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Foetal Alcohol Spectrum Disorder, Community Protection and the Criminal Law

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Abstract

This article reviews the evolving understanding of the neurodevelopmental disability of FASD in the forensic context and the criteria for its diagnosis, an issue that is especially pressing for Indigenous communities in Canada, the United States, Australia and New Zealand. It analyses important legal authorities, emphasising recent case law, dealing with the relationship of FASD to criminal offending and victimisation, including cases relating to fitness for interview, fitness to stand trial, and diminished responsibility, while focussing upon the sentencing of persons with FASD. It particularly draws attention to how the condition has been incorporated into the matrix of factors that affect evaluation of risk, including for young offenders. It discusses culturally informed, trauma-aware measures that are required to inform and guide forensic responses to FASD, so as to maximise effective early intervention, utilise non-carceral sentencing options, and identify creative options for provision of long-term supports for offenders diagnosed with FASD.

Keywords: foetal alcohol spectrum disorder; FASD; diagnosis; fitness for interview; fitness to stand trial; diminished responsibility; victimisation; vulnerability; criminal injuries compensation; sentencing; recidivism; community programmes; Indigenous issues

1. Introduction

A significant body of scholarly literature has developed in relation to the connection between maternal consumption of alcohol and the development by young persons of the multi-faceted disability known as foetal alcohol spectrum disorder (FASD) (see Brown et al. 2014; Nelson and Trussler 2017; Spohr 2018; Mukherjee and Aiton 2021; Chudley and Hicks 2022; Abdul-Rahman and Petrenko 2023; Flannigan et al. 2025; Canadian Academy of Health Sciences 2025). Much of the published literature has focused upon issues arising in relation to First Nations populations (see e.g., Hamilton et al. 2021) and has emerged in the context of the interaction between young persons with FASD and the criminal justice system (see e.g., Walsh et al. 2024). It has highlighted deficiencies in relation to how FASD has been diagnosed and responded to in the context of criminal offending, as well as to how it has been incorporated as a factor that potentially reduces moral culpability, in a way comparable to mental illness and intellectual disability (see e.g., *Wass v DPP* 2024; *R v Okemow* 2017).

Addressing the criminogenic risks of FASD requires expert identification of those with the symptomatology of the condition, preferably at an early age, before they engage in criminal offending (Freckelton 2016b; Canadian Academy of Health Sciences 2025). In turn,

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this requires international consensus on diagnostic criteria and nomenclature of nosology. It also necessitates the formulation of effective, individually tailored interventions for moderate antisocial behaviours to support offenders and reduce the risk to the community from the potential for serial offending contributed to by the condition. Ideally, this should take place early in a young person's life before they have engaged in serious breaches of community norms. However, if a diagnosis is only made after a person has entered the criminal justice system, or, as too often happens, after conviction and sentence and prior to the hearing of an appeal, the response burden shifts from the health domain to the courts, with health practitioners and lawyers needing to evaluate the relationship of FASD symptomatology to offending and to formulate strategies to reduce the risk of recidivism.

This article reviews the evolving understanding of FASD in the forensic context and the criteria for its diagnosis, an issue of particular importance for Indigenous communities in Canada, the United States, Australia and New Zealand. It analyses important legal authorities, emphasising recent case law about the relationship of FASD to criminal offending, including cases relating to fitness for interview, fitness to stand trial and diminished responsibility, while focussing upon the sentencing of persons with FASD, and the risks for persons with FASD to become the victims of criminal conduct. It particularly draws attention to how the condition has been incorporated into the matrix of factors that affect evaluation of risk, including for young offenders, as well as the impact of the condition upon the potential impact of FASD symptomatology in relation to incarceration. It argues for the adoption of creative measures to provide informed guidance to forensic responses to it, and highlights the need to control the risk posed by offenders with FASD by the adoption of tailored early interventions that are suitably resourced and evaluated by government.

2. Diagnosis of FASD

In 1973, Jones et al. published an article in *The Lancet*, titled "Pattern of Malformation in Offspring of Chronic Alcoholic Mothers". It presented case histories of eight unrelated children with a similar pattern of craniofacial, limb and cardiovascular defects associated with prenatal onset growth deficiency and developmental delay. Jones et al. (1973) followed this article by publishing (also in 1973) an analysis of what they termed "the fetal alcohol syndrome" (FAS) in early infancy. Increasing recognition of the dangers of prenatal consumption of alcohol ensued, and Clarren and Smith (1978) published a study of 65 children affected by FAS in the *New England Journal of Medicine*.

Diverse estimates have been made of the incidence of FASD, often in conjunction with evaluations of parental alcohol exposure (PAE). Using a published equation for the risk of FASD following PAE, a 2025 study, for instance, estimated the prevalence of FASD in the general population at 3.64% (95% confidence interval, 2.91%, 4.421%) (Tsang et al. 2025). More generally, though, the incidence of all forms of FAS has been estimated at between 2 and 4 percent in a number of countries, including Australia and Canada, depending on the definition and study design (May et al. 2009; Australian Institute of Health and Welfare 2015; Spohr 2018; Bower et al. 2018; Popova et al. 2019; Palmeter et al. 2021; Hamilton et al. 2021; Tsang et al. 2025; c.p., Burleigh et al. 2023 in the UK; Landgren et al. 2025 in western Sweden), although it is heavily over-represented in certain low socio-economic populations, especially those that are Indigenous (see Abel 1995; Sessa et al. 2022; O'Leary et al. 2020), arguably due to the effects of colonialism (Dickson and Stewart 2022; Canadian Academy of Health Sciences 2025, p. 76). In Ireland, where there is no official diagnostic standard, and there are no pathways for diagnosis, no framework of support, and no recognition of FASD as a disability, it has been estimated that as many as 7.4% of the population live with FASD (see Harper et al. 2026; Lange et al. 2017).

Significantly, a 2025 study in Western Australia (Williams et al. 2025) highlighted that awareness, knowledge, and education are likely to be welcomed by Indigenous members of remote communities, contribute to the prevention of FASD (Jacobsen et al. 2022) and support effective interventions on country and in the community.

In 1996, the Institute of Medicine (IOM) in the United States proposed four distinct diagnostic categories that comprise the foetal alcohol syndrome continuum, at one end of the spectrum being the subset of individuals with growth restriction, a distinctive pattern of facial dysmorphology, and cognitive and/or neurobehavioural effects (foetal alcohol syndrome), and at the other end of the spectrum those with neurobehavioural and cognitive deficits who exhibit minimal or no growth or physical anomalies (alcohol-related neurodevelopmental disorder) (ARND) (Stratton et al. 1996).

The relevant diagnostic area is beset by a proliferation of acronyms, all of which refer to subtly different, albeit related, alcohol-caused conditions. The focus of this article, FASD, is a broad diagnosis that includes foetal alcohol syndrome (FAS), partial foetal alcohol syndrome (PFAS), alcohol-related neurodevelopmental disorder (ARND), sometimes also termed congenital alcohol spectrum encephalopathy (CASE) (see *R v Obed* 2006: at [3]), and alcohol-related birth defects (ARBDs).

The variation in nomenclature of related conditions and the lack of agreement on diagnostic criteria have yet to be fully resolved, although there have been significant moves toward convergence in the use of terminology and diagnostic criteria. However, the ongoing differences in diagnostic approaches have resulted in some uncertainty about the bases for diagnosis, which pose both research and comparative challenges, as well as particular difficulties for the criminal justice system.

As noted above, the term "fetal alcohol syndrome" (FAS) was first used in 1973 to describe a cluster of congenital defects arising from antenatal alcohol exposure, including growth restriction, craniofacial abnormalities and intellectual disabilities (Jones and Smith 1973; see also Lemoine et al. 1967). By 2000, it was recognised that alcohol exposure in utero may result in neurodevelopmental problems in the absence of facial and other physical features, and the term foetal alcohol spectrum disorder (FASD) was coined (Streissguth and O'Malley 2000; Streissguth et al. 2013; see also Warren and Foudin 2001).

In 2005, an international, collaborative, evidence-based guideline for diagnosis related to prenatal alcohol exposure was published (Bertrand et al. 2005).

In September 2012, members of a 14-person steering committee were selected by the Canada Fetal Alcohol Spectrum Disorder Research Network, comprising four psychologists, three researchers, three paediatricians, a social worker, a clinic geneticist, a FASD clinic coordinator and a parent of a person living with FASD. The Network stipulated that a diagnosis of FASD may be made if a person meets either of two sets of criteria:

FASD with sentinel facial features:

- Simultaneous presentation of the three sentinel facial features (palpebral fissure length $\geq$ 2 SDs below the mean; philtrum rated 4 or 5 on a 5-point scale of the Washington Lip-Philtrum Guide; and upper lip rated 4 or 5 on a 5-point scale of the University of Washington Lip-Philtrum Guide); and
- Prenatal alcohol exposure confirmed or unknown; and
- Evidence of impairment in three or more of the identified neurodevelopmental domains (motor skills; neuroanatomy/neurophysiology; cognition; language; academic achievement; memory; attention; executive function, including impulse control and hyperactivity; affect regulation; and adaptive behaviour, social skills or social communication), or, in infants and young children, evidence of microcephaly. OR

FASD without sentinel facial features:

- Evidence of impairment in three or more of the identified neurodevelopmental domains (as above); AND
- Confirmation of prenatal alcohol exposure, with the estimated dose at a level known to be associated with neurodevelopmental effects (Cook et al. 2016).

