



GLOSSARY OF ELECTRICAL INDUSTRY TERMS

A

ADD-A-DEPTH RING – a means of extending the walls of a device box to the wall surface, providing a barrier between a wiring device and the surrounding wall material.

AIR PLENUM – a compartment or chamber to which one or more air ducts are connected and which forms part of the air distribution system.

AMP (A) – a measurement of the amount of electrical current in a circuit at any moment.

ARMOR – a metallic covering around the cable for mechanical protection. Typically interlocked steel or aluminum.

ARMORED CABLE CLAMP – a means of securing armored cable to a box, providing an electrical ground. The clamp will accommodate two cables.

B

BX – see flexible armored cable.

BAR HANGER – a means that is used to position a lighting fixture or fan between ceiling joists or studs. The bar hanger may be adjustable, and permits the electrical outlet box to be positioned along its length.

BEAM CLAMP – a fastening means, usually made of malleable iron or steel, commonly used with hangers and a threaded rod to fasten a raceway to an I-beam.

BELL BOX – a Hubbell Inc. trade name for the BELL® brand of weatherproof boxes.

BLOCK-LOC® – a Hubbell Inc. trade name for self-positioning masonry boxes and tile covers.

BONDING – the permanent joining of metallic parts to form an electrically conductive path that will assure electrical continuity and the capacity to conduct safely any current likely to be imposed.

BOX EXTENSION – see extension ring.

BOX-LOC® – RACO trade name for our snap-on metal stud bracket.

BOX MOUNT – a term commonly used to denote where the screws of a cover attach.

BUSHING – a fitting provided to protect wires from abrasion and intended for use where conductors enter or leave the raceway system.

C

CSA – see Canadian Standards Association.

CABLE – two or more insulated conductors wrapped in metal or plastic sheathing.

CABLE BOX – a box provided with clamps to accommodate either metallic or nonmetallic sheathed cable.

CABLE CLAMP – generic name for a clamp that mechanically secures the cable to the electrical outlet box.

CANADIAN STANDARDS ASSOCIATION (CSA) – an independent testing agency that certifies products to its established standards of safety and performance.

CARPET FLANGE – a ring that is used with a floor box to provide a decorative finish.

CHASE NIPPLE – a term used for a threaded nipple.

CIRCUIT – the path of electrical flow from a power source through an outlet and back to ground.

CLAMP BACK – a raceway fastening accessory typically used with a conduit strap to position a raceway away from a wall.

CLASS I locations – are those locations in which flammable gases or vapors are or may be present in the air in quantities sufficient to produce explosive or ignitable mixtures.

CLASS II locations – are those locations that are hazardous because of the present combustible dust.

CLASS III locations – are those locations that are hazardous because of the presence of easily ignitable fibers or flyings, but in which the fibers or flyings are not likely to be in suspension in the air in quantities sufficient to produce ignitable mixtures.

CLEAT HANGER – see bar hanger.

CODEGUARD® – RACO trademark for weatherproof cover and Hubbell WRTR device.

COMBINATION COUPLING – a coupling device used to join two dissimilar raceways (ie., rigid and flex).

CONCENTRIC KNOCKOUT – a combination knockout where all the knockouts have the same center (eg., masonry boxes).

CONCRETE BOX – a box intended for use in concrete and masonry block. It is not intended for installation in a floor.

CONCRETE RING – see concrete box.

CONCRETE-TIGHT FITTING – a fitting that, when assembled to conduit or tubing of the proper size, excludes concrete aggregate.

CONDUCTOR FILL – refers to the number of current carrying and grounding conductors permitted by the National Electrical Code (NEC) to be used in conduit and tubing.

CONDUCTORS – electrical term describing wires capable of carrying an electrical current or wire being used as a ground, usually sheathed with an insulating material.

CONDUIT – (raceway) a pipe or tube designed to enclose and protect conductors or cables from moisture and physical damage.

