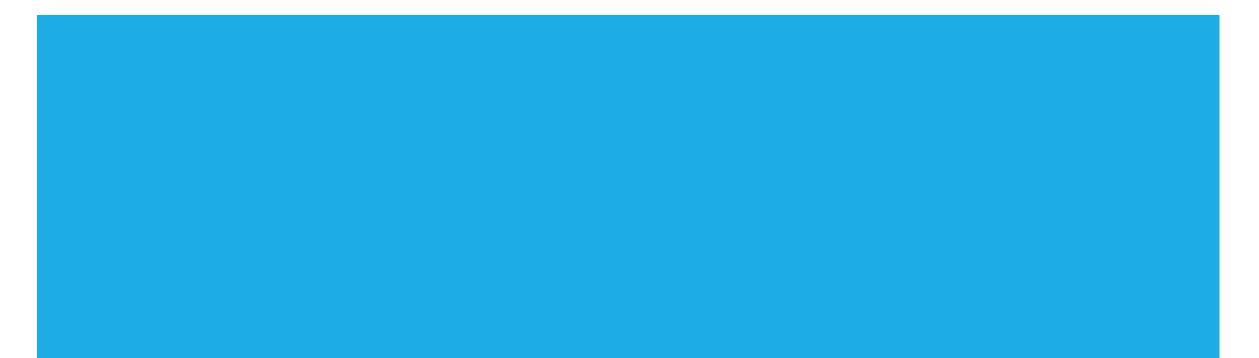
### ANIMAL PHOTOPOETRY CREATIVE CHALLENGE

THE COMPETITION



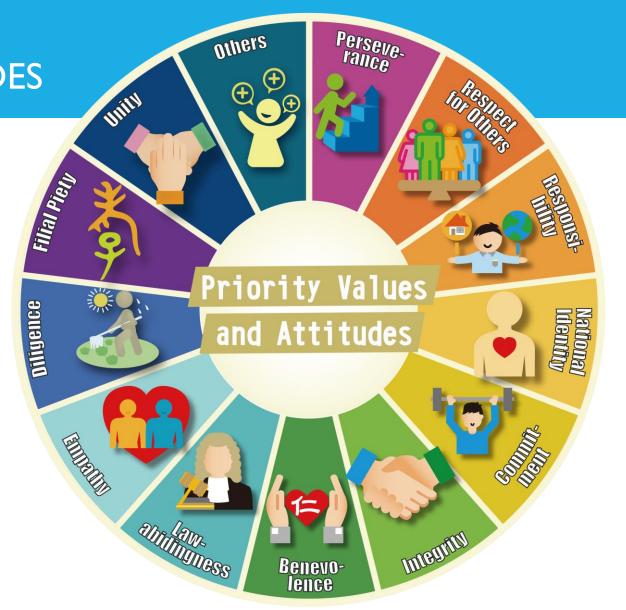
#### ANIMAL PHOTOPOETRY CREATIVE CHALLENGE -KEY OBJECTIVES

- Enhance students' appreciation of and interest in English poetry
- Encourage students' creative and artistic expression through photography AND poetry writing
- Promote Language across the Curriculum
- Enrich students' language learning experiences
- Nurture proper values and attitudes in students



#### VALUES EDUCATION – PRIORITY VALUES AND ATTITUDES





#### ANIMAL PHOTOPOETRY CREATIVE CHALLENGE -SAMPLE PHOTOPOETRY ENTRY

Take an animal photograph in Ocean Park and compose a poem to present the proper value(s) and attitude(s) assigned on the day of the Competition





#### **Unwavering Support**

You are the one who stood beside me, all through the storm, and kept me warm.

By Liz Lochhead

#### PROFESSIONAL DEVELOPMENT PROGRAMME -ANIMAL PHOTOGRAPH AND PHOTOPOETRY WRITING WORKSHOP



Part I:Animal Photography [Cantonese] Part 2: Animal Photopoetry Writing [English] Part 3: Animal Conservation and Animal Guide @ Ocean Park [Cantonese] Part 4: Hands-on Activity: Animal Photography and Photopoetry Writing



音色园主辦 可觀自然教育中心超天文館 Ho Koon Nature Education *cum* Astronomical Centre (Sponsored by Sik Sik Yuan)

# Wildlife Photography in Hong Kong

 $\bullet \bullet \bullet$ 

Dickson Wong Biology Panel Head

# <u>www.hokoon.edu.hk</u> – Outdoor Wildlife Learning Centre (Government Subsidized Secondary School)



中心介紹 學界課程 天文館 博物天地 比賽/專題計劃 聯絡我們 Q



#### Exposure triangle

Aperture (Av) : f/1.0 - f/32 The smaller the number, the greater the aperture

Shutter (Tv) : 30s - 1/8000s Adjust shutter speed

ISO: 100 - 12800 The higher the ISO, the greater the graininess and image noise

#### Basic photography techniques: portrait, motion, indoor environment

Aperture priority (Av) mode: Use f/2.0 or wider aperture to create a shallow depth of field

Shutter priority (Tv) mode: Use 1/1000 to freeze high speed action

ISO 6400, 12800 in manual mode: Use high ISO value to capture sharp image in dim or indoor scenes

#### Focal length of different lenses

Standard lens : 50mm (landscape & portrait photography)

Wide-angle lens : 24mm, 16mm / fish-eye lens (landscape / wide-angle macro photography)

Telephoto lens : 200mm, 400mm, 800mm (Birds or other wildlife photography)

Zoom lens : 24-200mm, 100-400mm (Travel photography)

#### 6 Must-know photography compositions

- 1. Rule of Thirds
- 2. Framing
- 3. Scattering
- 4. Fill the Frame
- 5. Leave Negative Space
- 6. Leading Lines

