



COMMERCE COMMISSION

**STANDARD TERMS DETERMINATION FOR
TELECOM'S UNBUNDLED COOPER LOCAL LOOP
NETWORK CO-LOCATION SERVICE**

**SCHEDULE 2
CO-LOCATION PRICE LIST
PUBLIC VERSION**

7 November 2007

Updated to incorporate Commerce Commission clarifications up to 23 December 2009

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1 Introduction

- 1.1 This schedule sets out Charges for the Co-location Service at the date the Co-location Standard Terms take effect and includes a mechanism to make adjustments to the Charges. Note all prices in this schedule exclude GST.
- 1.2 References to clauses or sections are references to clauses or sections in this Co-location Price List unless expressly provided otherwise. The definitions set out in the Co-location General Terms and the Co-location Operations Manual apply to the extent that they are not expressly modified by or inconsistent with the context of this Co-location Price List.

2 Charges

- 2.1 Each Charge is described in the table below as being either a Core Charge ('C') or a Sundry Charge ('S').
- 2.2 **Core Charges** are for the core components of the Co-location Service.
- 2.3 **Sundry Charges** are for other components of the Co-location Service (**ancillary services**). These charges are either:
- 2.3.1 fixed; or
 - 2.3.2 calculated on a fixed hourly rate; or
 - 2.3.3 expressed as "price on application" (**POA**) to reflect:
 - (a) the underlying cost of providing the resources, and
 - (b) project management skills required to provide the ancillary services.
- 2.4 For all POA price items, Telecom must, if requested by the Access Seeker, use all reasonable endeavours to provide the Access Seeker with two or more competitive quotes.
- 2.5 Each Charge will become due and payable and will be invoiced in the manner described in the table below.
- 2.6 The provisions in the Co-location General Terms relating to invoicing and payment of Charges apply.

3 Co-location Types

- 3.1 Telecom is offering Access Seekers a standard Footprint for the various co-location types. The relevant components will therefore vary. This will depend on the specific requirements of each Access Seeker.
- 3.2 The price for the set up of a new instance of an exchange co-location and expansion of existing exchanges is set out in Service Components 1.1 and 1.2 of the Price List.
- 3.3 The prices for a Footprint are set out in the Price List under Service Components 2.1, 2.2 and 2.3. There may be additional components required by the Access Seeker. These are also identified in the Price List.
- 3.4 An Access Seeker will incur initial and ongoing costs for Initial and Full site Audits (1.4 and 1.5), training and access accreditation (1.6 and 1.7), and Operational licence fees for OO&T (1.10) and OFM (1.11).
- 3.5 In addition there are ancillary services that may be applicable which will depend on the circumstances.

4 Adjustment to Charges

- 4.1 At the request of a Party the Commission will undertake a review of the geographic property rental price zone prices (set out in section 8) used to calculate the price under Service Component 2.1.
- 4.2 Telecom must, subject to the approval of the Commission, pass through changes in costs by increasing or decreasing Sundry Charges as follows:
- 4.2.1 Each year, on the anniversary of the date the Commission's determination relating to the Co-location Service comes into effect (**Review Date**), Telecom must adjust:
 - (a) the Sundry Charges relating to the ancillary services that are shown in the Price List table below (in the column "Price Change Mechanism" and identified as "clause 4.2.1 (a)") by an amount equivalent to the percentage change (up or down) for the previous year in the Labour Cost Index (Communication Services) Series Reference LCIQ.SE49J9 as published by Statistics New Zealand.
 - (b) the Sundry Charges relating to the ancillary services that are shown in the Price List table below (in the column "Price Change Mechanism" and identified as "clause 4.2.1 (b)") below by an amount equivalent to the percentage change (up or down) for the previous year in the Producer

Price Index (Electricity Generation and Supply) Series Reference PPIQ.SUD01 as published by Statistics New Zealand.