CONDUIT BODY – a portion of a conduit or tubing system that provides access through a removable cover(s) to the interior of the system at a junction of two or more sections of the system or at a terminal point of the system.

CONDUIT CLAMP – a fastening clamp used to mount raceways.

CONDUIT HANGER – a fastening means used to support conduit.

CONDULET – a term used to refer to malleable or aluminum conduit bodies.

CONNECTOR – a fitting intended to terminate a cable or raceway into a box, panel, etc.

CORD GRIP (CG) – a connector used to terminate flexible cords and cables into an enclosure.

COUPLING – a fitting intended to connect two lengths of raceway.

D

DAMP LOCATION – partially protected locations such as under canopies or roofed open porches, and interior locations subject to moderate degrees of moisture, such as basements, barns, and cold-storage warehouses.

DEVICE EARS – ears or tabs with holes spaced to accommodate wiring devices. Device ears are found on plaster rings, switch boxes and handy boxes.

DEVICE MOUNT – a term commonly used to denote where the screws of a device cover attach.



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DUPLEX RECEPTACLE – Electrical outlet device having two plug receptacles.

DURALO® – is a trademark identifying a tri-coat protective finish used on iron electrical conduit fittings for standard and hazardous locations.

E

8B – a 4 in. octagon box that is 1-1/2 in. deep.

8B DEEP – a 4 in. octagon box that is 2-1/8 in. deep.

ELBOW – a curved section of raceway intended to change the direction of the run.

ELECTRICAL METALLIC TUBING (EMT OR THINWALL) – conduit called thinwall as a contrast to the “heavywall” of rigid or IMC.

ELECTRICAL NONMETALLIC TUBING (ENT) – a plastic corrugated raceway of circular cross section that is resistant to moisture and chemical atmospheres, and that is flame retardant.

ELECTROPLATING – a term used to describe the process of electrically depositing a layer of corrosion resistant material (i.e., zinc) onto steel or iron parts.

EMT – see electrical metallic tubing.

END RUN – that portion of the branch circuit that extends to the last fixture or device.

ERICKSN® COUPLING – a registered trade name for a three-piece coupling used for rigid/IMC conduit.

ETL – certification mark for Intertek Testing Services. ITS tests to the standards of UL, CSA and other international standards.

EXPOSED WORK – boxes and branch circuits that are mounted external or exposed on walls, beams, columns, etc.

EXTENSION RING – used to extend the box when it is recessed back in a wall. Also provides more cubic inch capacity for the box if needed.

EXTRA DUTY® – a tradename applied to weatherproof while-in-use covers that have passed UL testing and are listed as “Extra Duty”.

F

FAN BOX – a box that is UL listed for the support of a ceiling (paddle) fan.

FINISHED WALLS – studs, furring strips, joists, that are covered with wood paneling, drywall, plaster, Masonite or ceramic are considered finished.

FIXTURE – a lighting assembly that is permanently attached to a building’s wiring system, usually to a ceiling box.

FIXTURE EARS – ears or tabs with holes in them spaced 2- 3/4 in. or 3- 1/2 in. apart to accommodate lighting fixtures.

FLEX – see flexible metal conduit.

FLEXIBLE ARMORED CABLE (BX) – commonly called BX, a manufacturer’s trade name. It may be described as prewired flexible metallic conduit since it includes two or more current carrying conductors and can be supplied with a grounding conductor.

FLEXIBLE METAL CONDUIT (GREENFIELD OR FLEX) – frequently called “Greenfield,” which is the trade name of one manufacturer of this flexible steel or aluminum raceway. It is used around machinery where vibration or movement exists or where complex routing of the raceway dictates a flexible conduit.

FLOOR BOX – a box provided with means for flush mounting in a floor. The floor box may be used to provide power, telephone or data connections in office or store areas.

FLUSH-FIT® – a Hubbell Inc. trade name for a device leveling plate that corrects loose and recessed devices.

