Font Features for Charis SIL

When Charis SIL is used in applications that support Graphite, and that provide an appropriate user interface, various user-controllable font features are available that allow access to alternatively-designed glyphs that might be preferable for use in some contexts. In LibreOffice 3.4.2+ (http://www.libreoffice.org/download/) or OpenOffice 3.2+ (http://www.openoffice.org/download/) the font features can be turned on by choosing the font (ie Charis SIL), followed by a colon, followed by the feature ID, and then followed by the feature setting. So, for example, if the Uppercase eng alternate "Capital N with tail" is desired, the font selection would be "Charis SIL:Engs = 2". (The Feature IDs have changed. If you already have documents which specify the Feature IDs as digits, you will need to change from digits to text. Both are documented in the table below. We are very sorry for the inconvenience.)



If you wish to apply two (or more) features, you can separate them with an "&". Thus, "Charis SIL:Engs = 2&smcp = 1" would apply "Capital N with tail" plus the "Small capitals" feature.



These same features are also available in OpenType. The OpenType feature IDs ("cvxx" for "Character Variant" and "ssxx" for "Stylistic Set") are listed in the OpenType feature ID column. However, they are only available in a few applications. Mozilla Firefox (https://www.mozilla.org/firefox) is the only application that currently supports Character Variants. Adobe InDesign, Microsoft Word, Microsoft Publisher and Mozilla Firefox support Stylistic Sets.

A glyph palette is available for accessing the alternate glyphs in some applications such as Adobe InDesign.

Ideally the selection of these font features is done in application programs, but many applications do not yet support this functionality. In response to this lack of support for features, a program called TypeTuner (command line version: http://scripts.sil.org/TypeTuner and web-based version: http://scripts.sil.org/tw) allows users to create derivative fonts with their own feature settings based on the needs of a local project or region.

In the table below, upper and lower case pairs are shown (if they exist), even if the feature only affects one or the other. This is in order to see how the whole pair looks when a feature is applied. The following font features are available in Charis SIL:

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes ¹										
Language specific																
Vietnamese-style diacritics (U+1EA4 U+1EA5 U+1EA6 U+1EA7 U+1EA8 U+1EA9 U+1EAA U+1EAB U+1EAE U+1EAF U+1EB0 U+1EB1 U+1EB2 U+1EB3 U+1EB4 U+1EB5 U+1EBE U+1EBF U+1EC0 U+1EC1 U+1EC2 U+1EC3 U+1EC4 U+1EC5	cv75	viet (old:1029)	0=False	Áấ Àà Ảả Ãã Áá Xả Àà Ảả Ãã Éế Èề ểể ễể ốố Òò ổổ Õổ	ÁÁ ÀÀ ẢẢ ÃÃ ẮẮ ÀÀ ẢẢ ÃÃ ÉÉ ÈÈ ÉẢ ỄỄ ỐÓ ÒÒ ÖỔ ÕÕ	R, O										
U+1ED0 U+1ED1 U+1ED2 U+1ED3 U+1ED4 U+1ED5 U+1ED6 U+1ED7)			1=Vietnamese-style	Ấã Àà Ẩẩ Ẩã Ấã Ắắ Àà Ẩã Éế Èề Éể Éễ ốố Òồ ổổ Õổ	Áã Àà Áẩ Ãã Áắ Àà Åå Ãã ÉÉÈè ểể ễẽ ốố Òò ổổ ỗỗ											
Serbian-style alternates (U+0431 U+0433 U+0434 U+043F U+0442)	locl (accessed trhough	serb	0=False	Бб Гг Дд Пп Тт	ББ ГГ Дд Пп Тт	R										
	Serbian language)		1=True	Бδ Гī Дg Пū Т ш	ББ ГГ Дд Пп Тт											
Chinantec tones (U+02CB U+02C8 U+02C9 U+02CA)	cv90	cv90	cv90	cv90	cv90	cv90	cv90	cv90	cv90	cv90	cv90	chtn (old:1057)	0=False	1-/	Small capitals are not available as there is no uppercase equivalent	R
			1=Chinantec-style	\1 - /	apperouse equivalent											
Bridging diacritics (U+0308 – used with "L" and "I", U+0311, U+0361 and U+035F – used with "O", "o", "U" and "u".)	-	brig (old:1052)	0=False 1=True	Naso: ĽL Ïl Ľl Konai: ÔU Naso: LĽ Ïl Ľl Konai: ÔU	Small capitals do not work properly	G										

