








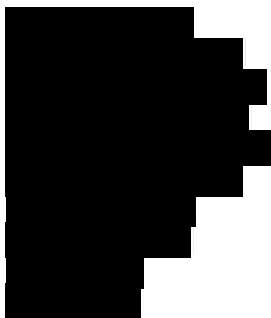

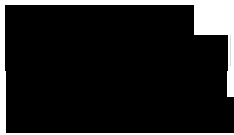






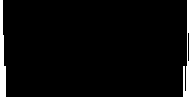



**Section 1194.21 Software Applications and Operating Systems –  
Internet Protocol Telephony Service (IPTeIS) – Detail Voluntary  
Product Accessibility Template**




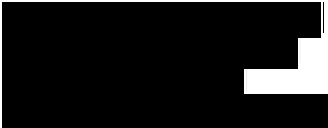



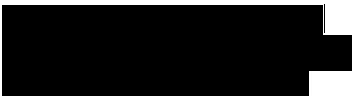


Criteria	Supporting Features	Remarks and explanations
<p>(a) When software is designed to run on a system that has a keyboard, product functions shall be executable from a keyboard where the function itself or the result of performing a function can be discerned textually.</p>	<p align="center">██████████</p>	<p align="center">████████████████████ ████████████████████ ████████████████████ ████████████████████ ████████████████████</p>
<p>(b) Applications shall not disrupt or disable activated features of other products that are identified as accessibility features, where those features are developed and documented according to industry standards. Applications also shall not disrupt or disable activated features of any operating system that are identified as accessibility features where the application programming interface for those accessibility features has been documented by the manufacturer of the operating system and is available to the product developer.</p>	<p align="center">██████████</p>	<p align="center">████████████████████ ████████████████████ ████████████████████ ████████████████████ ████████████████████</p>




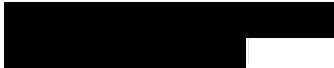





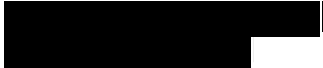

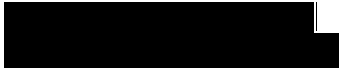


<p>(c) A well-defined on-screen indication of the current focus shall be provided that moves among interactive interface elements as the input focus changes. The focus shall be programmatically exposed so that Assistive Technology can track focus and focus changes.</p>		
<p>(d) Sufficient information about a user interface element including the identity, operation and state of the element shall be available to Assistive Technology. When an image represents a program element, the information conveyed by the image must also be available in text.</p>		
<p>(e) When bitmap images are used to identify controls, status indicators, or other programmatic elements, the meaning assigned to those images shall be consistent throughout an application's performance.</p>		
<p>(f) Textual information shall be provided through operating system functions for displaying text. The minimum information that shall be made available is text content, text input caret location, and text attributes.</p>		

<p>(g) Applications shall not override user selected contrast and color selections and other individual display attributes.</p>		
<p>(h) When animation is displayed, the information shall be displayable in at least one non-animated presentation mode at the option of the user.</p>		
<p>(i) Color coding shall not be used as the only means of conveying information, indicating an action, prompting a response, or distinguishing a visual element.</p>		
<p>(j) When a product permits a user to adjust color and contrast settings, a variety of color selections capable of producing a range of contrast levels shall be provided.</p>		
<p>(k) Software shall not use flashing or blinking text, objects, or other elements having a flash or blink frequency greater than 2 Hz and lower than 55 Hz.</p>		

<p>(l) When electronic forms are used, the form shall allow people using Assistive Technology to access the information, field elements, and functionality required for completion and submission of the form, including all directions and cues.</p>		
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**Section 1194.22 Web-based Internet information and applications  
– Internet Protocol Telephony Service (IPTeIS) – Detail Voluntary  
Product Accessibility Template**

Criteria	Supporting Features	Remarks and explanations
<p>(a) A text equivalent for every non-text element shall be provided (e.g., via "alt", "longdesc", or in element content).</p>		
<p>(b) Equivalent alternatives for any multimedia presentation shall be synchronized with the presentation.</p>		
<p>(c) Web pages shall be designed so that all information conveyed with color is also available without color, for example from context or markup.</p>		
<p>(d) Documents shall be organized so they are readable without requiring an associated style sheet.</p>		
<p>(e) Redundant text links shall be provided for each active region of a server-side image map.</p>		

