**Indices Rules - Advanced**

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| Name : | Class : | Date : |

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| Mark : | /24 | % |

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| --- | --- |
| **1)** Evaluate, giving your answer as a simplified fraction       a)       b)       c) | [3] |
| **2)** Give your answer in the form  , where a and b are positive integers | [1] |
| **3)** Give your answer in the form  , where a and b are integers | [1] |
| **4)** Give your answer in the form  , where a,b and c are positive integers | [1] |
| **5)** Give your answer in the form  , where a,b and c are integers | [1] |
| **6)** Evaluate       a)       b)       c) | [4] |
| d) |  |
| **7)** Evaluate, giving your answer as an integer or simplified fraction       a)       b)       c) | [3] |
| **8)** Evaluate the following, giving your answer as a simplified fraction       a)       b) | [2] |
| **9)** Give the following expression in index form       a)       b)       c) | [5] |
| d)       e) |  |
| **10)** Show the following as a power of 3 | [1] |
| **11)** Show the following as a power of 2 | [1] |
| **12)** Show the following as a power of 49 | [1] |

**Solutions for the assessment Indices Rules - Advanced**

|  |  |
| --- | --- |
| **1)**  a) | b) |
| c) | **2)** |
| **3)** | **4)** |
| **5)** |  |
| **6)**  a) 11 | b) 4 |
| c) 16 | d) 8 |
| **7)**  a) | b) |
| c) |  |
| **8)**  a) | b) |
| **9)**  a) | b) |
| c) | d) |
| e) | **10)** |
| **11)** | **12)** |