# Welcome to the Blue Planet Aquarium



Enjoy your journey through our magical underwater adventure.

### **Northern Streams**

The Journey begins...

The Northern Streams section of the aquarium represents the beginning of the water cycle. Water begins as precipitation in the mountains then flows downwards to form rivers. Rivers are split into 3 sections, (just like our tank!). The UPPER COURSE which is found in the mountains or hills, the MIDDLE COURSE of a river is when the land flattens and a flood plain is created in the surrounding areas, and the LOWER COURSE is where the river meets the sea, here the river is wider and deeper, and flows a lot slower.

#### **UPPER COURSE**



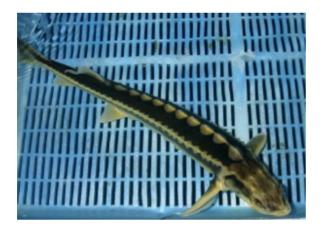
Top: Male Tufted Duck. Bottom: Female Tufted Duck. (All of our Tufted Ducks are male!).

The adult male is all black except for white flanks and a blue-grey bill. It has an obvious head tuft that gives the species its name. The Tufted Duck breeds widely throughout temperate and northern Eurasia. It occasionally can be found as a winter visitor along both coasts of the United States and Canada. It is believed to have expanded its traditional range with the increased availability of open water due to gravel extraction, and the spread of freshwater mussels, a favourite food. These ducks are migratory in most of their range, and winter in the milder south and west of Europe, southern Asia and all year in most of the United Kingdom. They will form large flocks on open water in winter. These birds feed mainly by diving under the water to obtain food.

#### **MIDDLE COURSE**



Siberian Sturgeon



Diamond back Sturgeon

The Siberian sturgeon are long-lived (up to sixty years), and late to reach sexual maturity (males at 11–24 years, females at 20–28 years). They spawn in strong current main stem river channels on stone or gravel substrates. The Siberian sturgeon feeds on a variety of benthic organisms such as crustaceans and chironomid larvae.

The Diamondback Sturgeon can reach 2.3m and 110kg in the wild but 1.25m and 15kg is nearer the mark in ponds. It grows very quickly, only second in growth rate to the Beluga. The Diamond Sturgeon is very pretty when small but often loses its white pattern to become a grey/black colour. The blunt rounded nose distinguishes it from other species.

#### **LOWER COURSE**

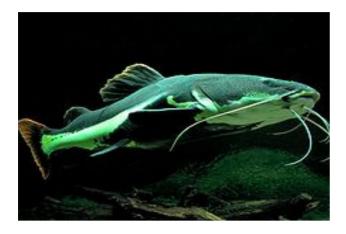


Common Carp

The Common carp is a widespread freshwater fish of eutrophic waters in lakes and large rivers in Europe and Asia. The wild populations are considered vulnerable to extinction, but the species has also been domesticated and introduced into environments worldwide, and is often considered an invasive species.

#### **Tropical Streams and Rivers**

You are now entering our tropical streams and rivers section. Here you can continue the journey seeing freshwater fish, amphibians and reptiles from the Amazon river basin.



Redtail Catfish



Black Pacu



**Emerald Tree Monitor** 

The Redtail Catfish is a pimelodid (long-whiskered) catfish named for its red or orange caudal fin. In Venezuela it is known as cajaro and in Brazil and even in a few parts of Bay of Bengal it is known as pirarara. This fish originates from South America. Despite reaching a large size, this fish is a common aquarium fish.

It may reach more than 1 metre in total length and 30 kilograms in total weight. It is similar in shape to the piranha and is sometimes confused with the carnivorous fish; the pacu is tall and laterally compressed with large eyes and a slightly arched back, andis also herbivorous. Body color is basic black to gray with spots and blemishes in its mid body. All the fins are black and the pectoral fins are small.

The Emerald Tree monitor, or the Green Tree monitor, is an arboreal monitor lizard. They can grow to 75-100cm. It is known for its unusual coloration, which consists of shades from green to turquoise, topped with dark, transverse dorsal banding. This coloration helps camouflage it in its habitat. It also has an adapted tail and long claws that it uses to grip branches.



Electric Eel



Red Bellied Piranha

The electric eel is an electric fish. It is capable of generating powerful electric shocks up to 600 volts, which it uses for both hunting and self-defense. It is an apex predator in its South American range. Despite its name it is not an eel but rather a knifefish. They are not closely related to true eels but as a member of the knifefish family they are more closely related to catfishes. Electric eels have an elongated, cylindrical body, typically growing to about 2 m.