<p>(f) Client-side image maps shall be provided instead of server-side image maps except where the regions cannot be defined with an available geometric shape.</p>		
<p>(g) Row and column headers shall be identified for data tables.</p>		
<p>(h) Markup shall be used to associate data cells and header cells for data tables that have two or more logical levels of row or column headers.</p>		
<p>(i) Frames shall be titled with text that facilitates frame identification and navigation</p>		
<p>(j) Pages shall be designed to avoid causing the screen to flicker with a frequency greater than 2 Hz and lower than 55 Hz.</p>		
<p>(k) A text-only page, with equivalent information or functionality, shall be provided to make a web site comply with the provisions of this part, when compliance cannot be accomplished in any other way. The content of the text-only page shall be updated whenever the primary page changes.</p>		
<p>(l) When pages utilize scripting languages to display content, or to create interface elements, the information provided by the script shall be identified with functional</p>		

text that can be read by Assistive Technology.		
(m) When a web page requires that an applet, plug-in or other application be present on the client system to interpret page content, the page must provide a link to a plug-in or applet that complies with 1194.21(a) through (l).	[REDACTED]	[REDACTED]
(n) When electronic forms are designed to be completed on-line, the form shall allow people using Assistive Technology to access the information, field elements, and functionality required for completion and submission of the form, including all directions and cues.	[REDACTED]	[REDACTED]
(o) A method shall be provided that permits users to skip repetitive navigation links.	[REDACTED]	[REDACTED]
(p) When a timed response is required, the user shall be alerted and given sufficient time to indicate more time is required.	[REDACTED]	[REDACTED]

Note to 1194.22: The Board interprets paragraphs (a) through (k) of this section as consistent with the following priority 1 Checkpoints of the Web Content Accessibility Guidelines 1.0 (WCAG 1.0) (May 5 1999) published by the Web Accessibility Initiative of the World Wide Web Consortium: Paragraph (a) -

1.1, (b) - 1.4, (c) - 2.1, (d) - 6.1, (e) - 1.2, (f) - 9.1, (g) - 5.1, (h) - 5.2, (i) - 12.1, (j) - 7.1, (k) - 11.4.

**Section 1194.23 Telecommunications Products –  
Internet Protocol Telephony Service (IPTeIS) - Detail  
Voluntary Product Accessibility Template**




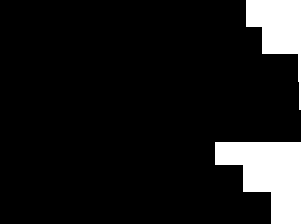


Criteria	Supporting Features	Remarks and explanations
<p>(a) Telecommunications products or systems which provide a function allowing voice communication and which do not themselves provide a TTY functionality shall provide a standard non-acoustic connection point for TTYs. Microphones shall be capable of being turned on and off to allow the user to intermix speech with TTY use.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>
<p>(b) Telecommunications products which include voice communication functionality shall support all commonly used cross-manufacturer non-proprietary standard TTY signal protocols.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>
<p>(c) Voice mail, auto-attendant, and interactive voice response telecommunications systems shall be usable by TTY users with their TTYs.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>

**Section 1194.23 Telecommunications Products –  
Internet Protocol Telephony Service (IPTeIS) - Detail  
Voluntary Product Accessibility Template**

Criteria	Supporting Features	Remarks and explanations
<p>(d) Voice mail, messaging, auto-attendant, and interactive voice response telecommunications systems that require a response from a user within a time interval, shall give an alert when the time interval is about to run out, and shall provide sufficient time for the user to indicate more time is required.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>
<p>(e) Where provided, caller identification and similar telecommunications functions shall also be available for users of TTYs, and for users who cannot see displays.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>
<p>(f) For transmitted voice signals, telecommunications products shall provide a gain adjustable up to a minimum of 20 dB. For incremental volume control, at least one intermediate step of 12 dB of gain shall be provided.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>
<p>(g) If the telecommunications product allows a user to adjust the receive volume, a function shall be provided to automatically reset the volume to the default level after every use.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>





**Section 1194.23 Telecommunications Products –  
Internet Protocol Telephony Service (IPTeIS) - Detail  
Voluntary Product Accessibility Template**

