# **Essential Skills Wales**

# **APPLICATION OF NUMBER**

#### Important notes:

- 1. Each level of the skill incorporates and builds on the previous levels.
- 2. This document must be read in association with the documents 'Amplification of evidence requirements' and 'Application of Number Mandatory Definitions' which provide mandatory detail about each component and are a constituent part of the standards.

# Level 2

This is about demonstrating your skills in:

- understanding numerical data
- carrying out calculations
- interpreting results and presenting findings

in order to tackle problems or tasks that you meet in education, training, work and social roles.

You must carry out at least one activity that shows your skills in all three of these areas.

If you need to carry out additional activities to meet all the requirements of N2.2 (a,b,c,d), each activity must include tasks for either N2.1 and N2.2 **or** N2.2 and N2.3 but you need to meet only the missing requirement/s.

# N2.1 Understand numerical data

## You must provide evidence that you can:

#### N2.1.1

Help to identify and describe at least one practical problem or task that involves a range of numerical data and information.

## N2.1.2

Confirm with an appropriate person how you plan to tackle it.

## N2.1.3

Collect relevant numerical data and information from a range of sources to meet the purpose of your task.

Your sources must include at least **two** of a table, a chart, a graph or a diagram.

## In order to show that you are competent, you need to know how to:

- work with an appropriate person to help you identify and describe the problem or task and confirm how you will tackle it
- read, understand and extract information from tables, diagrams, charts and simple graphs
- read and understand numbers presented in different ways
- collect and record data from making accurate observations
- read scales on a range of equipment to given levels of accuracy

- use shape and space to record relevant measurements and make accurate observations
- estimate amounts and proportions
- understand compound measures.

# N2.2 Carry out calculations

#### You must provide evidence that you can:

#### N2.2.1

Use appropriate methods to get the results you need and explain the methods you have used.

#### N2.2.2

Use the data and information you have obtained to carry out calculations relevant to your task to do with:

- a) amounts or sizes
- b) scales or proportion
- c) handling statistics
- d) using formulae.

#### In order to show that you are competent, you need to know how to:

- identify and use methods and calculations that are appropriate for your task, including grouping data when this is appropriate
- show clearly your methods of carrying out calculations and give the levels of accuracy of your results
- carry out calculations involving two or more steps, with numbers of any size with and without a calculator
- use mental arithmetic involving whole numbers and simple fractions
- work with and convert between fractions, decimals and percentages
- calculate with sums of money and convert between currencies
- calculate, measure and record time in different formats
- estimate, measure and compare length, weight, capacity and temperature using metric and, where appropriate, imperial units
- calculate within a system and between systems using conversion tables and scales, and approximate conversion factors
- recognise and use common 2-D representations of 3-D objects
- solve problems involving 2-D shapes and parallel lines
- work out actual dimensions from scale drawings
- use proportion and calculate using ratios where appropriate
- identify the range of possible outcomes of combined events through probability and record the information using diagrams or tables
- compare sets of data of an appropriate size, using percentages, mean/ median/ mode
- use range to describe the spread within sets of data
- understand and use given formulae
- calculate efficiently using whole numbers, fractions, decimals and percentages
- check your methods and calculations
- identify and correct any errors
- check that your results make sense.

# N2.3 Interpret results and present findings

#### You must provide evidence that you can:

#### N2.3.1

Select two different ways to present your results, using charts or graphs, and tables or diagrams appropriate to your audience.

### N2.3.2

Present and explain your methods and findings and explain how they meet the purpose of your task and are appropriate to your audience.

#### In order to show that you are competent, you need to know how to:

- understand what the results of your calculations mean in the context of your problem or task
- identify and describe appropriate ways to present your findings to two different audiences, including numerical, graphical and written formats
- construct tables, charts and graphs, and label with titles, scales, axes and keys appropriate to your purpose and audience
- use more than one way to present your findings, including numerical, graphical and written formats
- describe your methods, highlight the main points of your findings, and explain how they meet your purpose.

## Access statement

Candidates with particular disabilities may be unable to show that they are competent by providing all their evidence in the form specified in these standards.

For such candidates, reasonable adjustments to the evidence requirements may be allowed in appropriate circumstances. In some cases, exemptions may be permissible. Further detail on reasonable adjustments and exemptions for candidates with particular disabilities can be found in a separate amplification document.