香港海洋公園保育基金

OPCFHK

年報 ANNUAL REPORT 2020-2021





保育自然,守護未來 Save Nature to Save Our Future

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願景 Vision

我們展望各界無私合作,攜手保護亞洲野生生態長久繁盛豐饒。

We envision a world where Asian wildlife remains biologically diverse under the stewardship of humans, corporations and governments.

宗旨 Mission

我們承諾透過協作籌款與科研教育,致力提倡促進及參與亞洲區內務實有效 的野生生態保育工作,並重點保育中華白海豚與大熊貓以及其棲息地。

We are committed to advocating, facilitating and participating in effective conservation of Asian wildlife, with an emphasis on Chinese white dolphins and giant pandas, as well as their habitats. This will be achieved through partnerships, fundraising, research and education.



主席的話

Chair's Message

珍惜自然資源 護佑美好未來

To Save Our Future, We Must Protect Our Natural Resources

「健康的生態系統、豐饒的生物多樣性,是所有物種賴以生存的基本,而當中所面臨的最大挑戰之一,正是氣候變化。氣候變 化影響自然棲息地、破壞生態進程,並會令季節更替變得紊亂。|

"Healthy ecosystems and a rich global biodiversity are fundamental to life on our planet. One of their most imminent challenges is climate change, which disturbs natural habitats, disrupts natural processes and triggers irregular seasonal patterns."

地球上所有物種的存亡息息相關,唇齒相依。人類自工業革命以來持續過度開發自然資源,令許多動物的棲息地和食物流失,甚至面臨滅絕的威脅。科學家警告第六次生物大滅絕正在發生,而成因儼然是人類。我們對自然予取予求的生活方式,無疑正逼使自然生態走向絕路。我們還有機會扭轉劣勢,不過危機已經逼在眉睫,行動絕對刻不容緩。為守護地球未來,保育基金一直不遺餘力,我們亦很高興得到許多志同道合的朋友相助,凝聚更大力量。

健康的生態系統、豐饒的生物多樣性,是所有物種賴以 生存的基本,而當中所面臨的最大挑戰之一,正是氣候 變化。氣候變化影響自然棲息地、破壞生態進程,並會 令季節更替變得紊亂。全球決策者已經制定時間表討論 這個議題,連串會議將在二零二一年底至二零二二年初 密鑼緊鼓進行,當中包括聯合國《生物多樣性公約》第 十五次締約方大會(COP15)、「二零二一年二十國集 團羅馬峰會」、「聯合國氣候變化大會」(COP26)。 我們期望各會議將會取得明確進展,例如在環球經濟實 現碳中和上達成共識,並將全球暖化控制在較工業革命 前高攝氏一點五度的範圍內,以及制定《二零二零年後 全球生物多樣性框架》,推行經濟、社會及金融模式的 改變,以致力在二零三零年前緩解生物多樣性下降的情 況, 並在二零五零年前, 為恢復生態系統帶來正向影響。 而這一切唯有在大家通力合作與衷誠付出之下,方能有 望實現,不論在國家、企業還是個人層面,每一分力量 都至為關鍵。

污染問題同樣令人關注,特別是塑料污染問題。香港特區政府在二零二一年二月公佈《香港資源循環藍監2035》,並展開公眾諮詢,探討分階段管制即棄塑膠餐具的建議及處理其他單次使用塑膠的需要。早於二零一七年起,保育基金已推出「無飲管運動」,著力倡達上「塑」生活,可惜在二零二零至二零二一年度的調查之中,我們發現即棄塑膠飲管及外賣即棄塑膠餐具與容器的使用量均大幅上升,當中即棄塑膠餐具與容器則與空增加至四點四支,而外賣即棄塑膠餐具與容器則由四支增加至四點四支,而外賣即棄塑膠餐具與容器則即支增加至四點四十十十個相信與疫情期間外賣馬求改變有關。這次的調查無疑敲響了警號,提醒。們必須時刻堅守減廢原則,絕不可在走「塑」上鬆懈。

Earth's species are not merely interrelated – their survivals are tightly interlocked. After the Industrial Revolution, humanity began to exploit our natural resources. As a result, many animals lost their homes and their food supply, and even became extinct. Today, scientists warn that our planet's sixth mass extinction is occurring, and it is directly linked to the way we live and deplete our resources. It's not too late for us to reverse this situation, but the clock is ticking. The deadline is no longer a nebulous future time. At OPCFHK, we have tackled this challenge head-on, and are heartened to find that we are not alone.

Healthy ecosystems and a rich global biodiversity are fundamental to life on our planet. One of their most imminent challenges is climate change, which disturbs natural habitats, disrupts natural processes, and triggers irregular seasonal patterns. Policymakers around the world are now set to discuss the best steps to address this situation. A full schedule of events such as the fifteenth meeting of the Conference of the Parties (COP15), the 2021 G20 Rome Summit and the United Nations Climate Change Conference (COP26) are set for late 2021 and early 2022, from which we are expecting encouraging news such as an agreement to decarbonise the global economy and restrict global warming to 1.5°C above its pre-industrial level. We are also hoping to see the finalisation of the Post-2020 Global Biodiversity Framework, which will transform economic, social and financial models to mitigate biodiversity loss by 2030, and generate net improvements in the recovery of natural ecosystems by 2050. All these will require effort and commitment from all countries, enterprises and individuals on a global scale.

Pollution, especially plastic pollution, is another key topic of concern. Locally, in February 2021, the HKSAR government announced its Waste Blueprint for Hong Kong 2035, which includes public consultation on the recommendations for the control of disposable plastic tableware in phases and consideration of the need to handle other single-use plastics. Since 2017, OPCFHK has promoted the no-plastic lifestyle through our annual No Straw Campaign. Unfortunately, our 2020/21 survey found out that the consumption of single-use plastic straws and cutlery and takeaway containers have all increased sharply, with weekly consumption increased from 4 to 4.4 items and from 2.1 to 2.8 items respectively, most likely due to pandemic-induced changes in takeaway demand. This is a strong reminder for us all to stay vigilant about advocating for and leading a plastic-free life.

生物多樣性還面對非法獵殺和貿易等重大 威脅,非法野生動物貿易亦是持續困擾香 港的問題。立法會於二零二一年八月通過 香港法例第四百五十五章《有組織及嚴重 罪行條例》的修訂草案,將走私與非法交 易野生動植物的罪行納入條例中。保育基 金亦於本年度繼續全力打擊非法捕獵與貿 易。其中於二零二一年三月,我們開始資 助一項研究,協助發展臉部辨識系統,採 用人工智能技術識別蘇眉個體,讓公眾得 以察覺與舉報懷疑個案,對抗蘇眉非法貿 易。另外自二零一八年起,我們亦與海洋 公園及香港兩棲及爬行動物保育基金緊密 合作,守護香港原生物種眼斑水龜。眼 斑水龜屬淡水龜,飽受非法捕獵及買賣威 脅,數量正急速下降,研究團隊因而制定 了遷地保育計劃,期望以人工繁殖和野外 放歸的方式,恢復眼斑水龜的種群。香港 以外,保育基金亦全力支援馬來西亞及尼 泊爾等亞洲地區的保育工作,守護多個瀕 危物種,免受非法獵殺和走私販賣威脅。

展望來年,保育基金將繼續全力提倡保育, 積極推行和參與亞洲區內各個項目。我們 很高興環球決策者現正努力為可持續未來 制定決策與方向,並期待與大家一起為地 球與我們下一代的美好未來大步向前。

陳晴,太平紳士 基金主席 Biodiversity is also seriously threatened by poaching and trafficking, such as Hong Kong's ongoing issues with the illegal wildlife trade. In August 2021, the Legislative Council passed an Amendment that incorporated offenses involving wildlife trafficking and illegal trade into the Organised and Serious Crimes Ordinance (Cap. 455). OPCFHK has also taken an active role in combating poaching and illegal trades. In March 2021, we began funding a computer-aided facial recognition project that uses artificial intelligence (AI) technology to combat the illegal trade of humphead wrasse by empowering the public to identify and report suspicious sales. The Beale's eyed turtle, one of the region's native freshwater turtle species, is facing threats such as poaching for illegal trade and pet market sales. Since 2018, OPCFHK has worked with Ocean Park and the Hong Kong Society of Herpetology Foundation on an ex-situ conservation programme to restore the drastically diminished wild populations of the region's native freshwater turtles through captive breeding and reintroduction. We have also supported projects in Malaysia, Nepal and other regions of Asia to help defend the wild populations of multiple endangered species from poaching and illegal trade.

The important work that we do would not be possible without our kind and generous donors. We thank Ocean Park for their steadfast support, both in donations and technical expertise, and Bank of China (Hong

Kong) Limited for their generous sponsorship on the Conserve Wildlife Today for a Better Planet Tomorrow campaign, which included 19 scientific projects, an online public awareness campaign and the 26th Ocean Park Conservation Day. We are also immensely grateful to all of our other sponsors, corporate partners, stakeholders, individual donors and volunteers. Finally, we would like to honour the hard work of our trustee members, committee members, principal investigators and research teams, as well as the tireless dedication of our staff, who serve as our frontline in our ongoing efforts to protect nature.

In the coming year, OPCFHK will continue our work to advocate, facilitate and participate in the effective conservation of Asian wildlife. We are pleased that the policymakers of the world are also working hard to determine the best path forward and the steps we must take to get there. By working together to save nature, we can save the future of Earth and preserve it for our next generations.

Judy CHEN, JP Foundation Chair



總監的話

Director's Message

承先啟後 持續發展

The Path from Past Successes to a Sustainable Future

「透過這次五年工作檢討,我們為完善未來計劃釐定清晰方向,於保育、教育、推廣及人才培訓各範疇作出相應轉變, 為全球物種與其棲息地、人類與社會,帶來更深更遠的正面影響。|

"This five-year review marks a good opportunity for us to identify clear directions to optimise future endeavours. By making changes in conservation, education, communication and capacity building, we can have a bigger and longer-lasting impact on species, habitats, people and communities around the world."

保育基金在二零二零至二零二一年度撥款港幣三百萬元資助十二個全新項目,支持亞洲區七個國家二十三個物種的保育工作。有關項目涵蓋十個保育基金持續關注的旗艦物種和範疇,包括大熊貓、中華白海豚、長江江豚、香港淡水龜、南亞中華穿山甲、印度河龜、日本遠東哲羅鮭,以及長冠八哥的科研項目,還有保護柬埔寨濕地和打擊非法野生動物貿易的保育項目。此外,我們亦撥款資助多個亞洲區保育項目,其中在越南的斑鱉項目更取得突破進展,發現另一隻野生斑鱉的存在證據。

在保育上,科研是重要一環,而教育工作同樣重 要,保育基金明白唯有兩者相輔相承,才能令保育 得以可持續推行。在二零二零至二零二一年度,我 們針對學校教育,推出一系列新措施,例如將「環 保基金 一 明日之鱟保母育成計劃」從中學擴展至 小學;與漁農自然護理署(漁護署)合作,為幼稚 園及小學生舉行野生猴子及野豬生態教育講座及活 動;與商界環保協會合作推出「綠惜課室」;以及 邀請保育基金資助項目的首席研究員主持五場科學 網上研討會。此外,我們亦與香港專業教育學院 (沙田分校) 合作設計「綠路童心」計劃教材套, 以及與保良局合辦「快樂保 • 旅」計劃。在社區 教育方面,我們獲漁護署資助在海洋公園舉辦首屆 「自然瑰寶」教育展覽,為公眾介紹本地瀕危物種, 並加入了香港警務署主辦的「動物守護 ● 社區大 使計劃」,打擊殘酷對待動物罪行。透過宣傳與教 育,我們廣泛散播保育種子,孕育新一代人才,實 現可持續發展的綠色未來。

Conservation requires persistent dedication, as well as periodic monitoring and course adjustments. In 2020/21, OPCFHK conducted a comprehensive five-year review with the principal investigators (Pls) of our funded projects from 2015/16 through 2019/20. This review recorded encouraging results: more than six protected areas established across Asia, more than 150,000 hectares of habitats protected, more than 218,600 people reached, and almost 1,000 conservation practitioners trained, including 108 young scientists nurtured. This five-year review marks a good opportunity for us to identify clear directions to optimise future endeavours. By making changes in conservation, education, communication and capacity building, we can have a bigger and longer-lasting impact on species, habitats, people and communities around the world. We will use this information to seek out new ways to improve fund allocation and project evaluation.

In 2020/21, we allocated HK\$3M to 12 new projects that offered a total benefit to 23 species across seven countries and regions in Asia. This included our continued support to the 10 flagship species and areas identified, covering scientific research on the giant panda, Chinese white dolphin, Yangtze finless porpoise, Hong Kong freshwater turtles, Chinese pangolin in South Asia, river turtles in India, Sakhalin Taimen in Japan and Bali Starling, as well as conservation studies to protect the wetlands in Cambodia and combat illegal wildlife trade. We also funded a range of conservation projects throughout Asia, including one to monitor the Swinhoe's softshell turtle population in Vietnam, which notably discovered evidence of a new individual in the wild.

However, scientific research is only one key to the sustainability of OPCFHK's conservation efforts. The other key is education. In 2020/21, we launched various new initiatives to further this effort in schools in particular, such as extending our ECF STEAM Juvenile Horseshoe Crab Rearing Programme from secondary schools to primary schools. Our latest collaboration with the Agriculture, Fisheries and Conservation Department (AFCD) saw the success of a series of education talks and programmes on the biological characteristics of monkeys and wild pigs for kindergarten and primary schools. We also worked with the Business Environment Council (BEC) on the BEC Mobile Green Classroom, and the Pls of different OPCFHK-funded projects joined us to host a series of five scientific webinars. In addition, we worked with the Hong Kong Institute of Vocational Education (Sha Tin) to develop a teaching kit for Kids Greenway and with Po Leung Kuk to create the A Wonderful Journey Inside and Out programme. With regards to community education, we introduced the public to local endangered species at the first-ever Beauty of Biodiversity Exhibition, subvented by AFCD at Ocean Park, and worked with the Hong Kong Police Force to fight cruelty to animals through the Animal Watchers Programme. By spreading awareness and nurturing new generations of talent, we can ensure that our conservation projects have a long-lasting effect.

公眾的支持與捐助,亦是引領我們的重要動力。 為呼籲社會各階層支持保育,保育基金在二零 二零至二零二一年度推出全新籌款活動「保育 英雄支援計劃」及「海洋公園 Chill 級保育日 2021」,亦協助海洋公園「森度遊」活動舉行導 賞團,讓逾一千九百名參加者在欣賞戶外生態的 同時,參觀與認識香港海洋生物救護及教育中心 的運作。

在開拓新項目同時,我們亦繼往開來,繼續推行多個保育基金常設項目。其中包括在本年度重新設計的「環保基金一明日之鱟保母育成計劃」,這個馬蹄蟹教育項目自二零零九年推出至今,已成功向超過二十八萬八千八百人推廣保育;「野外生態保育大學生贊助計劃」亦在二零二零二一年度在南朗山完成生物多樣性基線調查等二一年度保衛賽 2020 線上跑」及「生態保衛賽 2021」則合共吸引約二千八百人次參加。此外,海洋生物擱淺行動組亦在年內合共處理了五十一宗個案。我們將在來年延續上述各個項目,讓保育力量在社會上傳得更廣、走得更遠。

未來保育基金將繼續探索與政府及不同機構合作 的機會,並因應疫情,將更多研討會及教育遊戲 工作轉移至社交媒體等線上平台。同時,我們將 檢視保育工作的優先順序,並探討不同的途徑, 冀能與社會各階層更有效地緊密合作。我衷心期 待在來年繼續與保育基金各位熱心同事,還有一 眾科研成員、商界伙伴以至社會各界竭誠合作, 當然你的支持亦必不可少。

布文傑 基金總監 Public support and donations are also crucial to our work. In 2020/21, OPCFHK implemented new initiatives such as the Conservation Hero Support Programme and Conservation Chill Club Day 2021, which were designed to gather support and donations from all walks of life. We also hosted guided tours as part of Ocean Park's green outing programme, where more than 1,900 visitors enjoyed the outdoors and explore the behind-the-scenes operations of our Hong Kong Marine Life Stranding and Education Centre.

While exploring new initiatives, we remained diligent on our ongoing, well-established programmes, such as the newly revamped ECF STEAM Juvenile Horseshoe Crab Rearing Programme, which has reached over 288,800 people since 2009. In 2020/21, the University Student Sponsorship Programme in Wildlife Conservation completed a baseline survey measuring the biodiversity of Nam Long Shan. The Run for Survival 2020 Virtual Run and Run for Survival 2021 together attracted about 2,800 participants. Finally, the Marine Life Stranding Response Team investigated 51 stranding cases. In the coming year, all these programmes will continue to actively engage different sectors of the community.

Looking ahead, OPCFHK will continue to explore opportunities to collaborate with the government and organisations. While the pandemic persists, our work will stay strong through more webinars and online games on social media and online platforms. We will also prioritise conservation efforts and investigate more ways to work with the community efficiently and effectively. Most of all, I look forward to collaborating with our devoted team of staff members, scientists, business partners, members of the community, and you.

Michael BOOS Foundation Director



保育年度回顧

Highlights of the Year

去年 2019 冠狀病毒病疫情持續,各地鎖國封城,令野生生態保育工作大受影響,保育資金變得緊絀。疫情蔓延全球固然令人關注,但與此同時,生態保育的工作亦絕不能懈怠。在二零三零至二零二一年度,保育基金推行及支援了多個保育項目,為守護亞洲物種及生態系統貢獻力量,並致力凝聚商界、學術界及公眾人士,向下一代灌輸可持續發展意識。

In the past year, the spread of the COVID-19 pandemic and the subsequent lockdowns disrupted wildlife conservation initiatives and dried up funding for conservation efforts. But even as the pandemic spreads around the world, it is still important for us to save wildlife from threats. In 2020/21, OPCFHK committed to safeguarding Asian wildlife and their ecosystems by initiating and supporting multiple conservation projects, and bringing together key stakeholders in the industry, academia and the general public to help raise the next generation with a sustainability mindset.

保育研究

Conservation & Research

1. 眼斑水龜保育項目 The Beale's Eyed Turtle Project

許多亞洲龜類,包括香港原生的眼斑水龜等,都一直飽受走私威脅,非法捕獵者更會直接從野外將龜類捉走。為更有效地保育眼斑水龜,保育基金資助嶺南大學的研究團隊,調查及監察眼斑水龜尚存的種群,以了解其生態及蒐集相關貿易數據,藉此評估與改良現行的反偷獵方法。

Many Asian turtle species, such as Hong Kong's native Beale's eyed turtle, are threatened by illegal trading, with poachers removing turtles directly from the wild. To better protect these turtles, OPCFHK supported a research team from Lingnan University to study and monitor the remaining population of Beale's eyed turtles. The project aims to understand the turtle's ecology and trade data while evaluating and improving existing anti-poaching methods.



2. 蘇眉保育項目 The Humphead Wrasse Project

雖然法例規定販賣蘇眉必須申領牌照,但市面仍然可見商戶以身試法販賣非法來源的瀕危蘇眉。保育基金為此特別資助香港大學研發一套流動應用程式,按臉部特色識別蘇眉個體及編製相片數據庫,公眾可藉此辨別市場上的蘇眉是否來自合法產源,並向有關當局舉報可疑商戶。

Even though a license is required to trade the endangered humphead wrasse, illegally sourced wrasse are still being sold in markets. OPCFHK funded the University of Hong Kong to develop a mobile app that distinguishes individual fish by their unique facial markings. The public can use the app and its photo database to identify legally imported fish and report suspicious sellers to relevant authorities.



