普查结果显示,黑脸琵鹭的种群数目每年平均增幅为 11.1% (SD = 13.8,表 9)。尽管在最大越冬地台南以及日本录得的黑脸琵鹭数目显著上升,于珠江河口及中国内地的越冬黑脸琵鹭数量却见下跌,详情会于下文论述。

2014年的普查录得黑脸琵鹭于 62个地点越冬,比 2013年的 53个地点要多。每年的普查均会涵盖所有曾经录得越冬黑脸琵鹭数目达到总数 1%的地点,以减低遗漏数算大群黑脸琵鹭的机会。由于近年全球黑脸琵鹭的数目变动颇大,普查参考了最近五年的平均数(2,466 只),把总数 1%订于 25 只的水平。任何地方倘若录得 25只黑脸琵鹭或以上,均会视作此鸟种的重要越冬地点,详情会在下面论述。

#### 台湾

#### 2014: 1,659 只

台湾录得的越冬黑脸琵鹭数目一直是全球最多的(图 2),2014年录得的数目更比2013年上升了2.2%,其中台南七股及四草有全球最大的越冬黑脸琵鹭种群,总共录得1,246只,占全球黑脸琵鹭数量45.7%。此外,今年嘉义县录得215只黑脸琵鹭,显示该处有可能成为台南县以外另一个黑脸琵鹭集结地。另一方面,高雄录得另一群为数157只的越冬黑脸琵鹭,即总数共1,621只黑脸琵鹭于台湾南部越冬,占全球种群59.5%。台湾其他地点也分别录得小群黑脸琵鹭,包括台中及外岛地区。有关台湾方面的调查,详情可见表1,2和3。

#### 珠江河口(包括香港和深圳的后海湾,以及澳门凼仔路环)

**2014**: 312 只,包括后海湾(香港及深圳)的 252 只以及澳门的 60 只

普查结果显示,于珠江河口越冬的黑脸琵鹭数量持续下降,2014 年更较去年显著下跌了 21.8%,主要由于后海湾录得的数目减少,总共只有 252 只,较去年下降了 28.2%,下降原因未明。一如去年的普查,这次调查覆盖后海湾地区多个地点,包括米埔自然保护区、落马洲渔塘、尖鼻咀潮汐带、香港湿地公园以及深圳福田自然保护区。2014 年普查在后海湾录得的越冬黑脸琵鹭数目,占全球越冬种群总数的 9.2%,这是全球黑脸琵鹭普查于 1989-1990 年冬天开展以来,后海湾的越冬种群数目第一次少于全球越冬种群的 10%。

澳门方面,2014年的普查于路凼城生态保护区共录得60只黑脸琵鹭,较去年上升了25%,共占全球越冬种群的2.2%,这些种群的觅食地点尚待考查。然而,随着澳门旅游业迅猛发展,黑脸琵鹭在当地的主要越冬地点外围环境恶化,令保护黑脸琵鹭在澳门的越冬地点变成一项挑战。

#### 中国大陆和海南岛

#### 2014: 339 只

近年来,中国大陆(包括海南岛)的黑脸琵鹭越冬种群数目变化较大,2014年共录得339只,较去年下降了6.6%(表五),占全球越冬种群数量的12.4%。

今年的普查中,于福建省福清湾及兴化湾分别只录得 68 只及 3 只黑脸琵鹭,较去年录得 141 只及 43 只分别下跌了 51.8%及 93%。调查人员同时指出,往年黑脸琵鹭在两地栖息的渔塘已被填平,推断部份往年在福建越冬的黑脸琵鹭今年可能迁往广东,以致广东海丰的越冬黑脸琵鹭数量由去年的 72 只上升至今年的 128 只,这也是中国大陆最大的越冬黑脸琵鹭种群。另外,今次普查也发现了一个新的越冬地,于广东湛江的雷州录得 4 只黑脸琵鹭。

#### 越南红河口

#### 2014: 40 只

2014年的普查在红河三角洲录得 40 只黑脸琵鹭,比 2013年增加 1 只。一如过往的普查,所有的纪录都是在红河三角洲的春水地区(Xuan Thuy)录得。调查亦有在同属红河三角州的 Thai Thuy 国际鸟类重要地点进行,不过并未在该地录得黑脸琵鹭。

#### 日本

#### 2014: 350 只

2014年的普查在日本西部(包括南西诸岛)录得 350 只黑脸琵鹭,是破纪录的新高(表 7),较 2013年大幅上升了 26.3%,占全球种群的 12.8%。2014年的普查共于 32 个地点录得黑脸琵鹭(表 1),其中熊本县有日本最多数量的越冬黑脸琵鹭,包括镜川河口录得的 35 只及熊本港录得的 23 只。另外,2014年普查于日本东部的茨城县及东京都录得 2 只黑脸琵鹭,是有纪录以来最为东北的黑脸琵鹭越冬地。

#### 韩国

#### 2014: 26 只

2014年的普查于韩国济州岛共录得 26 只越冬黑脸琵鹭(下道里有 8 只,城山浦及下道里之间的渔塘有 10 只,城山浦有 8 只),占全球总数的 1.0%,较 2013年上升了 13.0%,但仍未及 2012年 40 只的最高纪录,惟该纪录可能只是一个特殊情况。

