

# Question time!

## Questions for Jasper

### **Where are they from?**

Wolves used to be found throughout much of the northern hemisphere, including here in Scotland! Most of our current wolves were born at Highland Wildlife Park and a few joined us from Järvzoo.

### **How many wolves are there in Scotland?**

There are no wild wolves in Scotland

### **How many wolves are there in the World currently? Are any in the wild?**

There are roughly between 200,000 and 250,000 left.

### **How many species of wolves are there? Are there different breeds of wolves?**

There are two widely recognized species of wolves in the world, the red and the gray. However, there is debate over how many species of wolf exist.

### **What year was the first wolf born in, do we know?**

Wolf ancestors began to develop in the Paleocene, about 60 million years ago. By the Miocene, about 20 million years ago, canines and felines had branched into two separate families.

### **Are domesticated wolves dogs?**

Yes, they are a direct descendent of the gray wolf

### **What other countries do they live in? If they were in the wild, where might they be?**

Wolves are native to Eurasia and North America

### **What do wolves do in their den during the day? Do they just rest?**

Wolves only use dens when they have young pups that are not yet able to travel with the pack.

### **Murray is worried that they will be bored in captivity how do you keep them interested?**

Murray, you're quite right that wolves are highly intelligent so need lots of enrichment. It starts with their enclosure, their pack and the way we feed them. Enrichment might also include putting new scents in different forms, providing and hiding food and treats in various different forms and adding in play toys in different forms.

### **Roughly how large will a wolf grow to be?**

Roughly 80 to 85cm and they can weigh up to 80kg if they're an adult male

### **What is the sawdust for in the wolf enclosure?**

Sawdust is used as part of the enrichment Murray was asking about above because it can hold different scents.

### **How far can wolves smell?**

Estimates suggest up to a mile away!

### **What age are the wolves? (In HWP I presume). How old is the youngest wolf there?**

Our oldest in Jax and he's about to turn 9 on 14<sup>th</sup> May. Most of our other wolves were born in 2018 and 2019.

**What are all 5 of their names? :)**

We have Jax, Beinn, Chonzie, Merrick and Storr

**How much do they eat a day?**

Wolves tend not to eat every day and when they do eat, it's roughly 4kg but it's important for our animal care team to vary their diet, including amounts depending on dietary requirements.

**Do they have favourite meat? What are the wolves' main prey?**

Mostly large, hoofed animals such as deer

**Why is it illegal to give the wolves live prey?**

It's not illegal, we just have standards we choose to follow to make sure all animals in our care, including prey species, are cared for as best we can.

**Do you give them the carcass or hide it for them to find?**

Great question – it depends! The more variety, the better!

**How fit and strong are wolves?**

Very!

**How fast can a wolf run?**

Roughly 50 – 60km/h!

**What would happen if a new wolf was introduced to your wolves?**

It completely depends on the group dynamics and our animal care team would do lots in preparation to make sure it was the right combination and prepare over several months before introductions would be made.

**How many babies can a mother wolf have?**

Four to six is an average litter size.

**Has there ever been any accidents at the zoo? Has any human ever gotten too close?**

No, lots of safety measures are in place to make sure all of our animals, visitors and teams working at Edinburgh Zoo and Highland Wildlife Park are safe and happy.

**What is the rarest animal you have at the park?**

Our pine hoverfly str probably the rarest as no one has seen an adult in the wild for a long, long time!

**What is the final stage of a pine hoverfly? from Esli**

The adult is the final stage

**Is the Bluebottle Butterfly still around? Critically endangered?**

Yes, you can find a common bluebottle butterfly in Australia and several areas of Southeast Asia.

**How long do the Pine Hoverflies live for?**

We don't know exact averages yet for the wild but most hoverfly species live for a few weeks.

**How big is the Wildlife Park? How many species do you have?**

The park is 105 ha and we have over 60 species!

**Are there grizzly bears?**

We don't have grizzlies at HWP or Edinburgh Zoo

**How do you feel about having animals in captivity?**

There are lots of benefits to zoos and our job is to help people connect to nature so that more people want to care for all plants and animals.

**Can you name ten of your favourite animals in Edinburgh Zoo?**

There are so many! Binturong, northern rockhoppers, eastern pygmy marmosets, axolotl, royal pythons, sloths, red river hogs, red fronted macaws, red pandas and chimps

**How many snow leopards do you have and how do they survive if it's so warm?**

We have two and it's a similar climate here on the whole so they're very happy!

**Why is there so much deforestation in Scotland?**

The history is quite long and complex. It's important to understand so that we can learn from it and look for opportunities to rejuvenate spaces where we can and should.

**Why are you no longer breeding wolves? Will you just keep the 5 remaining ones until they die?**

The decision to breed any animal in a zoo depends on a few different elements, including their genetics, their wellbeing, the space we currently have and, most importantly, the stud book keepers' advice, to make sure all animals across zoos in the UK, Europe and the world have the highest standards of welfare.

**Why do some hoverflies disguise themselves as wasps?**

We're still learning so much about them! Why do you think they might?

**Do you have penguins?**

Edinburgh Zoo has three species of penguin.

**What is the baby polar bear called?**

Our cub is called Brodie because it means 'second son' and he is the brother of Hamish.

## Questions for Gill

**How long does it take you to write your books?**

It depends – my novels for 8-12 year olds take about 9 months – 3 months of lots and lots of research. 3 months of writing the first draft and 3 months of re-writing. My shorter books, like the Willow Wilwthing series take about 4 weeks per book.

**Where do you get your ideas from for your books?**

Anywhere and everywhere – many start with a news article – something about the wild world that I didn't know about. For example Coltan mining for minerals for mobile phones – the minerals are dug from the earth in places like the Democratic Republic of Congo – where the mining affects the habitats of gorillas and the livelihoods of people there.

I do LOTS of research and for every answer, I find I have ten more questions. I LOVE research because I find out so many things I never knew about. I also meet lots of interesting people and animals

through research. And I also get to do fun stuff, like flying on a paraglider or being rescued (in training sessions) by mountain rescue dogs.

**What sort of age are your books for?**

My younger books are for 4-9 year olds (Willow Wildthing Series and Puppy Academy series) and my other novels are for 8-12 yrs

Questions for Sarah

**How long does it take for cocoa to grow?**

With proper care, cocoa trees begin to yield pods at peak production levels by the fifth year and they can continue at this level for 10 years.

**How long does it take for the cocoa beans to dry?**

Once harvested, cocoa beans need to go through two processes: fermentation and drying. Fermentation helps the beans develop the aromas and flavours, and takes around 5 to 8 days.

After fermentation, the beans are spread out on large tables in the sun and turned regularly so they can dry evenly. This takes between 7 to 12 days.

Question for Jamie

**When you say there are over 9 million species does that include bacteria and archaea or just protozoan?**

In 2011, scientists used a technique based on patterns in the number of species at each level of biological classification to arrive at a prediction of about 8.7 million species. This number is an estimate, give or take 1.3 million, and does not include prokaryotic species (bacteria and archaea). This is an estimate of eukaryotic species only (animals, plants, fungi, protists and most algae).

For more information, you can find the paper of this research [here](#).