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- 1. Introduction. At the time of contact with the earliest French explorers of the Mississippi Valley, Siouan languages were spoken in a broad belt stretching from the mouth of the Arkansas River north and westward across the western prairies and the great plains to the Black Hills. In addition, there were Siouan languages scattered in the East in what are now Virginia, Alabama, and Mississippi. The Siouan language family is distantly related to the extinct Catawban languages of the Carolinas.
- 2. The Siouan language family. The more than fifteen separate Siouan languages fall into several well-defined subgroups. Individual language names are italicized:

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Missouri River Siouan
            Crow
            Hidatsa
Mandan
Mississippi Valley Siouan
    Dakotan<sup>2</sup>
    Chiwere-Winnebago
            Ioway, Otoe, †Missouria
            Winnebago
    Dhegiha
            Omaha, Ponca
            †Kansa, Osage
            †Quapaw
Ohio Valley Siouan
            †Tutelo, †Saponi, †Moniton
            †Biloxi
            tOfo
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2.1. The Dhegiha subgroup. This sketch will concentrate on the Dhegiha subgroup of languages and in particular on the Quapaw language.<sup>3</sup> This subgroup includes the languages of five tribes: the

Omahas, Poncas, Kansas, Osages, and Quapaws. These five political groups had already been in existence for quite some time when first contacted in the late seventeenth and early eighteenth centuries by the French. Their languages remain quite similar, though, so that when it becomes difficult to analyze particular features of Quapaw due to the small corpus of texts that we have inherited, it is sometimes possible to obtain hints by triangulation from available data and analyses of the four cognate dialects, even though today they are not entirely mutually intelligible.

The Omahas and Poncas lived in what is now eastern Nebraska and speak virtually the same language. The Kansa (Kaw) tribe lived in northeastern Kansas, and their language was mutually intelligible with that of the Osages, who lived mostly in southwestern Missouri and adjacent areas. The Quapaws themselves lived in four or five villages near the mouth of the Arkansas River in what is now eastern Arkansas.<sup>4</sup>

Their language is very similar in most respects to the other four Dhegiha tongues despite Wolff's (1952) statement, based on an informant's impression, that "speakers of Osage consider Kansa completely intelligible, though somewhat 'faster' than Osage; Omaha and Ponca barely intelligible but containing a small percentage of 'Osage' words; Quapaw completely unintelligible and 'very different'." In vocabulary, phonology, grammar, and syntax all five languages—one might even say dialects—are very much alike.

Today, although there are still many Quapaws living in northeastern Oklahoma, the language is no longer spoken. The last truly fluent speakers died in the 1960s and early 1970s. There are, however, still several individuals with a knowledge of up to several hundred words. Grammatical knowledge necessary to form novel sentences and speak the language is wanting though, and thus it is known primarily through materials collected by the Bureau of American Ethnology (BAE) in the 1890s and from the small amount of field work that the author found possible in the early 1970s.

Quapaw was spoken on the northwestern periphery of the Southeast and can only marginally be considered to share salient features of the Southeastern Sprachbund. The southeastern areal features that Quapaw does possess are generally present in the other Dhegiha dialects as well.<sup>6</sup>

3. Quapaw text. Recorded by James Owen Dorsey (1890-94[no. 95a]) apparently from Alphonsus Valliere, the text is presented in a normalized Quapaw transcription modernized from Dorsey's orthography by the present author and based on a comparison of Dorsey's characters with the pronunciation of analogous words by the last generation of speakers.

The first line of each group is in surface phonemic transcription. The second line gives a more abstract, morphophonemic transcription with each morpheme normally in its underlying form. The third line attempts a morpheme by morpheme translation, while the fourth attempts to clarify what otherwise might be opaque derivations, e.g.,  $\delta \phi ke$ -a-knj 'dog-upon-sit' is replaced in line four by 'horse', the actual meaning of the expression. The fifth line gives a fluent English translation of the entire sentence. There are a number of two-part verbs (and one or two three-part verbs such as think) in Quapaw. The first part of such stems is marked simply as  $V_I$  in the glosses. Elsewhere in the sketch V often refers to any vowel. Siouanists will recognize some of the  $V_I$  portions of verb stems as lexicalized locative prefixes. Usage should be clear in context.

(1) mažá šikáži šótti toskíde íkeyáwe ni etí khe, mažá šiké-aži šó-tti to-skíde í-k-eye-awe ni e-tí khe, land bad-NEG yet-LOC potato-sweet V<sub>1</sub>-it-say-PL water DEM-LOC the.LYING war not yet sweet-potato they call it creek there the Before the (Civil) War we used to live on the west side of what they called

mióxpettadédedóši okní ókathá na. mi- o- xpe-ttadédedóši o- o-kní ók- athá na. sun-into-fall on that side 1d-in-sit 1d-STANDING.AN.CONT HAB west on that side we dwelt Sweet-Potato Creek.

(2) etí ománikka kdébnattá sattá akní eánaska aníhe má. e-tí ománikka kdébna-ttá sattá a-kní e-á-naska wa-ní-he wa-<sup>2</sup>á. DEM-LOC year 10-when 5 on-sit DEM-1PAT-size 1AGT-move.CONT 1AGT-do.IMPF there years fifteen of age I was I was fifteen years of age there. (3) etí jtáttežika šokeáknj enáhi attá anihétta, e-tí jtátte- žíka šoke-á-knj e- náhi a- ttá wa- nihé- tta, DEM-LOC father-little dog-on-sit DEM-alone 1PAT-have 1AGT-MOVINGwhen there stepfather horse only my having when I was There, (my) stepfather took away from me the only horse that

gkínj hidátta íkkikkákide thé. g-a-kí-nj hidé- atta í- kkik- káj- g- ki- de thé. 1PAT-DAT-have-go-and V<sub>1</sub>-RCP-trade-1PAT-BEN-CAUS NAR mine-he took away and traded (it) on me cause I possessed and traded it away on me.

(4) ettí hidé thená, šókeáknj wítta áknj attá de théna, e-ttí hi-dé the-ná, šóke-á-knj wí-tta á-knj attá de thé-na, DEM-TEMP leave NAR-PAST, dog-on-sit my-ALN on-sit and go NAR-PAST then (he) left horse my mount and go which did Then, he went off riding my horse, and

kdína šókeákni wax²ó xotté žihí aní kdi. ki-dí-na šóke-ákni wax²ó xotté žihí aní ki-di. VERT-come-as dog-on-sit woman gray reddish bring VERT-come returning horse female roan (he) brought back when he returned he brought back a roan mare.

(5) šókeáknj thá žeká ettádede ttettá hidíkko šóke-áknj thá žeká ettá-dede ttettá hi-díkko dog-on-sit the.STD.AN leg-right<sub>1</sub>-on right<sub>2</sub> bone-hobble horse the leg on right side string-halt The horse was newly string-halt in the right hind leg

šátha šókeákni náha hi. šá-tha šóke-á-kni náha hi. yet-from dog-on-sit old EMP newly horse old very and (she) was very old.

(6) kö îšótta ákidáži hí, šókeákni wítta kói-šó-tta á- ki- idé- aži hí, šóke-á-kni wí-tta there-yet-as, 1PAT-DAT-tell-NEG EMP dog-on-sit my-ALN Thus, (he) me tell not really horse mine So, he really did not tell me in spite of its being my horse,

kö îšó íkkikkákidé the, kói-šó í-kkik-káj- a- ki- dé the, there-yet V<sub>1</sub>-RCP-trade-1PAT-BEN-CAUS-SUB even (he) on me traded (it) that that he had traded it on me.

- (7) gkidáži hí the gšóži áttappá. g- ki- idé- aži hí the g- ki- šó- aži áttappá. 1PAT-DAT-tell-NEG EMP SUB, 1PAT-DAT-please-NEG much (he) me tell not very that me pleased not much I did not like it much that he did not tell me at all.
- (8) ešý jtá wákibdá. e-šý jtá o- wá- ki- wa- dá. DEM-yet mother V<sub>1</sub>-1AGT-DAT-1AGT-tell then (my) mother I told (to her) Then I told my mother.
- (9) wákibdátti de šehé: o- wá- ki- wa- idá-tti de še- wa- hé V<sub>1</sub>-1AGT-DAT-1AGT-tell-LOC, this that-1AGT-say I to her I told upon, this the-following I said When I told her, this is what I said:
- (10) "jtáttežíka anáhodaži hí šýkeáknj wítta jtátte- žíka a- náhòọ- de- aži hí šýke-áknj wí-tta father-little 1PAT-mature-CAUS-NEG EMP dog-on-sit my-ALN stepfather me raised not even horse my "It is not good for me at all that my stepfather

íkkikkákidé the, áhottá áttaháži hi."

í- kkik- káj- g- ki- dé the, á- hottá áttaha-aži hi."

V<sub>1</sub>-RCP-trade-1PAT-BEN-CAUS SUB, 1PAT-good very-NEG EMP
(he) on me traded (it) that for me good very not at all
traded my horse away on me without even having raised me."