#### [柬埔寨

#### 2014: 0只

2011年的卫星追踪研究发现了柬埔寨一个新的黑脸琵鹭越冬地点 (van Zalinge et. al. 2013)。今年,研究人员根据这笔资料在该地区进行调查,惟未能找到黑脸琵鹭。]

#### [泰国

#### 2014: 0只

于普查期间没有纪录。近年冬季,似乎有少数黑脸琵鹭幼鸟经常在泰国海内湾出现。]

#### [菲律宾

2014: 0 只 (3 只在普查以外时间录得)

于 2013 年 12 月最后一周, 坎达巴曾经录得 3 只黑脸琵鹭, 但于普查期间再没有纪录。近年, 菲律宾偶有录得 黑脸琵鹭, 惟该地的水鸟调查工作仍处于起步阶段, 很多湿地地点仍未纳入水鸟调查中。]

#### [帕劳

2014: 0只(1只未能辨认的琵鹭在普查以外时间录得)

2013年12月,西太平洋岛国帕劳录得一只拥有黑色脸部的琵鹭,但是未能成功辨认为黑脸琵鹭或是澳洲琵鹭 Platalea regia。然而不论是哪种琵鹭,都为该地的新纪录种。澳洲琵鹭的分布地域与帕劳较为接近,但不能完全否定黑脸琵鹭于当地出现的可能性,因为于菲律宾的巴拉望亦曾录得黑脸琵鹭,显示黑脸琵鹭尤其未成鸟仍有机会于远离东亚沿岸主要越冬地的地区出现。]

#### 总结

在近三年的全球黑脸琵鹭普查中,黑脸琵鹭的数目只轻微上升,而在中国大陆及香港越冬种群的数量却明显下跌,尤其是后海湾地区,自 2011 年开始数目连年下降。数据显示,大群黑脸琵鹭停留于越冬地区的东面,尤其是日本及台湾。至于在中国沿岸,生境破坏也许是对越冬种群的主要威胁。遗憾的是,两个在中国福建的重要越冬地点都因为土地开发而遭破坏。

黑脸琵鹭于后海湾地区的数量下降,已经成为关注保育这濒危物种的全球性及地区性议题。后海湾地区一直是全球第二大黑脸琵鹭越冬种群栖息地,很多保育团体及政府部门均采取措施尽力保育。尽管如此,黑脸琵鹭的数量却于2010年至2014年五年之内,由高锋的462只下降至252只,由占全球种群20%下降至只占9%。目前为止仍然未知原因为何,也未有于区内发现大量黑脸琵鹭伤亡的情况。与此同时,于后海湾渡冬的水鸟,在同一期间的数目亦有下降的趋势(Anon. 2014)。

台湾及日本的黑脸琵鹭数量上升,后海湾及其他华南沿岸地区(例如福建省及海南省)的黑脸琵鹭数量下降,由此看来,黑脸琵鹭可能选择远离华南地区渡冬,此情况可能反映的事实是,华南沿岸地区的生境质素持续恶化。黑脸琵鹭一直只依赖东亚沿岸某几个潮汐带渡冬(Yu and Swennen 2004),而沿海生境的破坏及非法捕猎则一直仍在这些地区发生,故此这个物种仍然面临着绝种的危机。

以下详列这次普查录得黑脸琵鹭数目超过全球数量 1%的地区(1%即 2,466 只中的 25 只; 2,466 只为全球越冬种群的五年平均数),这些地区均会视为保育此鸟种的重要地点:

- 台湾台南曾文溪口,包括七股及四草 2014 年有 1,246 只 (46%),
- 香港和深圳后海湾 2014 年有 252 只 (9.2%),
- 台湾嘉义 2014 有 215 只 (7.9%),
- 台湾高雄 2014 年有 157 只 (5.8%),
- 广东海丰 2014 年有 128 只 (4.7%),

- 福建福清湾 2014 年有 68 只 (2.5%),
- 澳门路凼湿地 2014 年有 60 只 (2.2%)
- 越南红河口春水国家公园 2014 年有 40 只 (1.5%),
- 海南岛昌化江口四更 2014 年有 36 只 (1.3%),
- 日本熊本县镜川河口 2014 年有 35 只 (1.3%),
- 台湾宜兰 2014 年有 28 只 (1.1%)。

黑脸琵鹭全球同步普查 2014

Acknowledgements and References 鸣谢及参考文献

#### Acknowledgments 鸣谢

My heartfelt gratitude goes to all the counters, data contributors and organizations that participated and coordinated the census. A list of all participants is appended at the beginning of this report.

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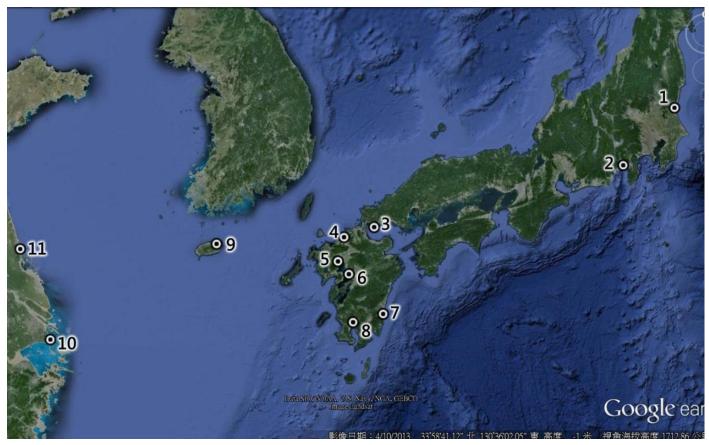
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黑脸琵鹭全球同步普查 2014

