# LAYMAN'S TERMS OF REFERENCE

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## **Classification of Ability Levels (Interpreting Percentiles)**

Beyond  $98^{th}$  Very Superior  $91^{st} - 97^{th}$  Superior  $75^{th} - 90^{th}$  High Average  $25^{th} - 74^{th}$  Average  $9^{th} - 24^{th}$  Low Average  $2^{nd} - 8^{th}$  Borderline

Below 2<sup>nd</sup> Extremely Low / Impaired / Mentally Handicapped

**Abnormality** – Something that is not normal or unusual (e.g., a malformation)

**Abstract** – A concept, idea, or thought that is not concrete and cannot be perceived by the senses. For example, the concepts of justice, due process, and morality are abstract concepts.

**Abstract reasoning** – the ability to think abstractly, or beyond what comes in through the senses, to understand more complex, higher order relationships among things. For example, when asked "how are Saturn and Jupiter alike," concrete answers might be, "they are both round," or "they are both in the sky." A more abstract answer would be, "they are both planets."

Adaptive Functioning or Adaptive Behaviour – how well a person functions on a day-to-day basis. It refers to a broad range of activities such as personal hygiene, getting dressed, communicating appropriately at home, completing chores, learning to ride the bus, and so on. In most individuals, whether handicapped or not, general intellectual abilities ("IQ") gives us an idea of how well they will be able to perform these functions in everyday life. In other words, we expect that the higher one's IQ, the higher their adaptive functioning skills. This often is not the case in FASD. Individuals with FASD may have average-range IQs, but still demonstrate very poor adaptive skills.

**Attachment disorder** – this refers to a disrupted or troubled ability to form healthy, stable relationships with other people, usually one or both parents.

**Attention** – Attention is the ability to concentrate or "pay attention" to something, often while ignoring irrelevant information. For example, reading a book on the bus requires paying attention to the words on the page while ignoring distractions such as other people's conversation, frequent stops, and people getting on and off the bus. There are different kinds or "levels" of attention. An example of relatively low level attention would be simply being awake and aware of your surroundings. An example of higher level attention would be doing several

different activities at the same time, such as preparing a multi-course meal for several guests. Attention is sometimes measured in the visual domain ('visual attention': attention for things you see) and auditory domain ('auditory attention': attention for things you hear). Attention can be compromised for many reasons such as fatigue, stress, physical pain, anxiety, depression, grief, learning disabilities, etc.

**Attention Deficit** / **Hyperactivity Disorder** (**ADHD**) – This is one of the most frequently diagnosed developmental disorders in childhood. Affected children have difficulty paying attention, staying still, or both. They may be forgetful, disorganized, fidgety, and appear "in their own world." ADHD is very common in children with FASD.

**Atypical** or non-typical – unusual or irregular; something that is "not typical."

**Auditory** – refers to the sense of hearing.

**Auditory memory** – Refers to the ability to remember things that you hear (see "memory" below for more detailed information on memory in general). Children with weak auditory memory will have difficulty learning and remembering things that they hear. At school, they may not benefit as much from simply hearing a teacher present a lesson. They may appear to be trying very hard to listen, but in reality may absorb very little. To compensate for this, these children may benefit from information presented visually. For example, instead of presenting them only with orally presented directions, provide written sketches, outlines, pictures, etc.

**Auditory perception** – the process in which auditory information is selected, organized and interpreted.

**Auditory Processing disorder** – "Auditory processing" describes what happens when the brain recognizes and interprets sounds. When sound travels through the ear, it is changed into electrical information that can be interpreted by the brain. So, the "disorder" part means that something is adversely affecting the processing or interpretation of that information. In other words, although hearing and intelligence are typically fine, at some point the "auditory message" doesn't get through as expected. An individual with this difficulty may have difficulty recognizing differences between sounds in words, even though the actual sounds are loud and clear. For example, "Tell me how a chair and a couch are alike" may be perceived as, "Tell me how a cow and a hair are alike."

