

# G GLOSSARY OF TERMS

## A

**Aberrant:** Behavior that is significantly different from what is accepted as usual or normal in a society or culture.

**Abnormal Behavior:** Behavior that is significantly different from what is accepted as usual or normal in a society or culture.

**Across modalities:** In teaching terms, this means teaching methods that use more than one of the sensory channels, such as visual (seeing), auditory (hearing), tactile (touch), and kinesthetic (movement). Also known as multi-sensory teaching.

**Analysis of Verbal Behavior (AVB):** See Verbal Behavior

**ADI (Autism Diagnostic Interview–Revised):** The Autism Diagnostic Interview–Revised (ADI–R) is an instrument used in the diagnosis of autism spectrum disorders in children and adults. The assessor interviews the parent or caregiver to obtain detailed descriptions of past and current behaviors that are relevant to a diagnosis of ASD. The interview focuses on developmental delays, social interactions, language, non-verbal communication, play, understanding and expression of emotions, and on restricted, repetitive and stereotypic behaviors and interests. It is currently considered to be a ‘Gold Standard’ tool for use in the diagnosis of autism. It is usually used in conjunction with the ADOS (see below).

**ADOS–G (Autism Diagnostic Observational Schedule):** The ADOS is an instrument used in the diagnosis of autism spectrum disorders in children and adults. It consists of a series of semi-structured play and social interactions with young children, and interview questions for adolescents and adults. The activities provide opportunities to observe the child or youth’s communicative behaviors, social interactions, imaginative play, emotional expression, stereotyped behaviors, or other behaviors that are relevant to the diagnosis of autism spectrum disorders. It is currently considered to be a “gold standard” tool for use in the diagnosis of autism.

**Advocate:** Someone who takes action to help someone else (as in “educational advocate”); also, to take action on someone’s behalf.

**Alert Program:** A specific program that is used to help teach self-regulation awareness. The program supports children, teachers, parents and therapists to choose appropriate strategies to change or maintain states of alertness. This program is described more fully in a book called *How Does Your Engine Run? A Leader's Guide to the Alert Program for Self-Regulation* (Williams & Shellenberger, 1996).

**Angelman Syndrome:** “A rare genetic disorder that causes severe learning difficulties. The children show characteristics such as: happy appearance (smiles and laughs a lot), hand flapping, excitable personality, balance problems, short attention span, developmental delay, and speech impairment with better receptive language skills. The incidence is believed to be 1 in 25,000 children.” (Canadian Autism Intervention Research Network, [www.cairn-ite.com/glossary/glossary.html](http://www.cairn-ite.com/glossary/glossary.html))

**Antipsychotic Drugs:** Drugs that help counteract or reverse psychosis, a disturbance in thought processing and behavior leading to a loss of contact with reality.

**Anxiety:** a cluster of negative emotions such as apprehension, fear and worry that can occur with physical responses like chest pain, stomach pains or shortness of breath.

**Aphasia:** The complete or partial loss of ability to use or understand language as a result of brain damage.

**Applied Behavioral Analysis (ABA):** Applied Behavior Analysis is a scientific discipline that is concerned with applying scientific principles of learning and behavior to socially important problems. It emphasizes careful measurement of observed behavior, and analysis of behavior in terms of its relationship to events in the environment that immediately precede or follow the behavior.

An Applied Behavior Analysis program establishes behavioral objectives or goals, breaks complex behaviors down into their functional parts, sets objective ways of measuring the relevant behaviors, implements teaching or behavior change procedures based on behavioral principles, and then evaluates the results through careful experimentation. ABA teaching methods are very systematic and precise.

Applied Behavior Analysis is a very broad field, and ABA principles and methods have been used for everything from developing language skills in children to teaching leadership skills to executives, and from eliminating self-injurious behavior to reducing littering. Applied Behavior Analysis methods are known to be effective in treating autism, and are used to promote the child's optimal development in all domains including motor skills, self-care,

language and communication, play and social skills, pre-academic and academic skills, and vocational and independence skills. Communication and social skills are given special emphasis. ABA techniques are also used to reduce challenging behaviors.

Some methods used in autism treatment which are based on ABA principles include: Discrete Trial Teaching, Precision Teaching, Programmed Instruction, Pivotal Response Training, Verbal Behavior approaches, Fluency Training, Incidental Teaching, and Positive Behavioral Support. (Dr. David Batstone, Queen Alexandra Centre, Vancouver Island Health Authority)

**Apraxia:** A neurological disorder where a person loses the ability to move in a way they want despite the fact that there is no loss of muscular power, coordination or sensation. Apraxia may be specific to speech.

**Asperger Syndrome (AS):** A developmental disorder on the autism spectrum. People with AS have average or above average intelligence and had no significant delay in early language development. People with Asperger Syndrome have difficulty with social understanding, and their patterns of behavior are often inflexible. They commonly have a very narrow range of interests with intense preoccupations in these interests. Many people with AS have challenges with motor planning and motor skills.

**Assessment:** An organized process of gathering of information about a child's needs, abilities, and behaviors in order to determine a diagnosis or to address an identified problem or question. This process may include the use of formal tests, interviews, direct observation, and review of medical or other background information. The assessment results are used to plan appropriate treatment, education, or support services.

**Assistive Technology:** Assistive Technology includes any item or piece of equipment used to maintain, increase or improve the functional capabilities of individuals with disabilities.

**Attention:** The mental process of selectively concentrating on one thing while ignoring other things.

**Attention deficit hyperactivity disorder (ADHD):** A neurological condition with specific chronic core symptoms including distractibility, disorganized thinking, poor impulse control, mood shifts, forgetfulness and hyperactivity. These symptoms vary in different situations and at different times. Common secondary symptoms include perceptual and emotional immaturity, poor social skills, disruptive behaviors and academic problems. ADHD is believed to affect 3–5% of the population.

**Atypical autism:** A term used in the International Statistical Classification of Diseases and Related Health Problems – Tenth Revision (ICD -10) to describe a condition that differs from autism in terms of either age of onset (an Autistic Disorder diagnosis requires that symptoms are apparent before the age of three) or failure to meet the criteria for autism in all three areas: reciprocal social interaction, verbal and non-verbal communication, and stereotyped behaviors or restricted interests. In the Diagnostic and Statistical Manual of Mental Disorders – Fourth Edition (DSM IV) it is called Pervasive Developmental Disorder – Not Otherwise Specified (PDD NOS).

**Auditory Processing Disorder:** Auditory processing is a term used to describe the brain processes involved in recognizing and interpreting sounds. An auditory processing disorder is impairment in the ability to process or interpret information that is heard. This is not just a problem in understanding words and language, but also in interpreting other sounds in the environment.

**Auditory Integration Training (AIT):** “AIT is an intervention in which the service provider identifies sounds to which the participant is believed to be over- or under-sensitive. Then music with selected high and low frequencies is presented via headphones to the participant. Certain frequencies, such as those to which the participant is over- or under-sensitive, may be completely or partially filtered from the music. In Auditory Processing Training, speech sounds are dilated or expanded (i.e., presented more slowly than in typical speech), and then compressed as the student progresses. Examples: Tomatis method, Berard Method, Earobics, FastForward. The 2002 American Speech and Hearing Association Work Group on AIT, after reviewing empirical research in the area to date, conclude that AIT has not met scientific standards for efficacy that would justify its practice by audiologists and speech-language pathologists.” (Association for Science in Autism Treatment, [www.asatonline.org/resources/autismtreatments.htm#auditory](http://www.asatonline.org/resources/autismtreatments.htm#auditory))

**Augmentative communication:** “Refers to methods of communication to either enhance or replace conventional forms of communication (spoken language). Individuals with significant impairment in communication skills may rely on augmentative communication systems to express their needs, wants, and feelings. There are a variety of augmentative communication systems that are available including gestures, sign language, picture exchange (such as PECS), pointing to pictures, and electronic devices that include voice output. Each system has unique advantages and disadvantages so the ultimate choice of a system should be predicated on a complete evaluation. Such an evaluation should consider the individual’s existing skills, his/her communication needs, and the skills needed to interact with others.” (Association for Science in Autism Treatment, [www.asatonline.org/resources/autismtreatments.htm#augmentative](http://www.asatonline.org/resources/autismtreatments.htm#augmentative)).

**Autistic Disorder (also called autism):** “A neurological and developmental disorder that usually appears during the first three years of life. A child with autism appears to live in his/her own world, showing little interest in others, and a lack of social awareness. The focus of an autistic child is a consistent routine and includes an interest in repeating odd and peculiar behaviors. Autistic children often have problems in communication, avoid eye contact, and show limited attachment to others.” (Yale Medical Group, [www.ymghealthinfo.org/content.asp?pageid=P02566](http://www.ymghealthinfo.org/content.asp?pageid=P02566)).

