

## Autism Victoria trading as Amaze: Professional Advisory Panel

Position statement on:

### Prevalence of Autism Spectrum Disorder in Australia

Author: Amanda Richdale, PhD, MAPS

All recent studies support a rise in the prevalence of Autism Spectrum Disorders (ASD) over time, especially since the 1990s and this is most likely due to a combination of changing diagnostic criteria and increased public and professional awareness of autism. Considering Autism Spectrum Disorders (ASDs) or the individual diagnoses Autistic Disorder (autism), Asperger's Disorder (or syndrome) and Pervasive Developmental Disorder Not Otherwise Specified (PDDNOS) reveals some consensus on the prevalence of autism and across the three ASDs, but less certainty about Asperger's Disorder or PDDNOS individually. This is because few studies have looked just at the prevalence of these latter two disorders. In a review of the literature, Fombonne (2009)<sup>1</sup> estimated that Asperger's Disorder was less common than Autistic Disorder or PDDNOS, with an overall prevalence rate for ASDs of 1:150 (0.7%) children, while in the UK both parent report and examination of the Special Education Needs register gave an ASD prevalence of 1:64 (1.6%) for 5- to 9-year-olds (Baron-Cohen et al., 2009)<sup>2</sup>.

In 2007 MacDermott<sup>3</sup> and colleagues reported a prevalence estimate of 1:160 (0.6%) children with ASDs within Australia using a range of data sources. More recently Barbaro and Dissanayake (2010)<sup>4</sup> reported that in a prospective surveillance study, 1:119 (0.8%) Victorian 2-year-olds met criteria for ASD. The Centers for Disease Control and Prevention (CDC)<sup>5</sup> in the USA currently report an average prevalence of 1:110 (0.9%) children with ASD. Two studies have been published in 2011, one in the USA and one in South Korea. The USA study (Windham, et al., 2011<sup>6</sup>) used existing sources and records and estimated

---

<sup>1</sup> Fombonne, E. (2009). Epidemiology of pervasive developmental disorders. *Pediatric Research*, 65, 591-598

<sup>2</sup> Baron-Cohen, S. et al. (2009). Prevalence of autism-spectrum conditions: UK school-based population study. *British Journal of Psychiatry*, 194, 500-509.

<sup>3</sup> MacDermott, S., et al. (2007). *The prevalence of autism in Australia. Can it be established from existing data?* Report for the Australian Advisory Board on Autism Spectrum Disorders.

<sup>4</sup> Barbaro, J. & Dissanayake, C. (2010). Prospective identification of autism spectrum disorders in infancy and toddlerhood using developmental surveillance: The social attention and communication study. *Journal of Developmental and Behavioral Pediatrics*, 31, 376-385.

<sup>5</sup> Centers for Disease Control and Prevention (CDC). *How many children have autism?*  
<http://www.cdc.gov/ncbddd/features/counting-autism.html> Retrieved September 26, 2011.

<sup>6</sup> Windham, G. C. et al. (2011). Birth prevalence of autism spectrum disorders in the San Francisco Bay area by demographic and ascertainment source characteristics. *Journal of Autism and Developmental Disorders*, 41, 1362-1372.

that 1:212 (0.5%) of children aged 8 years had an ASD, but considered that this may be an underestimate. Conversely, screening and assessing school age children, Kim et al. (2011)<sup>7</sup> estimated a rate of 1:38 (2.6%) for ASD in South Korea. The variability in these results most likely relates to differences in methods of ascertainment and sample size. Considering the estimates noted here and as also noted by CDC the prevalence for ASDs is therefore about 1% and this figure should be used for current service planning.

Amanda Richdale, for Autism Victoria Research Reference Group, September 2011

---

<sup>7</sup> Kim, Y. S. et al. (2011). Prevalence of autism spectrum disorders in a total population sample. *American Journal of Psychiatry*, 168, 904-912