https://www.fotobeginner.com/18891/6-must-know-composition/

#### Bird photography

Relationship between urban development and migratory birds



# Bird photography

How wetland birds ultilize water bodies





#### Predators

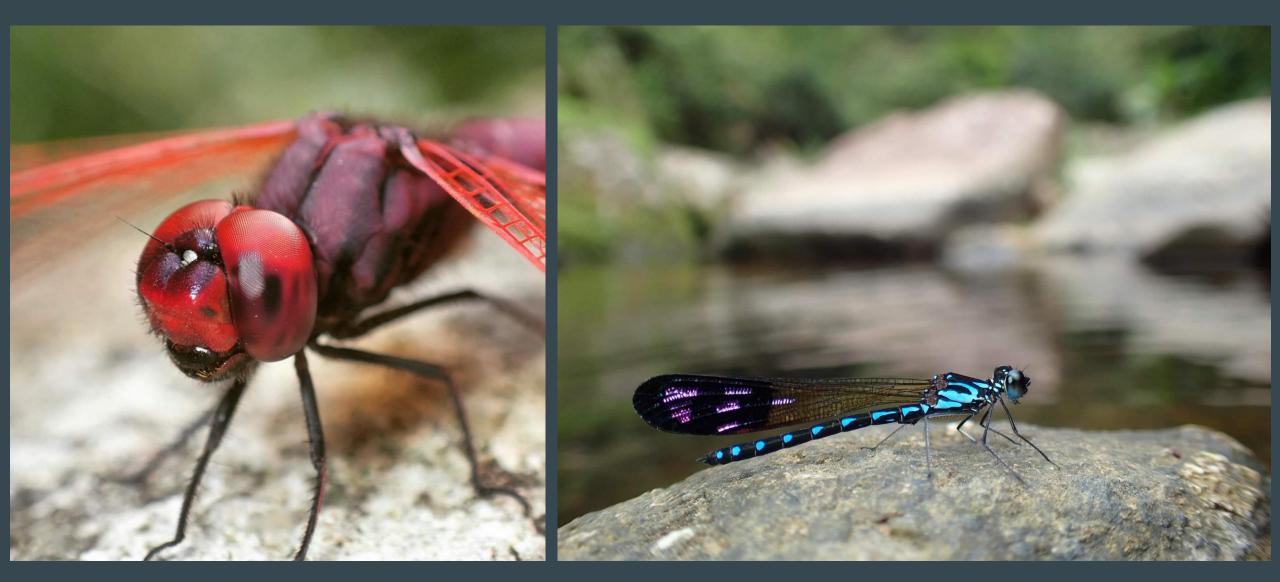
Wetland indicator species

#### Dragonfly & Damselfly



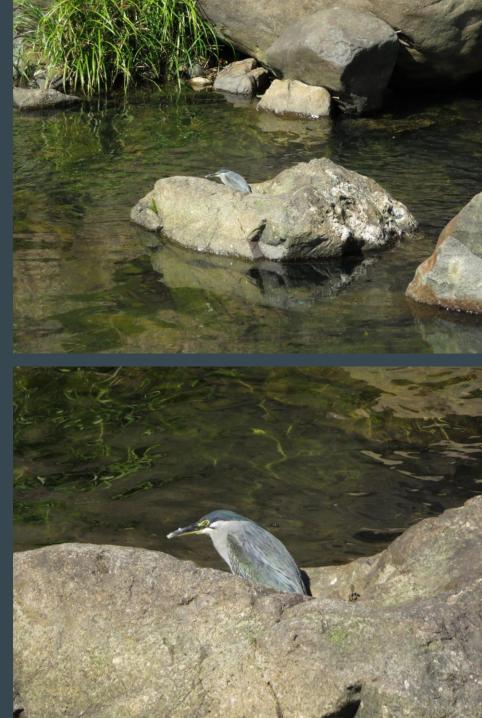


#### Macro photography on dragonfly/damselfly (Close-up vs Wide-angle)



#### Powerful super-zoom camera







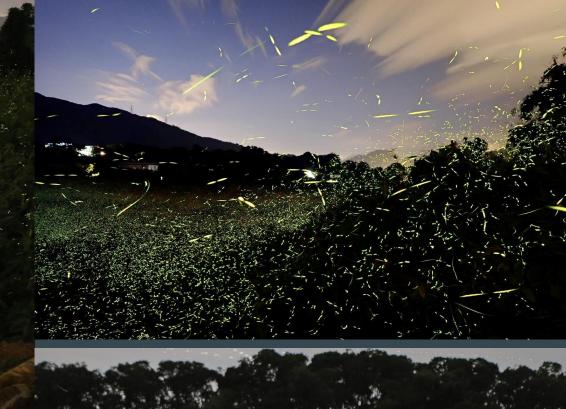
Spiders with high diversity- Macro lens with flash produces the best outcome!

Photo of fireflies by photo stacking (over 400 photos)



Some cameras are equipped with built-in stacking function.

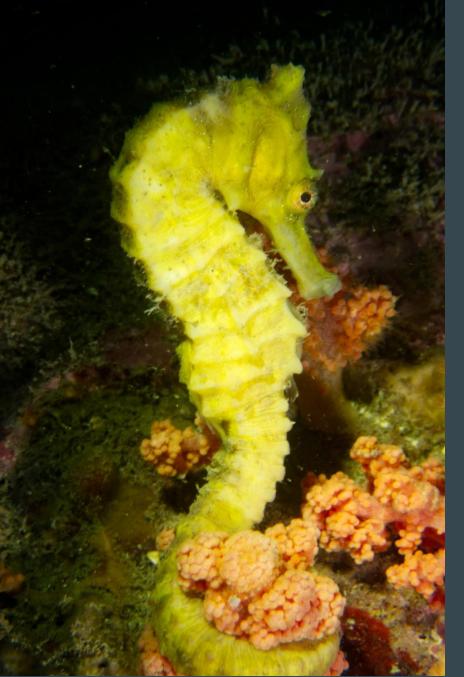
Illegal waste disposal, urban development (habitat destruction) and light pollution are major threats to the survival of fireflies



### Underwater photography becomes easy and affordable







Make use of zooming in/out function underwater when shooting animals of different sizes! Many hydrozoans are very small, under a few centimeters and are very difficult to see. A big thank you to the blackwater divers who have spotted these hydrozoans and shared their photos with the HKJP!



*Liriope tetraphylla* Photo: Dickson Wong



New species found in Hong Kong





A light, compact zoom camera makes it easier to bring with you when hiking







Nature photography with your phone - Grid lines and level guide



~

X

**PAN0** 

PORTRAIT

рното

VIDEO

 $\mathbf{O}$ 

**(** 

# How to capture nature with phone

Be familiar with functions in your phones, as well as your target species

Try taking photos at different angles and distances

Simple/Pro photography apps and equipment bring more possibilities to phone photography

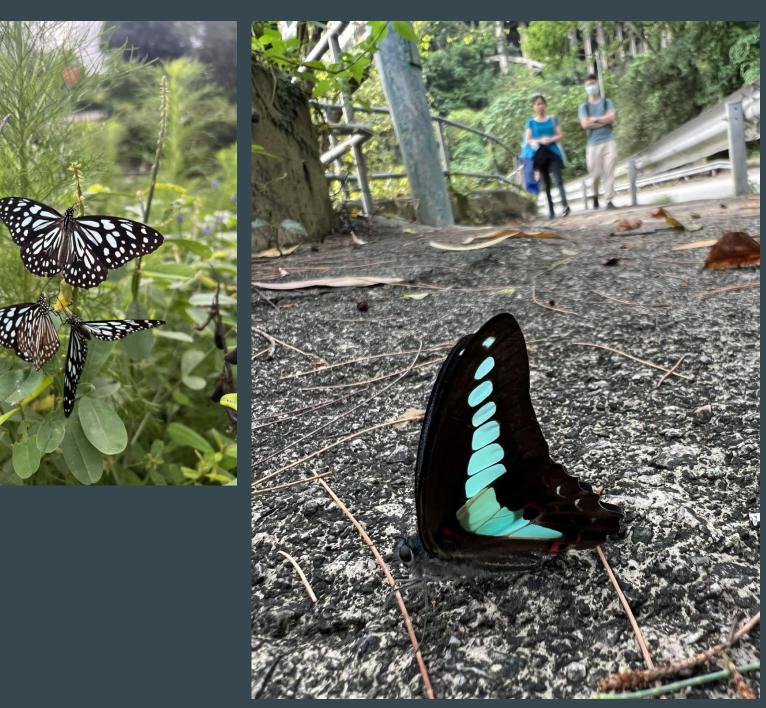


# Butterflies best for beginners

Danaid butterflies clusters

Swallowtails struggling on the road

Danaids, swallowtails, whites & yellows are larger in size and are not scared of humans, so close-up shots can be taken



