

PINNIPED ROUTE

EXPLORE THE OCEANOGRÀFIC'S
SEALS, WALRUSES AND SEA LIONS



OCEANOGRÀFIC
VALÈNCIA

HELLO!

WE ARE THE PINNIPED FAMILY

A group of marine mammals perfectly adapted to life both on land and in the water. In fact, our name comes from Latin and means:

Pinniped = *pinna* → flipper = Feet shaped like flippers
***pedis* → foot**

We live in the ocean, so we are perfectly adapted to this environment:

OUR ADAPTATIONS

FLIPPERS INSTEAD OF LEGS

Our legs evolved into flippers, perfect for swimming, turning and diving.



HIDRODINAMIC BODY

Our long, streamlined bodies help us move smoothly through the water.



THICK LAYER OF FAT

Beneath our skin, we have a thick layer of fat that protects us from the cold and helps us store energy.



HIGHLY SENSITIVE WHISKERS

Our whiskers, called vibrissae, can detect vibrations in the water and help us find food even when we can't see it.



SKILLED DIVERS

We can hold our breath for many minutes thanks to our large lungs and our blood's ability to store lots of oxygen.



WE DIVIDE IN THREE FAMILIES



Phocidae

Seals

Short flippers and no visible ears

18 SPECIES



Odobenidae

Walruses

With large tusks and live only in the Arctic

1 SPECIES



Otariidae

Sea Lions

Short flippers and visible ears

15 SPECIES

¿Did you know?

Nowadays we are marine mammals, but our ancestors were land animals that evolved to live in the water. In fact, we share common ancestors with the mustelid family, including otters



