Cable in Conduit

Quick reference guide
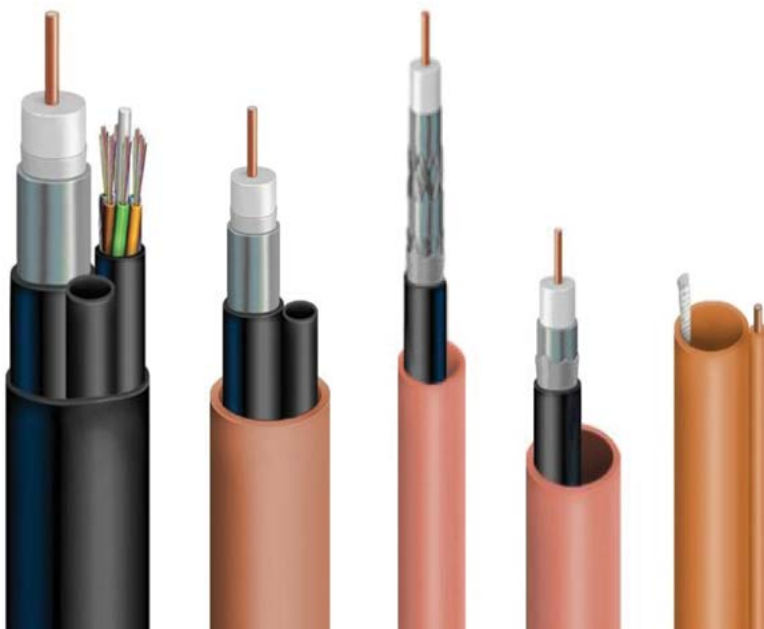
COMMSCOPE®

Cable in Conduit

The Benefits of Cable In Conduit

- Continuous length with preinstalled cables
- Protects buried cables from harsh environments, digging mishaps and rodents
- Saves the time, labor and costs associated with pulling and jetting cables
- Pathway for future cable installations, replacements and repairs
- Configurations to meet any needs for today and planning for tomorrow

The Cable In Conduit Portfolio

- Pre-installed with QR or P3 cable
- Pre-installed with drop coaxial cable
- Pre-installed with fiber cable
- E_2O hybrid
- Toneable conduit
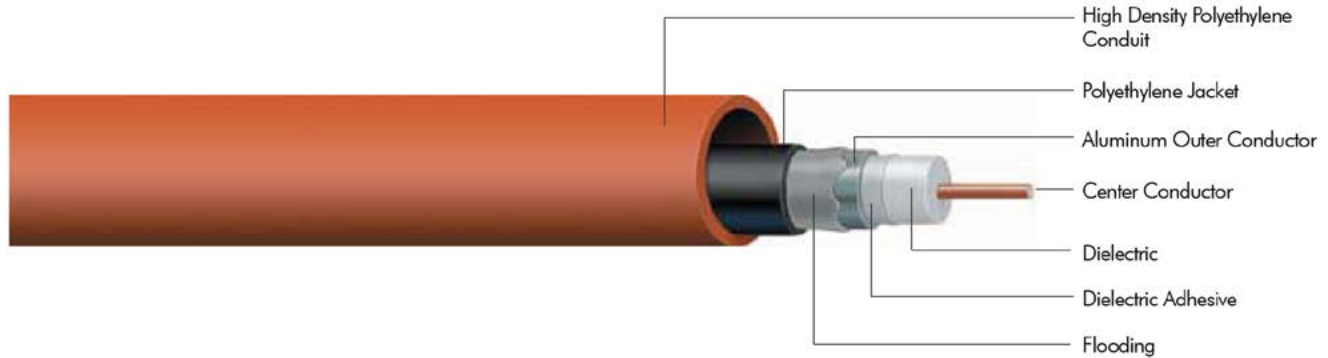- Empty conduit (empty or with rope/tape)

ConQuest® Conduit

Pre-Installed with QR® Trunk and Distribution Cable

QR®-In-Conduit

(JCASS Product Shown)

- High Density Polyethylene Conduit
- Polyethylene Jacket
- Aluminum Outer Conductor
- Center Conductor
- Dielectric
- Dielectric Adhesive
- Flooding

CommScope's patented QR® coaxial cable was developed to meet the increasing demands of tomorrow's broadband networks. QR has the highest reliability and flexibility of any coaxial cable, low RF attenuation and an unprecedented 10-year warranty.