### Maps

地图

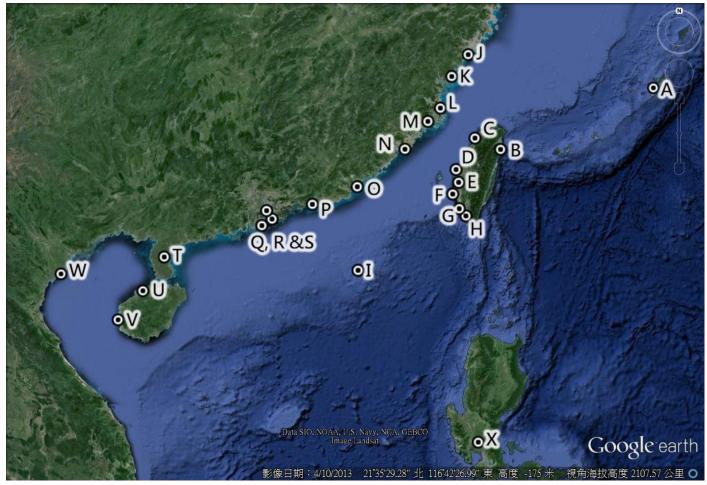


Map 1a. Locations of wintering Black-faced Spoonbills in winter 2013-14.

1) Ibaraki, Japan; 2) Tokyo, Japan; 3) Yamaguchi, Japan; 4) Fukuoka, Japan; 5) Saga, Japan; 6) Kumanmoto, Japan; 7) Miyazaki, Japan; 8) Kagoshima, Japan; 9) Jeju, Republic of Korea; 10) Shanghai, China; 11) Jiangsu, China.

地图 1a. 2013-14 年黑脸琵鹭冬季栖息地点:

1)日本茨城县; 2)日本东京都; 3)日本山口县; 4)日本福冈县; 5)日本佐贺县; 6)日本熊本县; 7)日本宫崎县; 8)日本鹿儿岛县; 9)韩国济州岛; 10)中国上海; 10)中国江苏。



Map 1b. Locations of wintering Black-faced Spoonbills in winter 2013-14.

A) Okinawa, Japan; B) Ilan, Taiwan; C) Hsinchu, Taiwan; D) Yunlin, Taiwan; E) Chiayi, Taiwan; F) Tainan, Tawain; G) Kaohsiung, Taiwan; H) Pingtung, Taiwan; I) Pratas Islands, Taiwan; J) Wenzhou, Zhejiang; K) Xiapu, Fujian; L) Mingjiang estuary; M) Xinhua (Fuqing Bay and Xinhua Bay, Putian), Fujian; N) Kinmen, Taiwan; O) Shantou, Guangdong; P) Haifeng, Guangdong; Q) Deep Bay, Hong Kong and Shenzhen; R) Guangzhou, Guangdong; S) Taipa, Macao and Zhuhai, Guangdong; T) Leizhou, Guangdong; U) Lingao, Hainan; V) Sigang, Hainan; W) Xuan Thuy, Vietnam; X) Candaba, The Philippines.

#### 地图 1b. 2013-14 年黑脸琵鹭冬季栖息地点:

A) 日本冲绳群岛; B) 台湾宜兰; C) 台湾新竹; D) 台湾云林; E) 台湾嘉义; F) 台湾台南(七股和四草); G) 台湾高雄; H) 台湾屏东; I) 台湾东沙群岛; J) 浙江温州; K) 福建霞浦; L) 福建闽江口; M) 福建兴化(福清湾和莆田兴化湾); N) 台湾金门; O) 广东汕头; P) 广东海丰; Q) 香港和深圳后海湾; R) 广东广州; S) 澳门路凼及广东珠海; T) 广东雷州; U) 海南临高; V) 海南四更; W) 越南红河口春水; X) 菲律宾坎达巴。

黑脸琵鹭全球同步普查 2014

### **Tables**

图表

Table 1. Number of Black-faced Spoonbills in different locations of East Asia, winter 2013-2014. Numbers in parenthesis are extra birds counted outside the census period.

