



Introduction to the self-study tasks

These self-study tasks are designed to help trainee teachers on PGCE courses learn more about teaching pupils with special educational needs (SEN) and/or disabilities. They can be used as standalone activities or to supplement and extend taught sessions on SEN and disability provided by the school or local authority.

There are 17 self-study tasks in all. Each task will take about two hours to complete, excluding practical activities.

Every Child Matters			
SST1	Inclusion and Every Child Matters		
SST2	SEN and disability legislation		
SST3	English as an additional language and SEN		
SST4	Children's needs and development		
SST5	ICT and SEN		
Cognition a	nd learning		
SST6	Moderate learning difficulties		
SST7	Dyslexia and specific learning difficulties		
SST8	Working memory		
Behavioura	l, emotional and social needs		
SST9	Behavioural, emotional and social difficulties		
Communica	ation and interaction		
SST10	Speech, language and communication needs		
SST11	Autistic spectrum disorders		
Physical an	d sensory impairment		
SST12	Visual impairment		
SST13	Hearing impairment		
SST14	Handwriting		
SST15	Developmental coordination disorder/dyspraxia		
Working in	partnership		
SST16	Working with colleagues in school		
SST17	Working with parents/carers and other professionals		

How to use the materials

This is an online resource. Some of the tasks are for you to do on your own; others are particularly suitable to do working with a partner.

Where some of the tasks ask you to record information you need to print out the relevant material first. Other tasks may involve using the internet, which gives you access to rich sources of information about SEN and disability and online forums for additional advice.

Each task includes the following elements:

- the professional standards addressed
- learning outcomes
- an opportunity to explore the concepts, definitions and research findings most relevant to the topic
- ideas for implementing the national curriculum inclusion statement in relation to the topic, including target setting, practical strategies, the role of additional adults and pupil grouping
- practical activities including action research, child study and class observation
- resources including books and websites
- an opportunity to evaluate your progress against the outcomes and plan your next steps.

A useful resource to support your studies is **Implementing the Disability Discrimination Act in Schools and Early Years Settings (DfES, 2006)**. It is available free to all schools and there should be a copy in your training institution or school. (If you haven't got a copy, you can order one using the link.)

It should be read in conjunction with **Promoting Disability Equality in Schools (DfES, 2006)** – which you can view, download or order by following the link.

Evidence and sources of information

As you work through these self-study tasks, try to keep a critical and evaluative attitude. Much of the understanding we have of what works, or doesn't work, in relation to meeting the needs of pupils with SEN and/or disabilities has not been fully researched.

Remember:

- many interventions suggested for one group of pupils with SEN and/or disabilities will often benefit other groups of pupils, including those without SEN and/or disabilities
- the quickest way to find out what to do is often to ask the pupil or their parent/carer what they
 think works.

Literature reviews of 'what works' in relation to literacy and mathematics for pupils with SEN and/or disabilities, which has been investigated in some depth, are available at: www.dcsf.gov.uk/research/data/uploadfiles/RR554.pdf

Self-study task 4 Children's needs and development

Professional standards addressed

- Understand how children and young people develop and that the progress and well-being of learners are affected by a range of developmental, social, religious, ethnic, cultural and linguistic influences.
- Know how to make effective personalised provision for those they teach, including those for whom English is an additional language or who have special educational needs or disabilities, and how to take practical account of diversity and promote equality and inclusion in their teaching.
 - (b) Know how to identify and support children and young people whose progress, development or well-being is affected by changes or difficulties in their personal circumstances, and when to refer them to colleagues for specialist support.

Learning outcome

You will understand theoretical perspectives on children's needs and development, and how these can inform inclusive teaching.



Activities		Timings
Activity 1	Maslow's theories	20 minutes
Activity 2	Every Child Matters	10 minutes
Activity 3	The circle of courage	10 minutes
Activity 4	Implications for pupils with SEN and/or disabilities	20 minutes
Activity 5	Understanding how children develop	35 minutes
Activity 6	Development in pupils with SEN and/or disabilities	15 minutes
Activity 7	Points for action	15 minutes
Appendix	Suggested answers and solutions	



Maslow's theories



Approximate timing: 20 minutes

Introduction

The psychologist Abraham Maslow developed a theory about human motivation based on what he called a 'hierarchy' of needs. All of us, he said, have a variety of needs. Some of these relate to basic survival instinct, ie we all need food, warmth and shelter.

Once these needs are satisfied, we will be motivated by the need for safety and strive for an environment in which we feel physically and emotionally safe and secure.

At the next level, we seek experiences that make us feel loved, cared for and accepted by others. We need to feel that we belong in a group.

Beyond this, we will seek to feel good about ourselves, to feel appreciated and to receive feedback that leads to a positive self-image.

Once these needs are met we will seek to meet other, higher order needs, grouped under the heading of 'self-actualisation' – the need to seek new knowledge and understandings, the need for aesthetic experiences, the need to use our talents to the full and challenge ourselves to 'be the best we can be'.

All of us can and do move up and down this hierarchy of needs at different points in our lives. You might want to reflect on how this has happened to you in your own life: how, for example, a focus on succeeding at school or work suddenly took second place to the need to find love, affection and belonging when a significant relationship in your life broke down.



Maslow's theory can be helpful to teachers in making sure that pupils are able to learn by understanding and attending to the wider range of needs that they have.

The needs that Maslow outlines can be met in different environments. A pupil might not be able to have all their needs met equally at home, at school, and in the community – but if at least one of these environments meets the need, the pupil will have a greater chance of progressing towards 'self-actualisation'.

Applying these ideas to learning



The next task invites you to apply Maslow's model to learning. Table 1 below describes concerns that pupils might have. Look at the chart and note, against each of the concerns, which area of Maslow's hierarchy it relates to.

Table 1: Pupils' concerns	
I'm scared of those boys	
I'm always in trouble	
I'm not satisfied with my work	
I'm no good at getting on with other kids	
I'm hot	
I can't say what I mean	
I'm different	
My teacher does not notice when I try my hardest	
I could do better than this	
It's stuffy in here	
I don't know the other kids on my table	
I'm cold	
I'm thirsty	
Teachers like all the other kids better than me	
I'm ugly	
I'm worried about my mum	
I can't do my work properly	
I'm tired	
These people don't like me	
I'm hungry	
My work is rubbish	

Now compare your ideas with the notes that follow.

