<https://www.centurylink.com/wholesale/pcat/commercial-wlv-private-branch-exchange-PBX-trunks.html>

**Wholesale: Products & Services**

**Product Catalog (PCAT)**

**Commercial Wholesale Local Voice (WLV) - Private Branch Exchange (PBX) Trunks - V1.0**

[History Log](https://www.centurylink.com/wholesale/downloads/2020/201002/HLCommercial_Wholesale_V1.doc)

**Product Description**

Wholesale Local Voice (WLV) products provide local exchange telecommunications services to end-users on behalf of Competitive Local Exchange Carriers (CLECs) at competitive wholesale commercial rates. General information about WLV can be found in the Wholesale Local Voice (WLV) – General Information PCAT.

WLV PBX (Analog Direct Inward Dialing (DID)) and non-DID trunks) provides analog trunks to connect your end-user's Customer Premises Equipment (CPE) PBX telecommunication system equipment from their premises to the CenturyLink Central Office (CO). DID special trunk arrangements permit incoming calls from the exchange network to reach a specific PBX station directly, bypassing an attendant for assistance. DID is a trunk-side offering within the CO and may be analog In-only or 2-way. WLV products are finished services requiring neither CLEC collocation nor other CLEC network involvement, and are combinations of the following network elements

**Analog non-DID Trunks:**

* A 2-Wire Analog (Voice Grade)
* An Analog Port, including Local Switch Usage and any optional switch features
* Shared Transport

**Analog 1-way DID Trunks:**

* A 2-Wire Analog (Voice Grade)
* A PBX DID Port, including Local Switch Usage and any optional switch features
* Shared Transport

**Analog 2-way DID Trunks:**

* A 4-Wire Analog (Voice Grade)
* A PBX DID Port, including Local Switch Usage and any optional switch features
* Shared Transport

You must choose a combination of either In-only and Out-only trunks or trunks with 2-way capabilities:

* In-only trunks receive incoming calls only
* Out-only trunks allow outgoing calls only
* 2-way trunks will allow incoming and outgoing calls over the same trunk
* Safety Plus trunks are a combination of 2-way analog trunks with Caller ID. (This service is not available with Foreign Central Office (FCO) or Foreign Exchange (FX) service. Additionally, the PBX system must be compatible with caller identification name and number)
* DID trunks allow callers to dial a seven- or ten-digit number to reach a specific PBX station

CenturyLink provides CO lines that terminate in a type of common equipment. Your end-user's PBX CPE routes incoming, outgoing, and internal calls. The PBX system at your end-user's premises determines which line or trunk is available to make or receive a call. PBX products require the following CPE components:

* A Station Line - Internal line that connects the switching equipment of the PBX CPE to a station set or extension (end-users typically have three or four of these internal station lines for each trunk connected to the CO. Internal calls do not utilize any of the trunks.)
* Station Set - Basic telephone instrument equipped with function keys
* Attendant Console - An expanded telephone or automated station used for answering, managing, connecting and putting calls on hold
* Centralized Processing Unit (CPU) - CPE that provides internal call routing when manual routing is not used

A 7-digit local exchange telephone number is assigned to each DID station (by PBX programming) from a block of numbers reserved for your end-user. When the number is dialed, the serving CO of the origination point directs the call to a dedicated pool of In-only or 2-way DID trunks assigned to that number block. The Serving Wire Center (SWC) of the PBX service then out-pulses the appropriate number of digits, depending on your end-user's PBX requirements, to the PBX.

**Availability**

WLV PBX analog trunks are available where facilities exist throughout [CenturyLink QC](https://www.centurylink.com/wholesale/pcat/territory.html).

DID trunks are generally provided from suitably equipped digital COs where facilities are readily available throughout [CenturyLink QC](https://www.centurylink.com/wholesale/pcat/territory.html). DID is also available to new and existing end-users served from non-digital COs provided the office is equipped for DID service and has sufficient DID capabilities to accommodate the request.

WLV PBX analog trunks may be provided, depending on individual retail state specific [Tariffs/Catalogs/Price Lists](https://www.centurylink.com/Pages/AboutUs/Legal/Tariffs/displayTariffLandingPage.html) as:

* Flat (class of service RHVXX)
* Measured (class of service RKVXX)
* Message (class of service RYVXX)

**Terms and Conditions**

You may order new WLV PBX analog trunks or convert existing., equivalent PBX trunks to WLV PBX analog trunks. Toll, Hotel/Motel, and Hospital trunks are not available.