表 1.2013-2014年冬季东亚各地的黑脸琵鹭数量。括号内的数字为普查期间以外录得的黑脸琵鹭。

		1	
Region 地区	Location 地点	2014	Number 数量
China mainland	Yenchang, Jiangsu	19 Jan	1
中国大陆	江苏 盐城	1月19日	
China mainland	Dongtian and Wetland Park, Chongming, Shanghai	19 Jan	4
中国大陆	上海 祟明 东滩及湿地公园	1月19日	
China mainland	Ou Jiang estuary, Wenzhou, Zhejiang	18 Jan	18
中国大陆	浙江 温州 瓯江口	1月18日	
China mainland	Minjiang estuary, Fuzhou, Fujian	18 Jan	18
中国大陆	福建 福州 闽江口	1月18日	
China mainland	Xinhua Bay, Fuqian, Putian, Fujian	18 Jan	3
中国大陆	福建 福清 莆田 兴化湾	1月18日	
China mainland	Fuqian Bay, Fuqian , Fujian	18 Jan	68
中国大陆	福建 福清 福清湾	1月18日	
China mainland	Funing Bay, Xiapu, Fujian	18 Jan	12
中国大陆	福建 霞浦 福宁湾	1月18日	
China mainland	Shantou, Guangdong	18-19 Jan	15
中国大陆	广东 汕头	1月18-19日	
China mainland	Haifeng, Guangdong	18 Jan	128
中国大陆	广东 海丰	1月18日	
China mainland	Nansha, Guangzhou, Guangdong	17-19 Jan	11
中国大陆	广东 广州 南沙	1月17-19日	
China mainland	Zhuhai, Guangdong	19 Jan	1
中国大陆	广东 珠海	1月19日	
China mainland	Leizhou, Zhanjiang, Guangdong	18-19 Jan	4
中国大陆	广东 湛江 雷州	1月18-19日	
China mainland	Xinying, Lingao, Hainan	19 Jan	20
中国大陆	海南省 临高 新盈	1月19日	
China mainland	Sigang, Dongfang, Hainan	19 Jan	36
中国大陆	海南省 东方 四更	1月19日	
Hong Kong and	Deep Bay, including Mai Po, Hong Kong and Futian,	17-19 Jan	252
Shenzhen	Shenzhen	1月17-19日	
香港和深圳	后海湾、包括香港米埔及深圳福田		
Macao	Taipa-coloane	17-19 Jan	60
澳门	凼仔-路环	1月17-19日	
Taiwan	Chiayi	18-19 Jan	215
台湾	嘉义	1月18-19日	
Taiwan	Tainan	18-19 Jan	1246
台湾	台南 包括七股、四草及土城	1月18-19日	
Taiwan	Kaoshiung	18 Jan	157
台湾	高雄 包括茄萣及高屏溪口	1月18日	
Taiwan	Hsinchu	18 Jan	1
台湾	新竹	1月18日	
Taiwan	Yunli	18 Jan	3
台湾	云林	1月18日	
Taiwan	Ilan	18 Jan	28
台湾	宜兰	1月18日	_
Taiwan	Kinmen	19 Jan	5
台湾	金门	1月19日	
Taiwan	Pingtung	18 Jan	3
台湾	屏东 Pratas Islands	1月18日	1
Taiwan ム迹		18 Jan	1
台湾	东沙群岛	1月18日	1
Japan 日本	Honshu: Ibaraki Pref., Kamisu City Hasaki Tone River Estuary	17 Jan 1月17日	1
14	本州岛岛 茨城县 神栖市波崎 利根川河口	1 7 1/ 1	
Japan	Honshu: Tokyo   Edogawa-ku, Kasai Rinkai Park	17 Jan	1
Japan   日本	本州岛岛 东京都 江戸川区 葛西临海公园	17 Jan 1月17日	1
口坐	平川町町 小尔印   江厂川区   菊四帕再公四	1 刀 1/ 凵	

Region 地区	Location 地点	2014	Number 数量
Japan	Honshu: Yamaguchi Pref., Yamaguchi City,	17 Jan	10
日本	Yamaguchi Bay	1月17日	
*	本州岛岛 山口县 山口市 山口湾	47.1	_
Japan 日本	Kyushu: Fukuoka Pref., Yukuhashi City, Imagawa River estuary	17 Jan 1月17日	5
口平	九州岛岛 福冈县 行桥市 今川河口	1 7 17 1	
Japan	Kyushu: Fukuoka Pref., Fukutu City, Tsuyazaki Irie	19 Jan	7
日本	九州岛岛 福冈县 津屋崎	1月19日	
Japan	Kyushu: Fukuoka Pref., Fukuoka City, Tatara River	18Jan	15
日本	estuary 九州岛岛 福冈县 多々良川河口	1月18日	
Japan	九州両両 個内芸 多く良川河口 Kyushu: Fukuoka Pref., Fukuoka City, Zuibaiji River	19 Jan	18
日本	estuary, Imazu tidal flat	1月19日	10
, , ,	九州岛岛 福冈县 瑞梅寺川河口 今津干舄		
Japan	Kyushu: Fukuoka Pref., Itosima City, Kafuri Bay	19 Jan	13
日本	(tidal flat)	1月19日	
T.	九州岛岛 福冈县 加布里湾	10.1	4.5
Japan   日本	Kyushu: Fukuoka Pref., Yanagawa City, Chikugo River estuary 九州岛岛 福冈县 筑后川河口	18 Jan 1月 18 日	15
Japan	Kiver estuary 九州蜀蜀 禰内芸 巩卢川河口 Kyushu: Saga Pref.,Daijugarami	1月16日 19 Jan	18
日本	九州岛岛 佐贺县 大授搦	1月19日	10
Japan	Kyushu: Saga Pref., Kashima City, Hama fishery Port	17 Jan	17
日本	九州岛岛 佐贺县 鹿岛市、滨渔港	1月17日	
Japan	Kyushu: Kumamoto Pref., Arao City, Arao Coast	19 Jan	2
日本	九州岛岛 熊本县 荒尾市 荒尾海岸	1月19日	
Japan □ ★	Kyushu: Kumamoto Pref., Kikuchi River estuary	19 Jan	16
日本 Japan	九州岛岛 熊本县 菊池川河口  Kyushu: Kumamoto Pref., Tamana City, Tojin River	1月19日 19 Jan	1
Japan   日本	estuary	1月19日	1
	九州岛岛 熊本县 玉名市 唐人川河口	17,127	
Japan	Kyushu: Kumamoto Pref., Kumamoto City Ezuko	19 Jan	2
日本	Lake	1月19日	
T.	九州岛岛 熊本县 熊本市 江津湖	10.1	20
Japan 日本	Kyushu: Kumamoto Pref., Kumamoto City, Kumamoto Port	19 Jan 1 月 19 日	23
	九州岛岛 熊本县 熊本市 熊本港	1 /1 1/ []	
Japan	Kyushu: Kumamoto Pref., Midori River estuary	19 Jan	12
日本	九州岛岛 熊本县 绿川河口	1月19日"	
Japan	Kyushu: Kumamoto Pref., Uki City, Ohno River	19 Jan	4
日本	Estury, Suna River Estuary	1月19日	
Japan	九州岛岛 熊本县 宇城市、大野川河口、砂川河口  Kyushu: Kumamoto Pref., Kagami River estuary	19 Jan	35
Japan   日本	九州岛岛 熊本县 镜川河口	1月19日	33
Japan	Kyushu: Kumamoto Pref., Mae/Kuma River estuary	19 Jan	12
日本	九州岛岛 熊本县 前川/球磨河口	1月19日	
Japan	Kyushu: Miyazaki Pref., Hitotsuse River estuary	17-19 Jan	13
日本	九州岛岛 宫崎县 一濑川河口	1月17-19日	10
Japan 日本	Kyushu: Miyazaki Pref., Kushima City Tenjin River 九州岛岛 宫崎县 串间市 天神川	18 Jan 1 月 18 日	12
Japan	Kyushu: Kagoshima Pref., Manose River estuary	19 Jan	17
Japan   日本	九州岛岛 鹿儿岛县 万之瀬川河口	1月19日	11
Japan	Kyushu: Kagoshima Pref., Kirishima City,	17 Jan	2
日本	Hamanoichi Regulation Pond	1月17日	
-	九州岛岛 鹿儿岛县 雾岛市 滨之市调整池	177	
Japan □ ★	Kyushu: Kagoshima Pref., Kajiki Town, Suzaki	17 Jan	20
日本	Regulation Pond 九州岛岛 鹿儿岛县 加治木町 须崎调整池	1月17日	
Japan	Kyushu: Kagoshima Pref., Kokubu Town, Hirose	17 Jan	16
日本	regulation pond	1月17日	-
	九州岛岛 鹿儿岛县 国分町 广濑调整池		
Japan	Kyushu: Kagoshima Pref., Hishida River estuary 九	19 Jan	7
日本	九州岛岛 鹿儿岛县 大崎町 菱田川河口	1月19日	