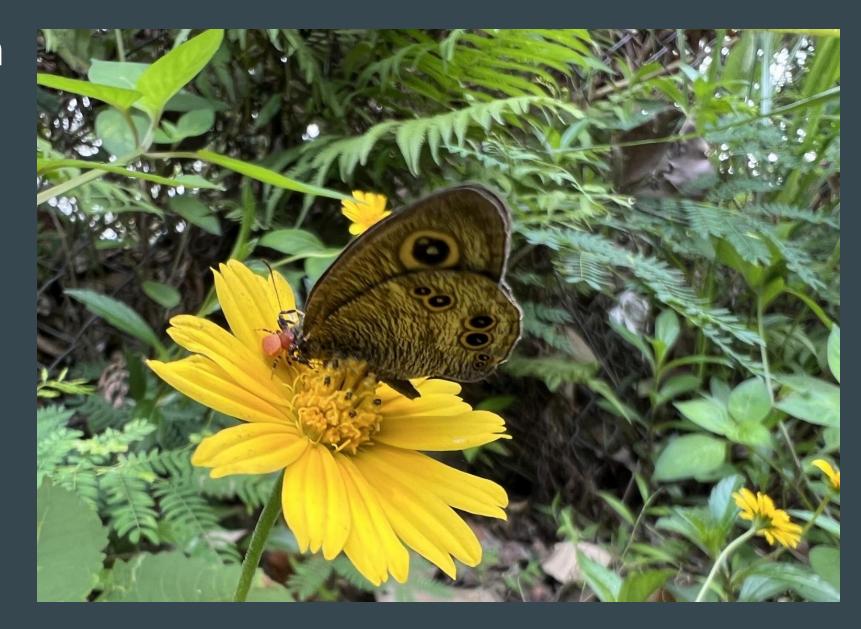
# Spider is the main character!

Spiders have high species diversity

Varies in colouration and appearance

But most species are small in size

Make use of macro function (with flower as background)



## Masked crab spider

Handrails are the easiest place to spot spiders

A wide-angle macro lens highlights the habitat

Special effects captured by phone







The most important and vulnerable moment of a dragonfly's life:

When a nymph emerge and become an adult

From inhabiting in the water to the king of the aerial world

### Wide-angle macro is a must try effect!

# Distance with the subject

Wide angle photography

Manipulating subject distance is important

Angle is also important





# Same fungi

Different angle

Different expression

Different preferences

Different fungi for different folks





# Utilize natural light

With natural light: Highlight the subject

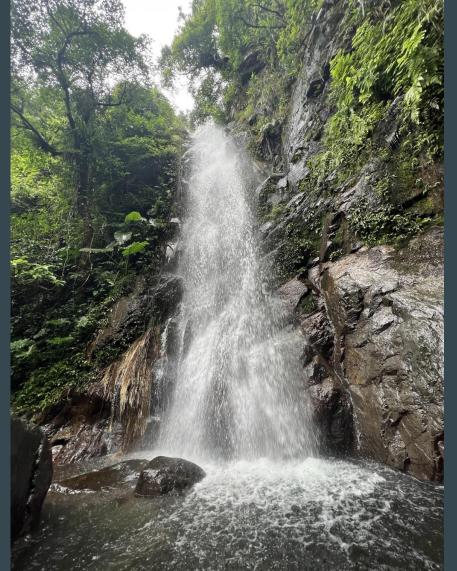
Without natural light: Reduce contrast



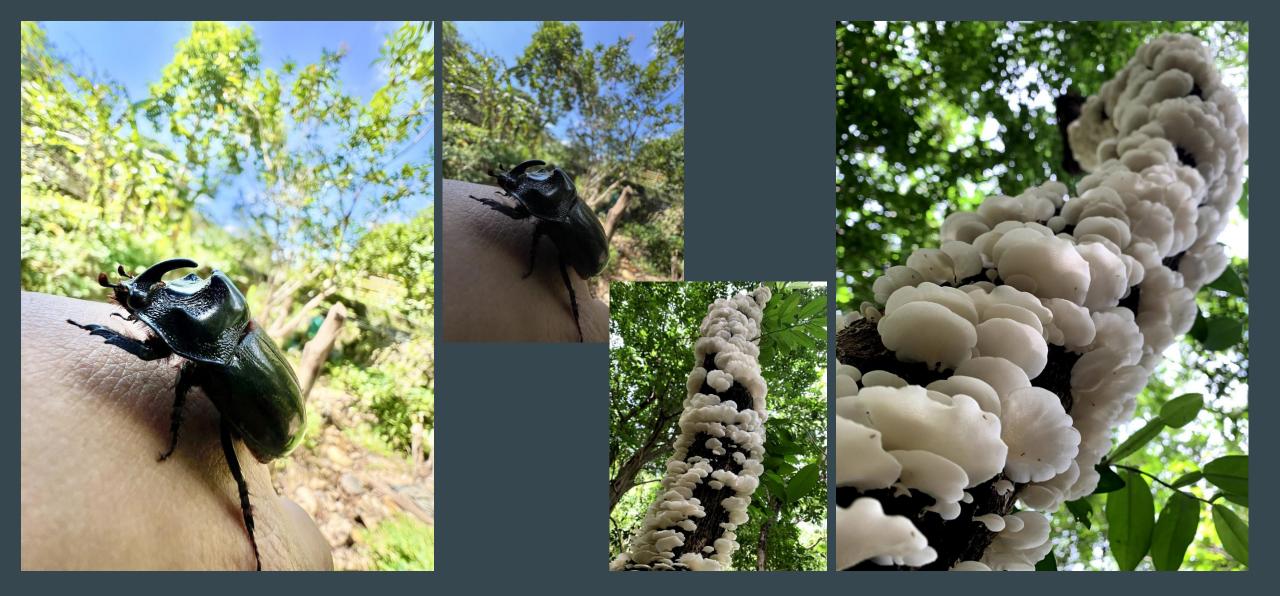
### Advanced in technology- capturing the special

#### Capture Waterfall:

- Professional Camera: tripod, ND filter
- Phone:'Live photo' -> long exposure
- \*But the surrounded features are less solid and sharp comparing to using a professional camera







Make the subject stand out by colour correction during post-production / adjustment of shooting angle



