


Puffer Fish

Worksheets

Name: _____

Fish Anatomy

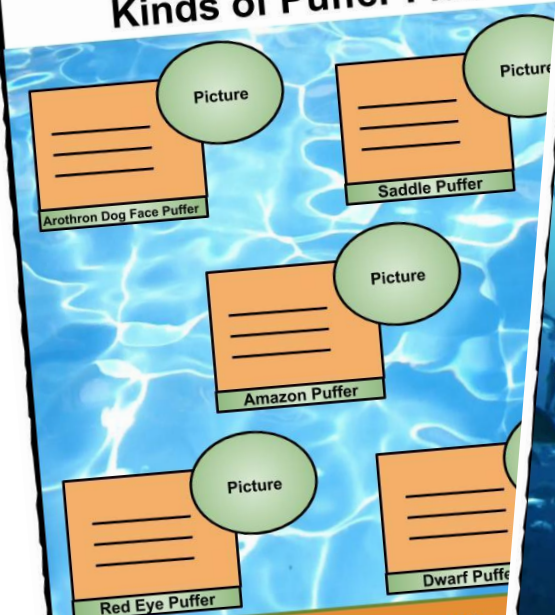


Puffer fish

The puffer fish is recognizable because of its unique defense mechanism. Look back on your elementary fish knowledge and label the parts.

Name: _____

Kinds of Puffer Fish



Picture

Arothron Dog Face Puffer

Picture

Saddle Puffer

Picture


Amazon Puffer

Picture

Red Eye Puffer

Picture

Dwarf Puffer




Puffer fish

There are more than 120 species worldwide and most of them are let creatures and humans. Let us make profile using some of its kind.

Name: _____

3 Classes of Fish



Pufferfish

Using the description, label the classes of fish and give at least two examples per category. You can do additional research to help you.

These primitive fish have no jaws, do not have paired fins, and have a skeleton made of cartilage.

Examples:

- _____
- _____

Picture

Picture

These fish have a skeleton made of cartilage, paired fins, and no swim bladder. Their skin has tooth-like scales. Fertilization of eggs is internal.

Examples:

- _____
- _____

Picture

Picture

These fish have a skeleton made of bone and paired fins. They also have teeth that are fixed onto the upper jaw.

Examples:

- _____
- _____

Picture

Picture

Contents

1. Puffer Fish Facts
2. Fish Anatomy
3. Kinds of Puffer Fish
4. 3 Classes of Fish
5. Fish Codes
6. Something Fishy
7. Fill Fish Fact
8. Scientific Classification
9. Self Defense Move
10. Venom Profile
11. Puffer Fish Day

Puffer Fish **Facts**



Scientific Name:

Tetraodontidae

Phylum: Chordata

Class: Actinopterygii

Order: Tetraodontiformes

Diet: Omnivore

Life Span: 4 to 8 years

Habitat: Shallow waters and coral reefs

Average size: 7 in to 24 in

The puffer fish, also known as blown fish or toadfish, is a unique species of fish popular for its inflatable body and sharp poisonous spines as a defense mechanism.

Puffer Fish Anatomy and Habitat

- ★ Puffer fish can be found in a variety of colors including grey, yellow, blue, white and brown. Some find it hard to identify them when they're not inflated.
- ★ They mostly live in the warm waters of the Indian, Pacific and Atlantic Oceans, while some species can be found in freshwater.

Pufferfish Facts

- ★ Unlike common fish with scales, puffer fish have thick and rough skin. Other species have spines on their skin. Its stomach area is the most elastic part of the body.
- ★ They have four teeth fused like a beak used to open shellfish, clams and mussels.
- ★ At the age of five, puffer fish reach maturity and are ready to reproduce. Male puffer fish guide females near to the shore where three to seven eggs are laid. Young puffer fish are protected by a hard eggshell while they float on the surface of the water. A week later, the egg hatches and a young puffer fish swims towards the reef.
- ★ Male puffer fish spend seven to nine days creating underwater crop circles in the sand consisting of intricate patterns to attract females.



