1

Understanding learners with dyslexia

```
                      Being a Dyslexia-
                       friendly teacher

 Revision: graphical                          Quiz: what do we
  representation                             know about dyslexia?


                      Understanding learners
                         with dyslexia        Vocabulary games
 Help with dyslexia
   by setting
  homework first

        ICT: word-processing            Defining dyslexia
```
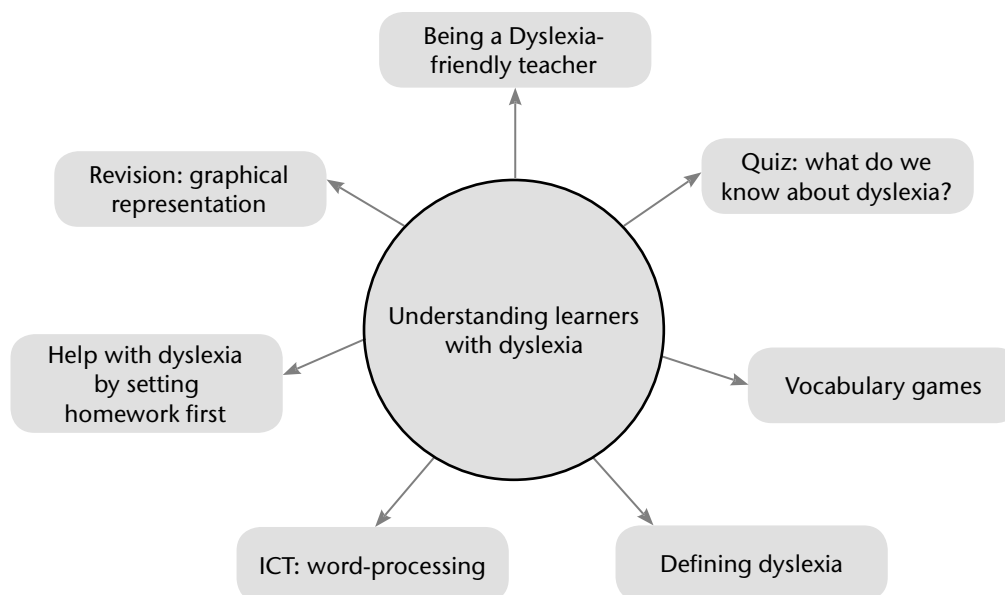
The main ways of talking about dyslexia fall within a medical-psychological (deficit-based) view and a socially constructed view. In education, dyslexia discussion is often about how to improve the learning power and skills of dyslexic students; this can become a discourse of deficit. In seeking to help learners, a Dyslexia-friendly view does not consider dyslexia characteristics as deficits to be discussed in terms of student failings. Instead it promotes commitment to improving our learning environments. We seek to develop awareness of approaches that will help students to manage their learning and to achieve appropriately.

Good Practice Points: Being a Dyslexia-friendly teacher

A great deal more is known about dyslexia than used to be the case, and a great deal of good practice may be found in schools incorporated into practitioners' daily routines.

A Dyslexia-friendly teacher's professional knowledge is a combination of attitude, understanding, technique and empathy. If we do not experience dyslexia ourselves, it may help to adopt a 'dyslexia proxy' by reflecting on our experience of some other, personal difficulty in our schooling. To be Dyslexia-friendly we can:

1. Make ourselves familiar with the characteristics of dyslexia.
2. Appreciate the importance of the learning environment.
3. See dyslexia as a whole-school concern.
4. Keep updating our own knowledge.
5. Use Dyslexia-friendly approaches, including multisensory practices.
6. Notice individual students' preferred ways of learning, providing opportunities for success.
7. Connect new learning to previous, secure learning, and then rehearse and revisit.
8. Allow a variety of methods for recording work.
9. Understand that there are good days and bad days, appreciating that this is not deliberate avoidance or laziness in a learner.
10. Protect students' feelings, realising that literacy activity may be fearful for some learners.
11. Recognise that sometimes it is two steps forward and one step back – or vice versa!
12. Provide dyslexic students with opportunities for success.