**Autism Behavior Checklist (ABC):** A screening test for autism that is completed by a parent or a teacher. Screening is used prior to a full and detailed diagnostic assessment. This screening instrument is primarily used for the school aged population with severe disabilities. For more information about screening tools, see [www.health.state.ny.us/community/infants\\_children/early\\_intervention/autism/screenin.htm](http://www.health.state.ny.us/community/infants_children/early_intervention/autism/screenin.htm).

**Autism Observation Scale for Infants (AOSI):** A testing instrument developed in Canada used to measure the autism-related behaviors in infants to assess an infant/toddler’s risk of later developing autism. For more information see the Canadian Autism Intervention Research Network article, [www.cairn-site.com/print/diag03\\_print.html](http://www.cairn-site.com/print/diag03_print.html).

**Autistic savant:** An individual with autism who displays an exceptional skill in some limited field (e.g., music, math). For more information and examples, see [www.wisconsinmedicalsociety.org/savant/whatsnew.cfm](http://www.wisconsinmedicalsociety.org/savant/whatsnew.cfm).

**Autism Spectrum Disorder (ASD):** Autism is often referred to as a “spectrum disorder,” meaning that the symptoms and characteristics of autism can present themselves in a variety of combinations, ranging from mild to severe. The Autistic Spectrum includes Autistic Disorder (AD), Asperger Syndrome, (AS), and Pervasive Developmental Disorder—Not Otherwise Specified (PDD-NOS). Childhood Disintegrative Disorder and Retts Disorder are not usually considered part of the Autistic Spectrum, although they are grouped with them in the Diagnostic and Statistical Manual of the American Psychiatric Association (DSM-IV).

**Aversives:** In non-technical terms, an “aversive” is an unpleasant event or object that a person will actively seek to avoid. Aversive consequences are known as “punishers” when they are given as a consequence of a behavior and this results in the behavior occurring less frequently. The term “punisher” is a technical term used in behavioral therapy and does not imply the use of physical aversives such as hitting, slapping, spanking, or pinching.” Mild verbal disapproval or withholding a desired object or activity might also function as “punishers” for young children. The use of physical aversives is not recommended or appropriate as a part of a behavioral intervention program,

and behavioral intervention programs can be successful without their use. (Clinical Practice Guideline Report of the Guideline Recommendations Autism / Pervasive Developmental Disorders Assessment and Intervention for Young Children (Age 0-3 Years) Sponsored by New York State Department of Health Early Intervention Program, [www.health.state.ny.us/community/infants\\_children/early\\_intervention/autism/ch4\\_pt2.htm](http://www.health.state.ny.us/community/infants_children/early_intervention/autism/ch4_pt2.htm)).

## **B**

**B Vitamins:** The B Vitamins are sometimes used in autism treatment by those advocating a bio-medical approach. A 2003 study entitled Combined vitamin B6-magnesium treatment in autism spectrum disorder by Nye and Brice found that “There is no evidence of an acceptably high level to state that a combination of Vitamin B6 and magnesium improves the behavior or social and communication skills of children and adults with autism.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/documents/abstracts/intervention04.html](http://www.cairn-site.com/documents/abstracts/intervention04.html)).

**Behavior-based programs:** Treatment methods that are based on behavioral science or the principles and methods of Applied Behavior Analysis (ABA). ABA is a well-researched, intensive method of treatment which has been shown to result in great improvement for many people with ASD symptoms. (See ABA)

**Behavior Consultant:** Refers to the person responsible for the design and development of the child’s behavioral plan of intervention and for the ongoing supervision of that plan.

**Behavior Interventionist (BI):** Refers to a person of the parent’s choice, such as a child care worker, who works with the child to achieve goals ideally set out by a behavioral consultant. This person usually works one-on-one with a child and ideally has experience with children with autism spectrum disorder. In B.C., this person must be 19 years or older and have a clear criminal record check.

**Behavioral Plan of Intervention:** A plan developed by a qualified behavioral consultant, with parental input, that promotes developmental growth with both broad and specific goals related to improving daily living skills and increasing independence in a social or school environment. The plan is used by a family in deciding what services are needed and what goals should be reached through those services. According to Ministry of Children and Family Development policy regarding children under 6 with ASD, a behavior plan of intervention must be developed within 90 days of enrolling for autism treatment funding from the Province.

**Berard Auditory Integration Training (called Berard AIT or AIT):** See Auditory Integration Training.

**Best Practice Guidelines:** Recommended practices and methods supported by research findings and generally accepted among experts in the field to be the most effective methods currently available.

## C

**Central Auditory Processing Disorder:** Central Auditory Processing Disorder (CAPD) is a learning disability in which an individual hears sounds but cannot process them correctly into words and language. People with CAPD may have trouble understanding what they hear, acting on it quickly, remembering it for a short or long time, and formulating a verbal response. Speech-language pathologists and audiologists are often involved in the diagnosis and treatment of auditory processing problems.

**Central Coherence:** Individuals with autism spectrum disorders are said to have “weak central coherence”, which is the capacity to integrate information to make sense of one’s environment. People with autism tend to focus on details and process information in a piece-meal fashion, rather than focusing on the context and overall meaning of a situation (They have trouble understanding the gist, the “whole picture”, or the gestalt).

**Central Nervous System:** The control centre of the body, made up of the brain and the spinal cord.

**Cerebellum:** A structure in the lower back part of the brain responsible for functions such as maintaining balance and coordinating and controlling voluntary muscle movement.

**Cerebral Cortex:** The outer layer of gray matter of the brain where higher brain functions take place, such as sensation, voluntary movement, thought, reasoning, and memory.

**Chelation:** A process used to remove heavy metals from the body. Specific products called chelating agents are ingested, heavy metals such as lead, copper, or mercury bind to the product, and they are then eliminated by the body. The purpose of chelation is to reduce the toxic effects of the heavy metal on the body and nervous system. Chelation is a recognized treatment for certain medical conditions, but its use as a treatment for autism is controversial and considered by many to be unsafe. See [www.autismwatch.org](http://www.autismwatch.org).

**Child Psychologist:** A mental health professional, usually with a Ph.D. in Psychology, who administers and interprets psychological tests, evaluates and treats the emotional, developmental, and behavioral disorders of children. Psychologists cannot prescribe medication.

**Childhood Autism Rating Scale (CARS):** A brief rating scale that measures the severity of autism in a child over 2 years of age, based on ratings of fifteen individual behavioral characteristics. The total score may fall in the “non-autistic,” “autistic,” or “severely autistic” ranges. It is normally based on the professional’s own observations of the child’s behavior, although some information may be obtained by interviewing a parent or caregiver. Special training is required to use the CARS.

**Childhood Disintegrative Disorder:** A relatively rare condition that resembles autism occurring in 3- and 4-year-olds characterized by a deterioration of intellectual, social, and language functioning from previously normal functioning. A Pervasive Developmental Disorder although not included as an Autism Spectrum Disorder. For more information, see <http://info.med.yale.edu/chldstudy/autism/cdd.html>.

**Chromosome:** A structure (typically 46 in humans) in the cell nucleus that is the bearer of genes.

**Co-existing Disorders:** In addition to cognitive impairments, individuals with ASD often suffer from multiple psychopathologies. These include impulse-control disorders, psychoses, obsessive-compulsive disorder, seizures, mood and anxiety disorders, and developmental delays. Also called “co-morbid disorders” or “differential diagnosis” or “dual diagnosis.”

**Cognition:** The process of “thinking,” including perception, reasoning, problem solving, and memory.

**Cognitive:** The ability to execute daily tasks in a functional manner. This includes the ability to remember short and long term events, to sequence activities, to reason, to think logically and safely, to categorize, etc.

**Cognitive Behavioral Therapy:** A treatment that combines behavior therapy with cognitive therapy and that works to reduce habitual reactions to challenging situations. CBT assists the person in learning how certain ways of thinking may cause or contribute to feelings of anxiousness, depression or anger that in turn lead to negative behavior. Recent research has indicated that positive results may be seen from using CBT with some people with high functioning autism. This treatment is conducted by a trained psychologist and may be used with verbally fluent children, adolescents, or adults.

**Co-morbidity:** When a person has two or more different conditions at the same time, these conditions are said to be co-morbid. For example, a person can have both Fragile X syndrome and autism, or an Anxiety Disorder and Autism. (See also: Co-existing Disorders).

**Communication Disorder:** Any interference with a person's ability to comprehend or express ideas, experiences, knowledge, or feelings.

**Complementary and alternative medicine (CAM):** A group of diverse medical and health care systems, practices, and products that are not presently considered to be part of conventional medicine (<http://nccam.nih.gov/>).