QR coaxial cable offers lower attenuation than larger traditional products, with unmatched flexibility, reliability and cost effectiveness. CommScope offers three standard sizes (540, 715 and 860) of QR Cable-In-Conduit, each optimized for a specific use. For more information or specifications on QR products, please visit our website at www.commscope.com.

Conduit's technical characteristics					
Size	Wall Thickness	Wall Rating	Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft
3/4"	SDR 13.5	Medium	NA	NA	NA
	SDR 11	Heavy	NA	NA	NA
	SCH 40	Extra-Heavy	NA	NA	NA
1"	SDR 13.5	Medium	3,700	63 x 28 x 43	261
	SDR 11	Heavy	3,700	63 x 28 x 43	296
	SCH 40	Extra-Heavy	3,700	63 x 28 x 43	311
1 1/4"	SDR 13.5	Medium	3,700	80 x 43 x 43	357
	SCH 40	Heavy	3,700	80 x 43 x 43	387
	SDR 11	Extra-Heavy	3,700	80 x 43 x 43	412
1 1/2"	SDR 13.5	Medium	3,700	90 x 43 x 43	436
	SCH 40	Heavy	3,700	90 x 43 x 43	445
	SDR 11	Extra-Heavy	3,700	90 x 43 x 43	508
2"	SCH 40	Medium	3,700	102 x 48 x 43	564
	SDR 13.5	Heavy	3,700	102 x 43 x 43	624
	SDR 11	Extra-Heavy	3,700	102 x 43 x 43	732

Other cables and wall sizes may be available upon request.
*Weight does not include the reel.
* FDT - Flange, Drum, Traverse

ConQuest® Conduit Catalog Numbering Key

Pre-Installed with QR® Trunk and Distribution Cable

```
1  5  0  T  1  3  5        QR  8  6  0  J  C  A  S  S
```

Outer Diameter

¾"	075
1"	100
1¼"	125
1½"	150
2"	200

Wall Thickness

110	SDR 11
135	SDR 13.5
040	SCH 40
080	SCH 80

Cable

QR540JCASS
QR715JCASS
QR860JCASS

Please contact Customer Service if you need assistance in building part numbers.

Color

T	Terracotta
B	Black
O	Orange
G	Grey
U	Blue
E	Green
Y	Yellow
W	White
N	Brown
R	Red

Stripes (Tracers)

Omit	No Stripe
TG	Grey
TU	Blue
TE	Green
TY	Yellow
TW	White
TN	Brown
TR	Red

| Size	Wall Thickness	Wall Rating	QR 715 JCASS			QR 860 JCASS		
			Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft	Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft
3/4"	SDR 13.5	Medium	NA	NA	NA	NA	NA	NA
	SDR 11	Heavy	NA	NA	NA	NA	NA	NA
	SCH 40	Extra-Heavy	NA	NA	NA	NA	NA	NA
1"	SDR 13.5	Medium	NA	NA	NA	NA	NA	NA
	SDR 11	Heavy	NA	NA	NA	NA	NA	NA
	SCH 40	Extra-Heavy	NA	NA	NA	NA	NA	NA
1 1/4"	SDR 13.5	Medium	3,000	68 x 28 x 43	409	NA	NA	NA
	SCH 40	Heavy	3,000	68 x 28 x 43	439	NA	NA	NA
	SDR 11	Extra-Heavy	3,000	68 x 28 x 43	464	NA	NA	NA
1 1/2"	SDR 13.5	Medium	3,000	90 x 43 x 43	488	2,700	80 x 43 x 43	558
	SCH 40	Heavy	3,000	90 x 43 x 43	497	2,700	80 x 43 x 43	567
	SDR 11	Extra-Heavy	3,000	90 x 43 x 43	560	2,700	80 x 43 x 43	630
2"	SCH 40	Medium	3,000	102 x 48 x 43	616	2,700	102 x 48 x 43	686
	SDR 13.5	Heavy	3,000	102 x 43 x 43	676	2,700	102 x 43 x 43	746
	SDR 11	Extra-Heavy	3,000	102 x 43 x 43	784	2,700	102 x 43 x 43	854

Specifications are subject to change without notice.
*Weight does not include the reel.
* FDT - Flange, Drum, Traverse