Dyslexia is a heterogeneous concept, so we can say that no two dyslexic learners are the same. In addition, whatever the individual characteristics of dyslexia, environmental elements of all types provide meaningful influences that cannot be fully assessed, since they are the effect of lives as they are lived. Nevertheless, there is now a degree of confidence in common characteristics among most dyslexic learners. Foremost among these is the recognition of phonological difficulty and/or reduced speed of processing, and memory difficulties, all characterised by a lack of automaticity. Additional characteristics, such as sequencing or organisational difficulties, may or may not fall within formal definitions of dyslexia.

Quiz: What do we know about dyslexia?

Dyslexia knowledge is increasing all the time and is more widely dispersed. The quiz presented in Figure 1.1 is a photocopiable resource for self-reflection or training. We suggest giving out the blank version for people to work on individually or together, and then giving out the same sheet with the answers inked in. This provides information quickly and avoids using time on covering material that people already know; it may also update earlier knowledge. It is noticeable that some of the answers are 'unsure' until further research has clarified the issues. The quiz also highlights the amount of misunderstanding that may be found about dyslexia. The answers, in terms of current knowledge, are:

1 False	10 Sometimes	18 True
2 False	11 True	19 False
3 False	12 Unsure	20 Sometimes
4 True	13 Unsure	21 False
5 False	14 False	22 False
6 Sometimes	15 False	23 True
7 False	16 Sometimes	24 True
8 Sometimes	17 False	25 Sometimes
9 Sometimes		

	True	False	Some-times	Unsure
1. There is an agreed theoretical understanding of dyslexia				
2. There is an agreed definition of dyslexia				
3. Dyslexia affects mostly boys				
4. Dyslexia can be inherited				
5. There is a (single) dyslexia gene				
6. People with dyslexia work better with tinted paper				
7. Dyslexia can be cured				
8. The main difficulty is reading (decoding)				
9. The main difficulty is spelling				
10. The main difficulty is written expression				
11. The main difficulty is that literacy skills do not become automatic				
12. The main difficulty is memory				
13. The main difficulty is speed of processing				
14. The main difficulty is letter reversals				
15. Dyslexia is completely different from 'ordinary' reading delay				
16. Learners with dyslexia have strengths in other areas				
17. Dyslexia is a myth				
18. Dyslexic learners experience more fatigue				
19. Dyslexic learners are best placed in low achieving sets/groups				
20. Dyslexic learners need to sit at the front				
21. Extra time in exams is for checking spelling				
22. It is unfair to other learners to ask a dyslexic child for less output				
23. The experience of dyslexia relates to the language used				
24. Dyslexic learners are disadvantaged by surprise literacy tasks, e.g. reading aloud, writing on a board, a quiz				
25. People with dyslexia are very intelligent in other ways				

The Dyslexia-friendly Teacher's Toolkit, SAGE Publications Ltd. © Barbara Pavey, Margaret Meehan and Sarah Davis, 2013.

Figure 1.1   What do we know about dyslexia? A quiz

Dyslexia is now largely, but not exclusively, understood to be a difficulty with significance for the language centre of a brain. Reduced activation is now seen as a key factor rather than physiological abnormality or deficit in a brain's structure. Dyslexic students may also experience problems with mathematics, musical notation and motor control. This last, where it impacts upon handwriting difficulties, may be discussed in the UK as part of an individual's expression of dyslexia or be associated with dyspraxia; it may also be separately identified as dysgraphia.

In written work dyslexic students may rely on a safe vocabulary, which will mean that they may not use words that will demonstrate the sophistication of their understanding. This does not mean that they may not enjoy exploring and using an extended vocabulary, and with encouragement students can go on to use this in writing. There are vocabulary games available which are literacy exercises presented in an appealing way, but the three games below are offered as helpful to dyslexic students because they do not put an individual in the spotlight. They do not rely on writing and spelling, and most importantly they are intended to be fun. In this way they help dyslexic students to get the matter of vocabulary under control.

Something to Try: Vocabulary games

- **Today's Target Word.** A teacher sets a target word and students using that word in the course of the lesson receive praise or applause or a reward of some kind. The teacher identifies the word at the start of the lesson and provides the opportunity for students to ask for an explanation, and to understand that they are not being asked to give an example of how the word might be used, or demonstrate their knowledge of the word, or talk about similar words or rhyming words (although actually these would be useful vocabulary-extending activities). Instead they are being asked to slide the word into conversation or discussion; this is a far more creative task, and one that requires students to listen carefully. Use of the word generates praise and applause.

