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Neurodevelopmental impairment in the youth justice system:

Understanding pathways to criminality and criminalisation

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Childhood neurodevelopmental impairment: physical, mental or sensory functional difficulties caused by disruption in the development of the nervous system, such as:

- cognitive or executive functioning deficits;
- specific learning difficulties
- communication difficulties;
- emotional and behavioural problems.

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Neurodevelopmental disorders: ‘a group of conditions… [which] typically manifest early in development, often before the child enters grade school, and are characterized by developmental deficits that produce impairments of personal, social, academic, or occupational functioning.’ (APA, 2013)

Such disorders include:

- learning disability;
- specific learning disorders;
- attention-deficit / hyperactivity disorder;
- communication disorders;
- autism spectrum disorder;
- fetal alcohol spectrum disorder.

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Nobody made the connection:

The prevalence of neurodisability in young people who offend

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Prevalence of neurodevelopmental disorders (Hughes et al, 2012)

Neurodevelopmental disorder	Definition (based on APA, 2013)	Prevalence among young people in general population	Prevalence among young people in custody
Learning / Intellectual Disability	Deficits in: cognitive capacity (measured by an IQ score of less than 70); and adaptive functioning (significant difficulties with everyday tasks)	**2 - 4%**	**23 - 32%**
Communication Disorders	Problems with speech, language or hearing that significantly impact upon an individual's academic achievement or day-to-day social interactions.	**5 - 7%**	**60 - 90%**
Attention-Deficit / Hyperactivity Disorder	Persistence in multiple symptoms of inattention, hyperactivity and/or impulsivity	**1.7 – 9%**	**12%**
Autistic Spectrum Disorder	Qualitative abnormalities in reciprocal social interactions and communication, and markedly restricted repetitive and stereotyped patterns of behaviour and interests	**0.6 – 1.2%**	**15%**

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Prevalence of traumatic brain injury (Hughes et al, 2015)

Nature of TBI	Prevalence among young people in general population	Prevalence among young people in custody
Any head injury	24 – 42%	49 – 72%
Head injury resulting in loss of consciousness	5 - 24%	32 - 49.7%
Head injury resulting in loss of consciousness for 20 minutes or more	5%	18.3%
More than one head injury	9.2 – 12%	45 – 55%

Understanding pathways into custody

Neurodevelopmental impairments influence offending in three distinct ways:

1. Expressions of NDI may increase propensity to antisocial / aggressive behaviour (e.g. executive or emotional functioning, communication)
2. Such deficits may increase exposure to social and environmental risk factors (e.g. difficulties with parenting, education disengagement)
3. Criminal justice processes and practices may *disable and criminalise* young people (e.g. reduced access to justice; ineffective interventions)

Policy and practice responses need to address all three of these areas

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