Remember that Maslow placed basic physiological needs – such as the need for food, water and warmth – at the foundation of his triangle. Pupils are unlikely to be able to learn well if they have concerns like these:

I'm hot	I'm thirsty
It's stuffy in here	I'm tired
I'm cold	I'm hungry

Pupils also need to feel safe in their learning environment. If they feel vulnerable, eg if they are afraid of making mistakes or of not fitting in with the peer group, they will be less able to learn. The need to feel safe is reflected in the concerns:

I'm worried about my mum	I'm scared of those boys
--------------------------	--------------------------

The next element in Maslow's hierarchy, 'belonging', involves the need to be accepted and to have friends. Learners need to feel that they are a valued part of their learning group if they are to perform effectively. Where this is not the case, the pupil might feel:

My teacher does not notice when I try my hardest	Teachers like all the other kids better than me
I don't know the other kids on my table	These people don't like me

Out of the need to experience affection and belonging will emerge the need for a sense of self-esteem. Pupils need to have a positive image of themselves and to feel that they have recognition and appreciation from others for their contributions. The need for self-esteem and the fear of losing it is a key factor in pupils' learning. Pupils might feel:

I'm no good at getting on with other kids	I'm ugly
I'm always in trouble	I'm different
My work is rubbish	

The highest level of need is only relevant when all others are satisfied. Maslow's term, 'self-actualisation', relates to the ability to achieve our full potential, to do the work required to succeed, to learn, and to be confident. The chance to be creative and autonomous is important for both children and adults. Concerns at this level might be:

I can't say what I mean	I'm not satisfied with my work
I could do better than this	I can't do my work properly

The role of the teacher



The next task asks you to think what teachers can do to help meet pupils' basic needs, so that they can learn.

Read the case study below.

Sam is an 11-year-old in year 6. He is small for his age, and thin. He often looks tired. He lives with his mother and older brother. His parents split up when he was six and he sees his father only occasionally. His mother finds him hard to manage. He is, she says, "always on the go", restless and argumentative.

At school he rarely sits still for long and often gets into arguments with other pupils, for example over equipment or who sits where. He is very impulsive and often acts without thinking. He is often on his own in school and staff have noticed other pupils teasing him on several occasions.

In class, he works best on practical activities. He is achieving below age-related expectations in most subjects and has some literacy difficulties. He considers himself to be 'stupid'.

Which of Sam's basic needs from Maslow's hierarchy do you think are not being fully met? Make notes in column 1 of table 2.

Table 2: Supporting Sam		
Unmet needs	Possible actions	

Now make notes in column 2 on any actions you think Sam's teacher might want to take so that he can succeed in learning, and so fulfil his 'higher order' self-actualisation needs. Once you have made your notes, compare them with the ideas in **the appendix**.



Every Child Matters



Approximate timing: 10 minutes

Another way of looking at the needs of children and young people is through the lens of the Government's Every Child Matters (ECM) framework. In developing this framework, extensive work was done with children and young people to seek their perspective on what they wanted from their lives.

The needs they identified were then grouped under five broad headings, often called the five ECM outcomes. You are likely to have met these already during your initial teacher training (ITT) programme and you can find out more by doing self-study task 1. This way of looking at children's development suggests that they need to:

- be safe
- be healthy
- enjoy and achieve
- make a positive contribution
- achieve economic well-being.



Think about how these five areas of need link to those identified by Maslow, by mapping them in table 3 on the next page.

Table 3: Mapping		
The five ECM outcomes	The needs identified by Maslow	
To be safe – from maltreatment, neglect, others' anti-social behaviour, bullying and discrimination		
To be physically and emotionally healthy		
To enjoy and achieve at school and through recreational interests		
To make a positive contribution — to forge positive relationships with others, to become self-confident, to be enterprising, to be involved in decision making and support the wider community		
To achieve economic well- being – to be on the road towards continuing their education or to employment		

Reflect also on the analysis you did earlier of Sam's needs and how teachers could seek to meet them. As you completed that analysis, you will probably have noticed areas of Sam's needs that a teacher could not be expected to influence. A teacher cannot, for example, repair Sam's relationship with his father or make sure he gets enough sleep.

Teachers are, however, part of a wider team that may have the power to address his unmet needs. For example:

- schools might have a learning mentor or parent support adviser who could discuss how much sleep he is getting with Sam and his mother
- schools might have a breakfast club that Sam could attend, so that he is well fed before class
- Sam and his family might receive help from a social worker, a youth worker, or child and adolescent mental health service (CAMHS).

The idea in ECM that all schools should offer extended services involving multi-agency collaboration is intended to provide for children like Sam.

ECM reminds us that if children and young people are to learn and thrive, we need to find ways of meeting not only the 'achievement' need that has traditionally been the province of schools.

Maslow's theory helps us understand why this should be the case by showing us that, unless the wide range of needs are met, pupils will not be able to focus their energies on learning. They will be too busy trying to find solutions to other, more pressing concerns.



The circle of courage

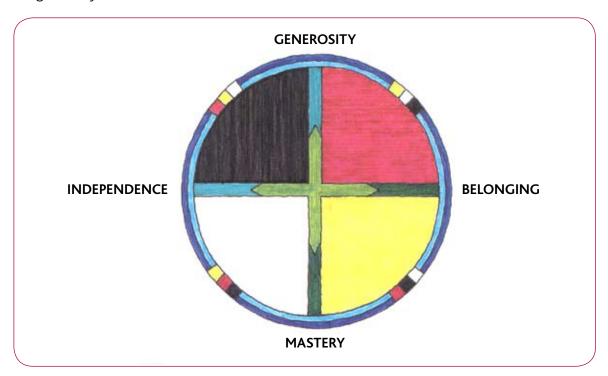


Approximate timing: 10 minutes

A third perspective on children's and young people's needs is the circle of courage model. It was developed, in Canada, by Brendtro, Brokenleg and van Bockern. It draws on western psychological theories, such as that of Maslow, but also on native American beliefs and perspectives towards life. It is also consistent with the beliefs and ways of living of other cultural groups and, as such, it provides a perspective that is culturally more inclusive than any one western psychological perspective.

The model is presented as a wheel with four spokes that keep the wheel true and strong:

- belonging
- mastery
- independence, and
- generosity.



Brendtro, L K, Brokenley, M and Van Bockern, S (1190). Reclaiming youth at risk: our hope for the future. Bloomington, IN: National Education Service.

The spirit of belonging

As with Maslow's theory, the circle of courage proposes that the need to belong and be loved (family, affection, relationships, acceptance by others) is essential to self-esteem and cognitive development. Teachers must draw pupils into the 'spirit of belonging' and establish relationships based on trust and respect.

Table 4: Distorting or breaking the spirit of belonging		
Spirit of belonging	Distorted spirit of belonging	Broken spirit of belonging
Attached	Gang loyalty	Unattached
Loving	Craves affection	Guarded
Friendly	Craves acceptance	Rejected
Intimate	Promiscuous	Lonely
Gregarious	Vulnerable	Isolated
Trusting	Overly dependent	Distrustful

Mending a broken spirit of belonging:

- create cohesive environments where every pupil feels important
- give positive encouragement
- recognise strengths, individuality and creative talents
- be specific when reinforcing a pupil's positive behaviour
- with behaviour, focus on the behaviour and not the person.

Putting these in place in a school or setting will also prevent the distortion or breaking of the spirit of belonging.

Spirit of mastery

Acknowledging and recognising their achievement, skills and abilities gives pupils a sense of mastery. Without opportunities for success, pupils may express their frustration through negative behaviours. Learning that links to their everyday life and gives opportunities for them to work together provides powerful intrinsic motivators for pupils. In the 'spirit of mastery', success becomes a possession of the many, not of the privileged few.