**Compulsion:** An uncontrollable impulse or urge to perform an act, often repetitively, and usually to avoid or alleviate anxiety.

**Congenital:** A condition that is present from birth.

**Consultation:** Case discussion and evaluation focusing on data, goals, objectives, and therapy techniques to be used.

**Craniosacral Therapy (CST):** Using a soft touch, therapists relieve blockages in the craniosacral system, the membranes and cerebrospinal fluid that surrounds the brain and spinal cord, to improve the functioning of the central nervous system. This therapy is controversial.

**Curriculum:** An organized set of specific course objectives which are often expressed in terms of learning outcomes.

## D

**Daily Schedule:** A structured outline of activities for the day that provides predictability and assists a person in making transitions from one activity to the next. A daily schedule is useful for maximizing "on task" (i.e., engaged) behavior and minimizing inappropriate behavior. A daily schedule may be in a written or a visual form.

**Data Collection:** Data collection refers to the process of gathering specific, objective information about a person's academic or behavioral performance. Data is usually in a quantitative form, such as the number of times a behavior occurs, percentage correct in a task, amount of work completed, etc. Collecting and analyzing data helps an instructor to evaluate a program's effectiveness. By collecting and analyzing data on a systematic basis, an instructor knows when to make changes in both academic and behavioral programs. Data collection has two critical components: information gathering and decision making. Information gathering may involve curriculum-based assessment, observing classroom behavior, grading papers, or parent interviews. The more structured and systematic the process, the more valid the

information. Once the data is collected, the instructor must analyze it and then make decisions based on that information. Decisions might be made regarding changes in curriculum, teaching strategies and techniques, or the management of specific classroom behaviors.

**Developmental:** Relating to the process of growth, maturation, or progressive change in a person as they age.

**Developmentally Delayed (DD):** An informal term used to describe the development of children who are not able to perform the skills that other children of the same age are usually able to perform, or who accomplish developmental “milestones” (sitting, walking, first words, etc.) at a significantly slower pace than average. A preferred term by many instead of the medical term “mental retardation.”

**Developmental Language Disorder:** Children have language disorders when they have problems expressing their thoughts or understanding written material or what others say. The disorder is developmental when it presents itself as the child is growing and is not the result of injury.

**Developmental Disability:** Defined as “measured intellectual functioning of approximately 70 IQ or lower, with onset before age 18, and measured significant limitations in two or more adaptive skill areas.” Eligibility criteria reflect the internationally accepted definition of developmental disability including IQ measurement of 70 [with a standard error of 3-5 points] and the key role adaptive skills play in both the definition and determination of eligibility for services. (Community Living BC, [www.communitylivingbc.ca/glossary.htm](http://www.communitylivingbc.ca/glossary.htm))

**Developmental Level:** “A method of observing how children achieved particular developmental milestones, particularly those related to a child’s ability to stay engaged, express mutual pleasure and attention, to engage in complex problem solving and symbolic play, and to link ideas.” (The Interdisciplinary Council on Developmental and Learning Disorders, <http://icdl.com/forparentsbyparents/glossary/glossarycontent.htm>)

**Developmental Regression:** “A form of autism in which infants, after apparently normal development, start to lose language and other skills. This condition is fairly rare and has not been well described, nor does it have scientifically established standards for diagnosis.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html](http://www.cairn-site.com/glossary/glossary.html))

**Discrete Trials:** “Discrete Trial teaching is a specific method of teaching used to maximize learning. It is a teaching technique or process used to develop many skills, including cognitive, communication, play, social and self help skills. It is just good teaching. The teaching strategy involves:

1. Breaking skills into the smallest steps
2. Teaching each step of the skill intensively until mastered
3. Providing lots of repetition
4. Prompting the correct response and fading the prompts as soon as possible, and
5. Using positive reinforcement procedures.

A therapy session uses repeated trials (or presentations) with each trial having a DISTINCTLY identifiable beginning, middle and end. So the trial is “Discrete” in that it is distinct and it has clearly identifiable steps and a conclusion. Each step of a skill is mastered before new concepts are presented. In Discrete trial teaching, a very small amount of information is given and the student’s response is immediately reinforced or not reinforced. This is different compared with more traditional teaching methods which present large amounts of information with no clearly targeted interactive response on the student’s part.” (Autism Treatment Info, [www.autismtreatment.info/what+is+a+discrete+trial.aspx](http://www.autismtreatment.info/what+is+a+discrete+trial.aspx))

**DSM-IV Diagnostic and Statistical Manual of Mental Disorders:** Published by the American Psychiatric Association used to define all mental health disorders for children and adults also listing known causes of disorders, statistical incidence, prognosis and research regarding treatment approaches. The most recently published edition of this manual is the 4th edition. Other areas of the world use the, International Statistical Classification of Diseases and Related Health Problems, ICD-1.

**Developmental, Individual-Difference, Relationship-Based (DIR) also known as DIR/Floortime:** “A model of addressing a child’s developmental challenges through relationship and affect, focusing on the child’s individual differences, and developmental levels (a child’s ability to stay engaged, express mutual pleasure and attention, to engage in complex problem solving and symbolic play, and to link ideas). The cornerstone of the D.I.R. model is ‘floor time.’” (The Interdisciplinary Council on Developmental and Learning Disorders, <http://icdl.com/forparentsbyparents/glossary/glossarycontent.htm>)

**Diagnostic Overshadowing:** Diagnostic overshadowing is the tendency for caregivers or clinicians to attribute new behaviors to the primary diagnosis (e.g., autism), when in fact they are due to a new condition.

**Differential Diagnosis:** A process of arriving at a diagnosis by assessing the person's symptoms and systematically considering all possible alternative explanations until the most likely cause or diagnosis is identified.

**Dimethylglycine (DMG):** Dimethylglycine or DMG is a non-protein amino acid found naturally in animal and plant cells. Research on humans and laboratory animals has shown that DMG strengthens the immune system. The immune system is dysfunctional in many individuals with autism. Some children and adults with autism have seizures, and there are two published reports of decreases in seizure activity as a result of DMG (New England Journal of Medicine, 1982, 307, 1081-1082; Epilepsia, 1989, 30, 90-93). Considered to be controversial—see [www.quackwatch.org](http://www.quackwatch.org).

**Dopamine:** “A chemical transmitter in the brain similar to adrenaline. Dopamine affects brain processes that control movement, emotional response, and ability to experience pleasure and pain.” (Autism and Asperger Research Reports, <http://aarr.stanford.edu/glossary.htm>)

**Down Syndrome:** “Down syndrome is a naturally occurring chromosomal arrangement that has always been a part of the human condition. The occurrence of Down syndrome is universal across racial and gender lines, and it is present in approximately one in 800 births in Canada.

Down syndrome is not a disease, disorder, defect or medical condition. It is inappropriate and offensive to refer to people with Down syndrome as ‘afflicted with’ or ‘suffering from’ it. Down syndrome itself does not require either treatment or prevention.

The sole characteristic shared by all persons with Down syndrome is the presence of extra genetic material associated with the 21st chromosome. The effects of that extra genetic material vary greatly from individual to individual. Persons with Down syndrome karyotypes may be predisposed to certain illnesses and medical conditions, but that genetic arrangement does not guarantee their development. The same illnesses and conditions are also present in the general population. Timely and accurate diagnosis and appropriate treatment of these illnesses and conditions improves both the length and quality of life, to the same extent as would be expected in the population without Down syndrome. Vigilance on the part of health care practitioners is required to identify and treat any of them if they arise.” (Canadian Down Syndrome Society, [www.cdss.ca/en/About/policies\\_and\\_statements/down\\_syndrome.htm](http://www.cdss.ca/en/About/policies_and_statements/down_syndrome.htm))

**Dx or dx:** Diagnosis

## E

**Echolalia:** “repeating words or phrases heard previously. The echoing may occur immediately after hearing the word or phrase, or much later. Delayed echolalia can occur days or weeks after hearing the word or phrase.” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#E](http://www.cairn-site.com/glossary/glossary.html#E))

**EEG “Electroencephalogram”:** A medical procedure where electrodes are placed on areas on a patient’s head to record brainwaves. It is used to identify seizures.

**Engagement:** A process in which “Children coo, smile, and gesture with their partners. Building intimacy, joy, and a rhythm to interactions. The foundation for more purposeful interactions and learning.” ([www.floor-time.org/ft.php?page=Glossary%20of%20Terms](http://www.floor-time.org/ft.php?page=Glossary%20of%20Terms))

**Environmental Engineering:** Environmental engineering is a formal term for the process of arranging the physical environment to enhance learning and behavior. The physical environment of a setting serves as a complex set of stimuli that may significantly influence appropriate or inappropriate behaviors. Instructors/ consultants can positively affect a person’s performance by paying careful attention to such factors as the basic layout of space, wall displays, traffic patterns, and other more subtle aspects of the physical environment.

