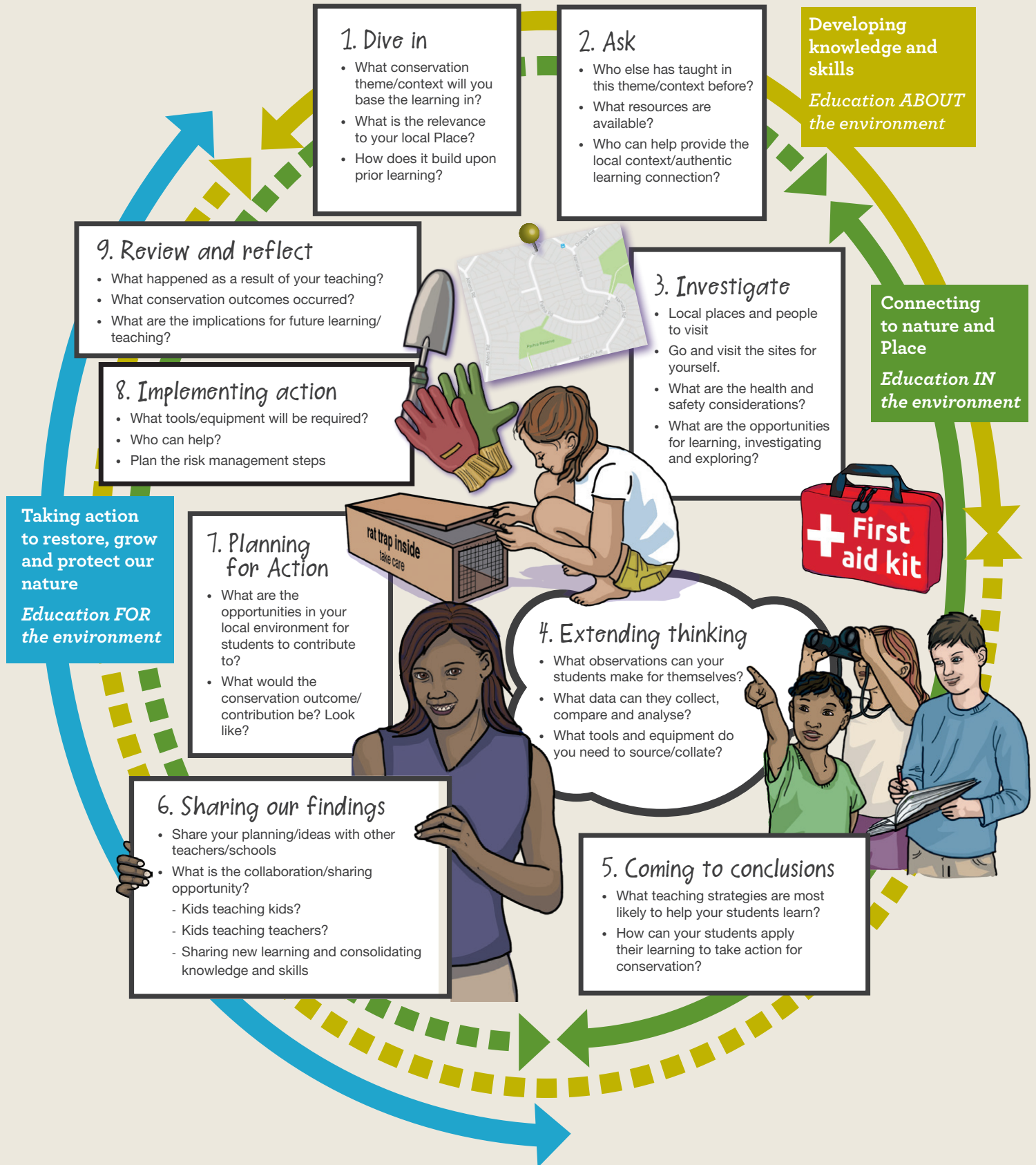


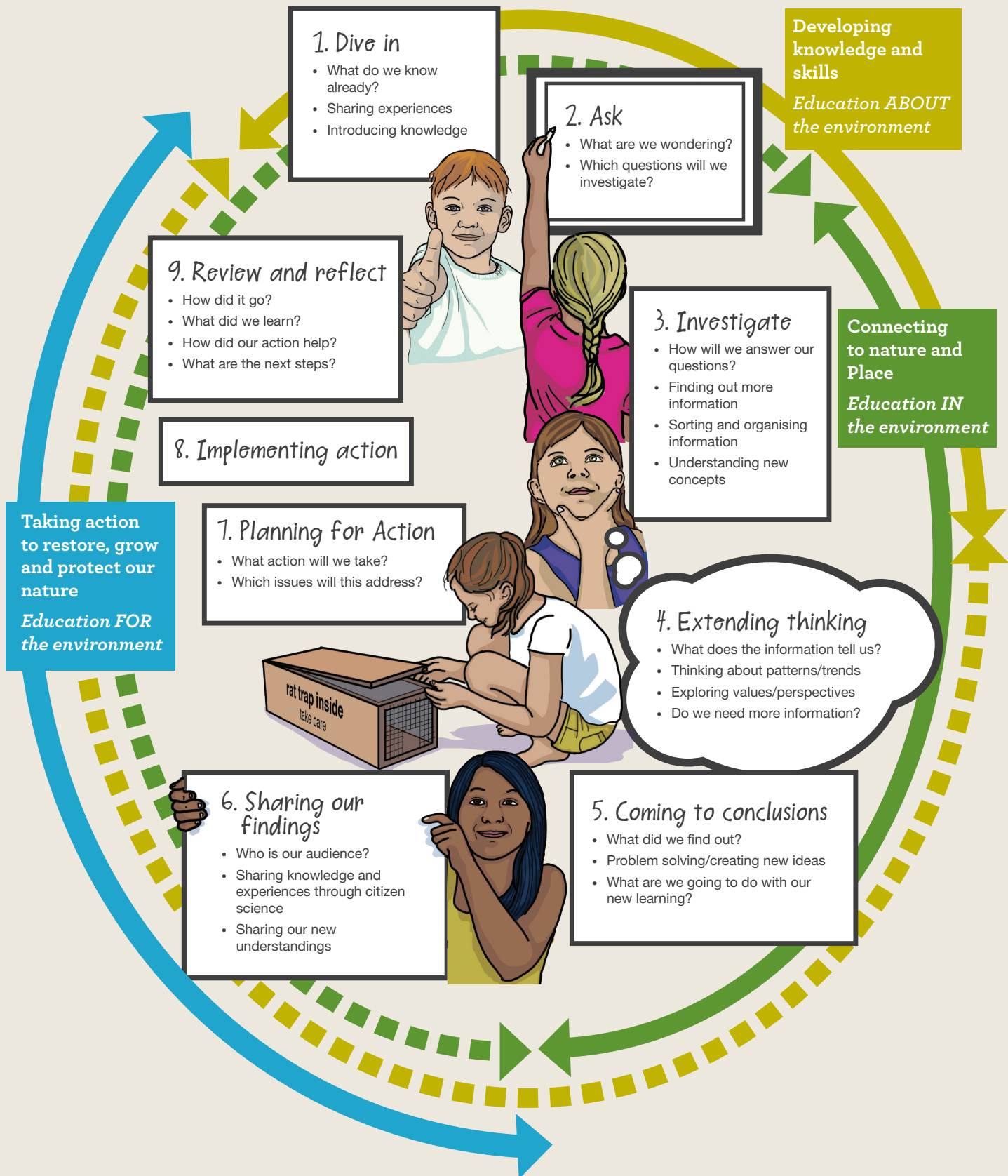
# Planning the teaching inquiry cycle

The Environmental Education inquiry cycle is a continuous learning process. The solid lines represent the opportunity for focussed teaching and learning ABOUT, IN or FOR the environment. The dotted lines reflect the potential for on-going opportunities in these dimensions.



# Student inquiry learning cycle

The Environmental Education inquiry cycle is a continuous learning process. The solid lines represent the opportunity for focussed teaching and learning ABOUT, IN or FOR the environment. The dotted lines reflect the potential for ongoing opportunities in these dimensions.



# Stages in the inquiry cycle

## Stage 1: Dive in

Introducing the topic and immersing students in the subject/ context. Taking into account prior knowledge and experience, students and teachers can develop a learning sequence which will meet learning needs and interests. Key concepts are introduced to form a foundation of knowledge for a learning inquiry.

**Key questions:**

What do we know already?

Sharing experiences of marine reserves, introducing knowledge

## Stage 2: Ask

Students now ask questions and further explore their ideas and how they relate to their prior knowledge. Student questions can be grouped with one main 'big/ essential' question and several minor questions for those needing more guidance. A big/ essential question has multiple answers and is an open question, requiring extensive research to answer. This forms the foundation of the inquiry. Students needing extension can have their own essential/big question/s.

**Key questions:**

What are we wondering? What do we want to know?

Which questions will we investigate?

## Stage 3: Investigate

At this stage of the inquiry, students are investigating their questions and further exploring the topic. Their research should be driven by their interests and inquiry questions. Students can follow lines of further inquiry to find out more information from relevant sources. They begin to organise and filter information.

**Key questions:**

How will we answer our questions?

Which information is relevant to our inquiry?

How can we sort and organise the information?

What new concepts have I understood?