¹TypeTuner legend: R=glyphs are Reencoded (will work with dumb rendering); **O**=OpenType rules are activated; **G**=Graphite-only feature (All features are available for Graphite applications.); **T**=Only available through TypeTuner (http://scripts.sil.org/TypeTuner) or TypeTuner Web (http://scripts.sil.org/ttw).

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes
Cyrillic ²						
Mongolian-style Cyrillic E (U+042D U+044D)	cv80	mone (old:1027)	0=False	Ээ	Ээ	R
			1=Mongolian-style	Ээ	Ээ	
Combining breve Cyrillic form (U+0306)	cv82	sbrv (old:1028)	0=False	anything with ˘ (ੱəੱ)	anything with ັ (ਚੱð)	R (no effect if data is NFC)
			1=Cyrillic-style	anything with ઁ (ðઁð)	anything with ઁ (ðð)	
Cyrillic shha alternate (U+04BB)	cv81	shha (old:1056)	0=False	hh	hh	R
			1=Uppercase style	hь	hh	
Tone-related						
Tone numbers (U+02E5 U+02E6 U+02E7 U+02E8 U+02E9 U+A712	cv91	tone (old:1026)	0=Bars	11417[++1	Small capitals are not available as there is no uppercase equivalent	G
Ù+A713 U+A714 U+A715 U+A716)			1=Numbers	5 4 3 2 1 5 4 3 2 1	apportation equivalent	
Hide tone contour staves (U+02E5 U+02E6 U+02E7 U+02E8 U+02E9 U+A712 U+A713 U+A714 U+A715 U+A716)	cv92	tstv (old:1050)	0=False	11411[t+t[(\(\(\(\)\()\)	Small capitals are not available as there is no uppercase equivalent	G
OTALIS OTALITOTALIS OTALIO)			1=True	₋ (
9-level pitches (U+F1F1 U+F1F2 U+F1F3 U+F1F4 U+F1F5 U+F1F6 U+F1F7 U+F1F8 U+F1F9)	-	pit9 (old:1062)	0=No tramlines	(_)	Small capitals are not available as there is no uppercase equivalent	G
U+FIF7 U+FIF0 U+FIF9)			1=Tramlines	(\sqrt{)}		
			2=Non-ligated with no tramlines	()		
			3=Non-ligated with tramlines			

There are also Cyrillic characters affected by the "Capital Ezh alternates", "Small capitals" and "Show deprecated PUA" features. Some languages may also use the "Modifier apostrophe alternates."