# 3x 1x

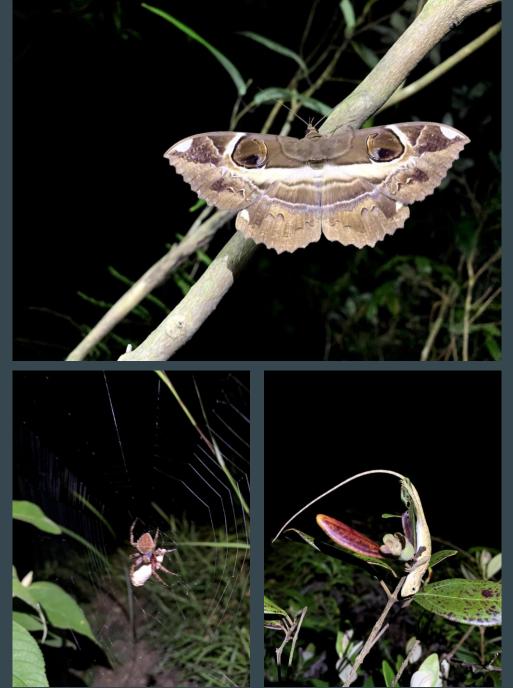
#### Make use of zoom in phone: 1x, 3x, 5x or 10x

Panorama of wetland in North New Territories





# Night safari – Torch and phone are the best partners

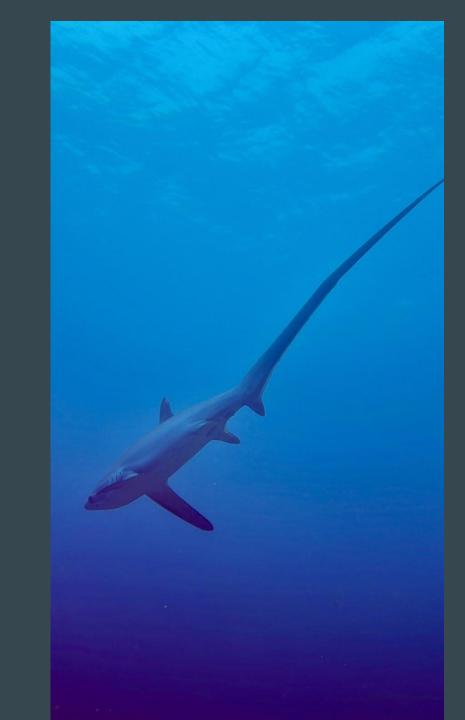






A phone with waterproof case and macro lens is the easiest way for underwater photography

Travelling overseas for wildlife photography is just as simple



## Definition of nature photography

• Nature Photography

Make use of environment, natural resources and natural phenomena as the theme

• Wildlife photography

Capture the interaction between living things and enviornment (both living things and non-living things) through photgraphic equipment

## Rules of wildlife photography

Please bare in mind: The rights of wildlife is the most important!

Familiarise yourself with the natural history of the subject to avoid damaging their interests accidentally

Site of Special Scientific Interest (SSSIs) - anyone who intentionally or recklessly destroys or damages of any of the flora, fauna, geological features, is guilty of an offence

Practitioners observe normal social courtesies

https://rps.org/media/1xcnsuga/the-nature-photographers-code-of-practice.pdf

## Specific conduct

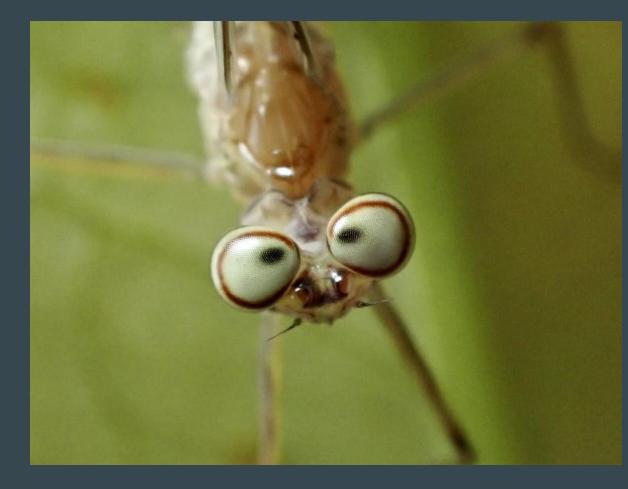
Birds at nest, and any animal breeding, feeding, or returning to its lair

It takes time for animals and birds to get used to hides. Hides therefore, should either be built over a period of time or erected some distance away and moved closer each day. After each change to the hide the photographer should retire to a safe distance and watch with binoculars. If any stage of the hide construction or its movement creates stress in the subject then the procedure should be reversed one stage or the hide should be removed completely.

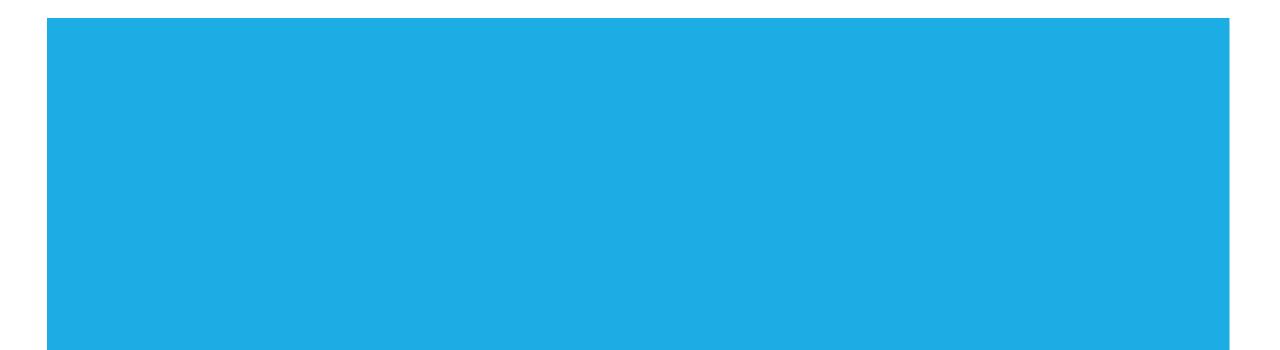
https://wildlifephotographersaustralia.org/?page\_id=21

### Conclusion

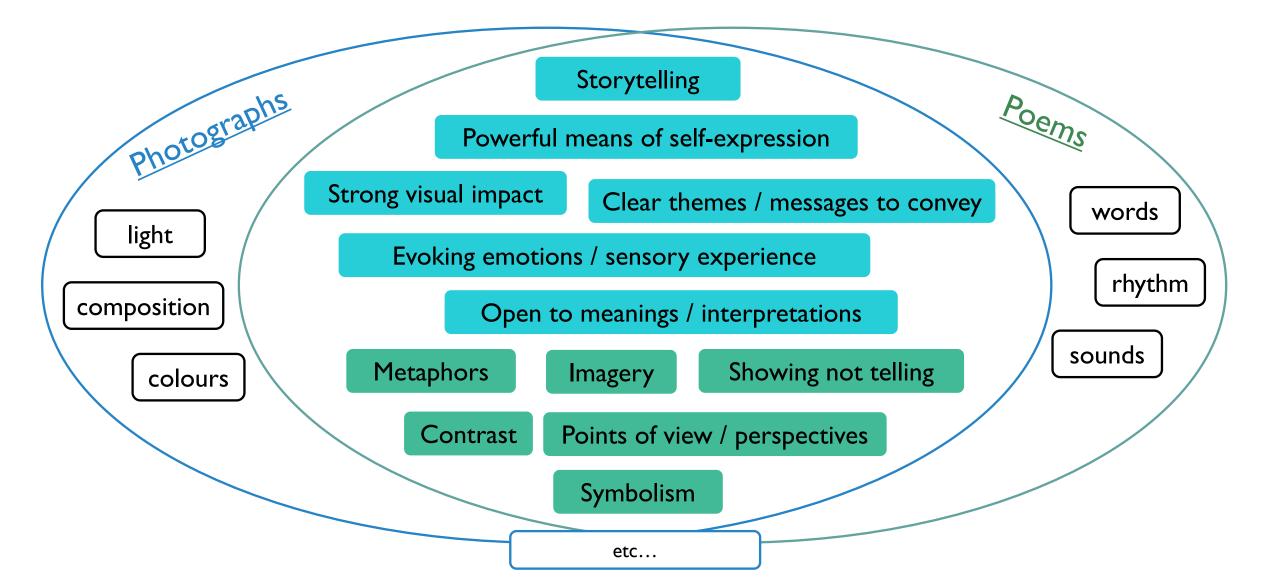
- Always be mindful of our nature
- Ecological knowledge, experience and senses are more indispensable than any shooting equipment
- Learn to be humble; appreciate and respect our nature
- Be innocent while exploring nature
- Band together with friends