MODEL OF
WALRUS



**SOUTH AMERICAN
SEA LION**



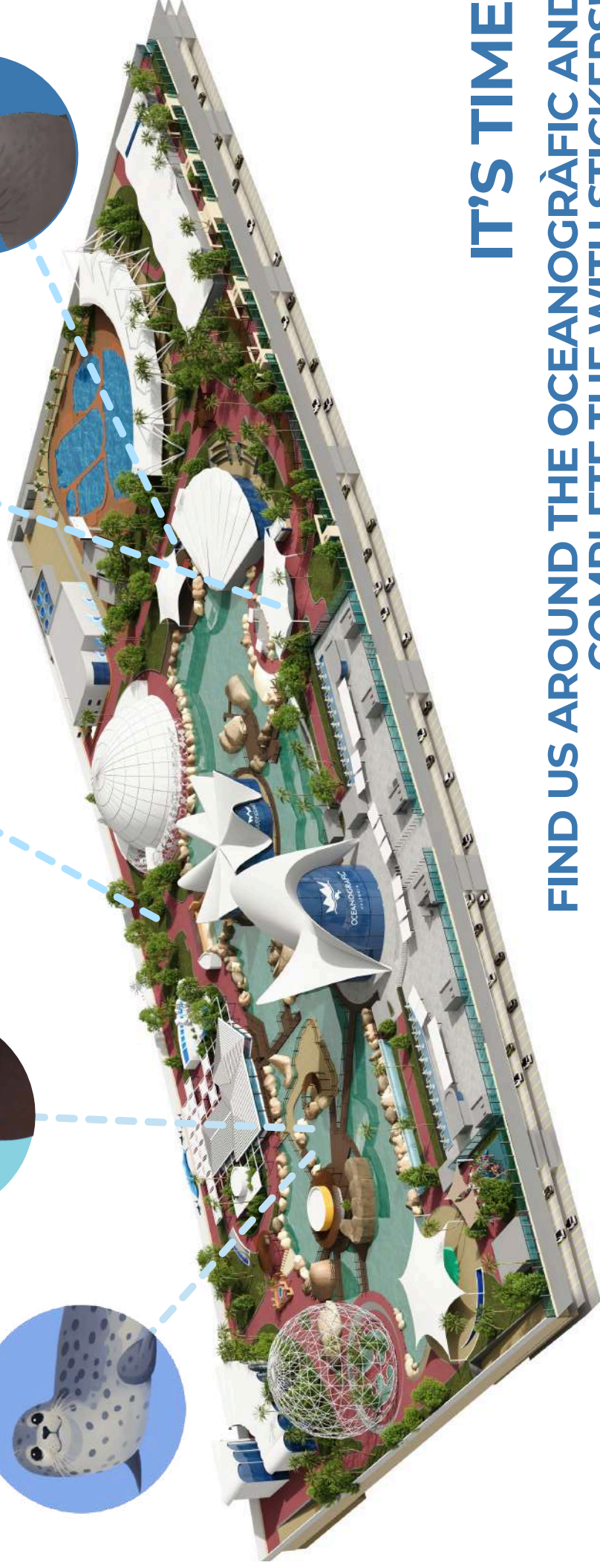
MODEL OF
**SOUTHERN
ELEPHANT SEAL**



**CALIFORNIAN
SEA LION**



**HARBOUR
SEALS**



IT'S TIME!

**FIND US AROUND THE OCEANOGRÀFIC AND
COMPLETE THE WITH STICKERS!**

HARBOUR SEAL

Phoca vitulina

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UNDERWATER NAPS

You may have seen us sleeping underwater through the acrylic window. We can take short naps beneath the surface for 5 to 10 minutes thanks to our strong lungs.



PEACEFUL AND SOLITARY

You will usually see us swimming or diving calmly. Unlike sea lions, we are naturally quieter and shyer animals.

CLUMSY ON LAND

We have very short flippers and cannot walk on land. Instead, we move across beaches and rocks by bouncing along on our bellies.



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CALIFORNIAN SEA LION

Zalophus californianus

GREAT AGILITY

Unlike seals, we can rotate our back flippers forward, which allows us to walk easily on land. We also are fast and agile swimmers.



CARING MOTHERS

After a 12-month pregnancy, we care and nurse our pups for about a year. We also teach them how to swim and hunt.

VERY SOCIAL

We live in large colonies where we constantly interact with each other. We sleep close together and use vocalizations all the time to communicate. Even the youngest learn how to survive by copying other members of the group.



SOUTH AMERICAN SEA LION

Otaria byronia

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SEXUAL DIMORPHISM

Males and females look very different and are easy to tell apart. Males are much larger than females, with a difference of almost 200 kilos in weight.

LOUD ROARS

We communicate through loud roars. We males have especially deep and powerful roars that help us defend our territory.



LION'S MANE

We males have a large mane around the neck that protects us from other males and helps us attract females. In fact, this is one of the reasons why we are called sea lions.



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MODEL OF WALRUS

Odobenus rosmarus

SPECIALIZED DIET

In this model, you can see how we feed. With our heads facing down, we use our whiskers and tusks to dig up 6,000 molluscs a day.



HUGE TUSKS

Our tusks, which can grow up to 1.5 metres long, help us pull ourselves out of the water by anchoring into the ice, defend ourselves and find food.

GIANTS OF THE ARCTIC

We are one of the largest pinniped species. Males can weigh 1,500 kilos, while females can reach around 800 kilos. Much of this weight comes from our thick layer of fat, which keeps us protected from the cold.



MODEL OF SOUTHERN ELEPHANT SEAL

Mirounga leonina

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IMPRESSIVE NOSE

We males have a huge, flexible nose that we can inflate like a balloon. This makes our calls much louder, helping us attract females and show who is in charge of the colony.

