Assessment, recording and reporting using the National Literacy and Numeracy Framework

Guidance

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## Assessment, recording and reporting using the National Literacy and Numeracy Framework

### Audience
Primary, secondary and special schools in Wales; Welsh local authorities and regional education consortia; unions; various organisations that have an interest in literacy and numeracy; and members of the public.

### Overview
This guidance document is to help schools in Wales with assessment, recording and reporting using the National Literacy and Numeracy Framework (LNF).

### Action required
None – for information only.

### Further information
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### Additional copies
This document can be accessed from the Welsh Government’s website at [www.learning.wales.gov.uk](http://www.learning.wales.gov.uk)

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Introduction

The National Literacy and Numeracy Framework (LNF) became a statutory curriculum requirement in September 2013. Formative assessment using the LNF will become a statutory requirement from September 2014.

This means that schools will need to review and develop their current assessment systems to ensure that:

- ongoing classroom assessment is used effectively to monitor progress, discuss next steps and set appropriate tasks
- their assessment, recording and reporting (ARR) policy sets out clearly how learners’ literacy and numeracy skills will be monitored and recorded across the curriculum and through key stages for formative purposes
- they can provide clear and informative narrative reports to parents/carers on what their child can do, and areas for development in relation to the LNF.

The introduction of statutory assessment using the LNF does not require a move away from formative assessment. In September 2014 there is no expectation that schools should arrive at a single year group judgement in relation to the LNF. The focus should be on developing a coherent approach to assessment across the curriculum which supports learners’ progression. Teachers/practitioners will be required to assess using the LNF in every subject (where appropriate). Schools should put in place systems which facilitate collaboration between teachers/practitioners in order to ensure that there is a complete understanding of an individual’s development in literacy and numeracy using the LNF.

The purpose of this guidance document is, therefore, to support schools in the process of improving literacy and numeracy standards for all learners in Wales. It is part of the range of guidance documents which have been produced to support the LNF, and aligns with training and guidance delivered by the National Support Programme (NSP) during Phase 3 of the programme.

The materials in the document are based upon work that has been identified in schools across Wales as emerging effective practice and will be supported and developed by Phases 3 and 4 of the NSP.
Whole-school approaches to assessment, recording and reporting (ARR)

Figure 1: Effective LNF ARR strategy and practice

1. Assessment informs planning and delivery of the LNF

Guiding principles

- Whole-school planning for assessment is integral to, and continuous with, curriculum planning.
- LNF assessment is across the curriculum and not confined to English, Welsh and mathematics.
- Assessment outcomes inform short-, medium- and long-term planning for progression of LNF skills across subjects, year groups and key stages.
- Assessment plays a central role in informing progress in literacy and numeracy.
• Learners are given opportunities to consolidate and apply skills in a variety of contexts; increasing in complexity, demand, familiarity of context and autonomy are carefully planned.

• Teachers use the LNF as a skills continuum and have a good working knowledge of the literacy and numeracy development for all years.

• Assessment identifies learners who demonstrate a competency in skills which does not coincide with the expectations for their particular year group – that is learners who are progressing further, faster or slower in one or more skill, and teachers plan and differentiate accordingly.

• Teachers from across different year groups, key stages and phases work together to share their understanding and to develop meaningful opportunities for learning and assessment.

• The results of assessment are used to introduce specific interventions as necessary.

Principles into practice

As set out in the Welsh Government’s Curriculum planning guidance (2013), it is crucial that planning for assessment is integral to, and continuous with, curriculum planning. Schools will need to ensure that whole-school systems are in place to support the consistent and rigorous assessment of literacy and numeracy skills across the curriculum.

Within some schools, whole-school and subject department policies and practice have been revised in order to bring them into line with the requirements of the LNF. In one primary school, ‘joined-up’ thinking has enabled the school to create units of work that are based on the LNF. In some secondary schools, the requirements of the LNF have been mapped out so that all departments have a clear idea of the skills that they are expected to address and assess. Whole-school staff training days on literacy and numeracy have helped towards building a measure of consistency into departmental approaches. In a number of instances, the schools have identified certain subjects or contexts as being the most appropriate for the delivery and assessment of particular LNF skills.
Case study: primary school

In order to implement the LNF in a cohesive way which will be as useful to the learners as possible, we decided that we didn’t want to just map to current provision, but develop our curriculum with the LNF as a starting point. Therefore, as a school we have decided to develop our planning so that there is a concentration on ‘rich tasks’, which are based on real-life events, as a way to ensure that the learners are able to apply the skills learnt in lessons in a realistic, enjoyable and increasingly challenging way. In order to implement this approach we have:

• established the requirements of the LNF within and between classes, and identified areas of strength and areas for development within the school
• introduced a new thematic approach which is focused on the learners acquiring skills for a real-life event, e.g. planning and holding a celebration – we have found that some subjects have a greater ability to develop certain skills than others and planned accordingly
• created forms of assessment which involve the learners in evaluating their own development and next steps which is then used to inform planning.