保育教育

Conservation Education

3. 環保基金 — 明日之鱟保母育成計劃 ECF STEAM Juvenile Horseshoe Crab Rearing Programme

保育基金於二零二零年獲環境及自然保育基金撥款資助,將常設的馬蹄蟹保育項目重新設計,提供一系列融入 STEAM (科學、科技、工程、藝術及數學) 元素的培訓項目。此計劃更於本年度由中學推展至小學,進一步向新生代宣揚保育意識。

In 2020, the Environment and Conservation Fund (ECF) added its support to OPCFHK's horseshoe crab conservation programme. The newly revamped programme provided a series of STEAM (Science,





Technology, Engineering, Art and Mathematics) trainings to secondary schools students, and was extended to primary schools to increase its outreach even further.

4. 停止餵飼野生動物計劃 Don't Feed Wild Animals

餵飼行為導致香港的野生猴子和野豬與人類之間的衝突持續。為緩解這種情況,保育基金及漁農自然護理署(漁護署)自二零一八年起合作推行此計劃,讓公眾注意餵飼野生動物對生態及社會造成的負面影響,並到各學校推廣與野生動物和平共處的方法。

In Hong Kong, feeding monkeys and wild pigs has led to persisting human-wildlife conflicts. To mitigate this problem, OPCFHK and the Agriculture, Fisheries and Conservation





Department (AFCD) have collaborated since 2018 on a programme to highlight the negative ecological and societal consequences of feeding wild animals. The programme also sows the seeds in schools for living in harmony with wild animals.

5. 「自然瑰寶」教育展覽 Beauty of Biodiversity Exhibition

在漁護署的資助下,是次展覽於海洋公園舉行,作為生物多樣性教育項目的其中一項活動,著力介紹本地瀕危物種,並舉辦導賞團,帶領公眾欣賞本地生物多樣性及認識其面臨的 威脅。

Subvented by AFCD, this exhibition at Ocean Park was part of AFCD's Biodiversity Education programme. It showcased local endangered species and offered guided tours to improve awareness of local biodiversity and its threats.





社區參與

Community Engagement

6. 保育英雄支援計劃 Conservation Hero Support Programme

生物多樣性正受到前所未有的威脅,包括氣候變化、塑膠污染及非法野生動物交易等。 在二零二零年,保育基金推出這個全新計劃,募集各界人士及企業機構捐款,資助保育 研究及教育工作。

More than ever, biodiversity is at risk from threats such as climate change, plastic pollution, illegal wildlife trade, etc. In 2020, OPCFHK launched this new initiative to gather support from all walks of life, attracting individuals and corporations to make donations to aid in conservation research and education.



7. 生態保衛賽 2021 Run for Survival 2021

是次活動以「保護蔚藍海洋 延續地球未來」為主題,是疫情爆發以來香港首個大型公開賽跑活動,也是保育基金首次於海洋公園舉辦這項年度盛事。除了賽跑活動外,保育基金亦同時舉行「保育嘉年華」,讓大眾透過攤位遊戲及工作坊,獲取生物多樣性的知識及海洋保育小錦囊。

As Hong Kong's first large-scale public running event since the pandemic began, this annual run took place at Ocean Park for the first time, with the theme Protect Our Ocean for a Better Future. OPCFHK concurrently held a Conservation Carnival with game booths and workshops that offered tips on biodiversity and marine conservation.



8. 第廿六屆海洋公園保育日 The 26th Ocean Park Conservation Day

保育基金在中國銀行(香港)有限公司贊助下,於 二零二一年五月二十九至三十日舉行保育日。此活動 特別舉行展覽,展出六種本地瀕危物種的資訊,並設 立寓教於樂的遊戲攤位。活動期間,逾一萬九千名參 觀者到訪怡慶坊,近距離觀賞眼斑水龜的爬行姿態。

On 29 and 30 May 2021, OPCFHK held this event with the sponsorship of the Bank of China (Hong Kong) Limited. The event featured exhibitions about six locally endangered species, as well as fun-yet-





educational games. Over 19,000 visitors also enjoyed an up-close look at a live Beale's eyed turtle at Ocean Park's Applause Pavilion.

二零二零至二零二一年度保育成果

2020/21 Achievements in Numbers

全賴你的支持,保育基金得以於本年度繼續在香港以至亞洲推動保育和研究工作,守護生物多樣性。以下數字展示我們過去 一年的成果:

Your support has enabled OPCFHK to fund conservation projects throughout Asia and locally in Hong Kong. These numbers speak for themselves about our efforts to preserve biodiversity:

23 個亞洲物種得到保育基金幫助 species in Asia benefitted from OPCFHK funding, including



9 陸生哺乳類 terrestrial mammals



6 兩棲類及爬行類 amphibians and reptiles



1 魚類 fish



3 水生哺乳類 aquatic mammals



3 鳥類 birds



1 其他 other

HK\$5,285,514



善款用作支持亞洲野生生態保育項目。 was spent to support wildlife conservation projects in Asia.





1 4 個涵蓋於保育基金保育工作中的物種, 被世界自然保護聯盟瀕危物種紅色名錄 列為「瀕危」或「極度瀕危」。 of the species OPCFHK helped are listed as "Endangered" or "Critically Endangered" on the International Union for Conservation of Nature (IUCN) Red List of Threatened Species.

> 詳情可參閱第十二至十三頁。 For more information, please refer to pages 12 to 13.



201,000+

名學生及公眾受惠於保育基金的教育活動。 students and members of the general public benefitted from OPCFHK's education programmes.

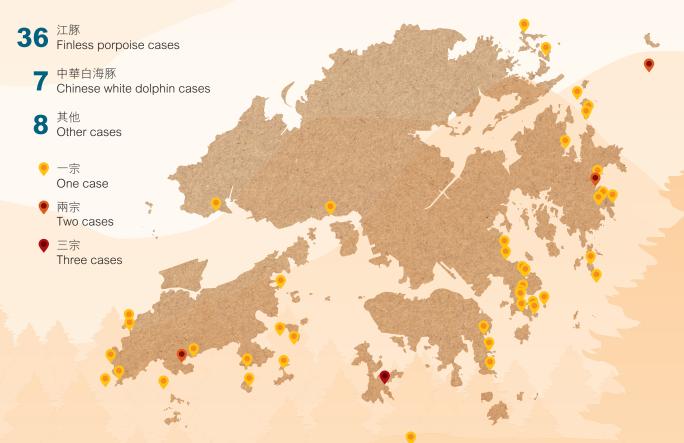
詳情可參閱第三十四至四十七頁。 For more information, please refer to pages 34 to 47. 5,400+

個義工工時。

volunteer man-hours were received.



51 宗本地鯨豚擱淺個案獲跟進。
marine life stranding cases in Hong Kong were investigated.



詳情可參閱第二十六頁。 For more information, please refer to page 26.

你的每一分捐獻,都能幫助保育基金與各界伙伴繼續推行保育研究、公眾教育、合作計劃與宣傳項目,為守護亞洲物種、生物多樣性及生態系統努力。我們衷心感謝你的支持,期望你能繼續與我們攜手護生態、拓未來!

Your generous donations allow OPCFHK to continue the very important work of preserving Asia's species, biodiversity and ecosystems through research, education, partnerships and awareness campaigns. Join us as we work to create a better future. Thank you for your support!



保育基金



OPCFHK



保育研究 CONSERVATION & RESEARCH

深耕當下科研 為更美好未來確定發展方向 Enriching Our Current Understanding to Navigate a Better Future

藉著科學研究,我們不單可以洞悉當下,更可以為未來奠定可持續發展的基石。在二零二零至二零二一年度,保育基金繼續支持本地及區內保育項目,為守護海洋生態、瀕危物種及生物多樣性而努力,並積極了解氣候變化的影響與打擊非法捕獵。透過推動科研,加上海洋生物擱淺行動組的調查,保育基金持續倡導以科學為基礎,尋找具實證的有效方法,維護現今和未來的生態平衡。

Scientific research not only gives us insight into our current situation, but also provides data to pave the way for creating a better world. In 2020/21, OPCFHK continued its support of local and regional projects in areas such as marine conservation, endangered wildlife, biodiversity, climate change and combating the illegal trade of threatened species. Through scientific research and the work of the Marine Life Stranding Response Team, OPCFHK is committed to continuing to advocate and support effective, scientific ways to preserve the delicate balance of nature for today's and future generations.

二零二零至二零二一年度保育項目

Conservation Projects in 2020/21

中國內地 Mainland China



綠海龜 Green Turtle



© Chen Min

 海龜救助信息與技術需求調查 Investigation of sea turtle rescue information and technological needs



玳瑁 Hawksbill Sea Turtle





棱皮龜 Leatherback Sea Turtle





東亞江豚 Narrow-ridged Finless Porpoise



 青島嶗山灣海域東亞江豚季節性 分布格局及棲息地利用調查 Seasonal distribution and habitat use of East Asian Finless Porpoise in Laoshan Wan, Qingdao



半蹼鷸 Asian Dowitcher



大濱鷸 Great Knot



© Tengyi Chen



小青腳鷸 Spotted Greenshank

Tang

 候鳥遷徙重要的中途站:中國連 雲港海岸濕地的保育
 Conserving the coastal wetlands of Lianyungang, China — the critically important stopover site for long-distance migratory shorebirds

EN)



羚牛 Takin

VU

© Fang Yihad

 高黎貢山羚牛保護、監測與社區 保護意識提升
 Protecting, monitoring, and raising community conservation awareness for the Gaoligong Mountain Takin

馬來西亞 Malaysia



馬來穿山甲 Sunda Pangolin



© Sabah Forestry Department/Leibniz-IZW

 運用反偷獵對策保護馬來穿山 甲及其他受威脅物種 Anti-poaching strategies to protect Sunda pangolins and other threatened species



馬來熊 Sun Bear





巽他雲豹 Sunda Clouded Leopard





圓尾鱟 Mangrove Horseshoe Crab



 利用鱟胚胎發育過程來評估馬來西亞沉積和氣候問題的影響 Sedimentation and climate emergency impacts in Malaysia evaluated using horseshoe crab embryogenesis

印度 India



阿薩姆棱背龜 Assam Roofed Turtle

CR CR

• 改革印度阿薩姆地區自然探索中心,加強社區保育意識 Revamping the Nature Discovery Centre in Assam, India: an effort towards planting conservation values in the community

印尼 Indonesia



© Orangutan Appeal UK

婆羅洲紅毛猩猩 Bornean Orangutan



 利用滅火和巡邏隊伍保護和保 育印度尼西亞 Sebangau 森林 Patrol and fire-fighting teams to protect and conserve the Sebangau Forest, Indonesia

尼泊爾 Nepal



孟加拉虎 Bengal Tiger



and a since



亞洲象 Asian Elephant



© Rabin Kadariya



印度犀 Greater One-horned Rhino





恒河江豚 Ganges River Dolphin





恒河鱷 Gharial



© Rabin Kadariya



豚鹿 Hog Deer



© Rabin Kadariya

 建立社區反偷獵團隊以助保育 野生動物 Community-based anti-poaching units for wildlife conservation

香港 Hong Kong



蘇眉 Humphead Wrasse



 在蘇眉上套用電腦人臉辨識技術作為改善CITES 執法新方案 Humphead wrasse computeraided facial recognition as a novel solution to CITES enforcement improvement



大壁虎 Tokay Gecko



© Suna Yik-he

 分析香港大壁虎基因多樣性 Hong Kong as a hub and home for declining Tokay geckos: analysis of genetic diversity

俄羅斯 Russian Federation



弓頭鯨 Bowhead Whale



© Olga Shpak

探討瀕危弓頭鯨的季節性分布 來界定和漁業有潛在性衝突的 水域

Follow to save: understanding the endangered Okhotsk Sea bowhead whale seasonal distribution for defining potential "areas of conflict" with industry

保育狀況 Conservation Status

根據世界自然保護聯盟瀕危物種紅色名錄

According to the International Union for Conservation of Nature (IUCN) Red List of Threatened Species



極度瀕危 CRITICALLY ENDANGERED



無危 LEAST CONCERN



數據缺乏 DATA DEFICIENT



瀕危 ENDANGERED





檢討二零一五至二零一六到二零一九至二零二零年度 保育項目

A Review of OPCFHK-funded Projects from 2015/16 to 2019/20

啟迪發展路線 邁向成功之路

保育基金對過去五個年度的保育項目作出檢討,並特別邀請各首席研究員回饋意見,同時分析各獲資助項目的工作報告及進行資料調研,務求能完善未來保育計劃。

An Encouraging Path to Success with Enlightening Directions for the Future

In order to optimise future endeavours, OPCFHK carried out a five-year review of its funded projects by gathering feedback from the principal investigators (PIs), analysing project reports and conducting desktop research.

二零一五至二零一六以至二零一九至二零二零年度獲資助物種及國家/地區

Supported Species & Countries/Regions from 2015/16 to 2019/20











是次檢討主要聚焦四大範疇的成果:

The review focused on four key areas of achievement:

1. 生物多樣性保育工作 Biodiversity Conservation

6+ 個亞洲保護區成立,包括全新開設或經活化/復修/加强保護的區域 protected areas established across Asia, including new areas and ones that have been revitalized/restored/strengthened

150,000+ 公頃棲息地受到保護或復修 hectares of habitats protected or restored

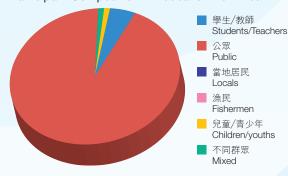
重點物種數量顯著增加 包括長江江豚、長冠八哥、科莫多龍,以及多種龜類和魚類 A notable recorded increase Komodo dragon, various turtles and fishes

12 個新發現物種 new species discovered

打擊非法貿易及捕獵行動包括設置相機偵測網絡、成立巡邏隊伍,以及加強當地社群的溝通與參與 Combated illegal trade through setting up camera trap networks, establishing patrol teams, and enhancing and poaching communication and community engagement

2. 教育及宣傳工作 Education and Communication

教育活動的參加者分布圖 Participant Composition in Education Activities



接觸群眾,包括 204,000+ 名公眾人士和 10,500+ 名教師和學生

218,600+ people reached, including 204,000+ members of the public and 10,500+ teachers and students

> 參與是次檢討的首席研究員表示曾透過不同媒體 宣傳研究項目和成果,包括報章雜誌、電台訪問、 電視播映,以及紀錄片、電子通訊與社交媒體 of the PI respondents expressed that they

communicated their project activities and findings via multiple media channels, including newspapers and magazines, radio interviews, TV coverage and documentaries, newsletters and social media

3. 人才培訓 Capacity Building

個保育項目成功推行,地點包括柬埔寨、中國內地、 印尼、蒙古、尼泊爾及越南 conservation projects in Cambodia, Mainland China, Indonesia, Mongolia, Nepal and Vietnam

名保育工作人員獲得培訓,包括 108 位年輕科學家 99()+ conservation practitioners trained, including 108 young scientists nurtured

個駐地培訓項目,遍布孟加拉、柬埔寨、印度、印尼、 馬來西亞及尼泊爾

local training projects in Bangladesh, Cambodia, India, Indonesia, Malaysia and Nepal

當地居民獲得培訓 540+ locals trained

USD45,000 綠色經濟體系成功建立 worth of green economy established

4. 保育項目的可持續發展與保育基金的重要角色 Project Sustainability and the Importance of OPCFHK's Support

> 首席研究員表示有在相關地區持續推行部 分保育工作或開展新項目

100% of the PI respondents indicated that they

had continued some of the conservation activities or started a new project in the area

位首席研究員認為保育基金的資助對其事業發展

12 相當重要 Pls found OPCFHK's funding important for their career development

位首席研究員先後加入不同世界自然保護聯盟專家 小組

 $2^{\,\,\mathrm{/M}}$ PIs became members of their respective IUCN Specialist Groups

總結建議 Recommendations

保育基金會充分運用是次檢討所得的資訊開創新猷,以改善撥款調配與項目評估的工作,包括:制訂推廣方案:修訂項目 報告提交模式,以標明量化成果為報告重點;定期跟進已完成項目的新進展;以及了解獲資助項目對相關首席研究員的事 業發展成效。保育基金透過檢討過去,著眼未來規劃,確保所有撥款都能更長足有效地守護物種存續。

Based on these encouraging findings, OPCFHK will seek new ways to improve the allocation of funding and the evaluation of projects through new initiatives. These will include formulating communication plans, revising the project report submission format to highlight quantitative achievements, regularly tracking the completed projects for new developments and investigating the impact of the projects on the career development of the PIs involved. By learning from the past, OPCFHK can ensure that our conservation funding is used to safeguard biodiversity in ever more effective ways.

弓頭鯨:了解鄂霍次克海種群的洄遊模式及面對的威脅

Bowhead Whale: Understanding Threats and Migration Patterns in the Okhotsk Sea



捕鯨禁令後的緩慢恢復

弓頭鯨曾經是捕鯨者的主要目標,因為牠們泳速緩慢,死後會立即 浮上水面,並且擁有價值高昂的油分及鯨鬚。弓頭鯨的商業捕獵大 致於一九二一年停頓,當時全球的弓頭鯨數量僅餘不足三千頭。時 至今日,西北極區的弓頭鯨數量已大幅回復,現時成年弓頭鯨的數 目約有一萬頭,可是在副極地區鄂霍次克海的種群數目依然十分稀 少,處於危險水平。氣候變化、商業發展及人類活動對弓頭鯨的棲 息地、洄遊模式及食物來源帶來嚴重威脅,但目前尚未有研究廣泛 探討這些威脅及與其相關的具體影響。



透過標記及追蹤深入認識弓頭鯨

在二零二零年,保育基金支持了一項由 A.N. Severtsov Institute of Ecology and Evolution of the Russian Academy of Sciences 領導的研究項目,深入了解鄂霍次克海的弓頭鯨。團隊透過衛星標記揭示弓頭鯨的洄遊路線及越冬地,並利用無人機進行空中拍攝,藉以辨認弓頭鯨及建立個體識別數據庫。團隊憑相片上弓頭鯨的明顯傷痕,可以判斷弓頭鯨的傷勢是自然因素(例如受到殺人鯨攻擊)或人為因素(例如被漁具誤纏及船隻撞擊)造成。與此同時,團隊亦在旅遊旺季期間持續進行觀察,以評估消閒活動對弓頭鯨造成的潛在影響。由此所得的數據,結合傳統活體組織檢查結果,將有助團隊向世界自然保護聯盟提供更全面的弓頭鯨種群趨勢資料。

A Slow Recovery after Whaling Predation

Bowhead whales were a long-time favoured target of whalers because they swim slowly, float immediately after death and are sources of valuable oil and baleen. By the time commercial bowhead whaling stopped in around 1921, less than 3,000 bowhead whales existed worldwide. Today, the Western Arctic bowhead whale population has recovered significantly and measures about 10,000 adults; however, the subarctic Okhotsk Sea population remains dangerously low. Climate change, commercial development and human activities pose significant threats to their habitat, migration patterns and food sources, but the extent of these threats and their specific areas of effect have not been extensively studied.

Tag-and-Track for a Better Understanding

In 2020, OPCFHK supported a research project led by the A.N. Severtsov Institute of Ecology and Evolution of the Russian Academy of Sciences to deepen understanding of the Okhotsk Sea bowhead whale. The team tracked the bowhead whales via satellite tagging to define their migratory routes and winter grounds. They used drones to conduct an aerial photo-ID study and created a catalogue from the data. The photos also showed the visible scars on each whale, allowing the team to determine whether the injuries were from natural threats such as killer whales or anthropogenic threats such as entanglement and ship strikes. Concurrently, the team conducted continuous observations during the tourist season to assess recreational activities as potential sources of disturbance to the whales. These results, combined with conducting traditional biopsies of the whales, will allow the team to provide IUCN with more comprehensive information about the whales' population trend.

帶領研究向前的初步成果

Preliminary Results Indicate Areas for Further Study

The research team conducted tagging activities at Ongachan Cove on the Tugursky peninsula by using various tagging methods, such as paramotor tagging and tagging from the boat. One successful tag gathered over one month of satellite data. The team supplemented the data with multiple drone flights, identified more than 50 bowhead whales and filmed their distribution in the cove. Notably, all identified individuals showed rake marks from killer whales. The team also assessed the impact of tourist activity on bowhead whales in Wrangel Cove via observation. Samples were collected from live and dead bowhead whales in Wrangel Cove for genetic analysis, which can provide information on population trends. Surprisingly, the team found that the skin shedding of bowhead whales was likely a nutritious food for local fish and invertebrate communities. The team also discovered a new 'tail-up' rest posture in bowhead whales from their hours of observation.