**Behavioural regulation** – The ability to control one's activity level and emotions in response to the external environment and to one's own internal environment. This ability develops with age. We expect younger children to react vigorously to highly exciting or salient situations. As typical children mature, their reactions "tone down" to more age-appropriate levels. In FASD, however, behavioural regulation may be problematic. They may experience extreme ups and downs. In response to the world around them, or to their own private thoughts, they may become inappropriately irritable, volatile, withdrawn, etc.

**Brain injury** – refers to harm or damage to the brain that occurs after the child is born. There are three levels of brain injury, mild, moderate, and severe. Sometimes referred to as a traumatic brain injury, or TBI.

Cause and effect – the ability to understand that a specific action has a specific consequence. For example, typically developing children will come to understand that specific behaviours, such as disobeying their parents or being disruptive, may lead to specific consequences, such as timeouts or removal of privileges. Understanding of cause and effect may be disrupted in FASD. These individuals may have trouble seeing the connection between what they do and what happens as a result.

**Central Nervous System** – the brain and spinal cord.

Cleft lip and palate – a "cleft" is a general term that means "split" or "separation." The "palate" refers to the roof of your mouth. There are two parts to the palate, hard and soft. If you feel the inside of your mouth with your tongue, you will notice the difference between the soft and the hard palate. The back of the palate (towards the throat) is called the soft palate and the front (towards the mouth) is known as the hard palate.

During normal fetal development, we all have a cleft lip and cleft palate that come together and join (fuse) in the middle. If you look in a mirror at the middle of the roof of your mouth, you can see the "seam" where the fusion has occurred. In some children, this fusion gets disrupted. A cleft lip occurs when there is an opening in the upper lip between the nose and mouth. It looks as though there is a split in the lip. A cleft palate occurs when the roof of the mouth has not joined completely. A cleft palate can range from just an opening at the back of the soft palate to a nearly complete separation of the roof of the mouth (soft and hard palate).



**Cognitive flexibility** – the ability to process information from different perspectives or angles, and to reason dynamically. It can also refer to the ability to think creatively or imaginatively, or to "think outside the box." A person with poor cognitive flexibility may think very rigidly and have trouble seeing things more than one way.

**Cognitive functioning (aka cognition)** – a general, non-specific term used to describe an individual's general intellectual abilities / intelligence / IQ. Cognitive functioning among individuals with FASD varies widely.

**Cognitive problems** – a general / non-specific term that refers to deficits or inefficiencies in cognition. It can refer to relatively isolated difficulties such as slow mental processing or concrete thinking, or to broader difficulties such as mental retardation.

**Communication** – The exchange of thoughts, ideas, messages, or information. This can occur through language (speech, writing) or behaviour (gestures, facial expressions, body movements, posture), and typically occurs in a social context.

**Comprehension** – Understanding the meaning or importance of something. For example, some children (with or without FASD) are highly skilled at reading individual words, but have trouble understanding what they read (poor comprehension).

**Concrete thinking** – The tendency to think concretely rather than abstractly (see above). Individuals with concrete thinking may interpret things very literally. For example, expressions such as "beat round the bush" or "cut it out" would be difficult for a highly concrete thinker to understand, because the meaning of these expressions is very different from the literal interpretation of the words (What bush? Cut what out?).

**Conduct disorder** – a pattern of behaviour in which the basic rights of others or societal rules are violated. It includes such behaviours as aggression to people and animals, destruction of property, deceitfulness or theft, and so on.

**Confabulation** – This occurs when a person distorts or makes up information, perhaps due to inaccurate memories. Many people wrongly confuse this with lying. The difference is that confabulation is not meant to deceive. Confabulation can be subtle, where small bits of information are made up to fill in gaps in memory or understanding. Confabulation can also be bizarre or unrealistic (e.g., claiming to be a "space pirate").

