Glossary of Flooring Terms

Carpet, Resilient, Installation, & Acronyms By: Lynne Peer, Peer Resource Group

*Very import terms are in a box

Carpet Terms

Abatement – The removal of a substance in order to meet certain safety or environmental requirements, i.e., asbestos abatement.

Acidic - Any material having a pH of less than 7.0 in water.

Alkaline - Any material having a pH greater than 7.0 in water.

Anti-Static - The ability of a fabric or additive to disperse electrostatic charges and prevent the buildup of static electricity.

Asbestos - A nonmetallic mineral fiber that is nonflammable. The fiber is woven into fabrics and used for theater curtains and industrial uses where flameproof materials are needed. The cut back adhesive could contain asbestos if it were used under a vinyl asbestos tile and needed to be abated.

Backing - Material that forms the back of the carpet, regardless of the type of construction. Primary back - In a tufted carpet, the material into which surface yarns are tufted. Secondary back - Any material attached or adhered to the primary back.

Beam Tufting – Beams are used to hold yarn as it is wound onto them in order to be tufted into carpet. They are like huge spools.

Beaming- The operation of winding warp yarns onto a large reel (beam) usually in preparation for tufting. Also called warping.

Beck - A vessel for dyeing fabric in rope form, consisting primarily of a tank and a reel to advance the fabric.

Bleeding - Loss of color by a fabric or yarn. In printing a color may bleed onto another color. Fabrics that bleed can cause staining of white or light shade fabrics in contact with them while wet.

Blending - The combination of staple fibers of different physical characteristics or color to assure a uniform distribution of these fibers throughout the yarn.

Broadloom - A term of measurement, referring to any carpet made 54 inches or wider, as distinguished from narrow widths of 27 or 36 inches. The term does not define any particular quality, construction, or style, usually refers to 12-foot or 15- foot widths.

Continuous Filament - Continuous strand of synthetic fiber extruded in yarn form, without the need for spinning which all natural and staple fibers require.

Class I and Class II – Flammability ratings that are given to carpet after a series of tests to determine flame spread. Depending on occupancy use and local, state or other building or fire codes, carpets for commercial use may require panel tests classifications of either I or II, most specifically for carpet installed in corridors of healthcare facilities, day care centers, dormitories, apartment buildings and correctional facilities.

• Class I is considered to be a minimum rating of 0.45 watts per square centimeter.

• Class II is considered to be a minimum rating of 0.22 watts per square centimeter or greater.

Most codes require only flooring radiant panel testing for carpet to be installed in corridors and exit ways, and the type of institution will determine whether Class I or Class II is appropriate.

Crimping - Processing yarn, usually by heat or pressure, to fix a wavy texture and increase bulk.

Crocking – The transfer of color from a fabric onto another substance.

Cut-Pile - A pile surface obtained by cutting the loops of yarn in a tufted or woven carpet.

Delamination – A condition that occurs when the secondary back or the attached cushion separates from the primary backing of the carpet.

Delustering - Subduing or dulling the natural luster of a textile material by chemical or physical means. The term often refers to the use of titanium dioxide or other white pigments as delustrants in textile materials.

Denier - A weight-per-unit measure of any linear material. In the carpet industry, it is the weight in grams of 9,000 meters of fiber or yarn. The higher the number, the larger the yarn or filament. Typical yarn ranges is from 1200d to 6000d. In the U.S., the denier is used for numbering filament yarns (except glass), man-made fiber staple (but not spun yarns), and tow. Typical denier per filament range is 18 – 30 dpf. (See Denier Per Filament). In most countries outside the U.S., the denier system has been replaced by the Tex systems.

Denier per filament (dpf) - The denier of an individual continuous filament or an individual staple fiber if it were continuous. In filament yarns, it is the yarn denier divided by the number of filaments.

• **Yarn Denier** - The denier of a filament yarn. It is the product of the denier per filament and the number of filaments in the yarn.

Dimensional Stability - The ability of textile material to maintain or return to its original geometric configuration.

Drawing - The process of attenuating or increasing the length per unit weight of laps, slivers, slubbings, or rovings. The hot or cold stretching of continuous filament yarn to align and arrange the crystalline structure of the molecules in order to achieve improved tensile properties.

Dyeing - The process of coloring materials; impregnating fabric with dyestuff.

- Acid Dyeable and Cationic Dyeable Nylons The dyeabilities of nylon are most commonly referred to as acid dyeable (light, medium or deep) and cationic (basic) dyeable. These terms refer to the major classes of dyes used to dye the fibers and have nothing to do with whether the fiber is Nylon 6 or Nylon 6,6. Both types of nylon can be made either acid dyeable or cationic (cat) dyeable; however, unless the nylon has been modified, it will be acid dyeable.
- Acid Dyeable Nylon: This nylon is the most common and it contains positively charged sites that attract dye. As with magnetic fields, opposite charges attract and like charges repel. In order for the positive site on a fiber to attract a dye, the dye must be carrying a negative charge, and acid dyes carry a negative charge.