This species lives in the Amazon River Basin, coastal rivers of northeastern Brazil. The red-bellied piranha has the reputation for being one of the most ferocious freshwater fish in the world. They have a set of razor sharp teeth which are capable of stripping flesh from prey and dead animals. As their name suggests, they have a reddish tinge to the belly when fully grown, although juveniles are a silver colour with darker spots. They grow to a maximum length of 33 cm.

# **Africa**

The first tank you will see is our Lake Malawi exhibit.



Lake Malawi is one of the Great Rift Valley lakes on the African continent, and just like the other Great Rift Valley lakes it is famous for its rich wild life. Aquarists appreciate the myriad of different cichlid species than can be found in Lake Malawi. Lake Malawi is a 40,000 year old lake and a lot of the cichlid species have developed in Lake Malawi and can be found nowhere else in the world. Lake Malawi is a large lake and contains several different environments: the rocky shores, the sandy bottom and the large open water areas. Malawi cichlids are found in all these environments and they have developed to fit into each niche. Lake Malawi is 560 km long and 75 km wide at the widest point, which gives it a total surface area of almost 30,000 square km. Three different countries share Lake Malawi: Malawi, Tanzania and Mozambique. Aquarists usually divide Malawi cichlids into two main groups: Mbuna cichlids and Peacock cichlids. Mbuna means rock-dweller in one of the local languages, and it is a very suitable name for these cichlids since they inhabit the shallow and rocky regions along the shores of Lake Malawi. Mbuna cichlids are also found around the shores of the islands in Lake Malawi. These cichlids will typically display a strong, pastel coloration. The male is more vividly coloured than the female. When two male Mbuna cichlids live near each other, the weakest one can dampen his colours and look more like a female in order to reduce aggression. Since Mbuna cichlids spend their lives among rocks, caves and crevices it comes as no surprise that they are cave breeders. The Peacock cichlids are instead found in the open waters in Lake Malawi. In the wild, Mbuna cichlids and Peacock cichlids hardly ever meet each other. The name Peacock is derived from the vibrant coloration displayed by the male Peacock cichlids. Female Peacock cichlids have a duller and more camouflaging coloration. Peacocks are often carnivores, but some of the species feed on zooplankton. Peacock cichlids are mouth brooders, which means that they female Peacock cichlid will guard the eggs inside her mouth.

## **The Frog Room**

The frog room is home to our amphibians and reptiles. Here you can find many colourful species.





Phantasmal Poison Dart Frog

**Dyeing Poison Dart Frog** 





Golden Mantella

Green and Black Poison Dart Frog

Poison dart frog is the common name of a group of frogs in the family Dendrobatidae which are native to Central and South America. These species are diurnal and often have brightly-colored bodies. Although all wild dendrobatids are at least somewhat toxic, levels of toxicity vary considerably from one species to the next and from one population to another. Many species are critically endangered. These amphibians are often called "dart frogs" due to the Amerindians' indigenous use of their toxic secretions to poison the tips of blowdarts. However, of over 175 species, only three have been documented as being used for this purpose.

### **Land Meets Water**

The first tank you will see is our Caiman exhibit. This tank is still a freshwater exhibit and is the last one you will encounter on your journey.



Cuvier's Dwarf Caiman

The Cuvier's dwarf caiman is a relatively small crocodilian reptile from northern and central South America. It is found in Bolivia, Brazil, Colombia, Ecuador, French Guiana, Guyana, Paraguay, Peru, Surinam and Venezuela. It lives primarily near fast stretches of stream, but also in nutrient-deficient waters. With a total length of up to 1.6 m in males and typically up to 1.2m in females, it is the smallest extant species of crocodilian. Juvenile dwarf caimans eat invertebrates, while adult caimans eat both fish and invertebrates. It uses burrows as shelter during the day, and lays eggs on a mounded nest which hatch in about three months.



Freshwater Angelfish

Angelfish originate from the Amazon River, Orinoco River and Essequibo River basins in tropical South America. They are unusually shaped for cichlids being greatly laterally compressed, with round bodies and elongated triangular dorsal and anal fins. This body shape allows them to hide among roots and plants. Angelfish are ambush predators that form monogamous pairs. Eggs are generally laid on a submerged log or a flattened leaf. As is the case for other cichlids, brood care is highly developed.

### **Mangrove**

Our Mangrove tank is a brackish water exhibit; this means that the water is slightly salty. It has more salinity than freshwater but less than seawater.



