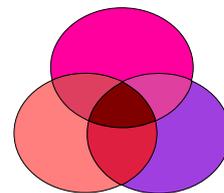


Introducing the updated SASC Guidance on the assessment and identification of the characteristics of an Attention Deficit Hyperactivity Disorder (ADHD)

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Institute of Psychiatry, UK



South London and Maudsley **NHS**
NHS Foundation Trust



MRC Social Genetic and
Developmental Psychiatry

1

Overview

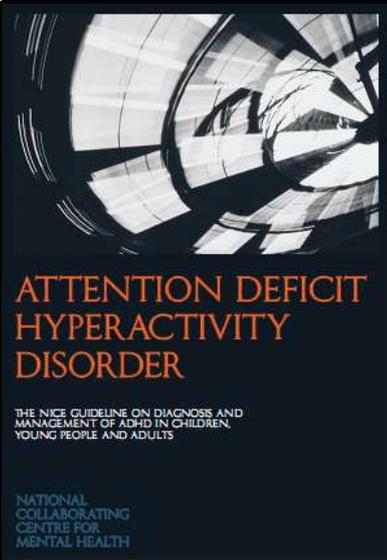
- What is ADHD
- Diagnostic process
- Specific SASC recommendations

2

ADHD is a common neurodevelopmental disorder

- Prevalence in children **5-7 %**
- Prevalence in adults **2-3 %**
- Underdiagnosed in UK in both children and adults
- Overlaps with both mental health and specific learning differences

3



The image shows the cover of a NICE guideline. On the left, there is a graphic with a circular, geometric pattern in shades of grey and black. Below this graphic, the text reads: "ATTENTION DEFICIT HYPERACTIVITY DISORDER" in large, bold, orange letters. Underneath that, in smaller white text: "THE NICE GUIDELINE ON DIAGNOSIS AND MANAGEMENT OF ADHD IN CHILDREN, YOUNG PEOPLE AND ADULTS". At the bottom left of the graphic, it says "NATIONAL COLLABORATING CENTRE FOR MENTAL HEALTH". To the right of the graphic, the NICE logo is present, consisting of the word "NICE" in a bold, sans-serif font above the words "National Institute for Health and Care Excellence" in a smaller font. Below the logo is a grey square with a white bookmark icon and the word "guideline" in white. Further down, the title "Attention deficit hyperactivity disorder: diagnosis and management" is written in a bold, black font. Below the title, it says "NICE guideline", "Published: TBC", and the URL "nice.org.uk/guidance/ng87".