- **Solution Dyed:** Extruded synthetic yarn from a colored solution; the filament is impregnated with pigment.
- Stock Dyed: Fiber dyed before spinning.
- Yarn Dyed: Yarn dyed before being manufactured into carpet.
- **Piece Dyeing:** Carpet dyed "in a piece" in a large beck of dyestuffs and water after tufting but before other finishing processes.
- **Cross Dyeing:** Method of dyeing fabrics with dyestuffs which have different affinities for different types of yarn, for example, a barber pole might be an acid dyed ply and a cationic dyed ply.
- **Space Dyeing:** Process whereby different colors are "printed" along the length of the yarn before it is manufactured into carpet.
- **Continuous Dyeing:** The process of dyeing carpet in a continuous production line, rather than piece dyeing separate lots. Most often done on Kuster continuous dyeing equipment that flows on dyestuffs, as distinguished from submerging carpet in separate dye becks.

Dye Sites - Functional groups within a fiber that provide sites for chemical bonding with the dye molecule. When nylon is formed, the polymer has naturally occurring dye sites present in the molecular structure. During dyeing the fiber is heated in boiling water (beck dyeing) or a steam atmosphere (continuous or space dyeing) causing the fiber's structure to open, thus allowing the dye molecules to fuse into the nylon.

Edge Ravel – A condition in installed carpet when the edges begin to ravel at the seams. Typically caused by inadequate amount of seam sealer.

Fastness - Resistance to fading; the property of a dye to retain its color when the dyed material is exposed to conditions or agents such as light, perspiration, atmospheric gases, or washing that can remove or destroy the color. A dye may be reasonably fast to one agent and only moderately fast to another. Degree of fastness of color is tested by standard procedures. Textile materials often must meet certain fastness specifications for a particular use, typically 4 on Grey scale (AATCC-8).

Fiber - A unit of matter, either natural or man-made, which forms the basic element of fabrics and other textile structures. A fiber is characterized as having a length at least 100 times its diameter or width. The term refers to units that can be spun into yarn or made into a fabric by various methods including weaving, knitting, braiding, felting, and twisting. The essential requirements for fibers to be spun into yarn include, a length of least 5 millimeters, flexibility, cohesiveness, and sufficient strength. Other important properties are elasticity, fineness, uniformity, durability, and luster.

Filament - A fiber of an indefinite or extreme length such as found naturally in silk. Man-made fibers are extruded into filaments that are converted into a filament yarn, staple, or tow.

Flammability Tests - Many procedures have been developed for assessing the flame resistance of textiles.

Frieze: A term applied when the pile of a velvet, plush, velour, or other pile fabric is uncut. Frieze carpet features extremely heavy texture obtained by high turns per inch twist or an unbalanced twist of the yarns, i.e., 4 x 6 twist. This type carpet of highly twisted yarns is normally plied and heat set, thereby creating a kinked or curled yarn effect.

Fuzzing: Hairy effect on fabric caused by snagging or breaking; or by fibers slipping out of yarn or contour in either service or wet cleaning. Carpet of continuous filament yarn is fuzzed by snagging and breaking.

Gauge/Pitch: The number of ends of surface yarn counting across the width of carpet. In woven carpet, pitch is the number of ends of yarn in 27 inches of width, e.g. 217 divided by 27=8 ends per inch. In tufted carpet, gauge also means the number of ends of surface yarn per inch counting across the carpet e.g. 1/8 gauge = 8 ends per inch. To convert gauge to pitch, multiply ends per inch by 27. E.g. 1/10 gauge is equivalent to 270 pitch, or 10 ends per inch x 27 1/8 gauge is 8 ends of yarn per inch x 27= 216 pitch.

Greige Goods- (Pronounced "gray" goods) - Term designating carpet just off the tufting machine and in an undyed or unfinished state.

Heat Setting- A process that locks twist in a yarn. This is accomplished by heating the yarn to a temperature that loosens the bonds between the molecules. Then new bonds are formed as the yarn cools which gives the yarn "memory." The three types of heat setting are Autoclave, Superba and Suessen.

Jacquard - A system of weaving which utilizes a highly versatile pattern mechanism to permit the production of large, intricate designs. The weave pattern is achieved by a series of punched cards. Each card perforation controls the action of one warp thread for the passage of one pick. The machine may carry a large number of cards depending upon the design, because there is a separate card for each pick in the pattern.

Kusters Dyeing Range - Continuous dye range for carpets. The unit wets the carpet, applies dyes and auxiliary chemicals, fixes the dyes in a steamer, and washes and dries the carpet in one pass through the range.

Latex - A milky, rubbery fluid found in several seed plants, it is used to seal the tufts of carpet in the backing substance. It's used on tufted and woven product to lock the yarn into the primary backing and then adhere the primary backing to the secondary backing.

Level Loop - A term describing a tufted or woven carpet with uncut or equal length, loops composing the pile surface.

Lightfastness - The degree of resistance of dyed materials to the color-destroying influence of sunlight. Two methods of testing are in use: 1) exposure to sunlight, either direct or under glass, and 2) accelerated testing in a laboratory apparatus equipped with any of several types of artificial light sources.

