

## Order of Operation ---- BIDMAS

When there is more than 1 calculation to be done, the operations MUST be done in the following order:

**Brackets**    **Indices**    **Division/Multiplication**    **Addition/subtraction**

Examples

$$\begin{aligned} 1. \quad & 3 + 6 \times 2 \\ & = 3 + 12 \\ & = 15 \end{aligned}$$

$$\begin{aligned} 2. \quad & 4 \times 7 - 80 \div 2 \\ & = 28 - 40 \\ & = -12 \end{aligned}$$

$$\begin{aligned} 3. \quad & 2^3 - 14 \div (2+5) + 6 \\ & = 2^3 - 14 \div 7 + 6 \\ & = 2^3 - 2 + 6 \\ & = 8 - 2 + 6 \\ & = 12 \end{aligned}$$

Now complete the following exercises

Exercise 1

- |  |   |  |
|--|---|--|
| 1. $2 + 3 \times 5$                                | 2. $5 \times 2 + 6$                           | 3. $20 - 2 \times 4$                                 |
| 4. $30 - 5^2$                                      | 5. $6 + 3^2 \times 2$                         | 6. $4 \times 5 - (6 + 9)$                            |
| 7. $28 \div 4 + 3$                                 | 8. $(17 - 2) \div 3$                          | 9. $20 \div (2 + 3)$                                 |
| 10. $(24 - 6) \div 3$                              | 11. $30 - 9 \times 2$                         | 12. $(45 - 5) \div 8 + 2$                            |
| 13. $20 + 2 \times 3^2$                            | 14. $15 \div 3 + 2$                           | 15. $5^2 - 2 \times 4$                               |
| 16. $24 \div 3 + 5$                                | 17. $12 - 3 \times 2^2$                       | 18. $18 + 10 \div 2$                                 |
| 19. $(6 \times 3 + 2) \div (4 + 2 \times 3)$       | 20. $50 - 16 \div 2 + 6$                      | 21. $7 \times 6 - 5 \times 4 + 1 \times 3$           |
| 22. $7 \times (15 - 3 \times 2)$                   | 23. $40 \div (2 + 3 \times 2)$                | 24. $60 - (7^2 + 2 \times 5)$                        |
| 25. $36 \div 3^2 + (12 \div 3)^2$                  | 26. $22 + 6^2 \div 2 + 1$                     | 27. $10 - (9 \div 3^2 + 4)$                          |
| 28. $6 + 2(3 + 2^2)$                               | 29. $5(9 - 3 \times 2)$                       | 30. $2 \times 3 + 24 \div 6$                         |
| 31. $\frac{14 + 3 \times (9 + 3)}{6 \times 4 + 1}$ | 32. $\frac{8 + 9 \times 3}{6 - 1}$            | 33. $1 + 3 \times (6^2 - 4 \times 3^2 + 8)$          |
| 34. $1 + 3^2 \times 4 - 3 \times 2^3$              | 35. $(10 + 2 \times 4^2) \div 6 + 3 \times 5$ | 36. $((3 \times 5^2 - 3) \div (3^2 + 3)) \times 2^2$ |

Exercise 2

- |   |                                |                                |
|---|--------------------------------|--------------------------------|
| 1. $3 - 2 \times 5$                     | 2. $-2 + 16 \div 8$            | 3. $2 \times 4 - 3 \times 5$   |
| 4. $-12 + 2^3$                          | 5. $(-10 \times 2) + (-7)^2$   | 6. $8 \times (-2) \times (-1)$ |
| 7. $3 \times (8 + (-2))$                | 8. $-5 \times (-3 - (-8)) + 4$ | 9. $(7-8) \times 3 + 2$        |
| 10. $(-8 + 2) \times 5 \div (-6) - 100$ |                                |                                |