Photo of a Porcupine Puffer Fish
Unique but Deadly Venom

- ★ The main feature of puffer fish is its ability to enlarge its body when threatened. Its body is covered with poisonous spikes, which are highly toxic to both animals and humans.
- ★ Almost all species of puffer fish contain tetrodotoxin, which can be 1,200 times stronger than cyanide.
- ★ In order to enlarge their body in a second, puffer fish ingest large amounts of water, turning them into ball-like creatures that a predator may find scary or too large to swallow.

Pufferfish Facts



- ★ While a single puffer fish can kill 30 adult humans, Japanese people have a very expensive delicacy made of puffer fish. Fugu is a Japanese delicacy made of puffer fish meat and only served by specially trained chefs.

Wobbegong Eating a Puffer Fish

- ★ The only species immune to puffer fish toxins are sharks. They can eat as many as they want without negative consequences.
- ★ Experts believed that puffers developed such a unique ability because they are generally poor swimmers that cannot escape predators. In addition, the brighter colors of puffer fish is associated with the amount of toxin produced.
- ★ The tetrodotoxin present in puffer fish is also present in triggerfish and blue-ringed octopus. It works by paralyzing the diaphragm, causing respiratory failure. As of today, there is no known antidote for such toxin.



Japanese fugu

- ★ Fugu chefs are trained for three years before preparing puffer fish sashimi. Between 1996 to 2006, there were 44 recorded incidents of fugu poisoning in Japan.

Pufferfish Facts

Puffer Fish Poisoning Symptoms

- ★ Generally, symptoms of puffer fish poisoning occur 10 to 45 minutes after ingestion. A person begins to feel numbness and tingling around the mouth. In addition, excessive salivation, nausea, abdominal pain and vomiting follows. Moreover, limbs start feeling weak followed by difficulty in breathing.
- ★ It may progress to paralysis, loss of consciousness, respiratory failure and can cause death.
- ★ A person should immediately seek medical attention after initial symptoms appear.
- ★ If a patient survives puffer fish poisoning with 24 hours, recovery is still possible. However, in severe cases where respiratory muscles get paralyzed, it can be fatal.

Additional Spiky Facts

- ★ Male white-spotted puffer fish are known for making nests in the sand to attract females.
- ★ In a different purpose, masked puffer fish males used their nests made of sperm for hiding from predators.
- ★ Some puffer fish, like the spotted green puffer, pignose puffer and bronze puffer can survive in large home aquariums but cannot be housed with other fish due to their aggressive behavior.
- ★ Stellate puffer fish is considered the largest of its kind, reaching four feet in length. On the other hand, the dwarf puffer fish is difficult to spot as it rarely reaches one inch.
- ★ Generally, they can change their color in response to the environment.