The Canadian Network excluded growth as a diagnostic criterion.

In 2011–2012, members of the Australian FASD Collaboration published a FASD diagnostic instrument for Australian health practitioners. It contained three diagnostic categories: Fetal Alcohol Syndrome (FAS), Partial Fetal Alcohol Syndrome (PFAS) and Neurodevelopmental Disorder-Alcohol Exposed (ND-AE). During 2015, the instrument was trialled in clinical practices around Australia and deemed to be informative, useful and flexible. In 2016, updated clinical guidelines for diagnosing fetal alcohol spectrum disorders were published (Hoyme et al. 2016; Bower and Elliott 2016). However, after the publication of the Canadian instrument, in 2020, the Australian FASD Collaboration modified the Australian instrument along similar lines. Similarly, New Zealand FASD guidelines were published in 2024 (see Kedge and Karanui-Golf 2025).

Internationally, therefore, key contemporary components of a FASD diagnostic assessment now include documentation of:

- history—presenting concerns, obstetric, developmental, medical, mental health, behavioural, social;
- birth defects—dysmorphic facial features, other major and minor birth defects, adverse prenatal and postnatal exposures, including alcohol;
- known medical conditions—including genetic syndromes and other disorders; and
- growth.

Infants and young children under six years of age, as well as older adolescents and adults, are regarded as warranting special consideration during the FASD diagnostic assessment process. There are also epidemiological circumstances where an individual may be considered to be "at risk" of FASD.

While FASD is a lifelong and potentially serious set of conditions, it is not listed specifically within the American Psychiatric Association's DSM-5-TR (American Psychiatric Association 2022) or the World Health Organization's ICD-11 (World Health Organization 2025). However, it does appear in the DSM-5-TR amongst "Conditions for Further Study: Neurobehavioral Disorder Associated with Prenatal Alcohol Exposure" (ND PAE): p. 916, and the ICD-11 lists FAS (code LD2F.00) as both a "malformation syndrome caused by maternal consumption of alcohol during pregnancy" and a "neurodevelopmental syndrome due to prenatal alcohol exposure" (code 6AOY). The DSM-5-TR stipulates the following criteria for ND PAE:

A. More than minimal exposure to alcohol during gestation, including prior to pregnancy recognition.
B. Impaired neurocognitive functioning as manifested by 1 or more of the following:
    1. Impairment of global intellectual performance (IQ of 70 or below);
    2. Impairment in executive functioning (e.g., poor planning & organization; inflexibility; difficulty with behavioral inhibition);
    3. Impairment in learning;
    4. Memory impairment;
    5. Impairment in visual-spatial reasoning.
C. Impaired self-regulation as manifested by one or more of:
    1. Impairment in mood or behavioral regulation;
    2. Attention deficit;

3. Impairment in impulse control.

D. Impairment in adaptive functioning as manifested by 2 or more of the following (1 of which must be (1) or (2)):
   1. Communication deficit;
   2. Impairment in social communication and interaction'
   3. Impairment in daily living skills;
   4. Impairment in motor skills.

E. Onset of the disorder occurs in childhood.

F. The disorder causes clinically significant distress or impairment in social, academic, occupational or other important areas of functioning.

G. It is not otherwise explicable.

The Australian Collaboration stated that "ideally" a diagnostic assessment for FASD is made by a multidisciplinary team to enable accurate evaluation of the range of outcomes that may be associated with prenatal alcohol exposure, with participating clinicians including a paediatrician, a psychologist, a speech and language pathologist and an occupational therapist, depending on a range of factors, including the patient's age, the availability of qualified clinicians in the geographical location and the nature of the suspected disabilities. An approach that focuses upon the diverse deficits in executive functioning, learning, memory, social skills and sensory-motor abilities by reference to the World Health Organization's International Classification of Functioning, Disability and Health criteria permits a multidimensional assessment of impairments that has the potential to be of particular utility in the forensic context (Ferorelli et al. 2025). Novick Brown et al. (2010, 2026) and Novick Brown (2021) have developed and amended a protocol for assessing FASD for the courts, which is attracting increasing international support. It utilises an integrated biopsychosocial approach. This has clear advantages. However, as acknowledged by the Canadian Academy of Health Sciences (2025), such multidisciplinary evaluation is not always feasible, either in terms of available resources or cost, especially in a legally aided forensic context. The Australian Collaboration noted, too, that the "assessment process may be confronting and the individual, their caregiver and family, should receive appropriate practical and psychological support" (Australian FASD Collaboration 2012).

There is a range of impediments to any form of diagnosis of FASD. This has caused it to be missed on a great many occasions (see Harper et al. 2026) An empirical study (Kerimofski et al. 2025) identified five impediments in particular: (1) stigma and stereotypes of parental alcohol exposure (PAE), (2) support for universal screening of PAE, (3) differential, co-occurring, and missed diagnoses, (4) lack of support following diagnosis, and (5) need for improved training for psychologists (see also Canadian Academy of Health Sciences 2025).

Notably, FASD can exist concurrently with, and be camouflaged by, other conditions such as mood disorders, conduct disorder, oppositional defiance disorder, autism spectrum disorder (ASD) and attention deficit hyperactivity disorder (ADHD) (see e.g., Canadian Academy of Health Sciences 2025; *Maaka-Wanahi v Police* 2023; *Nannup v State of Western Australia* 2021: at [18]; *R v Krey (No 3)* (2020); *R v WALD* 2004: at [40]; *R v M (PJ)* (2008); *R v Sumner* 2022), intellectual disability (*State of Western Australia v Patrick [No 6]* 2025) and PTSD (*Heke-Gray v The Queen* 2023; *R v BXY* 2023), some of which, by contrast with FASD, can often be ameliorated in their effects by pharmacotherapy. Depression and anxiety are common concomitants of FASD (see e.g., *R v Laboucane* 2021; *Hiemstra v State of Western Australia* 2021; *Wass v DPP* 2024). Frequently, though, FASD goes undiagnosed (see *R v BXY* 2023: at [46]) and its symptoms fail to be recognised by health and legal practitioners alike (Hoyme et al. 2026; Chartrand and Forbes-Chilibeck 2003). Moreover, it is common for its effects to be exacerbated by the usage of drugs and alcohol (see, e.g., *R v Heck* 2025).

FASD has the potential to affect people in a myriad of important aspects of their lives. An example of this was given in *R v Sumner* (2022: at [74]), where the Provincial Court of Manitoba found that the offender was affected by impulsivity, poor decision-making, inability to manage money, struggles in relationships, compulsive lying when in trouble, inability to consider the consequences of his actions and uncontrollable, lengthy tantrums (cp *R v MBQ; ex parte A-G* 2012). Similarly, in *Pomare v The Queen* (2017: at [19]) Whata J in New Zealand noted that the expert reports provided to the court coalesced in identifying that 'young people with FASD are markedly suggestible, easy to manipulate, yet tend to be egocentric and unable to appreciate other views. These factors often explain why FASD offenders are described as lacking remorse, when in fact they have neurological features prevent this type of higher order thinking.

Streissguth et al. (2013) linked negative environmental factors to adverse life outcomes for individuals with FASD, finding that in cases where individuals with FASD lacked stable or nurturing homes or were victims of physical abuse, sexual abuse, or violence, they would be more likely to experience negative life outcomes and engage in socially problematic conduct such as inappropriate sexual behaviour or get into trouble with the law. They examined five operationally defined adverse outcomes and 18 associated risk/protective factors using a Life History Interview with knowledgeable informants of 415 patients with FAS or FAE (median age 14 years, range 6–51; median IQ 86, range 29–126). Eighty percent of these patients were not raised by their biological mothers. For adolescents and adults, the life span prevalence was 61% for Disrupted School Experiences, 60% for Trouble with the Law, 50% for Confinement (in detention, jail, prison, or a psychiatric or alcohol/drug inpatient setting), 49% for Inappropriate Sexual Behaviours on repeated occasions, and 35% for Alcohol/Drug Problems.

3. FASD and the Criminal Law

Prenatal alcohol exposure (PAE), especially in the first trimester of pregnancy, can disrupt neuronal proliferation, migration, and synapse formation made possible by cell-adhesion molecules, with the neurocognitive features of FASD thought to be attributable to altered neuronal synaptic connectivity (Brown et al. 2022, 2024; Breuer et al. 2024).