# WHAT IS PHOTOPOETRY?



## What are some commonalities between **photographs** and **poems**?



# Why combine two distinct art forms?

### THE GENRE OF PHOTOPOETRY – CREATIVE SYNERGY

The photos and poems are interdependent – each element can stand alone but gains depth when interact with the other

Photopoetry, as a multimodal art form, often tells a story/conveys a message that may not be fully captured by either medium alone (e.g. the photograph can set a scene, while the poem adds depth and interpretation)

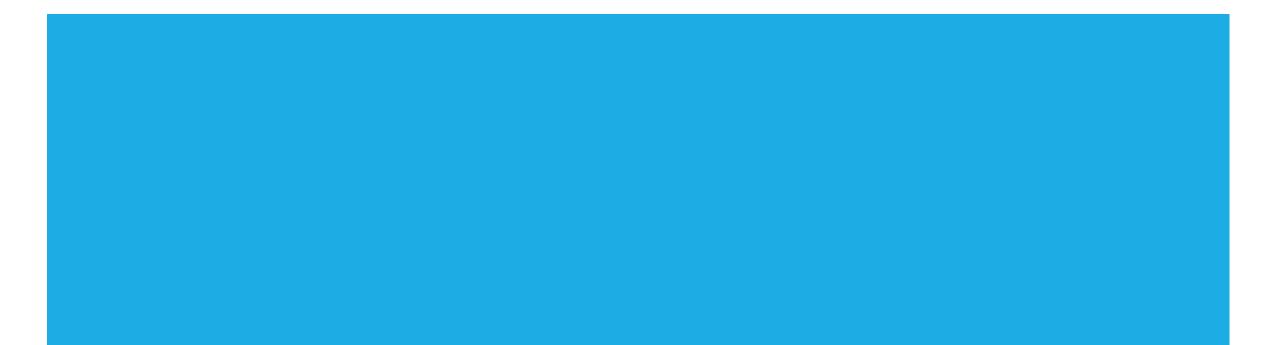
### Visual Harmony

Thematic Reinforcement

### Contextualisation

Narrative Creation / Creative Extension

# THE LEARNING AND TEACHING OF PHOTOPOETRY



### THE LEARNING AND TEACHING OF PHOTOPOETRY -KEY OBJECTIVES

To sharpen students' awareness of how photos and poetry can be integrated creatively to enhance meaning-making

To encourage students to be creative and adventurous as they appreciate the creative synergy of the art forms

How could these **poetic forms** and **poetic devices** enhance meaning-making in animal photopoetry?



Poet	Poetic Devices						
	Imagery	Personification	Simile/Metaphor	Alliteration	Onomatopoeia		

# EXPERIMENTING WITH POETIC FORMS AND CONVENTIONS - SOME EXAMPLES

Poetic form	Enhancing meaning-making by, for example	
Acrostic poem	spelling out a word related to the animals/theme of the photo, adding a playful and structured element	Peaceful and calm, Amidst the green bamboo grove, Nibbling tender shoots, Delight in every bite, Adorable and serene.
Shape/Concrete þoem	representing the animals visually, adding an artistic layer	Swimming in the blue, fins fluttering, glimmering scales, a splash of colour in the deep water, graceful and free, a life beneath the waves.
Haiku	capturing the essence of the moment depicted in the photo by means of brevity -> "A haiku comes closest to the shutter's click"	Silent in the deep, A shadow glides through the waves, Nature's fierce dancer.

# EXPERIMENTING WITH POETIC FORMS AND CONVENTIONS - SOME EXAMPLES

Poetic form	Enhancing meaning-making by, for example	
Limerick	adding layers of humour, rhythm, and narrative to the photo; complementing the playful nature of the animals	A baby monkey named <u>Ray</u> , Loved to swing and to play all <u>day</u> . With a giggle so sweet, He'd tumble and leap, Bringing joy in his own special <u>way</u> .
Riddle-like verse	encouraging viewers to spend more time contemplating the animals/theme of the photo	A symbol of wisdom, long and clear. With a fortress upon my back, I wander paths both blue and black. My steps are slow, my journey grand.



### EXPERIMENTING WITH POETIC DEVICES -SOME EXAMPLES

Poetic device	Enhancing meaning-making by, for example	Example
Imagery	making the photo and the animals more tangible by appealing to the senses and painting a detailed picture of its environment and texture	The alligator's <u>rough, wrinkled</u> <u>skin</u> , glistens under the hot sun's gaze.
Personification	making the animals more relatable by attributing human qualities to them, evoking empathy	The wise old owl <u>gazes</u> <u>thoughtfully</u> , <u>embracing the</u> <u>tranquility</u> of the quiet day.
Simile/Metaphor	creating vivid imagery of the animals, enriching the readers' understanding and emotional responses	Butterfly, <u>living jewels in flight</u> , dancing in the warm sunlight.
Alliteration	highlighting specific characteristics of the animals through the repetition of initial consonant sounds, creating a rhythmic quality that makes description more engaging	Slithering silently in the green, unseen.
Onomatopoeia	bringing the sounds of the scene to life, making the photo more immersive, enhancing the sense of presence and immediacy	A bird <u>chirps and tweets</u> , from the treetop high and neat.



### PERSONIFICATION



Giving some human characteristics to something that is not human, such as animals, objects and non-living things

e.g. The school is overjoyed when we are back. It spreads its arms wide to welcome us.

### ALLITERATION



Repeating the same consonant sounds at the beginning of words that are near each other

e.g. I am thankful to the tender teachers who touch my heart with their hands of love. They teach me to truly trust myself and treasure my time and talents.

# HYPERBOLE

them out of darkness when they are lost.

Making qualities of people or things stand out by exaggerating

e.g. My class teacher is the best teacher in the entire universe! She never fails to tend to our needs even when she is drowning in work and has a million other tasks to take care of.

them

NO PAIN NO GAIN

Repeating phrases, clauses or sentences that are similar in structure and meaning

e.g. Teachers encourage minds to think, hands to create and hearts to love.

