Universal Multiple-Octet Coded Character Set
International Organization for Standardization
Organisation Internationale de Normalisation
Международная организация по стандартизации

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Title:	**Revised proposal for the addition of Cherokee characters to the UCS**
Source:	**Michael Everson and Durbin Feeling**
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1. Introduction. This document requests a change of the encoding model for Cherokee from unicameral to bicameral, and in addition requests the addition of an archaic syllable *mv* to the repertoire.

1.1. Background. In the early 1990s when Cherokee was being encoded in the UCS, communication was not what it is today. Indeed much of the correspondence done concerning the encoding was even done by *fax*—hard as it is to believe now. In any case, it was not known at the time, either by character encoders or by the Cherokee users themselves, that the casing pairs which were found in certain important documents were required for encoding. It took some years after encoding before UCS-encoded Cherokee text became prevalent. Now that practical use has been made of the encoded script, Cherokee users have recognized that it was a mistake not to encode Cherokee as a bicameral script. The change of the encoding model for Cherokee from unicameral to bicameral should be prioritized as highly important. *The user community has requested this change and has identified it as an urgent requirement.*

2. The "missing" letter *mv*. Even when Cherokee was being first encoded, it was recognized that Sequoyah's document (illustrating his original character designs alongside handwritten versions of the typographic symbols being designed for them) contained an extra letter; back in 1994 this was mis-identified by Michael Everson as "archaic *hv*" (most likely due to the comparison given with Ꮣ *hv* in the *Cherokee Phoenix*, 1828-08-06—see Figure 2). The actual reading of the character is *mv*, a very rare syllable in Cherokee usually represented by *ma* in standard orthography. In consultation with the Cherokee Nation Language Program staff, the typographic form Ᏻ has been chosen to answer to the way in which Sequoyah drew the character. See Figure 1.

3. Bicamerality in Cherokee. Both capital letters and small letters are found in the Cherokee New Testament (1860) as well as in other documents, printed with lead-type throughout the 19th century and into the 20th. It is likely that the practice of unicameral Cherokee is in part a result first of the limitations of manual typewriters, as well as of early 8-bit encodings which followed the typewriter conventions. For a period of time through the middle of the 20th century the script was used much less than it had been previously. At present it is enjoying a UCS-based renaissance. Currently the Cherokee Nation's Office of Translation, Language Technology Department, and Curriculum Development staff are regularly forced to use fancy text in order to increase the font size of letters in sentence-initial position and representing personal and place-names. They find this disruptive of

their work-flow and impractical as fancy-text is less stable than plain text. Many database programs do not permit text in two point sizes in a database field, for instance.

3.1. Treatment of current Cherokee text. At present Cherokee text is encoded as caseless, with the property "Lo" (Letter Other) rather than "Lu" (Letter Upper) or "Ll" (Letter Lower) . There has been considerable discussion on this topic with the Cherokee user community and with representatives of both WG2 and the UTC. If the encoding model for Cherokee is to be changed from unicameral to bicameral, existing text has to be changed from "Lo" to either "Lu" or "Ll", and the new characters assigned whatever case is left over. There are advantages and disadvantages to both changes.

3.1.1. Change of current Cherokee from "Lo" to "Ll". Changing from "Lo" to "Ll" and adding a new "Lu" set of characters would seem to be the expected way of handling this problem, because in general it is upper-case characters which are added for Latin (casing pairs for African scripts using IPA, for example). If this were done, than Cherokee case-folding would be the same as Latin, Greek, Cyrillic, Armenian, Glagolitic, and Deseret: from upper-case to lower-case. In IDNA, current Cherokee characters (which are PVALID) would be made lower-case, and would fold to new upper-case characters (which would *not* be PVALID).

There are disadvantages to declaring existing Cherokee characters to be lower-case, however. Existing fonts draw Cherokee letters at the same size as Latin capitals. Despite what was suggested in N4487 (the preliminary proposal superseded by the present document) it does not make sense to retain Cherokee lower-case characters at Latin caps-height size and to make Cherokee capitals reach to the ascender and descender lines, because in the common scenario of mixed English and Cherokee text there would be essentially three sizes, Latin x-height, Latin/Cherokee caps-height, and super-large Cherokee caps. This would look pretty ridiculous.

Alternatively once could specify that fonts be changed so that existing Cherokee glyphs would be made, say, 68% smaller, and new caps added at Latin caps height. But this would mean two things. First, it would invalidate all current Cherokee fonts, and there is no real mechanism for comprehensively getting rid of them. And second, even if all of them could be got rid of and replaced with fonts that made the lower-case letters smaller, it would have the major implication of transforming the layout of every currently existing document.

3.1.2. Change of current Cherokee from "Lo" to "Lu". Changing from "Lo" to "Lu" and adding a new "Ll" set of characters would have the implication that Cherokee case-folding would be *different* from that of Latin, Greek, Cyrillic, Armenian, Glagolitic, and Deseret: it would instead be from lower-case to upper-case. In IDNA, current Cherokee characters (which are PVALID) would be made upper-case, and would fold to new lower-case characters (which would *not* be PVALID). This would be exceptional for IDNA, but it does not break anything in current practice, since currently PVALID characters would remain PVALID. Browser developers and other developers having to deal with IDNA would have to take special note of this (in the event a user typed in a URL with lower-case Cherokee).

Implications for the user in a word-processing environment would be that selecting text and applying the "all caps" style to it would work oppositely from the way it does for Latin. Typed-in Latin small letters grow with "all caps" style, and typed-in Latin capital letters stay the same size. For Cherokee it would be the opposite: Typed-in Cherokee capital letters would *shrink* with "all caps" style

(conceptually "all smalls" though the keyboard command would remain the same), and typed-in Cherokee small letters would stay the same size.

Implications for Cherokee font display is made much easier with this model, however. To add lower-case letters to an existing font is (technically) easy, and designers would not have to change the metrics of existing upper-case letters. The formatting of old documents would not change: basically everything would just *work*,

The disadvantage of treating currently encoded text as capital would mean that all currently encoded documents will, one day look like SHOUTING to readers, as the use of lower-case letters becomes more widespread. The same could be said for legacy Latin text written in 6-bit encodings, and for legal text which often written in all caps (for whatever reason).

3.1.3. Conclusion. After weighing the advantages and disadvantages in 3.1.1 and 3.1.2, the user community has decided to request the solution found in 3.1.2. Existing content and fonts will not go away; the fonts will be around for a long time. Implementors have no control over that. But implementors *do* control the treatment of casing behaviour in a user agent and can ensure that it does the right thing. Accordingly, our request is that WG2 and the UTC make the Cherokee script bicameral by making the existing Cherokee letters uppercase, in order to provide better backward compatibility with existing implementations.

4. Character encoding positions. In N4487 it was suggested that new Cherokee characters should be added to the SMP because there was little space left in the BMP (which had no free, unallocated blocks), and in order to preserve a constant offset for Cherokee case-pairs. While in general variable-length case-folding would not be problematic for many applications, it appears that for some others, such as certain database applications, it would be, at a deep enough level that it might not be possible to expect such folding to work (either in the short or long term, or ever), since a lesser-used script like Cherokee might not be reason enough to inspire corrections to that software, or to get such updates rolled out significantly. For this reason, the suggestion made recently by the U.S. National Body on the ballot for DIS ISO/IEC 10646 should be accepted. The boundaries of the Latin Extended-E block shoud be changed from 9 columns (U+AB30..U+ABBF) to 4 columns (U+AB30..U+AB6F), resulting in a block of 5 contiguous columns, which would enable a set of 80 characters to be encoded inthe BMP.

We recommend retaining constant offset nevertheless, for the convenience of users of the code charts. Accordingly, CHEROKEE LETTER A through CHEROKEE LETTER YA will be encoded at U+13A0..U+13EF, and CHEROKEE SMALL LETTER A through CHEROKEE SMALL LETTER YA will be encoded at U+AB70..U+ABBF. The remaining letters CHEROKEE LETTER YE through CHEROKEE LETTER MV will be encoded at U+13F0..U+13F5, and CHEROKEE SMALL LETTER YE through CHEROKEE SMALL LETTER MV will be encoded at U+13F8..U+13D5.

5. Ordering. The letter Ᏽ *Mv* should be inserted in its proper place in the syllabary, after Ᏺ *Mu*; Capital letters precede small letters as shown below.

D *A* <<< ᴅ *a* < R *E* <<< ʀ *e* < T *I* <<< ᴛ *i* < Ꭷ *O* <<< ᴓ *o* < � *U* <<< ᴕ *u* <
i *V* <<< i *v* < Ꮡ *Ga* <<< ꜱ *ga* < Ꮈ *Ka* <<< ᴏ *ka* < Ꮆ *Ge* <<< ʀ *ge* < Ꮿ *Gi* <<< ʏ *gi* <
Ꭺ *Go* <<< ᴀ *go* < Ꭻ *Gu* <<< ᴊ *gu* < Ꭼ *Gv* <<< ᴇ *gv* < Ꮂ *Ha* <<< ꜰ *ha* < Ꮅ *He* <<< ? *he* <
Ꭿ *Hi* <<< ᴊ *hi* < Ꮀ *Ho* <<< ꜰ *ho* < Ꮁ *Hu* <<< ᴦ *hu* < Ꮆ *Hv* <<< ᴑ *hv* < Ꮃ *La* <<< ᴡ *la* <
Ꮄ *Le* <<< ᴏ *le* < Ꮅ *Li* <<< ᴘ *li* < Ꮺ *Lo* <<< ɢ *lo* < Ꮇ *Lu* <<< ᴍ *lu* < Ꮈ *Lv* <<< ᴙ *lv* <
Ꮉ *Ma* <<< ᴍ *ma* < Ꮊ *Me* <<< ᴏ *me* < Ꮋ *Mi* <<< ʜ *mi* < Ꮌ *Mo* <<< ᴐ *mo* < Ꮍ *Mu* <<< ʏ *mu* <
Ꮇ *Mv* <<< ɢ *mv* < Ꮎ *Na* <<< ᴇ *na* < Ꮏ *Hna* <<< ᴛ *hna* < Ꮐ *Nah* <<< ɢ *nah* < Ꮑ *Ne* <<< ᴧ *ne* <
Ꮒ *Ni* <<< ʜ *ni* < Ꮓ *No* <<< ᴢ *no* < Ꮔ *Nu* <<< ꜰ *nu* < Ꮕ *Nv* <<< ᴏ *nv* < Ꮖ *Qua* <<< ꭲ *qua* <
Ꮗ *Que* <<< ᴔ *que* < Ꮙ *Qui* <<< ᴕ *qui* < Ꮚ *Quo* <<< ᴠ *quo* < Ꮘ *Quu* <<< ᴔ *quu* < Ꮛ *Quv* <<< ᴇ *quv* <
Ꮜ *Sa* <<< ᴜ *sa* < Ꮝ *S* <<< ᴐ *s* < Ꮞ *Se* <<< �序 *se* < Ꮟ *Si* <<< ᴄ *si* < Ꮠ *So* <<< ꜰ *so* <
Ꮡ *Su* <<< ᴕ *su* < Ꮢ *Sv* <<< ʀ *sv* < Ꮣ *Da* <<< ᴜ *da* < Ꮤ *Ta* <<< ᴡ *ta* < Ꮥ *De* <<< ꜱ *de* <
Ꮦ *Te* <<< ᴛ *te* < Ꮧ *Di* <<< ᴧ *di* < Ꮨ *Ti* <<< ᴧ *ti* < Ꮩ *Do* <<< ᴠ *do* < Ꮪ *Du* <<< ꜱ *du* <
Ꮫ *Dv* <<< ᴏ *dv* < Ꮬ *Dla* <<< ᴕ *dla* < Ꮭ *Tla* <<< ᴌ *tla* < Ꮮ *Tle* <<< ᴌ *tle* < Ꮯ *Tli* <<< ᴄ *tli* <
Ꮰ *Tlo* <<< ꜰ *tlo* < Ꮱ *Tlu* <<< ᴏ *tlu* < Ꮲ *Tlv* <<< ᴘ *tlv* < Ꮳ *Tsa* <<< ɢ *tsa* < Ꮴ *Tse* <<< ᴠ *tse* <
Ꮖ *Tsi* <<< ʜ *tsi* < Ꮶ *Tso* <<< ᴋ *tso* < Ꮷ *Tsu* <<< ᴅ *tsu* < Ꮸ *Tsv* <<< ᴄ *tsv* < Ꮹ *Wa* <<< ɢ *wa* <
Ꮺ *We* <<< ᴔ *we* < Ꮻ *Wi* <<< ᴏ *wi* < Ꮼ *Wo* <<< ᴠ *wo* < Ꮽ *Wu* <<< ꜱ *wu* < Ꮾ *Wv* <<< ᴃ *wv* <
Ꮿ *Ya* <<< ᴔ *ya* < Ᏸ *Ye* <<< β *ye* < Ᏹ *Yi* <<< ᴧ *yi* < Ᏺ *Yo* <<< ꜰ *yo* < Ᏻ *Yu* <<< ɢ *yu* <
Ᏼ *Yv* <<< ʙ *yv*

6. Glyph representation of Cherokee upper- and lower-case. In at least some of the 19th-century material lower-case letters are represented by the "long primer" size and upper-case letters are represented by the "English" size of the lead-type fonts cut for Cherokee at the time. These are approximately 10 and 14 points respectively. Setting such text in with lead-type was simple enough, but on computers today unless the leading has been explicitly specified (not all applications can do this) mixing 14-point and 10-point type in the same paragraph can make the line-spacing look a little uneven.