Luster - The quality of shining with reflective light. The term is frequently associated with the adjectives bright or dull to distinguish between varieties of man-made fibers.

Metallic Fiber - A manufactured fiber composed of metal, plastic-coated metal, metal-coated plastic, or a core completely coated by metal. Metallic fiber in carpet is sometimes is used to reduce buildup of static electricity.

Nylon Fiber - A manufactured fiber in which the fiber-forming substance is any long chain synthetic polyamide having recurring amide groups (-NH-CO-) as an integral part of the polymer chain. The two principal nylons used in carpet are Nylon 6,6, which is polyhexamethylenediamine adipamide, and Nylon 6, which is polycaprolactam.

- Nylon 6,6 is so described because each of the raw materials, hexamethylenediamine and adipic acid, contains six carbon atoms. In the manufacturing of Nylon 6,6, these materials are combined, and the resultant monomer is then polymerized. After polymerization, the material is hardened into a translucent ivory-white solid, which is cut or broken into fine chips, flakes, or pellets.
- Nylon 6 was developed in Germany where the raw material had been known for some time. It was not until Nylon 6,6 was developed in the U.S. that work was initiated to convert caprolactam into a fiber. The process for Nylon 6 is simpler in some respects than that for Nylon 6,6. Nylon 6,6 or 6 pellets are extruded through a spinneret while in the molten state to form filaments that solidify quickly as they reach the cooler air. The

filaments are then drawn to orient the long molecules from a random arrangement to an orderly one in the direction of the fiber axis. The drawing process gives elasticity and strength to the filaments.
Characteristics: Although the properties of the nylon described above vary in some respects, they all exhibit excellent strength, flexibility, toughness, elasticity, abrasion resistance, wash ability, ease of drying, and resistance to attack by insects and microorganisms.

Needle punching - Layers of batts of fibers are needled into a core, or scrim, fabric to form, a felted or flat-textured padding or material. Fiber pads that are common today are needlepunched. (Shaw's Endurance pad)

Ozone Fading - The fading of a dyed textile material caused by atmospheric ozone. Coastal areas are most affected by ozone fading, and ozone usually affects blue dyes first.

Pile - The visible ends of yarn, whether cut or looped, that form the wear surface of carpet and rugs.

Pile Height - The height of pile measured from the surface of the back to the top of the pile, not including the thickness of the back.

Pilling - The condition of certain fibers in which strands of the fiber separate and become knotted with other strands, causing a rough, spotty appearance. Pilled tufts should never be pulled from carpet, but may be cut off with sharp scissors at the pile surface.

Plasticizer - 1) A chemical added to polymers and resins to impart flexibility, workability, or stretch ability. 2) A bonding agent that acts by solvent action on fibers.

Ply - The number of single yarns twisted together to form a finished yarn.

Printing - A process for producing a pattern on carpet by any of a number of printing methods. The color usually in the form of a paste is deposited onto the surface that is then usually treated with steam, heat or chemicals for fixation. Various types of printing are

- **Direct printing** a process wherein the colors for the desired designs are applied directly to the white goods, as distinguished from discharge printing and resist printing.
- **Heat transfer printing** a method of printing fabric of polyester or other thermoplastic fibers with disperse dyes.
- **Rotary screen printing** a combination of roller and screen printing in which a perforated cylindrical screen is used to apply color. Color is forced from the interior of the screen onto the cloth.
- Injection printing a print process that uses individual jets to inject color into the pile surface. This process is considered to be superior to all other carpet printing systems.

Rows - Rows of tufts counting lengthwise in one inch of carpet.

Selvage - The edge of a carpet finished so that it will not ravel or require binding or hemming.

Serging - Finishing the edge of a carpet by oversewing rather than binding.

Shading - An apparent change of color in carpet pile caused as light is reflected in different ways when pile fibers are bent; not a defect, but a characteristic especially of cut pile fabrics.

Shearing - The process in manufacturing in which carpet is drawn under revolving cutting blades.

Spinneret - A metal disc containing numerous minute holes used in yarn extrusion. The spinning solution or melted polymer is forced through the holes to form the yarn filaments.

Spun Yarn - A yarn consisting of fibers of regular or irregular staple length usually bound together by twist.

Staple - Natural fibers or cut fibers from filaments. Man-made staple fibers are cut to a definite length from 8 inches down to about 1-1/2 that are then put into a spinning system and made into yarn. The term staple (fiber) is used in the textile industry to identify natural or cut length man-made fibers.

Stuffer Box - A mechanism for crimping or texturizing, in which a fiber bundle or yarn is jammed against itself, causing it to crimp.

Texture – A non-uniform surface pile that can be created by a) different pile heights, b) high twist, or c) unbalanced twist.

Thermoplastic - The term applied to true man-made fibers describes their tendency to soften at higher temperatures.

Tow - A large strand of continuous man-made fiber filaments without twist collected in loose, rope like form, usually held together by crimp. Tow is the form which most man-made fiber reaches before being cut into staple.