Table 5: Distorting or breaking the spirit of mastery			
Spirit of mastery	Distorted spirit of mastery	Broken spirit of mastery	
Achiever	Overachiever	Underachiever	
Successful	Arrogant	Failure-oriented	
Creative	Risk seeker	Avoids risks	
Problem solver	Cheater	Fears challenges	
Motivated	Workaholic	Unmotivated	
Persistent	Over-persistent	Gives up easily	

Mending a broken spirit of mastery:

- make sure every pupil experiences success in something
- help pupils to set realistic and achievable goals
- help pupils to learn problem-solving strategies
- create opportunities for pupils to solve problems through collaboration
- encourage and support pupils to take on challenging tasks
- connect learning with pupils' lived experiences
- consider alternative assessments there are many ways to evaluate learning.

Putting these in place in a school or setting will also prevent the distortion or breaking of the spirit of mastery.

Spirit of independence

In order to have our cognitive needs met, we must learn how to learn independently, rather than relying completely on others to guide and motivate us.

Teachers must provide guidance without interference so that learning becomes the responsibility of the pupil. This sense of autonomy is a powerful intrinsic motivator.

Table 6: Distorting or breaking the spirit of independence					
Spirit of independence	Distorted spirit of independence	Broken spirit of independence			
Autonomous	Dictatorial	Submissive			
Confident	Reckless	Lacks confidence			
Responsible	Refuses responsibility	Lacks a sense of responsibility			
Inner control	Manipulative	Helplessness			
Self-discipline	Rebellious	Undisciplined			
Leadership	Defies authority	Easily led			

Mending a broken spirit of independence:

- model decision making and create opportunities for pupils to make real decisions
- give choices of different types of activity so that the child/young person can work independently in ways they feel comfortable with, on tasks they feel confident about and interested in
- involve pupils in decision making
- help pupils develop internal controls self-discipline
- help pupils learn alternative behaviours to improve self-control
- encourage and support pupils in taking personal responsibility
- help and support pupils to understand and face the consequences of their behaviour.

Putting these in place in a school or setting will also prevent the distortion or breaking of the spirit of independence.

Spirit of generosity

Self-esteem and 'self-actualisation' are greatly increased by learning to help others ('making a positive contribution', in ECM terms). A feeling of pride and joy can be engendered through helping others. Without opportunities to share their talents, skills and abilities, pupils cannot become caring, responsible adults. The help given must be genuine and not equated with personal gain. Pupils can be encouraged to get involved in the community through a variety of projects.

Table 7: Distorting or breaking the spirit of generosity					
Spirit of generosity	Distorted spirit of generosity	Broken spirit of generosity			
Unselfish	Selfish	Lacks a sense of self			
Caring	Cannot give/withdraws from affection	Over-caring			
Sharing	Self-absorbed	Plays martyr			
Loyal	Disloyal	Co-dependent (acting in a way that maintains a friend or partner's dependence on, for example, drugs)			
Emphatic	Hardened	Over-involvement			
Sociable	Anti-social	Servitude			
Supportive	Exploitative	Unhelpful			

Mending a broken spirit of generosity:

- foster cooperative interpersonal relationships
- support and encourage pupils to be good listeners and good communicators
- encourage pupils to express their opinions
- create opportunities for pupils to support others, including through community involvement.

Putting these in place in a school or setting will also prevent the distortion or breaking of the spirit of generosity.



Implications for pupils with SEN and/or disabilities



Approximate timing: 20 minutes

This section asks you to apply what you have learnt about the needs of all children to achieve a better understanding of how to support pupils with SEN and/or disabilities.

Reflecting on a pupil you have taught



Consider how the theoretical frameworks of Maslow and the circle of courage might have meaning for a pupil with SEN and/or disabilities who you have observed, taught during a school placement, or know well.

Look back at the theories and identify at least three areas that are particularly relevant to the pupil you are thinking of. These might be taken from Maslow's hierarchy of needs or from areas where, in your judgement, there is evidence that a 'spirit' from the circle of courage is broken or distorted.

From this analysis, identify what you think should be the priorities for supporting the pupil:

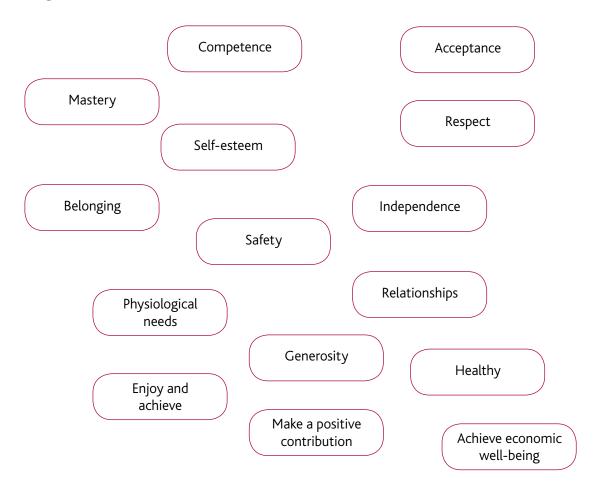
- for the pupil's teachers, and
- for the wider support systems provided by the school or linked external agencies.

Interactions between needs and particular types of SEN or disabilities



In this section you are asked to read some research articles and pieces written by children, young people and adults with SEN and/or disabilities. As you read, think about children's needs as described by Maslow, in ECM, and in the circle of courage model. Think about what the reading is saying about any areas where pupils might be particularly vulnerable if schools do not take the right steps to ensure their needs are met. Use a highlighter pen to circle or underline those needs on diagram 1 on the next page.

Diagram 1: Children's needs



Reading 1: Helping or hovering?

For the first reading you will need to go on the web, and follow this link: www.uvm.edu/~cdci/parasupport/reviews/helpinghovering.pdf

This will take you to an article called 'Helping or hovering? Effects of instructional assistant proximity on students with disabilities', by Giangreco, Edelman, Evans Luiselli and MacFarland. This American article describes interactions between disabled pupils and classroom assistants – the equivalent of our teaching assistants.

Reading 2: Mencap

Disablist bullying is wrecking children's lives says Mencap

18 June 2007

"I don't like getting bullied by people. It makes me upset. I wish it would stop."

Children and young people with a learning disability have told Mencap that bullying is a big problem. We know that 8 out of 10 children with a learning disability are bullied and scared to go out for fear of being bullied.

Mencap believes disablist bullying wrecks children's lives, leading to social exclusion in childhood and adulthood.

Today, to coincide with the start of Learning Disability Week, Mencap is launching 'Don't stick it, stop it!' It is a national campaign to highlight the fact that most children with a learning disability are bullied.

Mencap wants 5,000 children, young people and adults to visit **www.dontstickit.org.uk** where they can make an online sticker to show their support for children with a learning disability who are being bullied.

The stickers will then be used to show the Government that action needs to be taken to stop children and young people with a learning disability being bullied.

Over 500 children and young people with a learning disability across England, Wales and Northern Ireland took part in Mencap's bullying survey. It is the most extensive survey to date about the experiences of bullying of children with a learning disability.

