## Reasoning and Problem Solving Understand Percentages

### **Developing**

1a. B is the odd one out because it represents 40%. A and C represent 41%.

2a. 5%, 10%, 35 parts per 100, 50%, 70 parts out of 100, 90 parts per 100

3a. Lily is not correct because 7 rows of 10 blocks and 2 individual blocks are shaded so 72% is shaded altogether.

### **Expected**

4a. C is the odd one out because it represents 80%. A, B and D represent 82%. 5a. 2 parts per 10, 27%, 51 parts per 100, 6 parts out of 10, 79 parts out of 100, 84% 6a. Tess is correct because the bar model is split into 10 parts. Percentages are the number of parts out of 100 so 7 needs to be multiplied by 10 to find the percentage.

### **Greater Depth**

7a. C is the odd one out because it represents 45%. A, B and D represent 48%. 8a. 27%, 14 parts per 50, 6 parts per 20, 4 parts out of 10, 51%, 11 parts out of 20 9a. Milo is correct because the bar model is split into 20 parts. Percentages are the number of parts out of 100 so 12 needs to be multiplied by 5 to find the percentage.

# Reasoning and Problem Solving Understand Percentages

### **Developing**

1b. A is the odd one out because it represents 52%. B and C represent 60%.
2b. 80 parts out of 100, 75%, 60 parts per 100, 40%, 20 parts per 100, 15%
3b. Oscar is correct because 3 rows of 10 blocks and 4 individual blocks are shaded.

#### **Expected**

4b. B is the odd one out because it represents 61%. A, C and D represent 60%. 5b. 91 parts out of 100, 90%, 7 parts out of 10, 64 parts per 100, 5 parts per 10, 38% 6b. Jake is correct because the bar model is split into 10 parts. Percentages are the number of parts out of 100 so 3 needs to be multiplied by 10 to find the percentage.

### **Greater Depth**

7b. A is the odd one out because it represents 80%. B, C and D represent 60%. 8b. 6 parts out of 10, 59%, 7 parts per 20, 32%, 15 parts per 50, 4 parts out of 20 9b. Kyra is correct because the bar model is split into 20 parts. Percentages are the number of parts out of 100 so 8 needs to be multiplied by 5 to find the percentage.