Other approaches include:

• identification of a particular skill that an individual needs to develop and planning in class intervention
• identification of a particular skill that needs development within a cohort or group, and subsequent planning, to create a learning focus, e.g. departments in a secondary school may collaborate to address particular elements/aspects from the LNF either through a thematic approach, or by increasing opportunities within their own context
• identification of particular needs of cohorts/groups in their development plans and provide opportunities for whole-school training, leading to increased opportunities to consolidate and progress the skill across all subject areas.
2. Assessment is planned, robust and reliable; outcomes are recorded in ways that are useful

**Guiding principles**

- Schools’ ARR, marking and feedback policies give clear guidance on achieving consistency when assessing.
- Assessments where the outcomes are to be recorded are planned, and skill(s) to be assessed are clearly identified.
- LNF assessments are mapped out across subjects and this information is accessible to all staff: each teacher knows the skill(s) they have responsibility to assess, and at what stage in the year.
- Assessments are planned so that the demands become increasingly complex.
- The way in which assessment information is recorded is agreed.
- Teachers are able to access literacy and numeracy assessment information in order to plan and differentiate.
- Feedback to learners is provided in ways that are clearly linked to the LNF expectations, and identifies clear next steps for learners to act upon.

**Figure 2: Achieving whole-school reliability**

- **h** Whole-school monitoring activities that are used to inform improvement planning
- **g** Standardised tasks, tests (National Reading and Numeracy Tests)
- **f** Consistently embedded whole-school Assessment for Learning (AfL) strategies
- **e** Producing exemplification materials and portfolios of learners’ work
- **d** Standardisation and moderation within and across subjects/departments/clusters
- **c** Staff training
- **b** Literacy/numeracy professional learning communities (PLCs)
- **a** Whole-school policies
a. Whole-school policies


b. Literacy and numeracy professional learning communities (PLCs)

The school uses a professional learning community (PLC) approach in order to collectively investigate and action research on effective strategies to address identified literacy and numeracy priorities. The PLC may be within and across departments and/or schools. Some examples of effective PLCs have had a focus on:

- improving boys’ literacy
- managing money in Key Stage 2
- tackling girls negative perceptions of numeracy
- providing appropriate opportunities to develop the writing of more able and talented learners through effective classroom practice.

Outcomes of the PLC are shared and influence whole-school policy and practice.


c. Staff training

Schools should identify staff development needs in relation to literacy and numeracy, in terms of their own skill development and learners’ skill development. Schools should provide opportunities for development in identified areas and monitor the impact of implementation of strategies from training that may include:

- whole-school training days
- participation in PLCs
- dissemination of guidance and documents
- school-to-school working
- peer partnerships.
d. Standardisation and moderation within and across subjects/departments/clusters

Schools should ensure that systems are in place to support teachers making accurate and consistent assessments with regard to the LNF. These should allow teachers to have a shared understanding of the exemplification of an element/aspect and provide opportunities to confirm and maintain their understanding.

e. Producing exemplification materials and portfolios of learners’ work

Schools may consider collating exemplification materials and/or portfolios of some learners’ work in order to assist teachers in making accurate assessments with regard to the LNF.

f. Consistently embedded whole-school Assessment for Learning (AfL) strategies

Progress against the LNF is supported by effective whole-school assessment for learning policy and practice. This may include:

- a LNF learning objective, shared with, or created by, learners and used to progress subject knowledge and understanding
- the LNF being used to help the learner and the teacher to set success criteria that is task specific
- facilitation of self-assessment and peer assessment against agreed success criteria so that learners become increasingly aware of what progression in literacy and numeracy skills looks like
- developing questioning to progress literacy and numeracy skills
- feedback to learners about the progression of their literacy and numeracy skills is focused, specific and manageable, and uses the language of the LNF
- agreeing the focus for written feedback
- learners have opportunities to reflect upon and act on feedback.