Key survey findings:

- 8 out of 10 (82%) children with a learning disability are bullied
- 8 out of 10 (79%) are scared to go out because they are frightened they might be bullied
- 6 out of 10 (58%) children with a learning disability had been physically hurt by bullies
- 5 out of 10 (53%) children who had experienced bullying said that they stayed away from the places where they have been bullied in the past
- 6 out of 10 (56%) children said they cried because they were bullied, and 3 out of 10 (33%) said they hid away in their room
- 4 out of 10 (36%) children surveyed said that the bullying didn't stop when they told someone
- 3 out of 10 (27%) children surveyed were bullied for three years or more.

Dame Jo Williams, Mencap's chief executive, said: "These shocking findings show how big a problem bullying is for children with a learning disability. Bullying wrecks lives, making children scared to go out. This means that children with a learning disability are missing out on opportunities to learn and make friends, socialise and play.

"If action is not taken to tackle bullying, children with a learning disability will face bullying and isolation all their lives."

Sir Al Aynsley-Green, Children's Commissioner for England, said: "I am very concerned by the findings of this report. All forms of bullying can have a serious and detrimental impact on children's lives.

"The bullying of children with a learning disability is of particular concern to me as they more likely to be bullied than most other groups of children, meaning that they are unable to enjoy a fun and active school and social life. We must take steps to tackle bullying now and provide children with the appropriate skills, tools and support to give them the confidence to tackle bullying."

Charlotte Morse's son, Ben, has Down's syndrome. Ben, now 19, has been bullied for most of his life because he has a learning disability. The bullying got so bad the family had to move to a different area of the town.

Charlotte said: "Ben was desperate to make friends with the local children. But he often returned home with spit on him or the tyres of his bike deflated. On some days he was chased by a group of children until he got home. How can children with a learning disability grow up to be independent if they are scared to leave their home?"

Reading 3: Dislexser

Dislexser

I was born with it But because of it I got hit for it I cried about it Fought because of it Tried to get rid of it Albert Einstein had it Sulked about it Called names because of it I didn't like it Mum had enough of me because of it Couldn't be bothered to live with it Do we really have to have it? Mum thought I was lazy because of it I thought I was crazy because of it Punched walls because of it Got in trouble over it Disrupted class because of it Walked out, away from it Embarrassed because of it I'm ashamed of it I swore at teachers because of it lust have to live with it

John Rogers and Lea Bourne

Reading 4

Micheline

The first time the doubt that I belonged to this particular planet struck me, was a glorious, calm, blue-skied day when I was thinking about growing up. Until that moment I think I had somehow believed that when I grew up I would become normal, ie without a disability. Normal then meant to me 'like my big sister', pretty, rebellious, going out with boys, doing wonderful naughty things with them, leaving school and getting a job, leaving home and getting married and having children. That momentous day I suddenly realised that my life wasn't going to be like that at all. I was going to be just the same as I had always been — very small, funnily shaped, unable to walk. It seemed at that moment that the sky cracked. My vision expanded wildly. My simple black and white world exploded into vivid colours which dazzled and frightened me in a way I had never been frightened before. Everything took on an ominous hue. At that point I saw life as a tremendous competition and I believed I was just not equipped to cope.

Micheline Mason, quoted by Miell, 1995

Look at the words you have highlighted on the chart. The words you have chosen most often are likely to focus on mastery and achievement, enjoyment of learning, belonging, acceptance, safety, self-esteem and independence.

However, these are not the only needs that can be at risk of not being met for children with SEN and/or disabilities. Consider also the following:

- basic physiological needs to be comfortable and free from pain can be at risk for pupils with physical impairments or profound and multiple learning difficulties (PMLD)
- many children with SEN or disabilities have complex health issues
- disability brings with it unacceptably high risks of failing to achieve economic well-being in adult life
- pupils with SEN and/or disabilities may not be put in a position to make a positive contribution to other children and to the community, even though they are fully able to do so.

We should not assume that it is in any way inevitable that pupils with SEN and/or disabilities should depend on adult support, lack acceptance by their peers, have low self-esteem, experience bullying and discrimination or have limited achievement.

Effective, inclusive schools make sure that they don't.

Teachers can play their part in this, by, for example:

- talking to pupils with SEN and/or disabilities that they teach to find out what life in school is like for them are they being teased, do they know what they are good at, what do they enjoy, how could the physical conditions in school be changed to make them more comfortable?
- making sure pupils with SEN and/or disabilities have opportunities to help others, eg reading with younger pupils, being members of the class/school council, being a mentor to newly arrived pupils
- avoiding overprotecting pupils with SEN and/or disabilities, encouraging them to be as independent as they can
- building their self-esteem by creating opportunities for success.



Understanding how children develop



Approximate timing: 35 minutes

Introduction

An understanding of children's development, as well as their basic needs, should underpin the way we teach.

This section contains resource material about child development that you can draw on, both now and in the future.

The resources include:

- an article on the latest insights from research into children's development in cognition and learning (reading 5)
- developmental charts summarising the typical course of development in communication and interaction, behavioural, social and emotional learning, and sensory and physical skills (tables 8, 9 and 10).

Tasks using these resources will help you to think critically about:

- how an understanding of child development can inform your teaching
- the complexity of prior learning that lies behind apparently 'simple' skills
- the wide range of variation in stages of development that you will find in any one group or class.

How an understanding of child development can inform your teaching

Reading 5: Children's cognitive development and learning



Read the article, Children's Cognitive Development and Learning. This is from the Cambridge Primary Review: Report number 2.1a. The report is available on the web at **www.primaryreview.org.uk**

As you read, make notes on:

- the implications of the findings for your practice
- the principles you will want to follow in teaching all pupils
- the reason it might be particularly important to build these principles into planning learning for pupils with learning difficulties.

When you have finished, compare your notes with those on the next page.

Implications for your practice might include:

- Planning for learning to be 'socially mediated' providing opportunities for pupils to learn from a range of adults and from other pupils, not just from books, computers or your own teacher-talk.
- Using multi-sensory teaching approaches providing visual, auditory and kinaesthetic routes to learning (but not trying to identify a pupil's preferred route and using only that).
- Making sure lessons are motivating the emotional system modulates what pupils learn, for example by determining what they pay attention to.
- Remembering that the frequency with which we experience something is crucial to the acquisition of expertise provide lots of repetition and opportunities for practice.
- Remembering that pupils learn by 'doing' (from physical interaction with the world), and actively making sense of their experience – effective learning is not the passive receipt of knowledge.
- Building in many opportunities for classroom conversation pupils remember things better when an adult talks with them to help them make sense of their experiences.
- Promoting pupils' speaking and listening skills across the curriculum pupils vary
 considerably in the extent of their language development when they enter school, but good
 language skills make them able to think about things beyond the present.
- Providing pupils with rich opportunities for pretend play and using their imagination, 'scaffolded' by an adult.
- Helping pupils to reflect on what helps them to learn and what strategies work for them 'learning to learn'.
- Helping pupils learn by analogy presenting a series of examples of a particular concept and helping them draw out the common principle.
- Using a learning sequence that involves first modelling (explaining and demonstrating
 the procedure or material to be learnt), then shared work (adult and pupil(s) do the task
 together), then guided work in which the pupil undertakes the task with support from the
 adult, until the adult can begin to withdraw.
- Encouraging pupils to believe that their abilities are not fixed but can grow.