NICE National Institute for Health and Care Excellence

NICE
guideline

ATTENTION DEFICIT HYPERACTIVITY DISORDER

THE NICE GUIDELINE ON DIAGNOSIS AND MANAGEMENT OF ADHD IN CHILDREN, YOUNG PEOPLE AND ADULTS

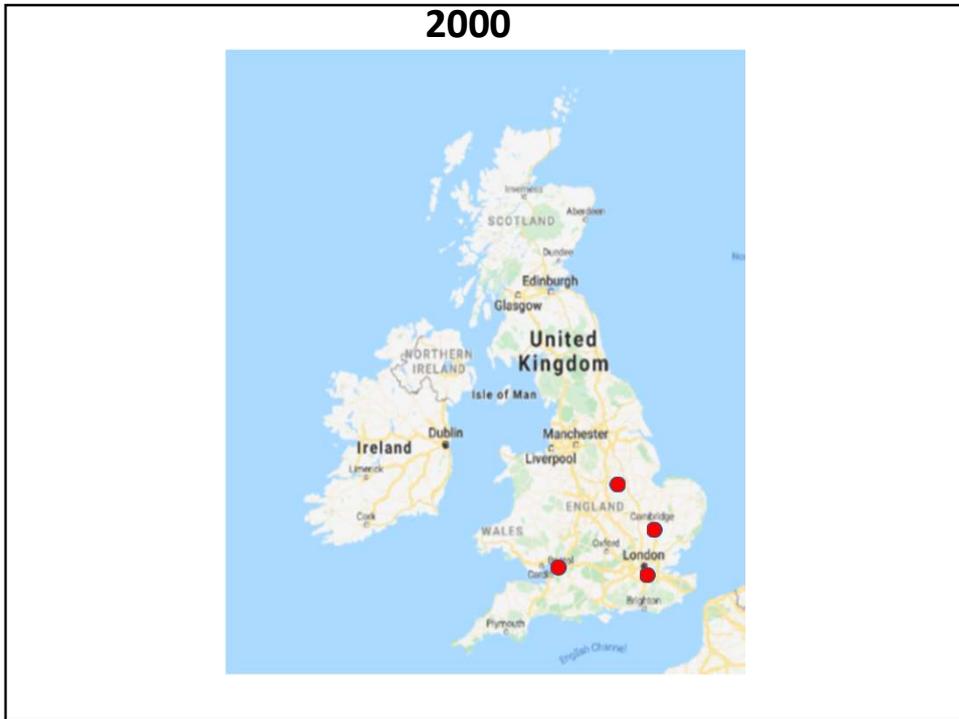
NATIONAL COLLABORATING CENTRE FOR MENTAL HEALTH

Attention deficit hyperactivity disorder: diagnosis and management

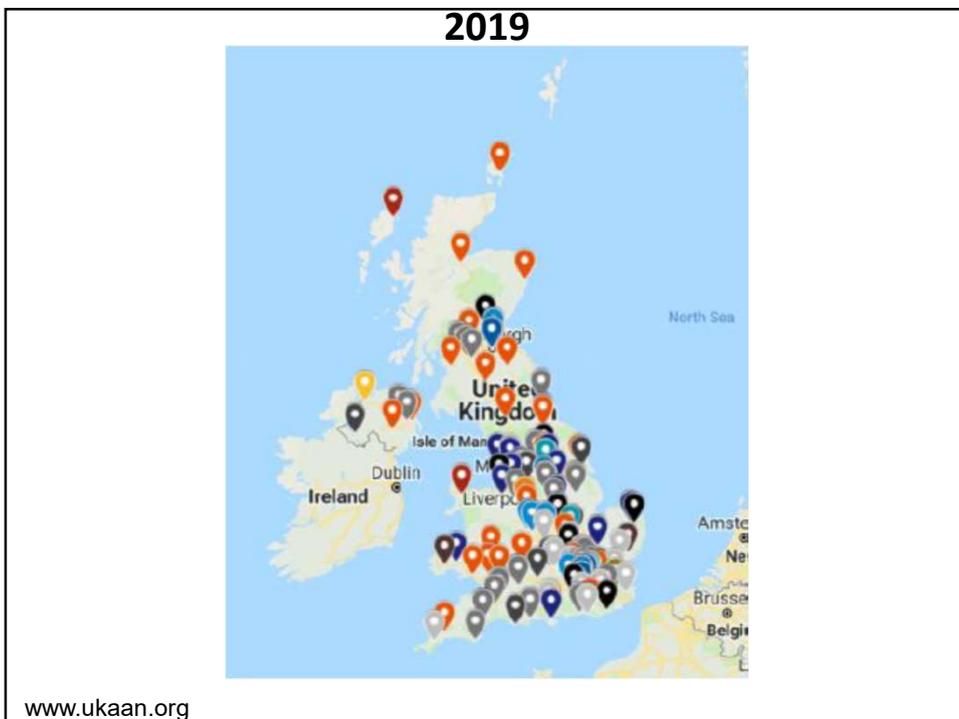
NICE guideline
Published: TBC
[nice.org.uk/guidance/ng87](https://www.nice.org.uk/guidance/ng87)

NICE guidelines 2008 and 2018

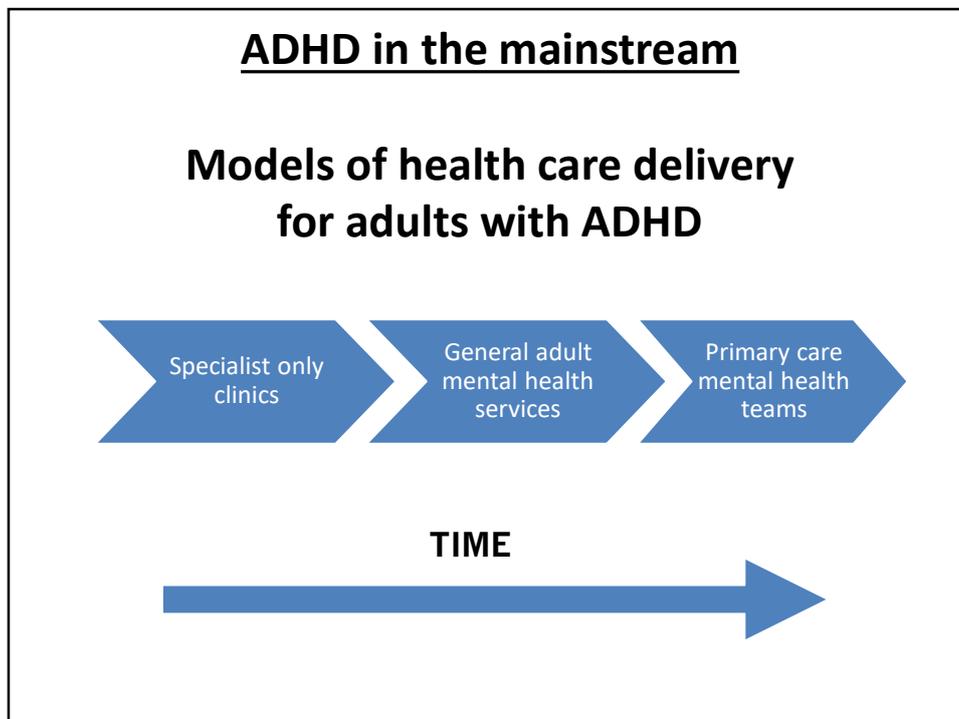
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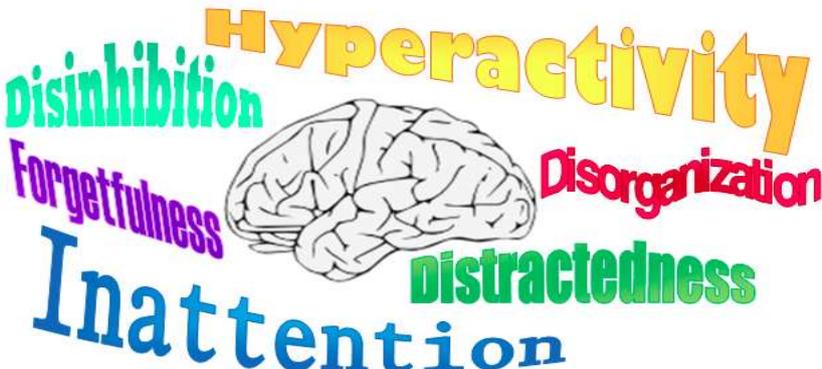
SASC guidelines: role of assessment report

- **Child under the age of 16:**
 - Support onward referral to CAMHS
- **16-17 years:**
 - Support onward referral to CAMHS
 - Detail characteristics of ADHD supporting the need for educational, and medical intervention
- **Adult 18 years and over:**
 - Detailed report to enable access to support for their study, employment, and medical management

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What is ADHD?

A persistent pattern of inattention or hyperactivity/impulsivity that interferes with or reduces the quality of functioning in daily life



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Criteria for ADHD Diagnosis: DSM-5

Inattention

- Lack of attention to details, makes careless mistakes
- Difficulty sustaining attention
- Does not listen when spoken to directly
- Trouble completing or finishing job tasks
- Problems organizing tasks and activities
- Avoids or dislikes sustained mental effort
- Loses and misplaces things
- Easily distracted
- Forgetful in daily activities

Hyperactivity

- Fidgetiness b(hands or feet) or squirming in seat
- Leaves seat when not supposed to
- Restless or overactive
- Difficulty engaging in leisure activities quietly
- Always 'on the go'
- Talks excessively

Impulsivity

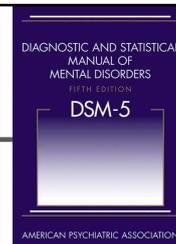
- Blurts out answers before questions have been completed
- Difficulty waiting in line or taking turns
- Interrupts or intrudes on others when they are working or busy

American Psychiatric Association. Diagnostic and Statistical Manual (DSM) of Mental Disorders. 5th Edition 2013