> Curriculum Development Institute Education Bureau HKSAR @2022







Making comparisons between two things which have something in common, using the

words"like" or "as"

SIMILE

e.g. A good teacher is like a compass. He always shows students the correct direction and guides

Literary Devices



Making a statement that says one thing is another, without using the words"like"or "as"

e.g. A teacher is a gardener who always nourishes and nurtures students, providing the most favourable environment for them to grow and bloom.

METAPHOR

### PARALLELISM

### THE LEARNING AND TEACHING OF PHOTOPOETRY -SOME SUGGESTED LEARNING ACTIVITIES

Activity		Objective(s)	
Collaborative Photopoetry	Students work together (a photographer + a poet) to create a series of photopoems that explore a common theme	To cater for learner diversity and foster students' creative synergy	
Visual Storytelling	Students photograph a story in four to six images, each paired with a line or stanza of poetry	To help students practise concise and impactful writing, focusing on capturing the essence of the image in a few lines	
Photo-poem Pairing	Students make photo-poem pairs from a selection of photographs and poems	To encourage students to think critically about the relationship between visual and textual elements	

	Creative Synergy in Photopoetry				
$\bullet_{T}$	Visual harmony	Themat reinforcer		extualisation	Narrative creation/ Creative extension
Poetic Forms and Conventions					
	Acrostic poem	hape/Concrete poem	Haiku	Limerick	Riddle-like verse
	Poetic Devices				
	Imagery	Personification	Simile/ Metaphor	Alliteration	Onomatopoeia



# 動物攝影「詩」創意大挑戰 Animal Photopoetry Creative Challenge



# **Vision and Mission**

# Vision

A world where our actions help conserve and protect our natural environment.

### Mission

Ocean Park Corporation is a world-class conservation and education hub. We create fun and meaningful experience that are grounded in nature, and complemented by leisure and adventure elements, to nurture nature stewardship.









# **Activity Map (The Waterfront)**

### The Waterfront (Area near the entrance)

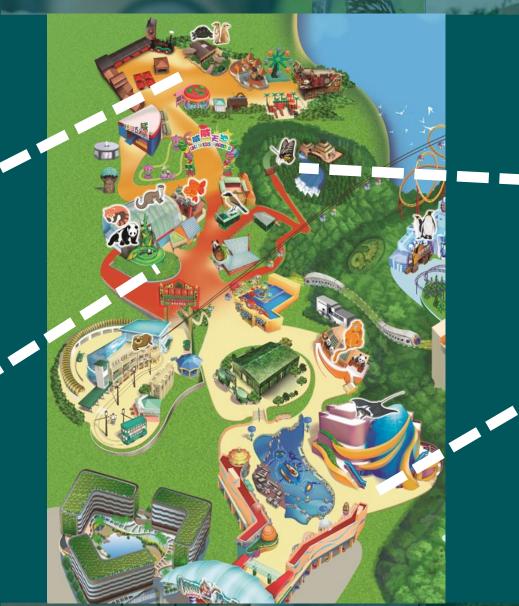
Little Meerkat & Giant Tortoise Adventure

Meerkat

### **Amazing Asian Animals**

- Chinese Alligator
- Red Panda
- Giant Panda
- Asian Small-clawed Otter
- Chinese giant salamander

### Ocean Park Hong Kong



# Eco Trail Butterfly Spider

### The Grand Aquarium

- Zebra Shark
- Milkfish
- Coral
- Yellow Seahorse



# Activity Map (The Summit)





# Learning Resources

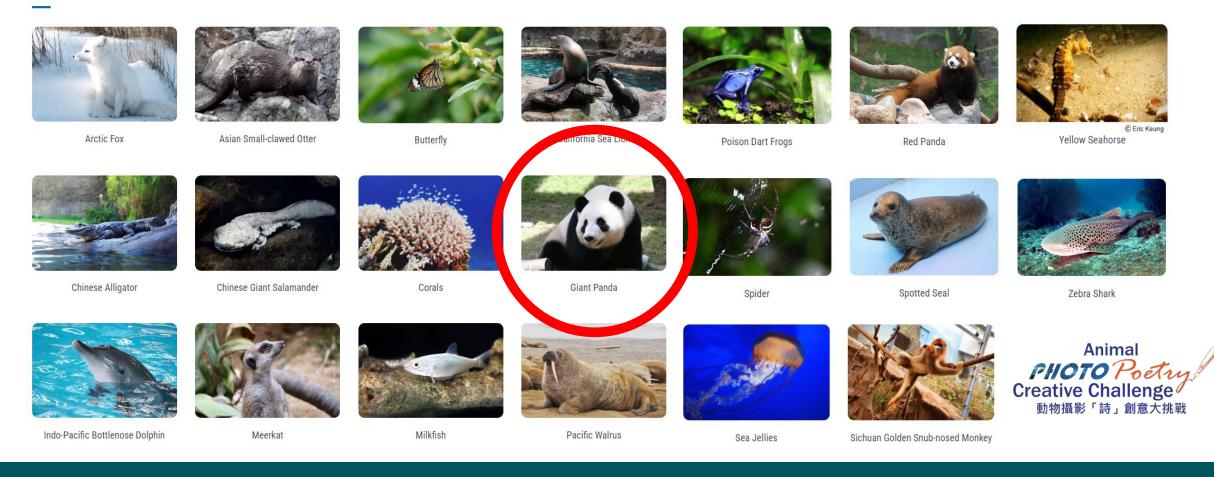


https://oceanparkhongkong.ievent.hk/event/3089?lang=e n Ocean Park Hong Kong



# Learning Resources

#### Resources





## **Resources - Animal Factsheet**

#### Animal FIIOTO Poetre Creative Challenge

### Giant Panda 🕮 Giant Panda Adventure

Scientific Name:	Ailurop
Other Common Name(s):	Panda
Body Length:	1.2 - 1.8
Body Weight:	100 kg
Distribution:	Bambo
	Sichuan
Conservation Statuses:	<ul> <li>IUC</li> </ul>

o forests, endemic to 3 provinces of China , Shaanxi and Gansu IUCN Red List - Vulnerable

oda melanoleuca



#### CITES - Appendix I

Chinese Wildlife Conservation Law - Category 1

#### Start your exploration in the pandas' home.

#### The Panda's Habitat

In this transparent tent, you can meet our animal stars - the giant pandas and red pandas. They share the same habitat in the bamboo forests of alpine mountains. We created a living area that imitates their natural habitat, with rivers, waterfalls, trees and slopes. Take a deep breath. Can you feel the cool fresh air? The temperature here is controlled to between 18 and 24 °C to reflect the average temperature and seasonal changes in their natural habitat in the temperate forest.

#### Seasonal Treats

For our animals' well-being, we provide environmental enrichment to provide variety and stimulate natural behaviour. Food is the most attractive thing to the pandas, so we play with it, making it into tubes or balls with holes, which we call puzzle feeders. We even add decorations and prepare festive feasts to celebrate birthdays and seasonal events with them!

#### 40 mediting

If you find the giant pandas eating, spend some time to cheer we them. They put a bunch of bamboo into their mouth and chew with their molars, which are seven times bigger than ours! To grasp the bampoo mmo, then have developed a "false thumb", which is actually an enlarged wrist bone, but functions like our thumb.