The article makes clear that these features are likely to improve learning for all pupils. For pupils with learning difficulties, they become even more important. When pupils are struggling, they need the best possible conditions for learning.

The article you have read refers briefly to the theories of Piaget and Vygotsky about how children's thinking and learning develops. These ideas have particular relevance for teaching pupils with SEN and/or disabilities and are explored further below.

Piaget's (born 1896) theories

Piaget believed that children go through certain invariant stages of cognitive development.

Sensory-motor stage					
Typical age range	Features	Milestones			
Birth to nearly two years	The child experiences the world through the senses – grasping, handling, looking at,	Differentiation of self from objects (me/not me).			
	mouthing, moving objects. They learn by acting on the environment.	Learning that objects still exist when out of sight.			
		Beginning to act intentionally, eg pulling a string to set an object in motion or shaking an object to make a noise.			
Pre-operational st	age				
About two to seven years	Starting to represent things with words and images. Egocentricism (the world revolves round me – has difficulty taking viewpoint of others). Still influenced by how things look. Can only pay attention to one aspect of a situation at a time. Limited ability to represent series of actions mentally – could find their way to a friend's house but not direct you there or trace the route on paper.	Ability to pretend – one object can represent another (eg a block of wood can become a car). Rapid development of language. Can classify objects by a single feature, eg all red blocks.			
Concrete operational stage					
About seven to 11 years	Can think logically about concrete objects and events. Mentally represents a series of actions, eg can not only find their way to a friend's house but also trace the route on paper.	Classifies objects by several features, eg all large, red blocks.			
Formal operational stage					
About 12 through to adulthood	Can think logically in the abstract – about ideas. Can generate and test a series of hypotheses	Becomes concerned with the hypothetical, the future, and ideological problems.			
	and test them out systematically.				

Piaget's theories have been subject to criticism. We now know:

- That children can reason at a mature level at younger ages than Piaget suggested if tasks are
 presented in ways that relate to their everyday experience and employ language they are
 accustomed to.
- More about infancy and the capacities of even newborn babies to imitate and remember.
- That children do not necessarily go through fixed 'stages' but that there is considerable overlap and a gradual progress through stages, rather than sudden all-or-nothing leaps.
- Most importantly, that children are not necessarily limited in their learning by being fixed in a
 particular developmental stage. We do not have to wait for them to enter some magic state
 of 'readiness'. The environment is all-important, especially the opportunities provided for
 appropriate social interaction with more advanced peers.

Nevertheless, there is much in Piaget's theories that can help us plan teaching and learning for pupils with SEN and/or disabilities. We can see cognitive development as starting with learning through the senses – exploring, manipulating, moving objects (the sensory-motor stage).

Children pass from exploration and thought dominated by immediate perceptions, through a period of becoming able to use and understand symbols (words, pictures, one object used in 'pretend' to stand for another), through to being able to manipulate these in the present, then eventually manipulating abstract ideas .

Typically, many lessons in secondary school assume that pupils are able to reason logically in the abstract, whereas, in fact, any class will contain a wide variation in this ability. Some pupils may still need the support of real objects, or to draw pictures for themselves, to be able to understand abstract problems.

Some classes may contain pupils with severe or profound learning difficulties. These pupils may remain at the sensory-motor stage throughout their time in school.

Vygotsky's theories

Vygotsky's theories emphasise the importance of social interactions in cognitive development. Both Vygotsky and Piaget emphasise learning by doing, with children actively constructing knowledge through activity.

For Piaget, however, acting on the environment and learning from the results was enough for learning to happen. For Vygotsky, children also need to be talking with others about their experience and to be guided by a more experienced person (a mature partner) in moving on from their current stage in thinking to the next stage.

The aspect of Vygotsky's theories most relevant to SEN is his definition of the 'zone of proximal development'. This describes the distance between what the child can do on their own, and what they can do when they are supported by a more mature partner.

This more experienced person is in a position to 'scaffold' the child's learning. Dialogue can move the child on from where they are to the next steps in understanding. The more experienced person needs to judge their interventions carefully, so that they are moving just ahead of the child's current stage of understanding. Too far ahead, and instruction will not be useful.

Teachers need to assess and establish what pupils can do with appropriate support, work with the pupil at precisely that level, then gradually withdraw the support so that the pupil can manage independently. This principle has become fundamental in guiding work with pupils with learning difficulties.

The complexity of prior learning that lies behind apparently 'simple' skills



This activity explores aspects of children's development in cognition and learning. You will also explore an idea that is very important in planning learning and teaching for pupils with SEN and/or disabilities, ie that apparently simple skills are often in fact complex, and that the teacher has to try to unpick where exactly in this complexity a learner who is having difficulty has got stuck or confused.

Jot down what you think is involved in the development of the ability to count. What does a child have to learn to be able to count objects successfully and accurately?

You may have noted that the child has to learn the sequence of number names (1, 2, 3 and so on), and match them to objects. The study of child development, however, has taught us that there is much more to learning this apparently simple skill than one might think. As well as knowing number names, children have to learn to understand some quite complex principles:

- they have to separate the counting sequence they hear and imitate into separate words to understand that 'onetwothreefourfiveoncelcaughtafishalive' is not just a single string of sounds, but made up of important, discrete components, and
- when beginning to count objects, children have to coordinate physical pointing and oral naming. Gelman and Gallistel (1978)¹ describe five principles of counting which children come to understand:
- The stable order principle understanding that the number names must be used in that particular order when counting. To achieve this, children have to 'unlearn' previous learning that order is not important in defining objects (that mummy, daddy, brother and sister are still mummy, daddy, brother and sister when standing in a line, for example, whatever the order in which they line up).
- The one-to-one principle understanding and ensuring that the next item in a count corresponds to the next number. Until they understand this, children can observe and imitate counting without 'matching' each number in the count one-to-one with an object that is being counted – so that the number they end up with bears no relationship to the number of objects in the set.
- The cardinal principle knowing that the final number represents the size of the set. Children go through several stages in learning to understand this principle:
 - Being aware that the last number said in the count is the response expected by the adult without recognising that it represents the quantity.
 - Knowing that the last number in the count indicates the quantity.
 - Understanding the progressive nature of cardinality that is, if they are stopped in the middle of a count, they can say how many they have counted so far, then carry on.
 - 4 Awareness that numbers, once assigned to sets, can be compared. Without this principle, children are not able to compare the sizes of two sets represented by numbers.
- The abstract principle knowing that counting can be applied to any collection, real or imagined, tangible or intangible – that you can count the beats of a drum, for example, or the windows in your house at home when you cannot see them.
- The order irrelevance principle knowing that the order in which the items are counted is not relevant to the total value. Four apples are still four apples, even when they are rearranged in a different order – they do not have to be re-counted. Each item counted is still a 'thing', not a one or a two, because number names are not related to the properties of the item but are given temporarily to enable the number of items in the set to be found.

Gelman, R and Gallistel, C R, 1978, The Child's Understanding of Number, Harvard University Press, Cambridge MA

For the majority of children these principles are acquired quickly and almost imperceptibly. For some children with SEN and/or disabilities, however, they need to be addressed explicitly. Assessment needs to unpick where it is that a child may have got stuck or confused. Consider this example:

Case study: Callum

Callum, aged eight, was using unifix cubes to find the answer to simple addition sums. The first 'sum' was 8 + 3. The teaching assistant working with the group asked Callum to get out eight cubes.