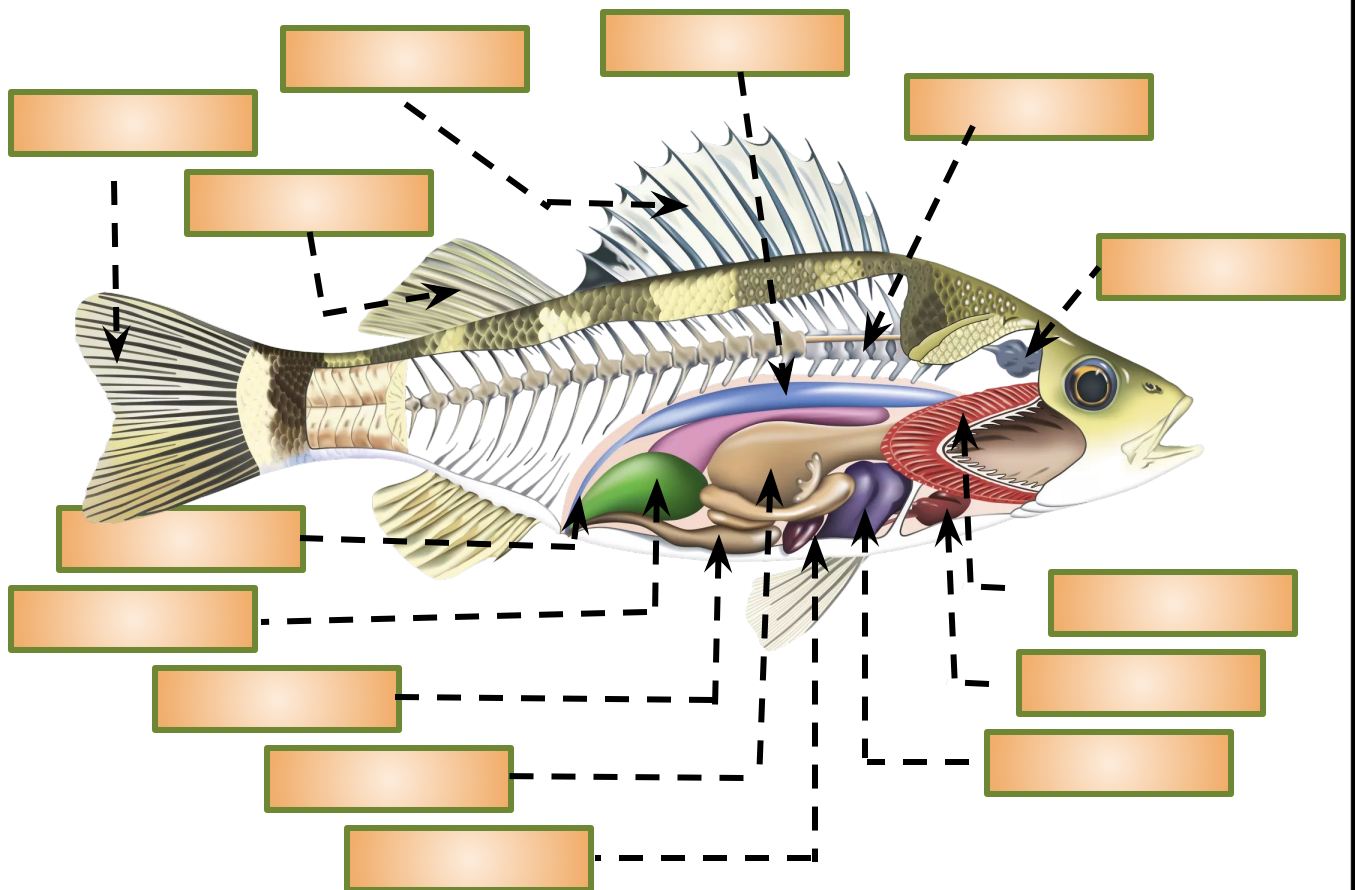
Name: _____

Fish Anatomy



Puffer fish

The puffer fish is recognizable because of its unique defense mechanism. Look back on your elementary fish knowledge and label the parts.

