Workings and final answer.

What have we learned?

What other mathematical techniques do we need to apply?

What useful information do we know?

**REMEMBER**! Accuracy and spelling of key words \* Appropriate paragraphing and sequencing of information presented \* Correct phrasing – capitals, punctuation.

What do we want to find out?

Mathematics Unit 27: Lichen

A result of global warming is that the ice of some glaciers is melting. Twelve years after the ice disappears, tiny plants, called lichen, start to grow on the rocks.

Each lichen grows approximately in the shape of a circle.

The relationship between the diameter of this circle and the age of the lichen can be approximated with the formula:

$d=7.0×\sqrt{\left(t-12\right)}$ for $t\geq 12$

where $d$ represents the diameter of the lichen in millimetres, and $t$ represents the number of years after the ice has disappeared.

**QUESTION 27.1**

Using the formula, calculate the diameter of the lichen, 16 years after the ice disappeared.

Show your calculation.

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**QUESTION 27.2**

Ann measured the diameter of some lichen and found it was 35 millimetres. How many years ago did the ice disappear at this spot? Show you calculation.

Workings and final answer.

What have we learned?

What other mathematical techniques do we need to apply?

What useful information do we know?

**REMEMBER**! Accuracy and spelling of key words \* Appropriate paragraphing and sequencing of information presented \* Correct phrasing – capitals, punctuation.

What do we want to find out?

Mathematics Unit 27: Lichen