**Congenital anomalies** – "Congenital" refers to something that exists or develops before birth, during development in the uterus. Therefore, congenital anomalies refer to abnormalities that develop before the baby is born, either through genetic factors (e.g., Down's Syndrome) or environmental factors (e.g., alcohol; trauma).

**Comorbid disorders** – comorbid means "co-occurring." Therefore, comorbid disorders are multiple disorders that occur in the same individual. For example, a child diagnosed with FASD may also be diagnosed with ADHD, conduct disorder, depression, obsessive compulsive disorder, and/or oppositional defiant disorder.

**Developmental delays** – when a child has not developed certain abilities that most children would have developed by that age. For example, they may be slow to crawl, walk, talk, dress, feed themselves, read, write, and so on. Developmental delays can be specific, where only one area is affected, or global, where several abilities are compromised. If used properly, the word "delay" suggests that the child will catch up on the affected ability. If the delay is permanent and severe, the child goes on to develop a developmental disability (see below).

**Developmental disability** – this is a broad term that refers to a functional impairment in such functions as speaking, walking, thinking, and/or socializing. Developmental disabilities can be specific or global. They can be caused by genetic defects, metabolic problems, physical trauma, toxic substances, nutritional deficiencies, and psychosocial factors.

**Discriminate** – the ability to distinguish among things or recognize that various things are distinct. For example, a child who is colour blind may not be able to properly discriminate among certain colours.

**Emotional regulation** – this refers to the ability to keep emotions under control and situation-appropriate. Individuals with FASD tend to be emotionally unstable or "volatile." They may go from calm to agitation for unclear reasons.

**Executive functioning** – higher-order cognitive processes required for effective and situation-appropriate behaviour. Executive functions include such abilities as initiation, planning, organization, abstract thinking, problem solving, working memory, and inhibition. Collectively, these abilities control and regulate the other "departments" in the brain, in much the same way as a cockpit controls a plane's flight or a conductor coordinates an orchestra. It is thought that executive functions depend largely on frontal regions in the brain.

**Expressive Language Disorder** – A difficulty expressing oneself through language (see "Language", below).

**Externalizing disorders** – disorders where the main difficulty includes behaviours "turned outward" toward others. Examples of externalizing behaviours include aggression, delinquency, hyperactivity, disruption, and destruction (compare with Internalizing disorders, below).

**Failure to thrive** – a general / non-specific term used when an infant does not gain weight as expected for a variety of reasons.

**Fine motor skills** – these refer to small muscle movements such as buttoning a shirt, tying a shoelace, and writing.

**Focused attention** – the ability to direct one's attention to one specific thing for a relatively short period of time (e.g., carefully measuring 8 tablespoons of sugar without losing track).

**Fluid Reasoning** – This is a term based on Raymond Cattell's theory of intelligence. In the 1940s, Cattell suggested there were two kinds of intelligence: "fluid"; and "crystallized." He proposed that fluid intelligence is a natural, general ability that stays fairly constant throughout life and includes such abilities as problem-solving, reasoning, and pattern recognition. In contrast, Cattell proposed that crystallized intelligence can change over time and consists mainly of specific, acquired knowledge. For example, a child who learns the names of Canada's 10 provinces and 3 territories has developed a piece of crystallized intelligence, but his or her basic ability to learn and reason ("fluid intelligence") has not been altered.

**Generalize** – the ability to take information learned in one situation and apply it to other situations (e.g., learning something in school and applying it in the "real world").

**Graphesthesia** - the sense by which figures or numbers are recognized when written on the skin with a dull-pointed object.

**Gross motor skills** – refers to large muscle movements such as walking, running, or riding a bike.

Hyper	a preface to indicate that something is excessive or beyond what typically occurs
(e.g., hyperactivity indicates excessive activity levels).	
Нуро	- a preface to indicate that something is less than or below what typically occurs
(e.g., hypoall	ergenic indicates that something does not cause allergies).

**Inhibition** – Inhibition is the ability to "put the brakes" on a behaviour that's being considered or one that's already in motion. The familiar quotations "stop and think," "think before you act," and "look before you leap" capture this idea. For example, a child chasing after a ball that has rolled on to the street may suddenly stop at the curb, realizing that to blindly chase the ball without looking would be dangerous.

**Initiation** – to get started on or begin something. Usually associated with executive functions.

**Intelligence** – This is a highly complex term because different people have different theories and definitions of intelligence. Also, research shows there really is no single "thing" that defines intelligence. In the broadest sense, it can be thought of as "general mental ability," "general intellectual function," or "general cognitive ability." It's similar to a person's "mental horsepower." In most individuals, we expect various intellectual functions to be proportionately developed. For example, people with good verbal intelligence tend to have good non-verbal intelligence, good memory and learning skills, and so on.

**Internalizing disorders** – disorders where the main difficulty is "turned inward" on the self. Examples of internalizing disorders include depression, anxiety, and low self-esteem.

Language – A broad term to describe the means by which we communicate. Language is usually spoken, but it also occurs through writing, gestures, body language, and so on (see "Communication", above). Language can be divided into two broad categories: Comprehension – also known as "receptive language." Language comprehension allows us to listen to and make sense of or understand what is being communicated. Expression – also known as "expressive language" or "language production". Expressive language skills allow us to communicate effectively, usually through spoken language.

In most people, language comprehension and expression are equally developed. However, in some individuals, one can be lower than the other. For example, in FASD, expression may be high, but comprehension low. This leads to difficulties because they can "talk the talk," giving the impression that they are fine, when in fact comprehension is poor and they do not understand what is going on.

**Language comprehension** – The ability to understand or make sense of language (see "Language" above).

**Learning Disabilities** – a broad "umbrella term" that refers to impaired learning skills that interfere with normal functioning. The impairments are usually specific and can occur in one or more areas of language development (spoken, written, reading), mathematical processes, and/or intellectual tasks such as memory, reasoning, and problem solving. Children with learning

disabilities are sometimes mistakenly thought of as being globally impaired (e.g., a child with a specific learning disability in reading may be regarded as "slow.") In reality, specific learning disabilities can be found in a particular area even in those with gifted intelligence.

**Malformations** – irregular or abnormal body structures.

**Malnourished** – undernourished, poorly nourished, or starved.

**Memory** – a complex process in which information is encoded or "taken in", retained, and recalled when necessary. It depends on many different systems located throughout the brain. There are different terms associated with memory, depending on:

- 1. Duration (short-term vs. long-term memory)
  - a. **Short-term memory** Holds a limited amount of information only for a very short amount of time (i.e., a few seconds to a few minutes)
  - b. Long-term memory Holds an unlimited amount of information indefinitely
  - c. **Working memory -** the ability to briefly hold information in mind and manipulate or reorganize the information (see "Working Memory" below).
- 2. <u>Modality</u> (verbal vs. visual memory)
  - a. **Verbal memory** remembering information that you hear (also known as auditory memory
  - b. **Visual memory** remembering information that you see
- 3. Event-based vs. Action-based (explicit/declarative vs. Implicit/procedural)
  - a. **Explicit/Declarative memory** memories about specific events that happened at a specific time and place (e.g., "I remember when I bought my first car, down at the car lot by..."). These memories can be remembered and recalled, and rely on previous experience and knowledge.
  - b. **Implicit/Procedural memory** memories necessary to perform actions and tasks such as learning to ride a bike, ski, skate, etc. They cannot be remembered and recalled as can explicit memories. An example of implicit memory in action occurs when skills or performance improve through practice.

**Mental control** – The ability to hold information in mind for short periods of time and work with it. Weak mental control can make the processing of complex information more time consuming, drain mental energies more quickly and perhaps result in more frequent errors on a variety of learning tasks (also see "working memory", below).

**Motor Coordination/Motor Skills** – A person's ability to use large and small muscle groups. Gross motor skills deals with large muscle groups such as walking. Fine motor skills refer to the small muscle coordination required for things like writing or buttoning a shirt.