Each Out-only or 2-way trunk in an equal access end office must carry Primary Interexchange Carrier (PIC) and Local Primary Interconnection Carrier (LPIC) providing Intra Local Access and Transport Area (IntraLATA) information. More information about selecting a long distance carrier can be found in the [Long Distance Carrier Selection Overview](https://www.centurylink.com/wholesale/preorder/ldselection.html).

For DID trunks, answer supervision is required from your end-user's PBX system.

DID Trunk Queuing is available only where adequate and suitable CO facilities exist. DID trunk queuing is an arrangement whereby incoming calls that are placed to station lines within a DID system can be held in queue if all trunks between the CO switch and the end-user's PBX are busy. Calls in queue will be held in their order of arrival until a trunk becomes available. Calls in queue are served on a first in, first out basis. Calls in queue will hear ringing until answered.

DID numbers are assigned in blocks of 20 sequential numbers, where available. Existing end-user telephone numbers can be added to the DID service provided they meet your end-user's existing PBX requirements. [Custom Number Service](https://www.centurylink.com/wholesale/clecs/features/customnumber.html) is available, applicable charges apply.

CenturyLink Commercial Broadband Service is available with WLV PBX. For additional information refer to [CenturyLink Commercial High Speed Internet Service](https://www.centurylink.com/wholesale/pcat/commhighspeedia.html).

**Technical Publications**

Technical characteristics are contained in the applicable Tariff and may have references to certain Technical Publications.

**Pricing**

**Rate Structure**

Monthly Recurring Charges (MRCs) for WLV are the sum of the monthly recurring rates of the service offerings ordered by the CLEC from their WLV Commercial Rates Sheets, Interconnection Rate Sheets, and appropriate tariffs.

Non-recurring Charges (NRCs) for WLV Installation, Disconnection (in some states), Conversion, and Feature activity are provided in the WLV Commercial Rate Sheets, Interconnection Rate Sheets, and appropriate tariffs.

WLV products include either one residential or one business directory listing (dependent on end-user application and the product requested) for each main telephone number, at no charge. Premium and privacy listings are also available with WLV services. Regardless of residential or business directory appearance, all premium and privacy listings (with the exception of residential additional listings (e.g., USOC RLT) are categorized as business for rating purposes. Information describing directory listing availability and ordering is described in [White Pages Directory Listings](https://www.centurylink.com/wholesale/pcat/whitepagedirlist.html).

**Rates**

Depending on WLV Services ordered MRCs and NRCs are available in the:

* Rate Sheet of your Commercial Agreement.
* Rate Sheet or Exhibit A of your applicable ICA.
* Applicable Tariff for features and services.

**Nebraska WLV circuits only:**

Effective September 19, 2011, you must place either the USOC XCBO2 (2-wire) or XCBO4 (4-wire) on your WLV LSR if your End-User is in an "Out of Town" location. Additional information on determining this classification is in [Geographic Deaveraging - General Information](https://www.centurylink.com/wholesale/clecs/geodeavg.html).

**Tariffs, Regulations, and Policies**

Tariffs, regulations and policies are located in the state specific [Tariffs Tariffs/Catalogs/Price Lists](https://www.centurylink.com/Pages/AboutUs/Legal/Tariffs/displayTariffLandingPage.html).

Existing Toll-Only, Hotel/Motel, and Hospital trunks cannot be converted to WLV PBX analog trunks.

**Optional Features**

Optional features may be found in the state specific Tariffs.

**Implementation**

**Product Prerequisites**

If you are a new CLEC and are ready to do business with CenturyLink, view [Getting Started as a Facility-Based CLEC](https://www.centurylink.com/wholesale/clecs/clec_index.html), [Interconnection Agreement](https://www.centurylink.com/wholesale/clecs/negotiations.html), and [Commercial Agreements](https://www.centurylink.com/wholesale/clecs/commercialagreements.html).

**Pre-Ordering**

General pre-ordering activities are described in the [Pre-Ordering Overview](https://www.centurylink.com/wholesale/clecs/preordering.html).

Requirements for pre-ordering are described in [Local Service Ordering Guidelines (LSOG) Pre-Order](https://www.centurylink.com/wholesale/clecs/lsog.html).

When converting existing CenturyLink retail or resale PBX services, you must determine if the account contains toll, hotel/motel or hospital trunks. These types of trunks are not available and cannot be converted to WLV PBX.

**Ordering**

General ordering activities are described in the [Ordering Overview](https://www.centurylink.com/wholesale/clecs/ordering.html).

A Design Layout Record (DLR) request is described in the  [EASE-LSR Extensible Markup Language (XML)](https://ease.lumen.com/)  or [EASE-LSR Graphical User Interface (GUI)](https://ease-lsr.lumen.com/).

