## Homework 22

Due in:

| 1. $0.013 \times 0.032$ (must show a <br> WRITTEN method) | $3.1 \frac{2}{3} \div 2 \frac{1}{4}$ |
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|  |  |
| 2. Write the number below in <br> standard form. <br> 0.00025 | $4 . \frac{5}{9} \times \frac{2}{5} \times 90$ |


| 5. Evaluate $2^{3} \times 6+(3-7)^{2}$ | 8. If five numbers have a mean of 12 , and four of the numbers are $2,19,30$ and 17 , what is the fifth number? |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 6. Calculate; | 9. Estimate the mean from this frequency table. |  |  |  |  |
|  | x | 0 - | 1 - | 2 - | $3-$ |
|  | f | 4 | 0 | 8 | 3 |
| 7. 120 pupils are asked for their favourite food and 15 said lasagne. What angle would this be on a pie chart? | 10. Factorise;$x^{2}+8 x-20$ |  |  |  |  |


| 11. Solve $6(10-2 x)=>-24$ | 14. The probability that a <br> seed will not germinate is 0.3. <br> In a packet of 200 seeds how <br> many will germinate? |
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| $a=\frac{4-3 b}{6}$ | 15. The area of a sector of a <br> circle of $125 \mathrm{~cm}{ }^{2}$. It has a <br> radius of 10 cm. What is the <br> angle of the sector to the <br> nearest whole number? |
| 12. Make b the subject |  |
| $\qquad$neme |  |
| 13. Alice, Ben and Charlie <br> share some money in the <br> ratio 2:5:7. Alice and Ben <br> receive a total of $£ 42$. How <br> much did Charlie receive? | 16. Write 68 as a percentage <br> of 135. |


| 17. The circumference of the <br> circle is 14 cm. Find the area <br> correct to 1dp. | 19. A cylinder has a radius of <br> 10 cm and height of 20 cm. <br> Find the surface area of the <br> cylinder. |
| :--- | :--- |
| 18. After an increase of $10 \%$, <br> the boots now cost £55, what <br> was their original price? | 20. Simplify; <br> $7 a^{5} b^{4} c^{6} \times 6 a^{4}$ |
| $21(\mathrm{bc})^{3}$ |  |

## Total:

