Similarities and Differences of CdLS and Autism

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Many syndromes, such as Cri du Chat, Fragile X and Rett, present with a range of impairments in the areas of communication, behavior, and emotion. Individuals with Cornelia de Lange Syndrome (CdLS) also present with impairments in these three areas. These are the areas that highlight the hallmark diagnostic symptoms for Autism Spectrum Disorder. For an individual to receive a diagnosis of autism, the following symptoms must be displayed:

- qualitative impairment in social interaction;
- qualitative impairment in communication; and
- restricted repetitive and stereotyped patterns of behavior, interests and activities, as well as delays or abnormal functioning, with onset prior to age three, in (at least one of the following) social interaction, language as used in social communication, or symbolic or imaginative play.

Some of the symptoms of autism that also occur in individuals diagnosed with CdLS include developmental, language and social development delays. The range of delay varies across individuals. Specifically, individuals diagnosed with CdLS are described as having receptive and expressive language delays with a significant discrepancy in these language skills.[3, 4] A similar discrepancy is described in individuals on the Autism Spectrum.

Previous studies suggest a strong association between CdLS and Autism Spectrum Disorder.[1] For example, Berney and colleagues[1] reported that 53 percent of the 49 CdLS individuals in their study displayed autism symptoms and these associations were not attributed to the level of intellectual disability.[7]

However, in the area of social interaction, the overlap in presentation across the CdLS and autism groups may be less clear. Individuals with CdLS may present with increased anxiety, selective mutism, and shyness[2] that is not found in the autism group.

In the Moss, Howlin, Magiati & Oliver article,[5] the CdLS group demonstrated a greater capacity to use eye contact and gestures in comparison to the autism group suggesting different social skills impairments across the groups.

Further research is needed into the nature of the social, communicative and emotional impairments in CdLS compared to individuals with Autism Spectrum Disorder with similar intellectual disability. Not only are we interested in what ways these groups present in a similar fashion, but also in what ways the CdLS group presents differently than the autism group. These studies could aide in the delineation of different subtypes of individuals with CdLS along with specific treatment strategies that would be more beneficial for the specific subgroups.

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