g. Standardised tasks, tests (National Reading and Numeracy Tests)

Schools may have in place arrangements for teachers to reach an agreed understanding of standards through the development of tasks using the expertise and whole-school view of a literacy coordinator and numeracy coordinator.

h. Whole-school monitoring activities that are used to inform improvement planning

The school should evaluate the effectiveness of implementation of the LNF through appropriate monitoring activities. These may include:

- literacy/numeracy cross-subject monitoring and scrutiny of learners’ work
- lesson observations and learning walks
- monitoring of literacy and numeracy skills progress
- listening to learners, parents/carers and staff.

For a learner to make progress, careful planning needs to include opportunities to consolidate and apply a skill in a variety of contexts. For example, an activity may be made more complex by:

- increasing the number of variables the learner has to manage
- increasing the level of challenge of stimulus materials
- making greater demands in terms of the way in which outcomes have to be presented
- giving the learner material which is unfamiliar
- reducing the level of guidance and support.
3. Assessment information, including results in the National Reading and Numeracy Tests and teacher assessment, is considered to give an overall picture of achievement and attainment

Guiding principles

- All relevant assessment information should be used to inform an overall picture of a learner’s achievement and attainment.
- Relevant assessment information in literacy and numeracy achievement and attainment should be accessible to staff for planning and assessing.
- Diagnostic information from the National Reading and Numeracy Tests should be used formatively at a learner, group and school level.
- Summative data may also be used formatively.

Principles into practice

A wide range of relevant assessment information should be used to inform an overall picture of a learner’s achievement and attainment in literacy and numeracy. Sources may include:

- day-to-day classroom-generated AfL information against specific LNF skills, applied in different subjects
- collation of learners’ performance data against LNF expectations across a range of subjects that profiles the learners’ skills acquisition in literacy/numeracy
- standardised scores and progress scores from the National Reading and Numeracy Tests
- assessments made against the relevant parts of the English or Welsh and mathematics curriculum
- prior key stage and phase attainment.

This overall picture should be accessible for all staff to use in planning for classroom delivery, making an informed assessment as to whether a learner has achieved a particular expectation, and whether it is in line with prior attainment. It will also facilitate the transference, consolidation and progression of learners’ skills across the curriculum.
Possible recording model for internal use

<table>
<thead>
<tr>
<th>Key</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Red</td>
<td>Learner has not yet achieved this expectation.</td>
</tr>
<tr>
<td>Amber</td>
<td>Learner has in some cases demonstrated they have achieved this expectation but not consistently and may require support.</td>
</tr>
<tr>
<td>Green</td>
<td>Learner has demonstrated that they have achieved and consolidated this expectation.</td>
</tr>
<tr>
<td>Blue</td>
<td>Learner has achieved this expectation and is working on expectations from a higher year group.</td>
</tr>
</tbody>
</table>

Assessment in each subject area of each learner using the LNF

This model is based on departments being assigned responsibility for the assessment of particular aspects of the LNF on a half-termly basis. All departments would have access to this recording model and update accordingly. This model allows teachers to see at a glance the progression of a learner in a particular skill to help with identification of next steps.

Teachers would use a more detailed rubric (not provided) which identifies for their subject area whether learners have gained the skills described in the expectation statements of the LNF and at what level. This would be done throughout the school year as learners demonstrate, consolidate and progress skills.

Schools will use curriculum mapping in order to plan which expectation statement of the LNF will be covered and developed in which subject area so it will not be necessary for every subject to provide a judgement on each expectation statement.
Teachers may meet to agree an assessment judgement for each element/aspect of the LNF for each learner (literacy and numeracy may be addressed within different meetings). This would represent the view of all relevant teachers about the expectation achieved for each element/aspect across the curriculum subjects.

An alternative to this is that the literacy/numeracy coordinator collates the assessment information from different subject areas in order to agree an assessment judgement for each aspect of the LNF.

4. Achievement against the LNF is reported, along with next steps for progression

Guiding principles

Literacy and numeracy reports to learners and parents/carers should:

- use the language of the LNF
- take a narrative approach rather than a single judgement on whether a learner is above/at/below the expectations for their year group
- contextualise the skill
- describe and assess individual progress to inform discussion about achievement and next steps:
  - with learners
  - with parents/carers
  - between teachers/practitioners
- consider diagnostic information from the National Reading and Numeracy Tests.
Principles into practice

Literacy and numeracy reports are a mechanism by which schools can involve learners and parents/carers in supporting progress.