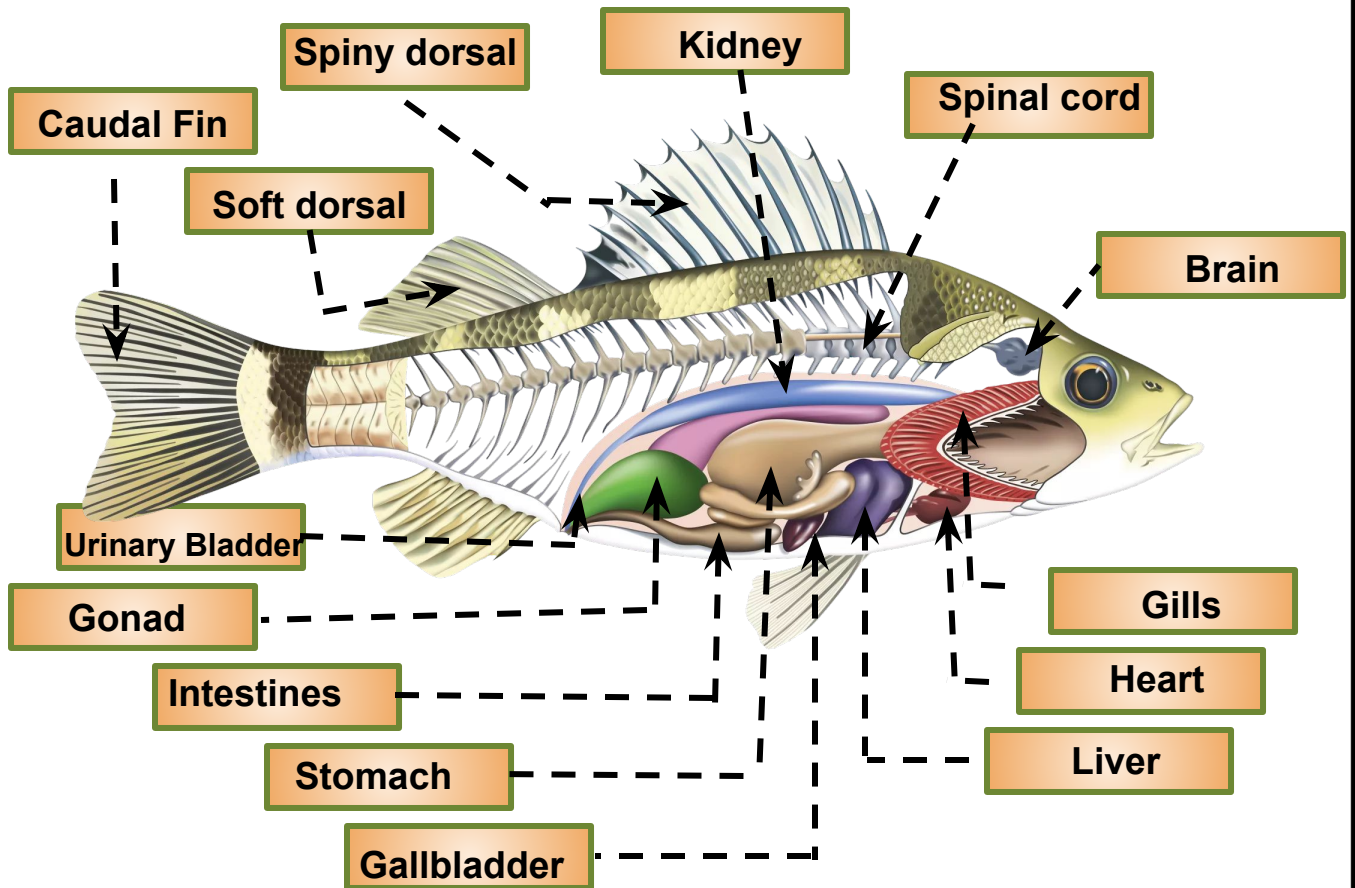


Fish Anatomy



Puffer fish

Answer Key



Name: _____

Kinds of Puffer Fish

Picture

Picture

Arothron Dog Face Puffer

Saddle Puffer

Picture

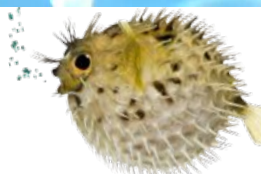
Amazon Puffer

Picture

Picture

Red Eye Puffer

Dwarf Puffer



Puffer fish

There are more than 120 species of puffer fish worldwide and most of them are lethal to both sea creatures and humans. Let us make a puffer fish profile using some of its kind.

Kinds of Puffer fish

Is a peaceful marine species that features large expressive eyes and a sad-looking small mouth. Their hard teeth can easily bite through mollusk shells.



Arothron Dog Face Puffer

The Saddle Valentini Puffer is a bright and colorful fish with dark brown bands across the midsection, brownish-orange spotting on the lower half, yellow fins, and blue striping running along the back.