- (11) kóišótta ekíži bdé ttánihé. kói-šó-tta ekíži wa- dé tte- wá- nihé. there-yet-as elsewhere 1AGT go POT-1AGT-MOVING.CONT thus somewhere else I going will be So I am going to go somewhere else.
- (12) eáwakkik<sup>2</sup>ó, tátta wákkikhettá anánaska
  e- wá- wa- kkik-<sup>2</sup>ó, tátta o-wá- kkik-khettá a- ená-naska
  DEM-1AGT-INDF-RFL- do something V<sub>1</sub>-1AGT-RFL-acquire 1PAT-enoughsize
  I something for myself do things I get I am enough big
  I'll do something for myself; I am old enough to get things for myself,

áakkižámetháha. á- wa- kkik-žá- wa- ?j e- tháha. V<sub>1</sub>-1AGT-RFL-think-1AGT-think DEM-because I think myself I believe.

- (13) koíšótta wittéke wákiwébdabdá tte. koí- šó- tta wi- ttéke o- wá- ki- wé- wa- da- wa- dá tte. there-yet-and my-mo.bro V<sub>1</sub>-1AGT-BEN-INDF-1AGT-work-1AGT-work POT and thus my mother's brother I for him work-work will So I will go to work for my (maternal) uncle.
- (14) ešówe ettítha jttáttežika jtá enápa
  e- šówe e- ttí-tha jttátte-žíka jtá e- nápa
  DEM-already DEM-LOC-from father-little mother DEM-two
  already there from stepfather mother both
  And from then on I ceased to live with (my) stepfather

weákdixé ábdištá. wa- i- wá- kdixé á- wa- di- štá. them-with-1AGT-live V<sub>1</sub>-1AGT-BY.HAND-stop them with I lived I ceased and my mother both.

(15) ekkíthattá wittéke wákiwébdabdá
e- kkí- tha- ttá wi- ttéke o- wá- ki- wé- wa-da- wa-dá
DEM-LOC?-from-and my-mo.bro V<sub>1</sub>-1AGT-BEN-INDF-1AGT-work-1AGTwork
that-time from and my mother's brother I for him work-work
And from that time on I was working for

tháhe má. wa- thá-he wa-?á 1AGT-STAND.CONT 1AGT-dO.IMPF I was my (maternal) uncle.

- (16) miába míxtina mazéska kdébnattá napá akní anákidá. miába mí- xti- na mazé- ska kdébna-ttá napá a- kní a- í- ki- dá. moon one-real-when metal-white ten- when two on-sit 1PAT-V<sub>1</sub>-DAT-pay month one when money twelve to me (he) paid He paid me twelve dollars a month.
- (17) ettítha miába napáhittá, háthahí hába mí jtá
  e- ttí- tha miába napá-hi- ttá, hátha-hí hába mí jtá
  DEM-LOC-from moon two-EMP-when, then-EMP day one mother
  there from month just two when then day one mother
  It was just two months later my mother finally sent

ákdathiweákidé. "hóe," ihé. "hónihg: á-ki-de-athi-we-á-ki-dé. hóe, i-wa-hé. hónihg: 1PAT-VERT-go-arrive-3S-1PAT-DAT-CAUS. What? V<sub>1</sub>-1AGT-say. It's this (for) me sent what I said It's this for me one day. "What is it?" I asked. "It's this:

(18) diáttežíka íyowítta akdánj kdí
di- átte- žíka í- ?o- wí-tta a- k- dánj ki- dí
your-father-little V<sub>1</sub>-wound-?-as V<sub>1</sub>-SUUS-bring VERT-come
your stepfather as (he) is shot (they) are taking him back to his own
home
Since your stepfather has been shot (they) are taking him home

khe, ppákkakká ttathá. khe, ppá-kkakká tta- thá LYING.CONT, nose-crooked LOC-from nose-crooked from from Crooked-Nose's (a trading post).

- (19) ekó dakhí kodá," iyé.
  e- kó da- ki- hí kodá, iyé.
  DEM-as 2AGT-VERT-arrive want, speak
  so you arrive back (she) wants, (he) spoke
  So she wants you to get on home," he said.
- (20) ešó ettí ppáze hébe hí akdé. e-šó e-ttí ppáze hépe hí wa- ki- dé. DEM-yet DEM-LOC evening piece EMP 1AGT-VERT-go still there evening part I back go So already (that) evening I started home.
- (21) akhína t²é kihá, oníahíde šǫkhé. wa- ki- hí- na t²é kihá, oníahí- de šǫ- khé. 1AGT-VERT-arrive-as die finish breathe-CAUS yet-LYING.CONT I back arrived as die finish breath make still As I arrived home, he lay still breathing, just dying.
- (22) jtá śkida, híwewákhidé, iyé, é ni thé.
  jtá ś- a- ki- ida hí- we wá- ki- hi- dé, ié, é ni thé
  mother 1PAT-V<sub>1</sub>-DAT-tell, come-3s INDF-VERT-arrive-CAUS, say, DEM live
  SUB
  mother me told (she) someone sent that-one alive that
  My mother told me that he had been alive (she said) when she sent
  someone.

- (23) ená akhí ešó oníahídaží. e- ná wa- ki- hí e- šó oníahíde- aží. DEM-only lAGT-VERT-arrive DEM-YET breathe- NEG only I got back then breathe not No sooner did I get home but he stopped breathing.
- (24) ešý hạ thétti ába k<sup>2</sup>áhawé. e- ý hạ thé- tti hợpa k<sup>2</sup>áhe-awé. DEM-yet night the STD.INAN-LOC morning lay-PL still night the in morning they laid (him) It was still night; in the morning they laid him out.
- (25) ékasáni habéhaké-tta máthe dé-da-wé. é- kasáni habé- haké- tta máthe dé- de- awé. DEM-morning day-before-when underneath go-CAUS-PL that morning day before when they put him under The next morning before day (noon -- JOD) they buried him.
- (26) ešý ettítha wittéke wákiwébdabdá
  e- šý e- ttí- tha wi- ttéke o- wá- ki- wé- wa- da- wa- dá
  DEM-yet DEM-LOC-from my-mo.bro V<sub>1</sub>-1AGT-BEN-INDF-1AGT-work-1AGTwork
  still there from my mother's brother I for him worked
  From then on I no longer worked for

the ábdištá, the á- wa- di- štá SUB V<sub>1</sub>-1AGT-BY.HAND-stop that I ceased my (maternal) uncle,

- (27) jtá wittáke énapá nahí náwe ttáha.
  jtá wi- ttáke é-napá na- hí ná- awe ttáha.
  mother my-man's.older.sister DEM-two alone-EMP PAST-PL because
  (my) mother and older sister both alone all they were because
  because both my mother and older sister were all alone.
- (28) wie nahiókittówe ttaittená, wie na- hí a- o- ki- ttó-awe tta- i- tte- ná, 1AGT alone-EMP 1PAT-V<sub>1</sub>-BEN-depend-PL POT-?-POT-as Me alone just me they depend would as Since they would be depending on just me alone,

wittéke oákiwébdabdá ábdistá. wi- ttéke o- wá- ki- wé- wa- da- wa- dá á- wa- dištá. my-mo.bro  $V_1$ -1AGT-BEN-INDF-1AGT-work-1AGT-work  $V_1$  AGT-stop my mother's brother I work-work I ceased I stopped working for my (maternal) uncle.

- 4. Introduction to Quapaw grammar. In what follows, I shall try to sketch the main phonological, morphological, and syntactic features of Quapaw. Where reliable comparative knowledge is available, I shall occasionally contrast the behavior of Quapaw with that of its Dhegiha sisters, or areally, with neighboring (but unrelated) languages.
- 4.1. Typology. Typologically, Quapaw is a primarily head-marking, active-stative, SOV language of moderate morphological complexity. Its structure is agglutinating with only a mild degree of fusion. Noun incorporation is poorly developed, amounting to little more than compounding. These characteristics are fairly typical of Siouan languages.

As pointed out by Nichols (1992), head-marking serves as a predictor of certain other characteristics. As expected, Quapaw shows alienable and inalienable possession, lack of an infinitive, noun classification, inclusive/exclusive (dual/plural) first person, and only weakly developed number marking. Diachronically it has seen grammaticalization of primarily verbal categories.

Likewise, Quapaw has a number of secondary syntactic patterns which, according to Greenberg (1963) and others, would be congruent with its overall (S)OV structure. Auxiliaries follow and adverbials precede the main verb, and the language is primarily prefixing (of, for example, person, instrument, location, valence, and role) but postpositional, with most of the latter category existing as clitics (such as locative postpositions and markers of number, tense, aspect, and mode). OV syntactic structure is reconstructible to Proto-Siouan-Catawban.

5. Segmental phonology. Phonologically, Quapaw, like the other Mississippi Valley Siouan languages, is more complex in its phonemic inventory than most of the languages spoken east of the Rockies. It includes a five-manner stop consonant system, oral and nasal vowels, and phonological sonorants that are phonetically obstruents (including one that is a stop). Its syllable structure is relatively straightforward, with open syllables and few clusters. Quapaw and the other Dhegiha dialects have simplified the complex consonant clusters found in Dakota; for example, Dakota pte 'bison', kpáza 'evening', psíča 'jump', and mni 'water' correspond to Quapaw tte, ppáze, síke, and ni, respectively.