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes
Miscellaneous						
Literacy alternates (U-0061 U+00E0 U+00E1 U+00E2 U+00E3 U+00E4 U+00E5 U+0101 U+0103 U+0105 U+01CE U+01DF U+01E1 U+01E9 U+0201 U+0203 U+0227 U+1E01 U+1E9A U+1EA1 U+1EA3 U+1EA5 U+1EA7 U+1EA9 U+1EAB U+1EAD U+1EAF U+1EB1 U+1EB3 U+1EB5 U+1EBF U+2C65 U+2090 U+1D43 U+0363 U+0067 U+011D U+011F U+0121 U+0123 U+01E7 U+01F5 U+01E5 U+1E21 U+A7A1 U+1D4D)	ss01	litr (old:1032)	0=False (default)	Aa Àà Áá Ââ Ãã Ää Åå Āā Ăă Ąą Ăǎ Ää Ää Ää Áå Åå Ââ Àà Aa Aa A Aa Åa Åå Ââ Åå Åå Åå Ãå Ãã Ãã Ãã Ãã Ãã Ĝg Ĝg Ğg Ğg Ğg Ğg Ğg Ğg Ğg Ğg Ğg Gg Ög Gg	1	R
			1=True	Aa Àà Áá Ââ Ãã Ää Åå Āā Ăă Ąą Ăă Āā Āā Áå Äå Ââ Àa Aa ª Aa Åa Áá Àà Ẩả Ãã Ậạ Ấắ Àắ Åå Ãã Ặ茲 ੴa a ª ª Gg Ĝĝ Ğğ Ġġ Ģģ Ğǧ Ġġ Gg Ō̄g Gg ^g	AA ÀÀ ÁÁ ÂÂ ÃÃ ÄÄ ÅÅ ĀĀ ĂĂ ĄĄ ĂĂ ÄÄ ĀĀ ÁÅ ÅÅ ÀÀ ÂA ÀA AA Ả ẠẠ ẢẢ ẤẤ ÀÀ ẢÃ ÃÃ ẬÃ ẬẬ ẮẮ ÀÀ ẢÅ ÃĂ ĂĂ ĂĂ ĂĂ ÆÆ a GG ĜĜ ĞĞ ĠĠ ĢĢ ĞĞ ĠĠ GG GG GG ⁹	
Barred-bowl forms (U+0111 U+0180 U+01E5)	ss04	bowl (old:1031)		Đđ Bħ Gg	ÐÐ Вв GG	R
			1=Barred-bowl	Đd Bb Gg	ĐĐ BB GG	

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes								
Slant italic specials (U+0061 U+00E3 U+00E0 U+00E1 U+00E2 U+00E4 U+00E5 U+0101 U+0103 U+01CE U+01DF U+01E1 U+01FB U+0201 U+0203 U+0227 U+1E01 U+1E9A U+1EA3 U+1EA5 U+1EA7 U+1EA9 U+1EAB U+1EAD U+1EAF U+1EB1 U+1EB3 U+1EB5 U+1EAT U+1EB7 U+2065 U+0250 U+00E6 U+006E U+0129 U+012B U+012D U+012F U+01D0 U+0209 U+020B U+1E2D U+1E2F U+1EC9 U+1ECB U+0131 U+006C U+013A U+1E37 U+1E39 U+1E3B U+1E3D U+0076 U+1E7D U+1E7F U+007A U+017A U+017C U+017E U+1E91 U+1E93 U+1E95 U+0493 U+04FB U+F327 U+A749 U+A75F U+2097)	ss05	(old:1053)	Āā Áắ Âå Ãã Ââ	ẢẢ ẤÂ ÀÀ ẨẨ ẨẨ ẬẬ ẮẮ ẢĂ ẢĂ ÃÃ ẠẠ ẶẶ ઢ՛ઠ V ÆÆ FF FF II ÌÌ ÍÍ	R									
									1=True	Ậậ Ắắ ằằ Ẩẳ ẵẵ ẵặ ṇạ Ḥạ Ææ Ff Ff	AA ÃÃ ÀÀ ÁÁ ÂÂ ÄÄ ÅÅ ÅÅ ĀĀ ĂĂ ĂĂ ÄÄ ĀĀ ÅÅ ÅÅ ÄÄ ÂÂ ÀA AA A ÅÅ ÂÂ ÀÀ ÂÂ ÂÃ ÂÃ ÂÃ ÅÄ ÅÄ ÅÄ ÃÃ AA ĂĂ ÄÄ ÅÄ V ÆÆ FF FF II ÌÌ ÍÍ ÎÎ ÏÏ ĨĪ ĪĪ ĬĬ ĮĮ ĬĬ ÌÌ ÎÎ ĮĮ ÍÏ ÎÏ IJ II LL ĹĹ ĻĻ ĻĻ LL ĻĻ LŁ 1 VV ŨŨ YY VV ZZ ŹŹ ŻŻ ŽŽ ŽŽ ZZ ZZ FF FF FF FF FFI			
Non-European caron alternates (U+0164 U+0165 U+010E U+010F U+013D U+013E)	cv77	cv77	cv77	cv77	carn (old:1063)						0=European style 1=Non-European style	Ťť Ďď Ľľ	ŤŤ ĎĎ ĽĽ	R
			. Non European style	Ťť Ďď Ľľ	ŤŤ ĎĎ ĽĽ									
Ogonek alternate (U+0328 U+0104 U+0105 U+0118 U+0119 U+012E U+012F U+0172 U+0173 U+01EA U+01EB U+01EC	cv76	ogon (old:1043)	0=Curved	anything with ု (Ąą Ęę Įį Ųų Qọ Ōౖō)	anything with ${ ilde{\circ}}$ (AA EE II UV QO ${ar{Q}}{ar{Q}}$)	R								
U+01ED)			1=Straight	anything with ${\it \circ}$ (Aa Ee Li Uu Qo ${\it ar Q}{\it ar Q}$)	anything with ${}_{ ho}$ (AA EE II VV QQ $ar{Q}ar{Q}$)									
Capital B-hook alternate (U+0181)	cv13	B_hk (old:1064)	0=Uppercase style	В6	Вв	R								