Saddle Puffer

Is a very popular member of the Tetraodontidae family of puffer fish. This is a peaceful fish, almost to the point of being shy so they cannot be kept with aggressive tank mates.



Amazon Puffer

The Red Eye Puffer is completely freshwater, with no salt at all being needed. They are small puffers with a big personality and even bigger attitude.



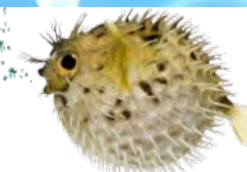
Red Eye Puffer

Dwarf Puffers are naturally found in slow-moving waters in south-west India, such as the Pamba river. This is known as the smallest puffer fish.



Dwarf Puffer

Answer Key



Puffer fish

Name: _____

3 Classes of Fish



Pufferfish

Using the description, label the classes of fish and give at least two examples per category. You can do additional research to help you.

These primitive fish have no jaws, do not have paired fins, and have a skeleton made of cartilage.

Examples:

-
-

Picture

Picture

These fish have a skeleton made of cartilage, paired fins, and no swim bladder. Their skin has tooth-like scales. Fertilization of eggs is internal.

Examples:

-
-

Picture

Picture

These fish have a skeleton made of bone and paired fins. They also have teeth that are fixed onto the upper jaw.

Examples:

-
-

Picture

Picture

3 Classes of Fish

Answer Key



Puffer fish

Jawless fish

These primitive fish have no jaws, do not have paired fins, and have a skeleton made of cartilage.

Examples:

- Hagfish
- Lampreys



Cartilaginous fish

These fish have a skeleton made of cartilage, paired fins, and no swim bladder. Their skin has tooth-like scales. Fertilization of eggs is internal.

Examples:

- Sharks
- Skates

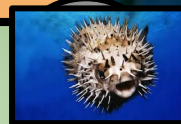


Bony fish

These fish have a skeleton made of bone and paired fins. They also have teeth that are fixed onto the upper jaw.

Examples:

- Puffer fish
- Flying fish



Name: _____

Fish Codes



Puffer fish

Fish are one of the oldest animal families to live on Earth. Using color codes, mix and match SET A and B.

SET A

SET B

Approximately how many species of fish are known worldwide?



Ocean Sunfish

What species of fish produces the most eggs?



Clownfish

What is the fastest fish?



50,000

What is the most poisonous fish?



5,000

What is the largest species of fish?



Stout Infantfish

What is the smallest species of fish?



Tadpole cod

How many teeth can a shark grow during its lifetime?



Whale Shark



Swordfish



Puffer fish



Needlefish



Sailfish



27,000

Fish Codes



Puffer fish

Answer Key

SET A

SET B

Approximately how many species of fish are known worldwide?



Ocean Sunfish



Clownfish



50,000



5,000

What is the fastest fish?



Stout Infantfish



Tadpole cod

What is the most poisonous fish?



Whale Shark



Swordfish

What is the largest species of fish?



Puffer fish

What is the smallest species of fish?



Needlefish

How many teeth can a shark grow during its lifetime?



Sailfish



27,000

Name: _____

Something Fishy



Puffer fish

Read each statement and color **BLUE** if it tells facts about puffer fish and **RED** if not.



They can look at two different things at the same time, as their eyes move independently.



They can change color, turning lighter or darker in response to their environment.



When threatened, they can puff up to make themselves up to ten times larger.



The largest puffer fish is the stellate puffer fish, which can grow up to almost four feet in length.



Puffer fish live only in saltwater.



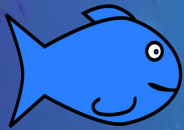
Most puffer fish use a poison called tetrodotoxin that is up to 100x more toxic than cyanide.

Something Fishy

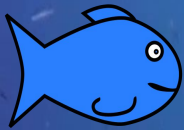


Puffer fish

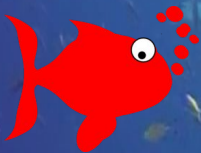
Answer Key



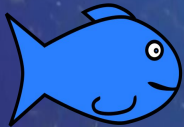
They can look at two different things at the same time, as their eyes move independently.



