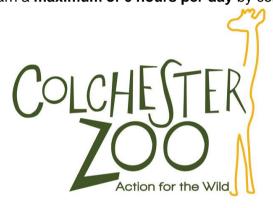
Colchester Zoo Learning at the Zoo Activity Pack 4

This pack is designed to provide parents, families and groups with information and activities to help you learn at Colchester Zoo. Complete the activities to earn Children's University passport stamps! There are four different packs, you can mix and match and complete worksheets from all the packs. Please note, you can earn a maximum of 6 hours per day by completing worksheet pages



If you are working to earn Children's University passport stamps, please complete as many pages of the worksheets as you wish and bring them to Guest Services at the end of your day. The more pages you complete, the more stamps you earn up to a maximum of six hours per day.

Please download and print the pack yourself.
For a small donation we can print this pack on your behalf.





Complete this and the next page to earn CU hours!

Fish Spotter



People sometimes miss all the interesting fish around the zoo. Follow the hints and see if you can find these animals.







Red Lionfish □

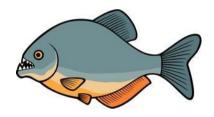
This fish enjoys swimming with the blackspotted puffer fish.



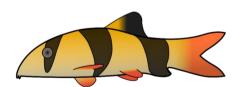
Maroon Clownfish □
These fish live happily with the blue tangs.



This fish has one of the smallest animals at the zoo as their neighbours, who spend their day cutting leaves in the giraffe house.



Red-Bellied Piranha ☐ You'll find these fish watching the visitors in Worlds Apart.



Clown Loach □
These fish swim with the turtles
in the orangutan house.



African Lungfish □
You'll find this fish living at the top of the giraffes and rhinos home.

After finding these fish, write down one cool fact about each of them on the next page. Find information about them on signs near their enclosure, or just by watching what they do and how they act. Record information like: how big they are, what food they like to eat, or anything else you want to remember.



Fish Factsheet:





		Blue Tang
	Red Lionfish	
		Maroon Clownfish
	Koi Carp	
		Blackspotted Puffer Fish
· ·	Red-Bellie	d Piranha
		Clown Loach
	African Lu	ngfish



Umphafa Species Count



Head to the Action for the Wild room (next to the Komodo dragon enclosure) on the back wall are signs about the Umphafa Nature Reserve in South Africa. On the sign in the corner there is a species censes for 2010, 2011 and 2012. From this complete the table below.

Data Table

Number of	2010	2011	2012
Giraffe			
M. Reedbuck			
Warthog			

Create a line graph below from the data in the above table.

Make sure you label the axes and an appropriate scale.

Which species has increased the most?_____





How do you compare to the animals?

As you explore the Zoo there are several challenges for you to have a go at. Below is a list of these challenges with their location number which matches with the numbers on the map on the next page. When you have completed each challenge, write down your results.

Can you stand on one leg as long as flamingo? You can find out at					
Length of time on one leg:					
How fast can you run? See which animals you can out run, and which animals can out run you at Your speed was: Which animal(s) was faster than you?					
Can you lift as much as a spider monkey or as much as a elephant? Found out who is the strongest at our strength test located at					
You could lift the same as:					
How many arm flaps can you do in 10 seconds? Odd question but hummingbirds can flap their wings 50 times in 10 seconds!. Find out if you can keep up at the wing challenge at Number of arm flaps in 10 seconds:					
Can you jump further than a flea or can a flea beat you in a jumping contest? Head to the jumping challenges at You can jump as far as a:					





worth 1 hour - must finish page 1 and 2!



The Plant Hunt - Page 1

Go to the garden opposite Walking with Giants (tortoise enclosure) in the Familiar Friends area of the Zoo. Use the clues below to identify the plants by reading the plant information signs in the garden.

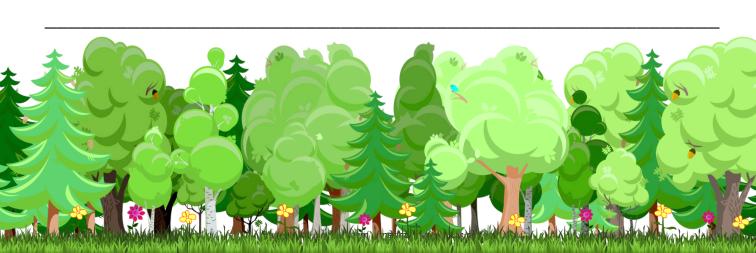
This plant has white flowers and red fruits with smooth grey bark that gets rough with age.

An evergreen shrub used in cooking. If left, the flowers are purple/blue spikes.

Even though this plant is called bamboo, it's not bamboo. It has white flowers and the berries are toxic to cats and grazing animals.

Despite the name, this plant is not native to England. Instead it's native to the Mediterranean.

This plant can grow up to 8 metres tall with honey scented, white flowers. The fruits are not true strawberries, but are orange-red fruits.



The Plant Hunt - Page 2

Tick off the plants when you find them, use the clues to help locate the trickier plants.



Several can be found next to the enclosure of the worlds largest lizard.



Monkey Puzzle Tree □

We have a young monkey puzzle tree, which can be found near the viewing area of a swimming bird from South America.



Eucalyptus Tree \square

The best place to see this tree is at the exit to the home one of the Worlds slowest animals.



This tree looks like an evergreen but it looses its leaves in the winter! This tree can be found in between the homes the Worlds tallest animal the Worlds largest animal.



Weeping Willow □

There are many of these trees around where the wild ducks and swans like to spend their time.





Camouflage Creepy Crawly

Visit the Discovery Centre and watch the stick insects.