A keeper may be standing beside you observing them too. This daily observation helps the keepers assess and monitor the pandas' condition, as any unusual behaviour, such as loss of appetite, is often a sign that the animal is feeling unwell.

#### **Threats & Conservation**

Fewer than 1,900 giant pandas remain in the wild. As the habitats of giant pandas are highly fragmented by human activities, many have no way to move to new areas to find food or to mate with other groups. Their short mating periods further complicates their survival, making their immediate conservation particularly vital.



### Ocean Park Hong Kong



### **Species** introduction

Audio guide



**Giant Panda** 





# Animal Factsheet - Basic information & Conservation status

nture

# Giant Panda 🕮 Zone B: Giant /

Panda

Scientific Name:
Other Common Name(s)
Body Length:
Body Weight:
Distribution:

**Conservation Statuses:** 

Ailuropoda melanoleuca

1.2 - 1.8 m
100 kg
Bamboo forests, endemic to 3 provinces of
China – Sichuan, Shaanxi and Gansu

- IUCN Red List Vulnerable
- CITES Appendix I
- Chinese Wildlife Conservation Law -Category 1



← Location of

### ← Animal photo

Conservatio n status

# Animal Factsheet - Species introduction & Audio guide

### The Panda's Habitat 🔸

In this transparent tent, you can meet our animal stars – the giant pandas and red pandas. They share the same habitat in the bamboo forests of alpine mountains. We created a living area that imitates their natural habitat, with rivers, waterfalls, trees and slopes. Take a deep breath. Can you feel the cool fresh air? The temperature here is controlled to between 18 and 24 °C to reflect the average temperature and seasonal changes in their natural habitat in the temperate forest.

### Seasonal Treats 🔸

For our animals' well-being, we provide environmental enrichment to provide variety and stimulate natural behaviour. Food is the most attractive thing to the pandas, so we play with it, making it into tubes or balls with holes, which we call puzzle feeders. We even add decorations and prepare festive feasts to celebrate birthdays and seasonal events with them!

### Meal Time 🚸 🗧 Audio Guide

If you find the giant pandas eating, spend some time to observe them. They put a bunch of bamboo into their mouth and chew with their molars, which are seven times bigger than ours! To grasp the bamboo firmly, they have developed a "false thumb", which is actually an enlarged wrist bone, but functions like our thumb.

A keeper may be standing beside you observing them too. This daily observation helps the keepers assess and monitor the pandas' condition, as any unusual behaviour, such as loss of appetite, is often a sign that the animal is feeling unwell.



# **Animal Factsheet - Relevant information/video**

### **Threats & Conservation**

Fewer than 1,900 giant pandas remain in the wild. As the habitats of giant pandas are highly fragmented by human activities, many have no way to move to new areas to find food or to mate with other groups. Their short mating periods further complicates their survival, making their immediate conservation particularly vital.





# **Other Learning Resources**

PARK

INFORMATION

### • ANIMAL & PLANT GUIDE @ Ocean Park website

ANNUAL





THE



PLAN YOUR





ONLINE

RESERVATION

Arapaima

**Arctic Fox** 

Asian Small-clawed Otter

**Blacktip Reef Shark** 



**Blue-crowned** Laughingthrush

Capybara



**Bowmouth Guitarfish** 



**Bull Bay** 



**California Sea Lion** 



#### **Chinese Alligator**



Chinese Fan-palm



**Chinese Giant** Salamander







# **Other Learning Resources**

### Aldabra Giant Tortoise

Scientific Name	Geochelone gigantea	
Other Common Name(s)	Aldabra tortoise	
Body Length	Male: Up to around 120 cm Female: Up to around 90 cm	
Body Weight	Up to around 250 kg	
Distribution	Scrublands, grasslands, mangroves and beaches on the Aldabra Atoll of Seychelles. Introduced to other islands of Seychelles and parts of Tanzania and Mauritius.	



#### Fun Facts

#### • These slow tortoises rule their land!

Though they can't race like rabbits, Aldabra giant tortoises are champions when it comes to size! Native to the Aldabra Atoll, they are some of the largest tortoises in the world, and also the largest animals on the island with no natural predators.

BUY TICKETS 💽

Threats & Conservation



CITES: Appendix II

with some areas less than two metres above sea level. That makes the tortoises vulnerable to sea level rise and flooding due to climate change.



# **IUCN Red List**



# IUCN Red List of Threatened Species

Compiled by the International Union for Conservation of Nature (IUCN), it aims to assess the conservation status of flora, fauna and fungi, and to provide information to assist and promote conservation.



Currently, there are over 150,300 species being recorded in the IUCN Red List. Over 42,100 Species (~28%) are under threat of extinction.



© Ocean Park Hong Kong, IUCN



# Giant Panda (Endangered>Vulnerable)





# **IUCN Red List**





# **IUCN Red List**

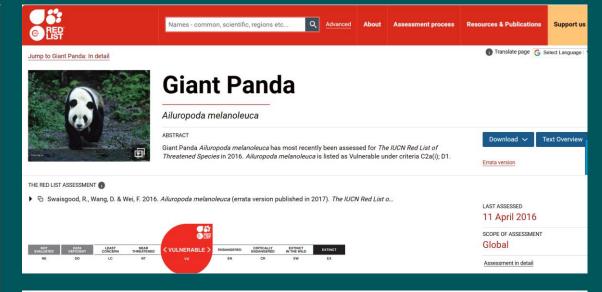


500-1,000

Population in detail

#### HABITAT AND ECOLOGY

### Forest



#### Habitat and Ecology in detail

HABITAT AND ECOLOGY

A member of the order Carnivora, Giant Pandas have evolved to specialize on a diet of bamboo (Schaller *et al.* 1985). Bamboo is a poor food source, low in protein and high in lignin and cellulose, and wild Giant Pandas can only digest an average of 17% of dry matter and about 27% of hemi-cellulose (Direnfeld *et al.* 1982, Schaller *et al.* 1985). Thus, to meet their daily energy requirement, Giant Pandas must consume a large amount of bamboo, up to 12.5 kg per day, and defecate more than 100 times daily (Schaller *et al.* 1985). Pandas have large, muscular jaws with skeletal features to accommodate the musculature and its famous "pseudothumb" used to hold and manipulate bamboo for processing. However, compared with other herbivores, the Panda has very low digestive efficiency because its digestive tract still resembles that of its carnivorous ancestors. The Panda's feeding strategy emphasizes volume, requiring it to allocate much of its time to foraging (approximately 14 hours daily).