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DSM 5 criteria – Adult ADHD

- **Criteria A:** 5 or more symptoms of inattention or hyperactivity-impulsivity
- **Criteria B:** Several symptoms present by the age of 12
- **Criteria C:** Several symptoms present in two or more settings
- **Criteria D:** Symptoms interfere with or reduce quality of social, educational or occupational functioning
- **Criteria E:** Symptoms are not better explained by another condition



American Psychiatric Association. Diagnostic and Statistical Manual (DSM) of Mental Disorders. 5th Edition 2013

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Age of onset criteria

Symptom thresholds:

Children: 6 out of 9 symptoms in either inattentive or hyperactive/impulsive domain

Adults: 5 out of 9 symptoms in either domain

Age of onset criteria:

- At least 3 out of 9 symptoms in either domain by age 12

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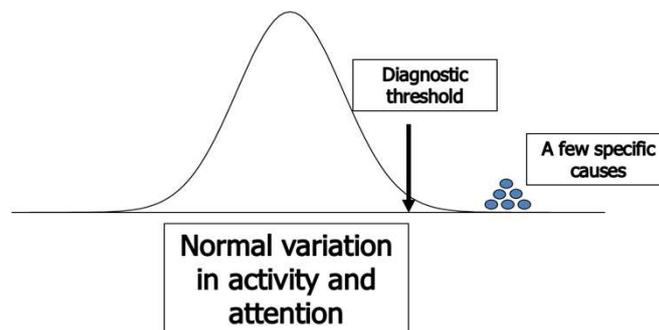
Common associated features of ADHD that support the diagnosis

Emotional symptoms	Low frustration tolerance, irritability, mood lability
Education problems	Academic or work performance is impaired, even in the absence of a specific learning disability
Cognitive deficits	Cognitive problems on tests of attention, executive function or working memory

American Psychiatric Association. Diagnostic and Statistical Manual (DSM) of Mental Disorders. 5th Edition 2013

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ADHD represents the extreme of a highly heritable quantitative trait



Genetic correlation between ADHD Disorder and ADHD trait scores = 0.96, $P=1.5 \times 10^{-5}$

Middeldorp et al, JAACAP, 2016: 10, 896-905

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Defining 'Impairment' (NICE 2008)

- Impairment to a degree that most people would consider requires some form of medical, social or educational intervention
- Without a specialist professional or higher level of intervention to ameliorate the problems, there is likely to be long-term adverse implications for the person affected, as well as problems in the short and medium term
- Impairment should be pervasive, occur in multiple settings and be at least of moderate severity
- Significant impairment should not be considered where the impact of ADHD symptoms are restricted to academic/work performance alone, unless there is a moderate to severe impact in other domains



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Domains of 'IMPAIRMENT'

- | | |
|--|--|
| 1. Work / education functions | ■ Psychosocial |
| 2. Social relationships | ■ Psychiatric |
| 3. Coping with daily activities | |
| 4. Accidents | |
| 5. Behavioural problems | |
| 6. Distress from the symptoms | |
| 7. Low self-esteem | |
| 8. Emotional dysregulation: irritability, temper control | |
| 9. Sleep problems | |
| 10. Risk for developing comorbid disorders (anxiety, depression, substance use disorders, personality disorder) | |

NICE Clinical Guideline 72. 2008. <http://guidance.nice.org.uk/cg72>;
Asherson P, Expert Rev Neurotherapeutics. 2005 Jul;5(4):525-39.

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High functioning ADHD?

- People with mild symptoms who continue to function reasonably well while being relatively impaired compared to their potential
- People who are highly symptomatic and have significant impairment in some domains, while being highly functional in other areas
- People with high levels of ADHD symptoms who are nonetheless high functioning in most areas

Margaret Weiss from 'The challenges of high functioning ADHD. UKAAN 2016

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High functioning individuals with ADHD

- Sports
- Music
- Comedians
- Journalists
- Builders
- Demolition teams
- Doctors
- Researchers
- Students

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Some examples from my practice

- Builder working during tea breaks
- Media student and theatre director
- Singer, comedian and writer
- Successful professional using cannabis for insomnia, restlessness and emotional instability
- Artist who was known for ‘unfinished’ artwork
- Entrepreneur with excessive spontaneous mind wandering
- Pioneers in the field of ADHD (many)

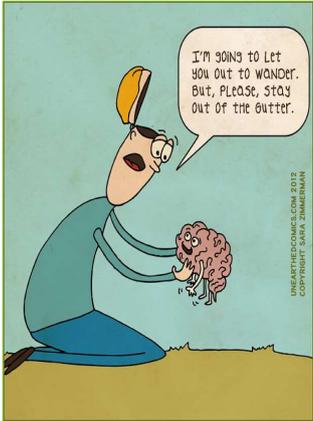
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Edward Hallowell: reframing ADHD - ‘mirror traits’

Negative trait	Positive ‘mirror’ trait
Hyperactive, restless	Energetic
Intrusive	Eager
Cant stay on the point	See connections others don’t
Forgetful	Get’s totally into what she or he is doing
Disorganised	Spontaneous
Stubborn	Persistent, won’t give up
Inconsistent	Shows flashes of brilliance
Moody	Sensitive

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Cognitive dynamism



UNRENDERINGS.COM 2012
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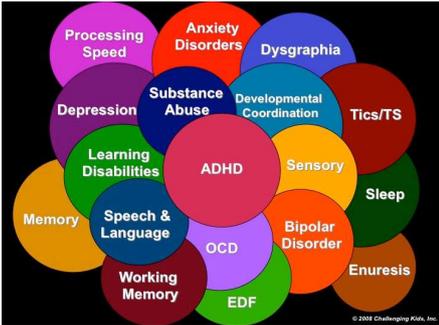
- **Divergent thinking, hyper-focus, creativity & curiosity** - conceptualised the ceaseless mental activity reported by all the participants
- Descriptions of spontaneous & non-sequential thought processes, being “**outside the box thinkers**” & having **episodes of intense mental focus**

“... the ADHD brain seems unfocused, quite scattered, chaotic & a bit random ... but give that brain some- thing that you can tune into & its your interest, then all that random stuff just goes boom ... I get this incredible intense concentration & that’s great for work ...”