Region	Location	2014	Number
地区	地点		数量
Japan	Nansei-shoto Islands: Okinawa Pref., Awase tidal flat	19 Jan	14
日本	西南群岛 冲绳县 泡濑干舄(海岸)	1月19日	
Japan	Nansei-shoto Islands: Okinawa Pref.,	19 Jan	3
日本	Naha/Tomigusuku, Man-ko Tidal Flat 西南诸岛 冲西南群岛 冲绳县 漫湖干舄		
Japan	Nansei-shoto Islands: Okinawa Pref.,	19 Jan	17
日本	Tomigusuku, Yone-Sankaku-ike Pond 西南群岛 冲縄县 与根三角池	1月19日	
Japan	Nansei-shoto Islands: Okinawa Pref., Tomigusuku,	19 Jan	1
日本	Toyosaki Tidal Flat 西南诸岛 冲绳县 豊见城 豊崎干	1月19日	
Japan	Nansei-shoto Islands: Okinawa Pref.,	19 Jan	1
日本	Haneji Naikai Tidal Flat	1月19日	
	南西诸岛 冲縄县 羽地内海		
Republic of Korea	Jeju: Hado-ri fishponds	19 Jan	8
韩国	济州 下道里 渔塘	1月19日	
Republic of Korea	Jeju: area between Seongsanpo and Hado-ri	19 Jan	10
韩国	济州 城山浦与下道里之间	1月19日	
Republic of Korea	Jeju: Seongsanpo	19 Jan	8
韩国	济州 城山浦	1月19日	
Vietnam	Red River Delta, Xuan Thuy National Park	19 Jan	40
越南	红河口 春水国家公园	1月19日	
The Philippines	Candaba	17-19 Jan	(3)
菲律宾	坎达巴	1月17-19日	
	Total 总数:		2726 (3)

Table 2. Sites visited with no Black-faced Spoonbill spotted during or near the 2014 census period. 表 2. 2014 年全球同步普查期间曾进行调查但未有录得琵鹭的地方。

