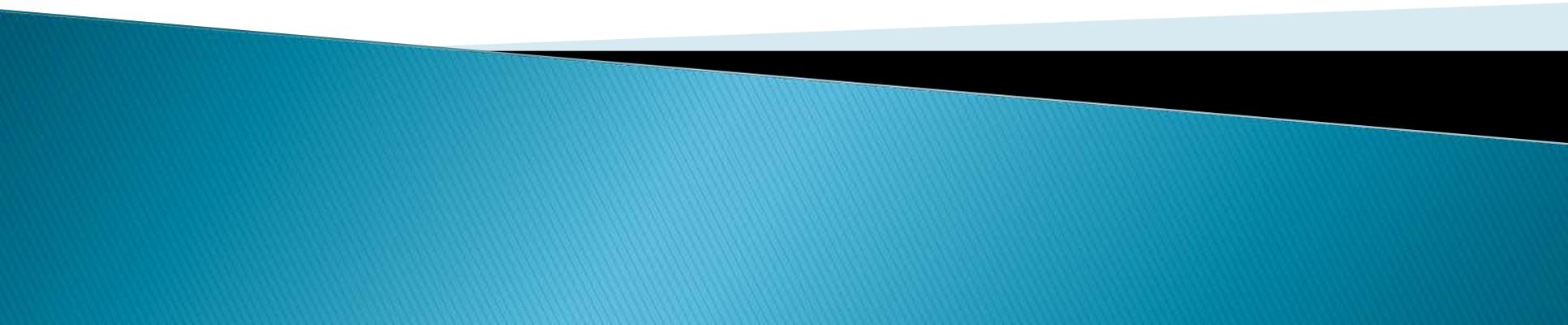


A Literature Review on Alcohol and Substance Use in people with Learning Disabilities

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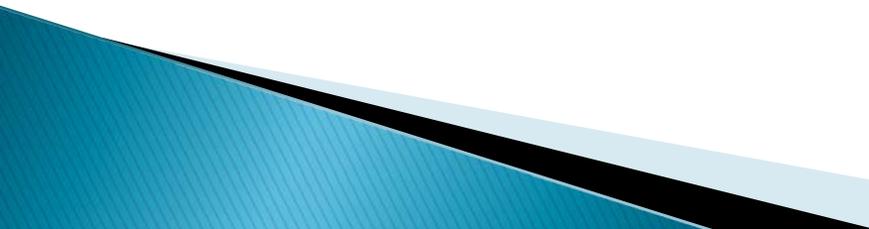


Content

- ▶ Definition of learning disability
 - ▶ Background
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Definition of learning disability

Learning disability (LD) is defined by three core criteria: ¹

- ▶ Significant impairment of intellectual functioning;
 - ▶ Significant impairment of adaptive/ social functioning;
 - ▶ Age of onset before adulthood.
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Background

- ▶ Up to 2% of the population
 - ▶ Over 1 million people in England²
 - ▶ Exists on a gradient – from mild to profound
 - ▶ Around 80% of people with mild LD are not diagnosed or known to statutory services³
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Background – type of LD

Type of LD	IQ	% of those with LD	Presentation
Mild	50–69	80	<ul style="list-style-type: none">• Conversational language – can read / write• Can live independently / work
Moderate	35–49	12	<ul style="list-style-type: none">• Variable language – limited reading / writing• Likely to need support in ADLs / accommodation
Severe	20–34	7	<ul style="list-style-type: none">• No / minimal language• Assistance for basic tasks and self care• Highly supported accommodation
Profound	<20	1	<ul style="list-style-type: none">• Full time support for all needs• High rates of co-morbidity

Background – Causes of LD

- ▶ Caused by any factor that affects brain development
 - ▶ Often the cause is unknown
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Background – Causes of LD