FORM 7 – a style of conduit body that requires a clip cover.

FORM 8 – an “expanded volume” style of conduit body that requires a two screw cover.

FORM 35 – a style of conduit body that requires a two screw cover.

FURRING STRIPS – small wood strips attached to an existing wall to provide a means to attach paneling or drywall.

G

GFCI – see Ground Fault Circuit Interrupter.

GANGABLE – box with a side that can be removed to allow the attachment of another box for installation of multiple devices.

GAUGE – a term used to describe the physical size of a wire.

GORILLA-RING® – a RACO® concrete ring UL approved for fixture and ceiling fan support.

GOTCHA – term for a split hinge design ring used in Hubbell strain relief cord connectors.

GREENFIELD – see flexible metal conduit.

GRID-BRACE® – A Hubbell Inc. trade name for a ceiling support assembly designed for ceiling fan or fixture support for suspended ceilings.

GRIP-LOK – refers to old work clips used to secure switch boxes with plaster ears in hollow walls.

GROUND – a conducting connection between an electrical circuit or equipment and the earth, or to some conducting body that serves in place of the earth. Neutral wires carry the current to ground in all circuits. An additional grounding wire, or the sheathing of metal clad cable or conduit, protects against shock from a malfunctioning tool or other device.

GROUND FAULT CIRCUIT INTERRUPTER (GFCI) – a safety device that senses shock hazard and automatically stops electrical flow in a circuit.

GROUND FITTING – a fitting used to attach a grounding conductor to a ground pipe or rod.

GROUND LUG – means used to connect a ground wire to a fitting, clamp, or enclosure. Generally made of copper, aluminum, brass or bronze.

GROUND SCREW – a UL listed screw used to secure a grounding conductor to an enclosure.

GROUND WIRE – the conductor used to connect the electrical equipment to ground (or earth) at the service entrance point, minimizing the potential for electrical shock. Usually clad in green insulation or unclad.

H

HANDY BOX – box designed for enclosing devices; usually surface mounted.

HANDY ELL – a 90 degree elbow used either to connect two runs of conduit, or to connect a run of conduit to an enclosure.

HAZARDOUS LOCATIONS – are those locations where fire or explosion hazards may exist due to flammable gases or vapors, flammable liquids, combustible dust, or ignitable fibers or flyings.

HEAVYWALL – see rigid metal conduit.



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HICKEY – (1) a threaded extension for support of a lighting fixture. (2) conduit bending tool.

HIDDEN WORK – residential and commercial construction where the electrical work is hidden by the finished wall; only the wiring device, switch, wall plate or light fixture is visible.

HOT WIRE – the higher voltage conductor carrying electrical current (usually black) in a 120V single phase system.

I

I.D. – inside diameter.

IMC – see intermediate metal conduit.

INSULATED THROAT CONNECTORS – insulated throat connectors have a thermoplastic line pressed or glued into the throat. This liner helps to prevent damage to the insulation when the conductors are pulled.

INSULATION – sheathing or jacket of nonconducting material used to cover wires.

INTERMEDIATE METAL CONDUIT (IMC) – a lighter weight, more economical version of rigid metal conduit. It has the same outside diameter (O.D.) with a thinner wall.

J

JAKE FITTING – a commonly used term for a screw-in type connector or coupling for flexible metal conduit.

JIFFY BOX – old work switch box.

JOIST – horizontal beams that extend from wall to wall and support the floor or ceiling – typically 2 in. x 10 in., 2 in. x 8 in. or 2 in. x 6 in.

JUNCTION BOX – an enclosure used for splitting circuits into different branches. In a junction box, wires connect only to each other, never to a switch, receptacle, or fixture.

K

KELLEMS GRIP – name for a wire mesh grip.

KILOWATT (KW) – one thousand watts, kilowatt measures power.

KILOWATT-HOUR – the standard measure of electrical consumption or energy.