量化成果 Quantitative Achievements

- 可弓頭鯨成功被安裝標記,收集到 45 日的數據 successful tag, 45 days of data
- 201 次無人機任務,收集到超過 50 小時的數據 drone flights, over 50 hours of mission data
- 50十 頭弓頭鯨被識別 bowhead whales identified

- 40 個活體樣本被採集 biopsy samples collected
- 33 個皮膚樣本從水中或海灘上獲得 skin samples collected from either the water or the beach
- 3 個弓頭鯨屍體樣本被收集 carcasses' tissues collected

展望未來

研究團隊正在編寫總結報告,將向不同持分者陳 述是次研究結果及建議,並會詳細分析鄂霍次克 海弓頭鯨的行為習性與其所面臨的人為威脅。團 隊亦會在同行評議的期刊中發表兩份學術文章, 進一步分享有關保護此物種的見解。目前,團隊 正參與制定鄂霍次克海弓頭鯨的國家保育政策。

Looking Ahead

A final report with findings and recommendations to different stakeholders is under progress and will include a complete analysis of the Okhotsk bowhead whales' behaviours and anthropogenic threats. The team will also publish two papers in peer-reviewed journals to further share their insights on how to protect this species. Currently, the team is preparing a national strategy for the conservation of the Okhotsk bowhead whale population.

學名 Scientific Name	Balaena mysticetus
概要 Overview	這種鯨類在西北極區的數量已大幅回復,但在副極地區的種群依然瀕危 While this whale's Western Arctic population has recovered considerably, its subarctic population remains at critical levels
保育狀況 Conservation Status	無危 * Least Concern*
估計數量 Estimated Population	全球有 10,000 頭成年弓頭鯨 但於鄂霍次克海的種群數量稀少,處於危險水平 10,000 mature individuals globally But the Okhotsk Sea population is dangerously low
棲息地類型 Type of Habitat	淺海區 [,] 海洋深海區 Marine neritic, marine oceanic
主要威脅 Major Threats	食物來源減少、被天敵捕食、被船隻撞擊、被漁具誤纏、海洋噪音、水質污染及氣候變化 Declining prey sources, natural predation, boat strikes, entanglement from fishing equipment, marine noise and water pollution and climate change

^{*} 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

小眼金線經: 收集數據以促進保育成效

Small Eye Golden-line Fish: Gathering Data for Effective Conservation



與其他國家及地區相比,中國內地擁有最豐富的洞穴魚物種,至今共發現了約一百五十個品種,而且全部屬中國內地獨有。由於經濟急速發展,洞穴魚的棲息地受到不同人類活動的嚴重破壞,例如抽取地下水導致洞穴水文出現變化,以及排污造成水質污染等,均對中國內地的洞穴魚構成嚴重威脅,急需保育對策。小眼金線蚆被視為潛在護傘種,代表如果該物種受到良好保育,其他洞穴魚亦可以間接地獲得保護。然而,由於缺乏此物種的空間分布及種群狀況等資料,制約了有效的保育,因此須要進行詳細的研究,以確定其保育狀況及幫助制定保育措施。

保育基金支持了一項研究項目,透過調查小眼金線紀的資源現狀、分布生境及威脅,了解其現況。此物種主要分布在廣西坡心河沿岸,並透過河道支流進一步擴散。該研究確認了多種威脅此魚類及其棲息地的因素,其中旅遊景點的開發對牠們構成嚴重威脅,因為建築工程及人為干擾已令其種群減少及令棲息地範圍縮小。此外,團隊亦確認了其他主要威脅,例如誤捕而造成的過度捕撈,以及工業排放而令地下水受污染。

Mainland China has the highest diversity of cavefishes compared to other countries and regions. About 150 species have been discovered, all of which are considered as endemic species in Mainland China. Due to rapid economic development, their habitats have been severely destroyed by human activity such as the use of underground water, leading to changes in the hydrology of the cave habitat, and the discharge of contaminants that damage the water quality. These factors pose a serious threat to the cavefishes in Mainland China. Therefore, urgent conservation is needed. The small eye golden-line fish is considered a potential umbrella species, which means that other cavefishes can be protected indirectly if this species is well-protected. However, information on this species, such as its spatial distribution and population status, is scarce, which hampers effective conservation. A thorough study is needed to review its conservation status and help formulate conservation measures.



OPCFHK supported a research project to find out the current status of the small eye golden-line fish by investigating its resource availability, spatial distribution and threats. The species is mainly distributed around Guangxi Poxin River, and has expanded its populations though river passages. The study identified multiple factors that are threatening the fish and its habitat. Development of travel spots poses a significant threat to the fish, since construction and human interference have caused the decline of both its population and habitat. The team also identified other major threats, such as overfishing through by-catch and groundwater pollution from industrial discharge.

The study team presented the government with a list of recommendations for measures that should be implemented to protect this species, including conducting prior assessment for any construction work that will take place near a cave. They also suggested establishing a buffer zone to ensure that the cavefish enjoy a safe and unaffected habitat.

學名 Scientific Name	Sinocyclocheilus microphthalmus
概要 Overview	區內潛在護傘種,是中國內地的珍稀洞穴魚,能夠間接保護其他物種,但目前因區內急速發展正受威脅 A potential umbrella species that protects other species indirectly, this cavefish in Mainland China is currently threatened by the area's rapid development
保育狀況	易危 *
Conservation Status	Vulnerable*
估計數量	因缺乏資料而未能確定
Estimated Population	Unspecified due to lack of information
棲息地類型	淡水洞穴
Type of Habitat	Fresh water cave
主要威脅 Major Threats	棲息地受破壞或退化、因基建及工業發展令地下水受污染,以及非法捕魚 Habitat destruction or degradation, contamination of underground water due to infrastructure and industrial development, and illegal fishing

* 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

馬蹄蟹:了解活化石在台灣面對的威脅

Horseshoe Crab: Understanding Threats to This Living Fossil in Taiwan

保育基金十多年來一直積極參與馬蹄蟹的保育工作,從香港開始,其後伸延至中國內地,現在更

到達台灣。過往中國鱟廣泛分布 於台灣不同的沿海地區,然而, 最近的研究發現牠們在香山濕地、 布袋和西海岸的數量急劇下降, 就連位於金門的龐大種群數量也 在減少,可見保育已經刻不容緩。

的距離太遠,令年幼馬蹄蟹難以往來。而在布袋,不同採樣地點的年幼馬蹄蟹空間密度變化不一,則與有機物質的分布有關。

OPCFHK has actively participated in horseshoe crab conservation for over ten years, first in Hong Kong, then in Mainland China and now in

Taiwan. Historically, Chinese horseshoe crabs have been widely distributed throughout Taiwan's different coastal areas. However, recent studies found that their populations had plummeted in the Xiangshan Wetlands, Budai and the West Coast. Even the large population in Kinmen is declining. It's clear that immediate action is needed.

Under OPCFHK's funding, Taiwan's Azure Alliance surveyed the Chinese horseshoe crab populations and their microhabitats in Budai, Penghu and Xiangshan, Taiwan. The team also analysed the populations of adult horseshoe crabs in these regions, taken from past gill net surveys. In Penghu, there was a noticeable lack of horseshoe crab larvae. This could be due to declining numbers of adult horseshoe crabs or deterioration of spawning grounds leading to less recruitment of horseshoe crab larvae. It could also indicate that Penghu is unsuitable as a spawning or nursery ground, or that

the distance between Penghu and other spawning grounds is too far for the larvae to travel. In Budai, the spatial variation of juvenile horseshoe crab density along the sampling sites was related to the distribution of organic matter.





成年馬蹄蟹調查記錄

Adult Horseshoe Crab Records

- 7 年內·從金門的漁民或居民購買了 1,319 隻馬蹄蟹·以進行繁殖或標識追蹤 1,319 purchased from fishermen or the public for breeding or tagging in Kinmen within 7 years
- 2 年內,於澎湖進行的刺網調查共捕捉了 35 隻馬蹄蟹,其中 24 隻在理想的海洋動物棲息地內港被捕獲 35 captured in gill net surveys in Penghu in 2 years, 24 of which were found in the inner harbour, an excellent habitat for marine life

此外,調查還證實人類捕獵仍然是一個嚴重威脅。 團隊調查了金門漁民捕獲和出售成年馬蹄蟹的趨勢。其後,當地政府決定購買這些被捕獲的成年 馬蹄蟹,以用於進行繁殖或標識追蹤。在調查進 行期間,團隊向熟悉潮間帶的當地居民提供了培 訓,支援調查附近地區的年幼馬蹄蟹的情況,以 保護這瀕危物種。 The surveys also confirmed that human exploitation remains a serious threat. The team investigated the trend of adult horseshoe crabs captured and sold by fishermen in Kinmen. These captured adults were later purchased by the local government for breeding or tagging. During the project period, the team provided training to locals who had a good knowledge of intertidal zones. The locals subsequently became strong support for investigating juvenile horseshoe crabs in nearby areas for the conservation of this endangered species.

學名 Scientific Name	Tachypleus tridentatus
概要	有「活化石」之稱的古老海洋物種,出現於四億年前
Overview	Considered as a living fossil, this ancient marine species came into existence for more than 400 million years
保育狀況	瀕危 *
Conservation Status	Endangered*
估計數量	持續減少
Estimated Population	Decreasing
棲息地類型	淺海區 [,] 海洋潮間帶
Type of Habitat	Marine neritic, marine intertidal
主要威脅	人類捕獵、喪失適合產卵及育幼的海灘,以及被棄置漁網或漁具誤纏
Major Threats	Human exploitation, loss of spawning and nursery beaches, and threats of entanglement by ghost nets or gears

* 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

蒙古旱獺(通稱土撥鼠):發展全面保育方案

Mongolian Marmot: Developing an All-round Protective Plan

保育基金資助了蒙古保育研究與教育中心,在 三個主要地區,包括 Yamaat Bulag、Hiidiin Tuuri 及 Bumban Uhaa,展開綜合科學研究及

均溫度對棲息地是否適合最為重要。團隊並利 用土地數據來評估棲息地質素,發現當地和國 家保護區的棲息地質素較佳。

研究團隊還在當地隨機抽取了五十個家庭、合 共一百九十九人進行調查,了解他們對土地利 用和即將簽訂的蒙古旱獺保育協議的認識及看 法,大多數均持正面回覆。

這個研究項目促成了 Enger Shand Bag 及 Sumber Bag 的保護區成立。保護區總面積約十五萬公頃,受到喬巴山市自治政府二零二零年第二號決議的監管。此外,項目向當地社群介紹蒙古旱獺保育協議時,亦找到一些牧民家庭表示願意協助執行保護工作。團隊編制了有關蒙古旱獺的保育手冊,並為一百三十多人提供培訓,為恢復蒙古旱獺種群創造了美好前景。

OPCFHK funded the Conservation Research and Education Center in Mongolia to carry out a comprehensive scientific research and community awareness campaign for the Mongolian marmot in three primary areas –



Yamaat Bulag, Hiidiin Tuuri and Bumban Uhaa. The research team identified a limited number of marmots and burrows through a combination of methods – line transects, point counts, drones and UAV imaging techniques. They found that marmot distribution had decreased 99.99% since 1990.

The researchers used the environmental data from the three survey sites to create a marmot distribution model that they could use to predict habitat suitability across different land types. Through their analysis, the team

discovered that the annual mean temperature contributed the most to habitat suitability. Land data was used to assess habitat quality, and the habitat quality in local and national protected areas were found to be high.

The research team also conducted a survey among 199 individuals from 50 randomly selected households about their understanding and opinions on land use and the upcoming marmot conservation agreement. The majority of responses were favourable.

This project facilitated the creation of Local Protected Areas (LPA) in Enger Shand Bag and Sumber Bag. Together, these areas total around 150,000 hectares and are protected under the Self Governing Body of Choibalsan Soum's Resolution #2 of 2020. The project also identified herder households that were interested in protecting the LPA when they introduced the marmot conservation agreement to the local community. The team developed a handbook related to marmot conservation and more than 130 people received training. All these efforts created a positive prospect for the recovery of the Mongolian marmot population.

學名 Scientific Name	Marmota sibirica
概要 Overview	蒙古草原上群居的一種瀕危嚙齒目動物,其開挖的地洞對其他草原動物而言是十分重要的棲息之所。蒙古旱獺是當地十分受歡迎 的重要食材,在夏季末其體型最大時經常被捕獵。 An endangered rodent species that lives as a group on the grasslands of Mongolia. The burrows they make are an important habitat for other grassland species. Marmots are an important ingredient in many popular, local dishes and are frequently hunted when they are at their heaviest in late summer.
保育狀況	瀕危 *
Conservation Status	Endangered*
估計數量	持續減少;自 1990 年起,數量已下跌了 99.99%
Estimated Population	Decreasing; since 1990, the population has dropped 99.99%
棲息地類型	灌木地及草原
Type of Habitat	Shrubland and grassland
主要威脅	由於挖礦及過度放牧導致棲息地喪失;作為皮毛素材和食材被人類捕獵
Major Threats	Loss of habitat due to mining and overgrazing, as well as poaching for fur and meat

^{*} 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

淡水蟹:透過記錄種群開展保育工作

Freshwater Crabs: Documenting Populations for Conservation

中國內地淡水蟹物種數量為全球最高,不過目前科學家對其了解不多。雖然研究團隊至今已在雲南辨別出涉及十七屬的逾六十種淡水蟹,卻對其生態與分布所知甚少,特別是在偏遠地區的物種,掌握到的資訊更貧乏。淡水蟹不但是生態系統的指標物種,反映生境的潔淨與健康,也是食物網中的重要一環。現時淡水蟹面臨三大威脅,包括人類干擾、環境污染與棲息地退化流失,而其中七成威脅均來自人類干擾。



保育基金資助南京師範大學研究團隊展開調查,了解雲南淡水蟹的生物多樣性與棲息地,以蒐集最新資料,助世界自然保護聯盟在瀕危物種紅色名錄中更新相關淡水蟹種群的保育狀況。研究團隊透過徒手採樣、抄網或地籠法,在三十二個地區採集得三十個淡水蟹樣本,包括兩個新發現品種,並將有關發現編撰成論文,於二零二零年十月在同行評議的期刊上發表。此外,研究團隊還在雲南西部錄得一個首次在中國發現的淡水蟹品種,再將之連同各項發現,一併提交予世界自然保護聯盟。



Mainland China is home to more species of freshwater crabs than any other country in the world, but scientists still have much to learn about them. In Yunnan, researchers have identified more than 60 species across 17 genera so far, yet much about their ecology and distribution remain unknown, especially in remote areas. In addition to serving as indicators of their ecosystem's pristineness and health, these crabs are an important part of the food web. Currently, the top three threats they face are human disturbances, pollution, and habitat degradation and loss, with human disturbances representing an overwhelming 70% of the threats.

OPCFHK funded a research project conducted by researchers from Nanjing Normal University to survey Yunnan's freshwater crab biodiversity and habitats. The survey results will provide updated information for each species for IUCN Red List classification. The research team sampled crabs through physical searches, netting and trapping at 32 locations and identified 30 species, including two newly discovered species. Detailed descriptions of the new species were published as a paper in a peer-reviewed journal in October 2020. The team also found a crab species in West Yunnan that was confirmed as a first record for China. After the findings were compiled, the research team presented their evidence to the IUCN.

雲南淡水蟹最新保育狀況 Latest Conservation Status of Freshwater Crabs in Yunnan

2 個品種 - 瀕危 * species - Endangered*

(*根據世界自然保護聯盟瀕危物種紅色名錄準則進行的初步評估。 目前大部分淡水蟹僅獲標註為數據缺乏,或未被列入世界自然保護聯盟瀕危物種紅色名錄)

目前 133 個雲南省自然保護區中,僅 1 個將 無脊椎動物列為受保護對象

在30個淡水蟹棲息地中,14個未被列入保護區

4 個品種 - 易危 * species - Vulnerable*

(*Preliminary assessment based on IUCN Red List of Threatened Species criteria. Currently most of these crab species are either classified as Data Deficient or have no IUCN classification.)

Only 1 out of 133 Nature Reserves in Yunnan currently safeguards invertebrates

Habitats of **14 out of 30** crab species identified as unprotected

調查發現雲南目前僅有一個保護區保育無脊椎動物, 而且並非針對淡水蟹,可見當地淡水蟹保育工作大 有改善空間。幸而由於中國內地政府推出易地搬遷 措施,助居民由山區遷往城鎮,減少了當地人與淡 水蟹之間爭取水資源的衝突。與此同時,研究團隊 特別製作了不同的科普教材和影片,分發予自然保 護區職員和鄰近社區,助當地居民了解淡水蟹的特 徵和重要的生態角色。 The survey found that Yunnan's protection for freshwater crabs had much room for improvement. Currently, only one protected area safeguards invertebrates, but not specifically freshwater crabs. Fortuitously, due to the implementation of village-to-city translocation policies, the Mainland government has helped reduce conflicts over water resources between humans and crabs. During the project period, the research team also compiled various educational documents and videos on the importance and identification of freshwater crabs for Nature Reserve staff and the surrounding communities.

斑鱉:守護全球最珍稀的龜類

Swinhoe's Softshell Turtle: Preserving the Rarest Turtle in the World



斑鱉現被視為全球最稀有的龜類,多年來一直是保育界重點守護的物種。在上世紀七十至九十年代,斑鱉遭到人類大規模獵殺捕食,導致數量驟跌至極度瀕危水平,更一度被認為已幾近在野外滅絕。直至二零零七年,研究團隊才在越南河內東莫湖發現一隻斑鱉,另一隻則再相隔十年後,才在宣漢湖被發現。

保育基金由二零一八起開始資助 Indo-Myanmar Conservation (IMC) 的 Asian Turtle Program(ATP),推行斑鱉保育, 該計劃自二零零三年起一直在越南北部 二十一個省府進行普查。二零二零年八月 二十日,ATP 的研究員成功拍下令人振奮 的一幕,顯示兩隻巨型鱉類同時自東莫湖 冒出水面,成為越南可能存在第三隻斑鱉 的首項實質證據。連同中國內地的一隻計 算在內,有關發現將令斑鱉的整體數量上 升至四隻。目前研究團隊正致力確認新發現 的鱉類是否斑鱉,以及透過電泳分析基因 以判別其性別。暫時顯示新發現的鱉類屬雄 性,但有關結果還須通過其他測試反覆查 證。隨著研究推展,保育界希望可以更了解 斑鱉,並逆轉其瀕危命運,恢復種群數量。

Conservationists have striven to protect the Swinhoe's softshell turtle, believed to be the world's rarest, after its population fell to a dangerously critical number due to large-scale human predation for food from the 1970s to 1990s. The turtle species was believed to be almost extinct in the wild until 2007, when one turtle was identified in Dong Mo Lake near Hanoi, Vietnam. Ten years later, a second turtle was confirmed in Xuan Khanh Lake.

A team from Indo-Myanmar Conservation's Asian Turtle Program (ATP/IMC) has surveyed 21 provinces in northern Vietnam since 2003. In 2018, OPCFHK began to provide funding to ATP/IMC to support conservation efforts for the turtle species. In exciting news, on 20 August 2020, one of their researchers photographed two enormous softshell turtles simultaneously emerging in Dong Mo Lake. This was the first evidence of a possible third Swinhoe's softshell turtle in Vietnam, potentially raising the species' population to four, including the one in Mainland China. In addition to seeking species confirmation of this fourth individual, the research team has been working to identify the sex of

the turtles based on DNA using electrophoresis analysis. So far, the preliminary results have indicated that the known Dong Mo turtle is male. The team is seeking further corroboration with other tests. Hopefully, as time goes on, conservationists will learn more about these endangered animals and find a way to restore their population.