5.1. Phonemes. The phonemes of Quapaw are given in table 1.

TABLE 1. QUAPAW PHONEMES.

	LABIAL	DENTAL	PALATAL	VELAR	GLOTTAL
ASPIRATED	ph	th	(čh)	kh	
GLOTTAL		t?	(c?)	k?	7
TENSE	pp	tt	čč	kk	
PLAIN	р	t	(č)	k	
VOICED	b				
VOICELESS		s	š	X	h
GLOTTAL		87	š?	x?	
VOICED		Z	ž	γ	
NASAL	m	n			
RESONANTS	W	d			a gidi
		ORAL	Nas	SAL	
	HIGH	i	i		
	MID	е о	Q.		
	Low	а	ą		

5.2. Consonants. Most Siouan languages have a series of voiceless aspirated stops and a series of glottalized stops (ejectives). All have a plain (unaspirated) series of stops, which may be either voiced or voiceless according to environment in the various languages. Dhegiha languages have an extra series of stops that I have termed tense. Medially, these are phonetically geminated, but initially they are always voiceless unaspirated, and they tend to raise the pitch of the following vowel. Their precise phonetic correlates in word-initial position have never been determined instrumentally, but they clearly contrast with all three other series. Tense stops arise historically, and sometimes synchronically, from older preaspirated stops and from heterorganic consonant clusters, and they are impressionistically reminiscent of the so-called tense consonants of Korean.<sup>8</sup>

Several Dhegiha languages have developed a series of alveolar or palatal affricates from earlier Common Dhegiha dental stops preceding front vowels. These are a common feature of Kansa and Osage but are rare in Quapaw, Omaha, and Ponca. Dhegiha (including Quapaw) affricates are always from underlying dentals, never from velars (as is most often the case in Dakota). Quapaw

speakers who affricate t preceding i are sometimes from that group within the Quapaw tribe that lived with the Osage tribe for an extended period of time. Dorsey's material from the 1890s shows no examples of such affrication.

Quapaw glottalized stops are ordinary ejectives with the release of oral and glottal closure nearly simultaneous. Common Dhegiha \*p? has merged with ? in Quapaw, leaving no labial in that series. Quapaw also has the glottalized fricatives s?,  $\check{s}$ ?, and x?. As is the case with ejective stops, glottal release is either simultaneous with or very slightly after the release of oral constriction or closure. Constriction is relatively great, so much so that these fricatives have become their affricated or stop equivalents in Kansa and Osage, where s? and  $\check{s}$ ? > c? and x? > k?.

Historically, the nasal resonants, m and n, occurred only before nasal vowels, while their oral counterparts, w and rackstar rackstar rackstar resonants is still characteristic of certain other Siouan languages, such as Mandan. Most Siouanists agree that nasality was predictable for consonants, but not for vowels in Proto-Siouan. Therefore, Siouan is one of the relatively rare language families that appears to have lacked distinctively nasal consonants but possessed nasal vowels. Denasalization of some nasal vowels has led to phonemicization of <math>m and m in several of the modern languages, including Quapaw. Quapaw now has both nasal vowels and nasal consonants.

The Quapaw phoneme written d (< Proto-Siouan \*r) may have a variety of actual reflexes in the various Siouan languages and dialects. In Quapaw it is nearly always [d] or an affricated [dö] or somewhat devoiced [t0], but in other, closely related languages its counterpart may be pronounced or vary with [l], [r], [t], [d], [ŏ], [n], or [y]. It still alternates regularly with n in Quapaw before nasal vowels and may form clusters in which only sonorants may participate.

Quapaw b is the only phonemic voiced stop (since d functions solely as a sonorant). It has a number of distinct etymological sources; namely, secondarily geminated ww, underlying w preceding d or n, and a few instances of p that have voiced spontaneously but irregularly and variably, especially following nasal vowels. Thus in some (but not all) instances, Quapaw surface b, like d, is functionally or at some more abstract level a sonorant.

5.3. Vowels. Most Siouan languages have very ordinary five-vowel "Spanish-like" systems. Quapaw vowels are a bit different. The Proto-Siouan phoneme \*u acquired a fronted articulation, [ü] (generally preserved in Kansa and Osage), and then merged with i leaving Quapaw (along with Omaha-Ponca) with a four-vowel system. The old o has raised until it is pronounced sometimes like [o] and sometimes like [u]. a is somewhat backed and e is somewhat lowered from IPA cardinal values. Thus the whole inventory of vowels has shifted in a counter-clockwise direction from the cardinal norms on a trapezoidal vowel chart. Typologically, this sort of rotation is not uncommon.

There is also a nasal subsystem, comprising only three vowels. There is a strong tendency for the two nasal back vowels, q and q, to merge even in careful speech. The result is something approaching [3]. This is true throughout Dhegiha.

- 5.4. Length. Quapaw had distinctively long and short vowels. Siebert (1989) recorded long vowels, the closely related Dhegiha dialects, Kansa, Osage, Omaha, and Ponca, also have them, and they are well attested in other languages from Crow in Montana to Tutelo in Virginia. Mrs. Supernaw clearly had both accented and unaccented long vowels, but unfortunately Dorsey did not consistently record length, so I am unable to treat this topic systematically. Siouan field workers should absolutely never ignore it though, even if it seems at first hearing to be variable or linked to accent. 10
- 5.5. Accent. Accent is distinctive in Quapaw. Most investigators have analyzed Mississippi Valley Siouan accentual systems as simple stress (amplitude) systems. It is becoming increasingly clear though, that Proto-Siouan had a pitch accent system, with the most common pattern showing high pitch on the second (proto) syllable counting from the left. 11 Koontz (p.c.) is considering analyzing the Omaha accent system as pitch accent, and the same may be possible for Quapaw.

In this sketch I have written accent as simple stress in forms I recorded personally and have reproduced Dorsey's accent markings in the text. It should be noted that his accent marking seems a bit strange in a number of cases, perhaps due to his relative lack of familiarity with the language when he recorded his material. In general, Quapaw preserves the second syllable (iambic) accent rule,

but because of the syncope of initial syllable vowels in certain forms throughout Mississippi Valley Siouan, there are numerous exceptions to the rule. Generally one can expect to find initial syllable accent in stative verb stems, body part terms, and in words beginning with a tense stop or any consonant cluster, as such forms quite generally had an initial syllable vowel that has been lost. Accent in verbs is especially fluid, often moving leftward as prefixes are added.

6. Morphophonology. There are certain productive phonological processes that can be seen at work. There is a tendency for nasalization to spread in a word from a nasal vowel until it encounters an obstruent. There is also a tendency towards coalescence of mid and low vowels with V1V2 > V2 at affix or clitic boundaries, e.g., tte-wa-nihe [ttanihe] 'I shall (MOVING, CONTINU-ATIVE)'. Both nasal spread and vowel coalescence are illustrated in (3) and (6) i-kkik-káj-a-ki-dé [ikkikkákide] 'he traded it on me'. Features of both vowels may be preserved at a recent compound boundary; e.g., šóke-akni [šokčakni ~ šogægni] 'dog-upon-sit = horse'. Historically, vowel clusters at morpheme boundaries of a certain age and type resulted in insertion of a glide, \*r (Quapaw d); e.g., o-i-thi > [odothi] 'to pelt with'. Sets of assimilatory processes also affect the prefixed person-number markers, generating numerous allomorphs, and these will be discussed along with that morphology. This does not by any means exhaust the inventory of phonological processes.

Because of the extensive reduction of consonant clusters in Dhegiha languages, many, although not all, of the interesting cluster rules present in Dakota reduplicative phonology are absent from Dhegiha.

6.1. Ablaut. No discussion of a Siouan language would be complete without mention of the phonological phenomenon known as "ablaut." The vast majority of such discussions have revolved around the phenomenon as it exists in modern Dakotan, in which, to oversimplify somewhat, verbs often show replacement of a final unaccented -a with -e (-j if nasalized) in a complex set of grammatical environments.<sup>12</sup>

Linguists have tried to make phonological sense of this alternation for over fifty years without notable success. The reason for the lack of success quickly becomes clear if one examines Quapaw or nearly any other Siouan language except Dakotan. In these languages, the underlying vowel in such cases is clearly -e, not -a as in Dakotan, and ablaut replaces the -e with -a, not vice versa. Thus the environments that one must specify for ablaut in Dakotan are precisely those in which it did not occur historically. In Quapaw, ablaut is found when forms with the underlying, final -e precede any of four postposed grammatical morphemes: 'plural', negative', imperative', and 'continuative'. In my analysis the forms of the first three of these clitics are -awi/awe, -aži/aže, and -a, respectively, and the ablaut is most often just vowel truncation of the sort described above. Reduplicated forms of verbs in -e show the -a variant regularly, though, as does tte 'potential', preceding a continuative auxiliary verb.

- (29) bakkówiyaya bakkówiye (reduplicated) push around > push round and round
- (30) áwittawe azátta mikhe á- wi- wa- táwe wa- zá tte wa- ikhé LOC-1AGT.2PAT 1AGT-see 1AGT- lie POT 1AGT-CONT I will lie watching you.
- (31) éyawe éye-awe say-PL they say.
- (32) šikáži šíke-aži bad-NEG S/he is not bad.
- (33) bdé ttánihé
  wa- dé tte- wá- nihé
  1AGT- go POT-1AGT-MOVE
  I will be going.