The Archerfish are a family (Toxotidae) of fish known for their habit of preying on land based insects and other small animals by literally shooting them down with water droplets from their specialised mouths hitting prey 1-5m away.

Archer Fish



**Spotted Scat** 

Spotted Scat have a very slim, laterally compressed body, which is almost disc-like in outline. It is coloured grey to green, and is marked by big circular spots that vary in colour from a dark green to black. Under natural conditions these fish are found in brackish water. Even though the spotted scats grow to 12 inches long in their natural environment, aquarium specimens rarely exceed 4 inches. They're active, harmless fish, and turn out to be very tame when acclimatised.

### **Coral Cave**

Our Coral Cave exhibit is home to around 200 of our tropical marine fish.



**Regal Tang** 



Raccoon Butterflyfish



Blue Spotted Ribbontail Ray

The Regal Tang is a species of Indo-Pacific surgeonfish. As a juvenile, its diet consists primarily of plankton.
Adults are omnivorous and feed on plankton, but will also graze on algae.
Spawning occurs during late afternoon and evening hours. This event is indicated by a change in color from a uniform dark blue to a pale blue.

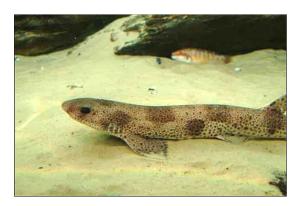
The raccoon butterflyfish is also known as the crescent-masked butterflyfish or lunule butterflyfish. It is found in the Indo-Pacific region and in the southeast Atlantic. Its length is up to 20 cm. In captivity, the typical lifespan of a raccoon butterflyfish is five to seven years.

The blue spotted ribbontail ray is a species of stingray. Found from the intertidal zone to a depth of 30 m, this species is common throughout the tropical Indian and western Pacific Oceans in coral reef-associated habitats. It is a fairly small ray, not exceeding 35cm in width, with a mostly smooth, oval pectoral fin disc, large protruding eyes, and a relatively short and thick tail with a deep fin fold underneath. It can be easily identified by its striking color pattern of many electric blue spots on a yellowish background, with a pair of blue stripes on the tail.

### **Rock Pool**



Thornback Ray



Lesser Spotted Dogfish



Common starfish

The Thornback ray is found in coastal waters of Europe and the Atlantic coast of Africa. Its natural habitats are open seas and shallow seas. The thornback ray is probably one of the most common rays encountered by divers. Like all rays, it has a flattened body with broad, wing-like pectoral fins. The body is kite-shaped with a long, thorny tail. The back is covered in numerous thorny spines, as is the underside in older females. Adult fish can grow to 1m in length, although most are less than 85 cm.

The small-spotted catshark or lesser spotted dogfish is found on the continental shelves and uppermost slopes off Norway and the British Isles south to Senegal, including the Mediterranean. Its length is up to 1 m and it can weigh more than 2 kg. It is found primarily over sandy, gravelly or muddy bottoms at depths of a few metres down to 400m.

The Common Starfish is the most common and familiar starfish in the north-east Atlantic. It has five arms and usually grows to between 10 and 30 cm across, although larger specimens (up to 52 cm across) are known. The Common Starfish is usually orange or brown, and sometimes violet; deepwater specimens are pale. The Common Starfish is to be found on rocky and gravelly substrates.

#### **Caribbean Reef Exhibit**



#### **Sand Tiger Shark**

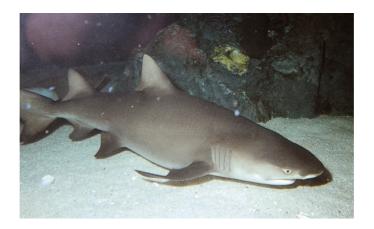
We have 7 Sand Tiger sharks in our Caribbean Reef Exhibit. 4 of them are males and 3 of them are females. They are called Alfie, Fergal, Cloud, Flare, Betty, Wilma and Storm.

Alfie, Fergal and Betty are juvenile sharks. This means they are our younger sharks, and you can tell them apart because they have all got lots of spots on their sides.

Storm is our largest shark in the tank.

Flare is the shark in the picture above, he has a dislocated jaw which is why his teeth stick out of his mouth quite a lot mote than our other sand tiger sharks.

Sand Tiger Sharks can be mainly found around North America, Japan, Australia and South Africa. They go by many different names across the world such as Grey Nurse Sharks and Ragged Tooth Sharks.