Persons with FASD have been recognised for some time as over-represented in the criminal justice system (Butcher 2020: 155; Popova et al. 2011: 336) FASD has the potential to be relevant in many ways in relation to criminal responsibility and culpability (Roach and Bailey 2009; Douglas 2010, 2015; Freckelton 2016a, 2016b, 2016c, 2016d), as well as in scenarios in which people with FASD become victims of criminal conduct (Novick Brown et al. 2010). This is not a new recognition. The Supreme Court of Florida stated as long ago as 1994:

> Just as the harmful effect of alcohol on the mature brain of an adult imbiber is a matter within the common understanding, so too is the detrimental effect of this intoxicant on the delicate, evolving brain of a fetus held in utero. . . . (*Dillbeck v State* 1994)

Novick Brown et al. (2010, p. 386) have helpfully highlighted the diversity of scenarios in which FASD has been identified to be relevant to the criminal justice process:

> It is important to note that FASD is relevant on both sides of the courtroom. Not only should defense teams explore the possibility of FASD in their cases if they suspect a defendant may have been exposed to alcohol in utero, but prosecutors as well may want to present evidence of victim vulnerability to the Court. In our own experience working as a multidisciplinary assessment team with state

> and federal prosecutors, enhanced sentencing had been obtained for victims determined in forensic evaluation to have FASD.

While FASD has been raised by the defence in the contexts of fitness for interview and the weight that should be given to admissions and confessions, and while it may arise in relation to fitness to be tried (Goddard et al. 2026) and even whether a person has been able to form the intent to commit a crime, FASD has arisen in the forensic context mostly in relation to sentencing, with the assertion being advanced on behalf of offenders that their blameworthiness/moral culpability is reduced by reason of their having FASD. It is impulsiveness, low frustration tolerance and reckless behaviour that are the hallmarks of the conduct of persons with FASD that bring them into contact with the criminal justice system (see e.g., *R v Noftall* 2023). Put another way, there can be serious impairments to social adaptive functioning in persons with FASD, meaning that they are "unable to adapt to their environment and meet the requirements of daily living, resulting in their committing a variety of crimes. They are often unable to recognize social expectations and access resources" (*R v Sumner* 2022: at [61]).

However, more is necessary than "merely" the diagnosis of FASD to assist the criminal trial and sentencing processes (Freckelton 2016b), especially when the diagnosis may be based upon others' assertions about maternal consumption of alcohol during pregnancy, which may or may not be accurate (see e.g., *Re W (A Child: Emotional Harm)* (2020)).

What is often most important in the forensic context goes beyond the diagnosis of FASD, together with any comorbid conditions that frequently exist. It is an exploration of measures that, when realistically evaluated, can be constructed to minimise the risk of ongoing offending and thereby secure a satisfactory measure of protection for the community.

3.1. Fitness to Stand Trial

FASD symptoms have the potential to affect an accused person's fitness to stand trial (Goddard et al. 2026).

An example of this was seen in the New Zealand case of *R v MT* (2019), where the offending consisted of a kidnapping, torture and murder of a 17-year-old girl, involving a number of offenders. MT was 16 years and 11 months of age and mildly intellectually disabled. She met the criteria for a diagnosis of FASD.

Justice Downs at first instance found MT fit to stand trial, but the Court of Appeal (*R v MT* 2020) overruled the decision, holding that his ruling did not adequately consider the implications of FASD for her fitness to stand trial. The Court of Appeal held that MT's various deficits would preclude her from effectively participating in the trial, especially understanding the subtleties of the differing accounts that would inevitably be advanced in a cut-throat defence (where each accused person blamed the other):

> We considered that, realistically, it would be beyond her capability to appreciate the implications of the evidence she was hearing in order to instruct counsel. We had no confidence that she could make an assessment of the competing factors necessary to decide whether to testify. We were not satisfied that, even with the support of a communication assistant and supervision of questions by the Judge, MT could give a sufficiently coherent account and respond to questioning to be able to testify. We therefore considered she was unfit to stand trial.

Ultimately, on retrial, MT was made subject to a special care order. It was observed that it her FASD was not solely responsible for her offending and that her capacity to be deceptive heightened the risk that she posed to the public.

3.2. Unreliability of Admissions and Confessions

FASD symptoms, by virtue of the propensity of some suspects to confabulate to meet the expectations of wishes of those interrogating them, have the potential to make confessions and admissions of questionable value and highly unfair and prejudicial to a fair trial (Brown et al. 2011, 2022).

The leading international authority on the relevance of FASD to the making of admissions or confessions to police is *Pora v The Queen* (2015) (see Brookbanks et al. 2022; Gibbs and Sherwood 2017; Freckelton 2016c). a decision of the Privy Council on appeal from the New Zealand Court of Appeal. Pora was found guilty of the 1992 rape and murder of a woman. He gave inconsistent accounts of his involvement in the crimes to police, but when taken by police on a drive designed to show his route to the victim's house, Pora appeared disorientated, unable to indicate the way to her house without assistance, and experienced great difficulty in identifying her house at all.

When DNA evidence showed that a male other than Pora had raped the deceased and that this offender had engaged in previous sexual offences but always on his own, the prosecuting authorities conducted a further investigation. Before the Privy Council, the issue arose from further expert evidence adduced by him regarding whether Pora satisfied the criteria for FASD and therefore whether the various admissions he made to police were unreliable. A neuropsychologist expressed the view that Pora exhibited deficits of regulatory control that were common among those with FASD who struggle to regulate their moods and actions (*Pora v The Queen* 2015: at [37]). The neuropsychologist stated that when Pora was placed in a complex situation, he was likely to act impulsively with a reduced capacity to think through the consequences of his conduct. Pora was also regarded by the neuropsychologist as displaying significant impairments of executive function, including impaired reasoning, literal and limited thinking, cognitive rigidity and deficits of regulatory control. He showed no capacity for abstract thought, interpreted things literally and could not appreciate deeper or implied meaning: "He was cognitively rigid, sticking to one way of responding and was unable to appreciate a range of differing options. This indicates that he will get something in his mind and stick to it even when the evidence is contrary to it. He will not be well able to match his thinking to the circumstances and adapt with changes of situational demands" (*Pora v The Queen* 2015: at [37]).

The neuropsychologist opined that due to his brain limitation, Pora "tends to say and do what seems to his advantage at the time, without a realisation that he is doing this. This tendency can be perceived as manipulative and self-serving until the underlying brain damage is considered and it is appreciated that this is not wilful or intentional. A lack of insight into one's own limitations is a universal feature of FASD" (*Pora v The Queen* 2015: at [37]). The neuropsychologist observed that:

> As well as behavioural dysregulation those with FASD tend to be emotionally dysregulated and cannot tolerate or manage stress well. They require others to provide a high level of direct assistance to be productive and remain emotionally settled. These types of higher thought process deficits seriously affect a person with FASD's capacity to self-monitor, realise the thoughts and feelings of others, and appreciate how their actions may be perceived. . . .
>
> People with FASD, most especially when they have memory and executive deficits, are prone to confabulate; that is make up stories to fill in the gaps that are not in keeping with the truth. This is different to lying as it is not intentional and is a feature of executive brain impairment. . . . The persons with FASD cannot be considered a reliable informant . . . (*Pora v The Queen* 2015: at [37])

A psychiatrist gave evidence along similar lines: that Pora had very significant impairments in frontal executive function, with no demonstrable capacity for abstract thought and a strong tendency to maintain a position even when it was shown to be "entirely untenable" (*Pora v The Queen* 2015: at [45]). He observed that Pora might be uncertain about what the correct answer to the question should be, because he did not remember, and may therefore provide an incorrect answer in order to satisfy the interviewer. Secondly, he might also place trust in the person questioning him and be eager to please. Thirdly, he might be reluctant to admit uncertainty about his lack of knowledge and continue to maintain a position that is different from the true facts (*Pora v The Queen* 2015: at [47]).

On the basis of the expert evidence, the Privy Council concluded that it was beyond question that the FASD evidence established the risk of a miscarriage of justice: "It provides an explanation as to why Pora's confessions may have been false. . . . The impact that evidence of a confession will have, especially a confession to heinous crime, is difficult to overstate" (*Pora v The Queen* 2015: at [55]–[56]).

The reasoning in *Pora v The Queen* was subsequently applied by the New Zealand High Court in *R v Fawcett* (2021), with Dunningham J holding in relation to Fawcett's accounts under police interrogation that they too should not have been admitted on the basis of his FASD:

> Given Mr Fawcett's neurodisability which makes him an unreliable historian even when he is endeavouring to tell the truth, and without solid corroborating evidence of his involvement, I consider Mr Fawcett's FASD adversely affected the reliability of his statements and I am satisfied they should be excluded on this ground. (*R v Fawcett* 2021: at [301])

These two decisions, and the mental health expert evidence upon which they were based, require careful consideration to be given to the reliability of admissions and confessions made by persons with FASD under police interrogation. Diagnosis of FASD is not sufficient for a determination of incapacity on the part of a person to participate reliably in interviews, but it, as well as comorbidities, does have the potential to raise important questions about the extent to which admissions and confessions made by persons with FASD are voluntary and reliable.