For the purpose of this clause 4.2.1 the previous year is the period which commences on the quarterly index date immediately prior to the previous Review Date (or, for the first review, the date of the Commission's determination) and ends on the quarterly index date immediately prior to the Review Date.

4.2.2 Where:

- (a) the cost of providing one of the ancillary services that are shown in the Price List table below (in the column "Price Change Mechanism" and identified as "clause 4.2.2") increases or decreases; and
- (b) that increase or decrease is due to changes in input costs charged to Telecom pursuant to contractual obligations by its field service company contractors,

Telecom must immediately adjust the Sundry Charge relating to that ancillary service to reflect the increase or decrease in costs.

4.2.3 When adjusting the Sundry Charges under clause 4.2.1 Telecom must also review all Sundry Charges which are POA and provide a fixed price where this is practicable.

4.3 Once an adjustment has been calculated under clause 4.2, Telecom must give notice to the Commission of the adjustment. The notice must include:

- 4.3.1 a description of the adjustment made; and
- 4.3.2 the reasons for the increase or decrease;

4.4 Any adjustment to a Sundry Charge shall take effect from the date the Commission approves the adjustment.

CO-LOCATION SERVICES - PRICE LIST

1 Co-location Transaction Charges

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
1.1 Co-location new exchange	<p>Set up of a new instance of exchange Co-location and expansion of existing exchanges</p> <p>The set up of a new Co-location site for Access Seeker will vary for each exchange and will include the following components:</p> <ul style="list-style-type: none"> - Power feeds enhancement (DC) - Air Conditioning enhancement - Seismic Rack mounts - Cable tray and rack construction - Exchange manhole breakout - Room construction including items such as demolition and reconstruction of rooms; refurbishment of floor, wall and ceiling surfaces; construction of caging; installation of security systems; obtaining necessary permits and approvals; design; project management 	C	On notification by Telecom of completion of new co-location site set up		<p>Price based on actual time and materials incurred carrying out the Build. The Access Seeker shall pay Telecom a sum calculated as follows:</p> $A = B \times C$ <p>where</p> <p>A = the sum payable</p> <p>B = the modern equivalent value of the asset</p> <p>C = the proportion of the asset used by the Access Seeker</p> <p>The Access Seeker will pay Telecom's capital costs for that Build, calculated in accordance with section 7</p> <p>Telecom will pay the cost of providing caging or separate rooms in exchanges where Access Seeker Equipment must be separated from Telecom's core network.</p>
1.2 Co-location New Row	Installation and set up of a new row within an existing Co-location exchange	C	On completion of installation and set up of row		<p>Price based on actual time and materials incurred carrying out the Build. The Access Seeker shall pay Telecom a sum calculated as follows:</p> $A = B \times C$ <p>where</p> <p>A = the sum payable</p> <p>B = the modern equivalent value of the asset</p> <p>C = the proportion of the asset used by the Access Seeker</p> <p>The Access Seeker will pay Telecom's capital costs for that Build, calculated in accordance</p>