Such an analysis would not work for Dakotan, though, because -a has been generalized analogically within verb paradigms in that language; i.e., the underlying phonology has been reanalyzed, and the clitics that follow the verb (plural and negative) cannot be analyzed as having an initial a-. Thus phonologists should never

expect to find a principled—that is, phonetically motivated—solution to the problem as it is posed by Dakotan. No complete comparative study of ablaut across Siouan has yet been undertaken, but it seems clear that Quapaw presents a much more conservative situation than Dakotan. I do not pretend, however, that this treatment of the problem in Quapaw will resolve all of the questions surrounding the phenomenon in other Siouan languages. The situation is complex, and analogy has played a key role in the generalization or reanalysis of these forms in all of the languages.

6.2. Fricative symbolism. Sound symbolism plays a part in most if not all Siouan languages. In Quapaw it is either not as well developed, or not as well preserved, as it is in Dakota and Winnebago. Nice threesomes such as zi 'yellow', zi 'yellowish-brown', and  $\gamma i$ brown' or sóta 'clear to hazy', šóta 'muddy, smoky', and xóta 'dark gray' that one finds in Dakota are generally wanting in Quapaw, but there are numerous pairs that illustrate the principle. Basically, any semantically gradable concept that contains a fricative may participate. Voicing remains constant, but the fricative may be dental to palatal to yelar, the front articulation supposedly representing the lighter or finer degree and the back articulation the darker or coarser degree of the concept. Application of this principle is often murky at best though, and the precise semantic outcome of application is not predictable. This factor, along with the general lack of productivity in Quapaw, suggests that the process should be considered derivational. And although some Siouan grammars have treated fricative symbolism as if it were part of phonology, it is not phonological in the sense that any actual morphophonological alternations are involved. Each member of the following is a distinct lexeme, not a morphophonological variant. A few Quapaw examples of fricative symbolism:

(34)	kdezé kdežé	'striped' 'spotted'
(35)	kasté kašté	'gash, split' 'gash, slit'
(36)	bdáze bdáže	'burst' 'spread apart'

(37)	zi žihí	'yellow' 'reddish yellow'
(38)	wasá wašá	bear' (lit., 'something black') 'mole' (lit., 'something dark' [melanoma])
(39)	šótte xótte	'smoke, be smoky (of air)'; 'be muddy (of water)' 'gray'

- 7. Noun morphology. Nouns are inflected for possession and definiteness. Associated definite articles are marked for animacy, number and collectivity, position or shape (sitting, standing, or lying), and motion.
- 7.1. Possession. As is the case in many consistently head-marking languages, possession in Quapaw can be divided into what may be called *inalienable* and *alienable* types. The inalienable set of nouns is the closed set, and in Proto-Siouan it included most external and some internal body parts and most kinship terms. <sup>14</sup> In Quapaw, as well as in other Dhegiha Siouan languages, only kinship terms are inalienably possessed. <sup>16</sup> Except in their vocative form, kin terms require a possessive prefix. Some examples follow: <sup>16</sup>

	18	2S	38
man's aunt	<b>wi</b> -ttími	di-ttími	l-ttími
man's elder brother	wi-žíde	di-žíde	i-žíde
woman's broher-in-law	wi-šík?e	di-šík?e	l-šík²e
daughter	wi-žáke	di-žáke	i-žáke
man's mother's brother	wi-ttéke	di-ttéke	i-ttéke

All other nouns are possessed using a postposed base, -tta, with a possessive prefix: šóke wí-tta 'my dog', šóke dí-tta 'your dog', šóke i-ttá 'her/his dog', šóke akó-tta 'our dog'. ¹A second method of forming alienable possessives uses the dative-possessive verbal prefix, ki-; e.g., šóke ki-t²é 'his/her dog died'. The latter sentence might also be interpreted as the homophonous benefactive '(the) dog died on him' (with underlying kik-t²e), however.

7.2. Classificatory definite articles. Definiteness is a second important inflectional category in nominals. It is encoded in a set of postposed definite articles collectively representing an innovation in the Dhegiha (Quapaw, Kansa, Osage, Omaha-Ponca) subgroup of

Siouan. Other Siouan languages usually have no more than two definite articles.<sup>18</sup> The Dhegiha articles incorporate a number of classificatory notions, and no other Siouan subgroup has a set of articles with similar form and function.

I have shown elsewhere (Rankin 1976) that Proto-Siouan and numerous of its daughter dialects possessed a system of positional verbs, 'be sitting', 'be standing', and 'be lying', which, even in the proto-language, had doubled as markers of continuative aspect and which, in the process of this inflection, had provided a semi-overt classification of their subject nouns. The more northerly of the Siouan subgroups generally show only this primitive system of noun classification using positional verb roots and the related verbs of placing, 'set', 'stand', 'lay', in essence not unlike many Indo-European languages. The positional roots later compounded with deictic elements in Mandan and other dialects to produce a set of classificatory elements used to mark nouns and noun phrases overtly for position if animate, or shape if inanimate.

This system was expanded in the languages of the southeastern rim of the area of Siouan habitation to produce a more extensive and therefore more interesting noun classification. In the Dhegiha subfamily the system of classificatory definite articles justified the subtitle of Rankin (1976): "From Verb to Auxiliary to Noun Classifier and Definite Article," the sequence in the progressive grammaticalization of the original three verbs.

The existence of positional classificatory verbs is typologically common in many American (and other) languages, but positionals are especially prominent and their use especially consistent in the Southeast, and they are to one degree or another characteristic of nearly all languages of the Southeastern Sprachbund. The status of positionals as an areal feature is reinforced by the fact that there is evidence that they spread into and across some Southeastern language families via language contact. 19

Dhegiha Siouan languages participate in the southeastern Sprachbund to a degree. Close study of the Dhegiha dialects since 1976 has revealed further steps in the development of the Dhegiha positionals.

7.2.1. Parameters of the article system. The categories marked in addition to definiteness are animacy, movement, number,

sitting, standing, lying (globular, long and vertical, long and horizontal if inanimate), scattered and collective. According to Dorsey, Quapaw, unlike Omaha, does not distinguish (animate) subject from object articles.<sup>20</sup>

**7.2.2.** Dhegiha inanimates. For inanimate nouns, the Dhegiha system is:

TABLE 2. DHEGIHA INANIMATE ARTICLES

QUAPAW	KANSA	OMAHA-PONCA	CLASSIFICATION
khe	khe	khe	long horizontal objects
the	čhe	the	long upright objects
		δą	round or squat objects
nįkhe	yige	••	round or squat objects
ke	ge	ge	scattered objects, cloth

# 7.2.3. Dhegiha animates. For animate nouns, the system is:

TABLE 3. DHEGIHA ANIMATE ARTICLES

QUAPAW	Kansa	OMAHA-PONCA	CLASSIFICATION	
ni	yi	ði	animate sg moving	
apa	aba	ama	animate pl moving	
nikhe	yikhe	õįkhe	animate sg sitting	
nikha	yakha	<i>ōakha</i>	animate pl sitting	
the	kha	tha	animate standing	
khe	?	?	animate lying	

# **7.2.4. Quapaw inanimates.** The Quapaw inanimate articles are (40-51):

- (40) khe 'singular, lying, animate or inanimate' té-khe 'the lake' žá-khe 'the log' ha-khe 'the skin, bark'
- (41) the 'singular, standing, inanimate'; also marks nominalized (past?) acts.

  žá-the 'the tree' (cf. 'log', above)

  wak'i-the 'the carrying of something'

- (42) njkhe 'singular, sitting, animate or inanimate' mažá kówa-njkhe 'yonder (piece of) land' (cf. 'lake', above) hobé-njkhe 'the moccasin'
- (43) ke 'scattered, inanimate' kkátte-ke 'the plums'
- 7.2.5. Quapaw animates. The Quapaw animate articles are:
- (44) nj 'singular, moving, animate' mikká-nj 'the (moving) raccoon'
- (45) apa 'plural, moving, animate' nikkašik-apa 'the (moving) people'
- (46) njkhe 'singular, sitting, animate or inanimate' ištáye š²áke ekáxna njkhé 'the old Frenchman's wife' ([[old Fr.] [hiswife]]).
- (47) the 'singular, standing, animate' methó-tha 'the grizzly'
- (48) khe 'lying, animate' wax²ó khe 'the (reclining) woman' dedo thi, t²e-khe 's/he arrived here, the dead (person)'
- 7.3. Collective (plural) articles. If nouns form a collective, sitting objects take the standing article, standing objects take the lying article and lying objects take a unique article, *iké* (but one that marks sitting objects in Kansa and sometimes in Osage). Dorsey tries to justify this apparent rotation scheme pragmatically, but there is clearly a certain amount of arbitrariness to the classification.