Here is an example text from the gospel of John 1:1–9, set in the size used in the New Testament, with 14-point capitals and 10-point smalls on 14.4 point leading:

¹ᏗᏓᎴᏂᏡᎬᎢ ᎧᏁᏨᏓ ᎡᎮᏗ, ᎠᏃ ᎾᏍᎩ ᎧᏁᏨᏓ ᎤᏁᎳᏅᎯ ᏚᏙᎳ ᎠᏟᏗ, ᎠᏃ ᎾᏍᎩ ᎧᏁᏨᏓ ᎤᏁᎳᏅᎯ ᏅᎢᏓ. ²ᏗᏓᎴᏂᏡᎬᏗ ᎾᏍᎩ ᎤᏁᎳᏅᎯ ᏚᏙᎳ ᎠᏟᏗ.

³ᎭᏏ ᎠᎦᏍᏗ ᎾᏍᎩ ᎤᏮᎴᎵᏗ, ᎠᏃ ᎭᏏ ᎠᏆᎶᏅ ᎰᏩ ᎢᏝ ᎠᎦᏍᏗ ᎾᏍᎩ ᏥᎤᏯᏚᎥ ᏙᎩ. ⁴ᎾᏍᎩ [ᎧᏁᏨᏓ] ᎡᎰᏓ ᎤᏩᏙᏗ; ᎠᏃ ᎾᏍᎩ ᎡᎰᏓ ᏰᏃ ᏥᏏ ᎤᎮᏓᏳᏝᏃ ᏅᎢᏓ. ⁵ᎠᏃ ᎾᏍᎩ ᏥᏏ-ᏍᏓᏯᏚᏍᎩ ᎤᏝᏰ ᏌᏳᏏᏗ, ᎤᏝᏰᏃ ᎢᏝ ᏯᎵᎭᏝᏙᏗ.

⁶ᏴᏩ ᏛᎦᏍᏗ ᎠᏙᏎᏫ ᎡᎰᏯ ᏩᏂ ᏧᏛᏙᏗ ᎤᏁᎳᏅᎯ ᎤᏓᎶᎯᏙ ᏅᎢᏯ. ⁷ᎾᏍᎩ ᎤᎻᏤᏯ ᎧᏁᏨᎠᏯ ᏅᎢᏯ, ᎾᏍᎩ ᏥᏏ-ᏍᏗ ᎤᏤᏗᏯᏃ, ᎾᏍᎩ ᏛᎦᎭᏉᏗᏃ ᎣᎯ ᎤᏃᎠᎦᏃᏃ. ⁸ᎢᏝ ᎾᏍᎩ Ꭷ ᏥᏏ-ᏍᏗ ᏯᎢᏓ, ᎧᏁᏨᏍᏳᏰᏃᏱᎭ ᏅᎢᏯ ᎾᏍᎩ ᏥᏏ-ᏍᏗ. ⁹ᎾᏍᎩᏯᏱᎭ ᎾᎧᏁᏨᏓ ᎤᏮᎠᎦᎢᎢᏏ ᏥᏏ-ᏍᏗ ᏅᎢᏯ; ᎾᏍᎩ ᎡᎦᏓ ᏧᎻᏤᎢ, ᏥᏏ ᎭᏍᏓᏯᏙᎵᎧ ᎣᎯ ᏰᏃ.

Here is an example text from the gospel of John 1:1–9, set in 12 points on 14.4 point leading:

¹ᏗᏓᎴᏂᏡᎬᎢ ᎧᏁᏨᏓ ᎡᎮᏗ, ᎠᏃ ᎾᏍᎩ ᎧᏁᏨᏓ ᎤᏁᎳᏅᎯ ᏚᏙᎳ ᎠᏟᏗ, ᎠᏃ ᎾᏍᎩ ᎧᏁᏨᏓ ᎤᏁᎳᏅᎯ ᏅᎢᏓ. ²ᏗᏓᎴᏂᏡᎬᏗ ᎾᏍᎩ ᎤᏁᎳᏅᎯ ᏚᏙᎳ ᎠᏟᏗ.

³ᎭᏏ ᎠᎦᏍᏗ ᎾᏍᎩ ᎤᏮᎴᎵᏗ, ᎠᏃ ᎭᏏ ᎠᏆᎶᏅ ᎰᏩ ᎢᏝ ᎠᎦᏍᏗ ᎾᏍᎩ ᏥᎤᏯᏚᎥ ᏙᎩ. ⁴ᎾᏍᎩ [ᎧᏁᏨᏓ] ᎡᎰᏓ ᎤᏩᏙᏗ; ᎠᏃ ᎾᏍᎩ ᎡᎰᏓ ᏰᏃ ᏥᏏ ᎤᎮᏓᏳᏝᏃ ᏅᎢᏓ. ⁵ᎠᏃ ᎾᏍᎩ ᏥᏏ-ᏍᏓᏯᏚᏍᎩ ᎤᏝᏰ ᏌᏳᏏᏗ, ᎤᏝᏰᏃ ᎢᏝ ᏯᎵᎭᏝᏙᏗ.

⁶ᏴᏩ ᏛᎦᏍᏗ ᎠᏙᏎᏫ ᎡᎰᏯ ᏩᏂ ᏧᏛᏙᏗ ᎤᏁᎳᏅᎯ ᎤᏓᎶᎯᏙ ᏅᎢᏯ. ⁷ᎾᏍᎩ ᎤᎻᏤᏯ ᎧᏁᏨᎠᏯ ᏅᎢᏯ, ᎾᏍᎩ ᏥᏏ-ᏍᏗ ᎤᏤᏗᏯᏃ, ᎾᏍᎩ ᏛᎦᎭᏉᏗᏃ ᎣᎯ ᎤᏃᎠᎦᏃᏃ. ⁸ᎢᏝ ᎾᏍᎩ Ꭷ ᏥᏏ-ᏍᏗ ᏯᎢᏓ, ᎧᏁᏨᏍᏳᏰᏃᏱᎭ ᏅᎢᏯ ᎾᏍᎩ ᏥᏏ-ᏍᏗ. ⁹ᎾᏍᎩᏯᏱᎭ ᎾᎧᏁᏨᏓ ᎤᏮᎠᎦᎢᎢᏏ ᏥᏏ-ᏍᏗ ᏅᎢᏯ; ᎾᏍᎩ ᎡᎦᏓ ᏧᎻᏤᎢ, ᏥᏏ ᎭᏍᏓᏯᏙᎵᎧ ᎣᎯ ᏰᏃ.

Note that a number of characters in this example have ascenders or descenders. Discussions with Cherokee users indicates that the use of such variation is found quite commonly in 19th-century handwriting, and is likely to be felt as natural to the script, although seeing it in type might be a surprise to some readers at first. Over the next period while, a certain amount of experimentation in this regard is to be expected. In the font used in the code chart, ascenders have been given to Ꮎ *u*, Ᏹ *he*, Ꮒ *ni*, Ꭴ *que*, Ꭶ *s*, Ꮃ *ta*, Ꮶ *tso*, and Ꭹ *ya* (of which Ꮒ, Ꮃ, and Ꮶ have not been attested per se in handwriting), and descenders have been given to Ᏻ *gi*, Ꭻ *gu*, Ꮏ *hna*, Ꮐ *nah*, Ᏸ *ye*, Ꮍ *yu* (of which only Ꭻ has not been attested per se in handwriting).

7. Font style. It must be said that Cherokee users would like to have their fonts function with *italic* and **bold** and ***bold-italic*** styles just as Latin fonts do. To date specifically italic styles have never been designed (though 19th-century handwriting offers many opportunities for study); at a minimum an obliqued Cherokee should be offered by font vendors.

8. Diacritical marks in Cherokee. It should be noted that a variety of combining diacritical marks are now used in Cherokee text. For ordinary readers and especially for children, U+0323 COMBINING DOT BELOW indicates shifts in consonant readings—such as voiced to voiceless, voiceless to voiced—and U+0331 COMBINING MACRON BELOW indicates the dropping of a vowel. (When a consonant is both shifted and has its vowel dropped, U+0324 COMBINING DIAERESIS BELOW is used.) In quite exceptional cases, nasalization can be indicated by U+03 combining tilde below. (Nasalization is common; marking it is not.) Diacritical marks above a letter indicate tones; these are typically used only by linguists and in lexicography.

	a	e	i	o	u	v
[g] to [k]		Ꝃ *ke*	Ꝕ *ki*	Ꝁ *ko*	Ꝅ *ku*	Ꝏ *kv*
[n] to [n]~[ʰn]		Ꭴ̣ *hne*	Ꮒ̣ *hni*	Ꮓ̣ *hno*	Ꮔ̣ *hnu*	Ꮕ̣ *hnv*
[s] to [ʃ]	Ꮜ̣ *sha*	Ꮝ̣ *she*	Ꮞ̣ *shi*	Ꮟ̣ *sho*	Ꮠ̣ *shu*	Ꮢ *shv*
[d] to [t]				Ꮩ̣ *to*	Ꮬ̣ *tu*	Ꮭ̣ *tv*
[tɬ] to [dl]		Ꮫ̣ *dle*	Ꮳ̣ *dli*	Ꮯ̣ *dlo*	Ꮰ̣ *dlu*	Ꮱ̣ *dlv*
[ts]~[dʒ] to [tʃ]	Ꮳ̣ *cha*	Ꮴ̣ *che*	Ꮵ̣ *chi*	Ꮶ̣ *cho*	Ꮷ̣ *chu*	Ꮸ̈ *chv*
[w] to [ʌ]	Ꮤ̣ *wha*	Ꮺ̣ *whe*	Ꮻ̣ *whi*	Ꮼ̣ *who*	Ꮽ̣ *whu*	Ꮾ̣ *whv*
[j] to [ʰj]	Ꭶ̣ *hya*	Ᏸ̣ *hye*	Ᏹ̣ *hyi*	Ᏺ̣ *hyo*	Ᏻ̈ *hyu*	Ᏼ̣ *hyv*

Some additional modifiers have been discussed, for use in transliteration of names in fiction. For example, the non-Cherokee sound [r]~[ɹ] might be represented by a dotted *l*-series:

	a	e	i	o	u	v
[l] to [r]~[ɹ]	Ꮃ̣ *ra*	Ꮄ̣ *re*	Ꮅ̣ *ri*	Ꮆ̣ *ro*	Ꮇ̣ *ru*	Ꮈ̣ *rv*

An example of these marks in use is in a spelling which is planned to be used in the forthcoming translation of �Ꮿ (*Haquiti*, *The Hobbit*) in Cherokee, where a character's Sindarin name will be written not just Ꭱꮈꭺꮅꮧ (*Elilonidi*) but Ꭱ̣ꮈ̣ꭺ̣ꮧ̣ (*Elrond*).

Tone marks above a letter, used to indicate pitch in technical transcription, follows the IPA conventions, and uses U+0304 COMBINING MACRON for "mid" (this is the default and need not be written), U+0302 COMBINING CIRCUMFLEX ACCENT for "falling", U+030C COMBINING CARON for "rising", U+0300 COMBINING GRAVE ACCENT for "low", U+0301 COMBINING ACUTE ACCENT for "high", and U+030B COMBINING DOUBLE ACUTE ACCENT for "super high".

