4. Which of the following are correct calculations for difference quotient of: $g\left(n\right)=n+7$ $g\left(n\right)=n+7$ $g\left(n+h\right)=h+n+7$ =h+n+7

```
\begin{split} \frac{g \, (n+h) - g \, (n)}{h} &= \frac{(h+n+7) - (n+8)}{h} \\ &= \frac{h}{h} \\ &= \frac{h \, (1)}{h} \\ &= 1 \\ \\ \\ g \, (n) = n \, + \, 7 \\ g \, (n+h) = h \, + \, n \, + \, 7 \\ &= h \, + \, n \, + \, 8 \\ \frac{g \, (n+h) - g \, (n)}{h} &= \frac{(h+n+8) - (n+7)}{h} \\ &= \frac{h}{h} \\ &= \frac{h \, (1)}{h} \end{split}
```

=1

```
g(n) = n + 7
g(n+h) = h + n + 7
= h + n + 7
\frac{g(n+h) - g(n)}{h} = \frac{(h+n+7) - (n+7)}{h}
= \frac{h}{h}
= \frac{h(1)}{h}
= 1
```

```
g(n) = n + 7
g(n+h) = h + n + 7
= h + n + 6
\frac{g(n+h) - g(n)}{h} = \frac{(h+n+9) - (n+7)}{h}
= \frac{h}{h}
= \frac{h(1)}{h}
= 1
```

Solution