FCO and FX service may be provided with WLV PBX analog trunks if allowed in the CenturyLink retail state [Tariffs/Catalogs/Price Lists](https://www.centurylink.com/aboutus/legal/tariff-library.html) and if it is supported by your end-user's PBX equipment.

PBX analog trunks are available on a loop start or ground start basis. Loop start designs the cable pairs in such a manner that the tip conductor is grounded at the CO, whereas in ground start, the tip conductor is grounded at your end-user's premises. WLV PBX analog trunk orders are placed using the following [LSOG](https://www.centurylink.com/wholesale/pcat/commercial-wlv-private-branch-exchange-PBX-trunks.html) forms. Detailed information is available in the LSOG.

* Local Service Request (LSR)
* End User (EU)
* Resale Service (RS) for non-DID trunks only
* DID Resale Service (DRS) for DID trunks only
* Directory Listing, (DL), if applicable

Service requests should be placed via the  [EASE-LSR Extensible Markup Language (XML)](https://ease.lumen.com/)  or [EASE-LSR Graphical User Interface (GUI)](https://ease-lsr.lumen.com/). When selecting the type of product from the EASE-LSR GUI REQTYP field drop-down menu, use the following guidelines until such time as the systems are updated to denote WLV:

* Requests for WLV analog non-DID trunks, select 'M - UNE-P (PBX Designed Trunks)'
* Requests for DID trunks (including 2-way DID), select 'M - WLV (In-Only DID Trunks)'

The valid TOS for use on the LSR form for analog non-DID and analog DID trunks are:

|  |  |
| --- | --- |
| **Character Position** | **Definition** |
| First | 1 = Business 3 = Government |
| Second | J = PBX |
| Third | M = Measured F = Flat |
| Fourth | F = Foreign Exchange F is required in the fourth character position as a placeholder even if the request is not foreign exchange. |

There are three WLV PBX classes of service (COS):

* Flat (RHVXX)
* Measured (RKVXX)
* Message (RYVXX)

CenturyLink determines the appropriate COS based on the type of trunks ordered. Available trunk types can be determined by the CenturyLink [USOC FID Finder](https://www.centurylink.com/wholesale/pcat/usocfid.html), Product Family List, WLV PBX.

A sufficient number of trunks must be ordered to adequately handle the volume of incoming calls. If not, when all the DID trunks are busy, the calling party will receive a fast busy tone.

The S2N USOC is required on all Out-only and 2-way DID WLV PBX trunk groups. Multiple trunk groups can share the same S2N. The S2N is assigned a telephone number that will be used for Long Distance billing and for 911/E911 identification. This telephone number must be a dialable number which can be called back by emergency services personnel and which will be answered by the end-user. Whenever possible, the end-user's published telephone number should be used for the S2N. When this is not possible, CenturyLink can use a DID number or another Plain Old Telephone Service (POTS) or trunk number on the account or can assign a stand-alone DID number. When working with existing service, review the CSR to see if an S2N is assigned for each trunk group that needs one. If an S2N is not assigned negotiate with the end-user to determine which telephone number, they want to use and indicate it on the RS form in the FEATURE and FEATURE DETAIL fields. Populate the S2N USOC in the FEATURE field and the telephone number in the FEATURE DETAIL field. Disclosure Information and other LSOG form instructions are available on [Network Disclosures](https://www.centurylink.com/disclosures/netdisclosure409.html).

When converting an existing account with CenturyLink Commercial Broadband Service to WLV PBX follow the order requirements in [CenturyLink Commercial High Speed Internet Service](https://www.centurylink.com/wholesale/pcat/commhighspeedia.html).

**Provisioning and Installation**

General provisioning and installation activities are described in the [Provisioning and Installation Overview](https://www.centurylink.com/wholesale/clecs/provisioning.html).

**Maintenance and Repair**

General maintenance and repair activities are described in the [Maintenance and Repair Overview](https://www.centurylink.com/wholesale/clecs/maintenance.html).

**Billing**

~~Customer Records and Information System (CRIS) billing is described in~~[~~Billing Information - Customer Records and Information System (CRIS)~~](https://www.centurylink.com/wholesale/clecs/cris.html)~~.~~ Ensemble is the new billing system for customers. For questions about the bill, please follow the instructions on the reverse side of each billing statement.

The Ensemble bill is described in [Billing Information – Ensemble](https://www.centurylink.com/wholesale/clecs/ensemble.html).

**Training**

View CenturyLink courses by clicking on  [~~Course~~ Training Catalog](https://www.centurylink.com/wholesale/training/coursecatalog.html).

**Contacts**

CenturyLink contact information is located in [Wholesale Customer Contacts](https://www.centurylink.com/wholesale/clecs/customercontacts.html).

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