Criteria	Supporting Features	Remarks and explanations
<p>(h) Where a telecommunications product delivers output by an audio transducer which is normally held up to the ear, a means for effective magnetic wireless coupling to hearing technologies shall be provided.</p>		
<p>(i) Interference to hearing technologies (including hearing aids, cochlear implants, and assistive listening devices) shall be reduced to the lowest possible level that allows a user of hearing technologies to utilize the telecommunications product.</p>		
<p>(j) Products that transmit or conduct information or communication, shall pass through cross-manufacturer, non-proprietary, industry-standard codes, translation protocols, formats or other information necessary to provide the information or communication in a usable format. Technologies which use encoding, signal compression, format transformation, or similar techniques shall not remove information needed for access or shall restore it upon delivery.</p>		

**Section 1194.23 Telecommunications Products –  
Internet Protocol Telephony Service (IPTeIS) - Detail  
Voluntary Product Accessibility Template**

Criteria	Supporting Features	Remarks and explanations
<p>(k)(1) Products which have mechanically operated controls or keys shall comply with the following: Controls and Keys shall be tactilely discernible without activating the controls or keys.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>
<p>(k)(2) Products which have mechanically operated controls or keys shall comply with the following: Controls and Keys shall be operable with one hand and shall not require tight grasping, pinching, twisting of the wrist. The force required to activate controls and keys shall be 5 lbs. (22.2N) maximum.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>
<p>(k)(3) Products which have mechanically operated controls or keys shall comply with the following: If key repeat is supported, the delay before repeat shall be adjustable to at least 2 seconds. Key repeat rate shall be adjustable to 2 seconds per character.</p>	<p>[REDACTED]</p>	<p>[REDACTED]</p>

**Section 1194.23 Telecommunications Products –  
Internet Protocol Telephony Service (IPTeLS) - Detail  
Voluntary Product Accessibility Template**

<b>Criteria</b>	<b>Supporting Features</b>	<b>Remarks and explanations</b>
(k)(4) Products which have mechanically operated controls or keys shall comply with the following: The status of all locking or toggle controls or keys shall be visually discernible, and discernible either through touch or sound.		





1194.31 Functional Performance Criteria, Internet Protocol Telephony Services (IPTeIS)

<p>The relevant provisions of Subpart C, Functional Performance Criteria, paragraph 1194.31, shall apply to the services identified in paragraphs C.6.4 above. For these services, the offeror shall provide one of the following two capabilities:</p>	
<p><b>1. Support for Assistive Technologies used by disabled individuals.</b></p>	<p><b>Supports When Combined With Compatible AT-</b> Qwest's IPTeIS will support disabled individuals. IPTeIS supports connectivity to TTY devices. Qwest can provide VoIP phones to which TTY devices can be connected or provide Integrated Access Device (IAD) that will allow TTY or other analog devices to interoperate with the VoIP network. Qwest will analyze each Agency's specific criteria for Assistive Tehnology requirements for IPTeIS and respond on a task order basis.</p>
<p><b>2. At least one mode of operation and information retrieval that:</b></p>	
a.	For blind users, does not require vision.
b.	For vision impaired users, does not require visual acuity greater than 20/70.
c.	For deaf users, does not require hearing.
d.	For hearing impaired users, does not require enhanced auditory capability.
e.	For users with no speech capability or with impaired speech, does not require user speech.
f.	For users without fine motor control or simultaneous action capability, does not require fine motor control or simultaneous action and is operable without limited reach and strength.

The relevant provisions of Subpart D, Information, Documentation, and Support, paragraph 1194.41, shall apply to the services identified in paragraphs C.6.4.1, above.

**§1194.41 Information, documentation, and support  
Internet Protocol Telephony Service (IPTeIS)**

The standards also address access to all information, documentation, and support provided to end users (e.g., Federal employees) of covered technologies. This includes user guides, installation guides for end-user installable devices, and customer support and technical support communications. Such information must be available in alternate formats upon request at no additional charge. Alternate formats or methods of communication, can include Braille, cassette recordings, large print, electronic text, Internet postings, TTY access, and captioning and audio description for video materials.

<i>Criteria</i>	<b>Supporting Features</b>	<b>Remarks and explanations</b>
(a) Product support documentation provided to end-users shall be made available in alternate formats upon request, at no additional charge.		
(b) End-users shall have access to a description of the accessibility and compatibility features of products in alternate formats or alternate methods upon request, at no additional charge.		
(c) Support services for products shall accommodate the communication needs of end-users with disabilities.	