Case study: primary school

One school has considered it helpful to involve and inform parents/carers at all stages of their child’s learning in literacy and numeracy. This school uses a next step log kept by the teacher and the learner that enables the parent/carer to comment on the learners’ application of a skill when reading or doing homework. This has enabled both reporting about a learner’s performance at a termly or annual waypoint and an ongoing dialogue between home and school.

Another school described how parents/carers were seen as having a key role in the setting and reviewing of their children’s next steps, and involving them early in the process made the school report more meaningful.

Other strategies for informing and involving parents/carers have included:

- information sessions with parents/carers to explain the purpose of the LNF, national testing and standardised scores
- consultation with parents/carers to establish what they would find useful in the reporting of literacy and numeracy skills
- a planned programme of assessment of learning across all key stages (details are published in advance in the school calendar and shared with parents/carers)
- regular parents'/carers’ meetings and target-setting days
- enabling parents/carers to help their children develop their literacy and numeracy skills through:
  - literacy and/or numeracy activity days or evenings
  - ‘how to help your child’ sessions
  - booklets detailing specific strands
  - examples of methods and relevant activities
  - signposting various relevant resources, including apps, books, websites.
Some schools have found the following guidelines useful in producing reports. They should:

- reflect on how a learner has developed a skill and what their next step is
- reference the relevant point at which a learner is currently working, even if this is not within the year group expectations
- report on the literacy and numeracy skills that have been assessed within the subject
- include the language of the LNF and contextualise the skill
- reference the strand or element
- choose to report on expectations that are of particular relevance to learners.

Examples of narrative reports

**Foundation Phase example**

In his recount writing on our visit to the fire station, Ioan showed that he is able to use talk to plan writing. He included a great deal of information by doing this and, by noting down his ideas, he could further develop the content of his writing.

**Key Stage 2 example**

When planning a school visit to Llandudno, Leo could tell the time to the nearest five minutes on an analogue clock and calculate how long it was to the next hour. He will need to tell the time to the nearest minute on analogue clocks in order to increase his accuracy.

**Key Stage 3 art and design example**

When planning a piece of extended informative writing on Cezanne, Aneurin was able to structure the information effectively to maintain the reader’s interest. In order to further enhance reader engagement, he could ensure that his presentation included sections, photographs and captions.
Key Stage 3 history example

In constructing a presentation on the impact of the Second World War, Mila chose to look at the number of British soldier deaths relative to the population of the UK. She used her data-handling skills to interpret information from diagrams and graphs to do this. In order to develop her understanding of the impact, Mila should consider comparing this data to that of other countries.

See Appendix 1 for further examples.

Issues to consider

Does every subject contribute to the reporting of a learner’s performance against the LNF requirements?

In putting forward a possible model for the assessment of learners’ performance against the LNF, the recent consultation document on the proposals for revising the curriculum and assessment arrangements stresses the need for cross-subject and cross-department collaboration.

The proposal notes that in their curriculum mapping, schools will have identified specific subject areas for the development of LNF expectations; and, therefore, it is not necessary for every subject to provide a judgement on performance against each expectation statement.

Should there be individual subject reports for each learner on their LNF performance or should their achievements/attainments be merged to give a single literacy and a single numeracy report for each learner?

There is support for both approaches.

The potential benefits of producing a single literacy and numeracy report for each learner are:

• by collating evidence from a range of subjects in one document, such reports provide a clearer, more comprehensive and manageable overall view of levels of achievement, strengths and areas for development

• cross-subject discussion as part of the process of agreeing an overall judgement supports assessment reliability
• it enables discussion for determining any mismatches should they arise, e.g. discrepancy of ability to apply a skill in literacy/numeracy in different subjects.

The potential benefits of producing individual subject reports on literacy and numeracy for each learner are:

• reports can detail clearly using specific examples the progress and next steps that each learner has made in that subject
• issues and concerns related to progress in a particular subject area can be more easily identified
• planning and mapping of the LNF across the curriculum, enabling reporting across a range of elements/aspects of the LNF.

Whichever method is chosen, the value of the report, to parents/carers and learners, depends upon teachers accepting full responsibility for assessing literacy and numeracy robustly and accurately in any context in which they are taught.