9. Timeliness. Since the identities of the characters in this proposal are not disputed by anyone (they are, after all, simply casing pairs of existing characters (plus *Mv*/*mv*), and since early implementation woudl be advantageous to the user community, we favour the placement of the Cherokee additions onto the earliest possible ballot.

10. Unicode Character Properties.

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13A0;CHEROKEE LETTER A;Ll;0;L;;;;;N;;;AB70;;AB70
13A1;CHEROKEE LETTER E;Ll;0;L;;;;;N;;;AB71;;AB71
13A2;CHEROKEE LETTER I;Ll;0;L;;;;;N;;;AB72;;AB72
13A3;CHEROKEE LETTER O;Ll;0;L;;;;;N;;;AB73;;AB73
13A4;CHEROKEE LETTER U;Ll;0;L;;;;;N;;;AB74;;AB74
13A5;CHEROKEE LETTER V;Ll;0;L;;;;;N;;;AB75;;AB75
13A6;CHEROKEE LETTER GA;Ll;0;L;;;;;N;;;AB76;;AB76
13A7;CHEROKEE LETTER KA;Ll;0;L;;;;;N;;;AB77;;AB77
13A8;CHEROKEE LETTER GE;Ll;0;L;;;;;N;;;AB78;;AB78
13A9;CHEROKEE LETTER GI;Ll;0;L;;;;;N;;;AB79;;AB79
13AA;CHEROKEE LETTER GO;Ll;0;L;;;;;N;;;AB7A;;AB7A
13AB;CHEROKEE LETTER GU;Ll;0;L;;;;;N;;;AB7B;;AB7B
13AC;CHEROKEE LETTER GV;Ll;0;L;;;;;N;;;AB7C;;AB7C
13AD;CHEROKEE LETTER HA;Ll;0;L;;;;;N;;;AB7D;;AB7D
13AE;CHEROKEE LETTER HE;Ll;0;L;;;;;N;;;AB7E;;AB7E
13AF;CHEROKEE LETTER HI;Ll;0;L;;;;;N;;;AB7F;;AB7F
13B0;CHEROKEE LETTER HO;Ll;0;L;;;;;N;;;AB80;;AB80
13B1;CHEROKEE LETTER HU;Ll;0;L;;;;;N;;;AB81;;AB81
13B2;CHEROKEE LETTER HV;Ll;0;L;;;;;N;;;AB82;;AB82
13B3;CHEROKEE LETTER LA;Ll;0;L;;;;;N;;;AB83;;AB83
13B4;CHEROKEE LETTER LE;Ll;0;L;;;;;N;;;AB84;;AB84
13B5;CHEROKEE LETTER LI;Ll;0;L;;;;;N;;;AB85;;AB85
13B6;CHEROKEE LETTER LO;Ll;0;L;;;;;N;;;AB86;;AB86
13B7;CHEROKEE LETTER LU;Ll;0;L;;;;;N;;;AB87;;AB87
13B8;CHEROKEE LETTER LV;Ll;0;L;;;;;N;;;AB88;;AB88
13B9;CHEROKEE LETTER MA;Ll;0;L;;;;;N;;;AB89;;AB89
13BA;CHEROKEE LETTER ME;Ll;0;L;;;;;N;;;AB8A;;AB8A
13BB;CHEROKEE LETTER MI;Ll;0;L;;;;;N;;;AB8B;;AB8B
13BC;CHEROKEE LETTER MO;Ll;0;L;;;;;N;;;AB8C;;AB8C
13BD;CHEROKEE LETTER MU;Ll;0;L;;;;;N;;;AB8D;;AB8D
13BE;CHEROKEE LETTER NA;Ll;0;L;;;;;N;;;AB8E;;AB8E
13BF;CHEROKEE LETTER HNA;Ll;0;L;;;;;N;;;AB8F;;AB8F
13C0;CHEROKEE LETTER NAH;Ll;0;L;;;;;N;;;AB90;;AB90
13C1;CHEROKEE LETTER NE;Ll;0;L;;;;;N;;;AB91;;AB91
13C2;CHEROKEE LETTER NI;Ll;0;L;;;;;N;;;AB92;;AB92
13C3;CHEROKEE LETTER NO;Ll;0;L;;;;;N;;;AB93;;AB93
13C4;CHEROKEE LETTER NU;Ll;0;L;;;;;N;;;AB94;;AB94
13C5;CHEROKEE LETTER NV;Ll;0;L;;;;;N;;;AB95;;AB95
13C6;CHEROKEE LETTER QUA;Ll;0;L;;;;;N;;;AB96;;AB96
13C7;CHEROKEE LETTER QUE;Ll;0;L;;;;;N;;;AB97;;AB97
13C8;CHEROKEE LETTER QUI;Ll;0;L;;;;;N;;;AB98;;AB98
13C9;CHEROKEE LETTER QUO;Ll;0;L;;;;;N;;;AB99;;AB99
13CA;CHEROKEE LETTER QUU;Ll;0;L;;;;;N;;;AB9A;;AB9A
13CB;CHEROKEE LETTER QUV;Ll;0;L;;;;;N;;;AB9B;;AB9B
13CC;CHEROKEE LETTER SA;Ll;0;L;;;;;N;;;AB9C;;AB9C
13CD;CHEROKEE LETTER S;Ll;0;L;;;;;N;;;AB9D;;AB9D
13CE;CHEROKEE LETTER SE;Ll;0;L;;;;;N;;;AB9E;;AB9E
13CF;CHEROKEE LETTER SI;Ll;0;L;;;;;N;;;AB9F;;AB9F
13D0;CHEROKEE LETTER SO;Ll;0;L;;;;;N;;;ABA0;;ABA0
13D1;CHEROKEE LETTER SU;Ll;0;L;;;;;N;;;ABA1;;ABA1
13D2;CHEROKEE LETTER SV;Ll;0;L;;;;;N;;;ABA2;;ABA2
13D3;CHEROKEE LETTER DA;Ll;0;L;;;;;N;;;ABA3;;ABA3
13D4;CHEROKEE LETTER TA;Ll;0;L;;;;;N;;;ABA4;;ABA4
13D5;CHEROKEE LETTER DE;Ll;0;L;;;;;N;;;ABA5;;ABA5
13D6;CHEROKEE LETTER TE;Ll;0;L;;;;;N;;;ABA6;;ABA6
13D7;CHEROKEE LETTER DI;Ll;0;L;;;;;N;;;ABA7;;ABA7
13D8;CHEROKEE LETTER TI;Ll;0;L;;;;;N;;;ABA8;;ABA8
13D9;CHEROKEE LETTER DO;Ll;0;L;;;;;N;;;ABA9;;ABA9
13DA;CHEROKEE LETTER DU;Ll;0;L;;;;;N;;;ABAA;;ABAA
13DB;CHEROKEE LETTER DV;Ll;0;L;;;;;N;;;ABAB;;ABAB
13DC;CHEROKEE LETTER DLA;Ll;0;L;;;;;N;;;ABAC;;ABAC
13DD;CHEROKEE LETTER TLA;Ll;0;L;;;;;N;;;ABAD;;ABAD
13DE;CHEROKEE LETTER TLE;Ll;0;L;;;;;N;;;ABAE;;ABAE
13DF;CHEROKEE LETTER TLI;Ll;0;L;;;;;N;;;ABAF;;ABAF
13E0;CHEROKEE LETTER TLO;Ll;0;L;;;;;N;;;ABB0;;ABB0
13E1;CHEROKEE LETTER TLU;Ll;0;L;;;;;N;;;ABB1;;ABB1
13E2;CHEROKEE LETTER TLV;Ll;0;L;;;;;N;;;ABB2;;ABB2
13E3;CHEROKEE LETTER TSA;Ll;0;L;;;;;N;;;ABB3;;ABB3
13E4;CHEROKEE LETTER TSE;Ll;0;L;;;;;N;;;ABB4;;ABB4
13E5;CHEROKEE LETTER TSI;Ll;0;L;;;;;N;;;ABB5;;ABB5
13E6;CHEROKEE LETTER TSO;Ll;0;L;;;;;N;;;ABB6;;ABB6
13E7;CHEROKEE LETTER TSU;Ll;0;L;;;;;N;;;ABB7;;ABB7
13E8;CHEROKEE LETTER TSV;Ll;0;L;;;;;N;;;ABB8;;ABB8
13E9;CHEROKEE LETTER WA;Ll;0;L;;;;;N;;;ABB9;;ABB9
13EA;CHEROKEE LETTER WE;Ll;0;L;;;;;N;;;ABBA;;ABBA
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13EB;CHEROKEE LETTER WI;Ll;0;L;;;;;;N;;;ABBB;;ABBB
13EC;CHEROKEE LETTER WO;Ll;0;L;;;;;;N;;;ABBC;;ABBC
13ED;CHEROKEE LETTER WU;Ll;0;L;;;;;;N;;;ABBD;;ABBD
13EE;CHEROKEE LETTER WV;Ll;0;L;;;;;;N;;;ABBE;;ABBE
13EF;CHEROKEE LETTER YA;Ll;0;L;;;;;;N;;;ABBF;;ABBF
13F0;CHEROKEE LETTER YE;Ll;0;L;;;;;;N;;;13F8;;13F8
13F1;CHEROKEE LETTER YI;Ll;0;L;;;;;;N;;;13F9;;13F9
13F2;CHEROKEE LETTER YO;Ll;0;L;;;;;;N;;;13FA;;13FA
13F3;CHEROKEE LETTER YU;Ll;0;L;;;;;;N;;;13FB;;13FB
13F4;CHEROKEE LETTER YV;Ll;0;L;;;;;;N;;;13FC;;13FC
13F5;CHEROKEE LETTER MV;Ll;0;L;;;;;;N;;;13FD;;13FD
13F8;CHEROKEE SMALL LETTER YE;Lu;0;L;;;;;;N;;;;13F0;
13F9;CHEROKEE SMALL LETTER YI;Lu;0;L;;;;;;N;;;;13F1;
13FA;CHEROKEE SMALL LETTER YO;Lu;0;L;;;;;;N;;;;13F2;
13FB;CHEROKEE SMALL LETTER YU;Lu;0;L;;;;;;N;;;;13F3;
13FC;CHEROKEE SMALL LETTER YV;Lu;0;L;;;;;;N;;;;13F4;
13FD;CHEROKEE SMALL LETTER MV;Lu;0;L;;;;;;N;;;;13F5;
2E43;LOW COLON;Po;0;ON;;;;;;N;;;;;
AB70;CHEROKEE SMALL LETTER A;Lu;0;L;;;;;;N;;;;13A0;
AB71;CHEROKEE SMALL LETTER E;Lu;0;L;;;;;;N;;;;13A1;
AB72;CHEROKEE SMALL LETTER I;Lu;0;L;;;;;;N;;;;13A2;
AB73;CHEROKEE SMALL LETTER O;Lu;0;L;;;;;;N;;;;13A3;
AB74;CHEROKEE SMALL LETTER U;Lu;0;L;;;;;;N;;;;13A4;
AB75;CHEROKEE SMALL LETTER V;Lu;0;L;;;;;;N;;;;13A5;
AB76;CHEROKEE SMALL LETTER GA;Lu;0;L;;;;;;N;;;;13A6;
AB77;CHEROKEE SMALL LETTER KA;Lu;0;L;;;;;;N;;;;13A7;
AB78;CHEROKEE SMALL LETTER GE;Lu;0;L;;;;;;N;;;;13A8;
AB79;CHEROKEE SMALL LETTER GI;Lu;0;L;;;;;;N;;;;13A9;
AB7A;CHEROKEE SMALL LETTER GO;Lu;0;L;;;;;;N;;;;13AA;
AB7B;CHEROKEE SMALL LETTER GU;Lu;0;L;;;;;;N;;;;13AB;
AB7C;CHEROKEE SMALL LETTER GV;Lu;0;L;;;;;;N;;;;13AC;
AB7D;CHEROKEE SMALL LETTER HA;Lu;0;L;;;;;;N;;;;13AD;
AB7E;CHEROKEE SMALL LETTER HE;Lu;0;L;;;;;;N;;;;13AE;
AB7F;CHEROKEE SMALL LETTER HI;Lu;0;L;;;;;;N;;;;13AF;
AB80;CHEROKEE SMALL LETTER HO;Lu;0;L;;;;;;N;;;;13B0;
AB81;CHEROKEE SMALL LETTER HU;Lu;0;L;;;;;;N;;;;13B1;
AB82;CHEROKEE SMALL LETTER HV;Lu;0;L;;;;;;N;;;;13B2;
AB83;CHEROKEE SMALL LETTER LA;Lu;0;L;;;;;;N;;;;13B3;
AB84;CHEROKEE SMALL LETTER LE;Lu;0;L;;;;;;N;;;;13B4;
AB85;CHEROKEE SMALL LETTER LI;Lu;0;L;;;;;;N;;;;13B5;
AB86;CHEROKEE SMALL LETTER LO;Lu;0;L;;;;;;N;;;;13B6;
AB87;CHEROKEE SMALL LETTER LU;Lu;0;L;;;;;;N;;;;13B7;
AB88;CHEROKEE SMALL LETTER LV;Lu;0;L;;;;;;N;;;;13B8;
AB89;CHEROKEE SMALL LETTER MA;Lu;0;L;;;;;;N;;;;13B9;
AB8A;CHEROKEE SMALL LETTER ME;Lu;0;L;;;;;;N;;;;13BA;
AB8B;CHEROKEE SMALL LETTER MI;Lu;0;L;;;;;;N;;;;13BB;
AB8C;CHEROKEE SMALL LETTER MO;Lu;0;L;;;;;;N;;;;13BC;
AB8D;CHEROKEE SMALL LETTER MU;Lu;0;L;;;;;;N;;;;13BD;
AB8E;CHEROKEE SMALL LETTER NA;Lu;0;L;;;;;;N;;;;13BE;
AB8F;CHEROKEE SMALL LETTER HNA;Lu;0;L;;;;;;N;;;;13BF;
AB90;CHEROKEE SMALL LETTER NAH;Lu;0;L;;;;;;N;;;;13C0;
AB91;CHEROKEE SMALL LETTER NE;Lu;0;L;;;;;;N;;;;13C1;
AB92;CHEROKEE SMALL LETTER NI;Lu;0;L;;;;;;N;;;;13C2;
AB93;CHEROKEE SMALL LETTER NO;Lu;0;L;;;;;;N;;;;13C3;
AB94;CHEROKEE SMALL LETTER NU;Lu;0;L;;;;;;N;;;;13C4;
AB95;CHEROKEE SMALL LETTER NV;Lu;0;L;;;;;;N;;;;13C5;
AB96;CHEROKEE SMALL LETTER QUA;Lu;0;L;;;;;;N;;;;13C6;
AB97;CHEROKEE SMALL LETTER QUE;Lu;0;L;;;;;;N;;;;13C7;
AB98;CHEROKEE SMALL LETTER QUI;Lu;0;L;;;;;;N;;;;13C8;
AB99;CHEROKEE SMALL LETTER QUO;Lu;0;L;;;;;;N;;;;13C9;
AB9A;CHEROKEE SMALL LETTER QUU;Lu;0;L;;;;;;N;;;;13CA;
AB9B;CHEROKEE SMALL LETTER QUV;Lu;0;L;;;;;;N;;;;13CB;
AB9C;CHEROKEE SMALL LETTER SA;Lu;0;L;;;;;;N;;;;13CC;
AB9D;CHEROKEE SMALL LETTER S;Lu;0;L;;;;;;N;;;;13CD;
AB9E;CHEROKEE SMALL LETTER SE;Lu;0;L;;;;;;N;;;;13CE;
AB9F;CHEROKEE SMALL LETTER SI;Lu;0;L;;;;;;N;;;;13CF;
ABA0;CHEROKEE SMALL LETTER SO;Lu;0;L;;;;;;N;;;;13D0;
ABA1;CHEROKEE SMALL LETTER SU;Lu;0;L;;;;;;N;;;;13D1;
ABA2;CHEROKEE SMALL LETTER SV;Lu;0;L;;;;;;N;;;;13D2;
ABA3;CHEROKEE SMALL LETTER DA;Lu;0;L;;;;;;N;;;;13D3;
ABA4;CHEROKEE SMALL LETTER TA;Lu;0;L;;;;;;N;;;;13D4;
ABA5;CHEROKEE SMALL LETTER DE;Lu;0;L;;;;;;N;;;;13D5;
ABA6;CHEROKEE SMALL LETTER TE;Lu;0;L;;;;;;N;;;;13D6;
ABA7;CHEROKEE SMALL LETTER DI;Lu;0;L;;;;;;N;;;;13D7;
ABA8;CHEROKEE SMALL LETTER TI;Lu;0;L;;;;;;N;;;;13D8;
ABA9;CHEROKEE SMALL LETTER DO;Lu;0;L;;;;;;N;;;;13D9;
ABAA;CHEROKEE SMALL LETTER DU;Lu;0;L;;;;;;N;;;;13DA;
ABAB;CHEROKEE SMALL LETTER DV;Lu;0;L;;;;;;N;;;;13DB;
ABAC;CHEROKEE SMALL LETTER DLA;Lu;0;L;;;;;;N;;;;13DC;
ABAD;CHEROKEE SMALL LETTER TLA;Lu;0;L;;;;;;N;;;;13DD;
ABAE;CHEROKEE SMALL LETTER TLE;Lu;0;L;;;;;;N;;;;13DE;
ABAF;CHEROKEE SMALL LETTER TLI;Lu;0;L;;;;;;N;;;;13DF;
ABB0;CHEROKEE SMALL LETTER TLO;Lu;0;L;;;;;;N;;;;13E0;
ABB1;CHEROKEE SMALL LETTER TLU;Lu;0;L;;;;;;N;;;;13E1;
ABB2;CHEROKEE SMALL LETTER TLV;Lu;0;L;;;;;;N;;;;13E2;
ABB3;CHEROKEE SMALL LETTER TSA;Lu;0;L;;;;;;N;;;;13E3;
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ABB4;CHEROKEE SMALL LETTER TSE;Lu;0;L;;;;;N;;;;13E4;
ABB5;CHEROKEE SMALL LETTER TSI;Lu;0;L;;;;;N;;;;13E5;
ABB6;CHEROKEE SMALL LETTER TSO;Lu;0;L;;;;;N;;;;13E6;
ABB7;CHEROKEE SMALL LETTER TSU;Lu;0;L;;;;;N;;;;13E7;
ABB8;CHEROKEE SMALL LETTER TSV;Lu;0;L;;;;;N;;;;13E8;
ABB9;CHEROKEE SMALL LETTER WA;Lu;0;L;;;;;N;;;;13E9;
ABBA;CHEROKEE SMALL LETTER WE;Lu;0;L;;;;;N;;;;13EA;
ABBB;CHEROKEE SMALL LETTER WI;Lu;0;L;;;;;N;;;;13EB;
ABBC;CHEROKEE SMALL LETTER WO;Lu;0;L;;;;;N;;;;13EC;
ABBD;CHEROKEE SMALL LETTER WU;Lu;0;L;;;;;N;;;;13ED;
ABBE;CHEROKEE SMALL LETTER WV;Lu;0;L;;;;;N;;;;13EE;
ABBF;CHEROKEE SMALL LETTER YA;Lu;0;L;;;;;N;;;;13EF;
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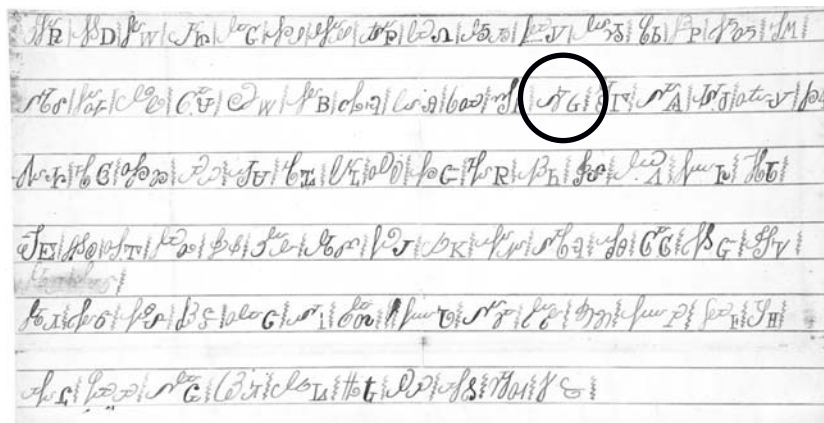
12. Figures.