Cause	Examples
Genetic	Chromosomal disorders, syndromes – Down syndrome, Fragile X, Turner's Metabolic Structural abnormalities – hydrocephalus, microcephaly
Antenatal	Teratogens – alcohol, drugs Maternal infection –TORCH infections Maternal hypothyroidism
Perinatal	Extreme prematurity – intraventricular haemorrhage, periventricular leucomalacia Hypoxic-ischaemic injury – birth asphyxia Metabolic – neonatal hypoglycaemia, hyperbilirubinaemia
Postnatal	Traumatic brain injury Anoxia – suffocation, near drowning Infection – meningitis, encephalitis

Background – risks

- ▶ Greater risk of physical health disorders
 - ▶ 4x more mental health problems
Point prevalence = 40%⁴
 - ▶ Worse access to healthcare⁵
 - ▶ People with learning disabilities say they don't receive advice on health promotion⁶
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Background – risks

- ▶ Changing patterns of care for people with LD
 - ▶ From long-stay institutions to community care
 - ▶ Exposed to social and environmental pressures
 - ▶ Adopt behaviours that impact negatively on their health
 - ▶ More access to alcohol / illicit substances / sexual relationships
- 

Alcohol + Substance Use

- ▶ Discrepancies in the literature
- ▶ Studies suggest:
 - lower^{7,8,9,10,11,12,13,14}
 - similar^{15,16,17}
 - higher^{18,19,20}

Risk of substance use than general population

- ▶ Most studies find lower rates of alcohol use than general population^{21,22}
- ▶ Of those that do use – higher risk of substance abuse^{15,17,22}
- ▶ Appears to be a hidden problem within the LD population

Prevalence

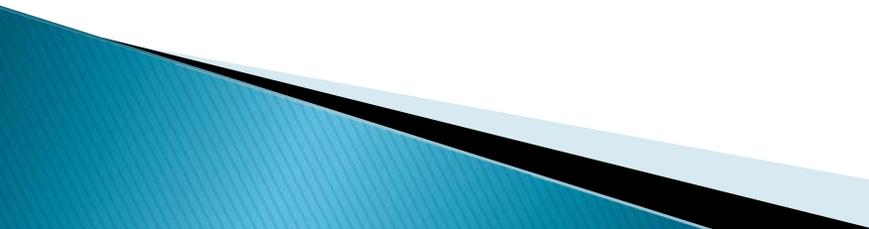
- ▶ Prevalence of substance misuse 0.5–2.6 % (up to 26%)^{23,34}
- ▶ Alcohol main substance to be misused^{25,26}
- ▶ Followed by cannabis and cocaine²⁶

Past month prevalence ²²	%	Vs general population
Alcohol	35.5–47	Lower (similar)
Smoking	20.5	Same
Marijuana	13	Lower
Cocaine	1.5	Lower

Prevalence

- ▶ 1 / 5th of alcohol users also use illicit drugs / prescribed medication²⁵
- ▶ Older adults more likely to use alcohol exclusively²²
- ▶ Younger more likely to use alcohol + cannabis or stimulants²²
- ▶ ~ 5% of youths in drug and alcohol service have a degree of LD²¹
- ▶ If LD + mental disorder – substance abuse range of 7–20%^{23,27}

Reasons to use

1. Being like others – to ‘fit in’
 2. Social and emotional influences
 3. Learning from experience
 4. Choices and challenges
 5. Self medicating against negative experience
 6. To relieve stress
 7. To develop relationships
- ▶ Similar to general population^{24,28,29,30}
- 

Risk factors

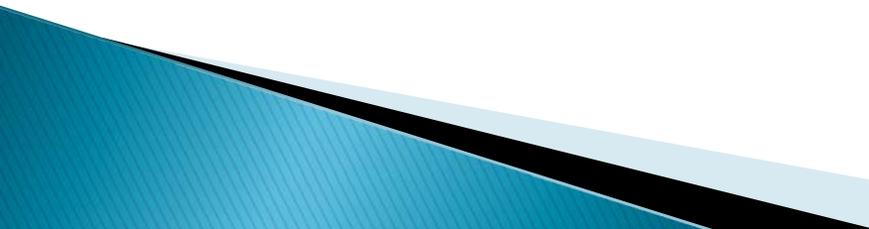
Risk factors^{7,16,21,22,25,26,31}

- Male
- Mild LD population
- Young
- Those that don't use LD services
- Living independently
- Forensic history
- Mental health problem
- Stressful life events
- Non-urban area
- Non - Caucasian
- Use of substances by friends
- Poor understanding of disability
- Hyperactivity
- Lack of assertiveness
- Low self esteem
- Susceptibility to peer pressure
- Desire for social acceptance
- Social isolation
- Lack of example setting in childhood