Brown et al. (2022: 66; 2024) have usefully recommended that those conducting and reviewing interviews with persons with FASD be alert to the need to use simple and direct language:

> Jargon, idioms, sarcasm, and abstract concepts should be avoided. In terms of questions, open-ended questions are preferred over close-ended questions (ie yes or no responses). Repetitive and leading questions should not be asked when speaking to individuals having FASD related impairments. The individual should also be allowed plenty of time to process information and provided frequent breaks. Pressure, stress, and verbal or physical threats should be avoided and minimized at all costs. In general calmness should be emphasized, including in the environment where noises, bright lights, and other distractions must be minimized. Any information garnered from the interaction should be corroborated . . .

3.3. Manslaughter

In a number of jurisdictions, a murder charge can be "downgraded" to manslaughter if a person suffers from the requisite "abnormality of mind". This can be classified as diminished responsibility (Novick Brown and Greenspan 2022). In New South Wales, Australia, for instance, section 23A of the *Crimes Act 1900* (NSW) provides that:

(1) A person who would otherwise be guilty of murder is not to be convicted of murder if—

(a) at the time of the acts or omissions causing the death concerned, the person's capacity to understand events, or to judge whether the person's actions were right or wrong, or to control himself or herself, was substantially impaired by an abnormality of mind arising from an underlying condition, and

(b) the impairment was so substantial as to warrant liability for murder being reduced to manslaughter.

(2) For the purposes of subsection (1)(b), evidence of an opinion that an impairment was so substantial as to warrant liability for murder being reduced to manslaughter is not admissible.

(3) If a person was intoxicated at the time of the acts or omissions causing the death concerned, and the intoxication was self-induced intoxication (within the meaning of section 428A), the effects of that self-induced intoxication are to be disregarded for the purpose of determining whether the person is not liable to be convicted of murder by virtue of this section.

(4) The onus is on the person accused to prove that he or she is not liable to be convicted of murder by virtue of this section.

(5) A person who but for this section would be liable, whether as principal or accessory, to be convicted of murder is to be convicted of manslaughter instead.

. . .

(7) If, on the trial of a person for murder, the person contends—

(a) that the person is entitled to be acquitted on the ground that the person was mentally ill at the time of the acts or omissions causing the death concerned, or

(b) that the person is not liable to be convicted of murder by virtue of this section,

evidence may be offered by the prosecution tending to prove the other of those contentions, and the Court may give directions as to the stage of the proceedings at which that evidence may be offered.

(8) In this section—

underlying condition means a pre-existing mental or physiological condition, other than a condition of a transitory kind.

A complex issue relevant to FASD and diminished responsibility arose in the stabbing case of *R v Krey (No 3)* (2020: at [218]), where, on the basis of expert evidence, Ierace J concluded that FASD, complex PTSD and intermittent explosive disorder (IED) amounted to an abnormality of mind from an underlying condition that was not transitory and that substantially impaired the offender's capacity to control himself at the time of the stabbing. This resulted in his finding Krey not guilty of murder but guilty of manslaughter (*R v Krey (No 3)* (2020): at [228]).

3.4. Sentencing

A significant number of Canadian and Australian decisions have explored the relevance of FASD to the judicial task of imposing a sentence. It has been observed that the intuitive synthesis task of sentencing a person with FASD is challenging, among other things, because of the potential for the offender's moral culpability to be reduced as a result of the condition (Wartnik 2011), but also because of the deficits in programmes and resources available to assist the offender to refrain from further offending (Roach and Bailey 2009: at [85]). Moreover, generalised statements about the impact of FASD tend to be unhelpful because of the variability in its effects on offenders (see Johansen-Hill 2019; Riley et al. 2011). There is also a reduced role for the consideration of parity of sentencing

when co-offenders do not have FASD (see e.g., *R v Angnatuk* 2021). Most importantly, FASD raises the issue of the importance of options other than carceral detention for offenders with FASD, particularly those who are young (Waite 2021).

What is helpful to a court is more than just diagnosis; it is expert evidence that assists a sentencer to appreciate:

> how specific deficits affected behavior directly relevant to [issues before the court] as well as to mental state. For instance, did attention deficits and impulsivity compound the defendant's self-regulation difficulty to such an extent that he or she was unable to resist an urge to act? Did such deficits worsen a tendency to make hasty decisions . . . Do memory deficits as well as poor sequencing ability preclude ability to provide relevant exculpatory details to the defense attorney? Do communication deficits affect understanding and ability to communicate adequately in terms of Miranda rights, police interrogation, and the legal process? Do executive function deficits affect abilities to learn from experience, to engage in the abstract thinking required to generalize from previous experiences to the present while simultaneously foreseeing consequences of actions (i.e., aspects of "reflection"), and to make independent decisions, delay gratification, consider alternatives, appreciate the impact of one's behavior on self and others, resist others' efforts to lead and manipulate, control emotions and impulses, and show remorse? (Novick Brown et al. 2010, p. 411)

Elder-informed, on-the-land healing and life-refocussing options can be of utility in this regard (Canadian Academy of Health Sciences 2025, p. 78), but they need to be individualised so as to be suitable for the person's circumstances and impairments. In addition, it is helpful to acknowledge that there are a number of inflexion points in rehabilitation at which such offenders are vulnerable to returning to offending. It is important, for instance, that reintegration of offenders with FASD back into the community is carefully managed and supported by culturally appropriate services that are suitably knowledgeable about the needs of persons with FASD (Pedruzzi et al. 2021). The Canadian Academy of Health Sciences (2025), p. 81; Brown et al. (2022) has emphasised the heterogeneity of offenders with FASD and argued that "a distinctions based approach that acknowledges the diversity among Indigenous Peoples and communities, and which is founded on relationships of trust and implements the Indigenous ways of knowing, doing, and being is a pathway forward."

FASD has the potential to reduce the relevance of punishment, general deterrence (see e.g., *R v Laboucane* 2021) and denunciation (see e.g., *R v Joamie* 2013) as considerations for imposition of sentence, especially when the cognitive deficits arising from the individual's experience of symptoms undermine their capacity to restrain urges and impulses, appreciate that their acts are morally wrong, and comprehend the link between any punishment imposed by the court and the crime for which the person has been convicted (*R v Harper* 2009; *R v Quash* 2009). Specific deterrence can also have a reduced role to play in sentencing for such offenders due to the limited efficacy of discouraging them from further offending.

In *R v FD* (2016: at [7]–[8]), Judge Andrew observed:

> Research into FASD indicates that out of youth court cases reported, including Aboriginal young persons, 89% of aboriginal young persons were suffering from FASD. Further, studies indicate compelling evidence that a young accused person who is suffering from FASD is likely to have diminished capacity to foresee consequences, make reasoned choices or to learn from their mistakes. People with FASD are primarily compromised in the following areas: intellectual functioning, reasoning and judgment, verbal learning and memory, impulse

> control and inhibition and perceiving social cues. Young accused persons with FASD lack the normal ability to process information and therefore their ability to plan, perceive and appreciate situations is distorted. Persons suffering from FASD do not have normal capacity to learn from experience and to retain learning. This includes an inability to appreciate consequences and to choose right from wrong. FASD accused have difficulty understanding how their behavior causes a certain outcome such as how they can get burned by a hot stove or how they may be sent to jail for committing a crime; therefore, they are unable to learn from their mistakes or to control their impulsive behavior. They are also unlikely to show true remorse or to take responsibility for their actions. These actions of FASD young persons are likely to clash with assumptions that judges have about human behavior at almost every stage of the justice system. The neurodevelopmental deficits associated with FASD challenge the basic principles of sentencing, which assumes that the offenders are capable of making choices, understanding the consequences of their actions, and learning from their mistakes so as not to repeat. General deterrence—meaning that the punishment given to one person for breaking the law will operate to deter other persons, presupposes the ability of an FASD sufferer to process and translate information as well as to remember it . . . [T]here is no pharmaceutical solution, no successful talk therapy, no amount of jail time, and no probation order that will regrow brain cells of an FASD accused. In light of this, one could conclude that treating FASD offenders as other accused sets them up for failure because they will be required to act beyond their level of ability and will most likely fail to comply.

In summary, the traditional principles of sentencing, such as deterrence, denunciation and separation, are not effective because the organic nature of FASD impedes the individual's ability to adapt their behavior. Having said that, studies seem to indicate that with proper treatment and care, such behavioral characteristics can be managed quite effectively. Deterrence and denunciation are problematic in that many young persons with FASD are simply incapable of engaging in risk and consequence analysis.

