

cingl
TELECOMMUNICATIONS
L.L.C.



CONFIDENTIAL PROPOSAL
CABLING INFRASTRUCTURE

City of Forney

City Hall Telecommunications Structured Cabling

Prepared
by

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Quote # 4482 Rev1

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Thank you for this opportunity to make another satisfied cingl
Telecommunications L.L.C. customer.

SCOPE OF WORK

HORIZONTAL SUBSYSTEM

1st Level

CINGL will provide material and labor to install:

- (38) 2-Data Office Locations
- (1) 1-Data Office Locations
- (7) 1-Data WAP Locations
- (7) ADDITIONAL CAMERA/ ACCESS CONTROL CABLES

TOTAL: (84) CAT 6 CABLES & (7) CAT 6A CABLES

2nd Level

CINGL will provide material and labor to install:

- (19) 2-Data Office Locations
- (4) 1-Data WAP Locations

TOTAL: (19) CAT 6 CABLES & (4) CAT 6A CABLES

All workstation data cables will consist of a 4-pair Category 6 Plenum Rated UTP Cable (Blue) (GENERAL 7131800).

All WAP data cables will consist of a 4-pair Category 6A Plenum Rated UTP Cable (Blue) (GENERAL 7141819).

The data cable will terminate on a RJ45 Category 6 Jack Insert (Blue) (PANDUIT CJ688TGBU) at the workstation location.

All Cat 6 jack inserts will connect to a 2-port Executive Faceplate (White) (PANDUIT CFPE2WH) at the workstation locations.

The WAP data cable will terminate on a RJ45 Category 6A Field Terminable Plug (PANDUIT FP6X88MTG). **NOTE: A 10-foot service loop will be provided at each WAP location.**

All office area cabling will be supported using the following:

- *Cable Support Bags (ERICO CAT425) w/ ceiling hanger wire for pathways that have more than 40+ Cat 6 cables.*
- *2" J-hooks w/ clips (PANDUIT JP2DW-L20) w/ ceiling hanger wire for pathways that have less than 40 Cat 6 cables.*

EQUIPMENT SUBSYSTEM

CINGL will provide material and labor to install:

- (1) 24-port Modular Patch Panel (PANDUIT CPPL24WBL Y) for the data workstation cable terminations.
- (2) 48-port Modular Patch Panel (PANDUIT CPPL48WBL Y) for the data workstation cable terminations.
 - (103) RJ45 Category 6 Mini-Com TX6 PLUS UTP Jack Module (Blue) (PANDUIT CJ688TGBUY) for the termination of the workstation data cables.
- (1) 24-port Modular Patch Panel (PANDUIT CPPL24WBL Y) for the data WAP cable terminations.
 - (11) RJ45 Category 6 Mini-Com TX6A PLUS UTP Jack Module (Blue) (PANDUIT CJ6X88TGBUY) for the termination of the WAP data cables.
- (1) 19"W x 84"H Equipment Rack with Floor Mount Kit (CHATSWORTH 55053-703) mounted on the floor for data and voice terminations and equipment.
 - (2) 12" x 10' Ladder Rack (CHATSWORTH 10250-712) installed from the top of the rack to the wall and up the wall for cable pathway and rack support. Also, the rack will run across the top of the existing cabinet for cable pathways.
 - (2) Wall Angle Support Kit (CHATSWORTH 11421-712) to support ladder rack to the wall.
 - (1) Vertical Wall Bracket Kit (CHATSWORTH 10608-001) to support ladder rack running up the wall.
 - (1) 3" Channel Rack to Runway Mounting Plate (CHATSWORTH 10595-712) to connect the ladder rack to the freestanding rack.
 - (3) 2" to 4" Cable Runway Elevation Kit (CHATSWORTH 10506-702) installed on top of the rack and cabinet for ladder rack support and pathway.
- (2) Double-Sided Vertical Wire Manager (PANDUIT WMPV45E) for cable management.
- (1) 2"W x 10"L Ground Bus Bar (CPI 13622-010) mounted on the plywood for grounding the rack.
 - #6 AWG Ground Wire will be used to ground all equipment and racks.