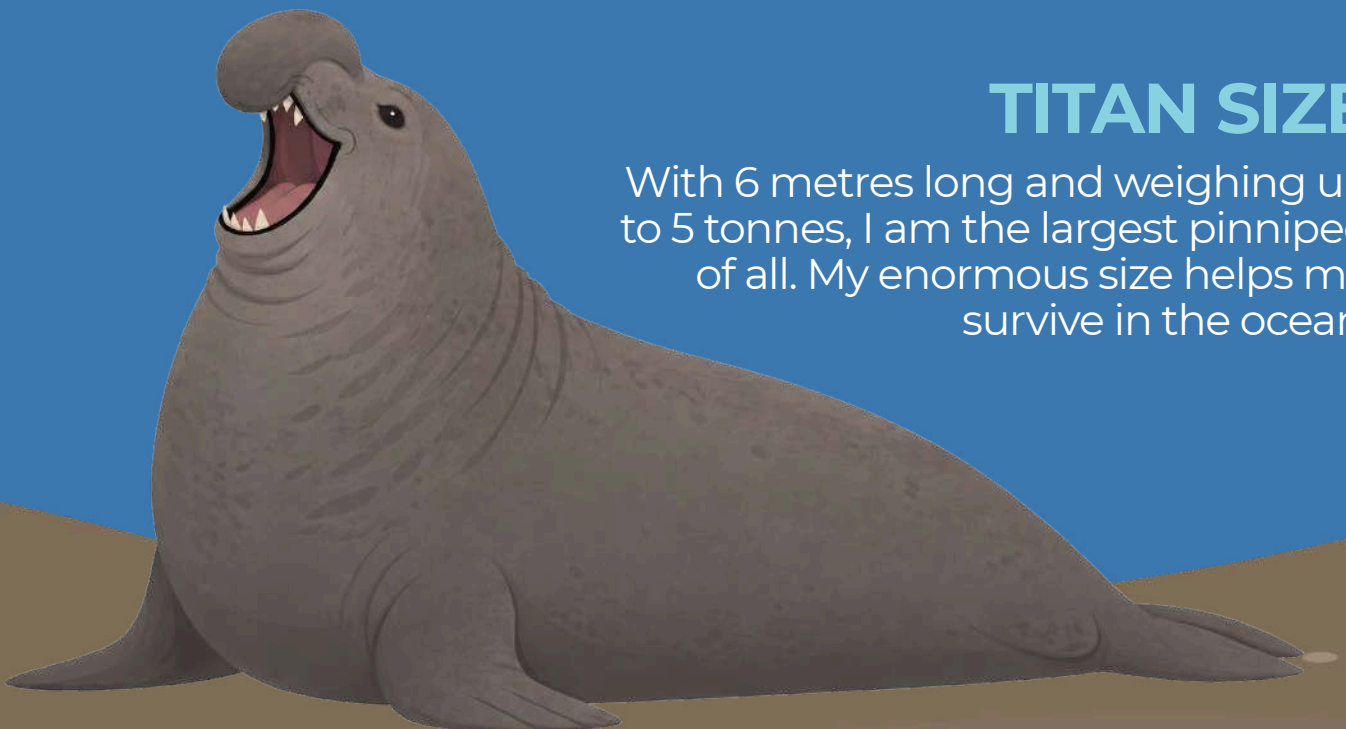
GROUP UNDER CONTROL

I defend the females in my group from other males using loud calls and fights, even to the death if necessary.



TITAN SIZE

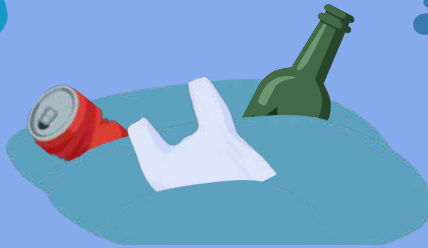
With 6 metres long and weighing up to 5 tonnes, I am the largest pinniped of all. My enormous size helps me survive in the ocean.



BUT PINNIPEDS FACE HUGE THREATS:



Overfishing



Pollution



Climate change

YOU CAN ALWAYS GIVE US A HAND (OR FLIPPER) WITH A FEW SMALL CHANGES:



Use public transport



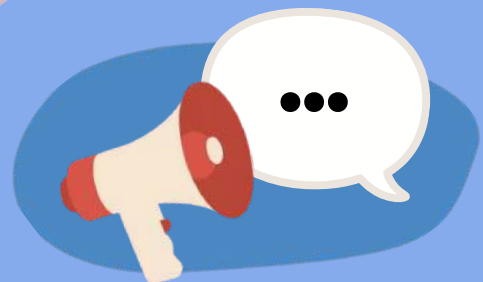
Eat seasonal food



Save energy



Reduce your use of plastic



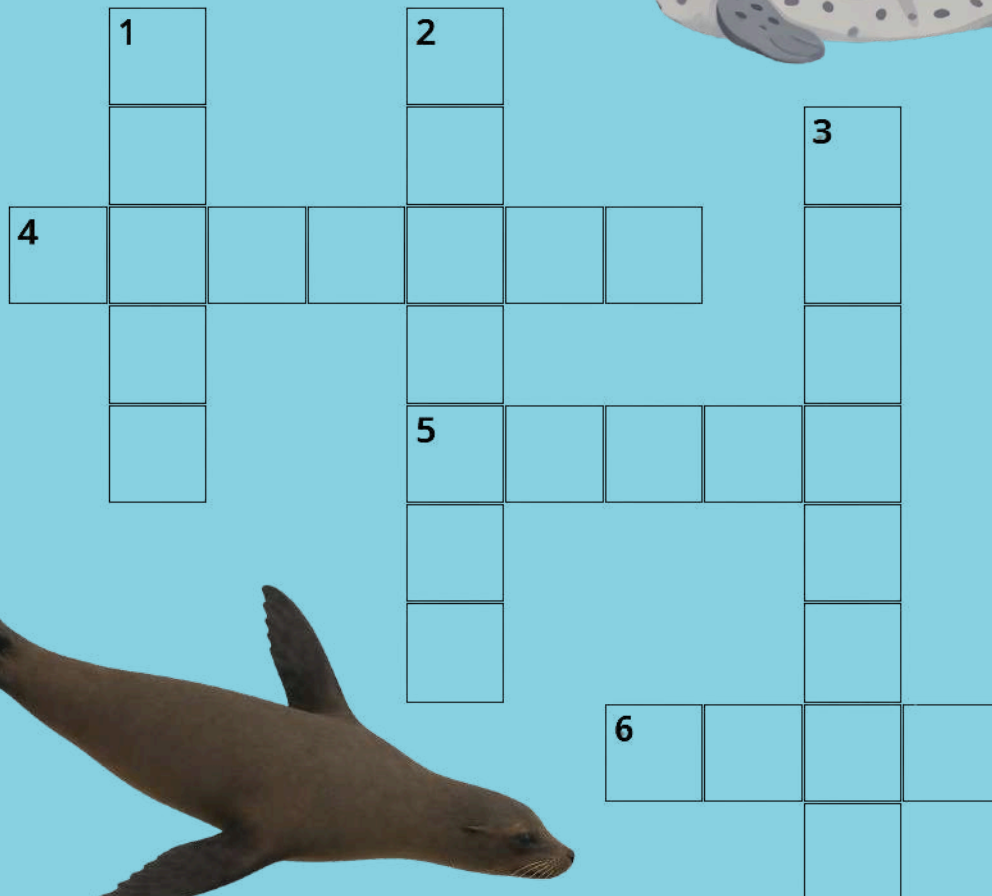
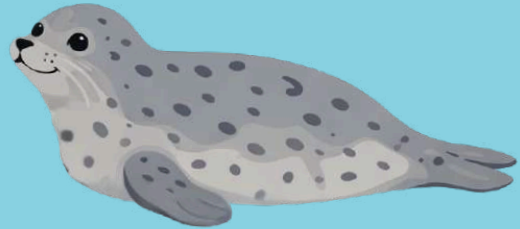
Share what you have learned

The Fundació Oceanogràfic also helps protect pinnipeds through research and conservation projects focused on different species.



LET'S SEE WHAT YOU'VE LEARNED!

Throughout the day, you've learned lots of things about us, so now we invite you to complete this crossword puzzle:



CLUES

1. How sea lions communicate.
2. Reducing its use helps us survive.
3. We use these to detect vibrations in the water.
4. The animal group that pinnipeds belong to.
5. Walruses use these to pull themselves out of the water.
6. Seals do not have these on their heads.





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