In *R v Harper* (2009: at [30]) the Yukon Territorial Court provided the following summary of principles:

> The purposes and principles of sentencing found in the Criminal Code assume that the offenders are capable of making choices, understand the consequences of their actions, and when punitive sanctions are applied, are capable of learning from their mistakes so as not to repeat them. General deterrence, meaning that the punishment given to one person for breaking the law will operate to deter other persons, presupposes the ability of those other persons to process and translate information as well as to remember it. Similarly, rehabilitation, as it is conventionally understood, is largely a cognitive process premised on the ability to understand, to learn, to remember and make choices. None of these assumptions fit well with what is known about FASD, a permanent brain damage that can affect all parts of the brain.

It has also been observed in both Canada and Australia that certain kinds of supportive and supervised environments can be protective against recidivism by FASD offenders (Wartnik 2011)—they can reduce the symptomatology and socially unacceptable behaviour of offenders with FASD. This was particularly apparent in *R v H (CT)* (2015) where a child of 15 had engaged in serious violent assaults but improved significantly in behaviour over a two-year period within "a closely monitored environment", prompting the Manitoba Court of Appeal to conclude, in balancing the factors of providing a realistic framework for

his rehabilitation and personal security against the need to provide protection to the public, that the offender required a further significant period of treatment in a highly structured environment (at [62]). Lengthy, consistent and focused supervision can be necessary to reduce the risk of reoffending (*R v McArthur* 2025: at [81]).

A further issue that has arisen in FASD sentencing cases is the application of the *Verdins* principles in Australia (Freckelton 2007; Walvisch et al. 2021), which require "mental impairment", broadly defined, to be taken into account (*R v Verdins* 2007), and the "*Gladue* factors" in Canada, which require sentencers to take into account the unique considerations that apply to the sentencing of Aboriginal offenders, with a focus on restorative justice, which can make imprisonment a less appropriate sanction (*R v Gladue* 1999: at [37], [93]). Among other things, the *Gladue* factors emphasise the need to avoid stereotypes in sentencing, the advantages of reducing the resort to imprisonment for Aboriginal offenders, the ways in which practices, customs and traditions of First Nations can provide sentencing options, and the benefits of a "remedial" or "restorative" role" to be adopted (*R v Gladue* 1999: at [37], [71]; Turpel-Lafond 1999; Dickson and Stewart 2022; Jaggi 2024), as well as adjustments that can be implemented to reduce the risk of reoffending (Novick Brown et al. 2026). Wartnik (2011) has also cautioned against retributive responses to breaches of parole or conditions, in recognition of the foreseeable potential for these to occur with offenders with FASD:

> Individuals with FASD have difficulty remembering and keeping appointments; whether it is the required meeting with the probation officer or AA attendance, their failure to do so is usually not an act of defiance, but a symptom of the disability. The court could suggest to the probation officer that the problem of missed appointments be dealt with prospectively by setting up a system of prompts and by drawing on the support of the sponsor or advocate.

Milward (2014: at [84]) has observed, though, that progress has been made in terms of judges' awareness of FASD and its potential relevance to sentencing:

> . . . Judges may in the past have struggled with how to sentence FASD accused. It is to their credit that they are now showing increased recognition of the need to utilize needs-based sentencing for FASD persons instead of a conventional reliance on deterrence and retribution. Part in parcel with this is a concurrent recognition that FASD in Aboriginal communities is part of the *Gladue* factors that need to be taken into consideration, and speaks to the imperative for non-custodial sentences under *Gladue*.

In Australia, it was held in *R v Verdins* (2007: at [26]) that "impaired mental offending" has the potential to reduce an offender's moral culpability if it has the effect of:

(a) impairing the offender's ability to exercise appropriate judgment;
(b) impairing the offender's ability to make calm and rational choices, or to think clearly;
(c) making the offender disinhibited;
(d) impairing the offender's ability to appreciate the wrongfulness of the conduct;
(e) obscuring the intent to commit the offence; or
(f) contributing (causally) to the commission of the offence.

This has the potential to have particular relevance to offenders with FASD across each of the *Verdins* factors. Such an effect was found in *Wass v DPP* (2024: at [65]–[66]) where McGrath J stated:

> I am satisfied that the appellant's FASD was causally related to the offending behaviour. The expert opinions support a finding that the appellant has an impaired capacity for managing, monitoring and regulating his behaviour.

> The appellant's FASD is relevant as a sentencing factor, in that it diminishes his moral culpability for the offending and moderates the weight to be given to general deterrence. In respect to personal deterrence, that factor remains highly relevant given the appellant's significant history of offending.

He found that the offender's FASD moderated the weight to be given to general deterrence but concluded that personal deterrence remained relevant (at [71]–[72]).

Of course, it is not open to sentencers always to impose non-custodial sentences, particularly where an accused person's offending has been serious, punishment is required, and they are found to pose an ongoing risk of serious recidivism (see e.g., *R v Powderface* 2014; *R v Obed* 2006: at [60]). Another challenge can be that frequently a FASD-affected offender will lack the motivation to conduct themselves more circumspectly or safely than in the past, as well as the ability to link consequences to their behaviours (*R v Drysdale* 2016: at [30]).

Another challenge of the sentencing process for persons with FASD is that frequently a number of complex factors have contributed to the offending. For instance, in the case of Jay Drysdale, a homeless 35-year-old man registered with the Mathias Colomb Cree Nation of Manitoba was diagnosed with FASD, reactive attachment disorder (RAD) and attention deficit disorder (ADHD). He had assaulted another person and threatened to use a weapon (*R v Drysdale* 2016: at [2]). Justice Zarzeczny (see also *R v Laboucane* 2021) noted the drug addiction of Mr Drysdale, as well as his impulsivity, and commented that:

> Mr Drysdale's case also raises complex issues insofar as his sentencing is concerned. One need only reiterate the impact and its complexity of Mr. Drysdale's historic inter-generational deprivation being born as an Aboriginal. His grandparents were victims of the residential school experience. Subsequently his parents endured the intolerable experience of living, as they did, as tent villager outcasts in abject poverty, all consequences of colonialization. Those *Gladue* factors resulted in his grandparents' inability to parent his parents and in turn his parents' inability to parent him leading to his FASD his apprehension by Social Services and his 23 foster home placements by the time he was 21 months old resulting in his severe Reactive Attachment Disorder. These in turn left him cognitively disabled, no doubt leading or contributing to his anti-social criminal offending behaviours. Mr Drysdale's history cries out loudly for a sentence that is responsive to Mr Drysdale's needs. I have concluded that a "needs based" as opposed to a retributive sentence is appropriate. (*R v Drysdale* 2016: at [62]; see also *R v Cook* 2023)

His Honour identified that the most effective way to control Mr Drysdale's offending behaviours and risk level to the community was through "the programs and protections that are available in the community. . . . I have concluded that it is in the community that he will be confronted with the risks that he presents and it is in the community and the resources that it has to offer Mr Drysdale that coping and control strategies must be found and consistently applied" (*R v Drysdale* 2016: at [68]). He imposed a three-year probation order with multiple conditions to facilitate Mr Drysdale's rehabilitation and to maximise the potential for protection of the community.

In *R v JP* (2020), too, the Saskatchewan Court of Appeal allowed an appeal by an Aboriginal man with FASD who had been sentenced to 17 years' imprisonment for participation in two armed robberies committed in 2015, reducing the global sentence to 10 years' incarceration. The prosecution argued that JP's FASD "cut both ways" in the sense that, while it mitigated his culpability, it also suggested that JP posed an ongoing risk of recidi-

vism. However, the Court of Appeal concluded that the sentencing at first instance had miscarried because JP's FASD had not sufficiently been incorporated as a mitigating factor:

> FASD presents as a *Gladue* factor not simply because of disproportionate FASD rates among Aboriginal communities, but because it is, in his life, an intergenerational consequence of residential schools. The *Gladue* report invited a connection between JP's FASD, his mother's childhood experiences and pregnancy, and the life of his great-grandmother with whom his mother lived. (*R v JP* 2020: at [45])

The Court affirmed (*R v Gladue* 1999: at [68]) the proposition that not every person with FASD has reduced moral culpability (*R v MJH* 2004: at [28]) but, ultimately, concluded that the sentencing judge had not adequately accounted for JP's blameworthiness and that this error had had a decisive impact on the sentence imposed (*R v JP* 2020: at [80]). It reduced his sentence to eight years' imprisonment.

The issue of the availability of suitable treatment and assistance for offenders with FASD is a recurrent sentencing issue, with better facilities being available in some contexts than in others. However, there is considerable community benefit in the initiation of concerted efforts to assist the rehabilitation of offenders with FASD (Popova et al. 2011), including to reduce the financial expense of their correctional detention (Popova et al. 2015; Thanh and Jonsson 2015).