學名 Scientific Name	Rafetus swinhoei
概要 Overview	相信是全球最珍稀的大型龜鱉,體重可達 150 公斤或以上,目前已知活體僅有 3 隻,尚有 1 隻有待考證 Reaching up to 150kg or more in size, this enormous turtle is believed to be the world's rarest, with only 3 confirmed living individuals and 1 undergoing verification
保育狀況	極度瀕危 *
Conservation Status	Critically Endangered*
估計數量	3 隻(2 隻在越南,1 隻在中國內地)
Estimated Population	3 (2 in Vietnam and 1 in Mainland China)
棲息地類型	內陸濕地
Type of Habitat	Wetlands (inland)
主要威脅	人類濫捕成年斑鱉及採集斑鱉的蛋食用;以及棲息地流失等問題
Major Threats	Exploitation of adults and eggs for consumption as well as habitat loss

^{*} 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

雪豹:識別及保護中國內地關鍵棲息地

Snow Leopard: Identifying and Protecting Key Habitats in Mainland China



全球百分之六十的雪豹棲息於中國內地,主要分布在三江源一帶。三江源位處青藏高原,擁有豐富的水資源,為雪豹提供理想環境,以培育密度較高的種群。當地連接四川西部與西藏東部,可能是世上最大的雪豹棲息地與周邊區域雪豹的重要種源地,一度被列為重點景觀保護單元。

保育基金資助北京大學及山水自然保護中心推行 大型研究,以實地考察的方式,深入調查雪豹於 三江源的棲息地與所面臨的威脅。目前資料收集 的工作在持續進行,不過研究團隊已空前成功地 收集到三江源區域內上千個雪豹分布點資訊。是 次研究還能成功確定雪豹的核心棲息地和潛在走 次研究還能成功確定雪豹的核心棲息地和潛在走 廊,以及亞種群之間的遺傳關係。團隊更調查 氣候變化對該區造成的影響,而各項調查結果都 印證了三江源是重要的保育區。

研究團隊至今已發表三篇論文和一本科普專著,並向地方政府提交建議,分享相關研究成果。由於三江源鄰近人類發展區域,保育工作的成敗很大程度上取決於社會的支持、公眾教育與參與度,因此研究團隊廣泛推行各種宣傳工作,並鼓勵社區參與,務求令保育計劃得以順利推行。

Mainland China is home to 60% of the world's snow leopard population. Sanjiangyuan specifically, located high on the Tibetan Plateau with abundant water resources, supports dense snow leopard populations and a high-quality habitat. Connecting West Sichuan and East Tibet, this area may be the world's largest snow leopard habitat and has previously been identified as an important landscape conservation unit. The Sanjiangyuan population may even be the source population of neighbouring subpopulations.

OPCFHK has sponsored a large-scale research study conducted by Peking University and the Shan Shui Conservation Center that carried out comprehensive field studies to provide a better understanding of the habitat and the threats faced by snow leopards in Sanjiangyuan. To date, the research team has managed to collect an unprecedented 1,000 snow leopard distribution data points from Sanjiangyuan, with data collection still underway. Additionally, their research has identified the species' core habitat, potential movement corridors and genetic relationship between subpopulations. The team has also researched the effects of climate change on the area. Their results confirmed Sanjiangyuan as a crucial zone for protection.

So far, the research team has published three papers and a monograph, and shared its recommendations with the local government. Because

of the reserve's close proximity to human development, successful conservation efforts will rely heavily on the readiness of community support, education and engagement. Therefore, an extensive public awareness campaign and community involvement are also vital to put the recommendations of this ongoing study in place.

守護生態平衡的捕獵者 Predators Preserve the Balance

雪豹是高山地帶生態的頂級捕食者, 捕食獵物時有助控制獵物種群的數量, 維持該區生態平衡。

Snow leopards are the top predators in the high mountains. By controlling prey populations, they help maintain the balance of the region's ecosystem.

社區參與及培訓成果 Local Community Engagement and Capacity Building Efforts

5 間當地機構參與 local organisations engaged

50+

名居民受訓成為野生生態 監察員

community members trained as wildlife monitors

篇社交媒體帖文獲 發布 social media posts published

學名 Scientific Name	Panthera uncia
概要 Overview	雪豹棲息於中亞高山地帶,環境偏遠險峻,蹤跡難以發現,但目前已知其數量正在減少 Snow leopards are hard to observe in the wild, not only due to their elusiveness but also because they live in very tough habitats within Central Asia's high mountain ranges. The species population is sadly in decline.
保育狀況 Conservation Status	易危 * Vulnerable*
估計數量 Estimated Population	<8,000
棲息地類型 Type of Habitat	森林、灌叢、草地及山石區 Forest, shrubland, grassland and rocky areas
主要威脅 Major Threats	人獸衝突(包括偷獵、報復式獵殺、非法貿易、人為因素引致棲息地流失及破碎化);以及因為氣候變化而令其獵物減少 Human-wildlife conflict, including poaching, retaliatory killing, illegal trade, habitat loss and fragmentation, as well as prey depletion due to climate change

^{*} 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

印尼婆羅洲保育項目:建立社區苗圃以復修棲息地

Indonesian Borneo Protection Project: Developing Local Community Nurseries to Restore Habitats



消失中的森林 The Disappearing Forest

印尼森林是世界上森林流失得最快的地方,據估計,在 1973 年至 2015 年間,印尼婆羅洲合共有 144,000 平方公里的原始森林消失,主要原因是由抽乾泥炭地而引起的森林火災,其他原因還包括開墾耕地及伐木。

Indonesia's rate of forest loss ranks among the highest in the world. Researchers estimate that between 1973 and 2015, Indonesian Borneo lost a total of 144,000 km² of old-growth forest. Forest fires from peat drainage are one of the primary causes for this loss, along with plantation establishment and timber harvesting.

Sebangau 國家公園佔地約五千七百平方公里,蘊藏世上其中一個最重要的泥炭沼澤森林,於二零零四年獲劃定為保護區。公園同時是極度瀕危物種婆羅洲猩猩 (Pongo pygmaeus) 及婆羅洲白鬚長臂猿 (Hylobates albibarbis) 的家園,其中園內的婆羅洲猩猩種群更是世上最大的受保護種群。自二零一九年以來,保育基金一直支持 Borneo Nature Foundation (BNF) 的保育工作,以復修及保護公園生態環境。

Sebangau 國家公園是地球重要碳庫,擁有豐富的生物多樣性及自然資源,因此必須妥善民護。可是,這片泥炭沼澤森林及其物種正面臨火災、非法伐木、泥炭地乾涸及非法捕獵的嚴重威脅。在二零二零至二零二一年度,BNF建造了社區苗圃,以拓展修復識長息地的工作。這些苗圃有助當地居民認識保息地的工作。這些苗圃有助當地居民認識保護天然資源的重要性,加強他們與家園環境的連繫,並讓他們學習到如何保護及復修當地生態系統。此外,這計劃還幫助當地社區以有助生物多樣性發展的方式,開發未充分利用的土地,提供就業機會給居民。

Measuring about 5,700 km², Sebangau National Park contains one of the world's most important peat-swamp forests and was designated as a protected area in 2004. Within this forest are the largest protected populations of critically endangered Bornean orangutans (*Pongo pygmaeus*) and Bornean white-bearded gibbons (*Hylobates albibarbis*). Since 2019, OPCFHK has supported the Borneo Nature Foundation (BNF) in their conservation efforts to restore and protect the park.

While priority should be given to conserving Sebangau National Park because it is a globally significant carbon store and a source of biodiversity and natural resources, the peat-swamp forest and its inhabitants face serious risks from fire, illegal logging, peatland drainage and hunting. In 2020/21, BNF established community seedling nurseries to augment the habitat restoration efforts. These nurseries help local families learn about the importance of conserving their region's

natural resources, enhance their connection to their environment, and offer opportunities to develop the skills and capacity they need to protect and restore this vital part of their local ecosystem. They also empower local communities to develop underutilised land in ways that promote biodiversity and create occupational opportunities for locals.



令人鼓舞的成果

Encouraging Results

- 42 個家庭營運 6 個社區苗圃
 6 community nurseries operated by 42 familiess
- 50 公頃的土地復修成森林, 種植了 48,902 株樹苗
 50 ha area reforested with 48,902 seedlings
- 於 2020 年 6 月至 10 月期間, 打理苗圃的家庭全年收入增加了33% — 35% (71至75美元)
 33% – 35% (US\$71 – US\$75) annual income increase for nursery families between June and October 2020
- 產生了 45,000+ 美元的環保經濟收益 U\$\$ 45,000+ total green economy value generated
- 建造了**1個魚塘**,以進行水產養殖試 驗計劃
 - **1 fishpond** created for an aquaculture trial programme

反偷獵項目:保護馬來西亞及尼泊爾的瀕危物種及其棲息地

Anti-Poaching Projects: Protecting Endangered Species and Their Habitats in Malaysia and Nepal

在馬來西亞及尼泊爾,生物多樣性的保育工作主要面臨 偷獵及非法貿易這兩大威脅。在二零二零至二零二一年 度,保育基金資助了兩個團隊應對這些問題,保護當地 的野生動植物。

馬來西亞婆羅洲沙巴的德拉馬科特森林保護區 項目

(SMART)作為輔助。目前,該項目已開始建構一個偷獵者檔案資料庫,與政府及其他非政府組織共享情報。研究團隊的目標是在二零二二年七月前,能夠偵測到該地區至少百分之四十的活

躍入侵行為,而最終目標是在二零二四年七月前,能夠 將偵測率提高到百分之九十或以上。





The primary threats to biodiversity conservation in Malaysia and Nepal are poaching and illegal trade. In 2020/21, OPCFHK funded two teams to protect the natural fauna and flora to combat these issues.

The Deramakot Forest Complex Project in Sabah, Malaysian Borneo

In Malaysian Borneo, some of Sabah's best remaining dipterocarp forests can be found in the Deramakot Forest Complex, supporting a wide range of mammal species. However, poachers from both local communities and neighbouring countries are threatening these habitats and their inhabitants. To understand and disrupt poaching operations, the project's research team has been working closely with Protect, the specialised anti-poaching unit of the Sabah Forestry Department, to support sites patrols and monitoring of poaching entry points via observation posts. These patrols and observations efforts were assisted by the use of Spatial Monitoring and Reporting Tool (SMART). The project has begun developing a poacher profile database that will enable them to share their intelligence with the government and other non-governmental organisations. The team is targeting to detect at least 40% of

active incursions in the area by July 2022, with the ultimate goal of raising the rate to 90% or better by July 2024.

尼泊爾卡他生態走廊項目

位於尼泊爾西南部的卡他生態走廊是老虎、犀牛、恆河鱷、 海豚及許多珍貴物種的棲息地,但由於來自當地及周邊社

區的偷獵威脅,令這些物種的數 量減少。此項目鼓勵當地青年參 與保護瀕危物種及其棲息地的工 作,竭力降低卡他生態走廊內及 周邊的偷獵威脅。研究團隊透過 動員及培訓當地青年,協助巡邏 及提供常規的流動支援,包括乘 坐單車進行巡邏等,以支援當地 社區的反偷獵網絡(CBAPU)工 作。此外, 團隊還設置了攝影器 材,並利用全球定位系統、手機 及巡邏日誌來收集資料,記錄當 地生態特徵、出現的物種及人類 活動,藉以建立資料庫協助執法。 在項目進行期間, 團隊發現偷獵 問題極大可能會因居民有其他工 作機會而減少。展望未來,項目 團隊將進行一項先導活動,希望

找出偷獵以外的其他潛在工作機會,並提供支援,助青年 維持生計。





The Khata Biological Corridor Project in Nepal

This project in southwestern Nepal engages local youths to help conserve endangered wildlife species and their habitats, and to

minimise the threat of poaching in and around the Khata biological corridor, which is home to tigers, rhinoceroses, gharial crocodiles, dolphins and other valuable species. The populations of these species are declining due to poaching by the surrounding communities. The research team supported the local community-based anti-poaching network (CBAPU) by mobilising and training local youth to help patrol and providing regular mobility support, including bicycle patrols. The team also set up a camera and used GPS, mobile phones and a patrolling logbook to gather information and record habitat features, species encountered and anthropogenic activities, in order to help build a database to facilitate law enforcement. During the project, the team identified a strong possibility that providing alternative income opportunities for locals might help alleviate poaching. In the future, the

project will identify and execute support for potential alternative livelihoods for youths as a pilot activity.

海洋生物擱淺行動組:了解香港水域內鯨豚擱淺的死亡個案

Marine Life Stranding Response Team: Understanding Cetacean Stranding Deaths in Hong Kong Waters



於二零二零至二零二一年度,海洋生物擱淺行動組共處理五十一宗鯨豚擱淺個案,數字之高令人擔憂。行動組透過調查擱淺現場,以及在海洋公園獸醫的專業支援下進行解剖,致力辨識不同擱淺個案的死因。以下為行動組去年調查過的其中三宗個案。

In 2020/21, the Marine Life Stranding Response Team responded to 51 cases of cetacean stranding, a worrisomely high number. By examining the stranding sites and conducting necropsies with the support of Ocean Park's veterinary experts, the Team strove to identify the cause of death of various cases. Below are three of the cases investigated by the Team during this past year.

擱淺個案一:腦出血的侏儒抹香鯨

Stranding Case 1: A Dwarf Sperm Whale with Brain Bleeding

於二零二一年六月十七日,在大浪灣東有人報告有一條尚存活的侏儒抹香鯨 (Kogia sima) 擱淺,可惜其後在初步檢查時已證實死亡。解剖結果發現牠的 腦部右半球顱內出血,原因為被船隻撞擊。

A live dwarf sperm whale (Kogia sima) was reported in Tai Long Wan East on 17 June 2021. However, it was confirmed dead upon the veterinarian's preliminary examination. The necropsy discovered an intracranial haemorrhage in the right hemisphere from a boat crash.



擱淺個案二:死因不明的熱帶斑海豚

Stranding Case 2: A Pantropical Spotted Dolphin with Unknown Cause of Death

於二零二一年六月十九日,在汀九灣泳灘發現一條活體熱帶斑海豚。可惜,由 於海豚的狀況太差,在獲救後不久便宣告死亡。雖然牠的死因未明,但在牠的 鯨脂層發現多種寄生蟲。

On 19 June 2021, a live pantropical spotted dolphin was found in Ting Kau Beach. Unfortunately, the dolphin was in so poor a condition that it died soon after rescue. While the cause of death is unknown, multiple parasites were found within the layers of blubber.



擱淺個案三:肺部受感染的江豚

Stranding Case 3: A Finless Porpoise with Lung Infections

一條幼年江豚的屍體在清水灣被發現,解剖過程未有發現明顯傷口,但其肺部 則受寄生蟲嚴重感染。

The necropsy of a finless porpoise calf found in Clearwater Bay revealed no obvious wounds, but did identify a serious parasitic infection in the lungs.



香港瘰螈:提防兩棲類傳染病爆發

Hong Kong Newt: Avoiding an Amphibian Pandemic



Batrachochytrium salamandrivorans (Bsal) 真菌病原體是兩棲類壺菌感染症的源頭之一。這種由真菌引起的病症導致全球的兩棲類生物多樣性下降,其中 Bsal 在多種蠑螈種群中均屬高度致命。香港瘰螈是香港唯一一種原生蠑螈,這種病原體一旦入侵,很可能會造成種群劇降甚至滅絕。因此有需要主動監測 Bsal 在香港的出現情況,以保護本地蠑螈及其他物種。

保育基金向一支由香港大學帶領的聯合研究 團隊提供資助,評估 Bsal 在香港瘰螈及其他 二十九種兩棲類身上出現的情況。研究團隊測 試了超過四百四十個皮膚拭子樣本,其中百分 之六十六點三的樣本屬於香港瘰螈;百分之 十八點三來自另外十五種本地兩棲類物種,並 有百分之十五點四來自寵物市場的十六種兩棲 類物種。

結果發現,只有來自三個本地兩棲類物種的七個樣本對 Bsal 呈陽性反應,表示這種病原體的整體盛行率非常低,其他二十七種兩棲類的樣本均未檢測出 Bsal。雖然目前本地兩棲類種群並未受到進一步威脅,但仍然需要進行更多研究及長期監測,來監控 Bsal 對香港瘰螈種群的影響,以保護本地的生物多樣性。

The Batrachochytrium salamandrivorans (Bsal) fungal pathogen is one cause of Chytridiomycosis, a fungal disease that has driven a global decline in amphibian diversity. It is especially deadly to many salamander populations. As the only species of salamander found locally, the Hong Kong newt is vulnerable to local population collapse and extinction from this pathogen. Therefore, it is critical to proactively monitor the presence of Bsal in Hong Kong to protect the newts and other species.

OPCFHK funded a joint research team led by the University of Hong Kong to assess the current presence of Bsal in the Hong Kong newt and 29 other species of amphibians. The research team tested more than 440 skin swab samples – 66.3% from local Hong Kong newts; 18.3% from 15 other native amphibian species, and 15.4% from 16 species found in the pet market.



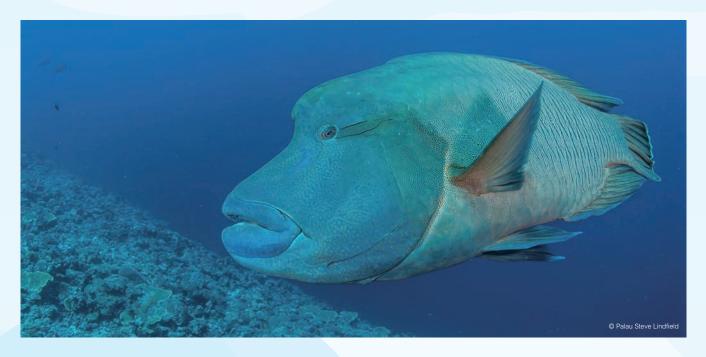
Only seven samples from three local amphibian species tested positive for Bsal, indicating a very low overall prevalence. None of the samples from the other 27 amphibian species tested positive. While it is good to learn that the amphibian population is currently not further at risk, more research and long-term monitoring are needed to monitor Bsal's impact on the Hong Kong newt populations and protect the region's biodiversity.

<u></u>	
學名 Scientific Name	Paramesotriton hongkongensis
概要 Overview	香港唯一一種帶尾的兩棲類原生物種,曾被認為屬香港獨有,但其後在廣東省亦發現其蹤跡 Hong Kong's only native tailed amphibian was once believed to be one of the region's endemic species, but has since also been found in Guangdong Province
保育狀況 Conservation Status	近危* Near Threatened*
估計數量 Estimated Population	持續減少 Decreasing
棲息地類型 Type of Habitat	淡水(內陸) Freshwater (inland)
主要威脅 Major Threats	棲息地喪失及受污染,寵物貿易,以及真菌病原體 Bsal 的出現,對香港瘰螈以至全球兩棲類動物的生存均構成潛在威脅 Habitat loss and pollution, the pet trade and an emerging fungal pathogen, Bsal, pose potential risks to the survival of not only this species but also all global amphibians

* 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

蘇眉:以新科技保育瀕危物種

Humphead Wrasse: Devising New Technology to Preserve an Endangered Population



急需打擊非法貿易的工具

蘇眉在香港屬受保護物種,食肆必須申領管有許可證,才能在指定時段按限額管有及售賣蘇眉。然而,每年市場錄得的蘇眉買證號,往往高於許可證指明的上限,足視蘇眉場別問題存在。事實上,中菜一直視蘇眉獨多饈,向來不乏饕客支持,在市場上有價外,豐厚利潤促成非法貿易,對本地及海外種群帶來威脅,而且公眾目前並無可靠辦別所買的蘇眉是否來自合法產源。

Better Tools Are Needed to Discourage Illegal Trade

The humphead wrasse is protected in Hong Kong – only licensed shops are allowed to hold and sell a restricted number of wrasse at a given time. However, the number of humphead wrasse sold each year is more than the legal number, a strong indicator of illegal trade. Humphead wrasse is considered to be a delicacy and popular in Chinese cuisine. They are sold at a high retail price, making illegal trade lucrative enough to be a threat to their local and non-local populations. Unfortunately, the general public currently has no reliable way to tell whether the fish they are consuming come from a legally licensed source.