The Quapaw collective articles are:

- (49) the 'collective, sitting inanimate, as in a pile' (JOD 1890-94) hobé-the 'the (pair of sitting) moccasins'
- (50) khe 'collective, standing as in a row' (JOD 1890-94) ttikdekde-khe akdé....' I go home to the (line of standing) lodges'
- (51) jké 'collective, lying as in a bundle' (JOD 1890–94) é za·ní žá-jké 'they all reclining'
- 7.4. Additional detail. Of the articles listed above, two require further comment. Most Dhegiha dialects maintain a morphological

distinction between sitting animate and sitting inanimate articles that parallels the standing articles. Historically the inanimate article was na, and nikhé marked animates only, but na was lost in Quapaw, Kansa, and Osage. This has left a void that has been filled differently in each language. In Kansa the collective "bundle" article (y)iké has been extended to include singular sitting objects, while in Osage some sitting objects have merged with the lying category while others, as in Quapaw, take the animate article -ikhé (Osage -ikšé, Carolyn Quintero, p.c.). In Quapaw all appear to have merged into the animate category. Quapaw does retain a few traces of na, however, in verbs of placing or putting.

All positional articles are syntactically enclitic to their entire noun phrase; e.g., *îhažo ttoší khe* 'the lower lip' and *žá-bdáska ttáka khe* (lit., 'wood-flat wide the') 'the wide board'. As there is some phonological fusion of stem-final and article-initial vowels, the status of articles as enclitics or affixes is still debated.

In most instances the use of positional articles seems to be pragmatically determined and semantically natural, but there are exceptional cases that remain unexplained. It appears that in at least some respects the system is (or was) on its way to becoming arbitrary and conventional. Dorsey gives examples of this in his dictionary and texts, such as matte-khe 'the (lying) bow' "even if perpendicular" (Dorsey 1890-94), or the Quapaw story of Cinderella in which the narrator uses -tha 'standing animate' for all of the characters virtually throughout the story. Here it seemed to be the unmarked animate positional (perhaps as the 'standing inanimate' seems to be the unmarked inanimate usage). In the reminiscences of one speaker, Dorsey has a large number of instances in which the article khe 'the (lying)' modifies animates who were clearly not reclining. These are marked 'the (past)' by Dorsey, as if the article system were sensitive to tense or aspect, but Dorsey's other speakers did not follow this usage. Perhaps the narrator thought of the persons or animals as deceased and therefore horizontal. There are a number of other somewhat baffling uses of the positional articles and auxiliaries in Quapaw, but they will have to await further analysis.

7.5. Compounding of articles with demonstratives and other elements. This compounding may have begun early in Siouan, since Mandan shows similar compounding. Unlike positional

demonstratives in Mandan, which normally have only two morphemes (the single demonstrative plus a positional root), compound deictics in Quapaw may contain an impressive number of elements encoding temporal, spatial, and directional notions in addition to all of the features of positional articles. The compounds are accented as single words and would appear to have lexical status in the language. An exhaustive list would fill pages. The following examples illustrate some of the compound deictic clusters with the, the 'standing, inanimate' or 'collective sitting inanimate' article. The other articles could be substituted, thus multiplying the resultant lexicalized forms. The three basic demonstrative pronouns and adjectives refer to objects 'near the speaker' (de), objects 'not near the speaker, but visible' (še), and objects 'not visible' (ka). In addition they may also have temporal and spatial reference, so the trio may mean 'this, that, yon', 'here, there, yonder', 'now, then, yore'.

- (52) déthe 'this STD.INAN'
- (53) dédathe 'these DU.STD.INAN'
- (54) šéthe 'that SG or COLL.SIT.VIS'
- (55) šédathe 'those DU.STD.VIS.INAN'
- (56) káthe 'that STD.INVIS.INAN or COLL.SIT.INVIS'
- (57) kádathe 'those DU.STD.INVIS.INAN'
- (58) kówathe 'yon SG.STD.INAN or pile'
- (59) kówadathé 'yon DUAL.STD.INAN or piles'
- (60) kóithe 'yon remote sg.std.vis.inan'
- (61) kóidathé 'yon REMOTE DUAL.STD.VIS.INAN'
- (62) tówathe 'that on this side SG.STD object or pile'
- (63) tówadathé 'those on this side DU.STD or COLL.INAN objects'
- (64) hówathettátha 'from what NEARBY SG.STD.INAN or COLL.SIT?'
- (65) hówadathéttitha 'from what DU.REMOTE.STD.INAN?'

8. Case alignment. Grammatically, Siouan languages are of the active-stative (sometimes called split intransitive) type. This means that the subjects of active verbs, both transitive and intransitive, are inflected for person with one set of pronominal prefixes, while stative subjects along with the objects of transitive verbs are inflected with a second set. Thus it is reasonable to divide the possible roles into an actor set and a patient set; the notion "subject" lacks somewhat in usefulness in Siouan linguistics. In the following examples, 'fetch' is active and 'suffer' is stative.

TABLE 4. ACTIVE AND STATIVE PARADIGM: ákda 'fetch one's own', ákda 'suffer'.

	'fetch one's own'	'suffer'
18	á-a-kda	á-a-kda
28	<b>á-da-</b> kda	á-di-kda
3s	á-Ø-kda	á-Ø-kda
1P	ak-á-kda-we	wa-á-kda-we

Fine tuning the idea of active a bit, the notion of agency seems to play the primary role in determining the status of verbs in Quapaw. Thus certain verbs that might appear to be semantically active are grammatically stative. These include 'suffer', 'sweat', 'itch', 'hurt (intrans.)', 'possess', and 'die'. Following Mithun (1991:516f.) and checking instances in which control might be a determining factor, we find that even verbs such as 'sneeze', 'belch with sour aftertaste', 'hiccough without sour aftertaste' are inflected with the active pronoun set in Quapaw, so control is not the controlling factor. This classification is apparently not entirely uniform even across the Dhegiha dialects, though. 'Die', for example, is stative in Quapaw but active in Kansa (although further investigation in extant Dhegiha dialects may well reveal that both forms are acceptable but have different meanings).

9. Verbal categories. Verbs are the most highly inflected category, as one might expect in a head-marking language. There are prefixes for agent-patient, locative categories, instrumental categories (two positions), reflexive-reciprocal and dative-possessive-benefactive. Verb stems themselves may be reduplicated to show iteration of an action or intensity of a state. Verbs are inflected for

aspect and mode by postposed particles or conjugated auxiliaries. Aspectual distinctions include imperfective, continuative, potential, and habitual, and modal distinctions include negative and imperative. Tense distinctions are not marked as such; English futures and optatives are normally translated using the potential aspect. Unmarked utterances in Quapaw may be translated into English with either present or past tense according to context.

Stative verbs may function as adjectives, in which case they follow the modified noun. As adjectives they are apparently not inflected for person-number (which would have zero marking in any event) but may be reduplicated.

9.1. Person categories. Koontz (1985), following Dixon's analysis of Australian pronominal systems, analyzes the basic Siouan pronominal distinctions exclusively in terms of *person*. This seems reasonable given that -awe 'plural' is generally very non-specific as to scope. When it appears it may be functioning to pluralize the agent, the patient, or even the action of the verb.

	SPEAKER	HEARER
first person	+	
second person		+
third person	•	•
inclusive person	+	+

**9.2. Pronominal prefixes.** The most abstract underlying phonological forms of the pronominals are as follows:

	AGENT	PATIENT	
18	wa-	g-	
28	da- < (*ya-)	di- < (*yi-)	
38	Ø-	Ø-	
1D	ąk-	wa-	

Additional forms for first person plural and second person plural are created by using the plural enclitic, -awi/-awe with the first person dual and second person singular, respectively. Singular and plural forms of the third person may often be essentially homophones, as both singular and plural forms can be marked with the aforementioned plural enclitic.<sup>21</sup> These abstract underlying forms are

justified by the following paradigms of regular and irregular verbs. Quapaw, Kansa, and Omaha-Ponca verb conjugation classes with agent pronoun prefixes are treated below.

9.3. Verb conjugation. I list below the conjugated forms of a number of regular and irregular verb types. Verbs are most easily classified according to their stem-initial consonant, which interacts phonologically with the person prefixes, effectively creating the classes. In Proto-Siouan times these classes were evidently phonologically conditioned, but in the modern languages the earlier conditioning factors have become nonproductive, and the classes are now for the most part lexically conditioned. There are additional, minor sub-subclasses not covered here.