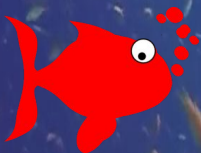
They can change color, turning lighter or darker in response to their environment.



When threatened, they can puff up to make themselves up to ten times larger.



The largest puffer fish is the stellate puffer fish, which can grow up to almost four feet in length.



Puffer fish live only in saltwater.



Most puffer fish use a poison called tetrodotoxin that is up to 100x more toxic than cyanide.

Name: _____

Fill Fish Fact



Puffer fish

Most species of puffer fish are found in tropical and subtropical oceans. Fill in the blanks to complete more facts about puffer fish.

They are scaleless fish and have _____ rough skin.

Puffer fish usually rely on a diet of algae but they can crack open mussel and clam shells with their strong _____ teeth.

_____ eat puffer fish and they are not affected by its poison.

When threatened, the puffer fish can inflate itself up to _____ times its normal size.

The second most poisonous vertebrate on the Earth is the _____.

Puffer fish are also known as Blowfish or _____.

Puffer fish meat is called _____ in Japan where it is a very expensive delicacy, despite being extremely poisonous.

Fill Fish Fact



Puffer fish

Answer Key

They are scaleless fish and have **spiky** rough skin.

Puffer fish usually rely on a diet of algae but they can crack open mussel and clam shells with their strong **beak-like** teeth.

Sharks eat puffer fish and they are not affected by its poison.

When threatened, the puffer fish can inflate itself up to **three** times its normal size.

The second most poisonous vertebrate on the Earth is the **Puffer Fish**.

Puffer fish are also known as Blowfish or **Toad fish**.

Puffer fish meat is called **fugu** in Japan where it is a very expensive delicacy, despite being extremely poisonous.

Name: _____

Scientific Classification

Bandtail Puffer

Kingdom: _____
Phylum: _____
Class: _____
Order: _____
Family: _____
Genus: _____
Species: _____



Binomial Name:

Colomesus asellus

Kingdom: _____
Phylum: _____
Class: _____
Order: _____
Family: _____
Genus: _____
Species: _____



Binomial Name:

Blackspotted Puffer

Kingdom: _____
Phylum: _____
Class: _____
Order: _____
Family: _____
Genus: _____
Species: _____



Binomial Name:



Puffer fish

Let's make puffer fish scientific cards! Do additional research to complete the profile above.

Scientific Classification

Bandtail Puffer

Kingdom: **Animalia**
Phylum: **Chordata**
Class: **Actinopterygii**
Order: **Tetraodontiformes**
Family: **Tetraodontidae**
Genus: **Sphoeroides**
Species: **S.spenglerpia**



Binomial Name:
Sphoeroides spengleri

Colomesus asellus

Kingdom: **Animalia**
Phylum: **Chordata**
Class: **Actinopterygii**
Order: **Tetraodontiformes**
Family: **Tetraodontidae**
Genus: **Colomesus**
Species: **C.asellus**



Binomial Name:
Colomesus asellus

Blackspotted Puffer

Kingdom: **Animalia**
Phylum: **Chordata**
Class: **Actinopterygii**
Order: **Tetraodontiformes**
Family: **Tetraodontidae**
Genus: **Arothron**
Species: **A.nigropunctatus**



Binomial Name:
Arothron nigropunctatus



Puffer fish

Answer Key

Name: _____

Self Defense Move



Puffer fish

All species of puffer fish contain toxins, which can paralyze and kill. Their defense mechanism against danger has made them unique and infamous. Can you describe what puffer fish do in times of danger?

What pufferfish do
when in danger?