Supportive family are a strong protective factor⁸

Characteristics

Compared to the non-LD population:

- ▶ Later onset of use^{22,27,29}
 - ▶ Greater risk of peer influence¹⁶
 - ▶ Less caucasian²³
 - ▶ ‘All or nothing’ principle¹²
 - ▶ Less likely to receive treatment or remain in treatment²²
- 

Risks for the user

Risks for the user^{13,17,22,23,25,29,}

Medication interactions

Less likely to seek help

High risk of complications:

- ↑ cognitive deficits
- Cardiovascular, respiratory and GI problems
- ↑ epileptic activity
- ↑ motor deficit

Aggression, erratic mood changes

Sexual exploitation

Difficulties maintaining relationships

Loss of daily routine

Prevention + Interventions

Interventions suitable for non-LD population are not suitable for LD

- ▶ Need to adapt interventions
- ▶ Reasonable adjustments must be made
- ▶ Need early identification
- ▶ Need to start at young age

In one study 6% tried cigarettes and 15% drank alcohol at the age of 10 years or younger³²

Interventions

- ▶ People with LD and substance misuse report that their main source of support is from LD services – in educational and liaison roles³⁰
 - ▶ Perceive main stream addiction services as negative³⁰
 - ▶ Need better access to a wide range of specialist services
- 



Interventions

Interventions include:^{13,21,24,27,29,30,32,33}

1. Behavioural modification
 - Self-determination theory
 - Motivational interviewing
 - Cognitive behavioural therapy
 - Psychomotor therapy
2. Alcohol education
3. Modification of existing treatment
 - E.g. AA concept of powerlessness over substances
4. Further healthcare professional training
5. Liaison between alcohol services and services for people with LD

Interventions

Modification of existing treatment

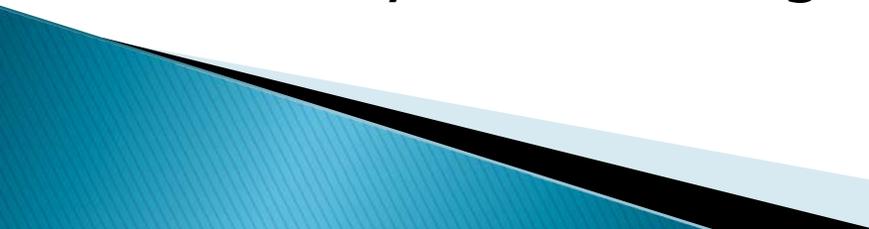
- Longer treatment
- Short sessions
- More supportive
- Repetition
- Close work with family members
- Patience
- Flexibility
- Simplification of topics
- Teaching approach
- Less confrontation
- Increased individual work + Less group work
- Concrete goals over short time frames
- Use of pictures / quizzes / games
- Incentives
- Role playing
- Maintenance sessions

Interventions

So far interventions have varying success:^{24,32}

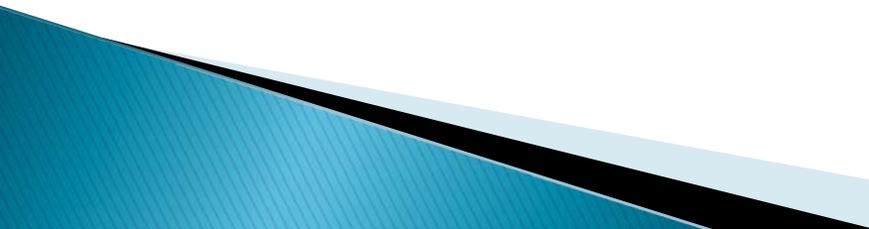
- ▶ Increased knowledge and skills
- ▶ Not improved attitudes
- ▶ Some reduction in substance use