Tuft Bind – A condition that exists when there is an adequate amount of latex on the back of the carpet to encapsulate the tufts and prevent them from being pulled out of the carpet. This helps determine the ability of the carpet to withstand zippering and snags. The tuft bind test involves the force required to pull a tuft from the carpet, measured in pounds. Loop pile carpet's minimum average value is 6.0 pounds of force. Some specifications may have tuft bind requirements.

Tufting – The process of creating textiles, especially carpet, on specialized multi-needle sewing machines. The needles push yarn through a primary backing fabric, where a loop holds the yarn in place to form a tuft as the needle is removed. The tufting process creates various constructions of carpet as identified below:

- Loop Pile After the needles is withdrawn from the primary backing, the looper rocks back and leaves a loop
- **Textured Loop** Produced by using an electronic speed control motor that creates texture with different pile heights by feeding varying amounts of yarn into the needles.
- **Cut Pile** A knife is attached to the looper and after the needles is withdrawn, the knife cuts a loop against the sharpened edge of the hook.
- **Cut and Loop** Achieved by having separate cutting and looping systems under the machine, or using spring loaded hooks to crate the cut pile portion.
- **Patterned Carpet** To produce patterned tufted carpet, a pattern attachment is added to the basic tufting machine. There are several types of pattern attachments, but their function is similar in that they all control the quantity of the yarn supplied to each tufting needle. In other words, less yarn gives a lower loop. Yarn color placement along with pattern attachments create the pattern.

Twisting - The process of combining filaments into yarn by twisting them together or combining two or more parallel single yarns (spun or filament) into piled yarns. Twisting is also employed to increase strength, smoothness, and uniformity, or to obtain novelty effects in yarn.

Yarn - A generic term for continuous strand of textile fibers, filaments, or material in a form suitable for knitting, weaving, or otherwise intertwining to

Resilient Terms

Note: This category includes all products that are not carpet or wood/wood laminate, such as Vinyl Composition Tile (VCT), Luxury Vinyl Tile (LVT), Vinyl Asbestos Tile (VAT), Sheet Vinyl Flooring, Linoleum Flooring, Rubber Flooring, and other categories. Does not include wood or engineered wood.

Above-Grade: Above the surface of the ground, as related to floor location, above a well-ventilated space with at least 18 in. between the bottom of the lowest horizontal structural member and any point of the ground.

Abrasion: Wearing, grinding, or rubbing away by friction.

Acclimation: Adaptation of the laminate floor to its installation environment or in accordance with specific pretesting requirements.

Acoustical Properties: Absorbance, reflection or transmission of sound waves generally measured in terms of Impact Insulation Classification (IIC), Sound Transmission Classification (STC) or difference between Concrete substrate IIC and IIC of same concrete assembly with finished laminate floor installed (Delta IIC).

Adhesion: A chemical process by which two materials can be joined together.

Aluminum Oxide: Added to the urethane finish for increased abrasion resistance of the wear layer.

Antistatic: Ability to limit the accumulation of static electricity on a surface. ASSURE CERTIFIED[™] is a third-party quality assurance testing program especially for Rigid Core flooring products developed by RFCI and conducted by SCS Global.

Backing Vinyl is constructed of several different layers: the wear layer, the printed or decorative layer, an inner core consisting of a foam and vinyl layer, and a backing. The type of backing determines how it can be installed.

Beautifully Responsible[™] Our message to consumers about family-friendly, eco-friendly resilient flooring: Discover resilient floors that match your style, budget, and sustainable values.

Below-Grade Below the surface of the ground, as related to floor location, part or all of the floor is below the ground.

Coefficient of Friction The ration of the tangential force that is needed to start or maintain uniform relative motion between two contacting surfaces to the perpendicular force holding them in contact.

Colorfastness: The ability of a material to retain its original color upon exposure to light or other source of degradation (i.e., light resistance).

Concrete: A hard, strong material made by mixing a cementing material (commonly Portland cement) and a mineral aggregate (as washed sand and gravel or broken rock) with sufficient water to cause the cement to set and bind the entire mass.

Flooring 101: Glossary of Flooring Terms, WIFI Presentation

Cork Tile: A floor surfacing unit made from natural cork shavings compressed and baked to be thoroughly and uniformly bonded together.

Cork The bark of a tree commonly known as Cork Oak and native to the Mediterranean region. The bark naturally splits every 9 to 15 years and can be safely harvested causing no harm to the tree. Cork is naturally hypoallergenic and resistant to mold and mildew.

Cushioned Vinyl Flooring: Any vinyl sheet floor covering incorporating a foam layer as part of its construction.

Decorative Layer: The rotogravure printing process offers a multitude of design possibilities that are expressed through the decorative layer such as patterns, geometrics, natural stone designs and more.

Deflection: The bending of a material between supports when a load is applied.

Delaminating: Separation of the Tile or plank layer(s).

Dimensional Stability: The ability of a material to resist changes in measured dimensions caused by environmental factors (e.g., moisture and/or temperature).