Sedgwick et al., 2019

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ADHD and comorbidity

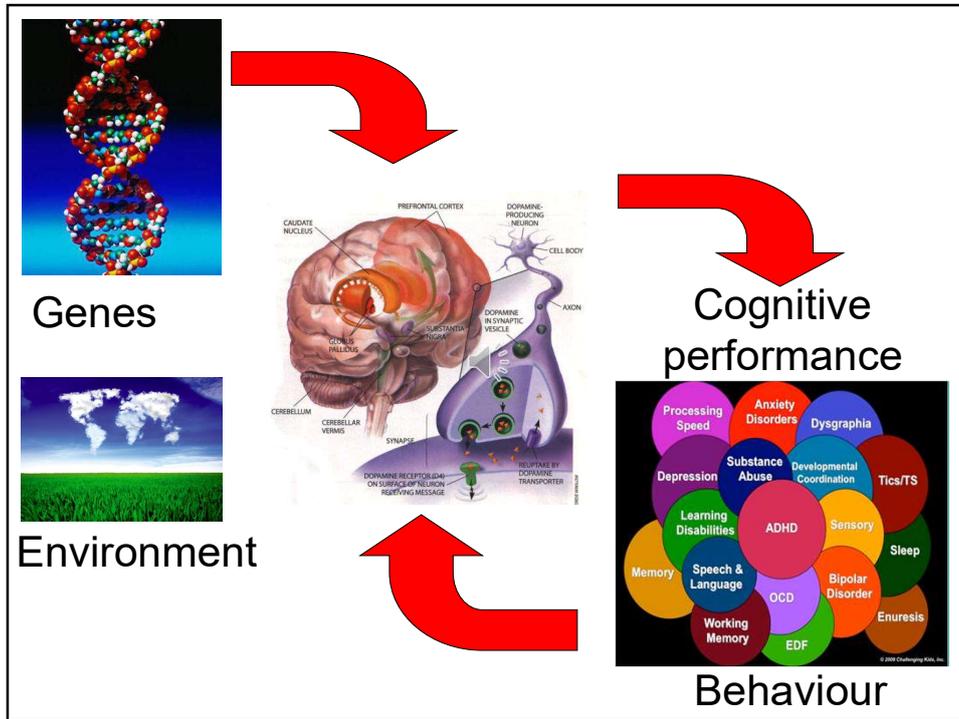


© 2008 Challenging Kids, Inc.

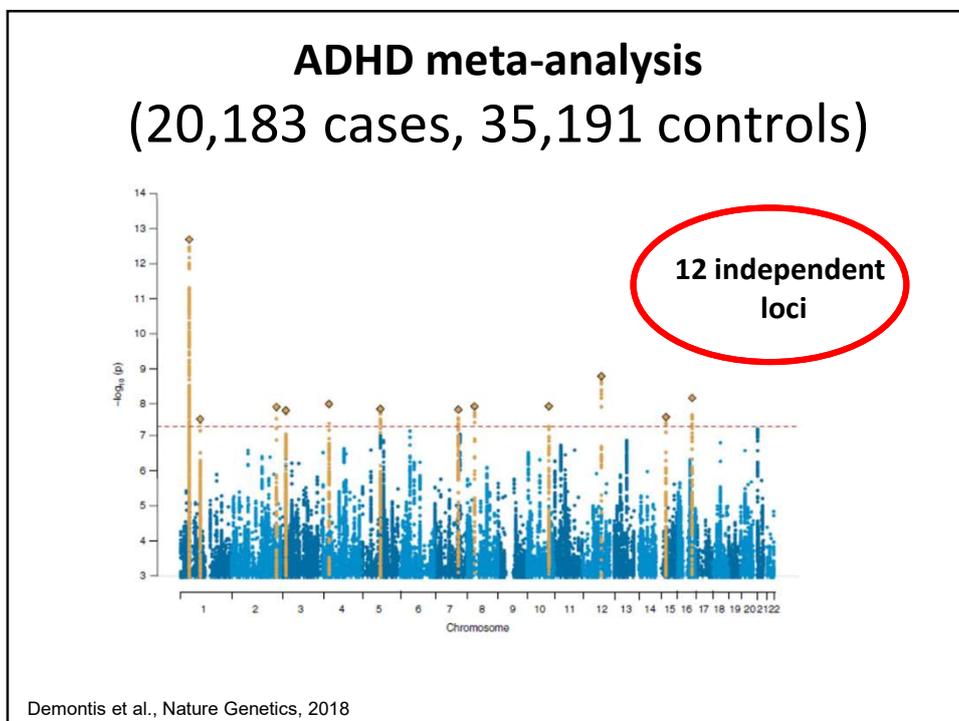
- **Specific leaning differences**
- **Autism spectrum disorders**
- **Cognitive deficits**
- **Emotional instability**
- **Sleep problems**
- **Anxiety and depression**
- **Personality disorder**
- **Substance use disorders**