5. Data is used to track learner progress within and across subjects

Guiding principles

The purpose of a whole-school tracking or recording system is to enable schools to:

• monitor and track progress in literacy and numeracy across different subject areas, years and key stages
• identify which learners may need extra support or further challenge
• pinpoint if a learner is having difficulty in a particular subject
• assess delivery of the LNF and inform planning on a whole-school basis
• enable governors to challenge standards of literacy and numeracy and support planning for improvement.
Principles into practice

Case study: Mount Pleasant Primary School

We identified the advantage of having a system to track individual learner progress against the LNF and wanted the system to be able to:

• track a cohort from Nursery to Year 6
• track individual learners
• provide a breakdown of performance by gender, free school meals (FSM) and additional learning needs (ALN)
• provide a breakdown of performance in oracy/reading/writing
• compare test scores, end of year teacher assessment, LNF achievement
• generate snapshot reports
• exemplify skills using learner’s work
• record comments about learners
• be easy for teachers to use.

These screenshots show how we track learners at the school.
Subject and Year – A dropdown menu enables ‘Literacy’ or ‘Numeracy’ to be selected and a year group from Nursery to Year 6 for a particular cohort.

% previous year achieved – This refers to the percentage of LNF statements that were achieved by the learners in this case in Year 4.

% of current targets achieved – This refers to the percentage of LNF statements achieved so far this year in Year 5.

LNF element – Below each of the LNF elements the literacy/numeracy expectation statements are noted for each year group.

Being able to record all relevant data in one place had been an identified initial requirement of the tracker and these simple tables enable that requirement to be met. They also enable comparison of different data. In Mount Pleasant Primary School, comparison of previous teacher assessments, test scores and current progress through the LNF has led to the discovery that there is near perfect alignment between all three. More able and talented learners stand out as do the less able. The school have found this discovery comforting rather than surprising but also recognise the potential arising from results which are not in alignment. They would prompt an investigation into why results differed, the outcomes of which could prove useful in informing future planning.
Planning information

Numeracy and the percentage of learners meeting the skill – The first column notes how many learners in a year group are achieving any particular expectation statement while the second column gives the same information as a percentage. If either number is low then it helps inform planning that more quality opportunities to practice the skills involved are needed. Percentages lower than 50% cause the cell to be highlighted in pink.

Individual learner columns to the right of the expectation statements are used for recording the assessments. The letter ‘a’ is input in a cell when a teacher deems that a learner has achieved that expectation statement. This causes the cell to turn green. The letter ‘d’ for ‘developing’ is entered in a cell when a teacher deems that a learner is working on a particular expectation statement. This causes the cell to turn yellow. Should no assessment have been made then the cell appears light pink.

It is important to note here that robust and consistent assessment processes are implemented before any judgements are arrived at. The tracker is used merely to record the judgements.

Further information about the tracker can be obtained from NSP partners.

This tracking model was recently demonstrated at NSP reporting and tracking workshops. A video of the event is available on the Learning Wales website.

Further examples of tracking can be found in Appendix 2.
Appendix 1: Examples of narrative comments

**Individual subject report for each learner**

**Nia**

When researching the differences between political parties, Nia was able to use internet searches carefully in order to produce an information leaflet. In order to improve the quality of the information, she should employ strategies to assess the quality and reliability of information on web pages, considering its origins and verifying accuracy.

**Iolo**

During our study of immunisation, Iolo was able to read and understand two unseen texts independently and select evidence to support his understanding of both. In order to further enhance his reading comprehension, he should locate additional information and evidence from different sources.

**Rhodri**

When listening to the BBC’s *Material World* podcast about the Iranian earthquake, Rhodri was able to identify the events chronologically. So that he can show he has thought about the implications of what he has heard, he could compose pertinent questions for further discussion.

**Cerys**

During the group discussion on child labour in the Industrial Revolution, Cerys was able to follow the points made in the discussion, and give reasons for her agreement and disagreement. In order to further enhance her skills as chair of a discussion, she should try to guide the group to consensus.

**Cadi**

In Cadi’s written review of *The Boy in the Striped Pyjamas*, she was able to paragraph appropriately. In order to give her writing coherence, she should make links within and between paragraphs, using connectives.
Twm

In a discursive piece of extended writing on the relative popularity of rugby and football, Twm was able to convey ideas through impersonal language. In order to further demonstrate objectivity, he could use the third person.