KO (KNOCKOUT) – a circular tab on the side or bottom of a box pushed back in place with a small piece of steel remaining uncut to hold the tab in place until it is removed for installation of conduit or a connector.

KORNS® CLAMP – A registered trademark for a right angle, parallel, or edge type conduit clamp, used to fasten conduit to I-beams.

KWIK-BRACE® – a RACO® new work adjustable brace that is UL approved for fixture and ceiling fan support.

KWIK-HANG® – a RACO® swivel fixture cover or box support hanger.

L

LAMPHOLDER – a current carrying device used to support, illuminate and protect lamps.

LIQUIDTIGHT FLEXIBLE METAL CONDUIT – flexible metal conduit with a plastic outer jacket that protects the electrical system against sunlight, liquids, vapors or solids.

LIQUIDTIGHT FLEXIBLE NONMETALLIC CONDUIT (NMLT) – liquidtight flexible nonmetal conduit is a raceway of circular cross section having a smooth inner surface with integral reinforcement within the conduit wall.

LOAD BEARING – walls that are an integral part of the structure that supports the joists.

LOCKNUT – an internally threaded barbed nut for use on conduit or fittings to prevent turning and to provide a secure joint.

LOW VOLTAGE PARTITION – a barrier added inside an electrical box to separate communication and power circuits. Also required where voltage levels between adjacent switches exceed 300.

LUG – see ground lug.

M

MC CABLE – metal clad cable. A UL classification indicating an assembly of insulated conductors with a metal cladding applied over the core and with grounding conductor(s) if the cladding is interlocked armor.

MADISON HOLD ITS® – Registered trademark for #977 griplok old work brackets.

MASONRY BOX – box installed in block walls as the blocks are being laid. The mason cuts the block to fit around the box.

MOUNTING EARS – ears on a box which are used to mount a box cover, device or fixture.

MOUSE HOUSE – a metallic or nonmetallic pedestal that can provide power or voice/data to a floor location.

MUD RING – all rings are called mud rings regardless of the finish wall material used. There are two styles of rings, one for mounting a switch or receptacle, and one for mounting lighting fixtures.

MYERS™ HUB – A trade name used to refer to a threaded hub for rigid/IMC conduit; provides a threaded hub in a KO.

N

NEC – see National Electrical Code.

NEMA – see National Electrical Manufacturer's Association.

NM – see nonmetallic sheathed cable.

NAIL-UP STRAPS – a fastening device used to mount raceways to wooden studs, siding, etc.

NATIONAL ELECTRICAL CODE (NEC) – a set of rules governing safe wiring methods drafted by the National Fire Protection Association. Local codes sometimes differ from and take precedence over NEC requirements.

NATIONAL ELECTRICAL MANUFACTURERS ASSOCIATION (NEMA) – a US Manufacturers Organization which actively promotes standardized product specifications for electrical apparatus.

NEUTRAL WIRE – a grounded conductor that completes a circuit by providing a return path to the source. Neutral wires are always identified by white or gray insulation.

NEW WORK – electrical work that is completed before the drywall or plaster is installed.

1900 – a 4 in. square box that is 1-1/2 in. deep.

1900 DEEP – a 4 in. square box that is 2-1/8 in. deep.

NIPPLE – an externally threaded fitting intended primarily to serve as a short raceway between close-spaced enclosures.

NONMETALLIC SHEATHED CABLE (ROMEX®) – nonmetallic sheathed cable, popularly called by a manufacturer's trade name of Romex, is two or more insulated conductors, usually copper, protected by an outer jacket or sheath of nonmetallic material.

NMLT – see liquidtight flexible nonmetallic conduit.



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O

O.D. – outside diameter (of conduit, etc.).

OCTAGON BOX – a metal box used on a wiring system, usually at an outlet. It provides means for connection to a wiring system and is intended primarily to enclose splices and wiring devices or to support a fixture or other equipment intended for similar installation.