In the early FASD case of *R v Obed* (2006: at [67]–[68]), where the offender had brutally raped a woman after having assaulted others previously, Fowler J of the Supreme Court of Newfoundland and Labrador emphasised the dilemma of the existence of variable levels of rehabilitative assistance:

> I cannot and I will not sentence any person to prison for treatment. That is the role of society, to provide treatment to its' citizens for afflictions of various descriptions within the normal community environment and the governing legislatures in this country must accept the responsibilities of dealing with FASD afflicted citizens. Governments now know that people with FASD will fill our prisons in increasing numbers because people with FASD have a very, very high likelihood of committing criminal offences in that they act on impulse, without consideration for the consequences. It is not difficult to predict that our jails will be overflowing with people with FASD if society somehow does not develop an understanding of how to deal with this serious problem while children are young enough to be helped. This is sadly the case in aboriginal communities to a higher degree than in any other segment of our society. More efforts must be made to deal with this incredibly difficult problem in aboriginal communities, especially in Labrador. The isolated communities in Labrador seem to be hardest hit by this problem where alcohol is rampant and almost one hundred percent of the matters that come before the courts are alcohol related. It is my understanding that it costs approximately $100,000.00 a year to incarcerate one person in our prison system. One can only imagine if that same amount of money was redirected to develop programs that would assist children who come from parents who have been alcohol dependent when they were pregnant with these children. Dr. Rosales was perfectly clear when he stated that this is not just an aboriginal problem, this problem is found at all levels of our society, in every community, in every walk of life, throughout our society and until something is done to curb this, then our crime rate will increase.
>
> This case is like the canary in the coal mines. It's a warning that we will be incarcerating more and more people in our society for criminal matters, serious

> criminal matters unless immediate steps are taken to study this issue more carefully and to develop programs that have a meaningful way of dealing with them.

Another uncomfortable reality with some offenders with FASD, apparent from early in their course of offending, is that not only is the condition giving rise to their offending lifelong, but the treatment that they require is both specialised and likely to necessitate a very long-term commitment of significant resources (*R v Cook* 2023: at [83]): structure and tools to manage in the community and reduce the potential for recidivism (*R v Laboucane* 2021: at [63]). This reality prompted Carlson PJ to impose a significant period of imprisonment in *R v Cook* (2023: at [85]–[87]), given the ongoing risk that Cook was found to pose:

> There is no doubt that the resources provided by the FASD Justice Project can greatly assist and support Mr. Cook and can contribute in that way to protection of the public, to the extent the required resources are available. Unfortunately the fact such supports are available to Mr. Cook, and the fact he has connected with his supports, do not guarantee protection of the public, or that Mr. Cook will not re-offend in spite of the resources. At the time this aggravated assault was committed, Mr. Cook did have the support of the FASD Justice Project, CLDS and Probation Services. Mr. Cook still committed the aggravated assault. Mr. Cook was diagnosed at three years old with FASD and has had the available resources since that time. And yet, Mr. Cook still committed the horrible aggravated sexual assault in 2016.
>
> There is no guarantee that FASD Justice Project, CLDS and/or Probation Services, will be able to secure a residential supervised arrangement for Mr. Cook that would be sufficient to address his needs and risk factors, that Mr. Cook would be compliant and continue to be compliant and of good behaviour, and, even if he did, that such arrangement in addition to other resources provided, will serve to protect the public from Mr. Cook's violent behaviour.
>
> The bottom line is, that while the public would no doubt be safer with Mr. Cook having resources of the FASD Justice Project, if that project is able to secure the supervised setting for Mr. Cook that he needs to reduce his risk, and if Mr. Cook is cooperative, takes advantage of that, and follows all his court conditions, the reality is that the resources of the FASD Justice Project cannot guarantee that such a supervised setting will be available for Mr. Cook, that he will accept it and stay in it, that he will follow conditions, and above all, that notwithstanding the best efforts of all his supports, that he will not act out impulsively and aggressively, as he has demonstrated he is prone to do. There is simply no guarantee that supports in the community, no matter how extensive or excellent, can be counted on to protect the public from Mr. Cook.

In *R v FC* (2012: at [12]), Judge Lilles of the Territorial Court of Yukon made the following important observations, based upon the National Conference: Access to Justice for Individuals with FASD in 2008 (at [12]):

1. FASD is one of the leading causes of mental retardation [a pejorative term used at the time], developmental and cognitive disabilities in Canada. It is entirely preventable. Approximately 0.9/100 people from the general population have FASD. Rates of FASD are higher in areas where alcohol abuse and poverty are widespread.
2. The person with FASD is entirely blameless—an innocent victim of maternal alcohol use during pregnancy. FASD can affect every part of the developing brain. This can result in problems with learning, memory, storage and retrieval of information, adaptive behaviour, attention, impulse control, speech and language abilities, motor development, reasoning, and problem solving. Approximately half of individuals

with FASD meet standard criteria for mental retardation (IQ less than 70). The brain abnormalities associated with FASD are different for every person with this disability.

3. Improving access to justice for individuals with FASD requires a better understanding of this disability and a concerted effort to keep FASD individuals out of the justice system. The justice system should not be used as a substitute for social services and supports for these most vulnerable citizens.
4. FASD-affected individuals can appear in the justice system as victims, witnesses and offenders. Most are involved in the child welfare system at an early age and for prolonged periods.
5. FASD-affected individuals do not do well in school or in society generally. By the time they reach adulthood, they have often exhausted and alienated their family members. Out on their own, a multitude of factors combine to result in social isolation, poor job performance, poverty, mental and physical health problems, homelessness, victimisation and involvement in the criminal justice system.
6. Given the stringent criteria associated with defences of "Not Criminally Responsible due to Mental Disorder" and "Unfit to Stand Trial" in the *Criminal Code*, most individuals with FASD do not meet the thresholds. Instead, they are processed as fully responsible individuals with handicaps that are sometimes viewed by sentencing judges as mitigating and, on other occasions, as aggravating (see also *R v Gracie* 2024: at [40]).

In *R v Ramsay* (2012), the Alberta Court of Appeal provided useful guidance. It engaged with the relevance of FASD for the sentencing of an accused man diagnosed with FASD who was convicted of sexual assault, two counts of confinement, assault causing bodily harm, obstruction of justice and three counts of breach of recognizance. He was sentenced at first instance to eight years' imprisonment but appealed on the basis, amongst other things, that the sentencing judge had overemphasised deterrence and denunciation and failed to give proper weight to the mitigating factor of his FASD.

The Court of Appeal determined that:

> Crafting a fit sentence for an offender with the cognitive deficits associated with FASD presents at least two identifiable challenges: accurately assessing the moral blameworthiness of the offender in light of the adverse cognitive effects of FASD and balancing protection of the public against the feasibility of reintegrating the offender into the community through a structured program under adequate supervision. Medical reports assessing the prospect of the offender's rehabilitation and reintegration into the community are essential to the task and must be carefully analyzed. (at [16])

Similar challenges for sentencing arose in *LCM v The State of Western Australia* (2016) (see Freckelton 2016a) where it was found that LCM, a child of 15, had bashed his newborn son to death in hospital for no apparent reason. A psychiatrist and a psychologist prepared forensic reports for the Supreme Court of Western Australia to assist in the sentencing task. They focused on LCM's dysfunctional background and his antisocial behaviours but made no reference to his having FASD. LCM was found to be minimally remorseful and was sentenced to ten years' imprisonment and only made eligible for parole after five years.

On appeal to the Court of Appeal, a multidisciplinary team from the Telethon Kids Institute (TKI) diagnosed LCM with FASD. A paediatrician member of the TKI emphasised the variability in the symptomatology of persons with FASD. The Court observed that some persons with FASD exhibit physical characteristics, but others do not. It noted that often those with the disorder are diagnosed only when it is noticed that their behaviours have become difficult. The best means of diagnosing the condition is by a multidisciplinary team comprising a medical practitioner, usually a physician or a paediatrician, a psychologist,

preferably a neuropsychologist, a speech and language pathologist, and an occupational therapist. The paediatrician expressed the view that FASD should be assessed over eight domains, although it was acknowledged that norms did not exist for Aboriginal children:

- Cognition;
- Attention and activity levels;
- Sensory processing;
- Executive functions;
- Memory and learning;
- Language;
- Adaptive functioning, social communication and social skills;
- Academic functioning; and
- Motor skills (*LCM v The State of Western Australia* 2016: at [90]).

LCM was found to experience major difficulties with executive functioning; processing complex information; abstract thought; memory; manipulating information; and giving accounts containing key information.