- **Vocabulary War.** The class is divided in two. Students in one group choose a word and challenge the other group to define and/or put it in context. Students can confer to find challenging examples to nominate, or to check with each other what would be the correct answer, allowing for further focused chat about the word. Students might well nominate, for the other side, the most difficult and convoluted word they could think of, which would make it more fun. The teacher is the arbiter and points can be given to either side for correct usage.

- **Headlines.** The teacher nominates three seemingly random words and students have to make a headline out of them, preferably comic or credibility-stretching headlines, but ones that make sense. Again, this can be done in groups or in 'sides', challenging each other.

Defining dyslexia

In the UK professional support endorses the definition published in the Rose Report of 2009, *Identifying and Teaching Children and Young People with Dyslexia and Literacy Difficulties* – a publicly available resource. While this is described as a 'working definition', it is embraced by the major dyslexia organisations. Rose's definition begins:

> Dyslexia is a learning difficulty that primarily affects the skills involved in accurate and fluent word reading and spelling. (Rose 2009: 30)

Referring also to the relative strengths that some people with dyslexia may experience, the British Dyslexia Association (BDA) augments this definition:

> In addition to these characteristics, the BDA acknowledges the visual and auditory processing difficulties that some individuals with dyslexia can experience, and points out that dyslexic readers can show a combination of abilities and difficulties that affect the learning process. (BDA, n.d.)

Reading comprehension and written expression are not included in Rose's definition, although they are explored later in the report where each subsequent element of the definition is discussed in more detail. The definition focuses upon six elements, shown here in italics:

> *Characteristic features of dyslexia are difficulties in phonological awareness, verbal memory and verbal processing speed.*

While these elements are 'reliable markers of dyslexia' (Rose, 2009: 33), this is not the same as saying that all these characteristics must be present in order for dyslexia to be identified. Some dyslexic learners do not have a clearly discerned phonological difficulty when tested. The word 'characteristic' does not mean compulsorily present; the definition allows for the possibility of variation among dyslexic learners.

> *Dyslexia occurs across the range of intellectual abilities.*

A welcome addition to earlier definitions, this reduces the possibility of under-identification and lack of Dyslexia-friendly intervention for some learners. It accords with the principle that good teaching for dyslexia is good teaching for everyone.

> *It is best thought of as a continuum, not a distinct category, and there are no clear cut-off points.*

This represents an important development in dyslexia understanding. While there has been no difficulty with the understanding that dyslexia itself falls within a range, typically characterised as mild, moderate or severe dyslexia, this point goes further. The report continues:

> *Until recently a child was deemed ether to have or not have dyslexia. It is now recognised that there is no sharp dividing line between having a learning difficulty and not having it. (p. 34)*

Debate has focused upon whether dyslexia forms a discrete category of reading difficulty/ disability, or whether the term describes the extreme expression of traits that are continuously distributed among people. The above explanation identifies dyslexia as representing the most challenging end of the range of general reading acquisition, where it becomes disabling. However there is no agreement as to where this tipping point occurs.

> *Co-occurring difficulties may be seen in aspects of language, motor coordination, mental calculation, concentration and personal organisation, but these are not, by themselves, markers of dyslexia.*

There is increasing interest in the other characteristics that many dyslexic students may experience; some specialists think that most dyslexic students experience complicating difficulties.

> *A good indication of the severity and persistence of dyslexic difficulties can be gained by examining how the individual responds or has responded to well-founded intervention.*

Earlier definitions understood that dyslexia was characterised by its intractability and the term 'developmental dyslexia' has long been used to distinguish it from acquired dyslexia. Dyslexic learners today may be identified in research as demonstrating the literacy characteristics of younger, less experienced readers. While we now understand dyslexia as describing the extreme end of a regular distribution of reading acquisition, there is a difference between a reader who is delayed because they are untutored and one who experiences dyslexia and that difference concerns intractability. With regular skilled teaching a delayed, untutored reader will catch up, but dyslexic learners will continue to have difficulty in some areas of literacy, even if it is not immediately apparent in their reading.