Figure 1. Sequoyah's original arrangement of the syllabary, showing *mv* in the original design and with a type-based version hand-drawn next to it.

Figure 2. Description of the problematic typography and use of the syllable *mv* in the *Cherokee Phoenix*, 1828-08-06.

ᏅᏬᎯ ᎤᏙᏣᎸᎥ, ᏣᏂ ᎣᎸᏫᏍᏓᏁᎸᎢ.

ᏓᏕᎦᏔ 1

1 ᏥᏳᏍᏆᎴ ᎤᏙᏣᎸᎥ ᎡᎮᎢ, ᏕᎠ
ᎾᏍᎩ ᎤᏙᏣᎸᎥ ᎤᏁᎸᏓᏁ ᏔᏥᏬᏱ Ꮣ-
ᎯᎵᎢ, ᏕᎠ ᎾᏍᎩ ᎤᏙᏣᎸᎥ ᎤᏁᎸᏓᏁ
ᎮᎴᎢ.

2 ᏥᏳᏍᏆᎴᎢ ᎾᏍᎩ ᎤᏁᎸᏓᏁ
ᏔᏥᏬᏱ ᎠᎯᎵᎢ.

3 ᎲᎢ ᎠᎦᏍᎥ ᎾᏍᎩ ᎤᏩᎵᎳᎢ, ᏕᎠ
ᎲᎢ ᎠᏉᏓ ᎡᏯ ᎢᏢ ᎠᎦᏍᎥ ᎾᏍᎩ
ᏊᏬᏂᎥ ᎥᏴ.

4 ᎾᏍᎩ [ᎤᏙᏣᎸᎥ] ᎡᎮᎷ ᎤᏬᎴᎢ;
ᏕᎠ ᎾᏍᎩ ᎡᎮᎷ ᎡᏯ ᏔᏍ ᎤᎾᏛᏔᎵᎪ
ᎮᎴᎢ.

5 ᏕᎠ ᎾᏍᎩ ᏔᏍ-ᏍᎯᏭᎵᏎᎥ ᎤᎴᎮ
ᏎᎥᎤᏍᏔ, ᎤᎴᏴᏃ ᎢᎵ ᏬᏍᎲᏍᎦᏐᎢ.

6 ᎤᎦ ᏔᎦᏍᎷ ᏓᏍᏎᎠ ᎡᎯᎥ ᏣᏂ
ᏠᏯᎢᏗᎾ ᎤᏁᎸᏓᏁ ᎤᎴᎦᏰᎶᏐ ᎮᎴᎢ.

7 ᎾᏍᎩ ᎤᎷᎷᎦᏤᏴ ᎤᏙᏣᎸᎠᏴ ᎮᎴᎢ,
ᎾᏍᎩ ᏔᏍ-ᏍᎯ ᎤᏙᏢᏝ, ᎾᏍᎩ ᏔᎪ-
ᎦᎯᏘᎵᎠ ᎾᎲᎢ ᎤᏤᎦᏢᎵᎠ.

8 ᎢᎵ ᎾᏍᎩ Ꭳ ᏔᏍ-ᏍᎯ ᏍᎮᎴᎢ, Ꭳ-
ᏃᏨᎠᏯᏗᏯᎲ ᎮᎴᎢ ᎾᏍᎩ ᏔᏍ-ᏍᎯ.

9 ᎾᏍᎩᏯᎲ Ꭳ ᎤᏙᏣᎸᎥ ᎤᎥᎦᏍᎸ
ᏔᏍ-ᏍᎯ ᎮᎴᎢ; ᎾᏍᎩ ᎡᎦᎠ ᏤᎷᎻᏬ
ᏔᏍ ᎲᎤᏓᏠᏔᎵᎠ ᎾᎲᎢ ᎡᏯ.