**Epidemiology:** This is the study of how a disease affects a population. For example, an epidemiologist might study how prevalent the disease or condition is and how this changes over time, how it is distributed geographically or across age or social groups, etc.

**Epilepsy:** “Epilepsy is not a disease or a psychological disorder, but rather a seizure disorder caused by sudden bursts of electrical energy in the brain.” (Epilepsy Ontario <http://epilepsyontario.org/client/EO/EOWeb.nsf/web/March+is+Epilepsy+Awareness+Month+March+1,+2006?OpenDocument>) “Recent studies suggest that about 7.6% of children with autism had developed epilepsy, and 5% of children had “autistic” features. Furthermore, approximately 25-30% may develop seizures at some point in life.” (Epilepsy Ontario, <http://epilepsyontario.org/client/EO/EOWeb.nsf/b88276df9b41610b85256e5900752659/2331de347d2923fc85256d4e00661d31?OpenDocument&Highlight=2,autism>)

**Epilepsy:** A variety of disorders marked by abnormal electrical discharges in the brain and typically manifested by sudden brief episodes of altered or diminished consciousness, involuntary movements, or convulsions.

**Etiology:** The study of the causes or origins of a disease.

**Executive Functioning:** “Executive function refers to the cognitive skills that are used to solve a problem:

- Representing the problem
- Making a plan to solve the problem
- Executing the plan
- Evaluating the effects of the plan

[...] For example, they may know rules and be able to repeat them, but nonetheless have considerable difficulty putting them into practice. They may also exhibit problem behaviors such as physical aggression.

In many cases, difficulties with executive function may be even greater than one would expect based on a child’s overall developmental level, as represented, for example, by performance on an IQ test. This can be quite frustrating for parents and caregivers, who may expect more from a child, given his or her intelligence, than he or she is able to provide.” (What happens when the development of executive function goes awry? Philip David Zelzo, Ph.D., [www.aboutkidshealth.ca/ofhc/news/SREF/4439.asp](http://www.aboutkidshealth.ca/ofhc/news/SREF/4439.asp))

**Expressive Language:** “Learning to speak, and to use language.” ([www.speech-language-therapy.com/devel2.htm](http://www.speech-language-therapy.com/devel2.htm))

**Extinction:** This is a technical term in behavioral psychology, referring to the withholding of reinforcement for a behavior that has previously been reinforced, in order to eliminate the behavior. The word “extinction” may also refer to the reduction in the frequency of occurrence of the behavior that results from withholding reinforcement.

## **F**

**Facilitated Communication:** “The use of a keyboard by a person with autism. The training begins with simple questions that have predictable answers, and becomes increasingly complex with less physical support from the facilitator. Proponents of this method argued that some people with autism eventually learn to communicate complicated thoughts. It has now been discredited through stringent research. (Canadian Autism Intervention Research Network, [www.cairn.site.com/glossary/glossary.html#F](http://www.cairn.site.com/glossary/glossary.html#F))

**Family Centered/Focus Model:** “Over the past 5 to 10 years, increased emphasis has been placed on enabling and empowering families to manage services and resources for their children with special needs. There is a shift occurring from professionally directed, child focused services to family centered services. Family centered services emphasize the family’s identification of their needs, resources and service requirements.” ([www.oaid.ca/prof\\_guide.html](http://www.oaid.ca/prof_guide.html))

**Floortime:** see Developmental, Individual-Difference, Relationship-Based (DIR) also known as DIR/Floortime.

**Fluency training:** “Is used within other programs to maximize generalization and retention of learned language skills. Fluency techniques can result in increased accuracy and speed of performing speech tasks.” (Autism Society of Canada, [www.autismsocietycanada.ca/approaches\\_to\\_treatment/communication\\_systems/index\\_e.html](http://www.autismsocietycanada.ca/approaches_to_treatment/communication_systems/index_e.html))

**Fragile X Syndrome:** “The most common cause of inherited mental retardation, with an incidence of about 1/1500 in males and 1/2500 in females. The inheritance pattern of the disease is unlike other X-linked disorders, because it shows significant numbers of apparently unaffected male carriers and some clinically affected females. The disease derives its name from the presence of a fragile site on the X chromosome of affected individuals.” (Autism-Resources.com, [www.autism-resources.com/autismfaq-simi.html](http://www.autism-resources.com/autismfaq-simi.html))

**Functional Analysis:** “A functional behavioral analysis begins as an assessment, but includes the added step of systematically altering the antecedents to and consequences of the behavior to determine precisely which are the driving forces behind that behavior.” ([www.polyxo.com/fba/](http://www.polyxo.com/fba/)) In other words, a behavioral assessment identifies the probable causes of a behavior. A functional analysis includes an “experiment” to confirm the causes.

**Functional Behavior Assessment:** A functional behavioral assessment is a systematic process to obtain a precise description of a behavior and the factors that influence it. This usually includes a measure of the frequency of occurrence of the behavior, information about the context in which it occurs, and information about the consequences or other factors that maintain or influence it. The goal is to identify the purpose or function of a person’s behavior(s); to develop and implement a plan to modify variables that maintain problem behaviors; and to teach appropriate behaviors using positive interventions.

**Functional MRI:** “A type of magnetic resonant imaging (MRI) scanning in which scientists can see what parts of the brain are active while a subject is performing a task, such as solving a math problem in the MRI scanner.” (Canadian Autism Intervention Research Network [www.cairn-site.com/glossary/glossary.html#F](http://www.cairn-site.com/glossary/glossary.html#F))

## G

**Gene:** “Originally defined as the physical unit of heredity, it is probably best defined as the unit of inheritance that occupies a specific locus on a chromosome, the existence of which can be confirmed by the occurrence of different allelic forms. Genes are formed from DNA, carried on the chromosomes and are responsible for the inherited characteristics that distinguish one individual from another. Each human individual has an estimated 100,000 separate genes.” (Canadian Autism Intervention Research Network, [www.cairn-ite.com/glossary/glossary.html#G](http://www.cairn-ite.com/glossary/glossary.html#G))

**Generalization:** There are two types of generalization: “Stimulus Generalization” and “Response Generalization”.

Stimulus generalization refers to the application of a skill or behavior learned in one situation to another different but similar situation. Once the skill is acquired, the child begins to demonstrate the skill with a new person (with Dad, although Mom was the teacher), in a new environment (at school, after the skill was learned at home), or in response to different stimuli or cues (identifying real trucks and cars, after being taught to identify pictures of trucks and cars).

Response generalization occurs when a person produces behaviors that are different from but similar to the behaviors that have been taught (e.g. a child spontaneously begins to greet people with “Hi, I’m Justin” after being taught to say “Hi, my name is Justin”). Response generalization can also occur with strategies to reduce behaviors. For example, a program might target the behavior of hitting, and as this is reduced other behaviors such as pushing and kicking may also decline.

**Genetic:** That which relates to genes.

**Genetic syndrome:** A group of physical signs and/or symptoms that occur together in an individual and characterize a particular genetic or chromosome abnormality.

**Gentle Teaching:** “This is a totally non-aversive therapy emphasizing bonding between teacher and student. Developed by John McGee, he contends that persons who persistently hit, bite, kick, scratch, self-stimulate, or withdraw have not bonded with their caregivers and that teachers must help move behav-

iorally-involved persons from a state of emotional distancing to one of meaningful human engagement so that they will find it unnecessary to express their needs through primitive or harmful responses.” Research does not support this therapy as making discernable improvements in student behavior. (Autism Society of PEI, <http://ca.geocities.com/peiautism/glossary.html>) (National Center for Biotechnology Behavior, [www.ncbi.nlm.nih.gov/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list\\_uids=9631207&dopt=Abstract](http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9631207&dopt=Abstract))

**Generalized (or global) Anxiety Disorder:** This disorder is characterized by excessive, prolonged worry and tension about everyday things like work, one’s health, or family and friends.

**Gestalt:** A “Gestalt” is a unified whole that is more than just the sum of its parts. Gestalt language processing refers to learning entire phrases or other language chunks as whole units, versus learning all of the individual words within a chunk and combining them in unique and flexible ways. See also Scripting.

**Gestalt Learner:** Many children with autism are “gestalt learners” of language in that they tend to remember and use entire phrases as “chunks” or whole units.

**Global Delay:** A delay in development across the whole spectrum of abilities, including, cognitive, motor, and language abilities.