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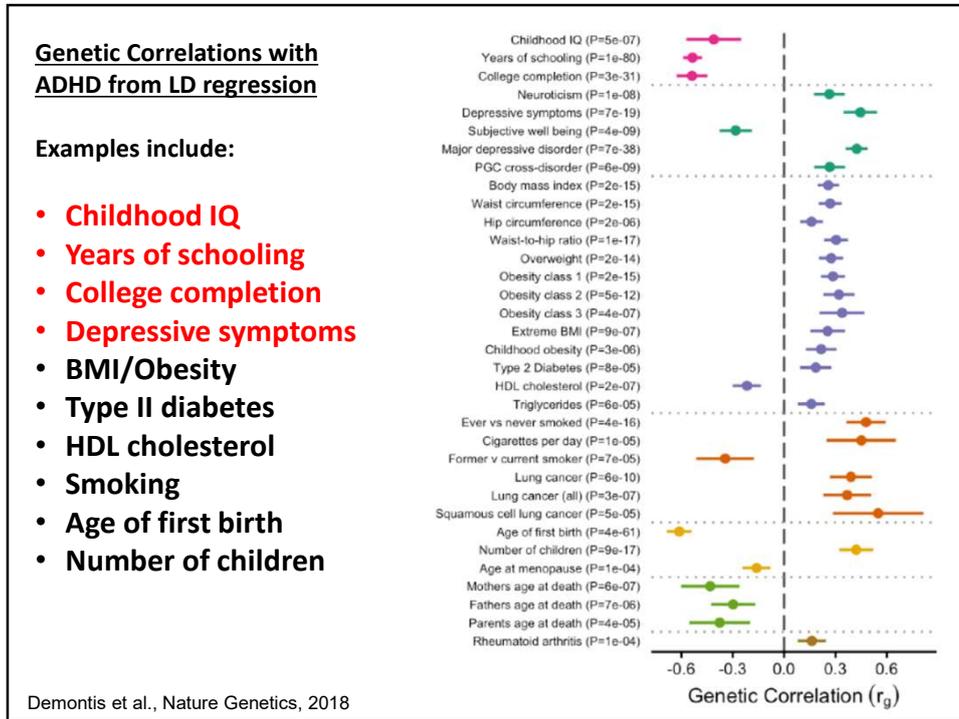
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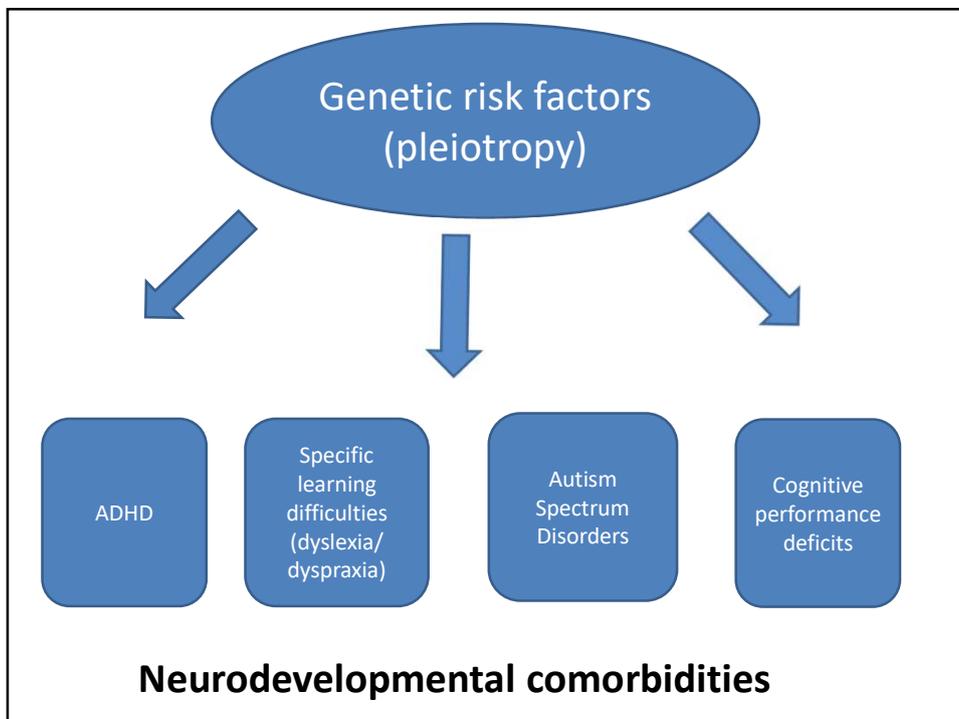
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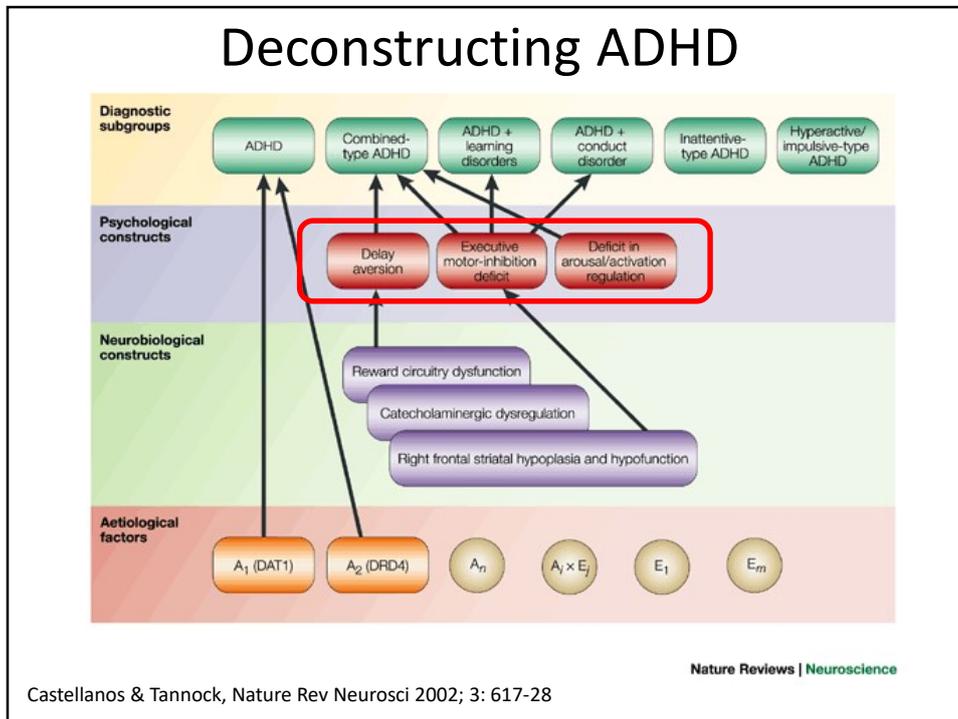
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Distinct groups of cognitive impairments in children and adults with ADHD

<p>➤ Higher-level effortful cognitive functions, e.g.</p> <ul style="list-style-type: none"> - inhibitory control - working memory - planning 	Fixed deficits
<p>➤ Lower-level, potentially more automatic cognitive processes, e.g.</p> <ul style="list-style-type: none"> - Preparation (alerting) - Vigilance (sustaining attention) - Reward processing - Reaction time variability 	Malleable deficits (track the disorder)

Michellini et al, J Attention Dis, 2021; Cheung et al., B J Psychiatry 2016

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Executive Function model (Brown 2006)

Executive functions can be thought of as **behavioural self-regulation**

Thomas Brown's model of Executive Function:

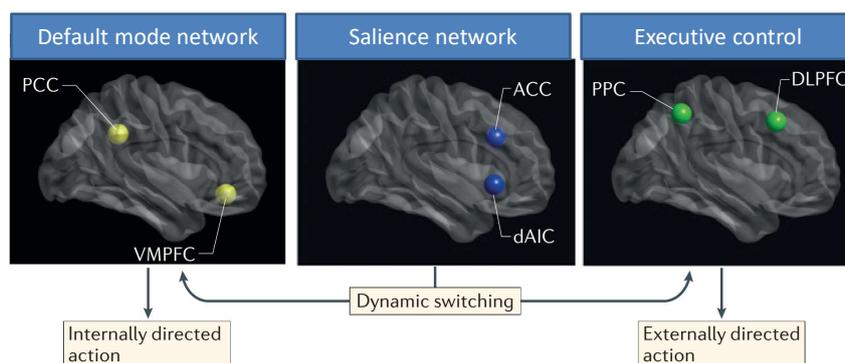
- **Activation:** *Organising, prioritising and initiating work*
- **Focus:** *Focusing, sustaining and shifting attention to tasks*
- **Effort:** *Regulating alertness, sustaining effort and processing speed*
- **Emotion:** *Managing frustration and regulating emotions*
- **Memory:** *Utilising working memory and accessing recall*
- **Action:** *Monitoring and self-regulating of activities*

Barkley 2007, Brown 2006,



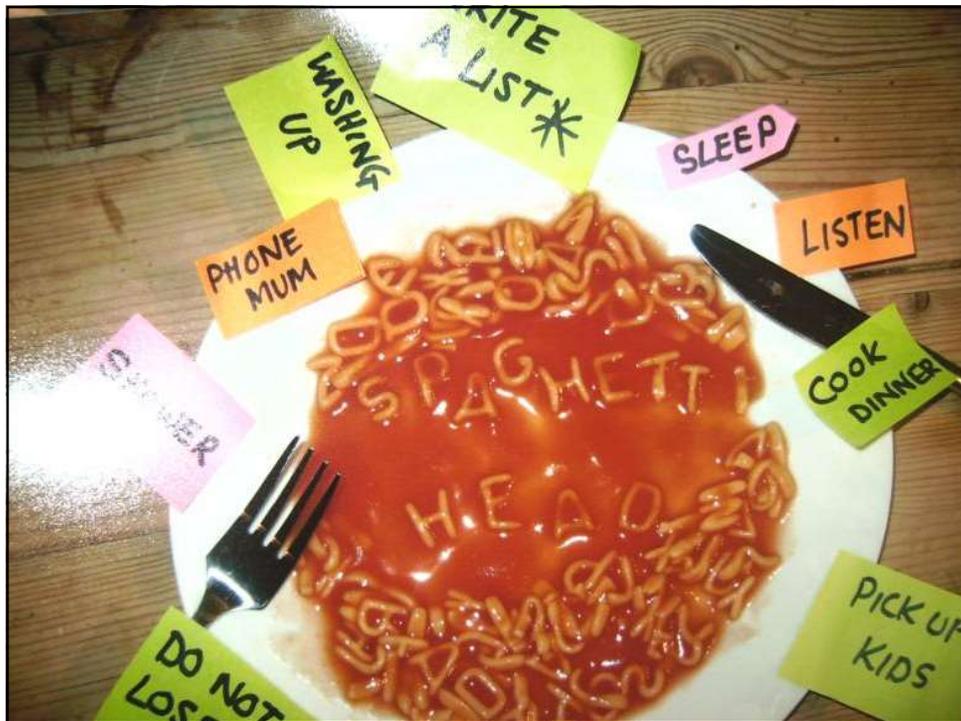
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Balance between Default Mode and Task Positive networks



Uddin L.Q. 2014, Nature Reviews Neuroscience

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“People with ADHD often struggle with filtering out”

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Description of excessive mind wandering in ADHD

- “Cacophony of ideas”
- “Layers and layers of this going on”
- “Internal dialogue constantly going on... I can’t stop it”
- “Distracted by what is going on in my head”
- “My mind is so active, I do not want to go to bed”

Anonymous (patient A)

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Problems linked to excessive mind wandering in ADHD

- **Distracted from current tasks by internal thoughts**
 - **Difficulty following conversations**
 - **Holding thoughts in mind**
 - **Reading difficulties**
 - **Sustaining attention**
- **Disrupted sleep**
- **Feeling exhausted by constant mental activity**
- **Self-awareness in the moment daily life**

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NICE guidelines 2018: General Guidance

- Provide psychoeducation as part of the diagnostic process
- Consider environmental modifications to reduce impact of ADHD symptoms, prior to starting medication
- Stress the value of balanced diet, good nutrition and regular exercise
- Ensure continuity of care for people with ADHD
- Provide a comprehensive, holistic shared treatment plan, that addresses psychological behavioural and occupational/educational needs

NICE NG87 – Guideline 2018

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NICE Guidelines 2018: Environmental Modifications

- Seating arrangements
- Lighting and noise
- Reducing distractions
- Shorter periods of focus with movement breaks
- Reinforcing verbal requests with written instructions
- Increasing physical activities
- Matching tasks to an individuals abilities

NICE CG72 2018 – Guideline in press

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NICE Guidelines 2018: Adults