10 ᎾᏍᎩ ᎡᎦᎠ ᎡᎥᎥ, ᏕᎠ ᎾᏍᎩ
ᎡᎦᎠ ᎤᏩᏒᎠ ᎮᎴᎢ, ᏕᎠ ᎡᎦᎠ ᎢᎵ
ᎤᏬᎵᏘᏘ.

11 ᎤᎥᎵᎠᎠ ᎤᎷᎷᎦᏤᏴ, Ꮣ4Ꮓ ᏠᏢᎵ
ᎢᎵ ᏬᏤᎦᎳᎲᏍᎦᏐᎢ.

12 ᎾᎲᎯᏯᎲ ᏗᎡᎦᏍᎲᎦᏣᎪ ᏐᎣ-
ᎵᏯᏛᏝᎠᎦᏴ ᎤᏁᎸᏓᏁ ᏣᏬᎮ Ꮤ-
ᎦᎹᎵᏲᏣᎵᎪ; ᎾᏍᎩ ᏐᎣᎥᎥ ᏗᏤᎦᎦ-
ᏭᏯᎢ;

13 ᎾᏍᎩ ᎤᎬ ᏠᎦᏔᎠᎾᏯᎪ ᎲᎢᎴᎣ,
ᏕᎠ ᎤᎣᏓᎸ ᏕᎷᎤᎨᏴᎬ ᏠᎦᏔᎠᎾᏯ
ᎲᎢᎴᎣ, ᏕᎠ ᎡᎣ ᏕᎷᎤᎨᏴᎬ ᏠᎦᏔᎠ-
ᎾᏯ ᎲᎢᎴᎣ, ᎤᏁᎸᏓᏁᎥᎲ ᏠᎦᏔᎠ-
ᎾᏯᎪ.

14 ᏕᎠ ᎤᏙᏣᎸᎥ ᎤᎠᏕᎸ ᏱᏢᏬᎯ-
ᎠᏴ, ᏕᎠ ᏔᏍᏓ ᎤᎡᎲᎦᏴ, ᎤᎥᎵᎳᎧᏍ
ᎢᎡᏴ ᎤᏝᎥᎩᏬ ᏕᎠ ᏍᎦᎠᎡᏘ; ᏕᎠ
ᏔᏝᎦᎵᎬᎠᏴ ᎤᎥᎴᏍ ᏎᎦᏯᎠᎬ ᎢᎴ-
ᎡᏘ, ᎾᏍᎩ ᏎᎦᏯᎠᎬ ᎢᎴ ᎣᏍᏇᎵᏈ
ᎤᏩᎶᎦᎬ ᎤᏍᎵᎦᎦ ᎤᎥᎵᎳ ᎾᏍᎩᏯ
ᎢᎴᎩ.

15 ᏣᏂ ᎤᏙᏣᎸᎨᏴ ᎾᏍᎩ Ꭶ[ᎤᏙᏣᎸᎥ,]
ᏕᎠ ᎤᎣᎹᎤᏴ ᎠᏗ ᎤᎱᎡᏱ; ᎠᏗ
ᎾᏍᎩ ᎲᎢᏞᎳᎦᏴ, ᎠᏗ ᎲᎲᎮᏍ-
ᏯᎡᏴ, ᏓᎲ ᏠᏕᎶᏘ ᏔᎡᎠ ᏓᏍᏓᏜ,
ᎾᏍᎩᎦᏗᏌ ᎡᎠᎥ ᏓᏈ ᎲᎨᎣ ᎢᎴᎡᏴ.

16 ᏕᎠ ᎾᏍᎩ ᎤᎠᎵᎳᎧ ᎢᎴ ᎲᎵᎪ
ᎡᏴᎦᎣ, ᎡᎦᏝᎦᏨᏃ ᎤᏝᎥᎳᏯ
ᎢᎴ ᎤᏍᎦᎶᏒᎬ ᎡᏴᎦᎪ.

17 ᏦᏒᎦᏌᏬᎳᏈᏃ ᏳᎦ ᎡᎮᎢᎴ
ᏔᎦᎳᎦᎦ ᎢᎴᎡᏴ, ᎤᎥᎵᎦᎬᎠᏴᎲ
ᏕᎠ ᏍᎦᎠᎡᏘ ᎲᎤᏴ ᏎᎦᎶᎵ ᎲᎲᏬᎵ-
ᎠᏯᏊᏬᎯ.

18 ᎢᎵ ᎤᎦ ᏔᎥᎠᎬ ᏎᎦᎶᎠᎢᎨ ᎤᏁᎸ-
ᏬᎯ; ᎤᏩᎶᎦᎬ ᎤᏍᎵᎦᎦ ᎤᏬᎴᏈ,
ᏗᏍᎵᎾᏈᎮ ᏎᎲᎮᏘ ᎡᎠᎢ, ᎾᏍᎩ ᎡᎮᏴᎢᎴ
ᏔᎦᎵᎦ.

19 ᏕᎠ ᎾᏍᎩ ᎠᏗ ᏣᏂ ᎤᏣᎵᎦᎦ,
ᎾᎦᎬ ᏗᎵᏝᎦ ᏲᎽᎵᏈᎲ ᎥᏒᎲᎤᎴ
ᏗᎢᏊ-ᏓᎵᎦᎠ ᏕᎠ ᏗᎵᏴᎣ ᎡᎦᎦᏓ-
ᎵᎪ, ᎠᏗ ᏔᎦᎲᎥᎳᎪ; ᏎᏆ ᎲᎠ?

20 ᏕᎠ ᎣᏓᏃᎤᏴ, ᏕᎠ ᎢᎵ ᎬᏝᏎᎢᏘ,
ᎣᏓᏃᎠᏯᎥᎲ ᎠᏗ ᎤᎱᎡᏱ; ᎢᎵ ᏗᏈ
ᏎᎦᎶᎠ ᎥᏴ.

Figure 3. The beginning of the Gospel of John (ᏣᏂ *Tsani*) published in 1860 in Cherokee, showing capital letters in use throughout at the beginnings of sentences and personal and place names. (Red highlighting has been added.)

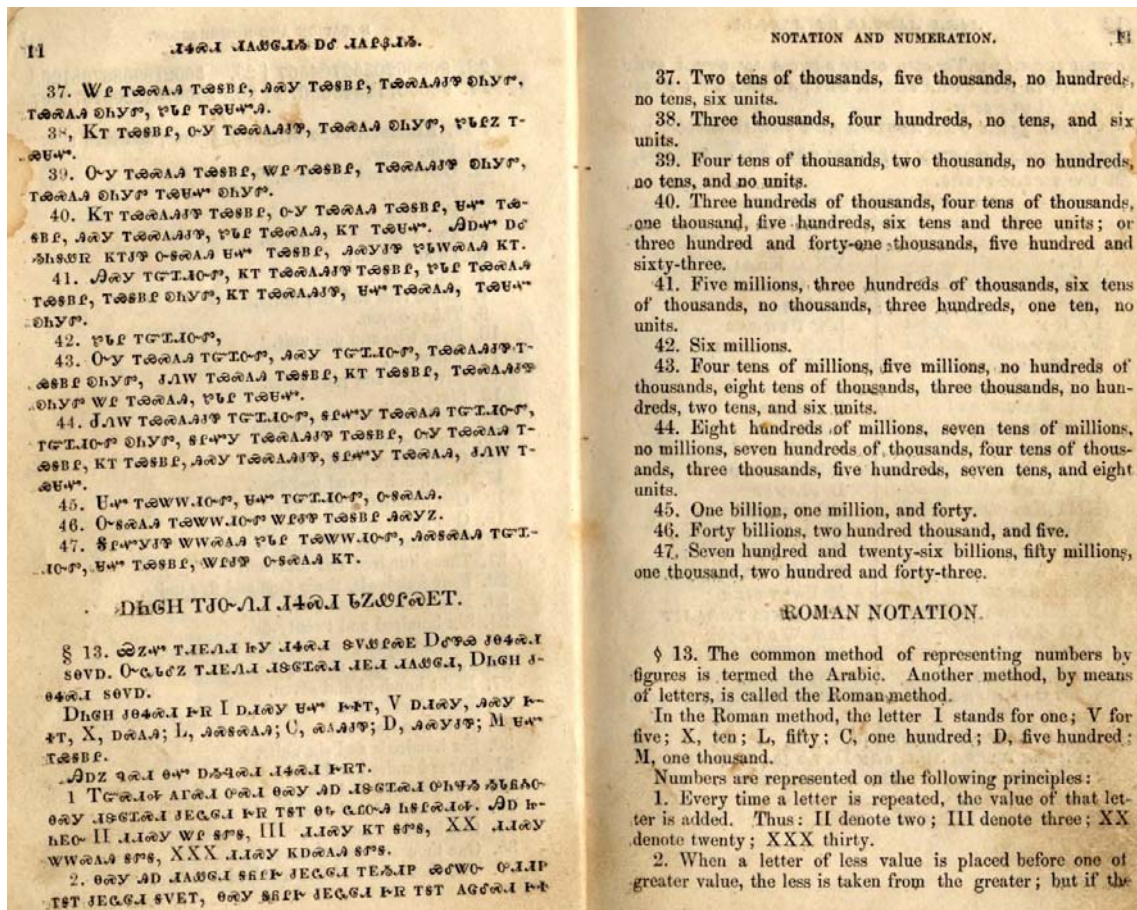**Figure 4.** Photo of part of the 1860 Cherokee New Testament.

Figure 5. From John B. Jones' *Elementary Arithmetic in Cherokee and English*, 1870, showing capital letters in use throughout at the beginnings of sentences. In the section on Roman Notation, The Roman method is called Dʰɢʜ *Anilomi* ('people of Lomi' = Rome) and the Arabic DᏸᏒᏬ *Aleqwiya* (which transliterates *Arabia*).
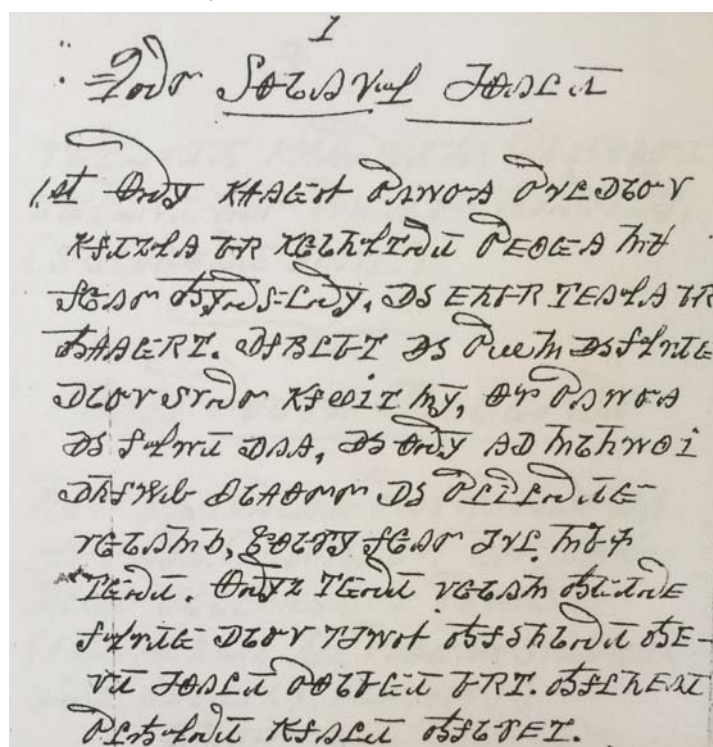
Figure 6. Sample of 19th-century handwriting in which ascenders and a few descenders can be seen.

Oᵒ Ꭷ Ꭷ Ꮯ   ᎢᎬᎠ ᏗᎫᎦᎠ ᎢᎬᎠᎠ ᏓᎢᎢᎠ AᏍᎧ ᎠᏍᎤ ᎠᏐᏜᎥᎠ.

ᎦᏂᎠᎢ DᎠᎧ KᎥᏫᎤᎩ,   ᎾᏜᎩ AᏍᎧ ᎠᏍᎤ ᎠᏐᏜᎥᎠ 271 AᏍᎧ ᎦᏐᎠᎠ AᏫᎤ ᎠᎻᎤᎠᎠᎠ, $56.75, ᎤᏔᎾᎢᏇ ᎠᎠᎤᎤᏯ ᎤᎵᏏᏓ ᎢᏅᏯᏛ 8, 1879, AᏍᎧ ᎤᎥᏇᎤ ᎢᏅᏯᏛ 9, 1879, ᎢᎬᎠ ᏗᎫᎦᎠ ᎢᎬᎠᎠᏍ ᎻᏍᎧᎤᏛ.

