

List of Acronyms and Abbreviations

Abbreviation/Acronym	Definition
μm	Micrometer
3D	Three-Dimensional
A	Amps
AASHTO	American Association of State Highway and Transportation Officials
ABMA	American Bearing Manufacturers Association
AC	Alternating Current
AC	Air Conditioning
ACH	Air Changes per Hour
ACC	Air Cooled Condenser
ACHE	Air Cooled Heat Exchanger
ACI	Activated Carbon Injection
ACI (Loading)	American Concrete Institute
AEIC	Association of Edison Illuminating Companies
AETB	Air Emissions Testing Body
AG	Aboveground
AGA	American Gas Association
AHJ	Authority Having Jurisdiction
AISC	American Institute of Steel Construction
AISI	American Iron and Steel Institute
AMCA	Air Movement and Control Association International
AMPP	Association for Materials Protection and Performance
ANSI	American National Standards Institute
API	American Petroleum Institute
ASCE	American Society of Civil Engineers
ASCII	American Standard Code for Information Interchange
ASHRAE	American Society of Heating, Refrigeration and Air Conditioning Engineers
ASME	American Society of Mechanical Engineers
ASTM	American Society for Testing and Materials
ATS	Acceptance Testing Specification
AWG	American Wire Gauge
AWS	American Welding Society
AWWA	American Water Works Association
B&PV	Boiler & Pressure Vessel
B&V	Black and Veatch
BICSI	Building Industry Consulting Services International

Abbreviation/Acronym	Definition
BMCR	Boiler Maximum Continuous Rating
BMS	Burner Management System
BPVC	Boiler & Pressure Vessel Code
BTA	Boiler Tube Company of America
BTU	British Thermal Units
C	Celsius
C/S	Carbon Steel
CAT	Category (5e, 6)
CBPVI	Center for Boiler & Pressure Vessel Inspection & Research (China)
CCOFA	Close Coupled Overfire Air
CCS	Combustion Control System
CEMS	Continuous Emissions Monitoring System
CENELEC	European Committee for Electrotechnical Standardization
Cert.	Certification
CFD	Computational Fluid Dynamics
CFM	Cubic Feet per Minute
CFR	Code of Federal Regulations
Cl	Chlorine
CL	Class
CMTR	Certified Material Test Reports
CO	Carbon Monoxide
Co.	Company
COM	Common (Multimeter)
CP	Control Power
CP	Cathodic Protection
CPE (Jacketing)	Chlorinated Polyethylene
CPM	Critical Path Method
CPS	City Public Service (Board of San Antonio)
CPSE	CPS Energy
CPU	Central Processing Unit
Cr	Chromium
CRCA	Cold-Rolled Close Annealed
CSA	Canadian Standards Association
CSB	Column-Side Bearings
CSEF	Creep Strength Enhanced Ferritic
CSPE	Chlorosulfonated Polyethylene
CT	Current Transformer
CT	Constant Torque

Abbreviation/Acronym	Definition
CTF	Commissioning Test Forms
CUI	Corrosion Under Insulation
Cv	Flow Coefficient
DAHS	Data and Acquisition Handling System
dB	Decibels
DB	Dry Bulb
dBA	Decibel, A-Weighted (Human Sensitivity)
DC	Direct Current
DCS	Distributed Control System
DIN	Deutsches Institut für Normung - German Institute for Standardization
Div.	Division
DM	Dimensioning
DOR	Division of Responsibilities
DOSH	Division of Occupational Safety and Health
DOT	Department of Transportation
DP	Differential Pressure
DPDT	Double Pole, Double Throw
DTI	Direct Tension Indicator
E/P	Electric-to-Pneumatic
EAW	Electric Arc Welded
ECMPS	Emissions Collection & Monitoring Plan System
EEI	Edison Electric Institute
EIA	Electronic Industries Alliance
emf	Electromotive Force
EMT	Electrical Metallic Tubing
EN	Exceptions Noted
EPA	US Environmental Protection Agency
EPC	Engineering, Procurement and Construction
EPDM	Ethylene Propylene Diene Monomer
EPR	Ethylene Propylene Rubber
ESV	Emergency Supply Shutoff Valve
ETAP	Electrical Transient Analyzer Program
etc.	Et Cetera
F	Fahrenheit
FAT	Factory Acceptance Test
FBE	Fusion Bonded Epoxy
fc	Foot-Candle (One Lumen per Square Foot)
FCI	Fluid Controls Institute
FD	Forced Draft