Vicky

In her recent narrative writing, Vicky was able to write with grammatical accuracy. She was able to vary her sentence structures to create pace and tension. To develop her narrative, Vicky should plan the structure of her story and follow the four plot stages so that she can write more cohesive and fluent stories.

Matt

Matt has shown in his core reading task on persuasive leaflets that he is able to use strategies such as annotating and skimming in order to find key pieces of information. He is able to use inference skills to look at sub-text and is able to summarise in order to offer an overview of a text. To progress, Matt must develop his annotation so that it focuses on key words which will allow him to develop his points appropriately. He must also use technical terms a little more in his writing so that it becomes more specific.

Marc

In his piece of writing on the causes of the First World War, Marc showed that he is able to give weight to evidence and sources and use summary and discussion skills to present arguments, which made his writing more objective. To develop his skills in discussion, Marc should try to anticipate others’ views a little more, so that he can shape his arguments to suit them.

Elbie

In recent role play, Elbie was able to demonstrate his money managing skills by using different combinations of coins in order to pay for shopping up to a value of £2. In role as ‘shopkeeper’, he was able to work out the amount of change from £2 to give to the customer. So that he is able to pay for items up to a value of £10 and calculate the change, Elbie should work with larger sums of money.
Chris

In writing a treasure hunt activity, Chris used his measuring skills and the four compass points to describe directions for the person completing the trail. In order to increase the accuracy of direction, Chris should use the eight compass points.

Ruby

In working out whether a sheet of MDF required to make a pencil holder was large enough, Ruby was able to estimate and visualise size. In order to ensure that there is minimal wastage when cutting, Ruby should select, trial and evaluate a variety of cutting layouts.

Single literacy and a single numeracy report for each learner

Literacy

In her writing Elise is able to write a comprehensive account of a topic and in science and design and technology is able to present information and processes clearly. Elise finds presenting ideas and writing about the implications and consequences of historical events more challenging. This is an area of literacy she needs to develop.

In her reading, Elise has a clear understanding of differing views on the same topic and is able to identify any contradictions between those views, as she has shown in her work on global warming in geography. She needs to transfer these reading skills to all subjects, e.g. history where using and understanding source information is crucial. Identifying different interpretations of facts could also further strengthen her work.

Elise has shown considerable ability in her oracy skills across the curriculum, especially in her ability to respond to others’ views appropriately. Elise has been able to discuss differing viewpoints such as in her collaborative dance work in physical education that recognised every group member’s input and negotiated its performance successfully. Elise’s ability to listen and respond could be further developed by testing out others’ ideas in different contexts and discussing the results as a member of a group.
Numeracy

Roland has a clear understanding of how to interpret diagrams and graphs in a range of subjects and is beginning to use mean, median, mode and range to compare two distributions in the work completed on migration in geography. Roland’s next step will be to examine results critically, and select and justify his choice of statistics. Roland is confident in his use of a wide range of graphs and diagrams to represent discrete and continuous data, although he needs to ensure that the importance of scale is always reflected accurately. To progress, Roland will be given the opportunity to use scatter diagrams to investigate correlation in science next year.

Roland is beginning to show that he is able to transfer mathematical skills across the curriculum in a variety of contexts and everyday situations, and his personal and social education project for the Young Entrepreneur Challenge showed particular flair in his ability to select, trial and evaluate a variety of possible approaches. To develop his numerical reasoning skills, Roland should focus on refining his methods of calculations, as has been required of him in his product development task in design and technology.
Appendix 2: Curriculum planning to tracking – an exemplar for secondary schools

The following series of screenshots illustrate the possible journey for a secondary school through the processes of:

- mapping opportunities to practice numeracy skills across the curriculum
- identifying assessment opportunities
- tracking individual learner progress.

The journey begins with every subject being allocated a numeracy specialist to support them with the work of identifying numeracy opportunities which occur naturally within their curriculum.

The initial purpose was to ensure that opportunities offered were at an appropriate level for each year group. Consideration was then given to differentiation of tasks according to the needs of different groups of learners. To ensure that tasks throughout the year were sufficiently challenging for learners, progression within skills strands were also considered.

The screenshot below shows the numeracy opportunities offered by the Physical Education Department of Ysgol y Moelwyn, Blaenau Ffestinog for Year 7 learners.