9.3.1. Regular active conjugation. This is the most productive subclass of verbs.  $k^2i$  'pack on the back'

	QUAPAW	KANSA	OMAHA-PONCA
18	a-k²į	a-k²į	a-?j
<b>2</b> S	da-k²j	ya-k²i	ŏa-?į
38	$k^2i$	k?į	$\gamma_i$
1D	$a-k^2i$	a-k?j	e-?j
1P	a-k²j-we	a-k <sup>2</sup> j-be	g-?j-(b)i

**9.3.2.** R-stems. (Most verb stems with initial d in Quapaw.) This is a relatively productive pattern. de 'go' (many similar examples exist).<sup>22</sup>

	Quapaw	KANSA	OMAHA-PONCA
18	b-de	b-le	b-ðe
28	<b>t</b> -te	h-ne	š-ne
38	dé	yé	ðé
1D	ak-á-de	ąg-á-ye	ąg-á-že
1P	ak-á-d-awe	ąg-á-ya-be	ąg-á-ža-(b)i

**9.3.3.** H-stems. (Some but not all verb stems with initial h in all three languages.) hi be coming here'.

	QUAPAW	KANSA	OMAHA-PONCA
18	p-hi	p-hü	p-hi
2S	š-i	š-ü	š-i
38	hí	hü	í
1D	ąk-á-hi	ag-á-hü	ąg-á-hi
1P	ąk-á-hi-we	ąg-á-hü-be	ąg-á-hi-(b)i

9.3.4. Glottal-stems. ?o 'do, be' (also wear, think and a few other verbs).23

	QUAPAW	KANSA	OMAHA-PONCA
1S	m-o	m-q	m-ą
2S	ž-o	ž-q	ž-a
38	%	%	?á
1D	ąk-ģ	ąg-ó	ąg-á
1P	ąk-ó-we	ąg-ó-be	ąg-á-(b)i

9.3.5. B-stems. baxi'shove, push, nudge' (also many other examples with instrumental ba-'by pushing').

	QUAPAW	KANSA	OMAHA-PONCA
18	p-páxi	p-páxi	p-páxi
28	š-páxi	š-páxi	š-páxi
38	baxí	baxí	baxí
1D	ą-báxi	ą-báxi	ą-báxi
1P	a-báxi-we	ą-báxi-be	a-báxi-(b)i

**9.3.6.** D-stems. Quapaw tawe look at. This is the only verb in the Dhegiha Siouan subgroup regularly found in this class. Unfortunately some of the Quapaw conjugated forms are not found in Dorsey. In all likelihood the Quapaw pattern follows that found in Kansa, Osage, Omaha, and Ponca exactly.

	QUAPAW	KANSA	OMAHA-PONCA	
1s	t-tawe	t-tóbe	t-tábe	
2S	š-tąwe	š-tóbe	š-tábe	
38	tậwe	dóbe	dábe	
1D	not found	ą-dóbe	ą-dąbe	
1P	not found	a-dób-abe	ą-dáb-a(b)i	

9.3.7. G-stems, G-stems, and G-stems,  $k\acute{a}\gamma e$  'make, do' (also the verbs 'pretend' and 'teach').

	QUAPAW	Kansa	OMAHA-PONCA
18	<b>p</b> -páγe	p-pá·γe	p-páye
28	š-káye	š-ká·γe	š-káye
38	káye	gá·γe	gáγe
1D	<b>a</b> -káγe	ą-gá·γe	ą-gáγe
1P	a-káy-awe	a-gá·y-abe	a-gáγ-a(b)i

G-stems $_2$ .  $k\acute{q}$ -da 'want', doubly conjugated as a G-stem and an R-stem.

	QUAPAW	KANSA	OMAHA-PONCA
18	k-ký-b-da	k-kó-b-la	k-ká-b-ða
28	š-kǫ́-t-ta	š-kǫ́-h-na	š-ká-š-na
3s	kýda	góya	gáða
1D	a-kóda	a- góya	a- gáða
1P	a- kód-awe	a-góv-abe	a-gáð-a(b)i

#### 9.3.8. W-stem(s). i-moye 'to ask a question'.24

	QUAPAW	KANSA	OMAHA-PONCA
18	í-m- qye	í-b- lǫγe	í-m- aγe
28	í-ž- ǫγe	í-h- noγe	í- n- aγe
3S	ímǫγe	íy <i>qγ</i> e	íwæγe
1D	not found	not found	<b>ạ</b> ỗá- wạγe
1P	not found	not found	<b>ạ</b> ὄμ- waγa-(b)i

10. Pronominal allomorphs. To summarize, the first person singular pronominal affix shows a complex alternation pattern that is partially phonologically conditioned and partly morphologically conditioned. Originally the conditioning factors were phonological and assimilatory in character. The rather involved rule that has developed is virtually identical in every Dhegiha dialect. Here the first person singular allomorphs are a-/b-/m-/p-/t-/k-; comparison with other Siouan subgroups shows that the most productive of these, a-, originally had the form \*wa-, and it is the w of this prefix that yields the other products. In the text presented in this sketch I have consistently used wa- to mark underlying first person singular agents even though the pronominals undergo considerable phonological mutation in their surface forms.

Second person forms are only a little less complex; allomorphs are  $da-/\check{s}-/\check{z}-/t-/\mathcal{O}-$ , and the underlying form of the prefix is da-.

Historically it was \*ya- (y- after syncope), and this accounts for the palatal contoid allomorphs.

Without going into formal rules, the phonology here involves several stages. Throughout Mississippi Valley Siouan, unaccented short vowels in initial syllables were lost at one point, often leaving consonant clusters; i.e.,  $CV_1CV_2 > CCV_2$ . When the initial CV- was an agent pronominal, the resultant cluster after syncope was \*wC-for first person singular agents and \*yC- for second person singular agents. These resonants in turn assimilated to the following steminitial consonant in several ways depending on major class (sonorant, obstruent, etc.), glottalic features (h, ?, voicing, voicelessness), nasality, and place and manner of articulation, yielding the distinct allomorphs that can be seen in the several paradigms today.

R-stems (Quapaw initial d-) have generally remained conservative as have B-stems beginning with the instrumental ba-by pushing'. Most of the other conservative paradigms have been replaced by regularized paradigms (first subclass) in all but a few basic verbs. Thus hi be coming' (above) is an H-stem, but haze 'run' has the conjugated forms a-haze and da-haze, not \*\*p-haze and \*\*š-aze.

Third person forms are unmarked. First person dual and plural forms are considerably simpler and show signs of having been innovated or at least reanalyzed since the Proto-Siouan period.<sup>25</sup> Thus, if we are right in our reconstruction of Proto-Siouan, first, second, third (zero), and probably inclusive persons were marked, but number in pronominal prefixes per se was not.

The Quapaw pronominal prefix ak-(a-before consonants) marks the first person dual inclusive. The plural distinction is introduced by the additional verbal suffix -(a)we/-(a)wi'pl'. The details of usage are still vaguely understood by Siouanists. Only in Dakotan and Winnebago is true dual inclusive meaning clear. The prefix, without -awi, probably marked dual inclusive agents only, but more work is needed on the extant Dhegiha dialects in order to be certain of this

11. Object pronominals. As mentioned above, the same set of patient prefixes marks stative subjects and the direct objects of transitive verbs in Quapaw. Note that there is a distinct permanteau, wi-, for first person singular acting on second person forms. Examples are from o-thi 'to strike' and nax? to head listen'. 27

- (66) o-á-thị 1 (3) hit S/he hit me.
- (67) o-á-da-thị 1 2 hit You hit me.
- (68) o-wi-thi 1.2 hit I hit you.
- (69) **a**-dá-nax?o 1 2 hear Did you hear me?
- (70) wi-nax<sup>9</sup>o 1.2 hear I heard you.
- 12. Statives. Stative (patient) conjugation: šíke 'to be bad'.28

QUAPAW	Kansa	
á-šike	ą-šige	I am bad
dí-šike	yi-šige	you-sg are bad
šíke	šíge	s/he is bad
wá-šike	wa-šige	we-du are bad
wá-šikawe	wa-šigabe	we-pl are bad
	á-šike dí-šike šíke wá-šike	á-šike a-šige dí-šike yi-šige šíke šíge wá-šike wa-šige

13. Quapaw numerals. Numerals may function as stative verbs. Siouan numerals and counting systems differ considerably from subgroup to subgroup, especially for the numbers 'seven', 'eight', and 'nine'. In Quapaw, and in Dhegiha generally, these numerals form a partial quinary counting system, 'seven' being based on the word for 'two' and 'eight' on 'three'. The root of Dhegiha and Chiwere Siouan 'nine' is shared with a number of Algonquian languages of the Great Lakes area. The Quapaw basic numerals:

one	m įxči	six	šáppe
two	nobá	seven	ppė noba
three	dá·bnį	eight	ppe dá bni
four	to·wa	nine	šákka
five	sátta	ten	kdébnę

Teens are formed using the construction 'ten-when X sits-upon-it'; e.g., kdébną-ttą mįxti á-knį 'eleven'. The decade numerals are formed using 'ten X' where X is a multiplier, e.g., kdébną dá bnį 'thirty'. One hundred is kdébną hi 'a stock of tens'.

- 14. Reflexive, reciprocal, dative-possessive, and reflexive-possessive. Other pronominal prefix categories include ki- 'dative-possessive-benefactive',  $k \sim kik$  'SUUS' (reflexive-possessive), and kkik-'reflexive, reciprocal'. Historically 'suus' probably represents an original prefix, \*ki, which lost its vowel by the common initial syllable syncope discussed under pronominals above, and which was then renewed by speakers for whom the remaining k had become opaque. The reciprocal is sometimes found reduplicated, but the reflexive as such never reduplicates.
- (71) ki-kaγ-á DAT-make-IMPER. make it for him.
- (72) šǫke-áknį ki-mędawe horse DAT-steal-PL They stole his horse.
- (73) kik-kóda SUUS-want to want one's own
- (74) k-dižá SUUS-wash to wash one's own<sup>29</sup>
- (75) šoke-ákni dí-tta da-kí-š-ko-t-ta e horse your 2AGT-SUUS-2AGT-want-2AGT-want Q Do you want your own horse?
- (76) *a-kkik-kaγ-awe*1d-RFL-make-PL
  We made it for ourselves.
- (77) a-kkip-pizaza
  a-kkik-pizeze (underlying)
  1d-RCP-seesaw
  Let's seesaw each other. Let's play seesaw.