🗁 Case Study: Larry

Sometimes dyslexic difficulties are less obvious, reflecting dyslexia's location within a range.

Larry learned to read early on, by an unusual route. His grandparents owned a bookshop and made sure that Larry had access to many beautiful books. He would look at the print while stories were read to him, the words were pointed out and the stories were discussed. At school, because he could read, there was no cause for concern about his literacy. However, Larry's spelling was not as good as his reading, and his written work was slow; he rarely produced more than one or two sentences.

Larry's reports were consistently written as variations on the theme 'could do better'. As far as Larry was concerned, he was trying his hardest and did not know how he could do better. He read slowly and had to read every word; he knew he was trying hard, but could not explain to his parents why his results were disappointing.

In spite of a strong start, Larry's reading skill did not develop to a sophisticated level. However, he was good at guessing the context of what he read, preferring practical, illustrated texts to fiction and novels. As far as his teachers were concerned, he remained a person who simply did not engage well with literacy-based work. He left school as soon as he was old enough. As an adult, Larry developed his own successful gardening business and now pays others to do clerical and administrative work for him.

Commentary: How might a Dyslexia-friendly teacher and school support Larry?

Larry's situation reflects how a learner may experience dyslexia which remains unidentified. Is Larry dyslexic? In Larry's case, his learning history suggests that he missed out on learning phonological strategies that would help him to decode unfamiliar words, but the seriousness of his difficulty, and its persistence, suggests that this is due to more than lack of tutoring.

Increasingly, knowledge of dyslexia makes it easier to identify a student with severe dyslexia who, in spite of best efforts, remains at an immature level of literacy. It is often the case that students develop their own strategies to help them manage literacy tasks. These may remain hidden, and there may be insights, surprises and interesting ideas in store for a teacher who asks a student how they actually go about a literacy task. If at a later date they are engaged with higher level study, students with this profile may reach a point where self-developed strategies are not enough. It may not be until this point that they are identified as dyslexic, and then support can be provided and entitlements met.

Student Voices: Neil

A Dyslexia-friendly teacher sees a student's response to teaching as a guide; it tells a teacher about the things students find difficult and the best ways of helping. Here is the voice of Neil, an adult, who could have been like Larry at school:

> l still, now, go to write a word and I'll start off at the back, and I'll work my way to the back. It's the same with my reading. Sometimes I'll write half the word, and write the other half of the word, and put a little bit in. When I'm reading especially, sometimes it's just one line, constantly, I just can't break the words up. I make it up instead – I get on with it. (Neil, an adult)

What might a Dyslexia-friendly teacher learn from this?

1. There is a need to investigate what Neil means when he says *I'll start off at the back, and I'll work my way to the back*. Is this a verbal slip-up, a mistake, or his actual strategy? A teacher might expect a linear progression along a certain literacy learning route, so would only know about these things from asking Neil or from observing him closely and sensitively.
2. The way Neil approaches the task of writing a word has nothing to do with the way in which a teacher might expect it to be approached. Some might say this was incorrect, yet Neil can work it out his own way. He puts in the bits he knows, then has a look at it and if he is not satisfied he adjusts it.
3. In reading Neil tells us that he has difficulty breaking words into their component parts – 'segmenting' as it is described in literacy teaching. This shows a need for an intervention that will teach this skill in a focused way.
4. If Neil does not know the word, he will substitute something and carry on – this is a good coping strategy for him.
5. His own analysis shows that Neil is well aware of his difficulties and the ways he copes with them.

It is quite possible that Neil would have spent his school years in the lower subject sets. This is a common pattern and an unhelpful one; dyslexic learners should not be in lower sets because of their literacy. They should be supported at a level commensurate with their overall ability, but this can be hard for schools to arrange. Dyslexia-friendly processes are helpful throughout the school; nevertheless, there are always some students who will need additional help.

Information and Communication Technology: Word-processing

There are many advantages for dyslexia learners in the use of ICT, but the most common usage is for producing written work. In 2000 Sally McKeown summed up the value to dyslexic learners of using ICT, particularly word-processing:

• Written tasks are more easily managed.
• The alphabet is displayed on keys, aiding memory and removing reliance on correct letter formation.
• Written work is therefore more legible.
• Presentation is better so that unfavourable judgements are not made on this basis.
• Work is more safely retained; this is especially important for coursework.