**Motor planning** – the ability to plan, organize and carry out a sequence of movements. Deficient motor planning is known as "dyspraxia." In children, this may result in coordination difficulties (e.g., walking, running, hopping, riding a bike, using a knife and fork). It can also result in speech difficulties, thereby affecting casual conversation and resulting in social

awkwardness. In school, dyspraxia can lead to difficulties holding a pencil and forming letters, leading to slow writing and school frustration.

**Neurobehavior disorder** – A general / non-specific term used when an individual has cognitive and/or behavioural difficulties that are believed to be the result of structural brain abnormalities.

**Neurology** – a branch of medicine that deals with structural and physiological pathology in the central nervous system (brain + spinal cord). When pathology is suspected, neurologists conduct physical and neurological examinations, run tests, and make decisions about the location of the pathology, possible causes, possible diagnoses, and treatment options. They can also prescribe medication when necessary.

**Neurological "Hard Signs" and "Soft Signs"** – Hard signs are physical, concrete evidence of pathology. In FASD, hard signs would include any of the physical brain abnormalities sometimes found (e.g., absent or malformed corpus callosum; abnormal basal ganglia, cerebellum, hippocampus). Soft signs are behavioural or clinical observations that may indicate the presence of pathology (e.g., poor fine motor skills, poor eye-hand coordination).

**Neuropsychology** – a branch of psychology dealing with higher order functions of the brain, along with the brain in relation to behaviour, thoughts, emotions, development, personality, social skills, and so on.

**Nonverbal Reasoning** – see Perceptual Reasoning.

**Over-stimulated** – overly aroused or excited.

**Perceptual Reasoning (Nonverbal reasoning)** – this is a term often used in the context of intelligence testing with the WISC-IV. On the WISC-IV, it is one of four Index Scores. In this context, Perceptual Reasoning refers to the ability to think and reason without using language. It is measured by activities such as using blocks to construct designs, identifying missing puzzle pieces, arranging pictures in the proper order, and mentally rotating objects.

**Perinatal** – something that occurs around the time of birth ("peri" means "around" or "near")

**Perseveration** – inappropriate and uncontrollable repetition of thoughts, words, behaviours, or gestures (e.g., when asked to draw 5 loops, an individual may begin to draw and be unable to stop; when engaged in a problem solving activity and instructed that a certain solution is no longer appropriate, an individual may persist using the inappropriate strategy again and again and again).

**Phenotype** – the observable characteristics of an individual, including such things as physical appearance and behaviour. For example, the physical phenotype of full FAS includes a triad of small eyes, flat philtrum, and thin upper lip. The behavioural phenotype often includes inattention, hyperactivity, and impulsivity.

**Postnatal** – something that occurs after birth

**Pragmatics of language** – the use of language for social communication. Weak pragmatics might surface as difficulty starting a conversation; responding inappropriately during a conversation; fluent speech that is empty of content; etc.

**Prenatal** – something that occurs before birth

**Problem solving** – the process of defining a problem, generating possible solutions, choosing and executing a solution, and determining whether the solution was successful.

**Processing Speed** – this is a term most often used in the context of intelligence testing with the WISC-IV. On the WISC-IV, it is one of four Index Scores. In this context, Processing Speed refers to the speed with which someone can process simple visual information and make quick decisions. Roughly speaking, it refers to "how fast we think." Weak processing speed can make tasks such as reading very difficult because making sense of the words on the page becomes time consuming and laborious.

**Prognosis** – a prediction of the most likely course of a disease, including the chance that recovery will occur. For example, a very severe brain injury usually has a poor prognosis, whereas a mild brain injury usually has a good prognosis.

**Semantic** – refers to the meaning of something, usually meaning in language.

**Sensory integration/processing** – how the brain registers, interprets and acts on sensation. Sensory processing involves the brain's ability to efficiently process and organize information through an individual's sensory systems: vision, hearing, smell, taste and touch, as well as vestibular (movement) and proprioception (sensations from muscles and joints).

