## STEM: Glossary

| Term                         | Definition  |
|------------------------------|---|
| Algebra                      | Algebra includes recognising and analysing patterns, noticing how they change, and making generalisations.  |
| Balance                      | In mathematics, the term balance is used to describe a state of equilibrium, for example, where weight on either side of a measuring device is equal or one object rests on top of another.   |
| Cardinality                  | Cardinality is the use of a number to label a set or to say 'how many' are in a group.<br>The final number in a count does not just label the last item counted, but it also<br>represents how many items in total.   |
| Cause and effect             | The concept of cause and effect explains why things happen. The cause is the reason for something to happen, and the effect is the outcome or what happened.  |
| Chance                       | Chance is the possibility of something happening.   |
| Counting                     | Counting takes two forms – rote counting and rational counting. Young children master rote counting, i.e. the ability to recite the number names in order from memory, first. Rational counting is more complex and requires that the child understand the meaning of each number name. |
| Concept                      | A concept is a term that describes a 'big idea' in relation to any of the STEM subjects.  |
| Data                         | Data refers to information collected for reference or analysis.   |
| Equilibrium                  | Equilibrium describes a state of physical balance. See 'balance' for further detail.  |
| Force                        | A force is a push or pull.  |
| Geometry                     | Geometry is an area of maths that deals with shapes, space, points, lines or angles.<br>Geometry explains how to build or draw shapes, measure them, and compare them.  |
| Gravity                      | Gravity is the natural force that causes things to fall toward the earth.   |
| Hypothesis                   | A hypothesis is a prediction of what children think will happen in an investigation.  |
| Measure                      | Measurement is any process that produces a description of an attribute such as length, volume, weight, height, capacity, time, temperature or money.  |
| Momentum                     | If an object is moving, then it has momentum.   |
| One-to-one<br>correspondence | One-to-one correspondence is counting each object in a set once, and only once with one touch/number per object.  |

| Term           | Definition   |
|----------------|--|
| Ordinal number | An ordinal number is a number that shows a position on a list: 1st, 2nd, 3rd.  |
| Quantity       | Quantity is the measure or number of objects in a group.   |
| Sets           | A set is a collection of distinct objects, grouped together in a meaningful way.   |
| Size           | Describes how big an object is and can be referred to in relation to other items.  |
| Space          | The concept of space describes the relationships between objects and places and can be expressed using language such as: in, on beside, etc.   |
| Volume         | Volume is the quantity of three-dimensional space, for example, the space that a substance (solid, liquid, gas) or shape occupies or contains. |
| 2-D shape      | A two-dimensional shape is flat and does not have any thickness. It is measured in only two faces, length and width.                           |
| 3-D shape      | A three-dimensional shape is solid. These shapes are measured in three faces, length, width and depth.   |