Embossing: A process by which the surface of the flooring is given a texture. **Embossed** Having a permanent multilevel surface produced by mechanical or chemical means.

Equilibrium Moisture Content: The moisture content at which the material neither gains nor loses moisture at a given relative humidity.

Expansion Gap: A space necessary between fixed objects (i.e. walls of a room, pipes, and cabinets) and between the material itself to allow for the movement of the material.

Fabricator: Any person or entity who uses composite wood products to make finished goods e.g. Laminate flooring, etc.

Flame Spread: Measurement of the flame propagation along the surface of a material.

Flexibility The ability to be bent, turned, or twisted without cracking, breaking or showing other permanent damage and with or without returning of itself to its former shape.

Floating Floor: Installation method by which the flooring panels are connected and not attached to the subfloor.

Friction Resistance to the relative motion of one body sliding, rolling, or flowing over another with which it is in contact.

Full Spread A vinyl flooring installation method in which the adhesive is troweled over the entire substrate.

HDF (High Density Fiberboard) – See MDF (Medium Density Fiberboard)

Heat Welded Seam A seam produced by grooving abutting edges of resilient flooring and filling said grooves with heated, fused, or melted material to provide a bond and seal. A glazing or top coating may be applied after the seam is trimmed

Heterogeneous Resilient Flooring A resilient floor surfacing material consisting of layers of dissimilar compositions or colors, or both.

Homogenous Rubber Flooring A rubber floor surfacing material, in sheet or tile form, that is of uniform structure and composition throughout., It usually consists of compounded natural or synthetic rubbers, or both, in combination with mineral fillers, pigments, and other additives.

Hydraulic Cement A binder system used in concrete subfloor assemblies that harden by chemical reaction with water and is capable of doing so even under water.

Impact Resistance: Ability to resist fracture or damage from a falling object.

Injection molded Flooring: A floor surfacing material made by driving or forcing a polymeric compound into a mold.

Inlaid Sheet Flooring: A floor surfacing material in which the decorative pattern or design is formed by colored areas set in to the surface. The design so formed may or may not extend through to a backing.

Inlay: A decorative effect used in flooring by combining elements of the same material but with different colors or patterns (e.g., borders or feature strips).

Inner Core: Consisting of a foam and vinyl wear layer, the inner core provides durability, insulation and comfort.

Lightweight Concrete: Concrete with a density of less than 115 lb/ft³ (1840 kg/m³).

Linoleum Cement: The binder in linoleum consisting of a mixture of linseed oil, pine rosin, fossil or other resins or rosins, or an equivalent oxidized oleoresinous binder.

Linoleum: Made of natural ingredients that include linseed oil, cork, limestone, wood flour and tree resins. The color goes all the way through, making it extremely wearable and durable.

Machine Direction: The direction in which a product moves through the manufacturing process.

Mark A mark made on the flooring surface by the deposition of material from friction or rubbing of traffic bodies against the surface.

Medium Density Fiberboard (MDF): A core material primarily composed of cellulose fibers combined with synthetic resins or other suitable bonding systems under heat and pressure. The materials are usually designated as low, medium, or high density (e.g., LDF, MDF or HDF). Note: High Density Fiberboard (HDF): A fiberboard with density greater than 800 kg/m3 (50 lb./ft.3).

Moisture Content: The amount of water in the material, usually expressed as a percentage of the dry weight.

Flooring 101: Glossary of Flooring Terms, WIFI Presentation

Moisture Meter: A tool used to measure moisture in the air, substrate or product **Oleoresin** A plant product containing chiefly essential oil and resin.

On-Grade: In contact with the ground, as related to floor location, in contact with the ground or with less than 18 in.(457.2 mm) of well-ventilated space between the bottom of the lowest horizontal structural member and any point of the ground.

Patching Compound: Compound used to fill or smooth minor depressions or irregularities in a flooring surface.

Pattern End Matched: When the ends of the flooring tiles or planks, typically similar patterns, are matched end to end to yield a continuous linear effect.

Perimeter Adhered: A vinyl flooring installation method in which adhesive is only applied to the perimeter of the flooring and also at the seams.

Plank: A form of resilient floor covering having an aspect ratio greater than 2:1.

Polymeric Poured (Seamless) Floors: A floor surfacing material composed of polymeric materials applied to the substrate in liquid form alone or in combination with mineral or plastic aggregates, desiccants, or fillers.

Post-Consumer Recycled Content The portion, often expressed as a percent by weight, of material used in the manufacture of a new product, where the material has been recovered or otherwise diverted from disposal.

Pre-Consumer Recycle Content Material recovered or diverted from industrial waste streams for use in the manufacture of a new product or a product made by a new process, often expressed as a percent by weight. This excludes materials and by-products generated from and commonly reused or reworked within the original manufacturing process.

Printed Sheet Vinyl Flooring A floor surfacing material which has a printed pattern and is protected with a wearlayer of transparent or translucent vinyl plastic. The wearlayer may also include a specialty performance top coating.