### Screenshot 1

<table>
<thead>
<tr>
<th>LNF Expectation Statement</th>
<th>Term 1</th>
<th>Term 2</th>
<th>Term 3</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>USING MEASURING SKILLS:</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7M1 - read and interpret scales on a range of measuring instrument</td>
<td>Happens consistently throughout the year.</td>
<td>Happens consistently throughout the year.</td>
<td>Happens consistently throughout the year.</td>
</tr>
<tr>
<td>7M3 - convert between units of the metric system and carry out calculations</td>
<td>Health and fitness</td>
<td>Health and fitness</td>
<td>Health and fitness</td>
</tr>
<tr>
<td>8M3a - use rough metric equivalents of imperial units in daily use</td>
<td>Fitness Room</td>
<td>Fitness Room</td>
<td>Fitness Room</td>
</tr>
<tr>
<td><strong>TIME:</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7M5 - measure and record time in hundredths of a second</td>
<td>CROSS COUNTRY</td>
<td>ATHLETICS: use the stopwatch to take precise time measurements in pairs or groups.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Pupils run a cross country course every week and record their times. Verbally discuss the distance they run e.g. what’s the distance in km, m or miles.</td>
<td>Happens consistently. Working in pairs pupils use a stopwatch to time how quickly they can run 50m. Each pupil runs the 50m three times. They compare their result and note their fastest time.</td>
<td></td>
</tr>
<tr>
<td><strong>COLLECT DATA:</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7D2 - collect own data for a survey, e.g.</td>
<td>Health and fitness</td>
<td>Health and fitness</td>
<td>Health and fitness</td>
</tr>
<tr>
<td></td>
<td>Pupils are asked to conduct a</td>
<td>Pupils are asked to conduct a</td>
<td>Pupils are asked to conduct a</td>
</tr>
</tbody>
</table>
The second screenshot below shows an individual pupil tracking document used to record the assessment judgements of the PE teacher based on the opportunities identified. Schools need to be clear about when learners are assessed and how the assessment is to be recorded.

The form was easily produced using the NSP's multipurpose tool and can be used electronically or printed and placed in a teacher's mark book.

**Screenshot 2**

<table>
<thead>
<tr>
<th>PHYSICAL EDUCATION</th>
<th>PUPIL TRACKING DOCUMENT</th>
<th>PUPIL NAME</th>
</tr>
</thead>
<tbody>
<tr>
<td>LENGTH, WEIGHT/MASS, CAPACITY</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7M1</td>
<td>read and interpret scales on a range of measuring instrument</td>
<td></td>
</tr>
<tr>
<td>7M3</td>
<td>convert between units of the metric system and carry out calculations</td>
<td></td>
</tr>
<tr>
<td>TIME</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7M5</td>
<td>measure and record time in hundredths of a second</td>
<td></td>
</tr>
<tr>
<td>TEMPERATURE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7M8</td>
<td>record temperatures in appropriate temperature scales</td>
<td></td>
</tr>
<tr>
<td>USING DATA SKILLS</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7D2</td>
<td>collect and own data for a survey, e.g. through designing a questionnaire</td>
<td></td>
</tr>
<tr>
<td>7D3</td>
<td>interpret diagrams and graphs (including pie charts)</td>
<td></td>
</tr>
<tr>
<td>7D3a</td>
<td>use mean, median, mode and range to compare two distributions (discrete data)</td>
<td></td>
</tr>
<tr>
<td>PRESENT AND INTERPRET GRAPHS</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7D4</td>
<td>construct frequency tables for sets of data, grouped where appropriate, in equal class intervals (groups given to learners)</td>
<td></td>
</tr>
<tr>
<td>7D4a</td>
<td>construct a wide range of graphs and diagrams to represent the data and reflect the importance of scale</td>
<td></td>
</tr>
</tbody>
</table>

In the third screenshot we see an extract of the overall Year 7 numeracy mapping document for Ysgol y Moelwyn which collates the numeracy opportunities offered by departments across the curriculum. This enables the school to see at a glance where the gaps in provision occur and which elements have most coverage. The exemplar given shows how the data handling strand in covered in Year 7. The school is now in the process of ensuring consistency in the way that data topics are taught and of assessment expectations.
The proposed programmes of study for English and mathematics, which note the specific skills to be taught in each year, will prove helpful to teachers when planning English and mathematics delivery. A school, in its mapping, will wish to identify within which half term a skill is first taught and where, as this will help other departments with their planning of literacy and numeracy content.

