

## KS3 higher Week 2 homework

1 Work out, remember to put in your commas to help with number placings

- |                     |                     |                       |                        |                            |
|---------------------|---------------------|-----------------------|------------------------|----------------------------|
| a) $6 \times 10$    | b) $35 \times 10$   | c) $576 \times 10$    | d) $8 \times 100$      | e) $54 \times 100$         |
| f) $926 \times 100$ | g) $720 \times 100$ | h) $63 \times 1000$   | i) $5,400 \times 10$   | j) $640 \div 10$           |
| k) $7,200 \div 10$  | l) $9,000 \div 100$ | m) $89,000 \div 1000$ | n) $2,000,000 \div 10$ | o) $85,430,000 \div 1,000$ |

2 Put numbers in order of size smallest first

- A**  $39 \times 1000$       **B**  $29,000 \div 10$       **C**  $420 \times 10$       **D**  $20,000,000 \div 1000$       **E**  $6,300 \times 100$

3 Work out

- |                   |                    |                     |                    |                      |
|-------------------|--------------------|---------------------|--------------------|----------------------|
| a) $3 \times 20$  | b) $5 \times 40$   | c) $6 \times 300$   | d) $600 \times 7$  | e) $50 \times 30$    |
| f) $40 \times 80$ | g) $900 \times 20$ | h) $200 \times 600$ | i) $240 \div 4$    | j) $5,000 \div 5$    |
| k) $150 \div 30$  | l) $560 \div 80$   | m) $600 \div 30$    | n) $4,400 \div 40$ | o) $45,000 \div 900$ |

4 Work out

- |   |   |  |  |  |
|---|---|--|--|--|
| a) $\begin{array}{r} 54 \\ \underline{\quad} \\ 3 \times \end{array}$ | b) $\begin{array}{r} 94 \\ \underline{\quad} \\ 5 \times \end{array}$ | c) $\begin{array}{r} 427 \\ \underline{\quad} \\ 8 \times \end{array}$ | d) $\begin{array}{r} 426 \\ \underline{\quad} \\ 9 \times \end{array}$ | e) $\begin{array}{r} 258 \\ \underline{\quad} \\ 6 \times \end{array}$ |
|---|---|--|--|--|

5 Work out either using long multiplication or grid method

- a)  $23 \times 17$       b)  $46 \times 25$       c)  $67 \times 32$

6 In class we looked at using factors to aid multiplication ie

$$\begin{array}{l}
 15 \times 16 \\
 5 \times 3 \times 8 \times 2 \\
 5 \times 2 \times 3 \times 8 = 10 \times 24 = \mathbf{240} \\
 c) 12 \times 18
 \end{array}$$

which can be rearranged to become  
have a go with these      a)  $6 \times 45$       b)  $55 \times 12$

7 Work out

- a)  $531 \div 3$       b)  $1278 \div 6$       c)  $2608 \div 4$       d)  $3168 \div 9$       e)  $6744 \div 12$

and some more difficult ones!      k)  $4706 \div 13$       l)  $9525 \div 15$       m)  $3744 \div 16$

8 Work out the following      remember your BIDMAS

- |                           |                         |                             |                                 |                            |
|---------------------------|-------------------------|-----------------------------|---------------------------------|----------------------------|
| a) $2 \times 5 + 3$       | b) $6 + 2 \times 3$     | c) $2 + 15 \div 5$          | d) $3 - 12 \div 6$              | e) $3 \times (2 + 5)$      |
| f) $9 \div (5 - 2)$       | g) $3 + 4^2$            | h) $5^2 - 3^2$              | i) $\sqrt{16} - 1$              | j) $5^2 \times 3$          |
| k) $\sqrt{49} - \sqrt{9}$ | l) $\frac{2 + 4}{3}$    | m) $\frac{5 + 3}{5 - 1}$    | n) $\frac{\sqrt{16}}{\sqrt{4}}$ | o) $5 + 3 \times 8 \div 2$ |
| p) $(3 + 4)^2$            | q) $(2 + 1 \times 7)^2$ | r) $\sqrt{16 - 3 \times 4}$ |                                 |                            |

9 Eggs are delivered in trays of 48. How many eggs will be in 14 trays?

10 Tickets for a concert cost £18 each, if a class of 32 students go to the concert, what is the total cost of the tickets?

11 Maths text books are sold in packs of 20, how many books are there in 18 packs?

12 English text books are sold in pack of 20 too.

A school needs 320 English text books, how many packs will it need to buy?

13 a) Tickets to a concert in a school hall are £26 each

350 people attended the concert

The orchestra charged £6,500 for playing the concert

How much money did the school make?

14 Pens come in packets of 15. I need to order 480 pens, how many packs of pens do I need to order