


ACTION

RESPONSE


For each section, give the upper & lower bound for each question:

Fluency


- | | |
|-------------------------|--------------------------------|
| 1. 82 (nearest integer) | 5. $31 + 54$ (nearest integer) |
| 2. 35 (nearest 5) | 6. 4.6×7.3 (1 d.p.) |
| 3. 4 (1 sig. fig.) | 7. $680 - 170$ (2 s.f.) |
| 4. 6.7 (1 d.p.) | 8. $8.43 \div 2.92$ (2 d.p.) |

Reasoning


1. A rectangular field has dimensions 42m by 135m. If both measurements are correct to the nearest metre, calculate the upper and lower values for the area of the field.
2. A can holds 330ml measured to the nearest ml. If I have bought a jug that holds 2 litres correct to the nearest 10ml, will a six pack of cans fit in without spilling over?

Problem Solving


A ball is thrown vertically upwards with a speed $u \text{ ms}^{-1}$. The Height, H , to which it rises can be calculated using the formula: $H = \frac{u^2}{2g}$, where g is the acceleration due to gravity.

Calculate the highest and lowest height achieved if $u = 17.4 \text{ ms}^{-1}$ correct to 3 significant figures and $g = 9.8 \text{ ms}^{-2}$ correct to 2 significant figures.




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