OFFSET CONNECTORS – connects the conduit on the wall surface to a KO in the box where the KO and wall surface are on different planes.

OLD WORK – electrical work that takes place after the drywall or plaster is in place.

OUTLET – anything that allows access to the wiring system (eg., box, conduit body, etc.).

P

PAN – see pancake box.

PANCAKE BOX – this round box is also referred to as a pan. The pancake box typically is the same depth as the finish wall material in which it is mounted.

PARTITION WALLS – walls that are nonload bearing—typically interior walls of an office building that can be removed.

PLASTER EARS – ears on switch boxes that prevent the box from falling back into the wall.

PLASTER RING – see mud ring.

PLENUM – a compartment or chamber to which one or more air ducts are connected to form part of the air distribution system.

PLUG – a threaded means used to close unused threaded openings.

PREGALVANIZED – the application of hot zinc to the exterior surfaces of steel.

PRIOUT – a circle or pear shaped tab cut into the steel with a tie (a little piece of steel uncut) holding it in place; the priout has a slot in it where a screwdriver tip is inserted to pry out the tab, providing an opening for cable.

Q

QUICK-FIT – Keyhole mounting system.

R

RACE WAY – enclosed channel designed expressly for holding wire or cables. Conduit is a raceway; so is a duct.

RAFTER – parallel beams that support a roof running from the top of the joist to the peak of the roof.

RAINTIGHT – constructed so as to pass the UL rain test.

RAYNGUARD® – RACO® trademark for extra duty weatherproof metallic while in use cover.

RAYNTITE® – RACO® trademark for weatherproof device cover approved for use in wet locations.

RAISED COVER – used for a job that is surface mounted. There are a variety of raised covers that may be used depending on the type of device being installed.

REDI-LOC® – a registered RACO® trademark for MCI, AC and HCF cable connectors.

RED SEAL COVER – see raised cover.

REDUCING BUSHING – a threaded steel or malleable iron bushing used to make transitions from one trade size of rigid/IMC to another

REDUCING WASHER – a stamped steel washer which, when used in pairs, reduces the size of an opening in an enclosure.

RETRO-BRACE® – a RACO® old work adjustable brace for fixture or ceiling fan support.

RETRO-RING® – a RACO® old work, steel mounting bracket for 4 in. square boxes.

RIGID – see rigid metal conduit.

RIGID METAL CONDUIT (RIGID OR HEAVYWALL) – rigid metal conduit is a raceway that provides a high degree of mechanical protection indoors or out, in dry or wet locations, exposed or concealed, in all kinds of atmospheric conditions, locations, and in hazardous locations such as explosion proof, vapor tight and dust tight.

RIGID NONMETALLIC CONDUIT – three types of rigid nonmetallic conduit are listed by UL: (1) rigid nonmetallic plastic Schedule 40 and 80 PVC; (2) rigid nonmetallic underground plastic; and (3) rigid nonmetallic underground other than plastic, fiber type.

ROBERTSON HEAD SCREW – a type of screw with a square key that is popular in Canada. A special tool (called a Robbie) is required to drive the screw.

ROMEX® – see nonmetallic sheathed cable.

S

SEAL-TITE® – A registered trademark used to refer to liquidtight metallic conduit and fittings.

SERVICE DROP – service entrance conductors from the utility pole to the service entrance conductors of a building that has overhead service. The utility company usually supplies and connects the service drop.

SERVICE ENTRANCE – the point at which electrical service enters a building.

SERVICE ENTRANCE CABLE (SE) – service entrance cable can be compared to nonmetallic sheathed cable (Romex®) in large conductor sizes, with a weatherproof nonmetallic outer covering. It is often encased by rigid, IMC or EMT conduit for additional protection.

SERVICE-ENTRANCE HEAD – an enclosed fitting intended for use at service entrances where open wiring is connected to a service-entrance cable or raceway system.