    ᎦᏛ ᎥᏣᏌᎾ, ᎤᎥᏍᎡ 16, 1881.

                ᏧᏳᏯᏫᎤᏯ,
                    DᎩᎬᎤᎬᏗᎠ.

                ——

Oᵒ Ꭷ Ꭷ Ꮯ   ᎠᏍᎤ ᎠᎠᎤᎤᏯ ᎠᏍᎪᎠᎤᎠᏯ ᎠᎠᎤᎠ ᎤᎥᎠᎠ.

    ᎦᏂᎠᎢ DᎠᎧ KᎥᏫᎤᎩ,   ᎾᏜᎩ ᏭᏭᎠᎠ ᎦᎧᎥᏴᎩ ᎠᏍᎤᎠ KᎩᎤᎴᎠᏗ (%27.75) ᎠᎠᏭᎤᎠ ᎥᏓᏜᎠ ᎠᎡᎥᎬᏓᎤᏯ ᎻᏍᎢ ᎠᏍᎤ ᎠᎻᎤ DᎠᎧ ᎠᎠᎠ, ᎤᏣᎤᎶ ᎤᎡᎬᎢ ᎠᎠᏭᎤᎠ ᎻᎥᎡᎾ ᎥᎡ, ᎾᏜᎩ ᎠᎠᎤᎠ ᎤᎥᎠᎠ ᎠᎤ ᎤᎥᎠᏣᎠᏗᎠᎠ ᎠᏍᎪᎠᎤᎠᏯ ᎠᏍᎤᎤᎠᎠᏳᎠᏗ ᎤᎥᏅᎡᎢ, ᎠᎤ OᵒᎬᎤᎬᏗᎠ ᎠᎤᎥᎠᏗ ᎥᎡᎥᎤᎠ AᏍᎧ ᎠᏍᎤ ᎠᏐᏜᎥᎠ ᎾᏜᎩ ᎤᎡᎬᎢ ᎢᎬᎠ ᎠᎫᎦᎠ ᎠᎠᎡᎻ.

    ᎦᏛ ᎥᏣᏌᎾ, ᎤᎥᏍᎡ 22, 1881.

                ᏧᏳᏯᏫᎤᏯ,
                    DᎩᎬᎤᎬᏗᎠ.

18   ACT AMENDING AN ACT.

AN ACT to make a certain warrant preferred.

    Be it enacted by the National Council,   That warrant No. 271, issued to Dr. L. M. Cravens for $56.75, under an appropriation dated December 8th, 1879, issued December 9th, 1879. be and the same is hereby made a preferred warrant.

    Approved November 16th, 1881,

                D. W. BUSHYHEAD,
                    Principal Chief.

                ——

AN ACT making appropriation for the Auditor's Office.

    Be it enacted by the National Council,   That the sum of twenty-seven dollars and seventy-five cents (27.75), be and the same is hereby appropriated out of any money in the Treasury belonging to the general fund, not otherwise appropriated, for the use and benefit of the Auditor's Office, and the Chief is hereby authorized to draw a preferred warrant for the same.

    Approved November 22d, 1881,

                D. W. BUSHYHEAD,
                    Principal Chief.

Figure 7. Cherokee and English acts, from *Laws and Joint Resolutions of the Cherokee Nation, enacted during the Regular and Special Sessions of the years 1881–2–3* (Tahlequah: E. C. Boudinot, 1884; Wilmington: Scholarly Resources, 1975). Capital letters can be seen in the Cherokee text. (Red highlighting has been added.)
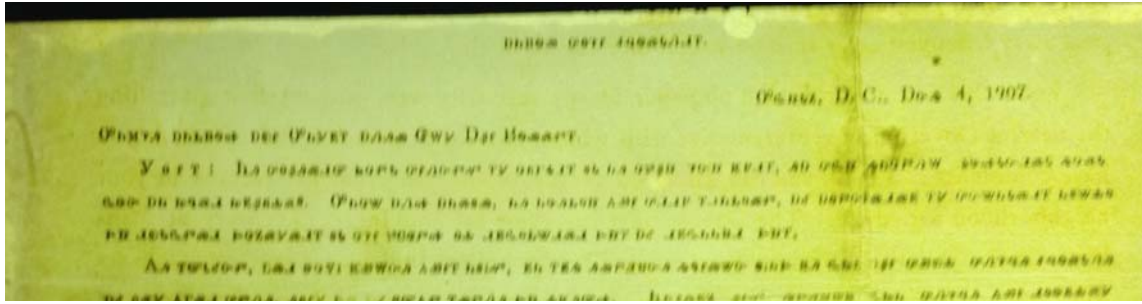
Figure 8. A warning from the Commissioner of Indian Affairs (Washington, D.C., 1907-03-04), concerning land fraud, showing the use of capital letters.
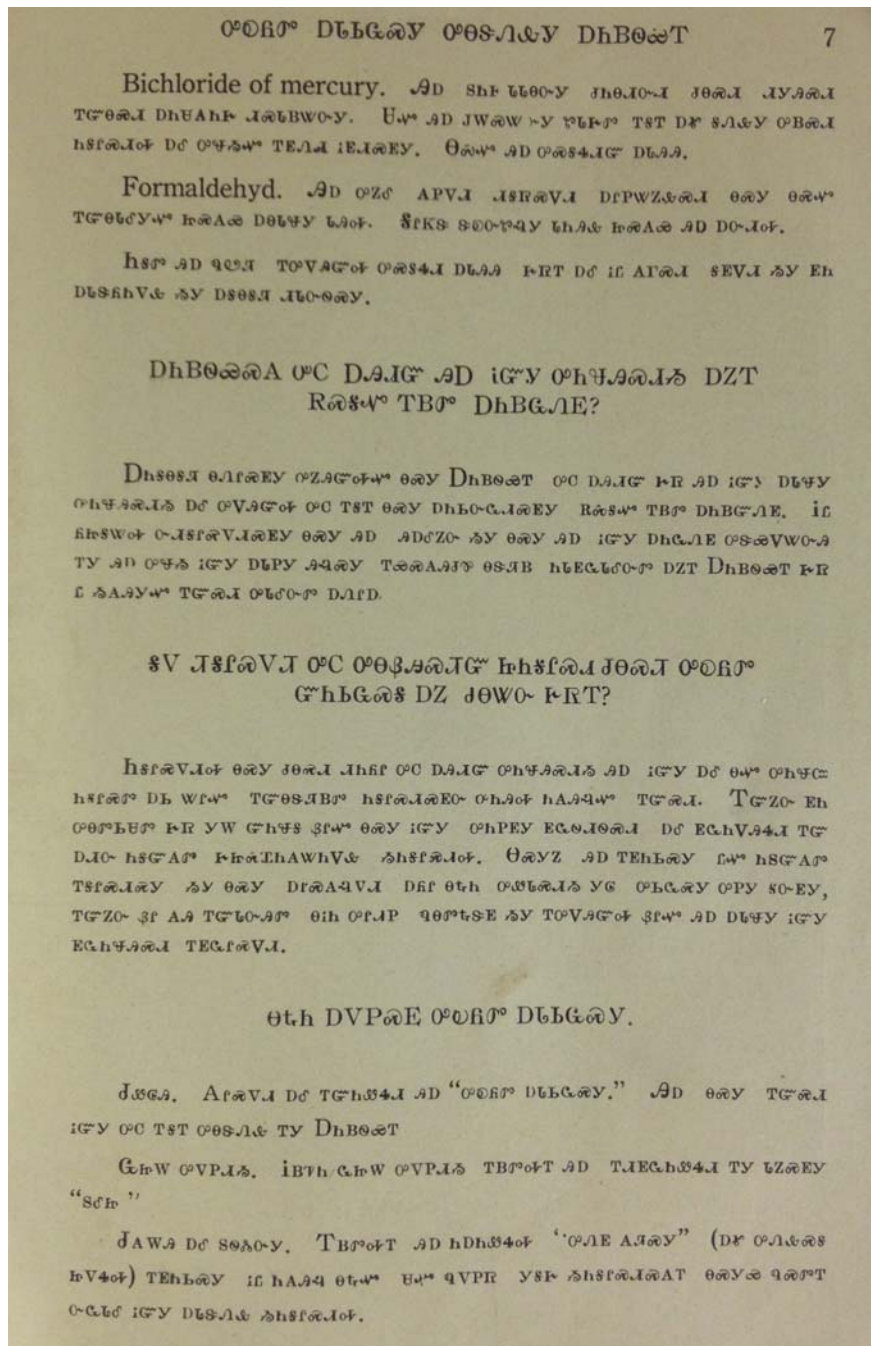

Figure 9. From a Cherokee health pamphlet, dated 1918, in which capital letters are used.

ᏴᏍᎳᎮᏙᎠ ᏞᏍᏏ ᎤᏟᏛᏔᎠ ᎤᏙᎠᏫᏙᎵ

ᎠᏖᏴᏴ �确Ꮢ, ᏔᎾᏔ ᎠᏔᎷ ᏚᏩ. ᎤᎾᏎ ᎤᏃᏴᎬ ᎤᏍᏴᏙ. "ᏚᎵ
ᏗᏒᎦᎠᏎ ᎤᎾᏎᎠ ᏚᏃᏴᏎ?", ᎤᏩᏔᎷ. ᎲᎬ ᎤᏪᏔ ᎤᏃᏴᏴ. ᎤᎠᏂ ᏞᏍᏏ
ᎠᏂᎱᎲ ᎤᎤᏔ.

ᎤᏓᏔᏂ ᏍᏙᏃᏴᎠᎬ ᏞᏍᏏ. ᏚᏮ ᎤᏩᏔᎲᏂᎢᏞ ᏐᏔᏎᏒ ᏍᏙᏃᏴᎬ.
"ᏞᏍᏏ, ᏚᎵ ᎬᏴᎧ ᎤᎾᏎᎠ ᏚᏃᏴᏴ?", ᎤᏞᎹᎱ ᏚᏮ. "ᎤᎥᎶᎧᎠ
ᎬᏴᏎᎤ ᎧᏗ ᎠᏙᏓᎠᎠᏗ", ᎤᎤᎳ ᏞᏍᏏ. ᎤᎥᏴᏂᎠᏗ ᎤᏫᎦᎵ ᏚᏮ. "Ꮮ",
ᎤᎤᎳ ᏞᏍᏏ, ᎠᏔᏃ ᏚᏮ ᎤᏩᏛᏴᎢᎳ. "ᎮᎦ", ᎤᎤᎳ ᏞᏍᏏ, ᎤᏚᎦ
ᎠᏙᏓᎠᎠᏗ. ᏚᏮ ᎤᎾᎥᏙᎳ ᎤᏍᏗ ᏞᏍᏏ.

ᏞᏍᏏ ᎤᎵᏍᎾ ᏚᏮ ᏍᏙᏃᏴᎠᏂᎬ, ᎤᎵᏴᏔᎷ ᏂᏥᏛ ᎤᏃᏴᎬ. "ᏃᏩ
ᎮᎠᏴᎷᏏ ᎠᏙᏓᎠᎠᏗ", ᎤᎤᎳ ᏞᏍᏏ. ᎠᏔᏃ ᎧᏗ ᏁᏥᏔ ᏚᏮ, "Ꮟ,
ᏗᎬᏃ ᎬᎤᎵᏍᎲ ᎮᏴ ᏛᏪ. ᏮᎵ ᏍᏴᏆᏍ ᏃᏕᎶ ᎮᎲᎮᎤ, ᎤᏟ ᎬᎾᏎᎠ
ᎾᎩ ᎤᏃᏴᎬ." "Ꮮ ᏮᎢᎤᏫ, ᏃᏯᎮᏴ ᎮᎠᏴᎷᏏ ᎠᏙᏓᎠᎠᏗ!" ᎤᏩᏙᎯ
ᏞᏍᏏ. ᏏᏩ ᎤᎤᎠᎬᎩ ᏞᏍᏏ ᎠᏗ ᎤᏏᎤᎠᏗ ᏚᏮ. ᏞᏍᏏ ᎤᎤᎴᎿ ᎤᏂ
ᎲᎤ ᎤᎤᎠᎬᏗ, ᎤᏏ ᎤᏰᎵᎳ ᏚᏮ.