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge	
					with section 7 Telecom will pay the cost of providing caging or separate rooms in exchanges where Access Seeker Equipment must be separated from Telecom's core network.	
1.3	Co-location Room Works within existing room	Miscellaneous work on existing equipment excluding work to Building Services	S	On notification by Telecom of completion of co-location room works		Price on Application (POA) Price based on actual time and materials incurred plus a 10% contribution towards common costs
1.4	Initial Audit	Initial Audit of exchange where Co-location is not currently provided to Access Seeker	S	On completion of initial audit	Clause 4.2.1 4.2.1(a)	\$1,026.00 Per audit Per Access Seeker Per exchange
1.5	Full Audit	Full audit of exchange where Co-location is not currently provided to Access Seeker or A survey for capacity upgrade or Intra-exchange cable installation or Audit of exchange infrastructure to determine work for wireless network antenna installation	S	On notification by Telecom of completion of full audit Or survey		Price on Application (POA) Price based on actual time and materials incurred plus a 10% contribution towards common costs
1.6	Accreditation training	Accreditation training (excluding the provision of an Access Card)	S	On completion of training	Clause 4.2.1 4.2.1(a)	\$256.50/participant Based on a 2 hour course duration with a skilled trainer (cost \$102.60 per hour) plus course materials and common costs
1.7	Security Access Card	Security Access Card including replacement for lost/stolen/damaged card	S	On issuance of security access card		\$35.00 per card Basis for determining the charge is the actual costs Telecom incurs in actual card purchase, printing and encoding, delivery and activation costs (\$20.00) plus \$15.00 to cover common costs related to operational security
1.8	Additional OO&T Training	Charge for Access Seeker staff training (at Access Seeker's site) on the operation and use of OO&T. Maximum of 10 persons per course.	S	Following completion of training	Clause 4.2.1 4.2.1(a)	\$102.60 per hour plus actual travel costs (as applicable the costs of airplane flights, public transport fares, taxi fares and standard mileage rates for motor vehicles as published by Inland Revenue) to Access Seeker's site. Hourly rate reflects fully loaded cost of skilled employee to run training.

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
1.9 Additional OFM Training	Charge for Access Seeker staff training (at Access Seeker's site) on the operation and use of OFM. Maximum of 10 persons per course.	S	Following completion of training	Clause 4.2.1 4.2.1(a)	\$102.60 per hour plus actual travel costs (as applicable the costs of airplane flights, public transport fares, taxi fares and standard mileage rates for motor vehicles as published by Inland Revenue) to Access Seeker's site. Hourly rate reflects fully loaded cost of skilled employee to run training.
1.10 OO&T License Fee	Monthly software license fee for OO&T	S	Monthly		\$24.00 per Access Seeker per month
1.11 OFM License Fee	Monthly software license fee for OFM	S	Monthly		\$24.00 per Access Seeker per month
1.12 Additional copies of invoice	Additional hardcopies of invoices as requested by Access Seeker	S	On provision of additional copies of invoice	Clause 4.2.1 4.2.1(a)	\$102.60 per invoice Based on per line itemisation and average forecast invoice length plus time and materials of person to prepare and courier charge
1.13 Additional billing information	Providing any additional billing information requested by the Access Seeker over and above that reasonably required to assist Access Seekers in interpreting invoices	S	On provision of the additional billing information Monthly		Price on Application (POA) Based on time and material of person to prepare and deliver information
1.14 Escorted Access	Escorted Access during Business Hours	S	At completion of escorted access	Clause 4.2.1 4.2.1(a)	Minimum charge \$130.00 Hourly rate \$75.00 Based on hourly rate of standover field services technician (\$75.00) plus call out fee of \$55.00
	Escorted Access outside Business Hours Minimum charge of 4 hours plus call out fee	S	At completion of escorted access	Clause 4.2.1 4.2.1(a)	Minimum charge \$415.00 Hourly rate \$90.00 Based on hourly rate of standover field services technician (\$90.00) outside of business hours plus call out fee of \$55.00
1.15 Security Guard call out	Security Guard call out due to Access Seeker's acts or omissions	S	Following call out		\$50.00 for call outs to metropolitan exchanges plus travel mileage for call outs to non-metropolitan exchanges as published by Inland Revenue
1.16 Fixing fault which Access Seeker no right of access	Charge for fixing of fault by Telecom, at Access Seeker's request, where Access Seeker is responsible for the fault, but has no right of access.	S	On completion of fault rectification		Price on Application (POA) Based on cost of time and materials (including a 10% contribution towards common costs)
1.17 No fault found	Fixed charge for fault call that is closed "no Telecom fault found".	S	Following completion of fault investigation	Clause 4.2.2	\$104.17Based on a service company cost of []TNZCOI plus [] TNZCOI administration charge

