Bold Birds

Many birds call the city their home. Studies have shown that birds living in urban areas are bolder than those living in rural areas, which helps them thrive in cities. Can you find bold birds living in your area?

Activity 2: per student
- pencil
- printout of ethogram
- measuring tape

Activity 3: per group
- markers – e.g. witch's hats, cones, wooden blocks
- measuring tape

Read the article about how bold and aggressive behaviour means birds thrive in cities.
In the heart of Sydney, the following birds are commonly found:

- Australian magpie
- Australian white ibis
- Rainbow lorikeet
- Sulphur-crested cockatoo
- Silver gull
- Noisy miner
- Laughing kookaburra
- Australian raven
- Pied currawong

Click this link to introduce yourself to these birds!

Activity 1. Research task

Select a species of bird that you have seen both at home and at school. Conduct research online to find out about its biology, as well as how it has adapted to living amongst humans.
Species chosen: _____

Natural biology:	Behavioural adaptations in urban environments
Diet:	
Where does it sleep?	
When is it active?	
How does it move?	
How does it avoid predation?	
Reproductive behaviour:	

Activity 2. Comparing bird behaviours using ethograms

Survey individuals of your chosen species in your local area and complete an ethogram , comparing how it behaves at school against how it behaves at home. Compare the behavioural differences between the two environments.

Note: Ensure you observe your species in the morning, and spend at least 15 min observing behaviours.

Ethogram 1

Name: _____ Bird species: _____

Date: _____ Time: _____ Location: School

Weather: _____

Bird behaviour	Tally
Flying	
Flocking	
Grooming	
Vigilant behaviour	
Walking	
Foraging	
Singing	
Alarm call	
Territorial behaviours	

Ethogram 2

Name: _____ Bird species: _____

Date: _____ Time: _____ Location: Home

Weather: _____

Bird behaviour	Tally
Flying	
Flocking	
Grooming	
Vigilant behaviour	
Walking	
Foraging	
Singing	
Alarm call	
Territorial behaviours	

Discussion questions:

1. Compare the human activities occurring at school versus at home. Consider elements such as traffic, number of street pedestrians, noise levels, amount of green space etc.

2. Studies have shown that bird species living in urban areas exhibit more aggressive and territorial behaviours than those living in rural areas.

3. Did you find any behavioural differences between birds at school and birds at home? Provide possible reasons for any differences.

Activity 3. Testing bird boldness using their flight response

The flight zone of an animal is the area surrounding an animal that if approached by a potential predator or threat, including humans, will cause the animal to fly away (flight response). The flight zone is determined by the animal's flight initiation distance (FID). The bolder an animal, the shorter its flight initiation distance.

In this activity, you will measure your chosen bird species' flight initiation distance in two locations – at home, and at school.

Preparation

Before you begin, watch this instructional video on how to measure Flight Initiation Distance. Watch up to 10:22.
Write notes on how you will approach your chosen bird below:

Collecting data

Collect the start distance, alert distance, and flight initiation distance for your chosen bird species. Repeat your experiment as many times as possible (extend your table if necessary). Calculate averages for each distance.

Species name: _____
Location 1: _____

	Bird 1	Bird 2	Bird 3	Bird 4
Start distance (m)				
Alert distance (if possible (m)				
Flight initiation distance (m)				

Location 2: _____

	Bird 1	Bird 2	Bird 3	Bird 4
Start distance (m)				
Alert distance (if possible (m)				
Flight initiation distance (m)				

Analysing results

Create a column graph comparing the average flight initiation distance for your bird species.

Discussion questions

1. Which location had bolder birds? Explain your results.

2. How might having a short flight initiation distance disadvantage an urban bird.

3. How might having a long flight initiation distance disadvantage an urban bird.

4. How do you think the flight initiation distance of your bird would compare to the same species in a rural location? Why do you think this is?