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| **Year:** | **7** | **Unit:**  | **Introduction to the Laboratory & Separating Mixtures – Sizzling Science** |
| **Subject:** | **Science** | **Assessment:**  | **Scientific report** |
| **LG** | **LEARNING GOALS and SUCCESS CRITERIA** | **I feel confident with this…(Date/Ref)** | **I only need a little help with this** | **I can do some of this but need a lot of help** | **I don’t know this at all-yet!** |
| **1**6 Lessons | **SC1** | I can **define** the scientific method  |  |  |  |  |
| **SC2** | I can **identify** the difference between every day and scientific language |  |  |  |  |
| **SC3** | I can **explain** the importance of scientific writing and using the correct format |  |  |  |  |
| **SC4** | I can **outline** the conditions required for questioning and predicting in science inquiry |  |  |  |  |
| **SC5** | I can **list** 3 steps needed to **evaluate** experiments (did my experiment provide an answer to my question, how good was my data, what would I change?) |  |  |  |  |
| **SC6** | I can **present** my scientific report using digital technology |  |  |  |  |
| **SC7** | I **understand** the school’s assessment and plagiarism policy (p 31-32 School Diary)  |  |  |  |  |
| **LG1** | **Students can identify problems related to separation which can be investigated experimentally and plan and conduct an experiment.** |  |  |  |  |
| **2**6 Lessons | **SC8** | I can **define** independent and dependent variables |  |  |  |  |
| **SC9** | I can **explain** why examining how data was collected is important. |  |  |  |  |
| **SC10** | I can **collect** and **manipulate** data in tables and graphs using digital technology |  |  |  |  |
| **SC11** | I can **interpret** data and **produce** an argued statement based on results |  |  |  |  |
| **LG2** | **Students will be able to use evidence to support their conclusions and be able to communicate their ideas, methods and findings using scientific language** |  |  |  |  |
| **3**3 Lessons | **SC12** | I can **define** pure substances and mixtures. |  |  |  |  |
| **SC13** | I can **list** 3 examples of both mixtures and pure substances. |  |  |  |  |
| **SC14** | I can **identify** and **explain** the differences between homogenous solutions and heterogeneous mixtures |  |  |  |  |
| **SC15** | I can **recognise** the difference between solutes and solvents in solutions, and **identify** the solvent and solute in solutions |  |  |  |  |
| **SC16** | I can **explain** the significance of solubility of substance |  |  |  |  |
| **LG3** | **Students will understand that substances can be classified into two groups: mixtures and pure substances, and identify at least two examples of each** |  |  |  |  |
| **4**12 lessons | **SC17** | I can **investigate** and/or **use** the following methods of separation: * filtering
* dissolving
* chromatography
* distillation
* centrifuging
* decanting
* evaporation
* magnetism
 |  |  |  |  |
| **SC18** | I can **identify** where separation techniques are used in everyday application |  |  |  |  |
| **SC19** | I can **explain** the role of water as a solvent |  |  |  |  |
| **SC20****SC21****SC22** | I can **evaluate** the characteristics of a mixture and **determine** the most appropriate method of separationI can **investigate** techniques used by Aboriginal and Torres Strait Islander peoples, such as hand picking, sieving, winnowing, yandying, filtering, cold-pressing and steam distillingI can explore and **compare** separation methods used in the home |  |  |  |  |
| **LG4** | **Students will understand that mixtures, including solutions, contain a number of pure substances that can be separated using a range of techniques** |  |  |  |  |