Recycled Content The sum, normally expressed as a percent by weight, of post-industrial or pre-consumer recycled material plus post-consumer recycled material.

Resilient Flooring An organic floor surfacing material made in sheet or tile form or formed in place as a seamless material of which the wearing surface is non-textile. The resilient floor covering classification by common usage includes, but is not limited to asphalt, cork, linoleum, rubber, vinyl, vinyl composition, and polymeric poured seamless floors. Resilient in this sense is used as a commonly accepted term, but does not necessarily define a physical property.

Resilient These floors have some "give" or elasticity when you walk across them. Tending or able to recover from strain or deformation caused especially by compressive stress. This category includes linoleum, cork, rubber and specialty resilient.

Resin Any of various solid or semi-solid amorphous fusible natural organic substances that are usually transparent or translucent and yellowish to brown and are formed especially in plan secretions, are soluble in organic solvents but not in water. Any of a large class of synthetic products that have some of the properties of natural resins, but are different chemically.

Rosin A translucent amber to almost black brittle friable resin that is obtained by chemical means from the oleoresin or dead wood of pine trees or from tall oil.

Rotogravure The most commonly used method for making residential vinyl floors. This process involves a print cylinder that spins around while the vinyl's core layer (called the gel coat) passes underneath. The cylinder systematically prints various colored ink dyes to create the pattern.

Rubber Rubber flooring is extremely durable, virtually indestructible, quiet and warm to walk on. It also resists dents and stains and its waterproof surface has an anti-slip finish. However, rubber is relatively expensive and must be installed by an experienced installer for maximum performance.

Seam Sealer A thin liquid adhesive applied to the cut edges of carpet to lock in the tufts and prevent edge ravel. Seam sealers may be visible in contrast with different vinyl textures and finishes.

Seam(s): A line or junction where Tiles or Planks are connected.

Seams Since vinyl comes in 6' and 12' widths, seaming may be necessary depending on the area to be covered. Certain patterns will hide seams better. For example, tile patterns with grout lines are better able to mask seams.

Sheet, Resilient Flooring Flexible resilient flooring, packaged in roll form, in which the length substantially exceeds the width.

Slip Resistance The ability to counteract loss of traction.

Solid Vinyl Tile A resilient tile flooring composed of binder, fillers and pigments compounded with suitable stabilizers and processing aids. The tile meets requirements of ASTM Specification F 1700. The binder consists of polymers and/or copolymers of vinyl chloride, other modifying resins, and plasticizers which comprise at least 34% by weight of the finished tile. The polymers and copolymers of vinyl chloride comprise at least 60% of the weight of the binder.

Stain Resistance: The degree to which a material resists permanent discoloration or surface attack from exposure to household items and/or industrial chemicals or reagents.

Static Coefficient of Friction The ration of the tangential force that is needed to start uniform relative motion between two contacting surfaces to the perpendicular force holding them in contact.

Subflooring A rough floor on top of which the vinyl flooring is applied. That structural layer intended to provide support for design loadings which may receive resilient floor coverings directly if the surface is appropriate or indirectly via an underlayment if its surface is not suitable.

Substrate The surface on which the vinyl flooring will be laid. If installing over a wood substrate, an underlayment will generally be necessary. A concrete substrate will not require an underlayment but will require some floor preparation.

Thermofusing: A process where resins are consolidated under heat and pressure to create a permanent bond and develop certain strength properties.

Traction The adhesive friction of a body on a surface on which it moves.

Underlayment: A material placed under resilient flooring, or other finished flooring, to provide a suitable installation surface.

VCT Vinyl Composition Tiles A resilient floor covering composed of binder, fillers, and pigments. The binder shall consist of one or more resins of poly (vinyl chloride), or vinyl chloride copolymers, or both, compounded with suitable plasticizers and stabilizers. Other polymeric resins may be incorporated as part of the binder.

Vinyl Asbestos Tile (VAT) An obsolete form of resilient tile composed of vinyl plastic binders, crysotile asbestos fibers, mineral fillers and pigments.

Vinyl Made from a mixture of polyvinyl chloride and plasticizer, it is usually flexible and non-porous. Pigments are added for color.

Warp: See Crowning, cupping, or crook.

Wear Resistance: Ability of the laminate flooring surface to resist abrasive wear through its overlay and décor layer.

Wear The accumulative and integrative action of all the deleterious mechanical influences encountered in use which tend to impair a material's serviceability. Such influences include, but are not limited to abrasion, scratching, gouging and scuffing.

Wearlayer A layer of material applied to the top surface of vinyl flooring. The thickness of the wearlayer varies with each vinyl product collection, or series, and is generally measured in mils. The thickness of a mil is about the same as a page in a phone book. Premium wearlayers offer superior resistance to stains, scuffs and scratches. How long a vinyl floor will look new and fresh is based on the wearlayer's performance.

Sources: The Resilient Floorcovering Institute RFCI.com and NALFA.com

Installation Terms

Acclimate- Allowing carpet, pad and other sundries to regain moisture and/or raise temperature to an acceptable level for satisfactory installation, condition.