He put out six. She helped him check, lining up his cubes and touching each of the cubes as he counted. When he got to six she stopped him and asked, "Don't you need some more?", and pushed two more cubes onto the end of his line.

"How many now?", she asked. Callum started counting from the beginning of the line of cubes. He touched each cube but did not stop when he got to the last one. "One, two, three, four, five, six, seven, eight, nine, ten", he said.

For Callum, counting was still just a rhythmic string he had learnt to chant. He did not understand the one-to-one match of number names to objects (the one-to-one principle), nor the principle that the last number in the counting sequence tells you the size of the set (the cardinal principle). Working on addition would be meaningless for him until he fully understood these ideas.

Activities can be designed to help pupils understand each of the counting principles. For example:

- helping pupils move objects and put them in a line as they count so as to master the one-toone principle
- stopping a count part way through so as to practise carrying on
- asking pupils to re-count jumbled groups so that they come to understand the order irrelevance principle.

The skill of teaching pupils with learning difficulties is to devise activities that mirror the complex developmental stages that pupils with typical development go through, often quite rapidly, when learning apparently simple skills.

The wide range of variation in stages of development found in any group or class



This activity explores aspects of children's development in three areas: communication and interaction, behavioural, social and emotional learning, and sensory and physical skills. The purpose is to help you become aware of the wide range of variation in stages of development that you will find in any group or class, and consider the implications for your teaching.

Spend some time looking at the developmental charts in tables 8, 9 and 10 on the following pages. Consider in which of the three areas of development you feel there is most variation in the stages reached by pupils in a typical class you have taught or observed during school placement.

Babbles Social communication Creceptive language Counds as though they are speaking our language Counds as though they are speaking our language Sounds as though they are speaking our language Enjoys watching caregiver's face Sounds as though they are speaking our language Enjoys watching caregiver's face Sounds as though they are speaking our language Enjoys watching caregiver's face Sounds as though they are speaking our language Enjoys watching caregiver's face Shows delight when others reply to their chatter objects Average one-year-old may understand close Growing ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or prefer appears to proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that there appears that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that or proving ability to take turns - learns that the representation or proving ability to take turns - learns that or proving ability to take turns - learns that are proving ability to take turns - learns that are proving ability to take t	Table 8	Table 8: Communication and language development	ent	
Babbles Sounds as though they are speaking our language Early attempts at words (mama, dada) Average one-year-old may say six words (most often familiar people, favourite possessions and parts of the body) Understands their name, basic commands such as 'no', and the names of familiar objects Average one-year-old may understand close to 70 words Average one-year-old may say six words Average one-year-old may understand close to 70 words Average one-year-old may say six words Average one-year-old may understand close to 70 words	Ages	Expressive language	Understanding language (receptive language)	Social communication
	0-1	Babbles Sounds as though they are speaking our language Early attempts at words (mama, dada) Average one-year-old may say six words (most often familiar people, favourite possessions and parts of the body)	Understands their name, basic commands such as 'no', and the names of familiar objects Average one-year-old may understand close to 70 words	Enjoys watching caregiver's face Shows delight when others reply to their chatter Loves to be imitated Growing ability to take turns – learns that communicating is about listening when someone else is speaking and that after a period of activity (verbal or non-verbal) there should be a period of non-activity By three months, uses gesture to communicate By one year, waves goodbye Learns to look at things pointed out by an adult – shared attention The child communicates when: they want something they want someone else to do something they want to interact with another person they want to interact with another person they are reflecting on their environment in some way

Table 8	Table 8: Communication and language development		
Ages	Expressive language	Understanding language (receptive language)	Social communication
1-2	As vocabulary increases, begins to add action verbs such as 'come' and 'go', as well as directives such as 'up' and 'down' Lots of repeated words: Bye-bye, Oggy-oggy Sometimes puts two words together: Daddy there?; Mummy up; Big ball Uses question intonation By 18 months, knows up to 50 words; by two years old knows up to 200 words (typically words for actions, food, body parts, clothes, animals, vehicles, places, pronouns, colour, shape) Puts two to three words together in short sentences: That my house Starts using question words: What that noise? Starts using pronunciation; speech often not understood by strangers	Responds correctly to simple sentences with two information carrying words: Give teddy to daddy , when there is a choice of teddy/dolly and granny/daddy Understands simple instructions and will respond to basic 'who', 'what' and 'where' questions	
2-3	Puts together sentences of three, four and more words: Me got cars Uses word endings, eg for plurals, tense: Daddy comed see me in garden Possibly 500 words by two years old; 1,000 by three years old Period of intense questioning: Why, why, why? Use of and to link ideas: I want juice and bikky By three, likely to be understood by strangers more than half the time	Understands most of what parent says Responds correctly to simple sentences with three information carrying words: Put the balls in the box	Begins to use language for conversational purposes – before this point, their utterances are rather one-sided, showing a desire to communicate their own desires and thoughts, but not to converse and not to respond to requests for information from other people

Table 8	Table 8: Communication and language development continued	ı ent continued	
Ages	Expressive language	Understanding language (receptive language)	Social communication
3–4	Produces increasingly long sentences – by four, average sentence length four to seven words Little words like to and the appear Links ideas using, eg when, cos, after, before: Igo now cos my mummy's here; leated it when I watched the telly Vocabulary of up to 5,000 words By four, can use speech sounds m, n, p, b, t, d, w, and sometimes f, v, k and g	By four, in a group situation, can follow instructions directed specifically at him/her Listens and attends to a short, simple repetitive story with pictures By four, responds correctly to simple sentences with four information carrying words: Throw the blue ball into the box, when there is a choice of different-coloured objects and either a box or a basket to aim at Understands concepts of size (big/little) and prepositions (in, on, under, behind) By four, understands and uses what, where and who questions	Uses language for a variety of reasons including recounting events, role-play and pretend: You be the baby and I'll be the mummy By four, can relate events concerning self
5-4	Uses language for a variety of reasons, including recounting events, role-play and pretend: You be the baby and I'll be the mummy By four, can relate events concerning self	By five, understands and answers when and why questions Understands comparisons (bigger/heavier) and harder prepositions (in front of, above, between) By around five, can follow general instructions given to class Can manage to listen and play/work at the same time By around five, can listen with interest to a more complex, unfamiliar story with pictures By around five, responds correctly to simple sentences with five information carrying words: Throw the blue ball into the big box, when there is a choice of different-coloured objects and either a large/ small box or a large/small basket to aim at	By five, can relate stories and is beginning to know the difference between fact and fantasy Language is used to engage in an ongoing social process with other people – to make sense of, and to communicate, as part of a social situation and set of relationships that exist between speakers