為甚麼蘇眉的保育工作如此重要?

Why Is Humphead Wrasse Conservation Important?

蘇眉是珊瑚礁生態的重要守護者之一,因為牠們最愛捕食棘冠海星。沒有蘇眉的存在,棘冠海星的數量會激增和過分侵 蝕珊瑚,繼而令珊瑚生長失衡,危害珊瑚礁的結構。

Humphead wrasse play an important role in coral reefs, which are home to many marine species. Without their presence, the crown-of-thorns starfish – their favourite meal – can grow out of control, leading to a disparity of coral growth and bioerosion that endangers the reef's structures.

借助人工智能技術保護蘇眉

二零二一年三月,保育基金開始資助一項有關臉部辨識系統的研究,透過人工智能技術識別不同蘇眉的臉孔,讓用家得以辨別本地市場上出售的蘇眉是否經由合法途徑進口,以加強執行《瀕危野生動植物種國際貿易公約》(CITES),打擊非法蘇眉貿易。

化創意理論為實質行動

研究團隊研發出能成功辨認不同蘇眉的臉部特色的識別系統,準確率達百分之九十六二四。有關應用程式的原型已經提交漁農自然護理署(漁護署),公眾亦可透過 Google Play 商店及蘋果 App Store 下載。用家只要輸入商店資料及上載蘇眉照片,應用程式與會自動比對數據庫資料,查找相應的記母,讓公眾得以確認所購買的蘇眉是否經由完計,並透過應用程式舉報可疑個案。每一張上載相片都有助研究團隊及漁護署構建數據庫,而用家的意見,亦有助優化數據庫和應用程式。

Utilising the Power of Artificial Intelligence

In March 2021, OPCFHK began funding a computer-aided facial recognition project that employed artificial intelligence (AI) technology to combat the illegal trade of humphead wrasse. As a novel solution to improve enforcement of the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), computer-aided facial recognition can help users distinguish between legally and illegally imported humphead wrasse at Hong Kong's local seafood markets.

Putting the Theory into Practice

The research team developed identification models that could match individual humphead wrasse based on their facial markings, from which a trained model with a high accuracy of 96.4% was developed. The team then developed a prototype app for the Agriculture, Fisheries and Conservation Department (AFCD) and the general public, which is currently available on the Google Play Store and Apple App Store. This app allows users to input shop information and humphead wrasse photos, then matches the most likely humphead wrasse from the database. This empowers the pubic to confirm that the fish they are buying are from legal sources, and to report suspicious sales via the app. Every new photo added to the app will assist the team and AFCD in building a robust database. In the future, both the database and the app will continue to undergo optimisation based on user feedback.

學名 Scientific Name	Cheilinus undulatus
概要	在香港售賣蘇眉必須申領許可證,而且只能按許可證指明限額管有物種,不過市面出售的蘇眉數量卻不只於此,足證非法貿易問題存在
Overview	Hong Kong only allows limited, licensed sales of humphead wrasse, but sales discrepancies indicate that illegal trade most likely is occurring
保育狀況	瀕危 *
Conservation Status	Endangered*
估計數量	持續減少
Estimated Population	Decreasing
棲息地類型	淺海帶
Type of Habitat	Marine neritic
主要威脅	非法食物貿易
Major Threats	Illegal food trade

* 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

你也可以出一分力! You Can Help!



立即掃描二維碼,下載應用程式,識別蘇眉是否合法進口,一起以行動對抗非法貿易,守護瀕危物種。

Scan this code to download the app now, and use it to verify the source of the humphead wrasse you consume. Let's work together to combat the illegal trade of threatened species.





IOS

Android

眼斑水龜:透過原地及遷地保育來保護野生種群

Beale's Eyed Turtle: Preserving Wild Populations Through In-situ and Ex-situ Efforts



「眼斑|

"Eye Spots"

要辨認出眼斑水龜,你可以留意牠們的頭 頸連接處是否長有「眼斑」。年幼及雌性 龜隻的眼斑為黃色,而成年雄性龜隻的眼 斑則為紅色。

You can recognise a Beale's eyed turtle by its "eye spots" (ocelli) – yellow in juveniles and females, red in adult males – at the junction of its head and neck.

瀕危的香港原生龜隻品種

香港五種原生淡水龜目前均受到嚴重威脅, 眼斑水龜是其中之一。根據 Turtle Taxonomy Working Group 的資料,截至二零一七年,超過 百分之八十的亞洲龜類物種已被列為易危等級。 在香港,由於棲息地受到破壞,加上非法寵物買 賣及傳統藥材貿易等因素,令原生淡水龜的數量 及分布大幅減少。根據一項最新研究指出,目前 香港野生眼斑水龜的數量寥寥可數。

Hong Kong's Imperilled Residents

The Beale's eyed turtle is one of five freshwater turtle species that is native to Hong Kong, all of which are currently facing significant threats to their survival. According to the Turtle Taxonomy Working Group, the conservation status for more than 80% of Asia's turtle species has been listed as threatened as of 2017. Habitat loss and the illegal pet and traditional medicine trades have caused the population and distribution of Hong Kong's native freshwater turtles to shrink dramatically over time. As of the most recent survey, only a very few wild populations of Beale's eyed turtles remain.



同心合力扭轉種群下降趨勢

多年以來,保育基金一直支持不同研究項目, 採用不同方法保護眼斑水龜,當中包括遺傳分 析、種群作圖、空間生態研究,以及積極監察 非法誘捕及貿易活動。二零一九年,保育基金 資助嶺南大學的研究團隊,評估穩定同位素分 析在幫助檢控非法龜類貿易的成效,並收集重 要的環境和空間生態數據,以及透過資料調研, 了解淡水龜充公的資訊,藉以更有效地保護香 港本土的淡水龜種群。保育基金並自二零一八 年起,與海洋公園及香港兩棲及爬行動物保育 基金合作,進行一項遷地保育計劃,利用人工 繁殖及放歸自然來協助恢復日益減少的野生種 群。二零二零年,透過各個團隊同心協力,已 經成功令計劃中的眼斑水龜的數量增加。這些 從早階段累積的數據及資料將用於完善計劃, 提高龜類繁殖、幼龜護理及未來將龜隻放歸自 然的工作成效。

Working Together to Reverse the Decline

For years, OPCFHK has supported projects to study and protect Beale's eyed turtles through various methods. These include genetic analysis, population mapping, studying their spatial ecology and proactively monitoring illegal trapping and trade activities. In 2019, OPCFHK supported a Lingnan University research team to evaluate stable isotope analysis efficacy in illegal turtle trade prosecutions, collect vital turtle habitat and spatial ecology data, and investigate turtle seizure information through desktop research. The results from the project helped improve the protections on Hong Kong's local turtle populations. Since 2018, OPCFHK has been working with Ocean Park and the Hong Kong Society of Herpetology Foundation on an ex-situ conservation programme that would use captive breeding and reintroduction to help restore the diminishing wild populations. In 2020, through the combined efforts of each team, the programme successfully increased its population under human care. The data and knowledge from these early successes will be used to improve the programme's effectiveness in turtle breeding, juvenile care and future turtle reintroductions.

偷獵及棲息地流失

Poaching and Habitat Loss

由於棲息地流失及非法貿易,中國及東南亞許多野生龜類種群已經消失。眼斑水龜在寵物市場中頗受歡迎,其瀕危狀況令其顯得尤為珍稀,因此推高了龜隻價格,成為偷捕及非法販賣野生眼斑水龜的誘因。此外,污染、渠道工程、土地開發及人為干擾亦令牠們的原始河流棲息地消失,持續對這物種構成威脅。

Many wild turtle populations in China and Southeast Asia have vanished due to habitat loss and the illegal wildlife trade. The Beale's eyed turtle has gained a place in the pet trade, and its endangered status has driven up the price per turtle, leading many to be illegally caught in the wild to sell. Additionally, the loss of their pristine riverine habitat due to pollution, channelisation, development and human disturbances remains a threat to the species.



學名 Scientific Name	Sacalia bealei
概要	眼斑水龜屬於香港五種原生淡水龜的其中之一,現存數量不多
Overview	One of five species of freshwater turtles native to Hong Kong, only a few populations of Beale's eyed turtles remain
保育狀況	瀕危 *
Conservation Status	Endangered*
估計數量	未能確定,正持續減少
Estimated Population	Unspecified, with a decreasing trend
棲息地類型	淡水(內陸水域)
Type of Habitat	Freshwater (inland waters)
主要威脅	棲息地被破壞及污染 [,] 過度捕獵以用作藥材或寵物買賣
Major Threats	Habitat destruction, pollution and unsustainable exploitation for the traditional medicine and pet trades

^{*} 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species

馬蹄蟹種群普查、市場及公眾意識調查:了解香港別具生態價值的瀕危物種

Horseshoe Crab Population, Market and Public Awareness Survey: Understanding Hong Kong's Valuable and Vulnerable Neighbours

活化石

馬蹄蟹早在四億七千五百萬年前已存在,比恐龍還要早二億三千萬年在地球上出現,其形態一直以來沒有特別大的改變,對生物學家及保育專家而言均具有特別的科研價值。然而,這種活化石目前正因為人為干擾、污染及棲息地受破壞而面臨滅絕的危機。現時,中國鱟(Tachypleus tridentatus)在世界自然保護聯盟瀕危物種紅色名錄中被列為瀕危物種,而另一品種圓尾鱟(Carcinoscorpius rotundicauda)則在世界自然保護聯盟瀕危物種紅色名錄中被列為「數據缺乏」,需要進行更多研究以深入了解其保育狀況。



種群普查

在二零二零至二零二一年度,保育基金繼續推行馬蹄蟹種群普查。此計劃有兩個目的:調查馬蹄蟹種群在重要育幼地點的數量及分布,以及培育出新一代的分別於二零二零年十二月、二零二一年三月及六月,在下白泥、白泥、水口、東涌灣及沙頭角進行調查,並在所有調查地點均發現到馬蹄蟹,情況令人鼓舞。令人更振奮的是,團隊在東涌灣發現到兩對正在交配的圓尾鱟。

此外,保育基金亦透過大專院校,招募修讀環境科學系的學生成為城市科學家,參與全新推出的培訓計劃。 參與學生到訪各區街市視察及記錄馬蹄蟹售賣情況、 進行種群普查及研討會,並在完成計劃後,記錄及研 究人類活動對馬蹄蟹棲息地及種群的影響。

The Living Fossil

Horseshoe crabs first appeared on Earth about 475 million years ago – about 230 million years before early dinosaurs – and their biology remarkably have not changed significantly since then, making them valuable sources of data for biologists and conservationists. However, today these living fossils face the possibility of extinction due to human disturbances, pollution and habitat destruction. Currently, the Chinese horseshoe crab (*Tachypleus tridentatus*) is listed as endangered on the IUCN Red List of Threatened Species. However, more research is needed to understand the status of the mangrove horseshoe crab (*Carcinoscorpius rotundicauda*), which the IUCN currently lists as "data deficient".

The Population Survey

In 2020/21, OPCFHK continued its Horseshoe Crab Population Survey. This project has two purposes: to update the data on Hong Kong's horseshoe crab population and distribution at important nursing grounds, and to train the next generation of conservationists on the scientific research about this fascinating species. The research team conducted population surveys at Ha Pak Nai, Pak Nai, Shui Hau, Tung Chung Bay and Sha Tau Kok in December 2020, March 2021 and June 2021. Encouragingly, horseshoe crabs were recorded at all of the sites surveyed. Even more exciting, two mating pairs of mangrove horseshoe crabs were discovered in Tung Chung Bay.

OPCFHK reached out to tertiary institutions to recruit students majoring in environmental sciences to become urban scientists and take part in the project's newly developed training programme. Students took part in inspecting and surveying horseshoe crab sales in various markets and districts, and participated in population surveys and seminars. After completing the programme, these young scientists recorded and studied the effects of human activities on horseshoe crab habitats and populations.

2020/21 年度計劃概要 2020/21 Project Summary

- 15 次種群普查 population surveys completed
- 5 個調查地點 locations surveyed
- 38 位大學生獲招募或接受培訓 tertiary students recruited/trained
- 40 個小時培訓 hours of training offered



市場及公眾意識調查

是項計劃在二零一九至二零二零年進行了市場及公眾意識調查,以確認如何從教育著手推廣馬蹄蟹保育,以及了解需要加大力度的範疇。在二零二零至二零五一年度,調查發現許多市民仍然不知道中國鱟正面臨滅絕威脅。雖然調查只發現有兩個街市售賣馬蹄蟹,以及只有百分之十三點五的受訪者表示曾經食用或買賣馬蹄蟹來放生,但污染及棲息地被發展均持續嚴重威脅牠們的生存。有見及此,研究團隊決定重點推行活動,進一步提高公眾意識。

The Market and Public Awareness Survey

The project involved conducting market and public awareness surveys in 2019/20 to identify which educational perspectives should be put in place and areas in which more effort should be made. In 2020/21, the survey found that many members of the public remained unaware that Chinese horseshoe crabs were facing extinction. Although only two markets sold horseshoe crabs, and only 13.5% of respondents said they had consumed any or traded for mercy release, pollution and habitat exploitation continued to pose major threats. This suggests an important direction for further public awareness campaigns.

2020/21 年度調查概要 2020/21 Survey Summary

1,000+ 市民受訪 members of the public interviewed

52.80/ 受訪者不知道中國鱟屬瀕危 * 物種 of respondents were unaware of Chinese horseshoe crabs' endangered* status

13.5% 曾經購買及食用馬蹄蟹 had bought and consumed horseshoe crabs

50十 街市店舗調查 wet market stalls investigated

2 個街市有馬蹄蟹出售 markets recorded as selling horseshoe crabs

* 根據世界自然保護聯盟瀕危物種紅色名錄 According to the IUCN Red List of Threatened Species



保育教育 CONSERVATION EDUCATION

培育年輕一代 創造可持續未來的能力

Empowering the Next Generation To Create a Sustainable Future

未來掌握在年輕一代手中,保育基金深明從小培養保育意識,是開拓蘊藏豐富生物多樣性的可持續發展環境的關鍵。有見及此,保育基金舉辦不同類型的活動,包括實用工作坊、同儕領導研討會、知識分享會,以及為年輕一代提供參與保育研究及調查工作的機會等,旨在教育香港年輕人有關生態與自然保育及守護生物多樣性的重要意義。保育基金為創造更美好將來,更着力培育年輕一代的保育意識,期望啟發年輕一代熱愛、尊重和保護大自然,令保育之火生生不息,照亮光明未來。

The future is in the hands of the next generation. OPCFHK understands that encouraging conservation from a young age is the key to creating a sustainable environment with flourishing biodiversity. That is why OPCFHK is dedicated to educating Hong Kong's youth about the importance of conservation and preserving its natural environment and biodiversity, using a wide range of programmes such as practical workshops, peer leadership seminars, sharing sessions and even conservation research and surveys that provide hands-on experience. OPCFHK is devoted to building a better tomorrow by nurturing the next generation to be more conservation-minded. With every new generation inspired to love, respect and protect nature, conservation will have a truly long-lasting impact on our environment.

環保基金 — 明日之鱟保母育成計劃 培養新一代保育人才

ECF STEAM Juvenile Horseshoe Crab Rearing Programme Inspiring New Generations of Conservationists

保育基金於二零二零年獲環境及自然保育基金撥款資助,與香港城市大學(城大)攜手,將常設的馬蹄蟹保育項目重新設計為「環保基金一明日之鱟保母育成計劃」。是項計劃繼續讓中學生透過親身體驗,學習有關人工繁殖與飼養馬蹄蟹以及保育其自然棲息地的知識,同時廣泛推行社改媒體活動及網上研討會,鼓勵學生分享保育資訊。在二零二零至二零二一年度,「環保基金一明日之鱟保母育成計劃」更推展至小學,進一步向新生代宣揚保育意識。

In 2020, OPCFHK reformed its ongoing horseshoe crab conservation programme, launching the newly revamped ECF STEAM Juvenile Horseshoe Crab Rearing Programme in hands with the Environment and Conservation Fund (ECF) and the City University of Hong Kong (CityU). This programme continues to engage secondary school students by empowering them with knowledge and first-hand experience about breeding and rearing the species, as well as conserving its natural habitat. Students are also encouraged to spread positive messages about conservation and develop comprehensive social media campaigns and online seminars. In 2020/21, the programme was extended to primary schools to increase its outreach even further.



建基於過去努力的成果 A Solid Foundation for Success

「環保基金 — 明日之鱟保母育成計劃」的前身為「馬蹄蟹校園保母計劃」,由保育基金與城大合辦,自二零零九年起推出,以往主要對象為中學生。時至今日,有關項目已見證超過一千七百隻馬蹄蟹獲放歸野外,而許多曾參與計劃的學生在畢業後亦從事環保事業,令保育工作得以延續。

The predecessor of the ECF STEAM Juvenile Horseshoe Crab Rearing Programme, called the Juvenile Horseshoe Crab Rearing Programme, was an initiative jointly launched by OPCFHK and CityU in 2009 that targeted secondary school students. Since then, more than 1,700 horseshoe crabs have been released. Many student participants later go on to graduate and work in environmental fields, which help ensure that this valuable work will continue.

啟發中學生將 STEAM 元素融入馬蹄蟹飼養模式

STEAM Elements Inspire Secondary School Students with Horseshoe Crab Rearing





中學生透過「環保基金 — 明日之鱟保母育成計劃」的導賞團參觀海洋公園的馬蹄蟹飼養設施,從中學習將 STEAM(科學、科技、工程、藝術及數學)元素應用於馬蹄蟹保育活動中。學生還可透過導賞團獲得飼養馬蹄蟹的經驗,了解年幼馬蹄蟹的行為習性,以便日後參與馬蹄蟹保育工作。保育基金亦為各學生提供一系列 STEAM 培訓,讓他們學以致用,各自設計出融合 STEAM 元素的專題研習。

展望二零二一至二零二二年度,保育基金計劃招募二十間中學參與此融合 STEAM 元素的項目,讓學生以 STEAM 模式設計各項公眾宣傳計劃,呼籲社會關注馬蹄蟹及改善其棲息地,以及協助保護其種群。

The programme organised tours for secondary school students to visit Ocean Park's horseshoe crab rearing facility. These tours inspired students to attain all-round development by applying elements of STEAM (Science, Technology, Engineering, Art and Mathematics) to the rearing programme, and provided them with first-hand learning experience in rearing so they could understand the behaviour of juvenile horseshoe crabs while carrying out horseshoe crab conservation. OPCFHK also provided a series of STEAM trainings to students so that they can apply the knowledge they've gained and design their own projects that integrate STEAM elements.

The programme targets to recruit 20 secondary schools to participate in STEAM-powered learning in 2021/22. Students in the programme will adopt a STEAM approach to design projects to raise public awareness about horseshoe crabs, as well as directly improve their habitats and help maintain their populations.



2020/21 年度中學計劃關鍵數字一覽 Key Metrics for the Secondary School Sector in 2020/21

21 間中學參與計劃 secondary schools participated

19,300+ 名學生參加 students engaged

「馬蹄蟹校園保母計劃」自 2009 年開展以來的成果 Achievements of the Juvenile Horseshoe Crab Rearing Programme since 2009

289 間中學參與 secondary schools participated

288,800+ 名公眾人士得以認識馬蹄蟹保育工作 people reached

全新小學馬蹄蟹教育計劃

New Primary School Awareness Programme

「環保基金 — 明日之鱟保母育成計劃」於二零二零至二零二一年度擴展至小學,旨在提高小學生對馬蹄蟹瀕危狀況的關注。此計劃已在七間小學舉辦工作坊,讓學生對生物多樣性及馬蹄蟹棲息地有所了解,並鼓勵他們參加宣揚保育的活動。

小學生更可透過此計劃的互動遊戲了解馬蹄蟹 的棲息地,以及認識其生態與所面對的威脅, 自幼孕育對馬蹄蟹保育的熱誠。 2020/21 marked the launch of the horseshoe crab primary school programme, which was designed to raise students' awareness about the endangered status of these horseshoe crabs. The programme offered workshops to seven primary schools, guiding students to learn about the biodiversity and habitat of horseshoe crabs and encouraging them to participate in promotional conservation activities.