## Stage 4: Extending thinking

At this stage of the inquiry, students are encouraged to use specific thinking skills to further explore a topic and seek a deeper understanding. Students now take the information they have gathered and begin to compare, contrast and sort. The information connects to what they already know or supports them forming new concepts. At this stage, students also look into aspects of social inquiry: values and perspectives and consider people's responses and decisions.

**Key questions:**

What does the information tell us?

Can we see any patterns/ trends?

Do we need more information?

## Stage 5: Coming to conclusions

Look back at overall findings. Next, students take a holistic view of information they have gathered, compared and organised. They begin to draw conclusions. Students make decisions about the current situation for their marine environment and which issue is most engaging and relevant to them.

### **Key questions:**

What did we find out?

What new ideas have come from this information?

What are we going to do with our new learning?

## Stage 6: Sharing our findings

Students can now share their ideas, information, conclusions and observations with a selected audience. This can be a powerful link to community and lead to collaboration and further information sharing. Sharing also helps students to consolidate their learning.

### **Key questions:**

Who do we want to share this information with?

How can we communicate our new knowledge and ideas?

What does our audience think?

## Stage 7: Planning for action

Students now create a brief, outlining their action and how it will target the focus issue. Now there is a focus for action they can begin to plan how they will take action for their marine environment.

### **Key questions:**

What can we do to help this situation- what action will we take?

What issue(s) will this address?

## Stage 8: Implementing action

Now it's time to have fun and take action. Students work in a real marine context to apply their learning and understanding to take action. The action should target the focus issue and aim to create a positive future for their local marine environment.

### **Key questions:**

Are we following our brief and criteria?

Is our action making a difference?

## Stage 9: Review and reflect

After carrying out an environmental action, students can now reflect on how it went. This may lead to further inquiry. Reviewing and reflecting is also helpful at each stage of the inquiry learning cycle.

### **Key questions:**

How did it go?

What did we learn?

How did our action help?

What are the next steps?