**Sentinel Physical Findings** – the adjective "sentinel" refers to physical findings that are key diagnostic features of FASD. These include a triad of facial anomalies (small eyes, thin upper lip and a smooth philtrum) and growth deficiency.

**Sequencing** – arranging or doing things in the proper order.

**Shift setting** – the ability to mentally "switch gears" or shift one's approach from one task to another.

**Social skills** – understanding and expressing the social conventions necessary for effective social communication, participating in positive daily social interactions, and demonstrating behaviours that lead to the development and maintenance of social relationships.

**Somatization** – multiple or recurrent physical complaints (e.g., headaches; abdominal pain; arm/leg pain) that cannot be fully accounted for by medical reasons, and are therefore thought to have a psychological component. Often, this psychological component involves stress or anxiety that "comes out" or is expressed in the body.

**Spatial organization** – perception of visual information, understanding spatial relationships.

**Static Encephalopathy** – The term "encephalopathy" refers to any physical abnormality in the brain. Such abnormalities can vary from large, noticeable structural defects to small, microcellular abnormalities. The term "static" means that the physical abnormality in the brain is unchanging, neither progressing nor regressing. In FASD, the term "static encephalopathy" is used in this diagnostic system when the patient presents with cognitive/behavioral dysfunction which is accompanied by structural, neurologic, and/or psychometric measures which strongly support the presence of structural brain abnormalities. The term does not define or suggest any specific pattern of structural abnormality or cognitive/behavioral dysfunction.

**Stimuli** – something (object, condition, or action) that causes a response.

**Sustained attention** – the ability to concentrate or "pay attention" over longer periods of time.

**Syntax** – the grammatical arrangement of words in a sentence.

**Talipes equinovarus** – club foot (see diagram to right). A foot deformity affecting the shape and position of one or both feet. The term "club foot" comes from the resemblance of the foot to the end of a golf club.

**Transition** – changing from one activity to another, or one stage to another (e.g., the transition between childhood and adolescence; the transition between work and play).



**Verbal Comprehension** – this is a term often used in the context of intelligence testing with the WISC-IV. On the WISC-IV, it is one of four Index Scores. In this context, Verbal Comprehension refers to the ability to think and reason using language. It is measured through tasks such as defining words, explaining the abstract relationship between words, and describing solutions to everyday situations.

**Verbal expression** – the ability to express oneself verbally.

**Verbal fluency** – the ability to quickly and easily generate words, either belonging to the same category (e.g., "toys") or beginning with the same letter (e.g., words that begin with "T").

**Verbal memory** – See "Memory," above.

**Verbal receptive language skills** – understanding or making sense of what is said.

**Verbal Intelligence** – see "Verbal Comprehension," above.

**Vestibular function** – refers to the sense of balance.

**Visual** – pertaining to vision or sight.

**Visual memory** – See "Memory," above.

**Visual-motor integration** (also known as visuomotor integration) – broadly, this refers to coordinating the visual system with the motor system. In children, it usually refers to the ability to coordinate what the child sees with the child's ability to write. It is typically measured by asking children to copy specific shapes of increasing complexity.

**Working memory** – the ability to briefly hold information in mind and work with it. The work done can involve simply holding information in mind (e.g., remembering a phone number long enough to dial it), or rearranging information in mind (e.g., mentally rearranging the objects in your living room from smallest to largest). It is usually associated with executive functions.

# BRIEF DESCRIPTION OF NEUROPSYCHOLOGICAL TESTS

Neuropsychologists use a variety of tests and instruments to measure brain functioning. In the same way that CT, MRI, EEG, and PET scans look at the structural, physical, and metabolic condition of the brain (i.e., "how the brain looks"), a neuropsychological examination examines brain functioning – "how the brain works."