Adhesive –1) A substance that dries to a film capable of holding materials together by adhesive and cohesive strength. Adhesive strength – sticks to a surface, cohesive strength – sticks to itself. 2) Chemicals that are used to pile yarn to primary backings, latex.

Balling up – A condition of the adhesive from excessive dust and dirt not allowing the installer to properly trowel the glue.

Baseboard – A board that covers the lower portion of a wall (trim, skirting) where it meets the floor, usually around the entire perimeter of a room.

Below grade - A cement slab that is poured below or partially below the surrounding terrain.

Blending and Racking - Extremely important to blend planks from several cartons and rack the plank to give a random appearance.

Bullnose – A common name used for a step return or roll-over. Originally an elongated step that was rounded at one or both sides of the tread.

Butt seam – An end seam or a cross seam.

Buttering or butter an edge - Seam sealing.

Closed steps – Steps with a wall at both ends.

Compressed seam technique – An installation technique for direct glue seams where fullness is allowed at the seam to manufacture a tight seam and then worked out into the rest of the flooring.

Contact adhesive- An adhesive that is applied to both surfaces to be adhered, allowed to dry completely (paper won't stick), that bonds when it comes in contact.

Cookie cutter – A circular bladed tool used to remove and replace damaged flooring up to about 3" in diameter.

Cross seams – Seams made by joining the ends of two pieces of together. Also called end seams or butt seams.

Cut-back adhesive – Asphalt or tar-based adhesive, frequently found under VAT (vinyl asbestos tile). Cut-back is incompatible with latex multipurpose adhesives.

Direct Glue Down – An installation method in which carpet is adhered directly to the floor.

Double-face tape – Tape with adhesive on both sides.

Double glue or double stick installation – An installation method in which the flooring first adhered to the floor, and then the carpet is adhered to the cushion.

Edge molding – A metal bar placed across door openings to protect the edge of the floor covering, and to prevent a trip hazard. Also called top metal or tap down metal.

Expansion joint – A strip of flexible material inserted between sections of concrete to prevent cracking during expansion/contraction cycles.

Floor scraper – A small hand tool with a 4-inch blade used for removal of adhesives, carpet, etc. prior to installation of new floor covering.

Flooring 101: Glossary of Flooring Terms, WIFI Presentation

Full Glue – Installation technique whereby the entire floor space is covered with adhesive as opposed to only putting adhesives on the perimeter.

Glue-down – An installation method where the flooring is adhered to the sub-floor with an adhesive.

Hygrometer – An instrument used to measure moisture content in concrete sub-floors prior to installation of floor covering. A calcium chloride test has greater accuracy.

Legs – Long strings of adhesive that develop between the carpet and sub-floor when the adhesive is allowed to properly tack.

Miter joint – A seam between two flooring pieces cut at an angle, usually 45° to join pieces at right angles.

Molding – A wooden, metal, vinyl or plastic strip, either quarter round or shoe molding, attached to the bottom of a baseboard or wall to cover the gap between wall and floor or to cover raw edges of flooring at doorways or where it may abut another type of floor covering.

On grade – On the level of the surrounding ground, or in contact with fill material that is in direct contact with the ground.

Open Time – The time allowed between spreading adhesive and laying flooring into adhesive. Also referred as tack time, or the time needed for the adhesive to become tacky.

Patching – The process of repairing holes, cracks, breaches, etc., in a floor surface prior to the installation of flooring.

Pattern match – An installation term referring to lining up printed or tufted patterns in two pieces of flooring so that the design is continued across seams in both length and width.

Peaked seams – Seams that lift in an inverted "V" making the seam obvious. On a direct glue installation peaked seams are installation error and can be repaired. On a stretch-in installation seam peaking will occur if the flooring is properly power stretched. The installer has many techniques that should be used to minimize seam peaking, with one of the most important being running seams into the main light source.

Pressure sensitive adhesive – An adhesive that is permanently tacky at room temperature. Has horizontal strength to keep product from slipping, but low vertical strength to allow removal and re-installation. Also called releasable adhesive.

Quarter round – Wooden or plastic molding that has a cross section comprising a 90° arc of a circle.

pH – A value representing the concentration of hydrogen ions in gram equivalents per liter used to indicate the acidity or alkalinity of a substance on a scale from 0 to 14 with 7 representing neutrality. Numbers less than 7 reveal increasing acidity and numbers greater than 7 reveal increasing alkalinity. (Laboratory and field testing for pH must be done with distilled water.)

Quarter round – Wooden or plastic molding that has a cross section comprising a 90° arc of a circle.

Quarter turn – The joining of two materials at 90° angle to one another.

Riser – The upright part of a step between two stair treads. Flooring 101: Glossary of Flooring Terms, WIFI Presentation **Scribing** – An installation term for the method of tracing the irregularities of a wall or other surface onto a piece of flooring in order to get an exact fit.

Seam – In flooring installation, the line formed by joining the edges of two pieces of flooring by the use of various techniques.