MDF Network Rack Layout

24-PORT PATCH PANEL (WAPS) – CAT 6A
1U CUSTOMER PROVIDED 48PT SWITCH - WAPS
24-PORT PATCH PANEL (DATA WORKSTATIONS) CAT 6
1U CUSTOMER PROVIDED 48PT SWITCH
48-PORT PATCH PANEL (DATA WORKSTATIONS) CAT 6
1U CUSTOMER PROVIDED 48PT SWITCH
48-PORT PATCH PANEL (DATA WORKSTATIONS) CAT 6
1U CUSTOMER PROVIDED 48PT SWITCH

ADMINISTRATION SUBSYSTEM

CINGL will provide material and labor to install:

- (103) 8” Slim-Line Category 6 Patch Cable (Blue) (PANDUIT UTP28SP8INBU) for IT closet patching.
- (96) 10-foot Slim-Line Category 6 Patch Cable (Blue) (PANDUIT UTP28SP10BU) for workstation patching.
- (11) 8” Slim-Line Category 6A Patch Cable (Blue) (PANDUIT UTP28X8INBU) for IT closet patching.

Labeling – cingl will label both ends of each cable with computer generated self-laminating labels. Labeling shall be attached per TIA-606 standards. Each wall jack shall be labeled with the corresponding patch panel location. Floor plans shall be marked with the corresponding patch panel/ jack number.

Support – Cabling shall be suspended in the ceiling above air conditioning ducts, sprinkler piping, and electrical conduit where elevations allow. Cable Supports will be installed through which cables shall be routed. Ceiling grid, electrical conduit, and sprinkler pipes will not be used to secure communications cabling.

Category 6/ 6A Testing - Shall perform a Category 6/6A test for each data cable installed. Tests include Line Map (continuity and polarity), Resistance, Near End Crosstalk (NEXT), Far End Cross Talk (ELFEXT), Power Sum ELFEXT, Attenuation, Length, and Delay Skew at rates up to 1GHz for Cat 6 or 10GHz for Cat 6A. Tests shall be conducted with a Fluke Versiv cable analyzer. A hard copy of the test results will be issued at completion of the work.

Documentation - Upon completion of the project, cingl Telecommunications will provide an installation report containing:

- A hard copy of all cable test reports.
- CADD drawing showing all workstation outlets and their numbers will be provided only if electronic CADD drawings can be obtained from the customer.