ConQuest® Conduit

Pre-Installed with P3® Trunk & Distribution Cable

P3®-In-Conduit
(JCASS Product Shown)
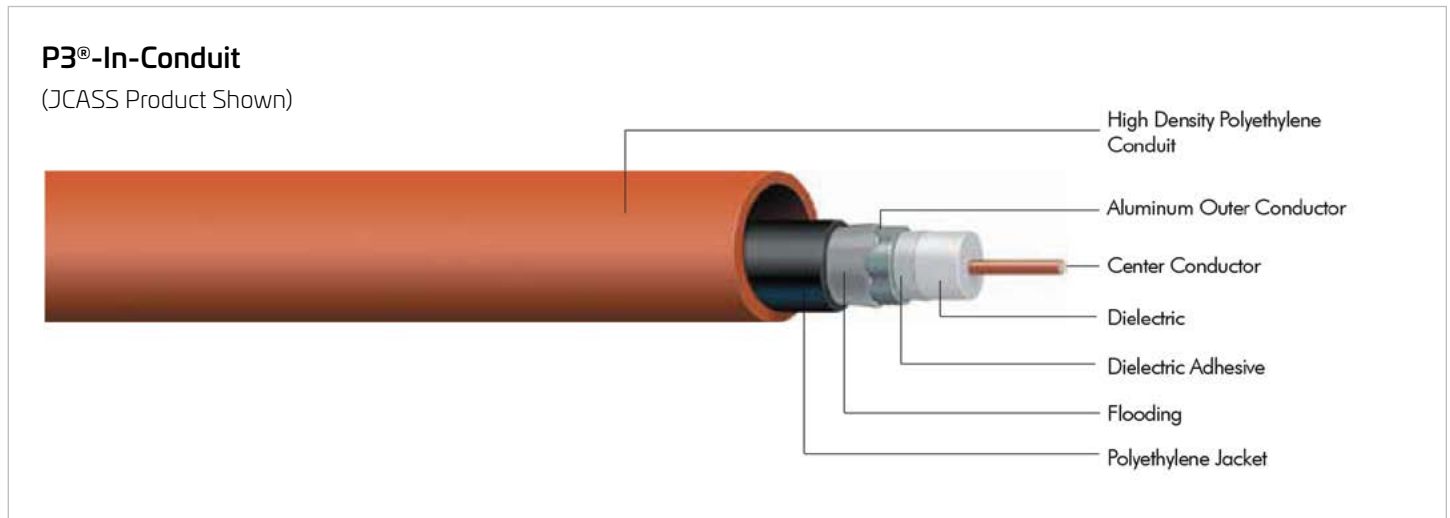
CommScope's P3® product line is the industry standard by which all coaxial trunk and distribution cables are measured. P3 has been proven robust and reliable by years of successful installations.

CommScope P3 offers low attenuation and inherent strength making it an industry standard. CommScope offers several different sizes of P3 Cable-In-Conduit (500, 565, 625, 700, 750 and 875), each optimized for a specific use. For more information or specifications on our P3 cables, please visit our website at www.commscope.com.

Size	Wall Thickness	Wall Rating	P3 500 JCASS			P3 565 JCASS			P3 625 JCASS		
			Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft	Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft	Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft
1"	SDR 13.5	Medium	2,400	54 x 28 x 43	266	2,400	54 x 28 x 43	285	NA	NA	NA
	SDR 11	Heavy	2,400	54 x 28 x 43	316	2,400	54 x 28 x 43	320	NA	NA	NA
	SCH 40	Extra-Heavy	2,400	54 x 28 x 43	316	2,400	54 x 28 x 43	335	NA	NA	NA
1 1/4"	SDR 13.5	Medium	2,400	63 x 28 x 43	362	2,400	63 x 28 x 43	381	2,400	63 x 28 x 43	410
	SDR 11	Heavy	2,400	63 x 28 x 43	392	2,400	63 x 28 x 43	411	2,400	63 x 28 x 43	440
	SCH 40	Extra-Heavy	2,400	63 x 28 x 43	417	2,400	63 x 28 x 43	436	2,400	63 x 28 x 43	465
1 1/2"	SDR 13.5	Medium	2,400	80 x 43 x 43	441	2,400	80 x 43 x 43	460	2,400	80 x 43 x 43	489
	SCH 40	Heavy	2,400	80 x 43 x 43	450	2,400	80 x 43 x 43	469	2,400	80 x 43 x 43	498
	SDR 11	Extra-Heavy	2,400	80 x 43 x 43	513	2,400	80 x 43 x 43	532	2,400	80 x 43 x 43	561
2"	SDR 13.5	Medium	2,400	90 x 48 x 43	569	2,400	90 x 48 x 43	588	2,400	90 x 48 x 43	617
	SCH 40	Heavy	2,400	90 x 43 x 43	629	2,400	90 x 43 x 43	648	2,400	90 x 43 x 43	677
	SDR 11	Extra-Heavy	2,400	90 x 43 x 43	737	2,400	90 x 43 x 43	756	2,400	90 x 43 x 43	785