15. Instrumental prefixes. Quapaw, like all other Siouan languages, marks by means of a derivational prefix the type of instrument (broadly conceived) used to accomplish the action of a verb. These instrument markers fall into two distinct prefix classes, and they represent a productive means of forming new verbs from existing verb stems. 30 They also quite generally serve as transitivizers of stative verbs, e.g., bdáska be flat but di-bdáska flatten, fold flat (using the by hand instrumental prefix).

15.1. Inner group. (Occurs in an order class near the verb stem, following the agent pronoun prefixes.)

TABLE 5. INNER INSTRUMENTAL PREFIXES.

QUAPAW	KANSA	OMAHA- PONCA	LAKOTA	TYPE OF ACTION INDICATED
ba-	ba-	ba-	pa-	by pushing
na-	na-	na	na-	by action of the foot
da-	ya-	ða-	ya-	by mouth
ka-	ga-	ga-	ka-	by striking, wind, water
di-	yü-	ði-	yu-	by hand, pulling
bi-	bü-	bi-	pu-	by pressing, rubbing

15.2. Outer group. (Occurs in an order class nearer the beginning of the word, preceding first and second person pronominal prefixes. Lakota order differs slightly.)

TABLE 6. OUTER INSTRUMENTAL PREFIXES.

QUAPAW	KANSA	OMAHA- PONCA	LAKOTA	TYPE OF ACTION INDICATED
pá-	bá-	ma-	wa-	by cutting with a knife
po-	bo-	mo-	wo-	by shooting, blowing
tá-	dá-	ná-	ná-	by extreme temperature

Examples of Quapaw verb stems with instrumental prefixes:

(78) pá-baγe 'to cut in two'ba-báγe 'to break by thrusting'

'to shoot (a rope or cord) in two'

po-baye

tá-kkówiγe bi-kkówiγe

	Po onle	00 billion (m 1 pp 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
	da-báye	'to bite in two'
	na-báye	'to break with the feet'
	di-báye	'to break by pulling'
	ka-báγe	'to cut in two by striking'
(79)	bi-įži	'to fail in pressing'
,	tá-jži	'to fail in cooking'
	pá-jži	'to fail in cutting or sawing'
	dí-iži	to fail in pulling, rowing'
	ka-įži	'to fail in throwing or striking'
	na-įži	'to fail in walking or with a machine'
	ba-íži	'to fail or miss pushing at something'
	da-įži	'to fail with the mouth or voice'
(80)	ba-kkówjye	'to push around in a circle'
	di-kkówiye	'to turn, pull out of line'
	ka-kkówjye	'to turn around, to circle'
IN A MARK SPECIAL	na-kkówjye	'to turn with the foot, treadle'
	tá-kkówiye	'to make circle using fire'
	CONTRACTOR DESCRIPTION OF THE PROPERTY OF THE	그 마이 어느 그는

'to blow in a circle'

16. Aspect and mode. These categories are inflected with particles postposed and often only loosely connected to the verb, so in a sense they involve matters of syntax. For practical purposes I shall treat them here with the rest of the verb morphology. I mentioned above several Quapaw aspect and mode categories; here I shall give a few examples to show how they are used. The verb dattá 'drink' has the forms first person singular b-dattá 'I drink/drank' and second person singular t-tattá 'you drink' (since it is an R-stem).

Potential: The underlying shape of this morpheme is tte. b-dattá tte I will/would drink'. It has the ablauted form tta preceding the continuative auxiliaries. This aspect is most commonly translated into English as a future, and it is the form that is given if a future is elicited.

Continuative: b-dattá m-jkhé 'I am drinking'; t-tattá njkhé 'you are drinking'. (Note that the continuative auxiliary -njkhé and other positional auxiliaries are also inflected for person.)

Potential continuative: b-dátta tta m-jkhé 'I will be drinking'.

Imperfective: b-dattá q-m-á 'I used to drink'; t-tattá  $\check{z}$ - $\check{q}$  'you used the drink', where (n)q/(n)a is a conjugated auxiliary derived from \* $^{\circ}2q$  'data

Habitual: The underlying shape here is na. b-dattá na I drink' (i.e., I'm a drunkard.'); t-tattá na 'you drink' (You're a drunkard.').

Negative: The underlying form is best considered aži. b-dattá-ži 'I don't/didn't drink'. dattá-ži 's/he doesn't/didn't drink'. The negative auxiliary is inflected for first person singular in the other Dhegiha languages, but not in other persons, and not in Quapaw.

Negative potential continuative: b-dattá-ži tta m-jkhé 'I won't go on drinking'.

Imperative: The underlying shape of this morpheme is -á. dattá (underlying dattá-a) 'Drink it!' (or simply 'drink'); a-dátta-w-á (underlying a-dátta-awe-á) Let us drink (it)'.

Narrative: All Dhegiha languages have a narrative mode marker that is occasionally used in storytelling. It takes the shape *the* and is postposed to most other post-verbal enclitics. Sentence (4) in the text contains examples, but this clitic is often difficult to distinguish from the subordinator that is homophonous with it. Perhaps studies of the extant Dhegiha dialects will clarify the distinction.

17. Continuative auxiliaries. The same positional particles that occur as classificatory definite articles also function post-verbally as markers of continuative aspect. The article chosen depends on the class of the subject of the verb (according to Dorsey and as far as I can tell at present); however, that subject need not be expressed overtly and any copying rule would need to refer to underlying constructs or discourse. As pointed out above, historically the Proto-Siouan positional verbs, \*rá\*ke 'sit', \*há\*ke 'stand', and \*wike lie', functioned as continuative auxiliaries. In Quapaw and the other Dhegiha dialects, these original auxiliaries have been lost or modified, and the apparently copied positional definite articles now fill the slot that they once occupied.

When the subject is first or second person these Quapaw postverbal continuative particles can take person-number marking and are actually conjugated as full-fledged auxiliary verbs. This conjugation only applies overtly to the animate forms, of course, since first and second persons must be animate. Of these continuative auxiliaries, only nikhé be sitting has a conservative conjugation pattern and appears to be old, although many of the forms incorporate a reflex (sometimes conjugated) of "he be in a place,

locative with an equally conservative H-stem conjugation pattern (see immediately below).<sup>32</sup> The rest use the regular pronominal prefixes and are almost certainly of recent origin. A few are even suppletive for number, a pattern virtually unheard of in Siouan but not uncommon within the southeastern *Sprachbund*. Data are from Dorsey (1890–94):

TABLE 7. AUXILIARY VERB PARADIGMS.

		STANDING	SITTING	LYING	MOVING
1	18	a-thạhể	m-įkhé	mj-khé	ánihé
300	28	dá-thạ-š-e	n-ikhé	žą-khé	(da)ni-š-é
HEISHEIT	38	thą	nįkhé	khé	nį
WE I A ONE OTHER	⇒1D	óka-thạ	ó-nikhe		ndras i
welver	1P	oká-ke	A	įké	óka-ní
C- JA COC MILLS	2P	da-ké-š-e	n-ikhá-š-e	įké	apá-š-e
THEY ->	3P		nikhá	CONTROL CONTRO	apá

For collective sitting animates there is also an invariant plural form, wiké, for all persons according to Dorsey (1890–94). This is very likely nothing more than -(a)wi 'pl' and -ke 'scattered (?) article'. Note, however, that ke is otherwise normally only used with inanimates.

A much fuller treatment of these positional continuative auxiliaries is called for, if possible using data from one of the extant Dhegiha dialects, Osage, Omaha, or Ponca, so that forms can be verified with speakers. Much remains to be learned about Dhegiha noun classification.

Where we see these neo-auxiliaries that have developed from definite articles with innovated person-number marking, we may add yet another stage of grammaticalization to the subtitle (Rankin 1977a) quoted above: "From Verb to Auxiliary to Noun Classifier and Definite Article . . . and back to auxiliary again!" Some of these auxiliaries have come full circle, returning to verbal status.

Most of the synchronic treatments of Dhegiha languages that I have seen treat this continuative auxiliary function of the definite articles as the result of a synchronic copying process. That is, continuative aspect is formed by copying the animacy, movement, positional, and other features from the subject to post-verbal syntactic position. This analysis may even work synchronically, but

the number of older *verb* roots that I see among the definite articles along with the fossilized conservative person-number affixes present on the conjugated animate forms strongly suggest that the historical development went the other way around; i.e., that articles, and therefore overt noun classification, are ultimately deverbal in origin.

