Practice worksheet | Patterns and equations

Rules for growing patterns

Name: _____ Date: _____

6 questions | 12 marks

1. Use “$\text{term number} \times 4$, then add 1” to find term 5. [1 mark]

2. A sequence starts at 3 and increases by 2. Find term 6. [2 marks]

3. Check whether “$\text{term number} \times 2$, then add 3” produces 5,7,9 for terms 1,2,3. [2 marks]

4. A rule is “$\text{input} \div 2$, then add 0.5”. Find the output for input 8. [1 mark]

5. A row of joined squares uses 4 sticks at stage 1, 7 at stage 2 and 10 at stage 3. Each extra square adds 3 sticks. How many sticks at stage 8? [3 marks]

6. A table gives 6,10,14 for terms 1,2,3. Give a term-number rule and test it. [3 marks]