Specifications are subject to change without notice.
*Weight does not include the reel.
* FDT - Flange, Drum, Traverse

ConQuest® Conduit Catalog Numbering Key

Pre-Installed with P3® Trunk & Distribution Cable

| 1 | 2 | 5 | T | 1 | 3 | 5 | | | P | 3 | 6 | 2 | 5 | J | C | A | S | S |

Outer Diameter

1″	100
1¼″	125
1½″	150
2″	200

Wall Thickness

110	SDR 11
135	SDR 13.5
040	SCH 40
080	SCH 80

Cable

P3500JCASS
P3565JCASS
P3625JCASS
P3700JCASS
P3750JCASS
P3875JCASS

Color

T	Terracotta
B	Black
O	Orange
G	Grey
U	Blue
E	Green
Y	Yellow
W	White
N	Brown
R	Red

Stripes (Tracers)

Omit	No Stripe
TG	Grey
TU	Blue
TE	Green
TY	Yellow
TW	White
TN	Brown
TR	Red

Please contact Customer Service if you need assistance in building part numbers.

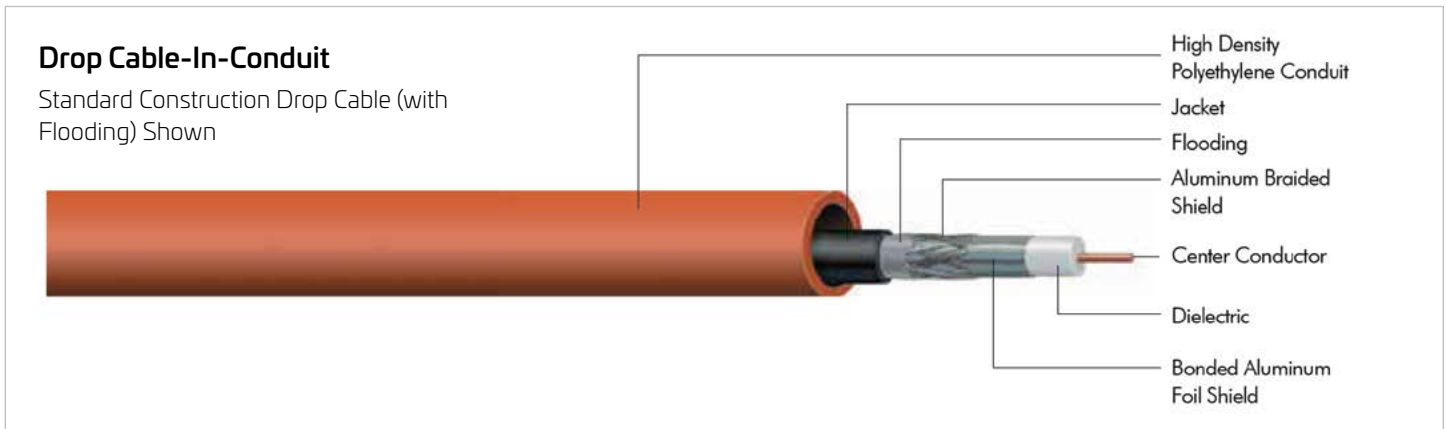| Size	Wall Thickness	Wall Rating	P3 700 JCASS			P3 750 JCASS			P3 875 JCASS		
			Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft	Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft	Nominal Length (ft)	Reel Size (FDT*) (in)	Weight* lbs/kft
1″	SDR 13.5	Medium	NA	NA	NA	NA	NA	NA	NA	NA	NA
	SDR 11	Heavy	NA	NA	NA	NA	NA	NA	NA	NA	NA
	SCH 40	Extra-Heavy	NA	NA	NA	NA	NA	NA	NA	NA	NA
1 1/4″	SDR 13.5	Medium	2,500	63 x 28 x 43	430	2,500	68 x 28 x 43	467	NA	NA	NA
	SDR 11	Heavy	2,500	63 x 28 x 43	460	2,500	68 x 28 x 43	497	NA	NA	NA
	SCH 40	Extra-Heavy	2,500	63 x 28 x 43	485	2,500	68 x28 x 43	522	NA	NA	NA
1 1/2″	SDR 13.5	Medium	2,500	80 x 43 x 43	509	2,500	80 x 43 x 43	546	2,500	80 x 43 x 43	606
	SCH 40	Heavy	2,500	80 x 43 x 43	518	2,500	80 x 43 x 43	555	2,500	80 x 43 x 43	615
	SDR 11	Extra-Heavy	2,500	80 x 43 x 43	581	2,500	80 x 43 x 43	618	2,500	80 x 43 x 43	678
2″	SDR 13.5	Medium	2,500	90 x 48 x 43	637	2,500	90 x 48 x 43	674	2,500	90 x 48 x 43	734
	SCH 40	Heavy	2,500	90 x 43 x 43	697	2,500	90 x 43 x 43	734	2,500	90 x 43 x 43	794
	SDR 11	Extra-Heavy	2,500	90 x 43 x 43	805	2,500	90 x 43 x 43	842	2,500	90 x 43 x 43	902