·	erent types of stick insects.
Why do you think they look different?	
	ps them hide in the trees. Which part of k insect would be the best at hiding in? ctures.
Hold the Giant Spiny Stick insect.	
What does it feel like?	
and the same of th	
Why do you think it feels like that?	

Please note, you can earn a maximum of 6 hours per day

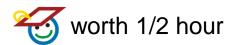


worth 1 hour Talks, and Feeding Times

There are a lot of feeds and talks that happen throughout the day. Check the map (available at Guest Services, Entrance and online) for locations and times.

Ask the keeper at the end of the talks if you need help.

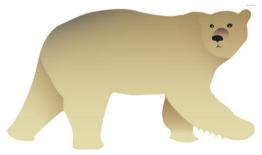
Attend the Humboldt P following questions:	enguin Encounter (Inc	ca Trail) and answer the
How do the keepers tell	the penguins apart ?	
What is the weather like	e in their natural habitat?	? (Circle the correct answer)
Cold and snowy	Hot and dry	Similar to the U.K.'s
What is guano?		
Watch the Amur Leopa	rd Encounter and ansv	ver the following questions
Why are the two Amur le	eopards kept separate fi	rom one another?
How many Amur leopard	d are left in the wild?	
What is happening to he	elp wild Amur leopards?	
Go to the Chimpanzee	Encounter and answer	r the following questions:
What are the names of	three of the chimpanzee	es?
Chimpanzees are (Circ	cle the correct answer)	
Carnivores	Herbivores	Omnivores
What is the roll of the al	pha male?	



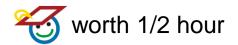
Visit the **Bears of the Rising Sun** lower viewing area to help you answer the questions below.

Using the signs to the left of the bear skeleton, answer the following;

 Count how many teeth you have and compare them to the numb teeth sun bears have. Number of your teeth Difference between the number of your teeth and the bears 	
 Sun bears have 12 incisors, 4 canines, 16 premolars and 4 molathe bottom jaw and 6 molars on the top. Count how many differe types of teeth you have. incisors, canines, premolars, molar 	nt
 Using the mirror, estimate how long your tongue is. Your tongue length Compare with the length of the sun bear's tongue How much longer is the sun bears tongue? 	
Using the sun bear, brown bear and polar bear signs, work out the following: What is the height difference between the sun bear and the brow bear?	'n
 How many sun bears (not standing) would it take to match the hear of the polar bear? 	eight
Using the maximum weight of the bears, what is the combined weight?	
 Weight of the: Sun bear, Brown bear, Polar bear Combined total: 	









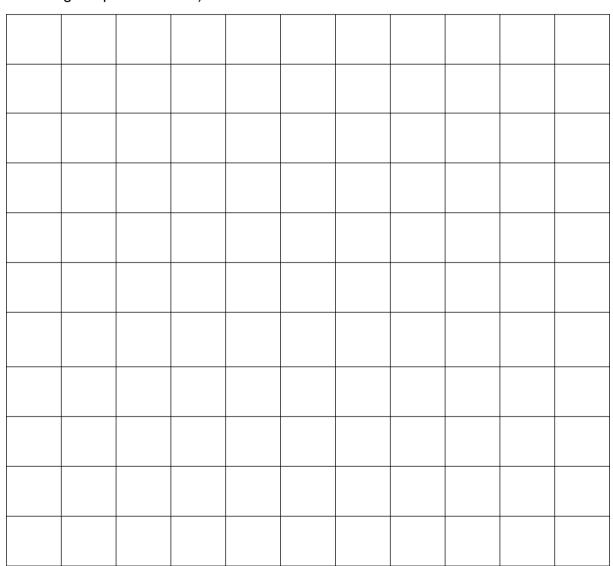
Enclosure Usage

It is important to know how the animals use their enclosure. We can find out if there are areas they prefer or are avoiding and why, as well how much of the enclosure is being used throughout the day.

Head to the mixed African animal enclosure called Kingdom of the Wild, (home of the giraffes).

Step 1 The Plan

On the grid below draw a basic plan of the outside enclosure. Include the location of feeders/food, water, shelters and the mound. (Viewing from the balcony at the top of the house is a good place to draw)

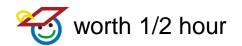


Step 2 Recording

Choose one of the species in the enclosure and over 5 minutes mark where they are every minute. Repeat for a second species .Use a different symbol or colour for each species.

Step 3 The Results

How much of the enclosure is being used? (estimate in fractions, i.e. 1/4 of the enclosure used)					
Can you think of a reason why the animals are in that location?	_				





Animal Enrichment

Environmental Enrichment is a term used to describe various activities that keepers use to encourage natural behaviours from the animals under their care. The purpose of enrichment is to encourage behaviours that are appropriate for that species and that satisfy an animal's physical and psychological needs.

For example providing climbing opportunities for tree dwelling animals, or providing problem solving activities for animals such as the chimpanzees.

Below are pictures of just some of the enrichment done at the zoo. In the boxes below draw some enrichment you have seen and label what animal it was with and a brief description of it.



Giraffe
Food frozen in water
Prolongs feeding and offer
new textures and tastes.



Tiger
Scent on a plastic
boomer ball
Encourages activity and
offers new smells



Otters
Footballs
Encourages activity and social interaction

The animals do not need to be using the enrichment at the time of drawing.





Now bring your completed pages of this workbook to the Guest Services building (located next to the red brick building) so we can stamp your Children's University passport.

PLEASE NOTE, while you can complete as many pages as you'd like from any of the workbooks, YOU CAN ONLY EARN A MAXIMUM OF SIX CU HOURS EACH DAY BY COMPLETING THESE WORKBOOK PAGES

If you have any comments please contact our education team at education@colchesterzoo.org