**Gluten-free/Casein-free Diet (GF/CF) Diet:** A diet believed by some to help improve the symptoms of autism. It involves elimination from the diet of gluten (a protein found in wheat and other grains) and casein (a protein found in milk). It is believed, although not proven, that the undigested portion of these proteins acts like a chemical in the brain producing symptoms in children with autism. Gluten is found mainly in wheat, oats and barley; casein in milk products. Certain people on the autistic spectrum have found that a diet free from these things can help their concentration and prevent digestive problems.

**Gold standard:** A tool or a practice that is considered to be of the highest standard at the time.

## H

**High Functioning Autism (HFA):** “Individuals with autism who are not cognitively impaired are called ‘high functioning’.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#H](http://www.cairn-site.com/glossary/glossary.html#H))

**Hyperactive:** Abnormally over-active.

**Hyperlexia:** “Ability to read at an early age, but often without linking the words to what the words mean.” (Autism Resources.com, [www.autism-resources.com/autismfaq-glos.html](http://www.autism-resources.com/autismfaq-glos.html))

**Hypersensitive :** Excessive sensitivity to sensations or stimuli

**Hypotonia:** Low muscle tone.

## I

**Incidence:** Also called frequency of occurrence. This term may be used to refer to the number of new cases of an illness or condition occurring in a population in a certain period, normally one year.

**Inclusive Education:** A policy in which all students are educated with their peers, have equitable access to learning and achievement, and are welcomed, valued and supported in the school system. Inclusion promotes participation, friendship and interaction.

**Integration:** (also referred to as Mainstreaming): This refers to the placement and education of students with disabilities in educational programs that also serve students who do not have disabilities.

**Intensive Behavioral Intervention (IBI):** IBI refers to an intensive and comprehensive program of treatment for young children with autism using an systematic Applied Behavioral Analysis approach to teaching. Such programs may also include speech language therapy and other educational programs that are based on similar behavioral approaches. ([www.health.state.ny.us/community/infants\\_children/early\\_intervention/autism/ch4\\_pt2.htm](http://www.health.state.ny.us/community/infants_children/early_intervention/autism/ch4_pt2.htm))

**Individual Educational Plan (IEP):** A plan that identifies the student’s specific learning expectations and outlines how the school will address these expectations through appropriate special education programs and services. It also identifies the methods by which the student’s progress will be reviewed. For students 14 years or older, it must also contain a plan for the transition to postsecondary education, or the workplace, or to help the student live as independently as possible in the community. For specific information about IEP requirements in B.C. schools, see [www.bced.gov.bc.ca/specialed/ppandg/iep\\_1.html](http://www.bced.gov.bc.ca/specialed/ppandg/iep_1.html).

**Intellectual disability:** Synonymous with the older term “mental retardation.” This term refers to significantly below average intelligence (IQ of 70 or less), which is manifested during the developmental period and also coexists with impairments in adaptive behavior.

**IQ (Intelligence Quotient):** Now an out-dated term referring to a person's cognitive ability or level of intelligence, as measured by a standardized test. An intelligence quotient is based on a ratio between a person's "mental age" and "chronological age" but modern intelligence tests no longer calculate intelligence scores in this manner. Standardized tests compare a person's performance to performance of many other people of the same age completing the same tests.

**Intelligence Score:** A measure of a person's performance on a standardized test of intelligence, based on a comparison of the person's performance to that of many others of the same age performing the same tasks.

**Irlen Syndrome:** "Visual perceptual problem identified by Helen Irlen which causes (among other things) black-on-white print to be difficult to read, and which can be alleviated by filtering out portions of the light spectrum with colored glasses." Controversial. See <http://quackwatch.org/01QuackeryRelatedTopics/eyequack.html>. (Autism-Resources.com [www.autism-resources.com/autismfaq-glos.htm](http://www.autism-resources.com/autismfaq-glos.htm))

## J

**Joint attention:** The ability to share with another person the experience of attending to an object or activity. This ability may be shown by following another's gaze, directing another person's attention toward an object of interest, or looking back and forth between an object and another person while sharing an activity.

## K

**Karyotypes:** "The complete set of chromosomes of a cell or organism. The DNA from blood is grown in such a manner that the chromosomes can be visualized under a microscope." (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#M](http://www.cairn-site.com/glossary/glossary.html#M))

**Ketogenic diet:** "Restricted diet used to prevent epileptic seizures" The ketogenic diet is very high in fats and low in carbohydrates and it makes the body burn fat for energy instead of glucose. This diet must only be used under professional direction. (Autism-Resources.com, [www.autism-resources.com/autismfaq-glos.htm](http://www.autism-resources.com/autismfaq-glos.htm))

**Kinesthetic:** The sense that detects bodily position, weight, or movement of the muscles, tendons, and joints

## L

**Language:** The ability to form a thought into a grammatical sequence of words (verbal or written mode). This includes the ability to use an acquired ability receptively and expressively.

**Low Functioning Autism:** “Refers to the condition of children with low Intelligence Quotient (IQ) that is less than a score of 70 who are nonverbal, and have severe autistic symptoms.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#L](http://www.cairn-site.com/glossary/glossary.html#L))

## M

**Mainstreaming:** “Placement of a disabled child with non-disabled peers in a regular classroom.” (Canadian Autism Intervention Research, Network [www.cairn-site.com/glossary/glossary.html#M](http://www.cairn-site.com/glossary/glossary.html#M))

**Magnetic Resonance Imaging (MRI):** “A diagnostic technique that uses the magnetic qualities of body chemicals to produce an image of the brain.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#M](http://www.cairn-site.com/glossary/glossary.html#M))

**Medical home:** The American Academy of Pediatrics describes the medical home as a model of delivering primary care that is accessible, continuous, comprehensive, family-centered, coordinated, compassionate, and culturally effective. (<http://www.medicalhomeinfo.org/>)

**Melatonin:** “A hormone that has a role in the immune system and in controlling one’s sleep cycle. It is sometimes given to children who have trouble sleeping at night. For that reason and others, it has been tried on Autistic children.” (Autism-Resources.com, [www.autism-resources.com/autismfaq-trea.html](http://www.autism-resources.com/autismfaq-trea.html))

**Mental age:** “The intellectual ability of a child, as expressed in years and based on comparisons of the child’s test performance with the performance of other children with a range of chronological ages.” This concept is considered outdated by some psychologists. (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#M](http://www.cairn-site.com/glossary/glossary.html#M))

**Mental Retardation:** This medical term refers to significantly below average intelligence (IQ of 70 or less), which is manifested during the developmental period and also coexists with impairments in adaptive behavior.

**Mobility:** The ability to physically move about and engage in work or exercise.

**MMR vaccine (Measles, Mumps and Rubella):** A vaccine against measles, mumps and rubella, given to children at 18 months and again at around four years. Some parents believe it to be directly responsible for autism developing in their child, but scientific research has not supported this contention.

**Modeling:** The process of learning behavior through the observation of others. A professional will “model” a specific treatment for other(s) on the team to copy and repeat.

**Motor Planning:** “The ability to formulate the idea of an action, organize, and execute it.

- Forming the idea—Developing the idea to achieve the goal (e.g., what do I want or need to do here?)
- Organize—Coordinating the body to prepare for achieving the goal (e.g., deciding what the body has to do and how)
- Execution—Performing the action (e.g., doing it).” ([www.floor-time.org/ft.php?page=Glossary%20of%20Terms](http://www.floor-time.org/ft.php?page=Glossary%20of%20Terms))

**MRI “Magnetic Resonance Imaging”:** “A diagnostic tool in the sense of an X-ray machine or CT [sic] scanner, which like them, creates internal images of the selected parts of the body. Rather than sending X-rays through the body, it builds its image data by testing the magnetism of the body tissue.” (Autism-Resources.com, [www.autism-resources.com/autismfaq-glos.html](http://www.autism-resources.com/autismfaq-glos.html))

## N

**Natural Environment:** The natural environment is defined as the home and other community settings in which children and families normally participate in activities. To the maximum extent appropriate for the needs of the child and family, early intervention services must be provided in natural environments.

**Neurobiological:** An adjective that refers to the branch of the life sciences that deals with the anatomy, physiology, and pathology of the nervous system. ([www.merriam-webster.com/dictionary/](http://www.merriam-webster.com/dictionary/))

**Neurologist:** “A doctor specializing in medical problems associated with the nervous system, specifically the brain and spinal cord.”(Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#N](http://www.cairn-site.com/glossary/glossary.html#N))

**Neurotransmitter:** “A chemical in the brain that transmits messages from one nerve cell to another.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#N](http://www.cairn-site.com/glossary/glossary.html#N))

**Neurotypical:** A slang term used to identify persons with typical neurological development and function from those who have a diagnosis of ASD.

