



Error Intervals

← REVISE THIS TOPIC

1 A number, n , is rounded to 2 decimal places.
The result is 3.17

Complete the error interval for n .

$$\dots 3.165 \dots \leq n < \dots 3.175 \dots$$

(Total for Question 1 is 2 marks)

2 A number, p , is rounded to 1 decimal place.
The result is 6.2

Complete the error interval for p .

$$\dots 6.15 \dots \leq p < \dots 6.25 \dots$$

(Total for Question 2 is 2 marks)

3 A number, T , is rounded to 2 decimal places.
The result is 8.52

Complete the error interval for T .

$$\dots 8.515 \dots \leq T < \dots 8.525 \dots$$

(Total for Question 3 is 2 marks)

4 A number, k , is rounded to 1 decimal place.
The result is 3.1

Complete the error interval for k .

$$\dots 3.05 \dots \leq k < \dots 3.15 \dots$$

(Total for Question 4 is 2 marks)



5 A number, r , is rounded to 1 decimal place.
The result is 6.0

Complete the error interval for r .

$$\underline{\hspace{1cm} 5.95 \hspace{1cm}} \leq r < \underline{\hspace{1cm} 6.05 \hspace{1cm}}$$

(Total for Question 5 is 2 marks)

6 A number, m , is rounded to 3 decimal places.
The result is 4.292

Complete the error interval for m .

$$\underline{\hspace{1cm} 4.2915 \hspace{1cm}} \leq m < \underline{\hspace{1cm} 4.2925 \hspace{1cm}}$$

(Total for Question 6 is 2 marks)

7 A number, v , is rounded to 2 decimal places.
The result is 3.07

Complete the error interval for v .

$$\underline{\hspace{1cm} 3.065 \hspace{1cm}} \leq v < \underline{\hspace{1cm} 3.075 \hspace{1cm}}$$

(Total for Question 7 is 2 marks)

8 A number, h , is rounded to 2 decimal places.
The result is 0.71

Complete the error interval for h .

$$\underline{\hspace{1cm} 0.705 \hspace{1cm}} \leq h < \underline{\hspace{1cm} 0.715 \hspace{1cm}}$$

(Total for Question 8 is 2 marks)



9 A number, x , is rounded to the nearest integer
The result is 23

Complete the error interval for x .

$$\underline{\hspace{1cm} 22.5 \hspace{1cm}} \leq x < \underline{\hspace{1cm} 23.5 \hspace{1cm}}$$

(Total for Question 9 is 2 marks)

10 A number, y , is rounded to the nearest 10.
The result is 70

Complete the error interval for y .

$$\underline{\hspace{1cm} 65 \hspace{1cm}} \leq y < \underline{\hspace{1cm} 75 \hspace{1cm}}$$

(Total for Question 10 is 2 marks)

11 A number, d , is rounded to the nearest 1000.
The result is 72000

Complete the error interval for d .

$$\underline{\hspace{1cm} 71500 \hspace{1cm}} \leq d < \underline{\hspace{1cm} 72500 \hspace{1cm}}$$

(Total for Question 11 is 2 marks)

12 A number, w , is rounded to the nearest 100
The result is 41600

Complete the error interval for w .

$$\underline{\hspace{1cm} 41550 \hspace{1cm}} \leq w < \underline{\hspace{1cm} 41650 \hspace{1cm}}$$

(Total for Question 12 is 2 marks)



13 A number, a , is rounded to the nearest 20
The result is 360

Complete the error interval for a .

$$\underline{\hspace{1cm} 350 \hspace{1cm}} \leq a < \underline{\hspace{1cm} 370 \hspace{1cm}}$$

(Total for Question 13 is 2 marks)

14 A number, b , is rounded to 2 significant figures.
The result is 27000

Complete the error interval for b .

$$\underline{\hspace{1cm} 26500 \hspace{1cm}} \leq b < \underline{\hspace{1cm} 27500 \hspace{1cm}}$$

(Total for Question 14 is 2 marks)

15 A number, g , is rounded to 1 significant figure.
The result is 800

Complete the error interval for g .

$$\underline{\hspace{1cm} 750 \hspace{1cm}} \leq g < \underline{\hspace{1cm} 850 \hspace{1cm}}$$

(Total for Question 15 is 2 marks)

16 A number, C , is rounded to 3 significant figures
The result is 3.12

Complete the error interval for C .

$$\underline{\hspace{1cm} 3.115 \hspace{1cm}} \leq C < \underline{\hspace{1cm} 3.125 \hspace{1cm}}$$

(Total for Question 16 is 2 marks)



17 A number, H , is rounded to 2 significant figures
The result is 0.0068

Complete the error interval for H .

$$\underline{\hspace{1cm}} \leq H < \underline{\hspace{1cm}}$$

0.00675 $\leq H <$ *0.00685*

(Total for Question 17 is 2 marks)

18 The length of a football pitch is 94 m correct to the nearest metre.

Complete the error interval for the length of the football pitch.

$$\underline{\hspace{1cm}} \text{ m} \leq \text{length} < \underline{\hspace{1cm}} \text{ m}$$

93.5 m \leq length $<$ *94.5* m

(Total for Question 18 is 2 marks)

19 The mass of an apple is 100 g correct to the nearest gram.

Complete the error interval for the mass of the apple.

$$\underline{\hspace{1cm}} \text{ g} \leq \text{mass} < \underline{\hspace{1cm}} \text{ g}$$

99.5 g \leq mass $<$ *100.5* g

(Total for Question 19 is 2 marks)

20 The capacity of a drinks can is 330 ml correct to the nearest millilitre.

Complete the error interval for the capacity of the drinks can.

$$\underline{\hspace{1cm}} \text{ ml} \leq \text{capacity} < \underline{\hspace{1cm}} \text{ ml}$$

329.5 ml \leq capacity $<$ *330.5* ml

(Total for Question 20 is 2 marks)



21 A number, R , is truncated to 1 digit.
The result is 4

Complete the error interval for R .

$$\dots\dots\dots 4 \dots\dots\dots \leq R < \dots\dots\dots 5 \dots\dots\dots$$

(Total for Question 21 is 2 marks)

22 A number, P , is truncated to 2 digits.
The result is 36

Complete the error interval for P .

$$\dots\dots\dots 36 \dots\dots\dots \leq P < \dots\dots\dots 37 \dots\dots\dots$$

(Total for Question 22 is 2 marks)

23 A number, Y , is truncated to 1 decimal place.
The result is 8.7

Complete the error interval for Y .

$$\dots\dots\dots 8.7 \dots\dots\dots \leq Y < \dots\dots\dots 8.8 \dots\dots\dots$$

(Total for Question 23 is 2 marks)

24 A number, U , is truncated to 2 decimal places.
The result is 5.24

Complete the error interval for U .

$$\dots\dots\dots 5.24 \dots\dots\dots \leq U < \dots\dots\dots 5.25 \dots\dots\dots$$

(Total for Question 24 is 2 marks)