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
					and [] TNZCOI to cover the estimated direct front office costs to manage each transaction. [] TNZRI mark up to cover common costs.
1.18 Co-location new Tie cable and HDP build in exchange	<p><u>The set up of additional Tie cables and block at a Co-location site for Access Seeker including the following components:</u></p> <ul style="list-style-type: none"> - Supply of HDP blocks - Optional supply of tie cables - Installation and termination of cables <p>(Note this excludes the following items which are covered by item 1.1;</p> <ul style="list-style-type: none"> - Cable tray and rack construction - Footprint construction - Room construction including items such as demolition and reconstruction of rooms; refurbishment of floor, wall and ceiling surfaces; construction of caging; installation of security systems; obtaining necessary permits and approvals; design; project management) 	C	On notification by Telecom of completion of new co-location site set up	Clause 4.2.2	<p>Chorus supplied cable: 16 pair cable up to 40 metres \$383.02 then \$369.72 per additional 16 pair multiple then \$37.44 per 16 pair per additional 5 metres</p> <p>Access Seeker supplied cable; 16 pair cable up to 40 metres \$225.05 then \$211.75 per additional 16 pair multiple then \$28.79 per 16 pair per additional 5 metres</p> <p>[Chorus COI]</p>

2 Co-location Recurring Charges

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
2.1 Co-location floor space	<p>Co-location Services space. Footprint includes:</p> <ul style="list-style-type: none"> - floor space (600mm x 300mm) - rental for Footprint space on or around the exchange for Access Seekers Equipment 	C	Monthly		<p>Price based on Commission set geographic property m² rate multiplied by the area occupied by the Access Seeker calculated as follows:</p> $A = B \times [(C \times E) + D]$ <p>where</p> <p>A = the sum payable</p> <p>B = geographic property m² rate (set out in section 8)</p> <p>C = internal footprint area (600mm x 300mm)</p>

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge	
					D = external footprint area E = common area multiplier (3.85)	
2.2	16A -48V DC Power Capacity	48V DC Power Final Distribution Rental per 16A increment per month (includes Air-conditioning loading)	S	Monthly	Clause 4.2.1 4.2.1(b)	Rural Exchange \$797.42 Suburban Exchange \$415.46 Urban Exchange \$340.63 Metro Exchange \$329.46 Large CBD Exchange \$323.88
2.3	Co-location cable space	Rental for Telecom-provided Cable Space including Cable Trays, racks and ducts	C	Monthly		Price based on Commission set cable rates multiplied by the number of Access Seeker cables calculated as follows: $A = [B \times C] + [D \times E]$ where A = the sum payable B = internal cable rate (\$3.86) C = number of internal tie cables D = external cable rate (\$27.09) E = number of external tie cables

3 Co-location cancellation schedule

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
3.1 Missed appointment	Missed appointments by Access Seeker for either an escort technician or testing personnel	S	At end of scheduled appointment	Clause 4.2.2	\$356.00 Based on 4 hours of field service company technician at an hourly cost of \$89.00. [...] TNZCI
3.2 Cancellation of Co-location or preliminary order	Cancellation of preliminary order	S	On cancellation of co-location order		Price on Application (POA) Price based on actual time and materials plus a 10% contribution towards common costs
3.3 Cancellation of full Co-location order	Cancellation of full order	S	On cancellation of co-location order		Price on Application (POA) Price based on actual time and materials plus a 10% contribution towards common costs

4 Electrical Supply and Air Conditioning Transaction Charges

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
4.1 Capacity upgrade	Work to upgrade infrastructure to provide additional capacity For example, additional 16A feed to a rack	S	On completion of capacity upgrade		Price on Application (POA) Price based on actual time and materials incurred plus a 10% contribution towards common costs
4.2 Power Feed Upgrade	Work to upgrade power feed from end of row board to footprint to provide additional capacity	S	On completion of capacity upgrade	Clause 4.2.2	Installation or upgrade of power feed to footprint from end of row board \$656.00 [Chorus COI]