		2011
Region 地区	Location 地点	2014
China mainland	Yunxiao, Fujian	17-19 Jan
中国大陆	福建 云霄	1月17-19日
China mainland	Quanzhou Bay, Fujian	17-19 Jan
	福建 泉州湾	,
中国大陆		1月17-19日
China mainland	Xiamen, Fujian	17-19 Jan
中国大陆	福建 厦门	1月17-19日
China mainland	Jianxin estuary, Zhanjiang, Guangdong	17 Jan
中国大陆	广东 湛江 建新河口湿地	1月17日
China mainland	Tongming estuary, Zhanjiang, Guangdong	17 Jan
中国大陆	广东 湛江 通明河口湿地	1月17日
China mainland	Dongzhaigong, Hainan	19 Jan
中国大陆	海南省 东寨港	1月19日
Taiwan	Taipei	18 Jan
台湾	台北市	1月18日
Taiwan	New Taipei	18 Jan
台湾	新北市	1月18日
Taiwan	Miaoli	
		18 Jan
台湾	苗栗	1月18日
Taiwan	Taoyuan	18 Jan
台湾	桃园	1月18日
Taiwan	Hualien	18 Jan
台湾	花莲	1月18日
Taiwan	Taitung	18 Jan
台湾	台东	1月18日
Taiwan	Penghu	18 Jan
台湾	澎湖	1月18日
Taiwan	Taichung	18 Jan
台湾	台中	1月18日
Taiwan	Changhua	18 Jan
台湾	彰化	1月18日
Taiwan	Matsu Islands	18 Jan
台湾	马祖	1月18日
Japan	Honshu: Miyagi Pref., Sendai City Gamou Tidal Flat	17 Jan
日本	本州岛岛 宫城县 仙台市 蒲生干舄	1月17日
Japan	Kyushu: Fukuoka Pref., Kanda Town Shiraishi	17 Jan
日本	Regulation Pond	1月17日
	九州岛岛 福冈县 苅田町 白石调整池	1月1/日
Tarasa		17 0 10 Iam
Japan	Kyushu: Fukuoka Pref., Wajiro Tidal Flat	17 & 19 Jan
日本	九州岛岛 福冈县 和白干舄	1月17&19日
Japan	Kyushu: Fukuoka Pref., Itoshima City,	17 Jan
日本	Kanobaru Pond Fukuryuu Pond, Tanaka Pond	1月17日
	九州岛岛、福冈县 纟岛市 叶原池、伏龙池、田中池	1
Japan	Kyushu: Kukuoka Pref., Yanagawa City, Okinohata	18 Jan
日本	River Estuary	1月18日
	九州岛岛 福冈县 冲之端川河口	
Japan	Kyushu: Saga Pref., Hayatsue River Estuary	18 Jan
日本	九州岛岛 佐贺县 早津江川河口	1月18日
Japan	Kyushu: Saga Pref., Kashima City, Shingomori	19 Jan
日本	九州岛岛 佐贺县 鹿岛市 新笼周辺	1月19日
Japan	Kyuahu: Nagasaki Pref., Isahaya Bay	18 Jan
日本	九州岛岛 长崎县 谏早湾	1月18日
Japan	Kyushu: Kumamoto Pref., Hikawa-Machi, Yatsushiro	19 Jan
日本	City, Hikawa River Estuary	1月19日
	九州岛岛 熊本县 氷川町・八代市、氷川河口	
Japan	Kyushu: Kagoshima Pref., Shibushi City, Anraku	19 Jan
日本	River Estuary	1月19日
	九州岛岛 鹿儿岛县 志布志市 安乐川	= /4 */ []
L	1 / 5/ 11 4 / 6/ 6-4 A	I

Region	Location	2014
地区	地点	
Japan	Kyushu: Kagoshima Pref., Matsubara Regulation	17 Jan
日本	Pond	1月17日
	九州岛岛 鹿儿岛县 松原调整池	
Japan	Kyushu: Kagoshima Pref., Minamisatsuma City,	19 Jan
日本	Ohura Reclamation Area	1月19日
	九州岛岛 鹿儿岛县 南萨摩市 大浦干拓周边	
Japan	Nansei-shoto Islands: Okinawa Pref.,	19 Jan
日本	Gushi Tidal Flat	1月19日
	南西诸岛 冲縄县 具志干舄	
Japan	Nansei-shoto Islands: Okinawa Pref.,	19 Jan
日本	Sashiki Tidal Flat	1月19日
	南西诸岛 冲縄县 佐敷干舄	
Cambodia	Boeung Prek Lapouv, Takéo	17-19 Jan
柬埔寨	茶胶省	1月17-19日
Vietnam	Thai Thuy IBA, Red River Delta	19 Jan
越南		1月19日
Thailand	Laem Pak Bia, Nong Bong Kai, Chiangrai	18 Jan
泰国		1月18日
Thailand	Petchaburi, Khao Takrao	18 Jan
泰国		1月18日

 $Table\ 3.\ Numbers\ of\ Black-faced\ Spoonbills\ in\ Taiwan\ during\ the\ international\ censuses.$ 

表 3. 全球同步普查期间在台湾录得的黑脸琵鹭数量。

Year	89-90	93-94	94-95	95-96	Jan 97	Jan 98	Jan 99	Jan 00	Jan 01	Jan 02	Jan 03	Jan 04
Total	150	206	286	300	298	363	380	380	427	582	580*	632
Year	Jan 05	Jan (	06 Ja	n 07	Jan 08	Jan 09	Jan 10	) Jan	11 J	an 12	Jan 13	Jan 14
Total	757	826	79	90	1030	1104	1280	834	1	562	1624	1659

<sup>\*</sup> This number also included the 18 sick individuals infected by avian botulism. 此数字包括 18 只受鸟类肉毒杆菌感染的黑脸琵鹭。

Table 4. Numbers of Black-faced Spoonbills in the Pearl River Estuary during the international censuses. 表 4. 全球同步普查期间在珠江河口录得的黑脸琵鹭数量。