**New variant autism:** “A proposed condition in which children deteriorate over time developing autism and an associated bowel disease. It was suggested that this condition was caused by the MMR vaccine. There is no evidence that this condition exists.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#N](http://www.cairn-site.com/glossary/glossary.html#N))

**NLP “Natural Language Paradigm”:** Note: NLP is also the acronym for something else: “Neuro-Linguistic Programming”, and partly for this reason, “Natural Language Paradigm” has been renamed “Pivotal Response Training.” See Pivotal Response Training.

**Non-Verbal Communication:** Any form of communication that does not involve the use of spoken language. For example, gestures, facial expressions and eye contact, are non-verbal forms of communication.

**Nonverbal Learning Disorder:** Nonverbal Learning Disorder (NLD) (also known as NVLD) “a nonverbal learning disability describes a situation in which the underlying cause of a student’s learning difficulties is believed to be a generalized weakness in the ability to cognitively process nonverbal information. Typically, such a student performs quite well verbally (both receptively or “listening” and expressively or “speaking”) but struggles to understand or remember information which is presented visually. This is not due to poor vision but is related to an assumed weakness in the brain’s ability to fully or efficiently process nonverbal information.” ([www.hopkins.k12.mn.us/Pages/North/LD\\_Research/definitions\\_frame.htm](http://www.hopkins.k12.mn.us/Pages/North/LD_Research/definitions_frame.htm))

## O

**Obsessive-Compulsive Disorder (OCD):** “Obsessions are thoughts or images that are involuntary, intrusive, and anxiety-provoking. Compulsions are impulses to perform a variety of stereotyped behaviors or rituals. OCD is a neurological disorder, cause uncertain.” In OCD, obsessive thoughts and compulsive actions interfere significantly with the individual’s daily life, causing marked anxiety and stress. (Autism Resources.com [www.autism-resources.com/autismfaq-simi.html](http://www.autism-resources.com/autismfaq-simi.html))

**Occupational Performance:** “The ability to choose, organize and effectively and safely perform everyday activities necessary for self-care and participation in educational, leisure, home management, and work activities.” (Occupational Therapists Regulation, College of Occupational Therapists of British Columbia, 1998, p. 1).

**Occupational Therapist (OT):** “Individuals who specialize in the analysis of activity and tasks to minimize the impact of disability on activities of daily living. The therapist then helps the family to better cope with the disorder, by adapting the environment and teaching.” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#O](http://www.cairn-site.com/glossary/glossary.html#O))

**Occupational Therapy (OT):** “Occupational therapy is skilled treatment that helps individuals achieve independence in all facets of their lives. Occupational therapy assists people in developing the “skills for the job of living” necessary for independent and satisfying lives.” In autism the focus is primarily on sensory integration; coordination of movement; and fine motor and self-help skills such as dressing, eating with a fork and spoon, etc. ([www.aota.org/featured/area6/index.asp](http://www.aota.org/featured/area6/index.asp))

**Oppositional Defiance Disorder (ODD):** “According to the DSM-IV, the behaviors seen in oppositional disorder are:

- Violations of minor rules
- Temper tantrums
- Argumentativeness
- Provocative behavior
- Stubbornness.” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#O](http://www.cairn-site.com/glossary/glossary.html#O))

OCD often occurs in association with other neuropsychiatric disorders, such as Attention Deficit Hyperactivity Disorder (ADHD), depression, anxiety disorders, or Tourette Disorder.

## P

**PANTER Form:** A document used by B.C.’s Ministry of Health, Ministry of Children and Family Development and Community Living BC. A form, which must be completed by a pediatrician, neurologist, psychiatrist or registered psychologist. This form confirms that a multidisciplinary assessment has been completed and that your child has autism spectrum disorder.

**Paraprofessional:** These personnel are also referred to as teacher aides, educational or classroom aides. Whether in general education classrooms or special classes, paraprofessionals can provide meaningful support to students with disabilities.

**Perceptual Problems:** Difficulty in interpreting sensory information or making sense of the environment.

**Perseveration:** “Repetitive movement or speech, or sticking to one idea or task that has a compulsive quality to it.”(Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#P](http://www.cairn-site.com/glossary/glossary.html#P))

**Pervasive Developmental Disorder (PDD):** Pervasive Developmental Disorders is an ‘umbrella term’ for a group of developmental disorders which includes Autistic Disorder, Asperger Disorder, Rett Syndrome, and Childhood Disintegrative Disorder. It also includes a “residual category” of Pervasive Developmental Disorder – Not Otherwise Specified (see definition below). This term is used when a person shows some autistic symptoms, but does not fully meet the diagnostic criteria for any of the other four diagnostic categories. The Pervasive Developmental Disorders (also known as Autistic Spectrum Disorders) are all “neurological disorders of unknown cause. The symptoms include diminished ability to understand language and to communicate with and to interact with others. Children with a PDD usually have limited interests and engage in repetitive activities. There may be sensory problems related to perception of sound (hypersensitivity or lowered response).” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#P](http://www.cairn-site.com/glossary/glossary.html#P))

**Pervasive Developmental Disorder, not otherwise specified (PDD-NOS):** “The diagnosis of PDD-NOS is used when there is severe impairment in social interaction and verbal and nonverbal communication skills, or when stereotyped behavior, interests and activities are present, but symptoms do not meet the criteria for other autistic disorders.”(Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#P](http://www.cairn-site.com/glossary/glossary.html#P))

**Physical Therapy (PT):** A treatment of physical disabilities given by a trained physical therapist that includes the use of massage, exercise, etc., to remediate mobility and gait and to modify strength, balance, tone, and posture and help the person improve the use of bones, muscles, joints, and nerves.

**Pica:** The persistent eating of non-food substances. The definition of pica requires that the behavior be developmentally inappropriate and not part of a culturally sanctioned practice. Clay, dirt, ice, sand, animal feces, paint, and hairballs are just a few examples of what children and adults with pica have been known to eat. See also DSM-IV. ([www.psychiatryonline.com/](http://www.psychiatryonline.com/))

**Picture Exchange Communication System (PECS):** “A functional communication training approach that emphasizes teaching students to give a picture of something they desire to another person in exchange for that item. Pioneered by Andrew Bondy and Lori Frost of the Delaware Autistic Program. Considered a kind of augmentative communication.” ([www.autism-resources.com/autismfaq-educ.html](http://www.autism-resources.com/autismfaq-educ.html))

**Pivotal Response Training:** “PRT is a naturalistic behavioral intervention developed by Robert L. Koegel and Laura Schreibman at the University of California in Santa Barbara. Pivotal Response Training (PRT) is a behavioral treatment intervention based on the principles of applied behavior analysis (ABA). PRT aims to increase the generalization of new skills by increasing motivation, including components such as child choice, turn-taking, reinforcing attempts and interspersing maintenance tasks. PRT has been used to develop language skills, play skills and social behaviors in children with autism.” ([www.autism-societycanada.ca/approaches\\_to\\_treatment/other\\_methods/index\\_e.html](http://www.autism-societycanada.ca/approaches_to_treatment/other_methods/index_e.html))

**Positive Behavior Support (PBS):** “Unlike traditional behavioral management, which views the individual as the problem and seeks to “fix” him or her by quickly eliminating the challenging behavior, positive behavioral support (PBS) and functional analysis (FA) view systems, settings, and lack of skill as parts of the “problem” and work to change those. As such, these approaches are characterized as long-term strategies to reduce inappropriate behavior, teach more appropriate behavior, and provide contextual supports necessary for successful outcomes.

PBS and FA can help practitioners and parents understand why the challenging behavior occurs—its function or purpose for the individual. In addition to helping practitioners and families understand the individual with the challenging behavior, PBS and FA also help them understand the physical and social contexts of the behavior. Moreover, PBS and FA provide a framework for helping the child to change challenging behaviors.” (<http://ericec.org/digests/e580.html>)

**Prader Willi:** “A congenital syndrome of unknown cause characterized by short stature, mental retardation, excessive eating and obesity, and sexual infantilism.” ([www.answers.com/topic/prader-willi-syndrome](http://www.answers.com/topic/prader-willi-syndrome))

**Prevalence:** “The proportion of people with a particular condition or disease within a given population at a given time.” For example, the prevalence of autism spectrum disorder is 1 in 165. (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#P](http://www.cairn-site.com/glossary/glossary.html#P)) (BC Children’s Hospital Foundation, [www.bcchf.ca/newscentre/magazine/spring\\_2003/lightning](http://www.bcchf.ca/newscentre/magazine/spring_2003/lightning))

**Processing:** Cognitive operations; “thinking”.

**Prognosis:** The possible outcomes of a condition or a disease and the likelihood that each one will occur.

**Proprioceptive:** Sense of body awareness created by interpreting the information from the muscles and joints.

## R

**Receptive Language:** The ability to understand spoken language.

**Registry of Service Providers for the Autism Funding (RASP):** Under Age 6 Program: The list identifies service providers who have been accepted to be placed on a registry to provide treatment services for children with autism spectrum disorder who are 6 or younger and is maintained by ACT – Autism Community Training. For families with children under age 6 with ASD they must select service providers from this list if they are paying for the service using their Autism Funding.

