| Subject | Year | Month |  |
| :---: | :---: | :---: | :---: |
| Mathematics | 10 | September | Balc |
| Topic: |  |  |  |
| Calculations, checking, rounding, product rule 3 lessons |  |  |  |
| Content (Intent) |  |  |  |
| Prior Learning <br> Year 9 Bounds and error intervals September Year 8 BIDMAS September | Future Learning <br> Year 10 Indices, roots, reciprocals \& BIDMAS September <br> Year 10 Accuracy \& bounds March <br> Year 12 <br> Pure Chapter 8 The binomial expansion |  |  |
| Objectives <br> - Add, subtract, multiply and divide decimals and whole numbers; <br> - Put digits in the correct place in a decimal calculation and use one calculation to find the answer to another: <br> - Round numbers to the nearest $10,100,1000$, integer, a given number of decimal places and to a given number of significant figures; <br> - Estimate answers to one- or two-step calculations, including use of rounding numbers and formal estimation to 1 significant figure: mainly whole numbers and then decimals. <br> - Use the product rule for counting (i.e. if there are $m$ ways of doing one task and for each of these, there are $n$ ways of doing another task, then the total number of ways the two tasks can be done is $m$ $\times n$ ways) including selecting 2 items from a population where order does or doesn't matter |  |  |  |
| Pedagogical notes (implementation) | How will understanding be assessed \& recorded (Impact) |  |  |
| Encourage the exploration of different calculation methods. | End of half term Assessment in Oct End of Year Mocks in April |  |  |
| Amounts of money should always be rounded to the nearest penny. | How can parents help at home? |  |  |
| Make sure students are absolutely clear about the difference between significant figures and decimal places. | MathsWatch clips (Qualification GCSE)$\begin{aligned} & 17,18,66,67 \\ & 69 \\ & 31,32,90,91 \end{aligned}$ |  |  |
| Further reading/discussion |  |  |  |
| Reading / Enrichment | Literacy | Numeracy Links | Careers Links <br> Caterer <br> Builder <br> Gardener <br> Engineer <br> Basic numeracy <br> requirement for all <br> careers |