Year	89-90	93-94	94-95	95-96	Jan 97	Jan 98	Jan 99	Jan 00	Jan 01	Jan 02	Jan 03	Jan 04
Hong Kong	50	70	78	99	69	88	96	90	135	136	179	238
Shenzhen	nc	nc	nc	nc	32	58	nc	nc	42*	3	24	5
Macao	6	12	8	10	13	9	12	6	36	37	46	50
Total	56	82	86	109	114	155	108	96	171*	176	249	293

Year	Jan 05	Jan 06	Jan 07	Jan 08	Jan 09	Jan 10	Jan 11	Jan 12	Jan 13	Jan 14
Hong Kong	272	296	320	331	273	429	386	357	322	222
Shenzhen	39	50	36	38	62	33	25	36	29	30
Macao	39	51	48	50	52	39	49	51	48	60
Total	350	397	404	419	387	501	460	444	399	312

nc = no count 未有进行调查

<sup>\*</sup>Forty-two birds in Futian were not included in the total number because counts in Mai Po and Futian were not taken simultaneously. 因米埔与福田的调查未能与同步进行,故总数未有包括 42 只在福田录得的黑脸琵鹭。

Table 5. Numbers of Black-faced Spoonbills in mainland China (excludes Futian, Shenzhen) and Hainan Island during the international censuses.

表 5. 全球同步普查期间在中国大陆及海南岛录得的黑脸琵鹭数量。

Year	89-90	93-94	94-95	95-96	Jan 97	Jan 98	Jan 99	Jan 00	Jan 01	Jan 02	Jan 03	Jan 04
Total	15	22	21	21	58	5	3	9	72	24	17	91
Year	Jan 05	Jan 06	Jan 07	Jan	08 J	an 09	Jan 10	Jan 11	Jan 1	12 Ja	an 13	Jan 14
Total	187	206	247	313	2	47	234	198	328	3	63	339

Table 6. Numbers of Black-faced Spoonbills in Red River Delta, Vietnam during the international censuses. 表 6. 全球同步普查期间在越南红河口录得的黑脸琵鹭数量。

Year	89-90	93-94	94-95	95-96	Jan 97	Jan 98	Jan 99	Jan 00	Jan 01	Jan 02	Jan 03	Jan 04
Total	62	25	23	75	nc	59	34*	46*	47	54*	65	62
Year	Jan 05	Jan 06	Jan 07	Jan	08 J	an 09	Jan 10	Jan 11	Jan 1	12 Ja	n 13	Jan 14
Total	56	74	45	49	6	53	46	49	35	39	)	40

nc = no count 未有进行调查

Table 7. Numbers of Black-faced Spoonbills in Japan during the international censuses.

表 7. 全球同步普查期间在日本录得的黑脸琵鹭数量。

Year	89-90	93-94	94-95	95-96	Jan 97	Jan 98	Jan 99	Jan 00	Jan 01	Jan 02	Jan 03	Jan 04
Total	5	16	14	31	28	75	60	99	87	107	128	149
Year	Jan 05	Jan 06	Jan 07	Jan	08 J	an 09	Jan 10	Jan 11	Jan	12 Ja	n 13	Jan 14
Total	103 (150)	155	189	224	. 2	215	258	270	284	27	77	350

Number in parenthesis is extra birds recorded outside but near the census period. 括号内的数字为普查期间以外录得的黑脸琵鹭。

Table 8. Numbers of Black-faced Spoonbills in Jeju Island, Republic of Korea during the international censuses.

表 8. 全球同步普查期间在韩国济州岛录得的黑脸琵鹭数量。

Year	89-90	93-94	94-95	95-96	Jan 97	Jan 98	Jan 99	Jan 00	Jan 01	Jan 02	Jan 03	Jan 04
Total	6	nc	nc	15	16	25	14	20	21	29	22	23
Year	Jan 05	Jan 06	Jan 07	Jan	08	Jan 09	Jan 10	Jan 11	Jan	12 Ja	n 13	Jan 14
Total	21	21	20	28		25	27	26	40	23	3	26

nc = no count 未有进行调查

<sup>\*</sup> Surveys also included Thai Binh and other places in the Delta. 普查地点包括 Thai Binh 及红河口内的其他地点。

Table 9. Numbers and percentage increase of total number of Black-faced Spoonbills during the international censuses.

表 9. 全球同步普查的黑脸琵鹭总数及百分比增加。

Year	89-90	93-94	94-95	95-96	Jan 97	Jan 98	Jan 99	Jan 00	Jan 01	Jan 02	Jan 03	Jan 04
Total	294	351	430	551	535	613	586	660	828	969	1069	1206
% change	-	19.4	22.5	28.1	-2.9	14.6	-4.4	12.6	25.5	17.0	10.3	12.8

Year	Jan 05	Jan 06	Jan 07	Jan 08	Jan 09	Jan 10	Jan 11	Jan 12	Jan 13	Jan 14
Total	1475	1679	1695	2065	2041	2347	1839	2693	2725	2726
% change	22.3	13.8	1.0	21.8	-1.2	15.0	-21.6	46.4	1.2	0.04

Annual % change (SD) from 93-94 to 2014: 11.1% (13.8), n = 20

93-94 年至 2014 年间的年均变化: 11.1% (13.8), n = 20

黑脸琵鹭全球同步普查 2014

## Figures 图片

Figure 1. Known wintering Black-faced Spoonbill populations from winter 1989-90 to 2013-14. 图 1.1989-90 至 2013-14 年冬季已知的黑脸琵鹭数量。