Specifications are subject to change without notice.
*Weight does not include the reel.
* FDT - Flange, Drum, Traverse

ConQuest® Conduit

Pre-Installed with CommScope Drop Cable

Drop Cable-In-Conduit

Standard Construction Drop Cable (with Flooding) Shown

High Density Polyethylene Conduit
Jacket
Flooding
Aluminum Braided Shield
Center Conductor
Dielectric
Bonded Aluminum Foil Shield

CommScope Drop-In-Conduit is a complete family of products serving a number of applications. All drop cable products are available in a variety of sizes (59, 6 and 11) and configurations (standard, tri-shield and super-shield). For more information or specifications on drop cables, please visit our website at www.commscope.com.

Size	Wall Thickness	Wall Rating	Maximum Number of Cables			Nominal Length	Reel Size (FDT*) (in.)
			F59 Series	F6 Series	F11 Series		
13mm	SDR 11	Heavy	1	1	0	1,000	24 x 12 x 18
1/2"	SDR 13.5	Medium	1	1	0	1,000	35 x 16½ x 18
	SDR 11	Heavy	1	1	0	1,000	35 x 16½ x 18
3/4"	SDR 13.5	Medium	2	2	1	1,000	42 x 24 x 24
	SDR 11	Heavy	2	2	1	1,000	42 x 24 x 24
	SCH 40	Extra Heavy	2	2	1	1,000	42 x 24 x 24
1"	SDR 13.5	Medium	3	3	2	1,000	50 x 24 x 24
	SDR 11	Heavy	3	3	2	1,000	50 x 24 x 24
	SCH 40	Extra Heavy	3	3	2	1,000	50 x 24 x 24

Specifications are subject to change without notice.
Other cables and wall sizes may be available upon request.
* FDT - Flange, Drum, Traverse

ConQuest® Conduit Catalog Numbering Key

Pre-Installed with CommScope Drop Cable

| 0 | 7 | 5 | T | 1 | 3 | 5 | | | F | 1 | 1 | 7 | 7 | T | S | E | F | X | P |

Outer Diameter

13mm	13M
½"	050
¾"	075
1"	100

Wall Thickness

110	SDR 11
135	SDR 13.5
040	SCH 40
080	SCH 80

Cable

F677TSEF XP
F1177TSEF XP

Please contact Customer Service if you need assistance in building part numbers.
*Ribbed not available in 13mm and ½" conduit

Color

T	Terracotta
B	Black
O	Orange
G	Grey
U	Blue
E	Green
Y	Yellow
W	White
N	Brown
R	Red

Stripes (Tracers)