These points still hold true. There may still be opposition from practitioners who believe that electronic written work is unacceptable, and there may be other practitioners who would like to have such ICT provision for their students but for whom it is not available. What we need to ensure, where we can, is that word-processing is readily accessible for class and school work and is not viewed as a treat.

Homework: Set homework at the start of the lesson

A Dyslexia-friendly approach to homework would include the ICT points above but could extend much further. Teachers could become more Dyslexia-friendly by setting homework at the start of the lesson, not at the end. This would make the link between class work and homework more apparent, giving students a chance to clarify their understanding and to note it down in legible format.

There is a continuing debate as to whether young students should be given homework. However, Directgov, the UK's public service website, provides a sliding scale suggesting how much time is recommended for homework, from one hour per week for years 1 and 2 (where children are 6 and 7 years old respectively) to two and a half hours per day in years 10 and 11 (where students are 15 and 16 years old). For younger children the website points out that 'homework' will involve reading to family members, but for dyslexic learners homework also means catching up on work not completed at school.
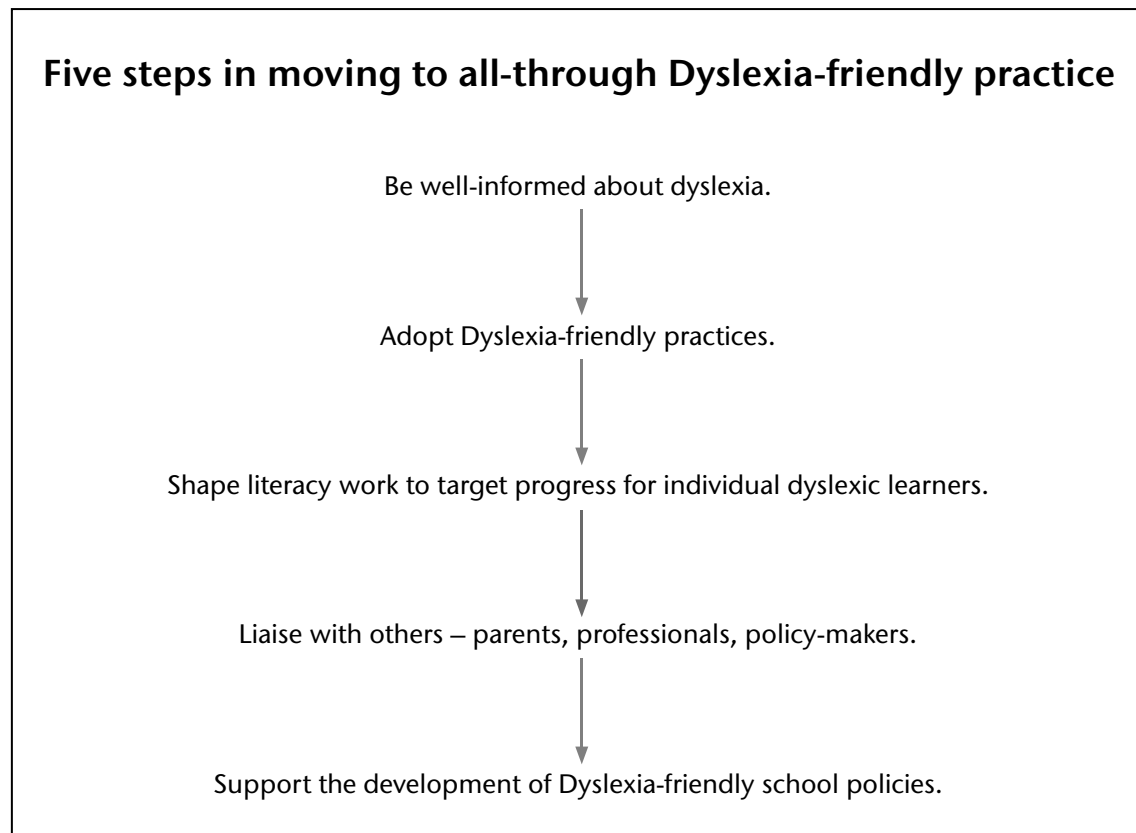
Many parents of dyslexic children are willing to help with homework but cannot read what has to be done from their child's writing, especially if the teacher calls this out at the last minute. Some schools operate homework helplines; paid-for, online support is also available.