Abbreviation/Acronym	Definition
Fe	Iron
FEP	Fluorinated Ethylene Propylene
FF	Flat Face (Flange)
FGD	Flue Gas Desulfurization
FGR	Flue Gas Recirculation
FKM	Fluoroelastomer
FM	Factory Mutual
FME	Foreign Material Exclusion
FNPT	Female National Pipe Thread
FOB	Free on board
FR	Flame-Retardant
FREPR	Flame-Retardant Ethylene Propylene Rubber
FRLS	Flame-Retardant Low Smoke
FRP	Fiberglass reinforced polymer
FR-PVC	Flame-retardant polyvinyl chloride
FRXLPE	Flame-retardant cross-linked polyethylene
ft	Feet (US)
FTP	File transfer protocol
g	Gram
GA	General arrangement
Ga	Gauge
gal	Gallon (US)
GB	Gigabyte
GCC	Ground Continuity Conductor
GE	General Electric
GEN	Generator
GHz	Gigahertz
GPM	Gallons per minute
GPR	Ground Penetrating Radar
GRC	Galvanized Rigid Conduit
HAC	Hazardous Area Classification
HART	Highway Addressable Remote Transducer
HAZOP	Hazard Operability
HCl	Hydrochloric Acid
HDPE	High-Density Polyethylene
Hg	Mercury
HHV	Higher Heating Value
HMI	Human-Machine Interface
HMWPE	High Molecular Weight Polyethylene

Abbreviation/Acronym	Definition
HNBR	Hydrogenated Nitrile Butadiene Rubber
HO	Hold
HP	High Pressure
hp (HP)	Horsepower
hr	Hour
HRB	Rockwell Hardness, B Scale
HRSG	Heat Recovery Steam Generator
HSLA	High Strength, Low Alloy
HVAC	Heating, Ventilation and Air Conditioning
Hz	Hertz
I	Importance Factor
I&C	Instrumentation & Controls
i.e.	"That is"
I/O	Input/Output
IAS	International Accreditation Service
IBBM	Iron Body Bronze Mounted
IBC	International Building Code
IBM	International Business Machines
ICEA	Insulated Cable Engineers Association
ICS	Industrial Control and Systems
ID	Inner Diameter
ID	Induced Draft
ID	Identification
IEC	International Electrotechnical Commission
IEEE	Institute of Electrical and Electronics Engineers
IFA	Issued for Approval
IFB	Insulating Firebrick
IFC	Issued for Construction
IFI	Industrial Fasteners Institute
IGBT	Insulated Gate Bipolar Transistors
IK	Insertable Kinetic
IMC	Intermediate Metallic Conduit
in	Inch (US)
in.w	Inches of Water
in.wc	Inches of Water Column
in.wg	Inches of Water Gauge
IP	Ingress Protection
IP	Internet Protocol
IR	Insertable Rotating