The fourth screenshot shows a simple version of an Excel tracking document which collates assessment judgements about whether skills have been achieved from selected departments across the school. All departments could be included on the document and data collated termly (this exemplar is for the first term).
## Screenshot 4

<table>
<thead>
<tr>
<th>YEAR FILTER</th>
<th>DEPT FILTER</th>
<th>Science</th>
<th>Geography</th>
<th>IT Design and technology</th>
<th>PE</th>
<th>Coalition of assessment for one term</th>
</tr>
</thead>
<tbody>
<tr>
<td>m m m m m m m m</td>
<td>COLLECT AND RECORD DATA</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Y Y Y</td>
<td>7D2</td>
<td>Collect own data for a survey, e.g. through designing a questionnaire</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>m m m m m m m m</td>
<td>PRESENT AND ANALYSE DATA</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Y Y Y</td>
<td>7D3</td>
<td>Interpret diagrams and graphs (including pie charts)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Y Y Y</td>
<td>7D3a</td>
<td>Use mean, median, mode and range to compare two distributions (discrete data)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>m m m m m m m m</td>
<td>PRESENT AND INTERPRET GRAPHS</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Y</td>
<td>7D4</td>
<td>Construct frequency tables for sets of data, grouped where appropriate, in equal class intervals (groups given to learners)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Y</td>
<td>7D4a</td>
<td>Construct a wide range of graphs and diagrams to represent the data and reflect the importance of scale</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Screenshot 5 is an exemplar is for the second term.

## Screenshot 5

<table>
<thead>
<tr>
<th>DEPT FILTER</th>
<th>Science</th>
<th>Geography</th>
<th>IT Design and technology</th>
<th>PE</th>
<th>Coalition of assessment for term 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>m m m m m m m m</td>
<td>USING DATA SKILLS</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Y Y Y</td>
<td>7D2</td>
<td>Collect own data for a survey; e.g. through designing a questionnaire</td>
<td></td>
<td></td>
</tr>
<tr>
<td>m m m m m m m m</td>
<td>PRESENT AND ANALYSE DATA</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7D3</td>
<td>Interpret diagrams and graphs (including pie charts)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7D3a</td>
<td>Use mean, median, mode and range to compare two distributions (discrete data)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>m m m m m m m m</td>
<td>PRESENT AND INTERPRET GRAPHS</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7D4</td>
<td>Construct frequency tables for sets of data, grouped where appropriate, in equal class intervals (groups given to learners)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7D4a</td>
<td>Construct a wide range of graphs and diagrams to represent the data and reflect the importance of scale</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Assessment, recording and reporting using the National Literacy and Numeracy Framework
July 2014
Guidance document no: 142/2014
Central to this document is a list of all the numeracy expectation statements for a particular year group or year groups.

On the right-hand side of the numeracy expectation statements are columns for each subject. Placing a ‘Y’ next to expectation statements which a particular department will report on and instigating the filter for that column modifies the form so that it displays only those expectation statements. This makes the process of inputting information much easier for each department. Once a department has completed inputting their data then removal of the filter will restore the entire document. The ‘Y’s noted on the left-hand side of the document will then provide an overview of the expectation statements assessed.

To the left of the numeracy expectation statements are columns in which judgements about learner achievement can be recorded. It should be noted that robust and consistent Assessment for Learning (AfL) and Assessment of Learning (AoL) processes are needed to underpin these judgements. In the example above, three judgements from three different departments can be recorded for each learner. The number of these columns can be increased or decreased as required.

The following is the grading system employed in this example:

3 = skill has been achieved  
2 = skill is almost achieved  
1 = skill is being developed  
0 = skill has not yet been addressed.

In the fourth column, beneath every learner name, an average of the information input into the previous three columns is automatically calculated. If this number is 2.5 or greater the expectation statement is deemed to have been achieved and the cell turns green. For values below 2.5 the cell turns red.

This form will generate an overall view of which expectation statements have been met and which have not. This information will help teachers plan appropriate tasks and will provide a detailed learner profile for transition between classes and key stages. It can also provide valuable information for report writing.
Appendix 3: Useful resources

**Welsh Government**

*Assessment for learning and the National Literacy and Numeracy Framework* (2013)


Professional learning communities


**Estyn**

*A story of resilience and persistence* – best practice case study of a secondary school

*Assessment for learning and thinking skills a top priority* – best practice case study of a primary school

**Other**

Dylan Wiliam’s videos references