Omit	No Stripe
TG	Grey
TU	Blue
TE	Green
TY	Yellow
TW	White
TN	Brown
TR	Red

Fiber Cable In Conduits

On Request Only

Fiber Cable In Conduits

Shown with All-Dielectric Stranded Losse
Tube Fiber Cable

High Density Polyethylene
(HDPE) Conduit

18 Gauge
(Fluoropolymer Coated)
Copper Clad Steel
Tone Wire
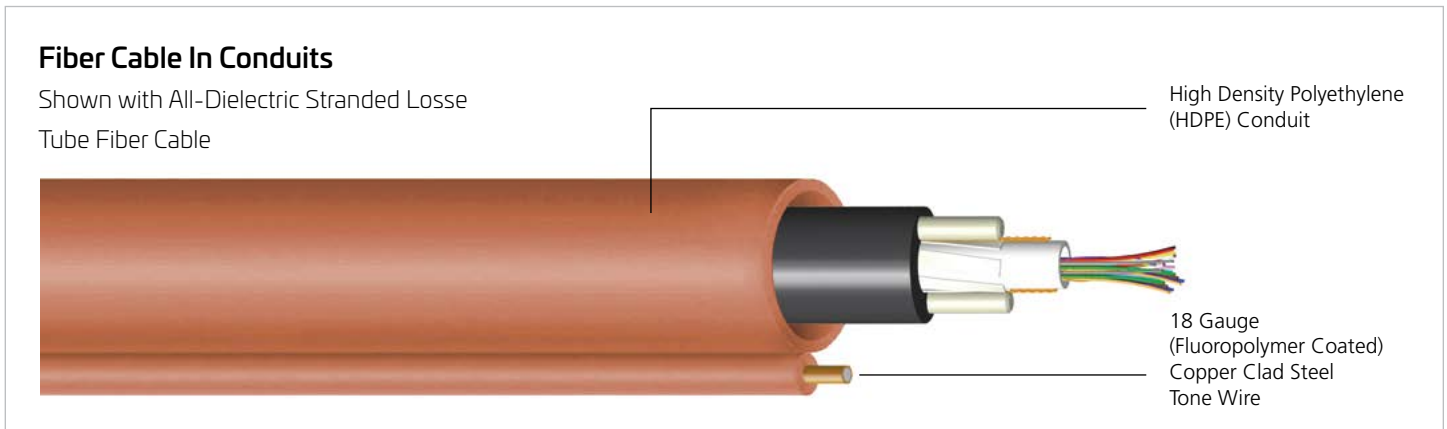
CommScope applies the same Cable in Conduit expertise to fiber optic cables. CommScope fiber optic cables can be preinstalled in various duct sizes to provide superior protection and eliminate the costs of pulling and jetting cables in the field.

Fiber in duct is not considered standard construction and requires feasibility study. Please contact us directly for any request.

E$_2$O Design
Custom Designs to meet your needs

E$_2$O
Electrical to Optical Design
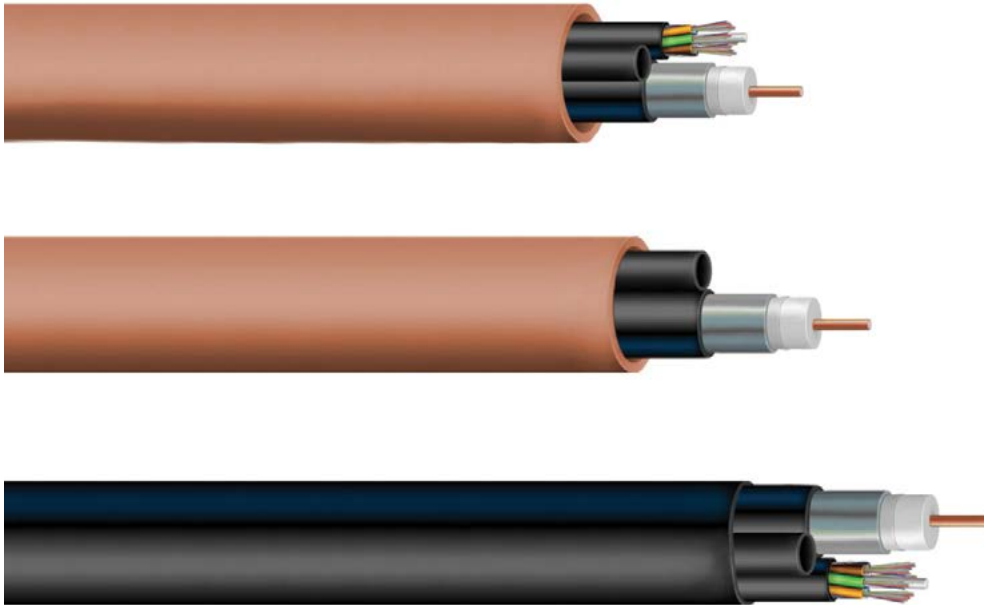
CommScope's Electrical to Optical (E2O) product line is a highly customizable solution that combines coaxial cable, optical fiber and/or microducts inside a single conduit sheath. The flexible design enables you to build in the capacity and space you need to handle future upgrades with little to no associated installation costs.