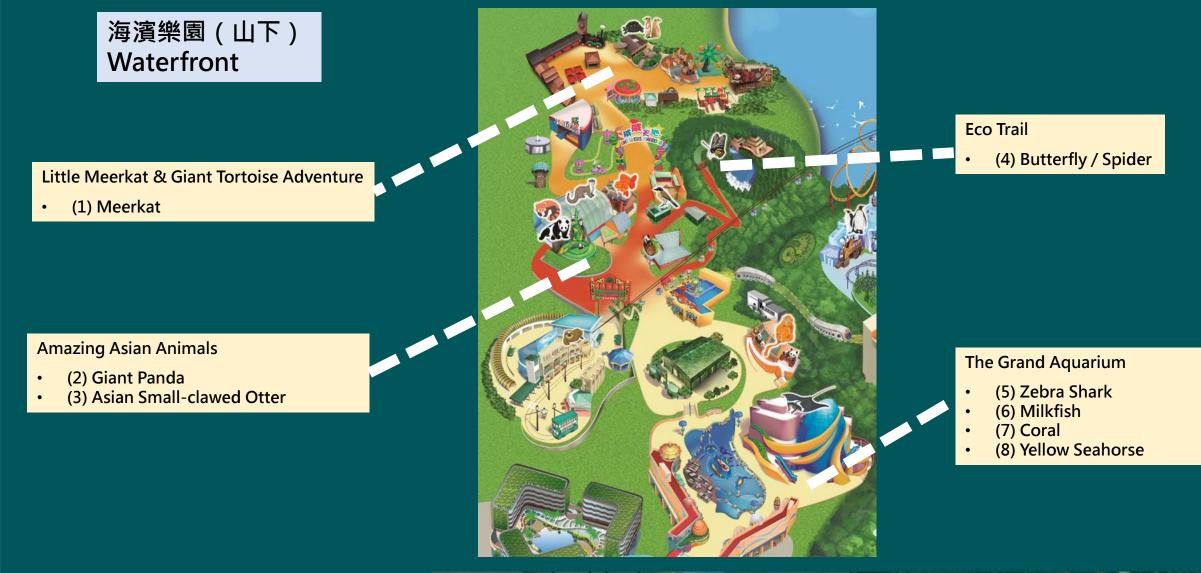
While morphological and behavioural adaptations provide some compensation for poor digestive efficiency, the Panda's ability to survive on such a low-quality food source remained mysterious for decades. Even whole-genome sequencing found no specific genes responsible for the digestion of cellulose and hemi-cellulose (Li *et al.* 2010). An explanation was uncovered in a recent metagenomics study that found the Panda's gut



### **IUCN Red List**



# Introduction to Featured Animals & Basic Photography Techniques





# Group 1

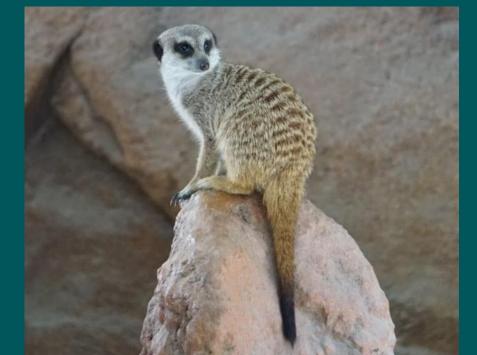


# Little Meerkat & Giant Tortoise Adventure





### **Group 1 - Meerkat**



Black eye patches help protect the eyes from intense sunlight by reducing the amount of light entering the eyes.



Inhabiting the desert, meerkats has coat colour that helps them blend into the surroundings.

Meerkats in each family take turns serving as sentries and monitoring the safety around them. Meerkats have four long, pointed claws on all four paws, which they use for digging and hunting small insects.

#### **IUCN Red List conservation status: Least Concern**



#### Group 1 - Meerkat



- Meerkats take turns to serve as sentries
- Make use of their behavior → look for meerkats standing still on tall rocks and wooden branches

# Groups 2 & 3





# Amazing Asian Animals

威威天地 記名を登録 The Waterfron 亞洲動物天地 夢幻水都 MARRIOTT



### **Group 2 - Giant Panda**



Far distance between the fence and the pandas
 → close-up photos: telephoto lenses is preferred



### **Group 3 - Asian Small-clawed Otter**



#### • To avoid reflections, shooting close to the glass is recommended

 Asian small-clawed otters move quickly & rhythmically → try to capture the moment when they stop



### **Group 3 - Asian Small-clawed Otter**

Asian small-clawed otters have dark brown coats that help them camouflage in rivers and streams.





They enjoy living in small family groups and often cuddle on another when sleeping.

Asian small-clawed otters have slender fingers.

**IUCN Red List conservation status: Vulnerable** 



# **Group 4 - Butterfly / Spider**

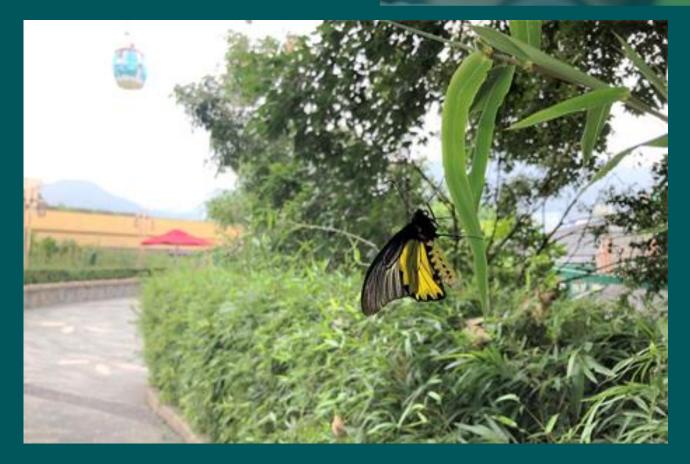


# The Eco Trail



# **Group 4 - Butterfly / Spider**



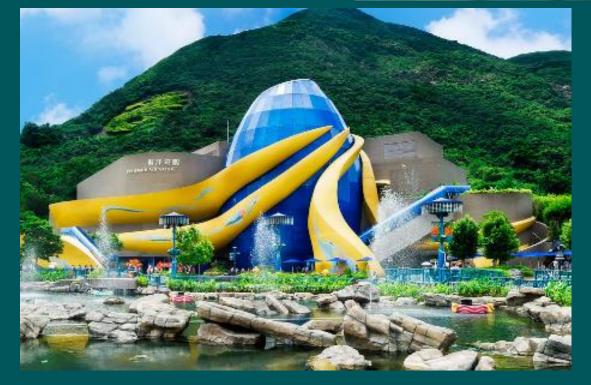


Use Natural Light: Take advantage of natural light. Early morning or late afternoon light can create beautiful, soft images.





## Groups 5 - 8



# The Grand Aquarium

威威天地 Acterfront 亞洲動物天地 夢幻水都 X MARRIOTT



#### The Grand Aquarium



Due to the large swing amplitude and the fast swimming speed of fish:

- apply **burst mode**, and choose the best among the photos
- don't follow the fish → predict its swimming route → focus on a further position → capture it when it swims past



# Groups 5 & 6 Zebra Shark & Milkfish



Zebra sharks are nocturnal and often hunt at night. They feed on mollusks, crustaceans, and small fish.



Milkfish swim in large schools. When hurt, their body produces an alarm substance which alerts their companions to predators or other danger.



# Groups 7 & 8 Coral & Yellow Seahorse



Coral reefs are among the most diverse ecosystems on Earth, providing habitat for about 25% of all marine species.



Yellow seahorses are valuable in traditional Chinese medicine. Although their benefits on health have not been tested, they are still captured and traded.