The psychologist member of the TKI noted that LCM started his ex utero life with a brain that could not work normally and was already impaired. On top of this, he had undergone traumatic life events, each of which could be considered 'a noxious insult' to the brain. In LCM's case, he had experienced many such insults, but his ability to "make sense of and repair" such events was impaired because of the organic brain damage he had suffered prenatally (*LCM v The State of Western Australia* (2016: at [113]). Thus, his capacity to cope with each traumatic event he experienced was less than that of someone without FASD. Further, his lived trauma compounded and exacerbated the likely consequences of his brain injury.

Mazza JA and Beech J observed that:

> Blanket propositions about how a diagnosis of FASD bears on the sentencing process should be avoided. Rather, attention should be directed to the details of the particular diagnosis of FASD, including the nature and extent of the specific disabilities and deficits, and how they bear upon the considerations relevant to sentence. (*LCM v The State of Western Australia* 2016: at [123])

They commented too that:

> Although it was known when LCM was sentenced that his behaviour had been shaped by dysfunction and trauma, what was completely unknown was that prenatally he had suffered permanent brain damage which left him with significant and lifelong deficits, most relevantly in his cognitive, linguistic and executive functioning." While some further testing was required, the evidence clearly established that LCM's powers of reasoning, logical thought and self-control were all compromised, as was his ability to deal with traumatic events. This is all in addition to the effects of his lived trauma, which itself compounded the effects of his FASD. (*LCM v The State of Western Australia* 2016: at [103])

They stated that they were satisfied that LCM's FASD was a significant cause (but not the sole cause) of his offending behaviour. They concluded that his FASD impacted at least six areas:

(1) it diminished his moral culpability for the offence;
(2) it moderated the weight to be given to personal and general deterrence;
(3) it diminished the adverse impact of the primary judge's findings that the appellant acted 'deliberately' and 'violently';
(4) it bore on whether and to what extent LCM was to be seen as lacking remorse, and the weight to be given to that;

(5) it bore on the significance of LCM's failure to call for treatment immediately after the offence, a matter on which the primary judge made an adverse finding; and
(6) LCM's impaired language skills may well explain his persistent adherence to the position that his actions were an 'accident', a position which the primary judge regarded negatively (*LCM v The State of Western Australia* 2016: at [128]); see also *R v FD* 2016 at [7]–[8]).

They found that LCM's offending was impulsive and unexpected: "he was, at the time, faced with the responsibility, at 15, of taking home and rearing a newborn baby. For any young person of that age, that would be a daunting and stressful prospect. For a young person with the appellant's background and impairment, it would have been an extremely traumatic prospect. LCM's irrational behaviour was in part a reflection of the impairments which he has and which are attributable to FASD" (*LCM v The State of Western Australia* 2016: at [129]).

They resentenced him to seven years' imprisonment, with him eligible for parole after three and a half years.

Chief Justice Martin (*LCM v The State of Western Australia* 2016: at [4]) made some important additional observations:

> It is remarkable that those responsible for his care and protection did not initiate an assessment of whether or not he was affected by FASD. . . . if the extent of LCM's neurological deficits had been understood and addressed by appropriate management intervention early in his life, the trauma which he subsequently experienced and caused to others may have been averted.

He stated (*LCM v The State of Western Australia* 2016: at [7]) that:

> The inadequacy of the arrangements for the assessment of FASD in this State make it impossible to make any meaningful assessment of the extent to which that condition is suffered by offenders in this State.

He commented that:

> The case of LCM illustrates that levels of awareness with respect to the possibility that an offender might be suffering FASD, and the arrangements which pertain to an assessment of that prospect and for the management of an offender found to be suffering that condition are inadequate, especially when compared to the awareness of and attention given to this issue in another comparable jurisdiction—namely Canada. (*LCM v The State of Western Australia* 2016: at [25])

He also stated that:

> Unless those arrangements are improved, not only will injustice be suffered by those who commit crime at least in part because of a condition which they suffer through no fault of their own, but also the opportunity to reduce the risk to the community by appropriately managing such offenders will be lost. (at [7])

In the subsequent appellate case of *Churnside v The State of Western Australia* (2016), the Western Australian Court of Appeal directed an adjournment of sentencing to explore deficits in information about how Churnside could be supported if he were not incarcerated. Churnside was an Indigenous man who pleaded guilty to two counts of aggravated burglary (see Freckelton 2016d; Baker 2016). He was sentenced at first instance to 22 months' imprisonment after the sentencing judge received multiple psychological, neuropsychological and paediatric reports which focused on his low IQ and FASD symptoms. He had no facial features of FASD save for hirsutism.

The Court of Appeal found that a number of options had been explored inadequately at first instance:

(1) Engagement with the DSC [Disability Services Commission];
(2) Support and supervision by Community Corrections officers;
(3) Programme-based support provided by EPIC [Empowering people in the Community];
(4) Substance abuse counselling available from a not-for-profit organisation;
(5) The possibility of an adult male mentor being provided to support the appellant in the community;
(6) The prospect that the appellant's mother might assume the responsibility of removing Churnside from the negative influences to which he had been subject in Karratha by taking him back to her country (*Churnside v The State of Western Australia* 2016: at [81]).

The Court of Appeal held that although the offences committed by Churnside were serious, in that they involved the burglary of dwellings occupied by their inhabitants at the time, deterrence, both general and specific, was of much reduced significance in the sentencing process because of the disabilities which Churnside suffered "through no fault of his own" (*Churnside v The State of Western Australia* 2016: at [78]).

It concluded that the sentencing court had been obliged to use "every means at its disposal to arrive at a disposition which would offer some degree of protection to the community" by reducing the risk of Churnside reoffending and at the same time providing some measure of justice to Churnside, who would otherwise be destined to an indefinite and perhaps escalating cycle of offending and imprisonment as a result of his pre-birth and childhood experiences (*Churnside v The State of Western Australia* 2016: at [82]; see also *Nannup v State of Western Australia* 2021). The Court of Appeal resentenced him to a 12-month community-based order to be served concurrently with a supervision and programme requirement, and a condition that he reside in his mother's country where his great uncle could supervise him.

In a later significant decision of *Jetta v DPP* (2021) the Western Australian Court of Appeal sentenced Jetta, who admitted to unlawfully assaulting a prison officer by spitting in his face while he was at Hakea Prison. It imposed a sentence of nine months' imprisonment to be served cumulatively on eight months for doing an obscene act in a public place and doing an obscene act at a police station. An expert report by a paediatrician and a clinical neuropsychology registrar found Jetta to have FASD and concluded that he displayed globally severe cognitive impairment across all areas and that he had an IQ in the extremely low range. Importantly, it concluded that Jetta had a significant impairment of impulse control. He demonstrated three sentinel features of FASD and, not unusually, had been exposed to domestic violence, personal substance use, hepatitis C and psychiatric illness. It concluded that he seemed to lack an understanding of social rules and boundaries.

The Court observed that:

> In any sentencing exercise blanket propositions about how a diagnosis of FASD bears on the sentencing process should be avoided. Attention must be directed to the details of the particular diagnosis of FASD including the nature and extent of the specific impairments associated with FASD, which is itself a mental impairment, may be relevant to sentencing in a number of ways. Impairments associated with FASD may reduce an offender's moral culpability for the offence. They may have a bearing on the kind of sentence imposed and the conditions on which it is served. A person suffering from FASD impairment may not be an appropriate vehicle for general deterrence, and personal deterrence may be more difficult to achieve and may not be worth pursuing. Further a sentence imposed on a person with FASD may weigh more heavily on that person than it would on a person who otherwise has normal health. (*Jetta v DPP* 2021: at [82])

It found that:

> The FASD Report establishes that Jetta's FASD has substantially contributed to him suffering from significant impairments in a number of domains including the domains of executive functions and cognition. The impairment to Jetta's executive functioning impacts adversely on his ability to control his impulses and to think through the consequences of his actions. The impairment to Jetta's cognition impacts adversely on his capacity to understand social rules and boundaries. (*Jetta v DPP* 2021: at [85])

The Court determined that Jetta's FASD was causally connected to his commission of the offence in the sense that his impaired executive functions resulting from his FASD adversely impacted on his ability to resist the impulse to engage in the conduct that was the subject of the offence, or, to put the matter another way, impacted upon his ability to make a calm and rational decision regarding how he should deal with his (likely unfounded) feelings that he had been treated unfairly by the victim: "The causal connection . . . reduced his culpability or moral blameworthiness for committing the offence" (*Jetta v DPP* 2021: at [86]).

It commented that:

> Jetta's FASD means that any attempt to give effect to personal deterrence . . . is unlikely to be successful. . . . The appellant has a very limited capacity to undertake the reasoning process required to connect his offending with the likelihood and severity of punishment. . . . His FASD renders him an unsuitable vehicle for the sentencing consideration of general deterrence. (*Jetta v DPP* 2021: at [89]–[90])

It concluded that the absence of an expert report about Jetta's FASD at first instance had given rise to a miscarriage of justice. However, it found that the sentencing consideration of protection of the public was important. It substituted a six-month sentence, cumulative on the other sentence of eight months' imprisonment, but ordered that he be eligible for parole (*Jetta v DPP* 2021: at [85]).