. Beh	Table 9: Behavioural, social and emotional development	otional development			
Gen	General emotional development	Attachment	Self-awareness	Moral development and empathy	Social skills
Birt star star star star star star star st	Birth to three months – startle, disgust, distress; begins to smile at familiar people Three to six months – laughter, anger, interest, surprise, sadness Seven months – fear of the unusual or unexpected emerges	Attachment to primary caregivers develops; child initially shows greater pleasure when in their company, and later becomes anxious if they are not present Fear of strangers appears at around eight months	Initially minimal Relies on caregiver to resolve distress Self-awareness developing well by one year – child understands that you and he/she and parent are separate people Words like 'me', 'my' and 'mine' will become common	By one year can match the emotions of another person, eg may cry if the mother is crying Does not understand that other people have wishes or desires that are different from his/her own	Birth to six months – awareness of, and interest in, other people Six to 12 months – clear interest in, and response to, peers Copies others Begins to notice different expressions Begins to respond differently to different people Begins to take part in simple make-believe games, eg imitating adult actions such as feeding a doll, talking on the phone, or shopping Waving by one year Plays 'peek-a-boo'

Table 1	Table 10: Physical and sensory development		
Ages	Gross motor skills	Fine motor skills	Vision and hearing
- 0	By six months, lifts head, waves arms and hands By 12 months, pulls self to stand and 'walks' around furniture	Transfers objects from one hand to the other Finger feeds	Can hear almost as well as adults, but is more sensitive to high-pitched sounds From birth, can distinguish sound of human voice from other sources of sound Near vision functions effectively, but acuity for stimuli at a distance is poor and ability to change focus is limited Shows preference for features (curved lines, high contrasts, movement and complexity) that characterise the human face
1–2	Walks at around 14 months Learns to run, jump and climb Learns to stand on tiptoe By 18 months can throw and kick a ball without falling over	Learns to eat with a fork and spoon and drink from a cup Can build a tower of six bricks, sort shapes in a shape sorter, scribble with a pen or crayon, turn pages and knobs	By two, can see almost as well as an adult
2-3	Learns to direct the motion of a ball using the foot Can climb up and down stairs unsupported Can pedal a tricycle	Can remove and unfasten coat Can put on simple item like vest and pants Learns to zip and unzip large zips Learns to grip a crayon well enough to make rudimentary vertical, horizontal and circular strokes Can screw and unscrew lids from jars	

Having looked at the developmental charts in tables 8, 9 and 10, in which of the three areas of development would you say that there is most variation in the stages reached by pupils in a typical class you have taught or observed during school placement?

Your response will depend on the age of the class you have thought about. With younger pupils, you may have noticed a wide variation in several areas. With older pupils, your answer is likely to have been behavioural, social and emotional learning. The important thing to be aware of is the **range** in any one class.

What might the implications be for your teaching?



Now focus on a pupil you have taught or observed whose development appears to lag behind the norm in any of the areas under consideration – communication and interaction, behavioural, social and emotional learning, or sensory and physical skills. Locate where you think the pupil's skills lie and identify strategies that you could use in your teaching to help move that pupil on to the next developmental steps.

Finally, refine your thinking by exploring the communication and language development chart (table 8) in more detail.



Think about a class you have taught or observed during school placement. Consider whether all of the pupils in that class could do all of the things identified on the chart as being typical of a five-year-old.

If you have the opportunity, check this with pupils.

Identify one or two pupils who struggle with learning and check:

- their understanding of instructions involving more difficult prepositions like "Put your hand above your head" or "Go and stand between Alex and Jessica"
- whether they can follow teacher instructions with lots of 'information carrying' words, eg
 "When you come in from washing your hands, you should sit at the back and not at the front
 because otherwise all the others will have to climb over you to find somewhere to sit."

Depending on the age of pupils you teach, you may be surprised at what you find out.

The point about pupils' understanding of instructions is really important.

Look at the sequence in table 11 on the next page.²

The sequence shows the developmental steps that the average pupil goes through on the way to achieving early national curriculum listening and responding objectives in the speaking and listening framework.

Table 11: Developmental steps

Can respond to instructions if the teacher goes up to the pupil and turns them to face them before speaking

Can respond to instructions when the teacher gives a preliminary alerting signal, names/looks at the pupil and the pupil is not occupied

Responds to instructions containing three information carrying words – for example, "Put the **book** on **my table**", and to a single instruction – for example, "Choose the colours you want"

Responds to instructions containing four information carrying words – for example, "Put the **big balls under** the **table**"

Responds to general instructions given to the class when all are asked to stop what they are doing and listen

Responds to general instructions given to the class while doing something else at the time

Responds to complex sentences with five information carrying words – for example, "Get your new book and colour a square red", and a two-step instruction – for example, "Put your book away and then line up"

Can follow a simple three-step instruction – for example, "Get out your maths book, find the page with the picture of buttons, and write in the numbers next to each set"

Can respond to complex multi-step instructions such as "Find a flower you'd like to use for your art work, decide which materials to use, and then get to work in the area just outside the classroom"

Reflect again on a class you have taught or observed during school placement. Shade the chart in up to the point where you are confident that **all** the pupils could achieve.

You are likely to have identified that some pupils (right across the age range) may not yet be able to follow instructions while attending to something else at the same time. There may also be pupils who struggle to process and remember more than a small number of information carrying words in a sentence they hear.

What might the implications be for the way you secure pupils' attention and give instructions?



Development in pupils with SEN and/or disabilities



Approximate timing: 15 minutes

This final section explores some of the implications of SEN and/or disabilities for children's development and your future work as a teacher. The aim is to help you understand that when pupils have SEN and/or disabilities they may show:

- delayed development achieving the same milestones as the typically developing child, in roughly the same order, but at a slower rate
- different or disordered development developing on a different course from that of the typically developing child, or
- uneven development achieving the same milestones as the typically developing child in some areas, but following a very different course in others.

You will also explore the way in which development in some areas is affected by delay or difference in others.

Looking at development



Consider the following case studies. As you read, look back to the developmental charts and your reading about cognition and learning. Your aim is to decide whether, in each case, the pupil's development has been delayed, is different, or is uneven, and in which developmental areas. Record your thoughts in table 12 below.

Table 12: Thre	e pupils' dev	elopment		
Pupil	Delayed (✔ or ✗)	Different (✔ or ✗)	Uneven (✔ or ✗)	In which areas
Matthew				
Alexa				
Patrick				

Case study: Matthew

Matthew, now in primary school, had a difficult early start to life. His mother, a heroin user, was not able to look after him properly and it was thought that he may have been abused by one or more of her partners. He was in and out of care in his first two years of life, spending time with several different foster carers. At three he was adopted into a stable home where he received every support.

Despite this, he struggled in many areas, particularly in early motor development. At school he was lively, articulate, read well and impressed his teacher with his wide general knowledge. His written work, however, was barely legible. He could not concentrate for long on anything, but least of all on writing. He presented as awkward, uncoordinated, accident-prone and disorganised. He could not catch or kick a ball and was often teased as a result.

In maths his numbers were poorly formed and often reversed; his work was messy and all over the page; he needed to handle apparatus to do the simplest calculations and had major difficulties with work on shape and space.

His greatest difficulties, however, were social. He seemed to have no understanding of people's feelings and showed no concern when others were hurt or in trouble. He formed superficial relationships but made no real friends. He needed a great deal of attention — rushing up to any visitor or stranger to say, "Hello, what's your name?" and hold their hand. As he grew older, he increasingly sought attention through inappropriate behaviour in class.