The programme includes interactive games designed to teach students about horseshoe crabs' habitats, biology and threats, with the ultimate aim of inspiring a lifelong interest in horseshoe crab conservation at a young age.







野外生態保育大學生贊助計劃 南朗山生態基線調查

University Student Sponsorship Programme in Wildlife Conservation

Nam Long Shan Ecological Baseline Survey





根據最新規劃的保育藍圖,毗鄰海洋公園的南朗山獲評定為對社區具備潛在生態及教育價值,因此保育基金特別聯同曾參與「野外生態保育大學生贊助計劃」(USSP)的學生,在該區進行了三次日間及夜間考察。期間各 USSP 義工協助保育基金隊員,當中包括生態學專家、保育基金社區教育部及科研部職員,在南朗山展開生物多樣性基線調查,USSP 義工從中更獲得參與科研統計、數據記錄、影像拍攝、環境視察及物種辨認的珍貴經驗。此調查成功在南朗山記錄得二十種動物及植物品種。

Under the latest roadmap of conservation initiatives, Nam Long Shan, a hill slope adjacent to the Ocean Park, offers potential ecological and education value to the community. OPCFHK engaged alumni volunteers from the University Student Sponsorship Programme in Wildlife Conservation (USSP) to help carry out day and night surveys during three trips to Nam Long Shan, where they assisted the OPCFHK team, which consisted of an ecological expert and staff from the community education and scientific divisions. The volunteers helped the team conduct a baseline survey on the area's biodiversity, and gained handson experience in conducting surveys, recording data, taking photorecords, observing sites and identifying species. Altogether, the project identified 20 flora and fauna species in Nam Long Shan.

甚麼是 USSP? What Is the USSP?

USSP 與本地大學合作,向大學生提供參與亞洲不同保育項目的前線工作機會,鼓勵他們投身保育及生態研究工作。每年均會有不同研究團隊指導學生推行保育項目,以及參與公眾教育活動。學生還有機會與本地及海外保育專家會面及交流,以及學習製作訊息圖表,參與媒體訪問及攝製紀錄片。

The USSP partners with local universities to give students frontline experience through different conservation projects in Asia and inspire them to pursue careers in conservation and ecological research. Each year, students in the programme are paired with research teams who guide them to assist in carrying out conservation projects and engage in running public awareness campaigns. They also get the chance to meet and talk to local and foreign conservationists, create infographics, and even participate in media interviews and documentaries.

第廿六屆海洋公園保育日 與大眾及中銀香港攜手保育六個本地瀕危物種

The 26th Ocean Park Conservation Day Joining Hands with the Public and BOCHK to Conserve Six Endangered Local Species

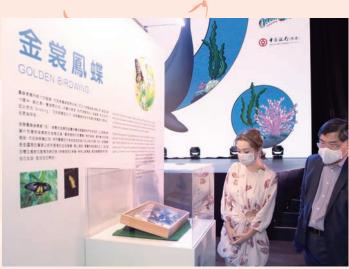


在二零二一年五月二十九至三十日,保育基金在中國銀行(香港)有限公司的贊助下舉行年度盛事「第廿六屆海洋公園保育日」。此活動旨在提高公眾對自然生態的關注,加深公眾對本地生物多樣性及保育重要性的認識。本年度的活動包括有趣且富教完意義的遊戲、展覽、趣味資訊及標本展示,讓公眾更深入了解自己在香港生態系統的角色,以及自然生態所面對的威脅。在五月二十五日舉行的保育日啟動禮上,保育基金及海洋公園的代表聯同漁農自然護理署(漁護署)署長梁肇輝博士與藝人關心妍攜手為活動揭幕。

On 29 and 30 May 2021, OPCFHK held the 26th Ocean Park Conservation Day with the kind sponsorship of the Bank of China (Hong Kong) Limited. This signature annual educational event promotes humanity's connection to nature and enriches the public's understanding of Hong Kong's rich biodiversity and the importance of conservation. This financial year, the event featured fun-yet-educational games, exhibitions, fun facts and specimens on display to enhance visitors' understanding about their roles and threats in Hong Kong's ecosystem. On 25 May, OPCFHK and Ocean Park representatives launched the event with a kick-off ceremony with Director of Agriculture, Fisheries and Conservation Department (AFCD), Dr. Leung Siu-fai, and celebrity Jade Kwan as the officiating guests.







「第廿六屆海洋公園保育日」關鍵數字一覽 Key Metrics for the 26th Ocean Park Conservation Day

19,000+ ^{參觀人次} visitors

怡慶坊展出六種本地瀕危物種

Six Endangered Species Were Showcased at the Applause Pavilion

在二零二一年度保育日舉行期間,保育基金為配合「珍惜自然寶藏 保護瀕危物種」的主題,特別將怡慶坊打造成「自然探知館」,展出鹿角珊瑚、眼斑水龜、馬蹄蟹、金裳鳳蝶、綠海龜及印度太平洋江豚等六種本地瀕危物種的資訊,包括海豚骨及動物標本的展覽,成為全港最大型的局類活動。公眾不單可以透過展覽了解各物種及知期。公眾不單可以透過展覽了解各物種及期間對的威脅,還可以參與不同的教育活動,如銀體保育專家親自分享研究項目的成果,近距離觀賞眼斑水龜的爬行姿態。此外,現場設有多個遊戲攤位,向公眾介紹本地保育工作的重要性。

For 2021, OPCFHK transformed Ocean Park's Applause Pavilion into a stunning Nature Discovery Centre under the event's theme, "Cherish the Hidden Treasures". At this Centre, the public could view Hong Kong's largest and finest collection of skeletons and specimens from six locally endangered species – the Acropora coral, Beale's eyed turtle, Chinese horseshoe crab, golden birdwing, green turtle and Indo-Pacific finless porpoise – while learning facts about each species and the challenges they face. They could also take part in a variety of conservation-based activities, hear scientists sharing their research and projects, and even see a live Beale's eyed turtle up close. In addition, educational game booths were arranged to highlight the importance of local conservation work.





停止餵飼野生動物計劃 透過公眾教育獲得正面迴響

Don't Feed Wild Animals Positive Results through Public Education

餵飼行為導致香港的野生猴子和野豬與人類之間的衝突持續。為緩解這情況,保育基金及漁護署自二零一八年起合作推行「停止餵飼野生動物計劃」,教育公眾餵飼野生動物對生態及社會造成的負面影響,以及分享如何減少人類與野生動物的衝突。

In Hong Kong, feeding monkeys and wild pigs has led to persisting human-wildlife conflicts. To mitigate this problem, OPCFHK and AFCD have been working together since 2018 on a public education programme, Don't Feed Wild Animals, to promulgate the negative ecological and societal consequences of this behaviour, as well as teach preventive measures to minimise the nuisances caused by these animals.

郊野公園公眾教育活動

此計劃其中一項工作,是在金山郊野公園及城門郊野公園設置教育攤位。保育基金員工及義工團隊在場派發傳單及問卷,教導公眾遇見野生動物時的正確行為,公眾亦可以觀賞教育展板及參加導賞團。除上述的郊野公園,保育基金更將教育攤位伸展至其他受野生猴子及野豬滋擾的地點。

Educating the Public at Country Parks

As part of the programme, OPCFHK operated educational booths at Kam Shan Country Park and Shing Mun Country Park. At these booths, a joint team of enthusiastic volunteers and staff members handed out leaflets and questionnaires to enhance the public's understanding on the proper ways to interact with wildlife. Visitors could also enjoy educational interpretative panels and participate in guided tours. These booths are now being extended to other locations where nuisances related to monkeys and wild pigs have been reported.





公眾參與 Public Participation

60 個教育攤位 education booths hosted

7,380+ 攤位遊覽人次 booth visitors

7 場生態導賞團 guided tours conducted



學校教育講座

Engaging Students through School Talks



在二零二零至二零二一年度,保育基金及漁護署舉行一系列專為幼稚園及小學而設的教育講座,讓學生認識本地常見的猴子和野豬的特徵,以及遇見牠們時正確的態度及行為,並透過互動遊戲來傳授實用知識。為配合防疫措施,保育基金特意重新設計這些講座及互動遊戲,讓活動可以透過網上會議平台繼續進行。保育基金亦向參與的學校派發教育單張,鞏固教學成效。

總括而言,網上及到校講座均順利進行,並獲得老師正面評價。無論 是網上還是到校講座,學生均同樣感到內容及遊戲有趣豐富。有見計 劃取得成果,保育基金正計劃透過社交媒體及網上平台來舉行更多網 上講座及遊戲,增加公眾參與程度。 For the 2020/21 year, OPCFHK and AFCD designed a series of educational talks suitable for kindergartens and primary schools. These talks provided students with information on how to recognise the biological characteristics of monkeys and wild pigs that they are likely to see in Hong Kong, as well as how to behave when they encounter them, complemented with interactive games that offered practical knowledge. To accommodate pandemic precautionary measures, the talks and interactive games were modified to be able to be delivered as a webinar via an online meeting platform. Educational leaflets were also delivered to participating schools.



Overall, both online and on-site talks were conducted smoothly and received positive feedback from teachers. Students expressed an equal interest in the content and games, regardless of whether it was a webinar or an on-site talk. Given the programme's success, future plans are in progress to deliver webinar and online games by using social media and online platforms to increase the public's engagement.

學生參與 Student Engagement

	No. of sessions 講座節數	No. of Participants 參加人數
On-site Talks 到校講座	56	2,654
Webinars 網上講座	12	546
Total 總數	68	3,200

網上分享活動 借助網絡力量連繫保育新世代

Online Sharing Sessions Connecting the Next Generation to Conservation via the Internet

鑑於 2019 冠狀病毒病疫情,保育基金於二零 二零至二零二一年度將教育推廣積極轉移至網 上平台,繼續與年輕保育專才緊密合作,讓守 護自然的理念得以薪火相傳。

OPCFHK made an extra effort to focus on online campaigns in 2020/21, amid the challenges posed by the global COVID-19 pandemic. Through passion and determination, OPCFHK has continuously worked with young and professional conservationists to help the next generation become more conservation-minded and have more respect for nature.

綠惜課室

BEC Mobile Green Classroom

是項活動由商界環保協會主辦,屬「商界環保協會賽馬會資 源『智』識揀計劃」項目之一。二零二一年一月至四月期間, 保育基金成為此活動的合作夥伴,為「綠惜課室」其下的「綠 惜大使計劃」舉行一系列提倡減廢與回收的網上工作坊,以 新穎形式傳遞本地海洋動物資訊與探討塑膠廢物污染對海洋 生態的影響,並鼓勵參加者與朋輩家人分享環保訊息。工作 坊上還播放了一段影片,以馬蹄蟹為第一身主角,讓觀眾切 身感受各種海洋垃圾對香港生態及馬蹄蟹家園造成的破壞。

To support the Business Environment Council (BEC), OPCFHK conducted a series of workshops to raise student awareness of waste reduction and drive behavioural changes in recycling. As part of the BEC Jockey Club Intelligent Resource Management Programme, these workshops were held under the Green Ambassador Scheme of the BEC Mobile Green Classroom from January to April 2021 in a new online format. The workshops transferred knowledge to participants on local marine animals and the effects of plastic pollution on them and their environment, and encouraged students to share what they had learned with their peers and families. A newly produced video for the project offers a horseshoe crab's firstperson perspective to describe Hong Kong's ecology and the impacts of various marine wastes on its habitat.





「綠惜課室」關鍵數字一覽 **Key BEC Mobile Green Classroom Metrics**

間學校參與 34 schools engaged

3,140+ 名中小學學生參加 primary and secondary school students participated

科學網上研討會

Scientific Webinars





一眾多年來獲保育基金資助研究的首席研究員透過網上研討會的 形式,分享研究項目的進程和成果,以提升公眾保育意識及啟發 區內人才。各研究員亦藉此向學生以至公眾傳揚生態知識 更多人為保育身體力行。

年內一共舉行五場網上研討會,包括兩場實時串流活動,講座主題包括鳥類、石斑及其他瀕危動物的保育議題。展望二零二一至二零二二年度,保育基金將繼續致力舉行網上研討會,積極傳遞保育訊息。

OPCFHK invited the Principal Investigators of its funding conservation projects over the years to share the progress and outcomes of their projects in online webinars. The primary goals of promoting these research findings were to raise public awareness, build capacity in the regions, enhance the knowledge transfer from scientists to students and the general public, and issue a call to action for conservation.

Five webinars, including two livestreams, were conducted this year. The topics discussed were the conservation of birds, groupers, and endangered animals. In 2021/22, OPCFHK looks forward to holding more webinars to spread the message of conservation even further and more pervasively.

推行合作計劃 攜手宣揚守護自然的理念

Collaboration Programmes Joining Forces to Spread Conservation Awareness

二零二零至二零二一年度,保育基金為加深公眾對保 育的支持,與不同機構合作實行多項計劃,其中包括: In 2020/21, OPCFHK collaborated with multiple organisations to raise the public's conservation awareness. These works include:

「綠路童心」計劃教材套

Kids' Greenway Teaching Kit

保育基金應香港專業教育學院(沙田分校)幼兒、長者及社會服務系幼兒教育中心邀請,因應教材設計一項戶外活動,藉以提升幼稚園學童對生物多樣性的認識。截至本年度,已有五十間幼稚園參與了這項活動。

The Child Education Centre for Teaching and Learning (CECTL) of the Department of Childcare, Elderly and Community Services under the Hong Kong Institute of Vocational Education (IVE) (Sha Tin) invited OPCFHK to provide an outdoor activity that children could participate in. The outdoor activity would be listed in teaching kits and was designed to raise children's awareness of biodiversity and distributed to 50 kindergartens.



「自然瑰寶|教育展覽

Beauty of Biodiversity Exhibition

在漁護署生物多樣性教育項目的資助下,保育基金在海洋公園及香港郊野舉辦一系列活動,宣傳生物多樣性。其中,在海洋公園舉行的「自然瑰寶」教育展覽著力介紹本地瀕危物種及保育基金的工作,並提供導賞團活動,帶領公眾欣賞本地生物多樣性及其面臨的威脅。為鼓勵公眾參與,展覽期間,參觀者還可以使用特別為活動而設的海洋動物主題濾鏡,在社交平台上推廣保育。

Subvented by the AFCD's Subventions for Biodiversity Education, OPCFHK developed a campaign to enhance biodiversity education through diverse programming at Ocean Park and in the wild in Hong Kong. The Beauty of Biodiversity Exhibition at the Park was organised to showcase local endangered species and OPCFHK's conservation achievements. The exhibition also offered guided public tours that promoted the appreciation of local biodiversity and educated participants about the threats facing it. To encourage public participation and awareness, the exhibition also offered a limited-time marine animal-themed filter that visitors could add to their pictures on social media platform.





「動物守護 ● 社區大使計劃」

Animal Watchers Programme

保育基金擔任香港警務署「動物守護 ● 社區大使計劃」 領袖,支持打擊殘酷對待動物罪行。在這項計劃中,保育 基金的主要工作包括就海洋動物保護議題提供專業意見及 舉行研討會,並參與製作宣傳短片,講述塑料垃圾對海洋 生態的危害,呼籲「走塑」生活。此外,保育基金還與計 劃內的其他領袖(專業機構)、大使(愛護動物的公眾代 表)及義工(社區及政府代表)合作,透過不同層面監察 計劃,以及鼓勵公眾積極參與各項相關活動。

OPCFHK served as a Captain in the Animal Watchers Programme (AWP) initiated by the Hong Kong Police Force, which fights cruelty to animals. In this role, OPCFHK provided expert advice and conducted seminars about protecting marine lives, and also participated in filming a video about impact of plastics on the marine environment that advocated using less single-use plastics. OPCFHK also worked with AWP's other tiers – Captains (experts), Watchers (animal-loving community figures) and Volunteers (community and government representatives) – to oversee the programme at different levels, and encouraged the public to participate in AWP events.



「快樂保 • 旅」計劃 啟發新一代保育力量

A Wonderful Journey Inside and Out Enlightening Students about Conservation

二零二一年,海洋公園與保良局攜手推出全新「快樂保●旅」計劃,到訪院舍及安排表演等多項動,內容涵蓋德育、保育及環保藝術創作等各方面,藉此傳遞關愛與快樂訊息,同時鼓勵院友守護自然生態。為支持是項計劃,保育基金亦特別向保良局羅氏基金中學提供科研體驗機會,讓學生於香港海洋生物救援及教育中心內參與解剖的生存威脅。此外,保育基金亦舉辦了一系列工作坊,加深學生對海洋保育和有關鯨豚擱淺調查的認識。

In 2021, Ocean Park and Po Leung Kuk launched a new joint initiative called A Wonderful Journey Inside and Out. This initiative features visits and performances at care centres, as well as moral education, conservation activities, eco-friendly art jamming and more, spreading love, joy and the message of preserving nature. To support this initiative, OPCFHK gave Po Leung Kuk Laws Foundation College students the opportunity to assist with scientific research at the Hong Kong Marine Life Stranding and Education Centre. Students assisted with necropsy and data collection to learn about the threats encountered by marine mammals in Hong Kong. In addition, OPCFHK also hosted a series of workshops to give students further insights into marine conservation and stranding investigations.







保育基金義工團隊 生態守護隊起動

OPCFHK's Volunteers Mobilising a Team of Devoted Conservationists

多年以來全賴一眾義工的支持,保育基金的工作才得以順利開展。在二零二零至二零二一年度,保育基金由衷感激香港警察學院、香港青年動力協會及社會各界的熱心支持,無私奉獻寶貴時間與才能,襄助平面設計及攝影等專業技術,令各與了能夠圓滿舉行。特別是在「海洋公園保育日」及「生態保衛賽」等活動中,各義工的支持顯得尤其重要。全賴各位義工的竭誠貢踐可持續發展的訊息,與公眾分享正能量。

OPCFHK's success would not be possible without the support of its volunteers. In 2020/21, OPCFHK was grateful to receive enthusiastic and passionate assistance from members of the Police College, Hong Kong Youth Power Association and overall community. These energised volunteers devoted their time and knowledge to supporting OPCFHK's many public awareness campaigns, informing the public about endangered wildlife, conservation, and sustainability while raising morale and spreading positivity. They also provided critical support for events such as Ocean Park Conservation Day and Run for Survival, and even used professional skills such as graphic design and photography to make every conservation event a tremendous success.

加入我們

Join the Team

香港生物多樣性和瀕危物種的未來,有賴你我和每一個人的守護。如果你也想貢獻一己之力,撥出時間或寶貴才能支持保育基金的工作,歡迎電郵至 opcf@oceanpark.com.hk。

Protecting Hong Kong's biodiversity and endangered species is a team effort. If you would like to volunteer your time or expertise to support OPCFHK's mission, please contact opcf@oceanpark.com.hk.