Seam adhesive or sealer – A specially formulated adhesive for securing cut edges of flooring prior to seaming.

Seam Sealing – The application of seam adhesive for securing cut edges of flooring to be seamed.

Shoe Molding – Wood or plastic strip with one corner edge rounded slightly. It is used to conceal joints between walls and floors or between larger moldings and floors.

Stair Nosing – Material used to cover the nose of a stair when the stairway is not upholstered. Commonly used to draw attention to the edge of a stair in restaurants, theaters, etc.

Threshold – The raised material beneath a door, also known as a doorsill or saddle.

Tread – The upper horizontal part of a stair.

Trowel – Head implement used for metering and spreading adhesive to the floor or other substrate.

Sources: Carpet and Resilient Manufacturers

Acronyms

A&D – Architect and Design Community; includes a wide variety of individuals who specify and select flooring for various end uses.

AIA – American Institute of Architects

ASID - American Society of Interior Designers

ASTM – American Society for Test and Measurement. They create test protocols for various physical tests on flooring products.

BOMA – Building Owners Management Association; an association for building owners and managers.

CEU – Continuing Education Unit; credits that interior designers and architects can accumulate toward accreditation or continuing education requirements for their profession.

CSI – Construction Specification Institute; a trade association for specifiers who write specifications for a variety of interior furnishings, describing how the products should perform, which tests the products should pass, and how the product is to be used in the field. All interior furnishings (carpet, upholstery fabric, ceramic, wood, etc. could be designated in a specification.)

DPL

Abbreviation for Direct Pressure Laminate, which characterizes a technique in which decor layer and balancing foil are directly pressed onto the substrate.

EPA- Environmental Protection Agency; a federal agency with environmental protection regulatory and enforcement authority. Administers Clean Air Act, Clean Water Act, Federal Insecticide, Fungicide and Rodentcide Act (FIFRA), Resource Conservation and Recovery Act (RCRA), Toxic Substances Control Act (TSCA), and other federal environmental laws.

EVA- Economic Value Added

EVP – Engineered Vinyl Planks

EWF – Engineered Wood Flooring

FCICA – Floor Covering Installation Contractors Association

HDF – High Density Fiberboard

IDCEC – The Interior Design Continuing Education Council that oversees continuing education credit-granting courses provided by manufacturing education providers. This is an umbrella organization encompassing ASID (residential designers), IIDA (commercial designers) and IDC (Canadian designers).

IICRC - Institute of Inspection Cleaning and Restoration Certification

IIDA – International Interior Design Association

IFMA – International Facility Managers Association; a trade association for facility managers, i.e., individuals who make operational decisions about buildings and complexes. They are responsible for product specification, selection, installation and maintenance.

LVP – Luxury Vinyl Plank

LVT – **Luxury Vinyl Tile (LVT)** - A type of flexible, vinyl floor tile and/or plank that has beautiful printed designs protected by a durable urethane wear layer. LVT products are easy to install, but they do require full spread adhesive and the proper sized trowel for installation.

MDF - Abbreviation for Medium Density Fiberboard, which is often used for laminate flooring and which is lighter than the High Density Fiber-board (HDF).

MFA – Multilayer Flooring Association

MLF – Multilayer Flooring

MVP – Moisture Vapor Protection

MSDS - Material Safety Data Sheet; document that chemical manufacturers must supply with their hazardous products to describe the chemical's general properties, its hazards, and how to safely use, handle and store it.

NALFA - North American Laminate Flooring Association. Trade association dedicated solely to the laminate flooring industry.

NAFCD - North American Association of Floor Covering Distributors.

NWFA – National Wood Flooring Association

NIOSH -National Institute for Occupational Safety and Health of the Public Health Service, U.S. Department of Health and Human Services (DHHS). A federal agency that recommends occupational exposure limits for various substances and assists OSHA and Mining Safety and Health Administration (MSHA) in occupational safety and health investigations and research.

OSHA -Occupation Safety and Health Administration of the U.S. Department of Labor. A federal regulatory agency with safety and health regulatory and enforcement authority for most United States industries.

RFCI – Resilient Floor Covering Institute

SPC (Stone Plastic Composite). SPC Vinyl Flooring stands for stone plastic composite vinyl flooring. Similar to WPC vinyl, an SPC vinyl is an engineered luxury vinyl that combines limestone and stabilizers to create an extremely durable core.

SVT – Solid Vinyl Tile

VAT – Vinyl asbestos tile, a type of tile that used to be used in the building market. Now, because of problems with asbestos, there are specific installation requirements if an end user is wanting to install flooring over VAT.

VCT –**Vinyl Composition Tiles** - A resilient floor covering composed of binder, fillers, and pigments. The binder shall consist of one or more resins of poly (vinyl chloride), or vinyl chloride copolymers, or both, compounded with suitable plasticizers and stabilizers. Other polymeric resins may be incorporated as part of the binder.

VOC -Volatile Organic Compound. Organic materials (especially gasses) that evaporate into air, thus affecting air quality.