Abbreviation/Acronym	Definition
ISA	International Society of Automation
ISO	International Organization for Standardization
IT	Unearthed Transformer Neutral
ITC	Instrumentation Tray Cable
ITP	Inspection & Test Plan
JEA	Jacksonville Electric Authority
kcmil	Kilo circular Mils
kg	Kilogram
km	Kilometer
kN	Kilonewton
kPa	Kilopascal
kPag	Kilopascal gauge
kVA	Kilovolt-amperes (apparent power)
kW	Kilowatt
Kzt	Topographic factor
L	Length
L	Liter
LAN	Local area network
lb	Pound (weight)
LCD	Liquid crystal display
LD	Liquidated damages
LED	Light-emitting diode
LFL	Lower flammability limit
LFMC	Liquidtight flexible metallic conduit
L-G	Line to Ground (fault)
L-L	Line to Line (fault)
LLC	Limited liability company
LNTP	Limited notice to proceed
LOTO	Lock out tag out
LP	Low pressure
LSHF	Low smoke, halogen free
LV	Low voltage
m	Meter
M&C	M&C TechGroup
M/A	Motor contactor/actuator
mA	Milliamp
MAOP	Maximum allowable operating pressure
Max	Maximum
MBtu/hr	Million Btu per hour

Abbreviation/Acronym	Definition
MCC	Motor control center
MCP	Motor current protection
MCR	Maximum continuous rating
MCR-NG	Maximum continuous rating on natural gas
MDR	Manufacturer's data report
MECL	Minimum Emissions Compliance Load
MERV	Minimum efficiency reporting value
MFC	Measurement of fluid flow in closed conduit
MFG	Manufacturing
Mfr.	Manufacturer
MFT	Master fuel trip
mg	Milligram
Micron	Micrometer
mils	1 mil = 0.001 inch
min	Minute
Min	Minimum
mm	Millimeter
MNPT	Male National Pipe Thread
MOM	MSDS / OSHA Management
MOV	Motor-Operated Valve
MPa	Megapascal
mph	Miles per Hour
MS	Microsoft
MSS	Manufacturers Standardization Society
MTNEJ	MTN Inc. Expansion Joint
MV	Medium Voltage
MW	Megawatt
N	Fan Running Speed
N	Newton
N	Neutral
N/A	Not Applicable
NACE	National Association of Corrosion Engineers
NDE	Non-Destructive Examination
NE	No Exceptions Noted
NEC	National Electrical Code
NECA	National Electrical Contractors Association
NEMA	National Electrical Manufacturers Association
NESC	National Electric Safety Code
NETA	National Electrical Testing Association

Abbreviation/Acronym	Definition
NFC	National Fire Code
NFPA	National Fire Protection Association
NG	Natural Gas
NGS	Northside Generating Station
NH ₃	Ammonia
NIST	National Institute of Standards and Technology
nm	Nanometer
Nm	Newton-Meter
No.	Number
NOAA	National Oceanic and Atmospheric Administration
Nom	Nominal
NOx	Nitrogen Oxides
NPS	Nominal Pipe Size
NPT	National Pipe Thread
NSF	National Sanitation Foundation
NTP	Notice to Proceed
O&M	Operation & Maintenance
OD	Outer Diameter
OEM	Original Equipment Manufacturer
OFA	Overfire Air
OSHA	Occupational Safety and Health Administration
OTDR	Optical Time Domain Reflectometer
P&ID	Piping & Instrumentation Diagram
PA	Primary Air
Pa	Pascal
PCC	Point of Common Coupling
PDC	Power Distribution Center
PDF	Portable Document Format
PE	Professional Engineer
PE	Protective Earth Conductor
PED	Pressure Equipment Directive
PER	Post Event Report
PFA	Perfluoro alkoxy (Teflon)
PFI	Pipe Fabrication Institute
PGT	Performance Guarantee Test
pH	Potential of Hydrogen (Acidity/Basicity)
Ph	Phase
PHA	Process Hazard Analysis
PHMSA	Pipeline and Hazardous Materials Safety Administration