社區參與 COMMUNITY ENGAGEMENT

與持分者攜手 建造更美好未來

Creating a Better Future through Stakeholder Collaboration

有成效的保育工作有賴社會各界攜手作出承諾、支持及共同參與。保育基金自成立以來,致力與各界別的持分者通力合作,包括政府、私營機構、科學家、專業人士、年輕保育人士以至社會大眾,為下一代守護生物多樣性。在二零二零至二零二一年度,雖然 2019 冠狀病毒病疫情帶來許多嚴峻考驗,但亦同時展現大眾團結一心的重要性,齊心找出新方案,以創新方式克服困難,邁步向前。全賴不同伙伴的支持,保育基金不但能夠承先啟後,繼續堅持推行既有的保育項目,更能以嶄新方式推行籌款活動,實現建設美好未來的願景。

Effective conservation requires commitment, support and participation across all sectors of the community. Since its founding, OPCFHK has collaborated with a wide range of stakeholders – the government and private sectors, professional experts and the general public, scientists and young enthusiasts – to preserve nature's biodiversity for future generations. In 2020/21, the challenges posed by the COVID-19 pandemic illustrated how important it is for everyone to stand together and find new solutions and innovative ways to overcome obstacles to move forward. With the grateful support of different partners, OPCFHK was able to not only continue its long-standing events but also launch new initiatives to raise funds to translate its vision of creating a better future into action.



「生態保衛賽」 促進建設一個健康的世界

Run for Survival Promoting a Healthy World

在二零二零至二零二一年度,保育基金透過一年一度的「生態保衛賽」慈善跑,推動大眾關注生物多樣性及海洋生物保育。是次活動籌得的款項將用作支持保育基金的亞洲野生生態保育工作。在2019冠狀病毒病影響下,「生態保衛賽」慈善跑依然能夠成功舉行,足證社區為保護地球及各物種付出極大的決心。

In 2020/21, OPCFHK took literal and metaphorical strides to raise awareness of biodiversity and marine conservation through its annual charity runs. All proceeds from the runs went to support OPCFHK's conservation work with Asian wildlife. The success of these events in the face of COVID-19 has demonstrated the community's tremendous dedication and determination to protecting the world and the animals that live in it.

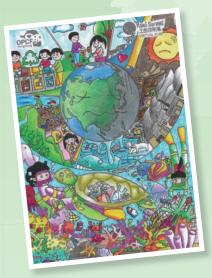
「生態保衛賽 2020 線上跑」

Run for Survival 2020 Virtual Run



雖然受 2019 冠狀病毒病疫情影響,但「生態保衛賽」慈善跑仍能在二零二零年成功推行,以「加入海洋保衛隊 完成拯救任務」為主題,透過慈善跑及社交媒體活動引起廣泛公眾關注。二零二零年的慈善跑原定於二零二零年三月二十二日於白石角海濱長廊舉行,但受疫情影響,延期至二零二零年八月二十四日至十月三十一日,並改以線上形式舉行,成為保育基金首個線上跑活動。參加者毋須組隊參加,可以自由選擇時間和場地完成挑戰,再上載截圖以確認所跑路程、日期及時間。在核實結果後,參加者即可獲發完賽獎牌及電子證書。

此外,為令活動更添趣味及推廣保育意識,保育基金更推出 三項社交媒體挑戰賽,分別為「拯救海洋填色比賽」、「走塑 挑戰」及「海洋換新裝有獎挑戰」,成功收到超過 70 份 參賽作品。而智趣廊亦推出有趣又富教育意義的影片,介紹 公眾健康及衛生知識,包括「親子工作坊:自家製環保 口罩套」等。



「拯救海洋填色比賽」冠軍: Momo LAM

Save the Ocean Colouring Competition Champion: Momo LAM Despite the COVID-19 outbreak, 2020 marked another successful year for OPCFHK's Run for Survival. Themed around Be an Ocean Guardian, Run to Save Wildlife!, the event and its social media campaign attracted significant public attention. Originally scheduled for 22 March 2020 at Pak Shek Kok Promenade, the run was postponed to 24 August to 31 October 2020 and transformed into OPCFHK's first-ever virtual run. Instead of running as a group, participants were encouraged to complete the challenge anytime and anywhere and then upload screenshots to confirm their running distance, date and time. After the results were verified, the participants were awarded finisher medals and e-certificates.

To double the fun, OPCFHK created three social media challenges to raise awareness and build excitement – the Save the Ocean Colouring Competition, Plastic Free Challenge and Dress Like the Ocean Challenge. The challenges received more than 70 entries. In addition, the Fun & Learn Centre created interesting and educational videos about public health and safety, including the popular "Family Home Workshop: Learn how to make an upcycled face mask holder".



「生態保衛賽 2021」 Run for Survival 2021



於二零二一年四月二十五日,保育基金以「保護蔚藍海洋 延續地球未來」為主題,首度於海洋公園舉辦「生態保衛賽」。「生態保衛賽 2021」是疫情爆發後香港 6個大型公開賽跑活動,得到海洋公園、活動贊助商、義工及跑手的鼎力支持。活動為不同年齡及程度人士的,經驗豐富的個人跑手可參加五公里計時賽,新手及家庭團隊可參加三公里同樂組。勝出者可賽,新手及家庭團隊可參加三公里同樂組。勝出者可賽,大眾透過攤內之里同樂組。所有完成賽事的參賽者亦可獲得完育嘉年華」,讓大眾透過攤位遊戲及工作坊,獲取生物多樣性的知識及海洋保育小錦囊,為環保作出改變。





On 25 April 2021, OPCFHK held its Run for Survival 2021 at Ocean Park for the first time, with the theme Protect Our Ocean for a Better Future. As Hong Kong's first large-scale public running event since the pandemic began, Run for Survival 2021 drew generous support from Ocean Park, as well as the event's sponsors, volunteers and runners. The Run was divided into categories based on age groups and experience – a 5km Individual Timed Challenge for seasoned runners and a 3km Fun Run for beginners and families. Winners received limited-edition medals while all runners received finisher medals upon completion. In addition to the Run, OPCFHK held an on-site Conservation Carnival to inspire people to make a difference for the environment, with meaningful activities such as game booths and workshops that offered tips on biodiversity and marine conservation.









與中國銀行(香港)合作 保護野生生態 延續地球未來

Partnering with Bank of China (Hong Kong) Conserve Wildlife Today for a Better Planet Tomorrow

保育基金十分感謝中國銀行(香港)有限公司(中銀香港)慷慨解囊,在二零二零至二零二一年度捐出港幣三百萬元贊助「保護野生生態 延續地球未來」活動,支持香港及亞洲區內有關海洋保育及打擊非法野生動物交易的科研項目。這些項目有助保育基金守護亞洲生物多樣性及提升公眾對有關方面的認識,了解保育的重要性及塑膠對海洋生物造成的污染。獲得這筆捐款支持的項目包括:

OPCFHK is extremely grateful for the generous sponsorship of the Bank of China (Hong Kong) Limited (BOCHK), whose HK\$3 million grant sponsored the Conserve Wildlife Today for a Better Planet Tomorrow programme in 2020/21 to support scientific projects in Hong Kong and Asia about marine conservation and combating illegal wildlife trade. By implementing these projects, OPCFHK hopes to safeguard Asian biodiversity and raise public awareness about biodiversity, the importance of conservation and the impact of plastic pollution on marine wildlife. Specific projects supported by this grant include:

香港及亞洲區內的野生動物保育項目

Wildlife Conservation Projects in Hong Kong and Asia

保育基金聯同中銀香港合共資助了十九項香港及亞洲區內的科研項目,藉此收集數據及資料,以協助科學家、保育人士、政府 機構及其他持分者評估、監測及制訂保育措施,緩解亞洲區生物多樣性所面對的威脅。

OPCFHK and BOCHK co-funded a total of 19 scientific research projects in Hong Kong and Asia. These projects gathered data and information to help scientists, conservationists, government organisations and other stakeholders evaluate, monitor and formulate conservation plans to mitigate Asian biodiversity loss.



研究團隊準備在海龜身上放置追蹤器。 Research team preparing to place tracker on sea turtle.



研究團隊在海龜身上放置追蹤器。 Researcher placing tracker on sea turtle.

綜合社交媒體活動

Integrated Social Media Campaign

有賴中銀香港的捐助,保育基金得以成功舉行一系列網上教育活動,接觸更多公眾。是次活動為期七個月,網羅不同保育主題,透過網上研討會及講座方式,向公眾講解有關生物多樣性及氣候變化的資訊,並進行問卷調查,了解公眾對保育的認識與實踐。

With BOCHK's donation, OPCFHK successfully organised a widespread online public awareness campaign. This seven-month campaign educated the public about conservation topics such as biodiversity and climate change through webinars and seminars, and conducted surveys to gather information about the audience's conservation knowledge and practices.

公眾活動參與情況 Public Campaign Engagement

749.000+ 位受眾 audience reached

800十 網上研討會及講座參加者 webinar and seminar participants

384 份問卷調查回應 survey respondents

海洋公園保育日 2021

Ocean Park Conservation Day 2021

在二零二一年五月,保育基金舉辦的「海洋公園保育日」獲中銀香港大力支持,並邀得中銀香港副總裁龔楊恩慈女士擔任活動主禮嘉賓。多位中銀香港員工更成為保育日義工,在遊戲攤位提供協助,並向公眾宣傳保育訊息。在中銀香港以及其他保育日的贊助商、義工及遊客的熱心支持下,這項為期兩日的教育活動取得空前成功。

In May 2021, BOCHK and OPCFHK joined together to support Ocean Park Conservation Day, with BOCHK Deputy Chief Executive Mrs. Kung Yeung Yun-chi, Ann officiating and BOCHK volunteers working in the game booths and providing information about conservation. Thanks to the joint efforts of BOCHK and the event's other passionate sponsors, volunteers and visitors, the two-day educational event was a great success.











保育英雄支援計劃 守護生物多樣性 建設更美好未來

Conservation Hero Support Programme Building a Bright Future that Safeguards Biodiversity

在二零二零至二零二一年度,儘管大眾日常生活 在疫情下未能如常運作,但保育基金仍矢志堅守 使命,身體力行宣揚與促進亞洲野生生態保育 工作。現時,生物多樣性正受到前所未有的嚴重 威脅,包括氣候變化、塑膠污染、過度捕撈、非法 野生動物交易及棲息地喪失等,支援本地及亞洲區 內的保育研究顯得尤其重要,以開拓創新的數據 收集方案及研究方法。為了實現這個目標,保育 基金特別推出全新籌款活動,呼籲大家支持。

在二零二零年,保育基金推出全新「保育英雄支援計劃」,旨在募集各界人士及企業機構的支持,透過單次或每月捐款資助保育研究及教育工作,共同保護大自然。其中,保育基金特別鳴謝以下企業伙伴在二零二零年十月至二零二一年六月的慷慨支持:

In 2020/21, even as the world locked down and suspended daily operations to combat COVID-19, OPCFHK's mission to advocate for, facilitate and participate in the effective conservation of Asian wildlife persevered. Now more than ever, biodiversity is at a severe risk from threats such as climate change, plastic pollution, overfishing, illegal wildlife trade, and habitat loss. As a result, it is extremely important to support conservation research locally and across Asia, and deliver innovative solutions and methods of data collection to support these endeavours. To fulfil this goal, OPCFHK created a new way to appeal for public donations.

In 2020, OPCFHK launched the Conservation Hero Support Programme. This new initiative is designed to gather support from all walks of life to help protect nature, allowing individuals and corporations to make one-off or monthly donations to aid in conservation research and education. OPCFHK would particularly like to thank the following corporate partners for their generous support from October 2020 to June 2021:

保育英雄支援計劃 Conservation Hero Supporting Programme			
金級捐款者(HK\$60,000) Gold Donor (HK\$60,000)	RED LOBSTER		
銀級捐款者(HK\$30,000) Silver Donors (HK\$30,000)	│	LI & PARTNERS 李偉斌律師行	
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銅級捐款者(HK\$15,000) Bronze Donors (HK\$15,000)	AFC	P®	TREE®
	(5) 6 博 皇 御 貴 金 圏 WWW.BIBGOLDHK.COM315度重服务客戸鴻彦城信企业		

成為保育英雄 - 踴躍捐款!

Be a Conservation Hero - Donate now!









每日捐出港幣 3.3 元,即可支持你所選擇的環保議題及物種。「保育英雄支援計劃」提供單次或每月網上捐款選項,為保育基金的工作提供直接幫助,當中包括:

- 亞洲區的保育研究項目
- 海洋生物擱淺行動項目
- 社區保育教育

掃描二維碼,了解更多!



成為保育英雄 — 踴躍捐款!

When you donate HK\$3.3 per day, you can choose the environmental issue and species about which you are most concerned. You can show your support with either a one-off or a monthly online donation. Your donation will directly contribute to OPCFHK's conservation efforts, such as:

- Research funding projects in Asia
- The Marine Life Stranding Response Programme
- Community education on conservation

Scan now to learn more!



Be a Conservation Hero – Donate now!

海洋公園 Chill 級保育日 2021 以有趣新方式連繫年輕保育人士

Conservation Chill Club Day 2021 A Fun, New Way to Engage Young Conservationists

在二零二一年,保育基金聯同海洋公園 探索及教育部推出創新的籌款項目,鼓 勵香港年輕人積極參與保育活動,守護 三個本地物種,包括鹿角珊瑚、綠海龜 及金裳鳳蝶。

在二零二一年六月三十日,「海洋公園 Chill 級保育日 2021」(Chill 級保育日) 為保育基金籌集捐款,支持本地的生物 多樣性研究及教育工作,包括海龜及 及康復工作、保護蝴蝶的設置研究及 瑚培植及放歸的工作。Chill 級保育日 勵幼稚園及中小學生參加,並提供一 列有趣的主題活動,分享香港本地生態 知識。此外,參加者只需捐出港幣十元 或以上,即可在活動當天穿著「戶外探 險」主題便服上班或上學。



為鼓勵及協助參與學校推行環保教育, Chill 級保育日特別設計多項以海洋對 吉祥物「威威與好友」為主角的活動 工作坊。「網上保育故事劇場」透過三 事劇場環節,帶領幼稚園學生認 在務。「DIY 野外探險帽」則教「Chill 級 FUN 享會」則與中小學生分享所 者如何意服裝設計比賽」造型。「Chill 級 FUN 享會」則與中小學生分享更「Chill 級 FUN 享會」則與中小學生分享是 態保育訊息,培育精明讓學生認識。 透解 資面對的威脅及相應的保育大使,而 境質 遺些活動,參加者能夠更深入地 可保護這些本地物種。



In 2021, OPCFHK and Ocean Park's Discovery and Education Department (DED) collaborated on an innovative new fundraising programme to encourage Hong Kong youths to participate in conservation events for three iconic local species – the golden birdwing, green turtle and Acropora corals.

On 30 June 2021, the Ocean Park Conservation Chill Club Day 2021 raised funds for OPCFHK to support local biodiversity research and education work, such as sea turtle rescue and rehabilitation, butterfly-friendly facilities research, and coral cultivation and reintroduction. Kindergartens, primary schools and secondary schools were encouraged to participate in the event, which featured a series of fun thematic activities that educated participants about Hong Kong's local ecology. With a minimum of HK\$10 donation, each participant could wear his or her own adventure suit at work or at school on the event day.

To encourage and facilitate participating schools to promote environmental education, participants were invited to take part in a range of different activities and workshops starring Ocean Park's mascots, Whiskers & Friends. At the Online Conservation Reading Play, kindergarten participants could enjoy a storytelling session where they learnt about the three species and accomplished educational missions. The Adventure Hat DIY Kit taught participants how to make their own adventure hat and gave them the opportunity to show off their outfits by joining the Most Creative Adventurist Costume Competition. The Online Conservation Morning Assembly shared knowledge and conservation tips with primary and secondary school participants to help them become future smart advocates. Finally, the Conservation Educational Kit taught students about local environmental threats and conservation efforts. Through these activities, participants got a better understanding of how to safeguard these species.





香港海洋生物救護及教育中心導賞團 深入認識處理本地海洋生物擱淺的工作

Hong Kong Marine Life Stranding and Education Centre Guided Tours Understanding More about Local Marine Life Stranding

香港海洋生物救護及教育中心由「滙豐一百五十周年慈善計劃」撥款資助興建,於二零一九年正式開幕,是亞洲首間兼備傳統與虛擬解剖技術的研究及教導了應。中心自開幕後,保育基金每個月均舉行免費導賞團,呼籲公眾關注鯨豚擱淺問題,並為海洋公園「森度遊」基供機會,近距離認識海洋生物保育知識及處理擱淺個案的行動。在二零二零年,海洋公園「森度遊」活動亦帶領參加者參觀此中心,了解拯救、研究及解組為所謂,如何協助制訂未來的監察及保育措施。在二零二一年度,共有超過一千九百名人士參加了香港海洋生物救護及教育中心導賞團。

The Hong Kong Marine Life Stranding and Education Centre (HKMLSEC) was officially opened in 2019. It is the first full-scale necropsy, virtopsy and education facility in Asia, under the sponsorship of the HSBC 150th Anniversary Charity Programme. Since then, OPCFHK has hosted free guided tours every month to raise awareness about stranding and provide Ocean Park visitors with an opportunity to take a close-up look at marine life conservation and stranding response operations. In 2020, Ocean Park's green outing programme gave hikers a chance to visit HKMLSEC, learn about the advanced equipment used to rescue, investigate and conduct necropsy of marine mammals, and understand how data-driven insights will help shape future monitoring and conservation efforts. In 2020/21, more than 1,900 participants joined a guided tour or visited HKMLSEC.

如何幫助活體擱淺的海洋動物 How to Help a Live-stranded Marine Animal

如你發現有海洋生物擱淺,請即致電 1823 通報個案。收到政府通知後,「海洋生物擱淺行動組」將會立即採取行動。其中,由於鯊魚無法在陸地存活太久,如遇擱淺必須儘快放歸大海;而鯨豚由於能夠在離開水面後存活較長時間,因此行動組的首要任務是為其即場評估身體狀況及進行醫學檢查,以找出擱淺原因。健康的鯨豚會在完成上述行動後立即放歸大海,而身體狀況較虛弱的則需要先接受治療,再放歸大自然。



If you find a live stranding marine animal, please report the case by calling 1823 immediately. After receiving the report from the Government, the Marine Life Stranding Response Team will initiate a rescue for the stranded animal. Stranded sharks must be returned to the sea as soon as possible, since they cannot live out of water; however, since dolphins and whales can survive out of water for longer periods, on-site evaluations of the animal's physical condition and medical examinations are paramount to identify the reason behind the stranding. Healthy individuals are returned to the sea immediately after the operations. For animals in poor condition, follow-up treatment is required before they can be released back to the wild.

無飲管活動調查 2019 冠狀病毒病疫情令即棄塑膠製品使用量回升

No Straw Campaign Survey COVID-19 Changes Herald an Alarming Surge in Plastic Use

在二零二一年四月十六日至五月七日,保育基金訪問了一千名年齡為十五歲或以上的香港市民,了解他們使用塑膠製品的情況。結果發現,即棄塑膠飲管使用量自二零一七年以來首度錄得升幅,從平均每人每星期四支增至四點四支,年度總使用量達至十一億支。另一方面,由於2019冠狀病毒病疫情令大家更依賴外賣和光顧食物外送服務,亦令與餐飲業相關的塑膠垃圾大增,即棄塑膠餐具及容器使用量便從平均每星期三點四件升至四件,當中外賣所佔數字便由每星期二點一件大增至二點八件。上述結果明確顯示,即使在疫情之下,公眾亦必須時刻警惕人類對環境構成的威脅。

From 16 April to 7 May 2021, OPCFHK surveyed 1,000 Hong Kong residents aged 15 or above about their plastic use. Worryingly, the survey found that single-use plastic straw consumption rose for the first time since 2017, from 4 to 4.4 per week, with annual consumption totalling 1.1 billion straws per year. Moreover, restaurant-related plastic waste has risen, which is commensurate with the increased reliance on food delivery and takeaway dining during the COVID-19 pandemic. The total number of single-use plastic cutlery and containers increased from 3.4 to 4 items per week, which includes a rise in the use of plastic cutlery and containers for takeaway from 2.1 to 2.8 items per week. These findings indicate that staying vigilant against human-imposed threats to the environment is very important even in challenging times.

目前已有超過 1,800 間餐廳、企業、教育機構及政府部門加入我們的「無飲管運動」。 歡迎你立即加入我們,承諾實踐「走塑」生活,建設更美好未來!