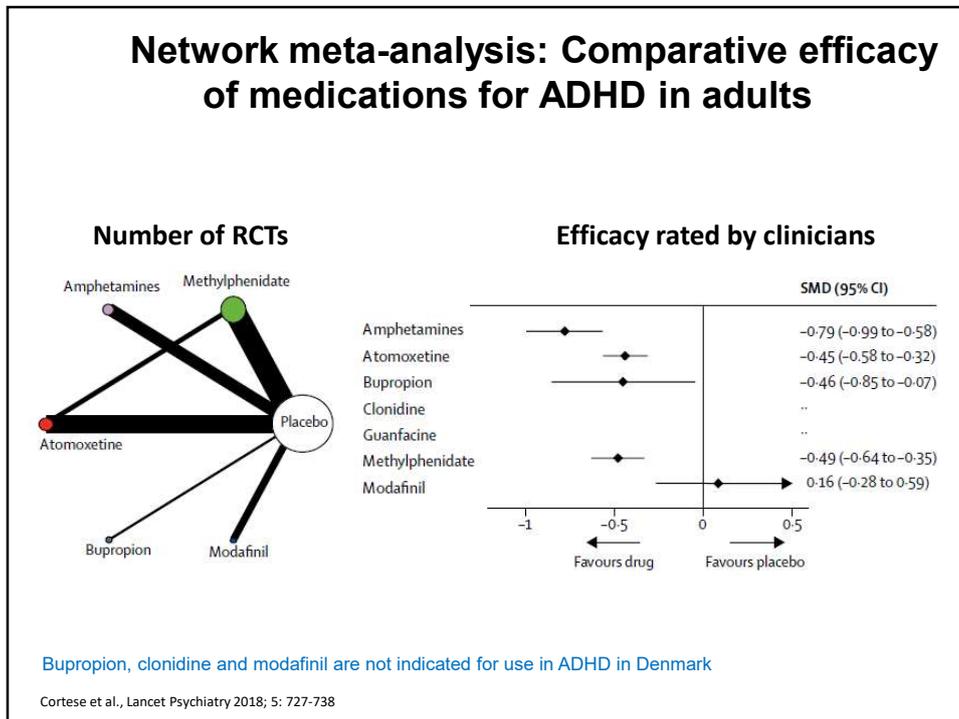
- Provide psychoeducation
- Implement environmental modifications
- Offer medication if symptoms and impairments still significant in at least one domain, after environmental modifications have been implemented and reviewed

Offer psychological treatments if:

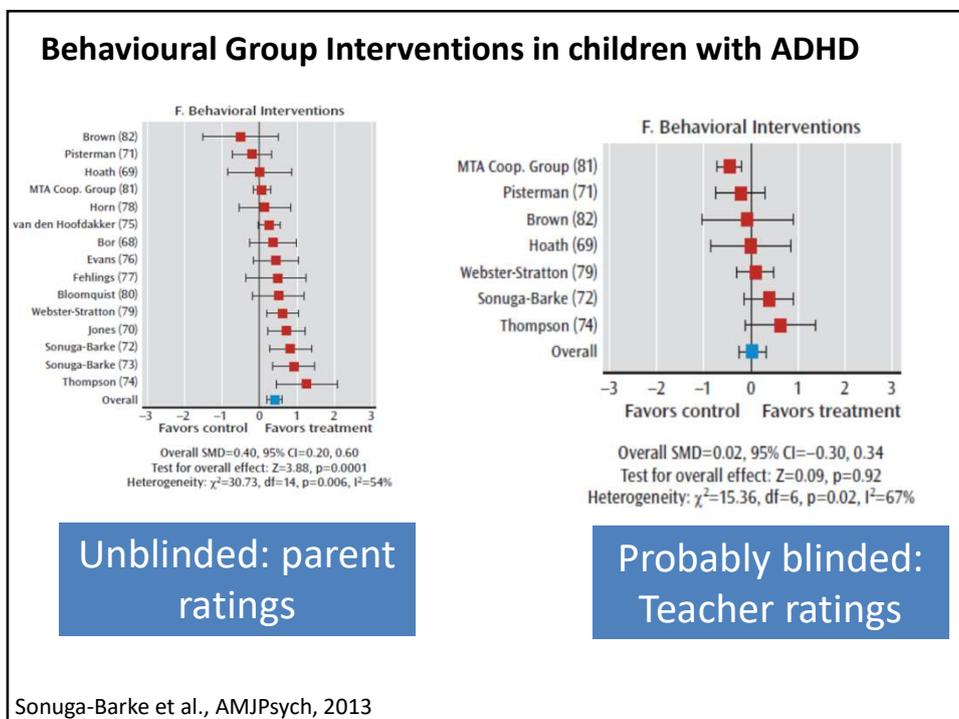
- Informed choice not to take medication
- Difficulty adhering to medication
- Symptoms still cause significant impairment