5 Network Services Transaction Charges

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
5.1 Intra-exchange cable installation	<p>Installation of intra-exchange cable</p> <p>Copper tie cable from footprint in co-location room in exchange to HDP on exchange MDF, Telecom or Access Seeker provided cable</p> <p>Copper tie cable from HDP on exchange MDF to Access Seeker ducts adjacent to Telecom exchange manhole, Telecom or Access Seeker provided cable</p> <p>Fibre tie cable from footprint in co-location room in exchange to Access Seeker ducts adjacent to Telecom exchange manhole, Telecom or Access Seeker provided cable</p> <p>Copper, Coax or fibre from footprint in co-location room to external footprint in wireless network antenna, Telecom or Access Seeker provided cable</p>	S	On completion of installation		<p>Price on Application (POA)</p> <p>Price based on actual time and materials incurred plus a 10% contribution towards common costs</p>

6 Wireless Network Services Transaction Charges

Service Component	Description	Core or Sundry	Charge Becomes Due	Price Change Mechanism	Charge
6.1 Audit for wireless network antenna installation	Audit of exchange infrastructure to determine work for wireless network antenna installation	S	On completion of audit		Price on Application (POA) Price based on actual time and materials incurred plus a 10% contribution towards common costs

7 Telecom Acting as Bank

The Telecom Build and associated capital cost arrangement (as set out below) is subject to section 16 (Quote) of the Co-location Operations Manual.

The Commission has set the provisional rate of return (r) equal to 10.0%¹. This rate of return must be used in the capital cost calculation (set out below).

$$\text{The cost of access paid to TCNZ} = (\alpha)(voa)$$

If less than 100% of the asset is taken by the Access Seeker then an annual payment will be charged by Telecom equal to the forgone return of Telecom on the asset. This will be charged according to the following formula and will apply to all Access Seekers on the anniversary of the first Access Seeker using the asset.

$$\text{Annual Payment to TCNZ} = (1 - \varpi)(voa)(r) \times \frac{1}{\varpi} \times \lambda$$

If the second or subsequent Access Seeker joins after the anniversary date of the annual billing period an amount is returned to the existing Access Seeker(s).

$$\text{Return to existing Access Seekers} = (1 - \phi)(voa) \left[(1 + r)^T - 1 \right] \times \frac{1}{\varpi} \times \alpha \text{ paid to the existing Access Seekers on the basis of their proportion of the asset.}$$

If the second or subsequent Access Seeker joins within the same annual billing period an additional amount is returned.

$$\text{Return to existing Access Seekers} = (1 - \phi)(voa)(r) \times \frac{1}{\varpi} \times \alpha \text{ also paid to the existing Access Seekers on the basis of their proportion of the asset.}$$

The proportion returned to the individual Access Seekers already using the asset is calculated as follows:

$$\text{For AS}_x \text{ the proportion is based on } \frac{\lambda}{\varpi - \alpha}$$

Where:

voa is the value of the asset.

α is the amount of access to the asset sought by the new Access Seeker.

ϕ is the sum of the proportions of all existing Access Seekers including the original Access Seeker.

r is the rate of return on the asset as set out above.

λ is the amount of access to the asset of the Access Seeker.

ϖ is the amount of access to the asset of any other existing Access Seekers, including the new Access Seeker.

T is the number of complete years that the asset has been in use before the new Access Seeker uses the asset.

¹ For the avoidance of doubt, the use of the benchmark rate of return (10%) is confined to the Co-location Service. The Commission notes that the appropriate rate of return on capital would be reconsidered as part of any application for a pricing review.

8 Geographic Property Rental Price Zones

Co-location Floor Space Rental Prices		
Zone	Geographic Region ²	Monthly Price (\$ / m ²)
A	Auckland and Wellington	20
B	Canterbury, Waikato, and Hawkes Bay	14
C	All Other Regions	11

² Regions align to Statistics New Zealand "Regional Council" geographical boundaries
<http://www2.stats.govt.nz/domino/external/omni/omni.nsf/wwwglsry/Regional+Council>