With E$_2$O you can:

- Optimize node splits to allow for future fiber extensions at minimized cost

- Build the capacity you need for the immediate future, reserving microducts for additional fiber that can be blown in at any time—at a fraction of the cost of replacing your outside plant

- Create a complete FTTx solution with all coaxial and fiber components pre-installed, and bring individual conductors on line as your channel and bandwidth needs grow. In other words: with E2O, your next outside plant upgrade could be your last for a very long time.

ConQuest® Toneable Conduit™

For Locating and Protecting Underground Infrastructure

Shown Empty

High Density Polyethylene
(HDPE) Conduit

18 Gauge
(Fluoropolymer Coated)
Copper Clad Steel
Tone Wire
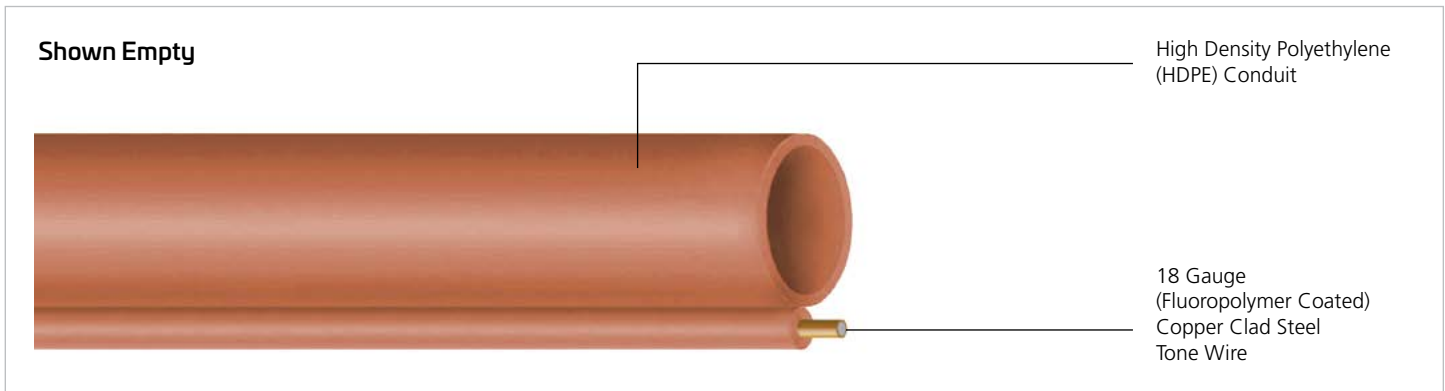
ConQuest® Toneable Conduit™

Dimensions and Specifications

SDR 11

Size	Nominal Outside Diameter (inches)	Minimum Wall Thickness (inches)	Nominal Inner Diameter (inches)	Min. Bend Radius Unsupported (inches)	Max. Pulling Tension (lbs.)	Weight* (lb/kft)
3/4"	1.050	0.095	0.840	12	485	130
1"	1.315	0.120	1.055	14	760	210
1 1/4"	1.660	0.151	1.338	18	1,215	326
1 1/2"	1.900	0.173	1.533	20	1,410	422
2"	2.375	0.216	1.917	26	2,485	646

SDR 13.5

Size	Nominal Outside Diameter (inches)	Minimum Wall Thickness (inches)	Nominal Inner Diameter (inches)	Min. Bend Radius Unsupported (inches)	Max. Pulling Tension (lbs.)	Weight* (lb/kft)
3/4"	1.050	0.078	0.874	12	405	111
1"	1.315	0.097	1.101	14	630	175
1 1/4"	1.660	0.123	1.394	18	1,010	281
1 1/2"	1.900	0.141	1.598	20	1,165	350
2"	2.375	0.176	2.002	26	2,065	538

SCH 40

Size	Nominal Outside Diameter (inches)	Minimum Wall Thickness (inches)	Nominal Inner Diameter (inches)	Min. Bend Radius Unsupported (inches)	Max. Pulling Tension (lbs.)	Weight* (lb/kft)
3/4"	1.050	0.113	0.804	12	565	149
1"	1.315	0.133	1.029	14	840	225
1 1/4"	1.660	0.140	1.360	18	1,135	301
1 1/2"	1.900	0.145	1.590	20	1,360	359
2"	2.375	0.154	2.047	26	1,840	478

Other wall thicknessees may be available upon request. Specifications are subject to change without notice.
*Attention: Pulling tensions can be influenced by temperature and soil conditions.
Please refer to the ConQuest Installation Manual for proper installation techniques.
**Weight does not include the reel.

