## Year 8 Term 4

| Learning Aim | Emerging | Developing | Securing |
| :---: | :---: | :---: | :---: |
| Algebra <br> Expressions |  | Understand coefficient are fractions not decimals Expand single brackets Factorise simple expressions Collecting like terms | Expand double brackets <br> Factorise linear expressions that include powers. Simplify expressions using indice rules <br> Model simple situations such as perimeter from given expressions |
| Examples |  | Expand: $4 x(7-2 x)$ $2(x+4)-3(x+2)$ <br> Factorise: $3 x+12$ | Expand: $(x-2)(x-5)$ <br> Factorise: $12 x^{2}-42 \mathrm{x}$ <br> Simplify $6 x^{4} \div 3 x^{5}$ |
|  <br> Measure <br> Area/ <br> Perimeter/ <br> Volume/ <br> Pythagoras | Apply formula to calculate area and perimeter of rectangles, parallelograms and triangles | Apply formula to trapezium. Calculate Volume and surface are of cuboids and prisms Problem solve compound shapes involving rectangles and triangles | Find missing edges of triangles using Pythagoras <br> Apply formula of Pythagoras to solve area questions |
| Examples | Find the perimeter: <br> Q1) | Volume $=70$, find $x$ : | Find $x(2 d p)$ : <br> Q1) |


| Extension <br> opportunities | Introduction to: |
| :--- | :--- |
| Algebra | Expand products of <br> two or more binomials <br> Factorise quadratics |
| Shape | Problem solve with <br> Pythag |
|  | Apply knowledge of <br> formula to problem <br> solve functional skill <br> style questions. <br> Bounds |

You can find practice on all the topics taught this term at Mathsworkout.co.uk
Login: sarum
Password: solid92
Go to algebra, section 02,03,04. Geometry \& measure, section 09,10,12,13,19

Choosing the right level of difficulty for you within each topic