ᎤᏃᏴᎠᏗ ᎤᎵᏍᎾ ᏞᏍᏏ ᏍᏛᎾᏆᎦ ᎤᎠᏗ ᎤᎾᏎ ᎤᏃᏴᎬ. "ᏚᎦ,
ᎮᎠᏴᎷᏏᏂ ᎠᏙᏓᎠᎠᏗ", ᎠᏯᎦᏆᏆ ᏞᏍᏏ. ᏚᏮ ᏗᎤᏂᏘ, "Ꮟ, ᏛᏕᏍ
ᏛᎢᎵᏍᎾ ᎤᎾᏎ ᎤᏃᏴᎬ Ꮮ ᏮᎢᎤᏛ ᎤᏔ ᏗᏍᎦᎠᎢᏘ. ᎤᎾᎤᎵᏇ ᎤᏔᏓᎹ
ᎤᎮᎷᎩ ᏃᏩ ᎠᎹᎳᎤᏞ. ᎤᎤᎠ ᏔᏍ ᏃᏴᏔᎵ ᎤᏃᏴᎬᏔ. ᎮᎵᎵ ᎠᏙᏓᎠᎠᏗ
ᏔᎵᏍᎤ ᎤᏃᏴᎬ", ᎤᎢᎳ ᏚᏮ. ᎤᏏ ᎤᏰᎵᎳ ᏞᏍᏏ.

ᏚᏮ ᎤᎾᏂᎵᏇ ᏍᏍᎦᏛ ᎤᏓᏔ ᏍᏙᏓᎠᏂᎬᏔ. "ᎤᎤᎠ ᎬᎤᎴ ᎤᏃᏴᏎ
ᏃᏰᏃ ᎾᏴ ᎤᏔ ᏗᏍᎦᎠᎢᏘ!" ᎤᎤᎳ ᏞᏍᏏ. "ᏚᎦ ᏚᏮ, ᎮᎠᏴᎷᏏ
ᏛᏔᏞᏒ ᎠᏙᏓᎠᎠᏗ!" ᎤᏩᏙᎯ ᏞᏍᏏ. Ꮮ ᏍᏓᎠᏴ ᏚᏮ. "ᏚᏮ! ᏚᏮ! ᏚᎵ
ᏛᏔᏞᏒ ᎠᏙᏓᎠᎠᏗ! ᎮᎠᏴᎷᏏ!", ᎡᎾᏍ ᎤᏰᎵ ᏃᏴᏔ ᏞᏍᏏ. ᏏᏩ Ꮮ
ᏍᏗᏍᎠᏞ ᏚᏮ. ᏞᏍᏏ ᏍᏍᎦᏞ ᎤᎾᏂᎵᏇ, ᎤᎲᎩᏮ ᏈᎤ ᏚᏮ. ᏞᏍᏏ
ᎤᏞᎤᏞᏞ, "ᏍᏫ ᏍᎱᏍ? ᏚᎮᎦᏒ ᎤᎥᎶᎧᎠ ᏗᏴᎠᏆ ᏍᏞᎲ. Ꮮ ᏔᏫᎠᎬ
ᏎᏴᏍᎮᏃᏴᎠᏞ ᏪᎵᎠᏘ."

ᏞᏍᏏ ᎠᏒᎳᎠᏂᎠᎮ ᎬᎶᏴᎠᏗ ᏍᏴ Ꮲ ᏍᏙᎠᎠᎬ ᏚᏮ. ᎠᏖᏴ ᏐᏴ
ᏍᎦᏒᎾ ᏚᏮ ᏍᏙᏓᎠᎬᎬ, ᏍᎦᏍᏕᏃᏫ ᏞᏍᏏ ᏍᎠᏓᏫ ᎤᏔ ᏍᎠ
ᎤᏍᎦᎬᎬ, ᎠᏙᏓᎠᎠᏗ ᎤᏃᏪᏔ.

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Figure 10. A story from the Second-Grade Cherokee school curriculum (*Language Arts and Reading Comprehension*, 2008), showing capital letters in use throughout at the beginnings of sentences and personal and place names.

	13A	13B	13C	13D	13E	13F
0	D 13A0	Ᏸ 13B0	G 13C0	Ᏼ 13D0	Ꮰ 13E0	ß 13F0
1	R 13A1	Γ 13B1	Ꮱ 13C1	Ꮽ 13D1	Ꮱ 13E1	Ꮱ 13F1
2	T 13A2	Ꮲ 13B2	ħ 13C2	R 13D2	P 13E2	Ᏺ 13F2
3	Ꭳ 13A3	W 13B3	Z 13C3	Ᏽ 13D3	Ꮹ 13E3	Gᵂ 13F3
4	Oʾ 13A4	ᏽ 13B4	Ꮅ 13C4	W 13D4	V 13E4	B 13F4
5	i 13A5	Ꮢ 13B5	Oʾ 13C5	S 13D5	Ꮳ 13E5	G 13F5
6	Ꮚ 13A6	Ꮆ 13B6	ℐ 13C6	Ꮴ 13D6	K 13E6	▨
7	Ꭷ 13A7	M 13B7	Ꮗ 13C7	Ꮷ 13D7	�Ꭰ 13E7	▨
8	Ᏸ 13A8	Ꮊ 13B8	Ꮟ 13C8	Ꭸ 13D8	Cᵂ 13E8	ß 13F8
9	Y 13A9	Ꮙ 13B9	Ꮴ 13C9	V 13D9	G 13E9	Ꮱ 13F9
A	A 13AA	Ꮋ 13BA	Ꮒ 13CA	S 13DA	Ꮆ 13EA	Ᏺ 13FA
B	J 13AB	H 13BB	Ɛ 13CB	Ꮥ 13DB	Ꮎ 13EB	Gᵂ 13FB
C	E 13AC	Ꮳ 13BC	Ᏻ 13CC	Ꮯ 13DC	Ꮕ 13EC	B 13FC
D	Ꮷ 13AD	Ꮍ 13BD	Ꮹ 13CD	Ꮭ 13DD	Ꮙ 13ED	G 13FD
E	Ꮲ 13AE	Θ 13BE	Ꮞ 13CE	L 13DE	6 13EE	▨
F	Ꭺ 13AF	Ꮷ 13BF	Ᏼ 13CF	C 13DF	Ꮗ 13EF	▨

Most lower-case Cherokee syllables are encoded at U+AB70-ABBF.

Upper-case syllables

13A0	Ꭰ	CHEROKEE LETTER A
13A1	Ꭱ	CHEROKEE LETTER E
13A2	Ꭲ	CHEROKEE LETTER I
13A3	Ꭳ	CHEROKEE LETTER O
13A4	Ꭴ	CHEROKEE LETTER U
13A5	Ꭵ	CHEROKEE LETTER V
13A6	Ꭶ	CHEROKEE LETTER GA
13A7	Ꭷ	CHEROKEE LETTER KA
13A8	Ꭸ	CHEROKEE LETTER GE
13A9	Ꭹ	CHEROKEE LETTER GI
13AA	Ꭺ	CHEROKEE LETTER GO
13AB	Ꭻ	CHEROKEE LETTER GU
13AC	Ꭼ	CHEROKEE LETTER GV
13AD	Ꭽ	CHEROKEE LETTER HA
13AE	Ꭾ	CHEROKEE LETTER HE
13AF	Ꭿ	CHEROKEE LETTER HI
13B0	Ꮀ	CHEROKEE LETTER HO
13B1	Ꮁ	CHEROKEE LETTER HU
13B2	Ꮂ	CHEROKEE LETTER HV
13B3	Ꮃ	CHEROKEE LETTER LA
13B4	Ꮄ	CHEROKEE LETTER LE
13B5	Ꮅ	CHEROKEE LETTER LI
13B6	Ꮆ	CHEROKEE LETTER LO
13B7	Ꮇ	CHEROKEE LETTER LU
13B8	Ꮈ	CHEROKEE LETTER LV
13B9	Ꮉ	CHEROKEE LETTER MA
13BA	Ꮊ	CHEROKEE LETTER ME
13BB	Ꮋ	CHEROKEE LETTER MI
13BC	Ꮌ	CHEROKEE LETTER MO
13BD	Ꮍ	CHEROKEE LETTER MU
13BE	Ꮎ	CHEROKEE LETTER NA
13BF	Ꮏ	CHEROKEE LETTER HNA
13C0	Ꮐ	CHEROKEE LETTER NAH
13C1	Ꮑ	CHEROKEE LETTER NE
13C2	Ꮒ	CHEROKEE LETTER NI
13C3	Ꮓ	CHEROKEE LETTER NO
13C4	Ꮔ	CHEROKEE LETTER NU
13C5	Ꮕ	CHEROKEE LETTER NV
13C6	Ꮖ	CHEROKEE LETTER QUA
13C7	Ꮗ	CHEROKEE LETTER QUE
13C8	Ꮘ	CHEROKEE LETTER QUI
13C9	Ꮙ	CHEROKEE LETTER QUO
13CA	Ꮚ	CHEROKEE LETTER QUU
13CB	Ꮛ	CHEROKEE LETTER QUV
13CC	Ꮜ	CHEROKEE LETTER SA
13CD	Ꮝ	CHEROKEE LETTER S
13CE	Ꮞ	CHEROKEE LETTER SE
13CF	Ꮟ	CHEROKEE LETTER SI
13D0	Ꮠ	CHEROKEE LETTER SO
13D1	Ꮡ	CHEROKEE LETTER SU
13D2	Ꮢ	CHEROKEE LETTER SV
13D3	Ꮣ	CHEROKEE LETTER DA
13D4	Ꮤ	CHEROKEE LETTER TA
13D5	Ꮥ	CHEROKEE LETTER DE
13D6	Ꮦ	CHEROKEE LETTER TE
13D7	Ꮧ	CHEROKEE LETTER DI
13D8	Ꮨ	CHEROKEE LETTER TI
13D9	Ꮩ	CHEROKEE LETTER DO
13DA	Ꮪ	CHEROKEE LETTER DU
13DB	Ꮫ	CHEROKEE LETTER DV
13DC	Ꮬ	CHEROKEE LETTER DLA
13DD	Ꮭ	CHEROKEE LETTER TLA
13DE	Ꮮ	CHEROKEE LETTER TLE
13DF	Ꮯ	CHEROKEE LETTER TLI
13E0	Ꮰ	CHEROKEE LETTER TLO
13E1	Ꮱ	CHEROKEE LETTER TLU
13E2	Ꮲ	CHEROKEE LETTER TLV
13E3	Ꮳ	CHEROKEE LETTER TSA
13E4	Ꮴ	CHEROKEE LETTER TSE
13E5	Ꮵ	CHEROKEE LETTER TSI
13E6	Ꮶ	CHEROKEE LETTER TSO
13E7	Ꮷ	CHEROKEE LETTER TSU
13E8	Ꮸ	CHEROKEE LETTER TSV
13E9	Ꮹ	CHEROKEE LETTER WA
13EA	Ꮺ	CHEROKEE LETTER WE
13EB	Ꮻ	CHEROKEE LETTER WI
13EC	Ꮼ	CHEROKEE LETTER WO
13ED	Ꮽ	CHEROKEE LETTER WU
13EE	Ꮾ	CHEROKEE LETTER WV
13EF	Ꮿ	CHEROKEE LETTER YA
13F0	Ᏸ	CHEROKEE LETTER YE
13F1	Ᏹ	CHEROKEE LETTER YI
13F2	Ᏺ	CHEROKEE LETTER YO
13F3	Ᏻ	CHEROKEE LETTER YU
13F4	Ᏼ	CHEROKEE LETTER YV

Archaic upper-case syllable

13F5	Ᏽ	CHEROKEE LETTER MV

Lower-case syllables

13F8	ᏸ	CHEROKEE SMALL LETTER YE
13F9	ᏹ	CHEROKEE SMALL LETTER YI
13FA	ᏺ	CHEROKEE SMALL LETTER YO
13FB	ᏻ	CHEROKEE SMALL LETTER YU
13FC	ᏼ	CHEROKEE SMALL LETTER YV