SET BACK – the distance a box is set forward on a stud to accommodate the thickness of the finished wall and leave the face of the box flush with the front surface of the wall.

SET SCREW CONNECTOR – a fitting which terminates a run of conduit into an enclosure using set screws to secure the conduit.

SET-UP BOX – trade term for an octagon box, factory installed on a bar hanger.

SHEATH – material, usually an extruded plastic material applied outermost to a wire or cable. Often called a jacket.

SHIELDED CABLE – a cable in which the insulated conductor(s) are enclosed in a conductive mesh envelope. The mesh is intended to protect the enclosed conductor(s) from external electrical interference.

SPLICE – the joining of two or more conductors.

SPLICE BOX – see junction box.

SPLIT COUPLING – a term used to refer to a coupling used for rigid/IMC conduit. Used where the conduits to be coupled cannot be rotated.

STAB-IT® – a RACO® trademark for our line of boxes with built-in cable connectors for flexible armored cable.



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STRAIN RELIEF – a term used to describe the sealing and gripping action of a cord connector.

STRAPS – used to support conduit as required by Code. Beam and conduit clamps perform this function in industrial locations.

STUD – 2 in. x 4 in. or 2 in. x 6 in. wood or steel used to construct walls.

STUD MOUNT – name for mud rings that allow for quick installation to studs and eliminates the needs for far-side support.

STUD WALL – wood or steel 2 in. x 4 in. spaced 16 in. or 24 in. on center — drywall or paneling typically is attached to the studs to finish the wall.

SWITCH BOX – boxes with device ears for direct mounting of switches as opposed to boxes requiring mud rings for switch mounting.

SWIVEL LOK – reference for multi-position liquidtight connectors for type B liquidtight flexible nonmetallic conduit and extra flexible liquidtight nonmetallic tubing.

T

THINWALL – see electrical metallic tubing.

TIGER BOX – name for a patented switch box for old work applications.

TILE COVER – a series of covers designed for use with tile. These covers are for mounting switches or receptacles. Rings are available in different depths depending on the finished wall thickness.

TKO – references a combination 1/2 in. and 3/4 in. knockout. The two knockouts are off-center to enable a 1/2 in. locknut to engage the box for proper grounding of the electrical system.

TOGGLE SWITCH – a switch intended for use in general distribution and branch circuits.

TOMBSTONE – see mouse house.

TRADE SIZE – conduit is referred to by trade size according to its inside diameter.

TYPE UF – see underground feeder cable.

U

U-CONDUIT – A Hubbell trade name for the Universal Conduit Body. The U-Conduit Body's interchangeable plates/panels allow the body to be configured into any of the five standard conduit body types LB, LL, LR, T, and C, for EMT or Rigid/IMC conduit.

UL – see Underwriters Laboratories.

UNDERGROUND FEEDER CABLE – underground feeder cable (Type UF) is a group of conductors manufactured in the form of a cable assembly similar to Type NM (Romex®) but with the physical and electrical characteristics that allow for direct burial in the earth.

UNDERWRITERS LABORATORIES (UL) – An independent testing agency that tests and lists electrical equipment to its established standards of safety and performance.

UTILITY BOX – see handy box.

V

VOLT (v) – a unit of electromotive force.

W

WATT (w) – a measure of the power an electrical device consumes; [volts x amps = watts].

WEATHERHEAD – a term used to refer to a service entrance head.

WEATHERPROOF – an enclosure constructed for outdoor use.

WEATHERPROOF-WHILE-IN-USE (WEATHERPROOF-IN-USE, WEATHERPROOF HOOD, OR OUTLET BOX HOOD) – term commonly used to describe covers that are designed to be rain tight with cords installed.

WET LOCATIONS – installations underground or in concrete slabs or masonry in direct contact with earth, and locations subject to saturation with water or other liquids, such as vehicle washing areas, and locations exposed to weather and unprotected.

WRTR – an electrical device that is weather-resistant and tamper-resistant.