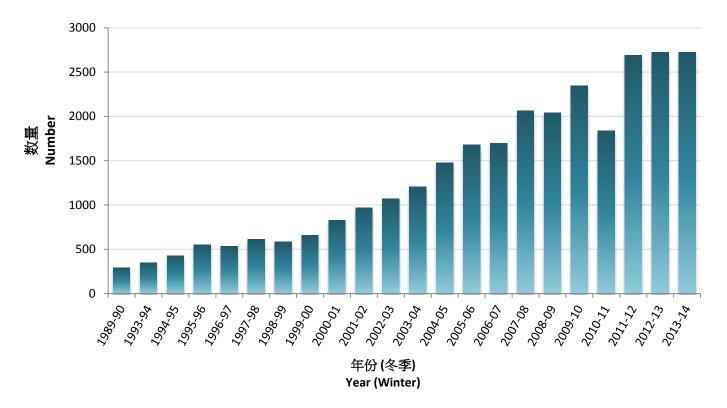


Figure 2. Percentages of Black-faced Spoonbills in different wintering areas during the 2014 international census.

图 2.2014 全球同步普查期间黑脸琵鹭在不同越冬地的全球百分比。

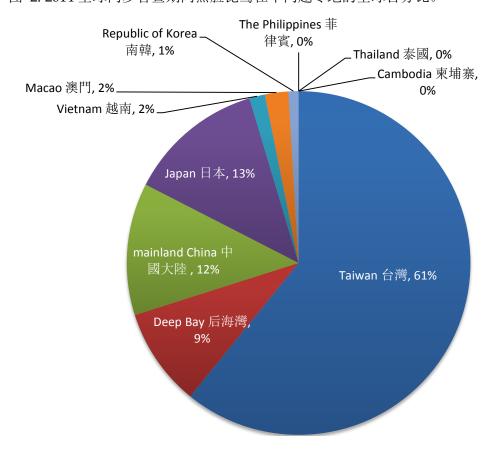
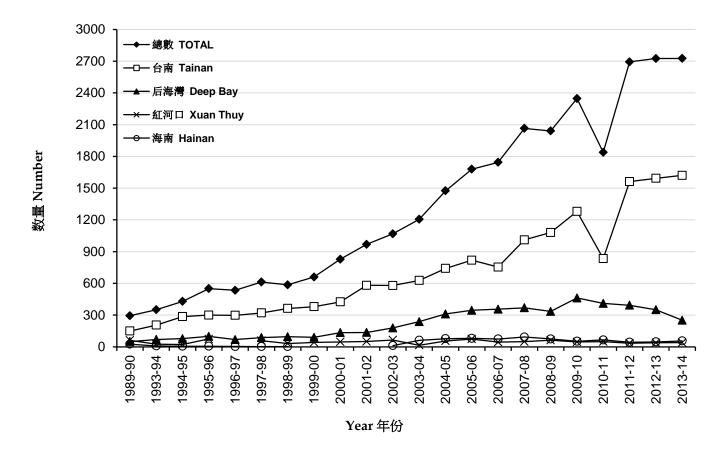


Figure 3. Trends of known Black-faced Spoonbills in the world, and in four important congregation sites: Tainan of Taiwan, Deep Bay of Hong Kong and Shenzhen, Red River Delta of Vietnam, and Hainan Island from the international censuses.

图 3. 比较全球同步普查的已知黑脸琵鹭数量,以及四个重要聚集地点(台湾台南、香港深圳后海湾、越南红河口和海南岛)的数量趋势。



黑脸琵鹭全球同步普查 2014

### **Appendix**

附录

## Appendix 1. Counts of Black-faced Spoonbills in Hong Kong and Shenzhen during the International Black-faced Spoonbill Census 2014.

附录 1.2014年黑脸琵鹭全球同步普查香港及深圳结果。

#### a) 17 January 2014 2014年1月17日

2011   17,117			
Place 地点 /Time 时间	1045h	1145h	1245h
Mai Po Nature Reserve and	104	109	93
boardwalk 米埔自然护理区及浮桥			
Lok Ma Chau 落马洲	32	44	30
Nam Sang Wai 南生围	0	0	11
Tsim Bei Tsui area, including Wetland	79	78	88
Park 尖鼻咀 (包括湿地公园)			
Futian 福田	21	13	30
Total 总数	236	244	252

#### b) 18 January 2014 2014年1月18日

Place 地点 /Time 时间	1115h	1215h	1315h
Mai Po Nature Reserve and	77	56	53
boardwalk 米埔自然护理区及浮桥			
Lok Ma Chau 落马洲	12	10	8
Nam Sang Wai 南生围	0	0	0
Tsim Bei Tsui area, including Wetland	67	61	58
Park 尖鼻咀 (包括湿地公园)			
Futian 福田	8	13	32
Total 总数	164	140	151

#### c) 19 January 2014 2014年1月19日

Place 地点 /Time 时间	1100h	1200h	1300h	1400h
Mai Po Nature Reserve and	55	68	65	41
boardwalk 米埔自然护理区及浮桥				
Lok Ma Chau 落马洲	69	46	49	56
Nam Sang Wai 南生围	18	17	11	9
Tsim Bei Tsui area, including Wetland	51	64	44	42
Park 尖鼻咀 (包括湿地公园)				
Futian 福田	37	26	24	13
Total 总数	242	221	193	161