However, homework misunderstandings can be avoided by thinking about what a dyslexic learner needs to know, and be able to access, in order to do the homework successfully.

Revision: Graphical representation

Many Dyslexia-friendly techniques and practices support revision because they do not depend on the written expression of an idea. Neil MacKay, the originator of the Dyslexia-friendly concept, notes that many of his recommended pedagogical activities were originally developed in order to support students undertaking examinations.

Though not everyone likes graphical representations, many students are helped to revise through using techniques such as the thought spray, spidergram or Buzan's Mind Map®. Each word in such a graphical representation is like a small iceberg, standing for a much larger area of knowledge. A graphical representation can be converted to a list by numbering the items.

Five steps in moving to all-through Dyslexia-friendly practice

Be well-informed about dyslexia.

↓

Adopt Dyslexia-friendly practices.

↓

Shape literacy work to target progress for individual dyslexic learners.

↓

Liaise with others – parents, professionals, policy-makers.

↓

Support the development of Dyslexia-friendly school policies.

Whole-school and whole-class strategies for a language and literacy focus

Recognising the importance of underlying language factors, Table 1.1 considers school and class strategies that support language development in relation to dyslexia.

Table 1.1   Whole-school and whole-class strategies for a language and literacy focus

	Early years	**Primary**	**Secondary**	**Tertiary**
Whole-school strategy	Policy and practice focus on language development.	School policy for literacy acquisition reflects Dyslexia-friendly methods.	The subject-focused curriculum allows for alternative ways of recording and demonstrating knowledge. All areas provide subject-specific vocabulary.	Strategy reflects possible late identification of dyslexia and makes arrangements and adjustments accordingly.
	There is a process for identifying speech and maturity or difficulty at school entry. There is access to speech and language advice.	There is a system in place for noticing and identifying readers and spellers who are falling behind and working with them.	There is a system for identifying signs of disaffection among poor readers. Where a child is showing behavioural difficulties, there is assessment for dyslexia and appropriate remediation.	All staff encourage the expression of sophisticated concepts and understanding. They appreciate how hard this may be for some dyslexic learners.
Whole-class strategy	Teaching encourages talking, speech sounds, rhyme, verbal interaction, story-telling, memory games.	Teaching encourages reading, spelling and written expression using Dyslexia-friendly approaches.	Teaching encourages written expression and subject knowledge, valuing an extended vocabulary even if it is not correctly spelled.	Teachers look for indicators that dyslexic learners are thinking faster than they can read or write, or that they are relying on old, unhelpful literacy habits.
	Teacher does not accept one-word answers and does not speak for a child. Teacher has access to speech and language advice for remediating language immaturities.	Classroom displays are clear and easy to read. They are not too chaotic or overcrowded.	Games and activities are developed to encourage confidence in using an extended vocabulary.	Teaching includes discussion with learners about how best they learn. Memory aids are used to help memorise subject-specific vocabulary.

Useful websites

These three major UK organisations provide information, advice and resources for practitioners, parents and people who experience dyslexia:

- The Dyslexia-SpLD Trust: http://www/thedyslexia-spldtrust.org.uk/
- British Dyslexia Association: http://www.bdadyslexia.org.uk/
- Dyslexia Action: http://www.dyslexiaaction.org.uk; their shop is at http://store.dyslexiaaction.org.uk

Further reading

MacKay, N. (2012) *Removing Dyslexia as a Barrier to Achievement* (3rd edn). Wakefield: SEN Marketing. Available from: http://www.senbooks.co.uk (email sales@senbooks.co.uk).

MacKay, N. and Tresman, S. (2005) *Achieving Dyslexia Friendly Schools Resource Pack*. London: British Dyslexia Association. Available online at: http://www.bdadyslexia.org.uk/ (training and accreditation section).

Rose, Sir J. (2009) *Identifying and Teaching Children and Young People with Dyslexia and Literacy Difficulties*. Nottingham: DCSF Publications.