- _____
- _____
- _____
- _____
- _____

Name: _____

Venom Profile

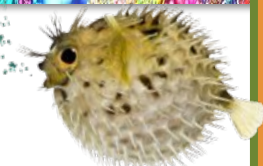


The Puffer fish

Poisoning
Facts

Poisoning
Symptoms

Poisoning
Treatment



Puffer fish

All species except sharks are vulnerable to puffer fish venom. In Asian countries like Japan and Korea, only trained chefs can prepare puffer fish meat. Do some readings to complete puffer fish venom profile.

Venom Profile



The Pufferfish

Poisoning Facts

This is one of the most toxic poisons found in nature. Most people who eat puffer fish do so intentionally as puffer fish are considered an Asian delicacy, served in some types of sushi and sashimi restaurants.

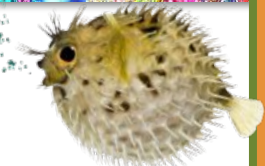
Poisoning Symptoms

Symptoms generally occur in 10-45 mins. After eating, the puffer fish poisoning begins with numbness and tingling around the mouth, salivation, nausea and vomiting. Symptoms may progress to paralysis, loss of consciousness, and respiratory failure and can lead to death.

Poisoning Treatment

Vomiting should be induced if the poisoned person is awake and alert and has eaten the fish within 3 hours. The person may become paralyzed. Artificial respirations may keep the person alive until medical attention in a hospital's emergency department is possible.

Answer Key



Puffer fish

Name: _____

Puffer Fish Day



Puffer fish

Let's finalize your knowledge about puffer fish! Color your own puffer fish and provide fascinating information you learned today.

