

Developmental Coordination Disorder (DCD): Leaflet for General Practitioners



This leaflet was produced through a consensus process led by Movement Matters and involving relevant stakeholders and organisations from across the UK.

What is DCD?

Developmental Coordination Disorder (DCD), also known as Dyspraxia in the UK, is a common disorder affecting fine or gross motor coordination in children and adults. This lifelong condition is formally recognised by international organisations including the World Health Organisation. DCD is distinct from other motor disorders such as cerebral palsy and stroke and occurs across the range of intellectual abilities. Individuals may vary in how their difficulties present; these may change over time depending on environmental demands and life experience.

An individual's coordination difficulties may affect participation and functioning of everyday life skills in education, work and employment.

Children may present with difficulties with self-care, writing, typing, riding a bike and play as well as other educational and recreational activities. In adulthood many of these difficulties will continue, as well as learning new skills at home, in education and work, such as driving a car and DIY.

There may be a range of co-occurring difficulties which can also have serious negative impacts on daily life. These include social and emotional difficulties as well as problems with time management, planning and personal organisation. These difficulties may also affect an adult's education or employment experiences.

At what age can I identify DCD?

Due to large variation in the environment and experiences of different children and their rates of development in the early years, formal identification of DCD rarely occurs prior to the age of 5 years.

How can I identify DCD?

The presence of motor difficulties can be determined through taking a developmental and educational history with the parent or carer. Parents may have noticed that a very young child has coordination difficulties or delays in motor development when compared with peers. Parents may report that the child generally appears awkward/clumsy and that he/she has difficulties with some or all of the following:

- Self-care e.g. washing, toileting, dressing (doing up buttons, tying shoe laces, putting clothes on the right way around).
- Physical play and sports especially in playing team games, including ball skills.
- Handwriting and drawing.
- Using tools and equipment e.g. a toothbrush, cutlery, scissors, rulers.
- Doing crafts and playing with construction toys.
- Learning new motor tasks.

Parents may also report:

- General organisation and planning difficulties relating to their child and his/her belongings e.g. losing clothing and books.
- Social difficulties e.g. difficulty in groups, especially maintaining friendships.
- Emotional difficulties e.g. low self-esteem.

How do I differentiate DCD from other movement disorders?

It is important to differentiate the motor behaviour of children with DCD from other movement disorders such as cerebral palsy, muscular dystrophy, global developmental delay or tumours. Careful questioning of the parent together with a physical examination of posture, muscle tone and reflexes should be undertaken to help you consider:

- Global rather than just a motor difficulty/delay.
- When the motor difficulties were first noted, whether they were present in the very early years or onset recently.
- Whether there has been a loss of previously acquired skills.
- Evidence of increased or fluctuating muscle tone.
- Asymmetry in motor control and coordination.

How is a formal diagnosis of DCD made?

A formal diagnosis of DCD can be made when there are significant motor difficulties that are not due to a visual impairment, neurological disorder or other medical condition.

The physical examination helps to exclude other possible movement disorders and forms an important part of the diagnosis. From the age of 5 years, when a child is old enough to be diagnosed, referral to other health professionals (e.g. an Occupational and/or Physiotherapist) should be made for further evaluation of the child's motor performance via standardized parent questionnaires and motor tests. A final diagnosis should be based on multiple sources of information including that from the parent, from standardized motor tests and from a physical examination by a medical practitioner.

What else should I be alert to and when should I refer the child on?

If you suspect another motor disorder (e.g. cerebral palsy, muscular dystrophy), tumour or other brain damage, refer to a Paediatrician or Neurologist for further assessment.

If other motor disorders have been excluded and you suspect there are significant movement difficulties, then refer to a Paediatrician and Occupational and/or Physiotherapist for further assessment of motor skills.

DCD often co-occurs with other developmental disorders, including ADHD, Language disorders (Specific Language Impairment, Dyslexia) and Autistic Spectrum Disorders. Be alert to this when taking the developmental and educational history and, where appropriate, refer on to a Paediatrician for further assessment.

DCD may be associated with serious social and psychological problems and sometimes psychiatric disorders (depression, anxiety). Again, be alert to this when taking the developmental and educational history and, where appropriate, refer on to a CAMHS (Child and Adolescent Mental Health Services) for further assessment.

What support can be offered for a child with DCD?

Identification of DCD is important as there is much that can be done to support the child to develop their skills and to participate in activities at home, at school and in the community. The type and level of support and intervention offered by professionals will vary from region to region but there is also much that parents and teachers can do to support a child. Appropriate goals for intervention should be identified by working together with the child, parent(s), teacher(s) and relevant professionals. Some children will benefit from simple adaptations (e.g. elasticated clothing, pen grips), while others will need specialist intervention from health and/or educational professionals. Educational training and coaching for parents is also important to create a supportive attitude.

Where can I go for further information?

www.movementmatters.org.uk