BILL OF MATERIALS WITH PRICING

LIST OF MATERIALS

Item	Description	Manuf.	Part Number	Qty.	Unit Price	Ext. Price
101	4-pair Category 6 Plenum Cable (Blue)	GENERAL	7131800	22000	\$0.2813	\$6,187.50
102	4-pair Category 6A Plenum Cable (Blue)	GENERAL	7141819	3000	\$0.5788	\$1,736.25
103	RJ45 Category 6 Mini-Com TX6 PLUS UTP Jack Module (Blue)	PANDUIT	CJ688TGBUY	103	\$7.5625	\$778.94
104	RJ45 Category 6 Field Terminable Plug	PANDUIT	FP6X88MTG	11	\$14.5625	\$160.19
105	2-port Executive Faceplate (White)	PANDUIT	CFPE2WHY	65	\$1.8125	\$117.81
106	Single Gang Metal Bracket Low Voltage Box Eliminator	ERICO	MP1	65	\$1.5000	\$97.50
107	Blank Inserts (White) 10PK	PANDUIT	CMBVH-X	1	\$2.2500	\$2.25
108	Cable Strap (Supports 265 Cat 6 Cables)	ERICO	CAT425	20	\$15.8125	\$316.25
109	J-Hook w/ Clip (Supports 31 Cat 6 Cables)	PANDUIT	JP2DW-L20	140	\$2.6875	\$376.25
110	Pre-Tied Ceiling Wire with Clip 6ft (100PK) - Includes Shots	HILTI	3550022	2	\$121.2500	\$242.50
301	RJ45 Category 6 Mini-Com TX6 PLUS UTP Jack Module (Blue)	PANDUIT	CJ688TGBUY	103	\$7.5625	\$778.94
302	RJ45 Category 6A Mini-Com TX6 PLUS UTP Jack Module (Blue)	PANDUIT	CJ6X88TGBUY	11	\$13.8125	\$151.94
303	24-port Modular Patch Panel	PANDUIT	CPPL24WBLY	2	\$26.2500	\$52.50
304	48-port Modular Patch Panel	PANDUIT	CPPL48WBLY	2	\$50.0000	\$100.00
305	19"W x 84"H Equipment Rack with Floor Mount Kit	CHATSWORTH	55053-703	1	\$172.5000	\$172.50
306	12" x 10' Ladder Rack	CHATSWORTH	10250-712	2	\$100.0000	\$200.00
307	Wall Angle Support Kit	CHATSWORTH	11421-712	2	\$26.4375	\$52.88
308	Junction Splice Kit (Black)	CHATSWORTH	11302-701	1	\$10.7500	\$10.75
309	Vertical Wall Bracket Kit	CHATSWORTH	10608-001	1	\$17.9375	\$17.94
310	3" Channel Rack to Runway Mounting Plate	CHATSWORTH	10595-712	1	\$36.3125	\$36.31
311	2" to 4" Cable Runway Elevation Kit	CHATSWORTH	10506-702	3	\$40.3125	\$120.94
312	Double-Sided Vertical Wire Manager	PANDUIT	WMPV45E	2	\$225.0000	\$450.00
313	2"W x 10"L Ground Bus Bar	CHATSWORTH	13622-010	1	\$103.5000	\$103.50
314	#6 AWG Stranded Ground Wire (Green)	CONDUMEX	5K-0601-5	60	\$0.8750	\$52.50
315	1-hole #6 Grounding Lug Mechanical	BURNDY	KA6U	4	\$1.8750	\$7.50
401	8" Slim-Line Category 6 Patch Cable (Blue)	PANDUIT	UTP28SP8INBU	103	\$6.8750	\$708.13
402	10-foot Slim-Line Category 6 Patch Cable (Blue)	PANDUIT	UTP28SP10BU	103	\$9.9375	\$1,023.56
403	8" Slim-Line Category 6A Patch Cable (Blue)	PANDUIT	UTP28X8INBU	11	\$10.0625	\$110.69
606	MISCELLANEOUS	GENERIC	1000	1	\$100.0000	\$100.00
					Material Total:	\$14,266.00

LABOR SUMMARY

Item	Description	Manuf.	Part Number	Qty.	Unit Price	Ext. Price
101	HORIZONTAL SUBSYSTEM	0	CABLEC			\$7,429.26
301	EQUIPMENT SUBSYSTEM	0	CABLEC			\$1,619.26
401	ADMINISTRATION SUBSYSTEM	0	CABLEC			\$1,012.67
					Labor Total:	\$10,061.18
					Material Total:	\$14,266.00
					Project Management Total:	\$0.00
					Travel and Expense Total:	\$0.00
					Total Project Investment Subtotal:	\$24,327.18
					Warranty on Materials and Labor	NC
					Total Project Investment:	\$24,327.18
ACCEPTED BY:				DATE		
<i>All Invoices are due by Net 15</i>						

WARRANTY

cingl Telecomm., L.L.C. warrants that the communications cabling system shall be installed to conform with EIA/TIA 568A specifications and that the cabling system shall be free from defects in materials and workmanship for lifetime of ownership by the client from date of acceptance. This warranty does not cover materials and workmanship that, once accepted, have become defective due to negligence, abuse, or by work performed by others.

In the event that a cable segment is suspected defective, cingl Telecommunications, L.L.C. shall, upon notification, repair the cable free of charge for the warranty period. If no problem is found with the cable, cingl Telecommunications, L.L.C. shall invoice for a standard service charge. Should evidence of negligence or abuse, or work performed by others be found, Owner shall be notified and arrangements made for repair that may include charges to Owner.

ASSUMPTIONS AND CAVEATS

All work can be performed during normal working hours 8:00am - 5:00pm, Monday-Friday. Access outside of normal working hours will be provided upon request.

Free and ready access will be provided to all required areas. Unscheduled delays caused by other trades may result in additional charges.

There is no asbestos present. If asbestos is found during the project, there may be delays and additional charges.

Work requested that is outside of this scope of work will result in additional charges.

Price is valid for a period of 30 days.