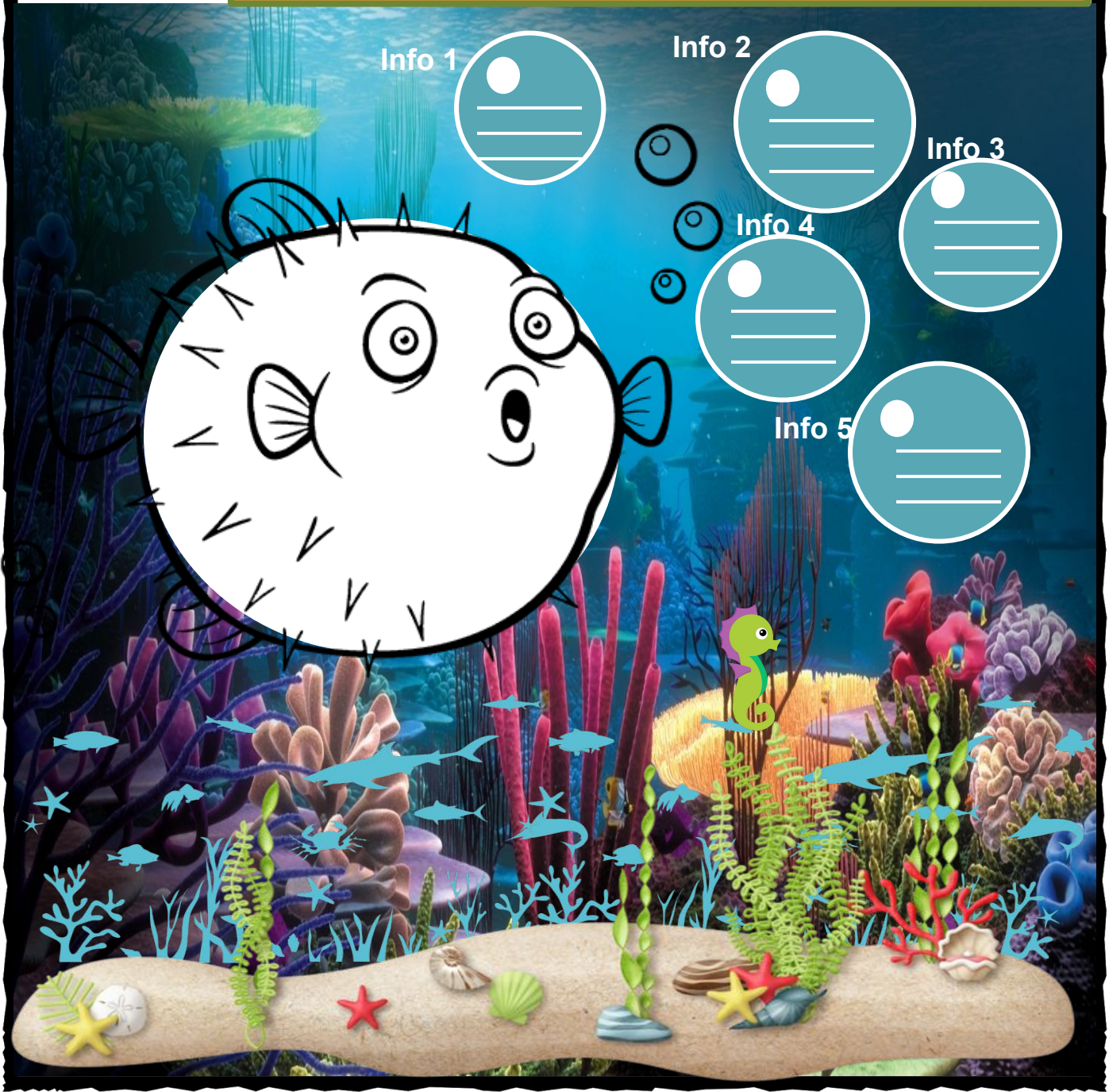
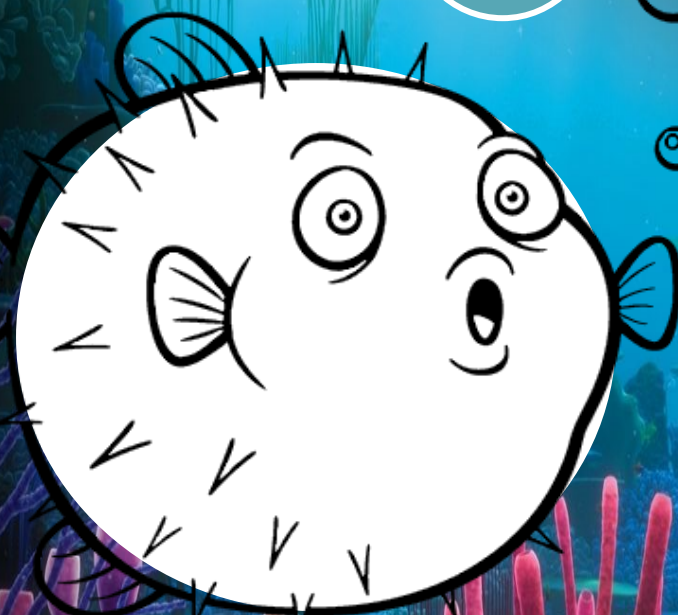
Info 1

Info 2

Info 3

Info 4

Info 5



Copyright Notice

This resource is licensed under the [Creative Commons Attribution-NonCommercial 4.0](https://creativecommons.org/licenses/by-nc/4.0/) International license.

You are free to:

- **Share** — copy and redistribute the material in any medium or format
- **Adapt** — remix, transform, and build upon the material

Under the following terms:

- **Attribution** — You must give appropriate credit, provide a link to the license, and indicate if changes were made. You may do so in any reasonable manner, but not in any way that suggests the licensor endorses you or your use.
- **NonCommercial** — You may not use the material for commercial purposes.

For more information on this license, visit the following link:

<http://creativecommons.org/licenses/by-nc/4.0/>

Thank you!

Thank you

Thank you so much for purchasing and downloading this resource.

We hope it has been useful for you in the classroom and that your students enjoy the activities..

For more teaching resources like this, don't forget to [come back](#) and download the new material we add every week!

Thanks for supporting KidsKonnnect. We can provide teachers with low-cost, high-quality teaching resources because of our loyal subscribers and hope to serve you for many years to come.

- The Entire KidsKonnnect Team :)