More than 1,800 restaurants, corporations, educational institutions and government departments have joined our No Straw Campaign. Join us now – take the pledge for a plastic-free today and a better tomorrow!



立即投入「走塑」生活!



Adopt a No-Plastic Lifestyle Today!

我們的團隊及鳴謝 THE TEAM & ACKNOWLEDGEMENTS



我們的團隊

The Team

受託委員會成員 Members of Board of Trustees



陳晴女士 , JP Ms. Judy CHEN, JP基金主席 Foundation Chair 自二零零四年十月起 Since October 2004



鄭詩韻女士 Ms. Michelle CHENG 自二零一七年六月起 Since June 2017



姚卓基先生

曾立基先生

Mr. Rudy IO 自二零二零年八月起 Since August 2020 (於二零二一年七月離任 Retired in July 2021)



礼令成先生,GBS, JP Mr. Leo KUNG Lin-cheng, GBS, JP自二零一四年九月起 Since September 2014



李繩宗先生 Mr. Matthias LI自一九九五年三月起 Since March 1995



Mr. Richard TSANG 自二零一零年九月起 Since September 2010



黃智祖先生, JP Mr. Joe WONG Chi-cho, JP 自二零二一年五月起 Since May 2021



陳善瑜女士

Ms. Ysanne CHAN 自二零一七年七月起 Since July 2017 (於二零二一年五月離任 Retired in May 2021)



方蘊萱女士 Ms. Loretta FONG Wan-huen 自二零一七年六月起 Since June 2017



劉鳴煒先生,GBS, JP Mr. LAU Ming-wai, GBS, JP 自二零二零年七月起 Since July 2020



梁美儀教授,JP Prof. Kenneth LEUNG Mei-yee, JP自二零一五年九月起 Since September 2015 (於二零二一年一月離任 Retired in January 2021)



盧佩鎣教授 Prof. Becky LOO Pui-ying自二零一一年九月起 Since September 2011



謝凌潔貞女士,JP Mrs. Cherry TSE LING Kit-ching, JP 自二零一八年六月起 Since June 2018

職員 Staff Members (截至二零二一年六月三十日 as of 30 June 2021)

布文傑 Michael Trevor BOOS

基金總監 Foundation Director

黃家聰 Marco WONG Ka-chung

高級發展經理 Senior Development Manager

温翰之 Judy WAN Hon-chi

社區教育經理 Community Education Manager

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助理發展經理 Assistant Development Manager

東急稲 Abby HUANG Wai-tim

社區教育主任 Community Education Officer

黃潔婷 Alexandra WONG Kit-ting

野猴生態調查員 Survey Officer

葉珮儀

Joyce YIP Pui-yee 行政主任 Administration Officer

卓思珩 Vivian CHEUK Sze-hang

發展主任 Development Officer

張家榕 Savannah CHEUNG Ka-yung

項目主任 Project Officer

徐子晴

Kelly TSUI Tsz-ching 野猴生態調查員 Survey Officer

保育基金聘用二十一位兼職保育助理支援本地保育工作,包括「海洋生物擱淺行動組」,並成立了一個由項目經理 Karthi MARTELLI 獸醫督導的特別小組,專責調查香港野猴數量及為野猴進行絕育手術。

The Foundation also employs 21 part-time Conservation Assistants to support local conservation efforts including the Marine Life Stranding Response Team. A special team supervised by Project Manager Dr. Karthi MARTELLI was formed to conduct macaque population survey and contraception in Hong Kong.

鳴謝

Acknowledgements

贊助人 Patron

張建宗先生 , GBM, GBS, JP Mr. Matthew CHEUNG Kin-chung, GBM, GBS, JP

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施雁飛女士 Mrs. Anthea STRICKLAND

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Marine Conservation Ambassador



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委員會

Committee

保育基金於過往一年承蒙籌款委員會、提名委員會、 科研委員會及科研顧問委員會的支持,特此致謝。於 二零二零至二零二一年度,委員會成員,包括業界的 專業人士和獨立權威的科學家,為我們的籌款活動及 研究申請書提供其專業知識和寶貴意見,為我們作出 了不可多得的貢獻。 We would like to extend our deepest gratitude to our Fundraising Committee, Nomination Committee, Scientific Committee and Scientific Advisory Committee. In 2020/21, the members of the Committees, including the professionals from various industries and the independent and respected scientists, contributed their expertise and knowledge in fundraising and evaluating our conservation funding proposals. Their insightful advice throughout the year has been invaluable.

籌款委員會 Fundraising Committee

曾立基先生(主席)	Mr. Richard TSANG (Chair)	Chairman, Strategic Public Relations Group
陳晴女士, JP	Ms. Judy CHEN, JP	Foundation Chair, OPCFHK
布文傑先生	Mr. Michael BOOS	Foundation Director, OPCFHK
陳善瑜女士	Ms. Ysanne CHAN	Chief Executive, Ocean Park Hong Kong (retired in May 2021)
黃智祖先生	Mr. Joe WONG Chi-cho, JP	Chief Executive, Ocean Park Hong Kong (since May 2021)
黃德源先生	Mr. Peter WONG	Managing Director, Integrated Publicity Services
鄔翁嘉穗女士	Mrs. Virginia WU	Director, Seven Sea Latex & Chemical Corp. Limited
司徒廣釗先生	Mr. Ralph SZETO	Co-Founder, CMRS Group
鄭紹康先生	Mr. Francis CHENG	Founder & CEO, Number One PR Communication Limited

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布文傑先生	Mr. Michael BOOS	Foundation Director, OPCFHK
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盧佩瑩教授	Prof. Becky LOO Pui-ying	Professor, Department of Geography, The University of Hong Kong

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朱利民教授 * (於二零二一年四月離任)	Prof. CHU Lee-man (Retired in April 2021)	Adjunct Associate Professor, School of Life Sciences, The Chinese University of Hong Kong
方家熙博士 *	Dr. James FANG Kar-hei	Assistant Professor, Department of Applied Biology and Chemical Technology, The Hong Kong Polytechnic University
李成業教授 * (於二零二一年四月獲委任)	Prof. Joe LEE Shing Yip (Appointed since April 2021)	Professor, School of Life Sciences, The Chinese University of Hong Kong
梁美儀教授 (於二零二一年一月離任)	Prof. Kenneth LEUNG Mei-yee (Retired in January 2021)	Chair Professor, Department of Chemistry, City University of Hong Kong
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邱建文教授 * (於二零二一年四月獲委任)	Prof. QIU Jianwen (Appointed since April 2021)	Professor, Department of Biology, Hong Kong Baptist University
蘇詠梅教授 *	Prof. Winnie SO Wing-mui	Professor, Department of Science and Environmental Studies, The Education University of Hong Kong
談儉邦博士 * (於二零二一年四月獲委任)	Dr. Kevin TAM Kim-Pong (Appointed since April 2021)	Associate Professor, Division of Social Science, Hong Kong University of Science and Technology

^{*} 增選成員 Co-opt members



布文傑先生(主席)	Mr. Michael Trevor BOOS (Chair)	Foundation Director, OPCFHK
魏偉寶先生	Mr. Grant ABEL	Director of Life Sciences, Seattle Aquarium
Robert L. BROWNELL Jr. 博士	Dr. Robert L. BROWNELL Jr.	Senior Scientist, Southwest Fisheries Science Center, Marine Mammal & Turtle Division, NOAA
陳堅峰先生	Mr. Simon CHAN Kin-fung	Assistant Director (Conservation), Agriculture, Fisheries and Conservation Department
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郭睿女士 (於二零二零年十一月離任)	Ms. GUO Rui (Retired in November 2020)	Director, Fisheries Resources Department, China Fishery Law Enforcement, Ministry of Agriculture and Rural Affairs
侯智恒博士	Dr. Billy HAU	Principal Lecturer, School of Biological Sciences, The University of Hong Kong
姜波處長 (於二零二一年三月獲委任)	Mr. JIANG Bo (Appointed since March 2021)	Director of General Office, China Fishery Law Enforcement, Ministry of Agriculture and Rural Affairs
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Nancy KARRAKER 博士	Dr. Nancy KARRAKER	Associate Professor, University of Rhode Island
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黎存志先生 (於二零二一年四月離任)	Mr. Patrick LAI Chuen-chi (Retired in April 2021)	Assistant Director (Fisheries), Agriculture, Fisheries and Conservation Department
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呂植教授	Prof. LU Zhi	Professor, School of Life Sciences, Peking University
馬伯樂獸醫	Dr. Paolo MARTELLI	Director of Veterinary Services, Ocean Park Hong Kong
Meena NARESHWAR 女士 (於二零二一年四月離任)	Mrs. Meena NARESHWAR (Retired in April 2021)	Senior Programme Coordinator, Centre for Environment Education, Ahmedabad, India
Daniel K. ODELL 博士	Dr. Daniel K. ODELL	Former Senior Research Biologist, Hubbs-Sea World Research Institute
冉江洪教授	Prof. RAN Jianghong	Professor, The College of Life Sciences, Sichuan University
Randall R. REEVES 博士 (於二零二一年四月離任)	Dr. Randall R. REEVES (Retired in April 2021)	Chairman, IUCN/SSC Cetacean Specialist Group
冼雍華博士	Dr. Simon SIN	Assistant Professor, School of Biological Sciences, The University of Hong Kong
Craig STRANG 博士	Dr. Craig STRANG	Associate Director for Learning and Teaching, Lawrence Hall of Science, University of California, Berkeley
William STREET 先生	Mr. William STREET	Senior Vice President, Indianapolis Zoo
宋亦希博士	Dr. SUNG Yik-hei	Assistant Professor, Science Unit, Lingnan University
王鴻加總規劃師 (於二零二一年四月離任)	Mr. WANG Hongjia (Retired in April 2021)	Chief Planning Officer, Sichuan Province Management Office, Giant Panda National Park
王福義博士	Dr. WONG Fook-yee	Adjunct Professor, Department of Geography and Resource Management, The Chinese University of Hong Kong
嚴佳代博士	Dr. YEN Chia-dai	Assistant Professor, National Taiwan Ocean University
張和民教授	Prof. ZHANG Hemin	Director, China Conservation and Research Center for the Giant Panda
張澤鈞教授	Prof. ZHANG Zejun	Vice President, College of Life Science, China West Normal University
張志忠司長	Mr. ZHANG Zhi-zhong	Director, Wild Animal and Plant Protection and Management Agency, National Forestry and Grassland Administration

首席研究員

Principal Investigators

水生哺乳類 Aquatic Mammals

首席研究員 Principal Investigator	所屬機構 Institute/ Organisation	研究物種 Supported Species	研究工作 Conservation Project
李永濤博士 Dr. LI Yongtao	中國水產科學研究院 黃海水產研究所 Yellow Sea Fisheries Research Institute, Chinese Academy of Fishery Science	東亞江豚 East Asian Finless Porpoise	青島嶗山灣海域東亞江豚季節性分布格局及棲息地利用調查 Seasonal distribution and habitat use of East Asian Finless Porpoise in Laoshan Wan, Qingdao
Olga SHPAK 博士 Dr. Olga SHPAK	A.N. Severtsov Institute of Ecology and Evolution of Russian Academy of Sciences (IEE RAS)	弓頭鯨 Bowhead Whale	探討瀕危弓頭鯨的季節性分布來界定和漁業有潛在性衝突的 水域 Follow to save: understanding the endangered Okhotsk Sea bowhead whale seasonal distribution for defining potential "areas of conflict" with industry

陸生哺乳類 Terrestrial Mammals

首席研究員 Principal Investigator	所屬機構 Institute/ Organisation	研究物種 Supported Species	研究工作 Conservation Project
Susan SHEWARD 女士 Ms. Susan SHEWARD	Orangutan Appeal UK	婆羅洲紅毛猩猩 Bornean Orangutan	利用滅火和巡邏隊伍保護和保育印度尼西亞 Sebangau 森林 Patrol and fire-fighting teams to protect and conserve the Sebangau Forest, Indonesia
Roshan GUHARAJAN 先生 Mr. Roshan GUHARAJAN	Panthera Wild Cat Conservation Malaysia Sdn Bhd	馬來穿山甲, 馬來熊,巽他雲豹 Sunda Pangolins, Sun Bear, Sunda Clouded Leopard	運用反偷獵對策保護馬來穿山甲及其他受威脅物種 Anti-poaching strategies to protect Sunda pangolins and other threatened species
房以好先生 Mr. FANG Yihao	大理大學東喜瑪拉雅 研究院 Institute of Eastern- Himalaya Biodiversity Research, Dali University	羚牛 Takin	高黎貢山羚牛保護、監測與社區保護意識提升 Protecting, monitoring, and raising community conservation awareness for the Gaoligong Mountain Takin

兩棲類及爬行類 Amphibians and Reptiles

首席研究員 Principal Investigator	所屬機構 Institute/ Organisation	研究物種 Supported Species	研究工作 Conservation Project
陳珉博士 Dr. CHEN Min	華東師範大學 East China Normal University	綠海龜、玳瑁、 棱皮龜 Green Sea Turtle, Hawksbill Sea Turtle, Leatherback Sea Turtle	海龜救助信息與技術需求調查 Investigation of sea turtle rescue information and technological needs
Shailendra SINGH 博士 Dr. Shailendra SINGH	Turtle Survival Alliance	阿薩姆棱背龜 Assam Roofed Turtle	改革印度阿薩姆地區自然探索中心,加強社區保育意識 Revamping Nature Discovery Centre in Assam, India: an effort towards planting conservation values in the community
Timothy BONEBRAKE 博士 Dr. Timothy BONEBRAKE	香港大學 The University of Hong Kong	大壁虎 Tokay Gecko	分析香港大壁虎基因多樣性 Hong Kong as a hub and home for declining Tokay geckos: analysis of genetic diversity



首席研究員 Principal Investigator	所屬機構 Institute/ Organisation	研究物種 Supported Species	研究工作 Conservation Project
楊子悠女士 Ms. YANG Ziyou	勺嘴鷸(上海)環保 科技有限公司 Spoon-billed Sandpiper (Shanghai) Environment Protection Technology Co. Ltd	半蹼鷸、大濱鷸、 小青腳鷸 Asian Dowitcher, Great Knot, Spotted Greenshank	候鳥遷徙重要的中途站:中國連雲港海岸濕地的保育 Conserving the coastal wetlands of Lianyungang, China — the critically important stopover site for long-distance migratory shorebirds
薛綺雯博士 Dr. Yvonne SADOVY	Science and Conservation of Fish Aggregations	蘇眉 Humphead Wrasse	在蘇眉上套用電腦人臉辨識技術作為改善 CITES 執法新方案 Humphead wrasse computer-aided facial recognition as a novel solution to CITES enforcement improvement
Byan Raveen NELSON 博士 Dr. Bryan Raveen NELSON	馬來西亞登嘉樓大學 熱帶生物多樣性及持續 發展研究所 Institute of Tropical Biodiversity and Sustainable Development, Universiti Malaysia Terengganu	圓尾鱟 Mangrove Horseshoe Crab	利用鱟胚胎發育過程來評估馬來西亞沉積和氣候問題的影響 Sedimentation and climate emergency impacts in Malaysia evaluated using horseshoe crab embryogenesis
Rabin KADARIYA 博士 Dr. Rabin KADARIYA	National Trust for Nature Conservation	孟加拉虎、 亞洲象、印度犀、 恒河江豚、 恒河鱷、豚鹿 Bengal Tiger, Asian Elephant, Greater One- Horned Rhino, Ganges River Dolphin, Gharial, Hog Deer	建立社區反偷獵團隊以助保育野生動物 Community based anti-poaching units for wildlife conservation

捐款紀錄

Donors & Sponsors

香港海洋生物救護及教育中心

The Hong Kong Marine Life Stranding and Education Centre



保育及教育項目 Conservation and Education Programme





蘇眉級捐款者 Humphead Wrasse Level (HK\$300,000 or above)



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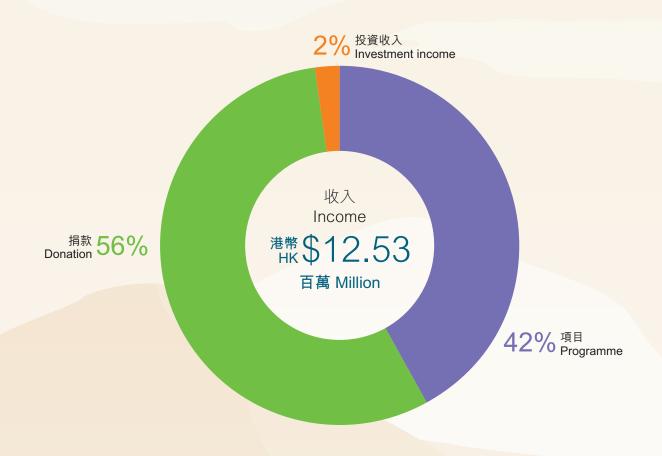
保育基金謹此感謝香港海洋公園教育及特別項目執行 總監胡琇然女士捐出在不同場合演講所得的相關收入。 We extend our gratitude to Ms. Josephine Woo, Executive Director, Education & Special Projects of Ocean Park Hong Kong for donating her speaking fees from various speaking engagements to OPCFHK.

財務摘要 FINANCIAL SUMMARY



二零二零至二零二一年度財務摘要

Financial Summary 2020/21



收入 (港幣)	Income (HK\$)	2020/21	2019/20
捐款	Donation	7,057,707	8,057,122
項目	Programme	5,228,190	5,558,623
投資收入	Investment income	240,403	815,123
總額	Total	12,526,300	14,430,868

保育基金於本年度的總收入是港幣一千二百五十三萬元,較去年減少百分之十三。本年度錄得赤字約港幣一百五十六萬元, 主要由於捐款及投資收入減少。

在二零二零至二零二一年度,保育基金的總支出為港幣一千四百零九萬元,較去年減少百分之十六,主要是在保育項目、公眾關注活動及行政方面的支出減少。

我們在保育、公眾關注活動及其他保育教育項目的開支(包括地震後的重建工作及相關項目)佔總支出的百分之七十二,其中 保育項目及地震後重建工作的支出達港幣五百六十一萬元,用以資助十二個涉及二十三個物種的全新保育項目,以及眾多續已 開展的科研計劃和項目。

展望未來,我們將更積極投入保育工作,繼續投放資源於亞洲區內極需關注的保育項目,並走進社區中宣揚保育工作,鼓勵下一代積極參與。

註:核數師報告及財務報表已上載至保育基金網頁,以供閱覽。



支出(港幣)	Expenditure (HK\$)	2020/21	2019/20
保育項目	Conservation projects	5,285,514	8,364,618
地震後重建工作	Earthquake rebuilding efforts	322,345	191
保育教育項目支出	Conservation & education programmes	2,259,228	1,996,972
公眾關注活動	Public awareness activities	2,193,102	3,175,293
籌款成本	Fundraising costs	3,249,434	2,010,469
行政支出+	Administration+	779,743	1,283,036
總額	Total	14,089,366	16,830,579

⁺包括折舊 Includes depreciation

Total income for the year decreased by 13% to HK\$12.53 million. Overall, the Foundation recorded a deficit of HK\$1.56 million mainly due to lower donations and investment income.

Total expenditure decreased by 16% to HK\$14.09 million in 2020/21, reflecting a decrease in costs for conservation projects, public awareness activities and administration.

72 percent of our total expenditure was spent on conservation projects, public awareness activities and other conservation and education programmes, including post-earthquake rebuilding efforts. Our project expenditures and post-earthquake rebuilding efforts amounted to HK\$5.61 million, stemming from 12 new conservation projects for 23 species, and many ongoing projects and public awareness efforts throughout the year.

In the coming year, we are looking to make an even bigger impact by directing our resources towards much-needed conservation projects in Asia, fostering environmental awareness among the younger generation, and reaching out to educate and engage local communities.

Remarks: Auditor's report and full financial statements were uploaded on website for reference.

香港海洋公園保育基金 OCEAN PARK CONSERVATION FOUNDATION, HONG KONG

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