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes							
			1=Lowercase style	Б6	ББ								
Capital D-hook alternate (U+018A)	cv17	D_hk	0=Uppercase style	Dɗ	DD	R							
			1=Lowercase style	Фď	ďď								
Rams horn alternates (U+0264)	cv25	ramh (old:1025)	0=Small bowl	Y	Small capitals are not available as there is no uppercase equivalent	R							
			1=Large bowl	δ									
			2=Small gamma	γ									
Capital H-stroke alternate (U+0126)	cv28	Hstk (old:1038)	0=False	Ħħ	ĦĦ	R							
			1=Vertical-stroke	Hħ	Нн								
J-stroke hook alternate (U+0284)	cv37	Jstk (old:1049)	0=No serif	f	Small capitals are not available as there is no uppercase equivalent	R							
			1=Top serif	f	appointed by an anom								
Uppercase Eng alternates (U+014A)	cv43	Engs (old:1024)	0= Large eng with descender	Ŋŋ	ŋŋ	R							
			1=Large eng on baseline	nŋ	ตต								
										2=Capital N with tail	Ŋŋ	ŊŊ	
			3=Large eng with short stem	ໆŋ	ອອ								
Capital N-left-hook alternate (U+019D)	cv44	N_hk (old:1035)	0=Uppercase style	Nn	NN	R							
			1=Lowercase style	րր	ր ր								
Open-O alternate (U+0186 U+0254 U+1D10 U+1D53 U+1D97)	cv46	opnO (old:1059)	0=Bottom serif	ο ο ο ο ο ο ο ο ο ο ο ο ο ο ο ο ο ο ο	Co o o o	R							
			1=Top serif	Oo o ° ç	Oo o ° o								
Small p-hook alternate (U+01A5)	cv49	p_hk (old:1040)	0=Left hook	Рβ	РР	R							

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes
			1=Right hook	Pp	РР	
Capital R-tail alternate (U+2C64)	cv55	R_tl (old:1039)	0=Uppercase style	Rt	RR	R
			1=Lowercase style	ττ	rr	
Capital T-hook alternate (U+01AC)	cv57	t_hk (old:1037)	0=Left hook	Tf	Тт	R
			1=Right hook	Tf	Тт	
V-hook alternates (U+01B2 U+028B U+1DB9)	cv62	v_hk: (old:1033)	0=Curved	υυυ	บบบ	R
			1=Straight with low hook	Vv^{v}	VV^{v}	
			2=Straight with high hook	Vv^{v}	Vv^{v}	
Capital Y-hook alternate (U+01B3)	cv68	Y_hk (old:1034)	1=Right hook	Yý	YY	R
			0=Left hook	Yy	ΥΥ	
Small ezh-curl alternate (U+0293)	cv19	ezhc (old:1036)	0=Small bowl	3	Small capitals are not available as there is no uppercase equivalent	R
			1=Large bowl	3		
Capital Ezh alternates (U+01B7 U+04E0)	cv20	Ezhr (old:1042)	0=Normal	33 33	33 33	R
			1=Reversed sigma	33 33	33 33	
OU alternates (U+0222 U+0223 U+1D3D U+1D15)	cv47	opOU (old:1045)	0=Closed	8888	8888	R
			1=Open	888 ⁸	888 ⁸	
Modifier apostrophe alternates (U+02BC U+A78B U=A78C)	cv70	apos (old:1044)	0=Small	, 11	Small capitals are not available	R
			1=Large	, 11		
Modifier colon alternate (U+A789)	cv71	coln (old:1047)	0=Tight	:	Small capitals are not available as there is no	R