The following list includes some of the more common tests used in a neuropsychological assessment, in particular in the diagnosis of FASD.

# Adaptive Behavior Assessment Scale 2nd Edition (ABAS-II)

Determines how individual is responding to daily demands

Develops treatment and training goals

Determines eligibility for services and Social Security benefits

Assesses individuals with mental retardation, learning difficulties, ADD/ADHD, or other impairments

Assess capability of adults to live independently

#### **ADHD Rating Scale IV**

The ADHD Rating Scale-IV is a reliable and easy-to-administer instrument both for diagnosing ADHD in children and adolescents and for assessing treatment response. Containing 18 items, the scale is linked directly to DSM-IV diagnostic criteria. There are three versions of the scale: a parent questionnaire on home behaviours (English), a parent questionnaire on home behaviours (Spanish), and a teacher questionnaire on classroom behaviours.

#### **Attention Deficit Disorders Evaluation Scale**

Enables educators, school and private psychologists, pediatricians, and other medical personnel to evaluate and diagnose Attention-Deficit/Hyperactivity Disorder in children and youth from input provided by primary observers of the student's behaviour.

#### **Beery Development Test of Visual Motor Integration (BEERY VMI)**

Helps accurately and efficiently assess visual-motor skills in children and adults.

#### **Behavior Assessment Scale for Children (BASC)**

A comprehensive set of rating scales and which help to understand the behaviours and emotions of children and adolescents

# **Behavior Rating Inventory of Executive Functioning (BRIEF)**

A set of rating scales that assess executive functioning in preschool-aged children, children and adolescents.

#### **Brief Test of Attention (BTA)**

Assess severity of attentional impairment.

# **California Verbal Learning Test for Children (CVLT-C)**

A test used to measure verbal learning, organization and memory.

#### Carrow-Woolfolk Oral and Written Language Scales (OWLS)

Designed to assess writing skills.

# **Children's Color Trails Test (Trails)**

Designed to provide an easily administered and objectively scored measure of alternating and sustained visual attention, sequencing, psychomotor speed, cognitive flexibility, and inhibition-disinhibition.

# **Children's Memory Scale (CMS)**

Compares memory and learning to ability, attention, and achievement. Measures learning in a variety of memory dimensions (attention and working memory, verbal and visual, memory, short- and long-delay memory, recall and recognition).

#### **Children's Self-Report and Projective Inventory (CSRPI)**

The Self-Report and Projective Inventory (SRPI) is a kit of clinical tools developed specifically to provide information about the social-emotional functioning of children and adolescents.

#### **Clinical Evaluation of Language Fundamentals**

Helps to determine the nature of a language disorder: the student's language strengths and weaknesses and determines what critical clinical skills and behaviors underlie the student's language disorder.

# **Comprehensive Test of Phonological Processing (CTOPP)**

The Comprehensive Test of Phonological Processing (CTOPP) assesses phonological awareness, phonological memory, and rapid naming. Persons with deficits in one or more of these kinds of phonological processing abilities may have more difficulty learning to read than those who do not.

#### **Conners' Continuous Performance Test (CCPT)**

Used for assessing sustained attention and freedom from distractibility.

# Conners' Rating Scale Revised – Parent Form, Long Version (CRS-Parent) Conners' Rating Scale – Revised – Teachers Form, Long Version (CRS-Teacher)

Used in the assessment of attention deficit disorder with hyperactivity (ADHD).

#### **Controlled Oral Word Association Test (COWAT) (also called FAS)**

Designed to measure the speed and flexibility of verbal thought process (ie the ease by which a person can think of words that begin with a specific letter (ie; FAS).

#### **Delis Kaplan Executive Function system (DKEFS)**

Assesses key areas of executive function (problem solving, thinking flexibility, fluency, planning, deductive reasoning) in both spatial and verbal modalities.

#### **Expressive Vocabulary Test (EVT)**

Test of expressive vocabulary and word retrieval for ages 2-6.