Case study: Alexa

Alexa, aged 11, was a cheerful girl. She was much liked by teachers and her peers, though a little immature socially, often preferring to play with younger pupils.

She had always lagged behind others in her class in learning. As a young child, she had been late in reaching developmental milestones; she did not walk until she was over two, for example.

When she started school, she spoke in sentences of two or three words and her speech was very hard for others to understand. She needed help with simple things like putting her coat on and changing for PE.

Over the course of key stage 1 she became more independent and her speech articulation problems improved, leaving only slight immaturities like 'tissors' for 'scissors'. Her progress in reading and writing was initially slow, but with lots of help from home she was able to read quite fluently by the time she was in year 4.

Questioning showed that she often had little understanding of what she had read. However, in mathematics, she could apply the four rules, but needed to use concrete resources at all times. She could not work things out in her head. Mathematical language such as, "What's the difference between 12 and 6?" or "How many can we have each?" would often cause her problems.

Case study: Patrick

Patrick, aged 14, was partially sighted and had been diagnosed at eight as being on the autistic spectrum. He attended a special school.

With appropriate information technology (IT) support he could read fluently and was only a little behind others his age in mathematics.

Despite his visual impairment, he learnt early and easily how to ride a bicycle and later to skate and to ski well, but he did not enjoy ball sports or team games. He was a talented pianist and could play any piece by ear after listening to it just once.

In contrast, his writing was childlike and stilted. Although he had always understood complex language and shown appropriately mature vocabulary and sentence structure in his own speech, talking with him was very different from holding a conversation with any other pupil his age.

When meeting someone new he would ask repeatedly what make of car they had, and for details of the car, and talk at length about what kinds of cars he liked and their technical aspects.

His responses to others' questions were often odd. On the telephone, for example, when asked "Is your mother in?" he would just say, "Yes" and stay on the line, not understanding that the speaker wanted to talk to his mother and that he should fetch her. When asked by a teacher "Is it right that you are moving house next month?" he answered, "We're not moving house; it's staying where it is. We have bought another one."

When you have finished, compare your notes with those in **the appendix**.

You have seen that the development of pupils with SEN and/or disabilities can follow a number of courses:

- it can proceed at a slower rate than that of other children, or
- it can proceed very differently.

Delay or disorder in one area is likely to affect development in others.

Behaviour may also show marked oscillation and regression, where the pupil one day performs at certain levels, but the next day reverts to an earlier stage of thinking, communication or behaviour.

This will be strongly affected by the context the pupil is in. Whatever the developmental path, your future role as a teacher is clear.

Firstly, you need to understand the stage the pupil has reached in the areas that are relevant to your teaching, and adapt the way you teach the whole class so as to accommodate the earlier or different stages reached by individuals. For Patrick, for example, this might mean choosing your language carefully so that you avoid the kinds of non-literal use of language (metaphor, jokes and idiom) that he may misinterpret. For Matthew, it might mean understanding the nature of his attention-seeking behaviour and providing him with as much attention as possible for positive behaviour. For Alexa, it might mean explaining vocabulary carefully.

Secondly, you need to look at your planning for the class as a whole to identify ways in which you can seek to move the pupil on from the stage they have reached in their development to the next stage. This is not a unique feature of teaching pupils with SEN; it applies to all pupils. Effective teaching is fundamentally about starting from where the pupils are and taking them a step further in their knowledge, skills or understanding. A basic knowledge of child development will help you do this.



Points for action



Approximate timing: 15 minutes

Spend a few minutes reflecting on this self-study task and record key points for action below. What do I want to do next to develop my practice?
How will I do this?
What is my timescale for this to happen?
How will I know if I have been successful?
Do I need to involve anyone else in enabling this to happen?

Appendix

Suggested answers and solutions

Table 2: Supporting Sam – possible actions			
Unmet needs	Possible actions		
Physiological needs	Make sure Sam has plenty of practical activities and regular breaks in class, when he can move around and use some of his physical energy.		
Safety	Persistent teasing is a form of bullying. Use the school's anti-bullying policy to stop the bullying from happening.		
Love, affection and belonging	Encourage friendships by pairing him regularly with a pupil he might get on with, for the kind of practical tasks he enjoys.		
Self-esteem	Find out what Sam knows about or is good at and get him to share this with the rest of the class.		
	Help him become an expert in a particular area.		
	Give him responsibilities, eg organising a lunchtime or after-school club, helping those who are new to the school.		
	Write a positive note in his home-school diary or planner that he can show to his family.		
	Provide help to improve his literacy skills.		

Back to activity 1, page 9

Looking at development: Notes

Matthew's case illustrates how development can become **different** as a result of early experiences. His behavioural, social and emotional development is not proceeding in the normal way – he does not seem to care about the feelings of others (empathy) and is not making friendships as he should (social skills). There are no signs that he is making progress in these areas, even if more slowly than his peers. It is likely that this is a result of early disruption in the development of secure attachments to adult carers.

Research has shown that developing an attachment to a consistently present and caring adult is fundamental to children's later social and emotional development. Matthew's motor skills also show different development. Together with his marked spatial difficulties this may at some point lead to a diagnosis of developmental coordination disorder (DCD) sometimes known as dyspraxia, possibly the result of heredity, or perhaps the result of very early experience – the effects of his mother's drug use during pregnancy, or restricted opportunities when he was very small for sensory-motor learning in which he could experiment with the effect of his actions on the environment and come to understand shape, space and movement.

Alexa's learning difficulties are more straightforward. She shows generalised **delayed** development, in all areas except sensory development and social communication — ie cognitive development, physical development, social and emotional development and expressive and receptive language. She is going through the same developmental course as other children, but more slowly. Cognitively, she is still very much at Piaget's 'concrete operations' stage in her thinking as she moves to secondary school. Her apparent fluency in reading and basic arithmetic can be misleading, as her level of understanding is still developing.

Patrick's development is spectacularly **uneven**. He is advanced in some areas (music, motor skills that involve balance), and cognitively typical in some academic skills. In other motor skills he is behind. It is in communication and interaction, however, that the difference between his development and that of others is most clear. While his expressive language has developed more or less normally, his social use of verbal and non-verbal communication is fundamentally different from that of other children and adults.

Like most autistic people, he finds it hard to use language as a social tool, to make conversation and cement social bonds. His ability to understand others (receptive language) is influenced by his tendency to take what he hears literally – not understanding how words can stand for something quite different from their actual meaning. In turn, this influences and is influenced by disordered development in behavioural, emotional and social skills.

We know that those on the autistic spectrum may take a long time to understand another's perspective, or experience empathy for another's feelings or condition. It is likely, too, that Patrick's visual impairment has influenced his development in other areas. As a small baby, the subtle interplay of conversational 'turn-taking' between him and those who cared for him may have been disrupted because he could not see their faces, as may later social interaction with other children that depended on the sharing of toys, objects and activities. Motor skills that rely on hand-eye coordination, such as catching, kicking or hitting a ball, will also have been affected by his restricted vision.

Back to activity 6, page 38