Archaic lower-case syllable

13FD	ᏽ	CHEROKEE SMALL LETTER MV

	AB7	AB8	AB9	ABA	ABB
0	D AB70	Ⱶ AB80	Ꮆ AB90	�凡 ABA0	ꮰ ABB0
1	R AB71	Ꮁ AB81	Ꭿ AB91	ꭡ ABA1	ꮱ ABB1
2	T AB72	Ꮳ AB82	h AB92	R ABA2	P ABB2
3	ꭳ AB73	W AB83	Z AB93	ꭣ ABA3	Ꮐ ABB3
4	Ꮻ AB74	ꭄ AB84	Ꝗ AB94	W ABA4	Ʋ ABB4
5	i AB75	ꭅ AB85	Ꮻ AB95	S ABA5	Ᏺ ABB5
6	Ꮪ AB76	Ꮐ AB86	Ꮮ AB96	Ꮧ ABA6	k ABB6
7	ꭷ AB77	M AB87	ꭗ AB97	ꭧ ABA7	d ABB7
8	Ᏼ AB78	ꭈ AB88	ꭘ AB98	Ꭻ ABA8	Cᵂ ABB8
9	Y AB79	ꭉ AB89	ꭙ AB99	V ABA9	G ABB9
A	A AB7A	ꭊ AB8A	ꭚ AB9A	S ABAA	ꮺ ABBA
B	J AB7B	H AB8B	Ɛ AB9B	꭫ ABAB	ꮻ ABBB
C	E AB7C	Ꮾ AB8C	Ᏺ AB9C	꭬ ABAC	ꮼ ABBC
D	ꭽ AB7D	ꭍ AB8D	ꭝ AB9D	Ꮑ ABAD	ꮽ ABBD
E	ꭾ AB7E	Ө AB8E	4 AB9E	Ꮜ ABAE	6 ABBE
F	ꭿ AB7F	ꮇ AB8F	ꮏ AB9F	C ABAF	ꮿ ABBF

The upper-case Cherokee syllables are encoded at U+13A0-13FF. Lower-case ye, yi, yo, yu, yv, and mv are encoded in that same block.

Lower-case syllables

AB70	D	CHEROKEE SMALL LETTER A
AB71	R	CHEROKEE SMALL LETTER E
AB72	T	CHEROKEE SMALL LETTER I
AB73	ꭳ	CHEROKEE SMALL LETTER O
AB74	ꭴ	CHEROKEE SMALL LETTER U
AB75	ꭵ	CHEROKEE SMALL LETTER V
AB76	S	CHEROKEE SMALL LETTER GA
AB77	ꭷ	CHEROKEE SMALL LETTER KA
AB78	Ᏺ	CHEROKEE SMALL LETTER GE
AB79	y	CHEROKEE SMALL LETTER GI
AB7A	A	CHEROKEE SMALL LETTER GO
AB7B	J	CHEROKEE SMALL LETTER GU
AB7C	E	CHEROKEE SMALL LETTER GV
AB7D	ꭽ	CHEROKEE SMALL LETTER HA
AB7E	ꭾ	CHEROKEE SMALL LETTER HE
AB7F	ꭿ	CHEROKEE SMALL LETTER HI
AB80	Ᏺ	CHEROKEE SMALL LETTER HO
AB81	Γ	CHEROKEE SMALL LETTER HU
AB82	ꮂ	CHEROKEE SMALL LETTER HV
AB83	W	CHEROKEE SMALL LETTER LA
AB84	ꮄ	CHEROKEE SMALL LETTER LE
AB85	ꮅ	CHEROKEE SMALL LETTER LI
AB86	G	CHEROKEE SMALL LETTER LO
AB87	M	CHEROKEE SMALL LETTER LU
AB88	ꮈ	CHEROKEE SMALL LETTER LV
AB89	ꮉ	CHEROKEE SMALL LETTER MA
AB8A	ꮊ	CHEROKEE SMALL LETTER ME
AB8B	H	CHEROKEE SMALL LETTER MI
AB8C	ꮌ	CHEROKEE SMALL LETTER MO
AB8D	y	CHEROKEE SMALL LETTER MU
AB8E	Θ	CHEROKEE SMALL LETTER NA
AB8F	ꮏ	CHEROKEE SMALL LETTER HNA
AB90	G	CHEROKEE SMALL LETTER NAH
AB91	Λ	CHEROKEE SMALL LETTER NE
AB92	h	CHEROKEE SMALL LETTER NI
AB93	Z	CHEROKEE SMALL LETTER NO
AB94	ꮔ	CHEROKEE SMALL LETTER NU
AB95	ꮕ	CHEROKEE SMALL LETTER NV
AB96	ꮖ	CHEROKEE SMALL LETTER QUA
AB97	ꮗ	CHEROKEE SMALL LETTER QUE
AB98	ꮘ	CHEROKEE SMALL LETTER QUI
AB99	ꮙ	CHEROKEE SMALL LETTER QUO
AB9A	ꮚ	CHEROKEE SMALL LETTER QUU
AB9B	ꮛ	CHEROKEE SMALL LETTER QUV
AB9C	ꮜ	CHEROKEE SMALL LETTER SA
AB9D	ꮝ	CHEROKEE SMALL LETTER S
AB9E	ꮞ	CHEROKEE SMALL LETTER SE
AB9F	ꮟ	CHEROKEE SMALL LETTER SI
ABA0	ꮠ	CHEROKEE SMALL LETTER SO
ABA1	ꮡ	CHEROKEE SMALL LETTER SU
ABA2	R	CHEROKEE SMALL LETTER SV
ABA3	ꮣ	CHEROKEE SMALL LETTER DA
ABA4	W	CHEROKEE SMALL LETTER TA
ABA5	S	CHEROKEE SMALL LETTER DE
ABA6	ꮦ	CHEROKEE SMALL LETTER TE
ABA7	ꮧ	CHEROKEE SMALL LETTER DI
ABA8	ꮨ	CHEROKEE SMALL LETTER TI
ABA9	V	CHEROKEE SMALL LETTER DO
ABAA	S	CHEROKEE SMALL LETTER DU
ABAB	ꮫ	CHEROKEE SMALL LETTER DV
ABAC	ꮬ	CHEROKEE SMALL LETTER DLA
ABAD	ꮭ	CHEROKEE SMALL LETTER TLA
ABAE	L	CHEROKEE SMALL LETTER TLE
ABAF	C	CHEROKEE SMALL LETTER TLI
ABB0	ꮰ	CHEROKEE SMALL LETTER TLO
ABB1	ꮱ	CHEROKEE SMALL LETTER TLU
ABB2	P	CHEROKEE SMALL LETTER TLV
ABB3	G	CHEROKEE SMALL LETTER TSA
ABB4	V	CHEROKEE SMALL LETTER TSE
ABB5	ꮵ	CHEROKEE SMALL LETTER TSI
ABB6	k	CHEROKEE SMALL LETTER TSO
ABB7	ꮷ	CHEROKEE SMALL LETTER TSU
ABB8	C	CHEROKEE SMALL LETTER TSV
ABB9	G	CHEROKEE SMALL LETTER WA
ABBA	ꮺ	CHEROKEE SMALL LETTER WE
ABBB	ꮻ	CHEROKEE SMALL LETTER WI
ABBC	ꮼ	CHEROKEE SMALL LETTER WO
ABBD	ꮽ	CHEROKEE SMALL LETTER WU
ABBE	ꮾ	CHEROKEE SMALL LETTER WV
ABBF	ꮿ	CHEROKEE SMALL LETTER YA

A. Administrative

1. Title
Revised proposal for the addition of Cherokee characters to the UCS
2. Requester's name
Michael Everson, Durbin Feeling
3. Requester type (Member body/Liaison/Individual contribution)
Individual contribution.
4. Submission date
2014-02-22
5. Requester's reference (if applicable)
6. Choose one of the following:
6a. This is a complete proposal
Yes.
6b. More information will be provided later
No.

B. Technical – General

1. Choose one of the following:
1a. This proposal is for a new script (set of characters)
No.
1b. Proposed name of script
1c. The proposal is for addition of character(s) to an existing block
Yes
1d. Name of the existing block
Cherokee, and a new Cherokee Supplement block
2. Number of characters in proposal
87 (7, 80).
3. Proposed category (A-Contemporary; B.1-Specialized (small collection); B.2-Specialized (large collection); C-Major extinct; D-Attested extinct; E-Minor extinct; F-Archaic Hieroglyphic or Ideographic; G-Obscure or questionable usage symbols)
Category A.
4a. Is a repertoire including character names provided?
Yes.
4b. If YES, are the names in accordance with the "character naming guidelines" in Annex L of P&P document?
Yes.
4c. Are the character shapes attached in a legible form suitable for review?
Yes.
5a. Who will provide the appropriate computerized font (ordered preference: True Type, or PostScript format) for publishing the standard?
Michael Everson.
5b. If available now, identify source(s) for the font (include address, e-mail, ftp-site, etc.) and indicate the tools used:
Michael Everson, Fontographer.
6a. Are references (to other character sets, dictionaries, descriptive texts etc.) provided?
Yes.
6b. Are published examples of use (such as samples from newspapers, magazines, or other sources) of proposed characters attached?
Yes.
7. Does the proposal address other aspects of character data processing (if applicable) such as input, presentation, sorting, searching, indexing, transliteration etc. (if yes please enclose information)?
Yes.
8. Submitters are invited to provide any additional information about Properties of the proposed Character(s) or Script that will assist in correct understanding of and correct linguistic processing of the proposed character(s) or script. Examples of such properties are: Casing information, Numeric information, Currency information, Display behaviour information such as line breaks, widths etc., Combining behaviour, Spacing behaviour, Directional behaviour, Default Collation behaviour, relevance in Mark Up contexts, Compatibility equivalence and other Unicode normalization related information. See the Unicode standard at http://www.unicode.org for such information on other scripts. Also see Unicode Character Database http://www.unicode.org/Public/UNIDATA/ UnicodeCharacterDatabase.html and associated Unicode Technical Reports for information needed for consideration by the Unicode Technical Committee for inclusion in the Unicode Standard.
See above.

C. Technical – Justification

1. Has this proposal for addition of character(s) been submitted before? If YES, explain.
No.
2a. Has contact been made to members of the user community (for example: National Body, user groups of the script or characters, other experts, etc.)?
Yes.

2b. If YES, with whom?

Roy Boney, David Crawler, Durbin Feeling, Sarah Holcomb, Sherry Holcomb, John Ross, Anna Sixkiller, Dennis Sixkiller, Pauline Teehee, Candessa Tehee.

2c. If YES, available relevant documents

3. Information on the user community for the proposed characters (for example: size, demographics, information technology use, or publishing use) is included?

Cherokee speakers and writers.

4a. The context of use for the proposed characters (type of use; common or rare)

Used historically and in modern editions.

4b. Reference

5a. Are the proposed characters in current use by the user community?

Yes.

5b. If YES, where?

Various publications, though the use has been limited by the lack of availability of capital letters.

6a. After giving due considerations to the principles in the P&P document must the proposed characters be entirely in the BMP?

No.

6b. If YES, is a rationale provided?

6c. If YES, reference

7. Should the proposed characters be kept together in a contiguous range (rather than being scattered)?

No.

8a. Can any of the proposed characters be considered a presentation form of an existing character or character sequence?

No.

8b. If YES, is a rationale for its inclusion provided?

8c. If YES, reference

9a. Can any of the proposed characters be encoded using a composed character sequence of either existing characters or other proposed characters?

No.

9b. If YES, is a rationale for its inclusion provided?

No.

9c. If YES, reference

10a. Can any of the proposed character(s) be considered to be similar (in appearance or function) to an existing character?

No.

10b. If YES, is a rationale for its inclusion provided?

10c. If YES, reference

11a. Does the proposal include use of combining characters and/or use of composite sequences (see clauses 4.12 and 4.14 in ISO/IEC 10646-1: 2000)?

No.

11b. If YES, is a rationale for such use provided?

11c. If YES, reference

11d. Is a list of composite sequences and their corresponding glyph images (graphic symbols) provided?

No.

11e. If YES, reference

12a. Does the proposal contain characters with any special properties such as control function or similar semantics?

No.

12b. If YES, describe in detail (include attachment if necessary)

13a. Does the proposal contain any Ideographic compatibility character(s)?

No.

13b. If YES, is the equivalent corresponding unified ideographic character(s) identified?