**Relationship Development Intervention (RDI):** “RDI is a parent-based clinical treatment program where parents are provided the tools to effectively teach Relationship Intelligence. According to Dr. Steven Gutstein, founder of RDI, Relationship Intelligence includes emotional referencing, social coordination, declarative language, flexible thinking, relational information processing, and foresight and hindsight.” ([www.judevine.org/programs/rdi.html](http://www.judevine.org/programs/rdi.html))

**Receptive Language:** The ability to understand spoken language.

**Regulation:** “The state of being controlled or governed.” ([wordnet.princeton.edu/perl/webwn](http://wordnet.princeton.edu/perl/webwn)) In Sensory Integration Therapy terms, a state of regulation exists “when all of the sensory information being received by the body (e.g., balance, body position hearing, sight, touch) are being “interpreted correctly by the brain and result in a state of calmness and an ability to attend to others as well as the environment.” ([www.flooritime.org/ft.php?page=Glossary%20of%20Terms](http://www.flooritime.org/ft.php?page=Glossary%20of%20Terms))

**Resident (British Columbia):** The Medicare Protection Act definition of a “resident” means “a person who:

1. Is a citizen of Canada or is lawfully admitted to Canada for permanent residence.
2. Makes his or her home in British Columbia.
3. Is physically present in British Columbia at least 6 months in a calendar year.
4. Is deemed under the regulation to be a resident (does not include a tourist or visitor to British Columbia).” ([www.hlth.gov.bc.ca/msp/infoben/eligible.html#who](http://www.hlth.gov.bc.ca/msp/infoben/eligible.html#who))

**Rett Syndrome/ Rhett Syndrome:** “A childhood neurodevelopmental disorder characterized by normal early development followed by loss of purposeful use of the hands, distinctive hand movements, slowed brain and head growth, gait abnormalities, seizures, and mental retardation. It affects females almost exclusively.” ([www.ninds.nih.gov/disorders/rett/detail\\_rett.htm#55513277](http://www.ninds.nih.gov/disorders/rett/detail_rett.htm#55513277))

**Reverse Mainstream:** This occurs when neuro-typical peers attend a special education classroom for an activity. This allows the special education students an opportunity to engage with their neuro-typical peers without leaving their highly structured and individualized educational settings.

**Risperdal (generic name: Risperidone):** “A drug prescribed to treat problem behaviors such as aggression, self-injury, and irritability in children, adolescents, and adults with autism. The drug works by reducing abnormal excitement in the brain.” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#R](http://www.cairn-site.com/glossary/glossary.html#R))

**Respite Care:** Respite is temporary, short-term care provided to individuals with disabilities. Services can be delivered in the individual’s home for a few hours or in an alternate licensed setting for an extended period of time. Respite care allows caregivers to take a break in order to relieve and prevent stress and fatigue.

## S

**SCERT’s Model:** “Developed by Dr. Barry M. Prizant (a clinical scholar, researcher and consultant to families of young children with Autistic Spectrum Disorders and related communication disabilities). SCERTS is an approach used for enhancing communication and socioemotional abilities for young children with ASD. SCERTS focuses on social communication, emotional regulation and transactional support, and is a framework and guide to address the core challenges experienced by children with ASD.” (Autism Society of Canada, [www.autismsocietycanada.ca/approaches\\_to\\_treatment/other\\_methods/index\\_e.html](http://www.autismsocietycanada.ca/approaches_to_treatment/other_methods/index_e.html))

**Secretin:** A hormone that controls digestion, increasing the volume and bicarbonate content of secreted pancreatic juices. Despite anecdotal reports that secretin is helpful in autism treatment, a number of scientific studies has found secretin to be ineffective in autism. See [www.quackwatch.org/04ConsumerEducation/News/secretin.html](http://www.quackwatch.org/04ConsumerEducation/News/secretin.html).

**Selective Serotonin Reuptake Inhibitor (SSRI):** “A class of drugs used as antidepressants. Functionally, they increase the levels of serotonin in the body. These drugs can be dangerous if mixed with other drugs such as other antidepressants, illicit drugs, some antihistamines, antibiotics and calcium-

channel blockers. Some examples of SSRIs are Prozac, Zoloft, Paxil.” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#S](http://www.cairn-site.com/glossary/glossary.html#S))

**Self-Injurious Behavior (SIB):** Causing harm to your own body, e.g. hitting or pinching oneself.

**Semantic-Pragmatic Disorder (or Semantic-Pragmatic Language Impairment):** Children with Semantic-Pragmatic Language Disorder have difficulties understanding the meaning of words and sentences (semantics) and difficulties with the social use of language (pragmatics). They often have particular problems in understanding abstract words and concepts or figures of speech, and getting the “main idea” in a sentence or conversation. They may have problems with turn-taking in conversations, reading the non-verbal cues of their conversational partners, or maintaining a topic or changing topics appropriately. There is some debate about whether Semantic-Pragmatic Language Disorders are part of the Autistic Spectrum or purely disorders of communication.

**Sensorimotor:** “Pertaining to brain activity other than automatic functions (respiration, circulation, sleep) or cognition. Sensorimotor activity includes voluntary movement and senses like sight touch and hearing.” (Autism-Resources.com, [www.autism-resources.com/autismfaq-glos.html](http://www.autism-resources.com/autismfaq-glos.html))

**Sensory Hypersensitivities:** Highly sensitive to stimulus being received via the senses.

**Sensory Defensiveness:** “A condition in which an individual is extremely sensitive to light touch. Theoretically, when the tactile system is immature and working improperly, abnormal neural signals are sent to the cortex in the brain which can interfere with other brain processes. This, in turn, causes the brain to be overly stimulated and may lead to excessive brain activity, which can neither be turned off nor organized. This type of over-stimulation in the brain can make it difficult for an individual to organize one’s behavior and concentrate and may lead to a negative emotional response to touch sensations.”([www.autism.org/si.html](http://www.autism.org/si.html))

**Sensory Diet:** A plan for sensory input at various times throughout the day to assist in the regulation of optimum levels of alertness and for remediation of developmental issues and sensory processing. (ref: Sensory Integration Theory and Practice, 2nd edition)

**Sensory Integration Theory:** “Sensory integration theory provides the understanding of the nervous system and the behaviors that are often attempted by the individual to cope with or adapt to nervous system disorganization.” (<http://216.194.201.208/terrytown/sensoryintegration.net/>)

**Sensory Modulation:** “When the senses work together. Each sense works with the others to form a composite picture of who we are physically, where we are, and what is going on around us. Sensory modulation is a neurological function that is responsible for producing this composite picture. It is the organization of sensory information for on-going use.” (Coping.org, <http://coping.org/intervention/sensory/sensorymod.htm#modulation>)

**Sensory Processing:** Can refer to specific tests of sensory processing, observations of a child’s sensory function, or the updated diagnostic label of “Sensory Processing Disorder” which includes a wider range of children and adults than those diagnosed with ASD. For more information on Sensory Processing Disorder see the website of the Sensory Processing Disorders Foundation at ([www.spdnetwork.org/aboutspk/defining.html](http://www.spdnetwork.org/aboutspk/defining.html)).

**Sensory-based Behaviors:** Behavior that is a result of a child’s attempt to meet a sensory need.

**Serotonin:** “A neurotransmitter, i.e. brain chemical that plays a part in communication within the nervous system. It has been noted that the level of serotonin measured in autistic people is sometimes higher than that in typical people. Some of the drugs that have been tested for use with autistic people have been drugs already known to affect serotonin.” (Autism-Resources.com, [www.autism-resources.com/autismfaq-glos.html](http://www.autism-resources.com/autismfaq-glos.html))

**Shared Attention and Meaning:** Also called Joint Attention, child and play partner are both focused on the same theme, object, and/or idea.

**Social Stories:** “Social Stories were developed in 1991 by Carol Gray as a tool for teaching social skills to children with ASD. They focus on developing the ability to recognize the feelings, points of view or plans of others. Stories are developed to meet the child’s individual needs based on their anxieties, their fears or the difficulty of particular situations. The stories help the child to develop appropriate responses to real life situations.” (Autism Society of Canada [www.autismsocietycanada.ca/approaches\\_to\\_treatment/other\\_methods/index\\_e.html](http://www.autismsocietycanada.ca/approaches_to_treatment/other_methods/index_e.html))

**Special Education:** Special learning programs tailored to meet the needs of children with learning difficulties, physical impairments etc.