LD mentioned in NICE Alcohol guidelines:³⁴

- ▶ Assisted inpatient withdrawal recommended
 - ▶ No further guidance given
 - ▶ Clearly additional guidance needed
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Conclusion

Little evidence to guide practice:

- ▶ Most studies epidemiological and inconclusive²¹
 - ▶ Unreliable rates of substance use in LD population²²
 - ▶ Effective and evidence based prevention programs lacking
 - ▶ Studies are small, run in specialist single centre settings and are uncontrolled²⁴
 - ▶ Some RCT's in progress^{17,24}
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Further research

More robust research needed^{22,33}

- ▶ To gauge magnitude of problem
 - ▶ To elucidate substance use patterns + consequences
 - ▶ To clarify pathways to substance abuse care
 - ▶ To test effectiveness of interventions
 - ▶ Prevention studies
 - ▶ To establish guidelines
- 

References

1. Learning Disability: Definitions and Contexts, Professional Affairs Board of The British Psychological Society, 2000.
2. People with Learning Disabilities in England 2012 Eric Emerson et al, Improving Health and Lives: Learning Disability Observatory.
3. People with learning disabilities in England in 2013, Protecting and improving the nation's health, Public Health England.
4. Cooper SA , Smiley E , Morrison J , et al.: Mental ill-health in adults with intellectual disabilities: prevalence and associated factors. *British Journal of Psychiatry* 190:27-35,2007
5. Facing the Facts: Services for People with Learning Disabilities – A Policy Impact Study of Social Care and Health Services (Department of Health 1999)
6. Equal Treatment: Closing the Gap A formal investigation into physical health inequalities experienced by people with learning disabilities and/or mental health problems. DRC. 2006
7. Improving Health and Lives, Learning Disability Observatory. 'Health inequality and people with learning disabilities in the UK; 2012' Emerson E et al.
8. [Papachristou E, Anagnostopoulos D](#) Behavioral disorders and substance abuse in adolescents with mental retardation *Psychiatriki*. 2014 Apr-Jun;25(2):139-50
9. [Fakier N, Wild LG](#). Associations among sleep problems, learning difficulties and substance use in adolescence. *J Adolesc*. 2011 Aug;34(4):717-26. doi: 10.1016/j.adolescence.2010.09.010. Epub 2010 Oct 16.
10. [Janusis GM, Weyandt LL](#). An exploratory study of substance use and misuse among college students with and without ADHD and other disabilities. *J Atten Disord*. 2010 Nov;14(3):205-15. doi: 10.1177/1087054710367600. Epub 2010 May 17.
11. [McCrystal P, Percy A, Higgins K](#), Substance use behaviors of young people with a moderate learning disability: a longitudinal analysis, *Am J Drug Alcohol Abuse*. 2007;33(1)
12. [Reis O, Wetzel B, Häbler F](#). Mild or borderline intellectual disability as a risk for alcohol consumption in adolescents – A matched-pair study. *Res Dev Disabil*. 2015 Dec 11. pii: S0891-4222(15)30001-9. doi: 10.1016/j.ridd.2015.11.007.
13. [Frielink N](#) Pretreatment for substance-abusing people with intellectual disabilities: intervening on autonomous motivation for treatment entry. *J Intellect Disabil Res*. 2015 Dec;59(12):1168-82. doi: 10.1111/jir.12221. Epub 2015 Sep 15.
14. [McGuire BE, Daly P, Smyth F](#). Lifestyle and health behaviours of adults with an intellectual disability. *J Intellect Disabil Res*. 2007 Jul;51(Pt 7):497-510.

