

Solving using Q-tips

<p>Ti (Key Terms or Ideas)</p>	<p>Q (What is the question to be solved?)</p>
<p>P (Problem Solving)</p>	<p>S (Solution – does it answer the question above?)</p>

Solving the sample question using Q-tips

June 2005, Mathematics A, Examination, Part II, Question 31

- 31 A ribbon 56 centimeters long is cut into two pieces. One of the pieces is three times longer than the other. Find the lengths, in centimeters, of *both* pieces of ribbon.

<p>Ti (Key Terms or Ideas)</p> <ul style="list-style-type: none">• 56 cm long ribbon cut into two pieces• One piece is three times longer than the other	<p>Q (What is the question to be solved?)</p> <p>How long is each piece of ribbon?</p>
<p>P (Problem Solving)</p> <p>Let</p> <p>x = first piece of ribbon $3x$ = second piece of ribbon</p> <p>piece 1 + piece 2 = 56 cm</p> $\begin{array}{rcl} x & + & 3x = 56 \text{ cm} \\ & & 4x & = 56 \text{ cm} \\ & \div 4 & & \div 4 \\ & x & & = 14 \text{ cm} \end{array}$	<p>S (Solution – does it answer the question above?)</p> <p>$x = 14$ cm so . . .</p> <p>piece 1 = 14 cm piece 2 = $3(14) = 42$ cm</p>