**Spectrum Disorder:** A disorder that covers a range from mild to severe.

**Speech-language pathologist:** “Individuals who specialize in the area of human communication. In autism the focus is on communication, not speech, to increase the child’s ability to interact and to understand their environment.” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#S](http://www.cairn-site.com/glossary/glossary.html#S))

**Speech/Language Therapy:** A planned program to improve and correct speech and/or language or communication problems, including verbal and non-verbal communication, in people requiring specific intervention.

**Stereotypy(ies):** “The constant repetition of certain apparently meaningless movements or gestures, e.g., rocking or head banging.” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#S](http://www.cairn-site.com/glossary/glossary.html#S))

**Stereotyped behaviors:** Behaviors displayed by an individual (with autism, for example) that are repeated many times.

**Stim:** “Short for ‘self-stimulation’, a term for behaviors whose sole purpose appears to be to stimulate ones senses. Many people with autism report that some ‘self-stims’ may serve a regulatory function for them (i.e., calming, increasing concentration, or shutting out an overwhelming sound).” (Canadian Autism Intervention Network, [www.cairn-site.com/glossary/glossary.html#S](http://www.cairn-site.com/glossary/glossary.html#S))

**Syndrome:** “Generally, a number of characteristics, features, events or behaviors that seem to go with each other or are believed to be coordinated or interrelated in some way. More specifically, in medicine and clinical psychology, a cluster of symptoms that occur together and can be taken as indicative of a particular disease or other abnormality.” ([www.bbbautism.com/general\\_beginners\\_guide\\_10\\_24\\_01.htm](http://www.bbbautism.com/general_beginners_guide_10_24_01.htm))

## T

**Tactile Dysfunction:** Dysfunction in “the tactile system can be seen in withdrawing when being touched, refusing to eat certain ‘textured’ foods and/or to wear certain types of clothing, complaining about having one’s hair or face washed, avoiding getting one’s hands dirty (i.e., glue, sand, mud, finger-paint), and using one’s finger tips rather than whole hands to manipulate objects. A dysfunctional tactile system may lead to a misperception of touch and/or pain (hyper- or hyposensitive) and may lead to self-imposed isolation, general irritability, distractibility, and hyperactivity.” ([www.autism.org/si.html](http://www.autism.org/si.html))

**Tactile Defensiveness:** “Is a condition in which an individual is extremely sensitive to light touch. Theoretically, when the tactile system is immature and working improperly, abnormal neural signals are sent to the cortex in the brain which can interfere with other brain processes. This, in turn, causes the brain to be overly stimulated and may lead to excessive brain activity, which can neither be turned off nor organized. This type of over-stimulation in the brain can make it difficult for an individual to organize one’s behavior and concentrate and may lead to a negative emotional response to touch sensations.” ([www.autism.org/si.html](http://www.autism.org/si.html))

**Tactile System:** “The tactile system includes nerves under the skin’s surface that send information to the brain. This information includes light touch, pain, temperature, and pressure. These play an important role in perceiving the environment as well as protective reactions for survival.” ([www.autism.org/si.html](http://www.autism.org/si.html))

**TEACCH (Treatment and Education of Autistic and related Communication-handicapped Children) Tactile System:** A state-wide program in North Carolina serving individuals with Autism across the age span and across agencies. “The major priorities include centering on the individual, understanding autism, adopting appropriate adaptations, and a broadly-based intervention strategy building on existing skills and interests.” TEACCH uses a structured teaching approach, which involves “organizing the physical environment, developing schedules and work systems, making expectations clear and explicit, and using visual materials”. ([www.teacch.com/](http://www.teacch.com/)) TEACCH is a project of the University of North Carolina.

**Theory of Mind:** “The ability to understand that others have beliefs, desires, and intentions that are different from one’s own.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#T](http://www.cairn-site.com/glossary/glossary.html#T))

**Tourette Syndrome:** “Both multiple motor and one or more vocal tics present with tics occurring many times a day, nearly daily, over a period of more than one year. The onset is before age 18 and the disturbance is not due to direct physiological effects of a substance or a general medical condition. The disturbance causes marked distress or significant impairment in social, occupational, or other important areas of functioning.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#T](http://www.cairn-site.com/glossary/glossary.html#T))

**Transition:** The process of bridging the time and environments between two settings, programs, or life situations. Also, moving or preparing to move from one activity to another.

**Tuberous sclerosis:** Tuberous sclerosis (TSC) is a genetic disease that causes benign tumors to grow in the brain and on other vital organs such as the kidneys, heart, eyes, lungs, and skin. It commonly affects the central nervous system. In addition to the benign tumors that frequently occur in TSC, other common symptoms include seizures, mental retardation, behavior problems, and skin abnormalities. TSC may be present at birth, but signs of the disorder can be subtle and full symptoms may take some time to develop. It occurs in 1 in 6000 births. Autism is sometimes associated with tuberous sclerosis. ([www.ninds.nih.gov/disorders/tuberous\\_sclerosis/detail\\_tuberous\\_sclerosis.htm](http://www.ninds.nih.gov/disorders/tuberous_sclerosis/detail_tuberous_sclerosis.htm))

## V

**Verbal Behavior:** “An applied behavior analysis approach that is used to teach communication. AVB employs the many effective procedures based on ABA (e.g., reinforcement, prompting, fading, task analysis). A major feature is the use of Skinner’s (1957) analysis of the functions of language (e.g., to request, to name things, to refer to things not immediately present), which departs from a developmentally based language approach. The functional analysis of language is a major approach for teaching communication skills to children with autism. ( John T. Neisworth & Pamela S. Wolfe, *The Autism Encyclopedia*, Paul H. Brookes Publishing Co. Inc. 2005)

**Vestibular System:** “The vestibular system refers to structures within the inner ear (the semi-circular canals) that detect movement and changes in the position of the head [...] Some children may be hypersensitive to vestibular stimulation and have fearful reactions to ordinary movement activities (e.g., swings, slides, ramps, inclines) [...] As a result, they seem fearful in space. In general, these children appear clumsy. On the other extreme, the child may actively seek very intense sensory experiences such as excessive body whirling, jumping, and/or spinning. This type of child demonstrates signs of a hypo-reactive vestibular system; that is, they are trying continuously to stimulate their vestibular systems.”(Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#V](http://www.cairn-site.com/glossary/glossary.html#V))

**Visual Processing:** Taking visual information from the environment, accurately interpreting the visual information, and using the information to make decisions for ideas and actions. Issues of visual processing are many and varied, and require a very specific diagnosis. The ability to organize visual information and use it for performance in the environment (e.g., when throwing a softball to a friend, know how far away the friend is and how hard and how far to throw the ball).

**Visio-Spatial Skills:** These are cognitive abilities that relate to the way you perceive the objects and surroundings of your environment.

## W

**Weighted Vest:** “The concept of the weighted vest is based on the technique of deep pressure. Deep pressure is used to assist the child to self-calm and relax so that sensory stimulus can be processed. The use of a weighted vest is thought to provide the child with unconscious information from the muscles and joints. Children who are easily distracted, hyperactive and lacking in concentration are said to respond positively to the additional weight a vest provides.” (Autism Society of Canada, [www.autismsocietycanada.ca/approaches\\_to\\_treatment/sensory\\_integration\\_therapies/index\\_e.html](http://www.autismsocietycanada.ca/approaches_to_treatment/sensory_integration_therapies/index_e.html))

**The Wilbarger Protocol:** “Some children have a tendency to respond to certain harmless sensations as if they were dangerous or painful. This is called sensory defensiveness (SD). The child with SD may misperceive the world as dangerous, alarming or at the very least irritating. When left untreated, SD can have a negative influence on every aspect of life. The protocol uses frequent application of firm/deep pressure touch input to various parts of the body. This is followed by gentle joint compression.” (Autism Society of Canada, [www.autismsocietycanada.ca/approaches\\_to\\_treatment/sensory\\_integration\\_therapies/index\\_e.html](http://www.autismsocietycanada.ca/approaches_to_treatment/sensory_integration_therapies/index_e.html))

**Wechsler Intelligence Scale for Children (WISC-III):** “An individually administered clinical instrument for assessing the intellectual functioning of children.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#W](http://www.cairn-site.com/glossary/glossary.html#W))

**Wechsler Preschool and Primary Scale of Intelligence- Revised (WPPSI-R):** “A clinical instrument similar to the WISC-III and the WAIS-R, except for children ages 3-0 to 7-0.” (Canadian Autism Intervention Research Network, [www.cairn-site.com/glossary/glossary.html#W](http://www.cairn-site.com/glossary/glossary.html#W))