References

15. [Beitchman JH](#) et al, Substance use disorders in young adults with and without LD: predictive and concurrent relationships, [J Learn Disabil](#). 2001 Jul–Aug;34(4):317–32.
16. [Katims DS](#), [Zapata JT](#), [Yin Z](#). Risk factors for substance use by Mexican American youth with and without learning disabilities. [J Learn Disabil](#). 1996 Mar;29(2):213–9.
17. [Schijven EP](#) et al. Evaluating a selective prevention program for substance use and comorbid behavioral problems in adolescents with mild to borderline intellectual disabilities: Study protocol of a randomized controlled trial. [BMC Psychiatry](#). 2015 Jul 22;15:167. doi: 10.1186/s12888-015-0563-1
18. [Blum RW](#), [Kelly A](#), [Ireland M](#). Health–risk behaviors and protective factors among adolescents with mobility impairments and learning and emotional disabilities. [J Adolesc Health](#). 2001 Jun;28(6):481–90
19. [Hogan A](#), [McLellan L](#), [Bauman A](#). Health promotion needs of young people with disabilities—a population study. [Disabil Rehabil](#). 2000 May 20;22(8):352–7.
20. [Swerts C](#) et al, Substance use among individuals with intellectual disabilities living independently in Flanders. [Res Dev Disabil](#). 2016 Apr 6. pii: S0891–4222(16)30069–5. doi: 10.1016/j.ridd.2016.03.019.
21. [Barrett N](#), [Paschos D](#). Alcohol–related problems in adolescents and adults with intellectual disabilities. [Curr Opin Psychiatry](#). 2006 Sep;19(5):481–5.
22. [Carroll Chapman SL](#), [Wu LT](#). Substance abuse among individuals with intellectual disabilities. [Res Dev Disabil](#). 2012 Jul–Aug;33(4):1147–56. doi: 10.1016/j.ridd.2012.02.009. Epub 2012 Mar 7.
23. Substance abuse and persons with disabilities, [Disabled World](#), 2013–07–22 (2013–11–15).
24. [Kouimtsidis C](#) et al. Extended brief intervention to address alcohol misuse in people with mild to moderate intellectual disabilities living in the community (EBI-ID): study protocol for a randomised controlled trial. [Trials](#). 2015 Mar 25;16:114. doi: 10.1186/s13063-015-0629-x.
25. [Taggart L](#) et al, An exploration of substance misuse in people with intellectual disabilities. [J Intellect Disabil Res](#). 2006 Aug;50(Pt 8):588–97.
26. [Chaplin E](#), [Gilvarry C](#), [Tsakanikos E](#). Recreational substance use patterns and co–morbid psychopathology in adults with intellectual disability. [Res Dev Disabil](#). 2011 Nov–Dec;32(6):2981–6. doi: 10.1016/j.ridd.2011.05.002. Epub 2011 Jun 2.

References

27. Quintero M, Substance abuse in people with intellectual disabilities. *Social work today*. Vol. 11 no.4 p.26
28. Tobacco and Alcohol Use in People With Mild/Moderate Intellectual Disabilities: Giving Voice to Their Health Promotion Needs. [J Appl Res Intellect Disabil](#). 2016 Mar 21. doi: 10.1111/jar.12255.
29. National Institute on Alcohol abuse and Alcoholism. Module 01 – Disabilities and Alcohol use disorders
30. [Taggart L](#) et al Listening to people with intellectual disabilities who misuse alcohol and drugs. [Health Soc Care Community](#). 2007 Jul;15(4):360–8.
31. [Cosden M](#). Risk and resilience for substance abuse among adolescents and adults with LD. 155–61 [J Learn Disabil](#). 2001 Jul–Aug;34(4):352–8.
32. [Kiewik M](#), Substance use prevention program for adolescents with intellectual disabilities on special education schools: a cluster randomised control trial. [J Intellect Disabil Res](#). 2016 Mar;60(3):191–200. doi: 10.1111/jir.12235. Epub 2015 Dec 2.
33. [Kerr S](#) et al Tobacco and alcohol–related interventions for people with mild/moderate intellectual disabilities: a systematic review of the literature. [J Intellect Disabil Res](#). 2013 May;57(5):393–408. doi: 10.1111/j.1365–2788.2012.01543.x. Epub 2012 Mar 28.
34. NICE – Alcohol–use disorders. The NICE guideline on diagnosis, assessment and management of harmful drinking and alcohol dependence. Oct 2014.