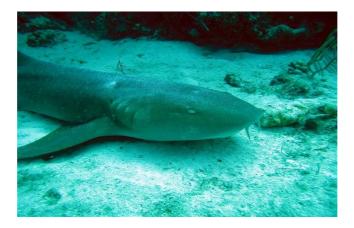
#### **Lemon shark**

Our Lemon shark is called Sunrise and he is a male.

We only have one Lemon shark in our Caribbean Reef Exhibit as Lemon sharks are notorious pack hunters.

He is a darker grey colour than the other sharks in our exhibit, and normally swims a lot faster than the other sharks as well.

He is a very intelligent shark and can sometimes be found resting on the bottom of the tank on the sand.



#### **Nurse Shark**

We have 2 Nurse Sharks in our Caribbean Reef Exhibit.

They are a male and a female; and they are called Sundance and Cassidy.

Our Nurse Sharks do spend a lot of the time lying on the bottom of our tank; this is quite normal behaviour for this species of carpet shark.

The nurse sharks have mouths like hoovers, so they do not have any sharp teeth like the lemon shark or our sand tiger sharks.



#### **Zebra Shark**

We have 1 zebra shark in our Caribbean Reef Exhibit and her name is Dotty.

The reason why Dotty is called a zebra shark is because when they are younger they do have stripes, much like a zebra. However when they mature their stripes turn into spots, which is how Dotty got her name!

Dotty is a very friendly shark and can often be seen near our divers when they are in our tank.

Just like our nurse sharks Dotty is also a species of carpet shark, so again you may find her quite often, lying on the bottom of the tank.

# Reef Magic

The centre of our tunnel is home to some more species of our tropical marine fish.



Clownfish are native to warmer waters of the Indian and Pacific oceans, including the Great Barrier Reef and the Red Sea. While most species have restricted distributions, others are widespread. Clownfish live at the bottom of shallow seas in sheltered reefs or in shallow lagoons.

Common Clownfish



Pyjama Cardinalfish

The Pyjama Cardinalfish is a popular aquarium fish. It grows to a total length of about 8.5cm and features distinctive red eyes and a broad dark vertical 'waistband' with scattered red spots toward the tail. It is distributed throughout much of the West Pacific, from Java to Fiji, and from the Ryukyu Islands south to the Great Barrier Reef. In Pyjama Cardinalfish, males incubate the eggs in their mouth until they hatch

### The Reef Section

Our Caribbean Reef Exhibit is split into two parts. The main section of the tank houses our larger sharks, but when you enter the second part of our underwater tunnel you are in the reef section. Here is the home to our smaller species of sharks, our juvenile rays and fish that are too small to be in our main tank.



Blacktip Reef Shark



Cownose Ray

The Blacktip reef shark is a species of Requiem shark, easily identified by the prominent black tips on its fins. It prefers shallow water and can often be seen swimming close to shore with its dorsal fin poking up through the waves. The Blacktip Reef Shark can be spotted around the world. It is especially common throughout the near shore waters of the tropical and subtropical Indo-Pacific.

The Cownose Ray is a species of Eagle Ray found through out a large part of the Western Atlantic and Caribbean. A cownose ray is typically brown-backed with a whitish or yellowish belly. Although its coloration is not particularly distinctive, its shape is easily recognizable. It has a broad head with wide-set eyes, and a pair of distinctive lobes on its subrostral fin (cow nose).

### **Venom**

Our Venom section is home to many creatures, from Lionfish to Tarantulas and Vipers!



Lionfish are a genus of venomous marine fish found mostly in the Indo-Pacific. They are characterised by red, white and black bands, showy pectoral fins and venomous spiky fin rays. They vary in size from 6.2 to 42.4 cm.

Lionfish



Greenbottle Blue Tarantula



**Eyelash Viper** 

These tarantulas live in webbed burrows under bushes and tree roots in desert areas of northern Venezuela. The entrance to the burrow is often extended with webbing, sometimes resembling a tunnel. These webs may protect the entrance from the harsh desert climate, and also act as a trap for insects.

The **Eyelash viper** is a venomous pit viper species found in Central and South America. They are small and arboreal. It's most distinguishing feature, and origin of its common name, is the set of modified scales over the eyes that look much like eyelashes. The eyelashes are thought to aid in camouflage, breaking up the snake's outline among the foliage where it hides. They occur in a wide range of colors, including red, yellow, brown, green, even pink, as well as various combinations thereof.