ConQuest® Toneable Conduit Catalog Numbering Key

| 2 | 0 | 0 | T | T | D | 0 | 4 | 0 | | | | | W | P | 1 | 8 | 0 | 0 | T | A | P | E |

Outer Diameter

¾"	0785
1"	100
1¼"	125
1½"	150
2"	200

Tonable

(TD)

Wall Thickness

110	SDR 11
135	SDR 13.5
040	SCH 40

Wall Type

Omit	Smooth
RIB	Ribbed

Cable

EMPTY DUCT
PP200ROPE
WP1250TAPE
WP1800TAPE

Color

T	Terracotta
B	Black
O	Orange
G	Grey
U	Blue
E	Green
Y	Yellow
W	White
N	Brown
R	Red

Stripes (Tracers)

Omit	No Stripe
TG	Grey
TU	Blue
TE	Green
TY	Yellow
TW	White
TN	Brown
TR	Red

Please contact Customer Service if you need assistance in building part numbers.

ConQuest® Conduit
Empty Conduit Products

Ribbed Wall Empty Conduit

CommScope manufactures smooth wall or ribbed (internal surface finish) conduit in a variety of wall thicknesses, and with a selection of pull lines available. ConQuest empty conduit provides superior protection and easy low friction placement of your valuable communications cable. Empty conduit products are the same high quality as CommScope's Cable-In-Conduit (CIC) products.

Conduit Size	Internal Surface		Wall Sizes			Pull Ropes				Pull Tapes	
	Smooth	Ribbed	SDR 11	SDR 13.5	SCH 40	200lb.	1100lb.	1200lb.	1800lb.	1250lb.	1800lb.
13 mm	•		H			•					
1/2"	•		H	M		•					
3/4"	•	•	H	M	X	•	•				
1"	•	•	H	M	X	•	•	•	•	•	•
11/4"	•	•	X	M	H	•	•	•	•	•	•
11/2"	•	•	X	M	H	•	•	•	•	•	•
2 "	•	•	X	H	M	•	•	•	•	•	•
3"	•	•	X	H			•	•	•	•	•

• = Available   M= Medium   H= Heavy   X= Extra Heavy   ▮ = Standard Product Offering

Specifications are subject to change without notice. Other wall sizes may be available upon request.

Available Pull Ropes and Pull Tapes

Polypropylene Pull Rope (200 lb. shown)

Polyester Pull Tape (Available in 1250 and 1800 lb.)

ConQuest® Conduit Catalog Numbering Key

For Empty Conduit Products

0	5	0	G	1	3	5						P	P	2	0	0	R	O	P	E

Outer Diameter

13mm	13M
½"	050
¾"	075
1"	100
1¼"	125
1½"	150
2"	200
3"	300

Color

T	Terracotta
B	Black
O	Orange
G	Grey
U	Blue
E	Green
Y	Yellow
W	White
N	Brown
R	Red

Wall Thickness

110	SDR 11
135	SDR 13.5
040	SCH 40
080	SCH 80

Stripes (Tracers)

Omit	No Stripe
TG	Grey
TU	Blue
TE	Green
TY	Yellow
TW	White
TN	Brown
TR	Red

Wall Type

Omit	Smooth
RIB	Ribbed*

Pull Line

EMPTY DUCT
PP200ROPE
WP1250TAPE
WP1800TAPE

Please contact Customer Service if you need assistance in building part numbers.
*Ribbed not available in 13mm and ½" conduit

CommScope pushes the boundaries of communications technology with game-changing ideas and ground-breaking discoveries that spark profound human achievement. We collaborate with our customers and partners to design, create and build the world's most advanced networks. It is our passion and commitment to identify the next opportunity and realize a better tomorrow. Discover more at commscope.com

COMMSCOPE®