4. FASD as a Precipitant to Vulnerability and Victimisation

Persons with FASD can be very vulnerable to criminal victimisation, including being manipulated and taken advantage of, both in the general community (*Hiemstra v State of Western Australia* 2021) and when in custodial confinement, where a sentence of imprisonment can be experienced as disproportionately harsh (*R v FC* 2012: at [22]; *R v Noftall* 2023: at [19]). This can be highly relevant to sentencing. An example occurred before the Provincial Court of Alberta in *R v Powderface* (2014), where the victim of a major sexual assault by a man with FASD and an IQ of 55 was a woman who also had FASD. Similarly, in *R v Noftall* (2023: at [19]), an arson case, Orr PCJ took into account the offender's FASD and observed that: "incarceration for him is particularly difficult and appears disproportionately harsh given his limited coping skills and vulnerability to abuse from other prisoners" (see also *R v Verdins* 2007).

Criminal Injuries Compensation

In England and Wales, there has been a difference of approach between the First Tier Tribunal (Criminal Injuries) and the Upper Tribunal (Administrative Appeals Chamber) about eligibility of children for criminal injuries compensation for harm in the form of FASD suffered by them as a result of maternal consumption of alcohol during pregnancy. The issue was whether the foetus, later the child, suffered from the commission of an offence administering a poison or destructive or noxious thing contrary to s23 of the *Offences Against the Person Act 1861* (Eng & Wales). The issue was resolved by the Court of Appeal in

2014 with a decision that the mother, in circumstances of heavy drinking during pregnancy and with the awareness that harm could ensue to her baby, was not the victim of a crime (*CP (A Child) v First Tier Tribunal* 2015). As Treacy LJ stated:

The reality is that the harm has been done to the child whilst it is in utero. The fact that if the child is born alive it will suffer the consequences of the insult to it whilst in the womb does not mean that after birth it has sustained damage by reason of the administration of the noxious substance. One only has to cast one's mind back to the Thalidomide tragedy. The injury was done to the affected children by the administration of the drug whilst they were still in the womb. Those children who were born affected were born with missing or ill-developed limbs. Whilst they suffered the consequences on a lifetime basis after birth, they did not sustain any additional damage after birth by virtue of administration of the drug (*CP (A Child) v First Tier Tribunal* 2015: at [42]).

Dyson MR further explained:

> The elements of the offence of manslaughter where there is an assault on the foetus which causes the death of the child after it has been born are (i) an unlawful and dangerous act, (ii) a death and (iii) a causal link between the act and the death. All three elements are required to complete the actus reus of the offence. The actus reus of an offence contrary to section 23 requires (i) the administering of a poison to a person, (ii) the infliction on such person of grievous bodily harm and (iii) a causal link between (i) and (ii). An essential ingredient of the offence, therefore, is the infliction of grievous bodily harm *on a person*. Grievous bodily harm to a foetus will not suffice. On the facts of this case, the harm caused to CP by reason of EQ's excessive consumption of alcohol was caused *before* her birth. Tragically, the harm was the brain damage with which CP was born. She was born with limited growth potential as she had symmetrical intrauterine growth retardation. All the suffering that CP has endured and will continue to endure during her life is the consequence of the harm that was inflicted on her when she was in her mother's womb. The distinction between (i) harm or injury caused by an act and (ii) the consequences of the harm or injury is critical. An offence contrary to section 23 is complete if D, with the requisite mens rea, inflicts grievous bodily harm on V. If V suffers further harm *as a result of* the grievous bodily harm, that does not give rise to a further offence. The further harm is simply a consequence of the grievous bodily harm. It may well be relevant to an assessment of the gravity of the offence that has been committed, but it is not part of the actus reus of the offence itself. (*CP (A Child) v First Tier Tribunal* 2015: at [63])

5. Conclusions

FASD has been shown to be relevant to the criminal justice system in a wide variety of ways. These vary from fitness to be interviewed and fitness to be tried, to when murder charges should be downgraded to manslaughter, sentencing of offenders, vulnerability as a victim and suitability for awards of criminal injuries compensation. In addition, it generates considerable costs arising from carceral confinement of persons with the disorder (Popova et al. 2015; Thanh and Jonsson 2015). What is apparent is that the symptomatology of FASD renders some persons extremely vulnerable both as perpetrators and victims of crime. Impulsivity, poor judgment, lack of awareness of likely consequences of conduct, impaired capacity to self-monitor, realise the thoughts and feelings of others, and appreciate how their actions may be perceived are also highly criminogenic and require responses from all sectors of the criminal justice process, informed by insights provided by suitably knowledgeable and experienced health professionals.

While persons of a non-Indigenous background can and do experience FASD as a result of prenatal maternal consumption of alcohol (see e.g., Harper et al. 2026; Lange et al. 2017), a review of the cases decided by the courts, especially on appeal, shows an extremely pronounced over-representation of persons of an Indigenous background (Jonsson et al. 2014; Bower et al. 2018). This is an important consideration for resourcing and fashioning government and community-led programmes of support and rehabilitation, although it must not be permitted to obscure the fact that non-Indigenous persons also live with FASD. FASD has formed an integral part of sentencing responses in Canada, the United States and Australia (see Perlin 2023).

Variation in diagnostic criteria and in terms utilised for FASD continues to afflict consistent discourse and collaborative research in the area (Myers et al. 2025; Elliott 2025). There is an urgent need for standardisation so that comparable approaches and analyses can be undertaken, based on genuinely comparable data. In addition, it is important to recognise that generally, FASD exists along with other health conditions with which it can be confused or which result in its being misdiagnosed or under-diagnosed.

Of its nature, FASD exists on a spectrum, so in every instance that is forensic, it needs to be individually assessed on the basis of specialised expert insights from paediatric, mental health and other experts. As was observed by the Yukon Territorial Court (*R v Harper* 2009: at [70]), "[t]he greater the cognitive deficits of the offender, the less role specific deterrence should play". This is a pertinent consideration in terms of punishment, general deterrence, denunciation and rehabilitation, too, and has relevance for identifying the circumstances in which non-custodial options are viable for sentencers, and, if so, how they can be innovatively and creatively constructed.

In itself, a diagnosis of FASD only assists an offender a modest amount in terms of assessment of criminal responsibility and culpability; expert evidence focused on individualised factors is essential (Novick Brown et al. 2010, p. 411). Paradoxically, as was stated in *State of Western Australia v Warmdean* (2019: at [152]):

> the presence of FASD might be seen to increase the offender's risk . . . The neurodevelopmental deficits may be an impediment to the offender learning from past encounters with the justice system for his offending and being able to change his behaviours. It may also be an impediment to him learning from treatment programs. That does not necessarily mean the risk is intractable. The diagnosis will be relevant, in any event, to the strategies that may be necessary to reduce the risk by way of treatment and reinforcement of protective measures.

The challenge for those imposing sentence is to locate, with the assistance of suitable expert evidence, whether or not from a multi-disciplinary team, how serious the symptoms of FASD are for an offender; the extent to which they contributed to the offending—the nexus with criminal conduct; and their interaction with comorbidities, such as ADHD, ASD, oppositional defiant disorder, PTSD, intellectual disability, substance abuse, anxiety and depression; as well as the extent to which cognitive and other deficits may have exacerbated impairments arising from FASD, and the effect of the person's FASD symptomatology on their experience of imprisonment. Then the issue is as to needs and risk—the measures that can be instituted to protect the community against recidivism, focussing, where possible, on non-carceral options. Often these measures will need to be long-term, in order to set in place structures, lifestyles and supports that will alleviate the otherwise predictable patterns of problematic conduct in which persons with FASD may engage.

The courts have been urged in this regard to be proactive in identifying such options (*Churnside v The State of Western Australia* 2016: at [82]; see also *Nannup v State of Western Australia* 2021), including by drawing upon innovative community supports and resources. Ideally this will be done before the criminal justice system is called upon to respond, but

when criminal justice processes are engaged, community supports need to be involved at the earliest available opportunity to break cycles of antisocial behaviour, institute prosocial patterns of response, and remove persons who are vulnerable because of FASD from sources of problematic influence and manipulation. Improved government funding of targeted resources, programmes and support (Truth and Reconciliation Commission of Canada 2015; Australian Senate Community Affairs References Committee 2021; Australian Government 2024), particularly those that are Indigenous-run, culturally guided, healing-informed, strengths-based and trauma-aware (Hewlett et al. 2025), together with suitable evaluations of progress made and trends identified from improved data collection, have the potential to be highly cost-effective in terms of reducing recidivism, improving quality of life, and reducing the likelihood of serial offending that puts the community at risk.

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