#### **Kaufman Survey of Early Academic and Language Skills (K-Seals)**

An easy-to-administer measure of children's language skills (expressive and receptive vocabulary), pre-academic skills, and articulation.

# Peabody Picture Vocabulary Test (PPVT-III)

Measure receptive vocabulary and screen verbal ability quickly and easily for ages 2-6.

# **Quick Neurological Screening Test II (QNS-II)**

An occupational therapy screening tool that measures neurological soft signs in children 5 years of age through adulthood. It consists of items adapted from pediatric neurological and neuropsychological examinations that sample fine and gross motor coordination, balance and vestibular function, visual and auditory perceptual skills, motor planning and sequencing, and spatial organization.

#### **Rey Complex Figure Test (RCFT)**

This drawing and visual memory test examines ability to construct a complex figure and remember it for later recall. It measures memory as well as visual-motor organization.

# **Rey-Ostereith Complex Figure Test**

Analyzes aspects of visual-spatial perception/construction and memory

# **Scales of Independent Behavior Revised (SIB-R)**

Designed to measure functional independence and adaptive functioning in school, home, employment, and community settings.

#### **Social Skills Rating Scale (SSRS)**

Constructed to screen and classify children suspected of having social behavior problems and to assist in the development of appropriate interventions for identified children.

#### **Stroop Color and Word Interference Test**

Examines attention, mental speed and mental control.

#### **Test of Everyday Attention for Children (TEA-Ch)**

This test is used with children with diagnosed or suspected attention difficulties to more clearly identify the patterns of attentional problems they may have.

# Wechsler Intelligence Scale for Children (WISC; WISC-R; WISC -III; WISC-IV) Wechsler Preschool and Primary Scale of Intelligence (WPPSI)

The Wechsler Intelligence Scales are a series of standardized tests used to evaluate cognitive abilities and intellectual abilities in children. The WPPSI is designed for children age  $4-6\frac{1}{2}$  years.

The results of educational tests given to children are often provided in composite scores. For example, on the WISC-III, three scores are usually provided; Verbal IQ (VIQ), Performance IQ (PIQ) and a Full Scale IQ (FSIQ). Each of these IQs are composite scores. Both the Verbal and

the Performance IQ scores are composites of five different subtests, each of which measures a different area of ability. The Full Scale IQ is a composite of the Verbal and Performance scores --- which makes it a composite of ten different subtests. IQ's between 90 and 110 are considered within the "average range;" mental handicap begins at IQ <70 with 71-75 being "borderline" and 76-85 considered "slow learner".

Note: While the WISC is the standard test used to measure intelligence, it does not measure how well a child is actually performing in the classroom

#### Wechsler Individual Achievement Test – Second Edition (WIAT-II)

Designed to measure academic skills including reading, comprehension, mathematics, written and oral language.

#### Wide Range Assessment of Memory and Learning – 2nd Edition (WRAML-2)

The WRAML-2 is a carefully standardized psychometric instrument which allows the user to evaluate an individual's memory functioning. The WRAML-2 affords evaluation of both immediate and delayed memory ability as well as the acquisition of new learning.

#### **Wisconsin Card Sorting Test (WCST)**

This procedure measures the ability to learn concepts. It is considered a good measure of frontal lobe functioning (ie executive function).

# Woodcock Johnson Tests of Achievement Third Edition (WJ-III)

A set of tests that measures general intellectual ability, specific cognitive abilities, scholastic aptitude, oral language and academic achievement.

#### **Woodcock Johnson Test of Cognitive Abilities Third Edition (WJ-III)**

A set of tests that measures information-processing abilities, including tests of working memory, planning, naming speed, and attention.

For more information understanding composite scores and reading reports, see excellent resource entitled Tests and Measurements for the Parent, Teacher, Advocate & Attorney available online at <a href="http://www.wrightslaw.com/advoc/articles/test\_measurementspf.html">http://www.wrightslaw.com/advoc/articles/test\_measurementspf.html</a>