NICE NG87 – Guideline 2018

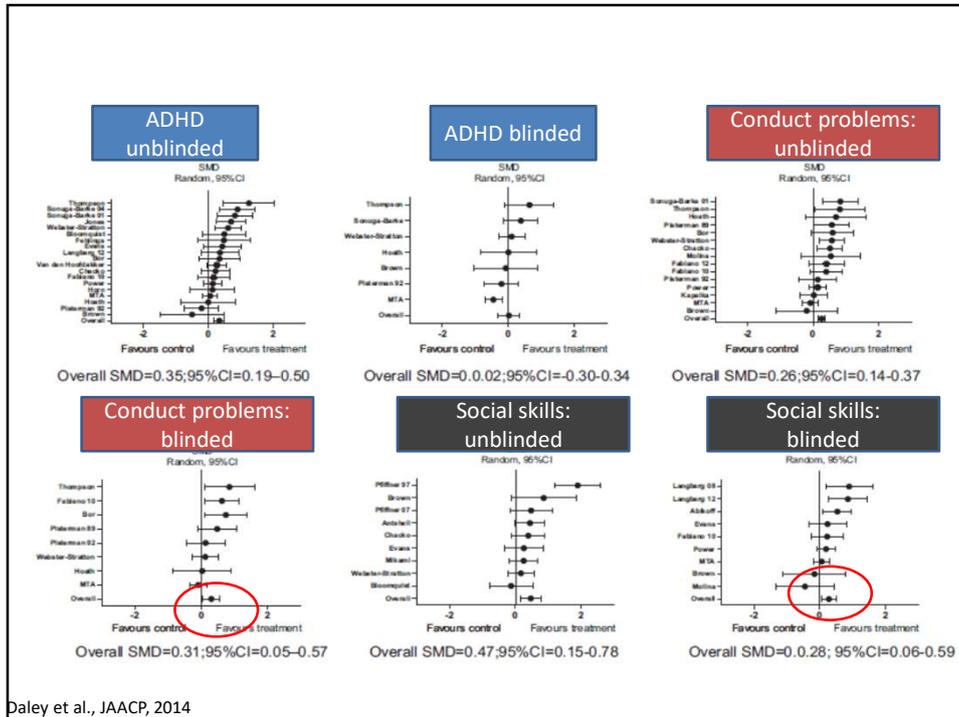
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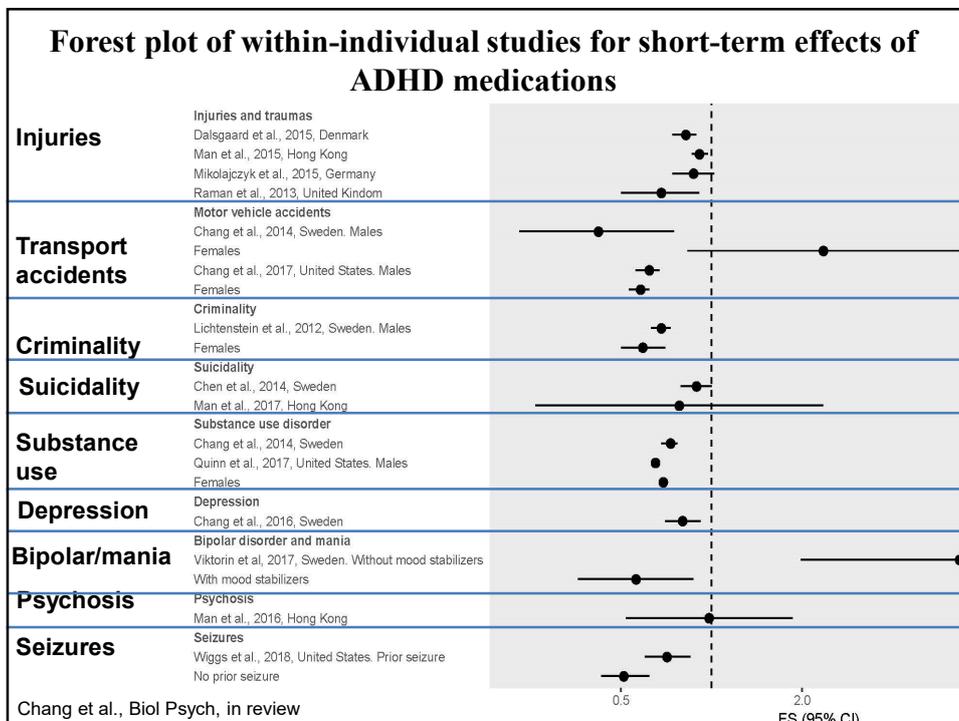
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Childhood

- SpLD assessors and psychologists should not attempt to diagnose ADHD in individuals under the age of 16
- Onward referral is important
- Detail suspected features of ADHD
- Question parents/carers/teachers
- Rating scales
- Template referral letter

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Ages 16-17

- Referral to Child and Adolescent Mental Health Services (CAMHS) for full multi-disciplinary assessment
- Report from specialist teacher or psychologist should detail the characteristics of ADHD supporting the need for educational interventions and, potentially, medical treatment

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Childhood

- SpLD assessors and psychologists should not attempt to diagnose ADHD in individuals under the age of 16
- Onward referral is important
- Detail suspected features of ADHD
- Question parents/carers/teachers
- Rating scales
- Template referral letter

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Adults

- To address the need for ADHD assessments for DSA funding, SASC recommend that practitioner psychologists and specialist teacher assessors holding current registration (HCPC and APC) and who have **relevant training** can identify learning difficulties and patterns of behaviour that together indicate the presence of characteristic features of ADHD.
- Suitable for Disabled Students allowance
- Relevant recommendations for educational support and reasonable adjustments
- Onward referral for medical management if required

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Relevant training

Assessment Practising Certificate (APC) or be a practitioner psychologist registered with Health and Care Professions Council (HCPC).

Appropriate training on ADHD:

- Manifestations of ADHD
- Use of rating scales
- Use of a diagnostic interview for assessing ADHD
- Developmental course of symptoms and impairments
- interplay of ADHD and other medical and mental health conditions
- Psychometric tests (optional) - there is NO diagnostic cognitive test for ADHD
- Distinction from SpLDs
- Appropriate recommendations in educational setting
- Report writing
- ongoing peer support/co-supervision and relevant continuous professional development (CPD).

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Adult assessments

- **Recognition of ADHD:** Enquire about core domains
- **Rating scales:** Barkley, Adult ADHD Self Report Scale (ASRS)
- **Structured interview:** DIVA-5 or ACE+ **[ESSENTIAL]**
- **Evaluate impairments:** particularly in educational and social domains
- **History:** describe development and impact of ADHD during childhood and adolescence
- **Obtain collateral information, if possible** (teachers/parents/friends)

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Adult assessments

- **Cognitive testing (optional):** sustained attention tasks (continuous performance tasks, go/no-go tasks, sustained attention to response task. QbTest and TOVA provide normative data but may be expensive.
- **Specific learning differences:** screen and look for these as comorbid conditions
- **Consider other explanations:** ADHD symptoms only emerge at when anxious, depressed or under stress – but not evidence at other times.
- **Emotional dysregulation:** Emotional over-reactivity, irritability, temper control, frustration, mood lability are all common (and may respond to treatment for ADHD)

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Reports

Assessment

- ADHD symptoms and check for DSM-5 criteria: use DIVA-5 or ACE+
- The impact of symptoms, particularly on educational performance/functioning but also other domains (e.g. social)
- Positive achievements and strengths
- List known or possible comorbidities and their impact
- Behaviour during assessment (may be entirely within normal range)
- Informant reports (whenever possible)
- Developmental history
- Cognitive testing if conducted (e.g. IQ)

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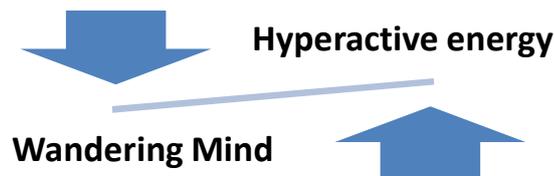
Reports

Recommendations:

- Diagnostic conclusions
- Impact on education/learning
- Workplace recommendations and reasonable adjustments
- Referral to GP or student medical service if medical treatment is appropriate:
 - Medication is first line treatment for reducing ADHD symptoms
 - Psychological treatment (particularly for comorbid anxiety/depression)
- Signposting to ADHD coach (can be funded by DSA)
- Signposting to ADHD support groups

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Managing ADHD well – a skilful balancing act



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