Abbreviation/Acronym	Definition
PIE	Power Island Equipment
PLC	Programmable Logic Controller
PLTC	Power-Limited Tray Cable
PMI	Positive material identification
PO4	Phosphate
P-P	Phase to Phase (fault)
PPE	Personal Protective Equipment
PPM	Parts Per Million
PPMVD	Parts Per Million by Volume, Dry
PQR	Procedure Qualification Record
PSD	Prevention of significant deterioration
PSI	Pounds per Square Inch
psig	Pounds per Square Inch Gauge
PT	Potential/Voltage Transformer
PTC	Performance Test Codes
PTFE	Polytetrafluoroethylene (Teflon)
PVC	Polyvinyl Chloride
PWHT	Post-Weld Heat Treatment
PWM	Pulse-Width Modulated
QA	Quality Assurance
QC	Quality Control
QCP	Quality Control Plan
QMS	Quality Management System
RAL	4 Digit Paint color numbering system
RAM	Random access memory
RATA	Relative accuracy test audit
RC	Returned for corrections
RD	Received for distribution
RE	Responsible engineer
RF	Radio frequency
RF	Raised face (flange)
RFP	Request for proposal
RGS	Rigid galvanized steel
RH	Relative Humidity
RHH (Insulation)	Rubber High Heat
RHW (Insulation)	Rubber High Heat, Water-Resistant
RMC	Rigid Metallic Conduit
RPM	Rotations per Minute
RR	Release for Record

Abbreviation/Acronym	Definition
RT	Radiographic testing
RT NDE	Radiographic testing, non-destructive evaluation
RTD	Resistance temperature detector
s	Second
S	Spectral response acceleration (seismic)
SA	Steel alloy
SAE	Society of automotive engineers
SAMA	Scientific approach to malware analysis
SAT	Site acceptance test
SC	Standard connector
SSC	Submerged scraper conveyor
SCFM	Standard cubic feet per minute
SCR	Selective catalytic reduction
SDS	Safety data sheets
sec	Second
SEL	Schweitzer engineering laboratories
SFA	Welding filler materials
SJRPP	St Johns River Power Park
SL	Sea level
SMOS	Soil moisture and ocean salinity
SO ₂	Sulfur dioxide
SO ₄	Total sulfur
SOE	Sequence of events
SOFA	Separated overfire air
SOL	Sockolets
SOV	Solenoid operated valves
SP6	Standard Practice 6 - finish requirement for gasket contact face
SPDT	Single pole, double throw
Sq.	Square
SQL	Structured Query Language
SRU	Sulfur Recovery Unit
SS	Stainless Steel
SS	Superseded
SSC	Submerged Scraper Conveyor
SSPC	Society of Protective Coatings
SSTD	Solid-State Trip Devices
SU	Start Up
SUS	Secondary Unit Substations
SWC	Surge Withstand Capability

Abbreviation/Acronym	Definition
SWPPP	Stormwater Pollution Prevention Plan
TCP	Transmission Control Protocol
TEFC	Totally Enclosed, Fan Cooled
TENV	Totally Enclosed, Not Ventilated
TFA	Technical Field Advisor
THHN	Thermoplastic High Heat-resistant Nylon-coated
THWN	Thermoplastic Heat & Water-resistant Nylon-coated
TIA	Telecommunications Industry Association
TN	Transformer Neutral Earthed
TN-S	Transformer Neutral Earthed, Separate Neutral and Earth Conductors
TOL	Threadolets
TW	Thermoplastic, Water-Resistant
TX	Texas
UG	Underground
UL	Underwriters Laboratories
UNS	Unified Numbering System
UPS	Uninterrupted power supply
US	United States
UTR	Unit Trip Relay
UV	Ultraviolet
V	Volts
VAC	Volts Alternating Current
VDC	Volts Direct Current
VDU	Video Display Unit
VFD	Variable Frequency Drive
VLF	Very Low Frequency
VO	Void
VOC	Volatile Organic Compounds
VPI	Vacuum Pressure Impregnation
VT	Variable Torque
W	Watt
WB	Wet Bulb
WCB	Weldable Cast B-Grade Steel
WFGD	Wet Flue Gas Desulfurization
WPS	Welding Procedure Specification
XHHW	Cross-Linked Polyethylene, High Heat-Resistant, Water-Resistant
XLPE	Cross-Linked Polyethylene
XML	Extensible Markup Language
Y/N	Yes/No