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes
			0=Expanded	:	uppercase equivalent	
Empty set alternates (U+2205)	cv98	empt (old:1046)	0=Circle	Ø	Small capitals are not available as there is no uppercase equivalent	R
			1=Zero	Ø		
Show invisible characters (U+00AD U+034F U+200B U+200C U+200D U+200E U+200F U+202A U+202B U+202C U+202D U+202E	ss06	invs (old:1030)	0=False		Small capitals are not available as there is no uppercase equivalent	R
U+2060 U+2061 U+2062 U+2063 U+FE00 U+FE01 U+FE02 U+FE03 U+FE04 U+FE05 U+FE06 U+FE07 U+FE08 U+FE09 U+FE0A U+FE0B U+FE0C U+FE0D			1=True	CGJ ZW ZW LRM RLM LRE RLE PDF LRO F() RLO		
U+FE0E U+FE0F U+FEFF)				VS VS VS S VS S VS VS VS VS VS VS X		
				VS VS VS VS VS VS TS		
Small Caps	smcp, c2sc	smcp (old:1058)	0=False 1=True		R S T U V W X Y Z À Á Â Ã Ä Æ Ç È É Ê È Î Í Î Ï Ð Ñ Ò Ó Ô Õ Ö Ø Ù Ú Û Ü Ý Þ Ÿ Ā Ă Ą Ć Ĉ Ċ Č Ď Đ Ē Ě Ė Ę Ě Ĝ Ğ Ġ Ģ Ĥ Ħ Ĩ Ĭ Į I I J Ĵ Ķ Ĺ Ļ Ľ Ł Ń Ņ Ň Ŋ Ō Ŏ Ő Œ Ŕ Ŗ Ř Ś Ŝ Ş Š Ţ Ť Ŧ Ũ Ū Ŭ Ů Ű Ų Ŵ Ŷ Ź Ż ₺ Б Ь С Б Ђ Њ К Ł Ŋ Ở Ŋ P Z T Ư Y Z Z Ş P DŽ DŽ LJ LJ NJ NJ A Ĭ Ŏ Ŭ Ü Ü Ü Ü Ü Ä Ā Ā G Ğ K Q Ō Ž DZ DZ Ġ Ň Å Æ Ø Ä Â Ë Ê Ï Î Ö Ô Ř R Ü Û Ş Ţ 3 Ħ 8 Z Ā Ę Ö Õ Ö Ö Ř R Ü Û Ş Ţ 3 H 8 Z Ā Ę Ö Õ Ö Ö Ā Ž L Ł W M N O R R Z T U U U A 3 P A B B B Ç D D D D D D D E Ē E E F G H H H H H H J Ï K K K L Ļ L L M M M M M M M M M M M M M M M M	R

Feature Name	OpenType feature ID	Graphite feature ID	Feature Setting	Example	Example with Small Capitals	TypeTuner Notes
					N N N D K K K L L O O O P P P Q Q Z Z V W S B P V 3 f 9 O F S T D F C ' Y N € B F G K N R S H 3 G	
Other Features						
Line spacing	-	-	Normal Tight Loose	Allows for adjustment of the default line spacing in the font.		Т