18. Classificatory verbs of placing and the Quapaw causative. These verbs are common to all of the Mississippi Valley Siouan languages and for the most part are related etymologically to the original verb stems, 'sit, stand' and 'lie', as with akdé 'stand something upright upon something'; e.g., mášo á-a-kde 'I stuck a feather upright (in my hair)'. Quapaw -de, the root here, is derived from Proto-Siouan \*rhe, (which also gives Quapaw the, 'inanimate to be standing'); ákna 'set a globular object or cloth on something' is derived from Proto-Siouan \*ráke 'be sitting'; and ák'òhe 'lay a horizontal object on something' is at least potentially (with some interesting phonological implications) a doublet from Proto-Siouan \*wike 'be lying'. 33

Quapaw has extended the use of positionals within verbs of placing. Just as the original Proto-Siouan main verbs of position (\*rá·ke, \*há·ke, and \*wúke) have generally been replaced in Quapaw, so the original verbs of putting or placing have been widely replaced with newer, causative verbs whose roots are found among the Dhegiha classificatory definite articles. In other words, the articles have provided replacement roots for innovated verbs of placing.

- (81) iná-de 'set a globular object or cloth or paper'34
- (82) ithé-de 'stand a vertical object up'
- (83) ihé-de 'lay a horizontal object'

These verbs use the regular causative conjugation in which de, the causative root, bears the person-number marking; e.g., 1s ihé-a-de, 2s ihé-da-de. 35 They can be combined to describe, for example, the placement of horizontal objects in a vertical plane, as in ákik? óhe ithéde 'put horizontal things in a (vertical) pile'. Both positional verbs are used here; ák? ohe 'lay' and ithéde 'stand' with the combined meaning 'to stack up horizontal things'.

- 19. Syntax and discourse. Only the briefest sketch of Quapaw syntactic structure is possible in a work of this scope. All Siouan languages are basically (S)OV languages. Typological study of the world's languages leads us to expect that right-headed languages will tend to behave in certain consistent ways. The following examples from Quapaw show just how well it fits the predicted patterns.
- 19.1. Examples of statements. Note the OV constituent order.
- (2) etí ománikka kdébnattá sattá akní eánaska aníhe má.
  e-tí ománikka kdébna-ttá sattá a-kní eá-naska wa-ní-he wa-?á.
  there year 10-when 5 on-sit 1PAT-size 1AGT-MOVE.CONT 1AGT-do.IMPF
  there years fifteen of age I was
  I was fifteen years of age there.
- (16) miába míxtina mazéska kdébnattá napá akní anákidá. miába mí- xti- na mazé- ska kdébna-ttá napá a- kní a- i- ki- dá. moon one-real-when metal-white ten- when two on-sit 1PAT-V<sub>1</sub>-DAT-pay month one when money twelve me (he) paid He paid me twelve dollars a month.

In the Dhegiha languages a frequent minority pattern is OVS. This pattern is especially prevalent in modern Omaha, where it appears in both texts and elicited materials consistently about eleven percent of the time (Catherine Rudin, p.c.). I have also encountered it often in Kansa. In the Dorsey Quapaw texts it is much less frequent, but it does occasionally occur.

- 19.2. Position. OV languages are generally postpositional, and this is certainly the case in Quapaw.
- (84) ní mạthé under the water
- (14) ešówe ettítha
  e- šówe e- ttí-tha
  DEM-already DEM-LOC-from
  already there from
  And from then on...
- 19.3. Possession. In OV languages, the possessor (possessive pronoun) generally precedes the possessed noun (see section 6.1). This

generalization holds true only for inalienably possessed kin terms in Quapaw. Alienably possessed nouns have a postposed pronominal prefixed to an invariant possessive base, -tta.

(85) šýkeákni dítta šýke-á-kni dí-tta dog on-sit 2PAT-POSS horse your your horse

Possessor nouns precede possessed nouns, and the alienable or inalienable possessive morphology is then present on the possessed noun.

- 19.4. Adjective order. In OV languages, adjective order is not entirely predetermined. It depends on the language, and in Siouan languages adjectives follow the noun.<sup>36</sup>
- (4) šǫkeákni wax?ó xotté žihí šǫke-ákni wax?ó xotté žihí dog-on-sit woman gray reddish horse female roan roan mare
- 19.5 Adverb placement. Like other complements, adverbs strongly tend to precede the verb that they modify (but see [7] for a counterexample).
- (20) ešý ettí ppáze hébe hí akdé.
  e-šý e-ttí ppáze hépe hí wa- ki- dé.
  DEM-yet DEM-LOC evening piece EMP 1AGT-VERT-go
  still here evening part I back go
  So already (that) evening I started home.
- 19.6. Subordination. In OV languages, verb forms subordinate to the main verb generally precede that verb. Quapaw relative clauses are nominalizations marked with clause-final *the*, the positional article for standing inanimates and abstract and deverbal nouns.
- (7) ákidáži hí the ašóži áttappá. á- ki- idé- aži hí the a- ki- šó- aži áttappá. 1PAT-DAT-tell-NEG EMP SUB, 1PAT-DAT-please-NEG much (he) me tell not very that me pleased not much I did not like it much that he did not tell me at all.

But while subordinate clauses most often precede the main clause in Quapaw, there are exceptions in the Dorsey texts. For examples, see sentences (6) and (22).

- 19.7. Auxiliary placement. In OV languages, the auxiliary verb follows the main verb. This is clearly the case for the positional, negative, and imperfective auxiliaries in Quapaw.
- (11) kọi sợt tạ ekí ži b de ttánihé.

  kọi sợ-ttạ ekí ži wa- de tte- wá- nihé.

  there-yet-as elsewhere 1AGT go POT-1AGT-MOVING.CONT
  thus somewhere else I going will be
  So I am going to go somewhere else.
- 19.8. Question formation. OV languages often have question particles; i.e., verbal question markers, sentence-finally. The particle in Quapaw is e. If a negative answer is anticipated, ená is used. The particle appears to be used for both yes-no and question word questions.
- (86) wasóso t- tá- baye e cord 2AGT-BY.MOUTH-BREAK Q Did you bite the cord in two?
- (87) máhị š- kọ- t- ta e knife 2AGT-want 2AGT want Q Do you want a knife?
- (88) tti the hánaska e house the how big Q How big is the house?
- 20. Gender-sensitive particles. Siouan languages are among those that indicate the sex of the speaker by a grammatical particle that is usually postposed to the main verb (or nominal predicate) of the sentence. Generally, therefore, this particle ends the sentence. In most of the Dhegiha dialects, the particle denoting 'male speaker' is written hau. In Quapaw it seems to be used more in discourse to mark what could be called paragraphs. In this context it is used by both male and female speakers.<sup>37</sup>

The particle for 'female speaker' is written -e in the Quapaw texts collected by Dorsey (1890–94). Dorsey's Ponca, Omaha, Osage

Quapaw, and Kansa texts all show very consistent use of -e to mark declaratives. It is this distinction that I have made above when I have written the plural suffix as -awi/-awe. The form with -e is women's speech. Both hau and e are enclitics, but e fuses phonologically with the preceding verb stem by the  $V_1V_2 > V_2$  rule. There should be a variety of other gender-sensitive modal particles (such as imperatives and emphatics), but Dorsey did not always recognize them, and it will take further study of his text collection to identify and elucidate them.

The female declarative was consistently used by Maude Supernaw, as in wajini kdéttaha, apae óže hné 'White people, when they go home, dance all night'. Here hné is most likely Dorsey's na 'habitual aspect' with the female declarative.<sup>38</sup>

- 21. Evidentiality and quotatives. In traditional narratives, Quapaw, like most Siouan languages, frequently used quotative particles. In traditional tales most sentences end with *iyáwe* 'they say'. These particles also require further study.
- 22. Conclusion. There is very little in print on the Quapaw language, since, except for the work of James Owen Dorsey in the 1880s and 1890s, it was ignored by most scholars. The Dorsey collection in the National Anthropological Archives contains a respectable collection of typescript texts in Quapaw with interlinear translation. There is also a typescript dictionary consisting of over three thousand file slips being edited by Rankin. Dorsey also has a number of grammatical notes on the language in his files.

### Notes

Abbreviations. The following abbreviations are used: ANIM = animate article; COLL = collective article; DU = dual number; HAND = instrumental by hand, pulling'; INAN = inanimate; INVIS = deictic particle, distant, not visible; LY = lying positional article; NAR = narrative mode; PL = plural number; SG = singular number; SIT = sitting positional; STD = standing positional article; SUB = subordinating particle (one of the positional articles);  $V_1$  = compound verb root, 1st part; or first of two vowels;  $V_2$  = compound verb root, 2nd part; or second of two vowels; VIS = deictic particle, distant, visible.

- 1. This subgrouping is my own. The subgroup names in most cases go back to Voegelin (1941), as I believe it is best to conform to the established tradition in matters of nomenclature. The distantly related Catawban family contains Catawba and Woccon as well as probably other, unattested languages of the Carolinas.
- 2. I use the term *Dakotan* to refer to all of the related varieties usually designated as Dakota, Lakota, and Nakoda (Assiniboine, Stoney). See Parks and Rankin (2001).
- 3. My field work on the Quapaw language began in 1973 and for all intents and purposes ended less than a year later. Most of the Quapaw people with fluent command of their language were already gone. Several people who could remember the language to one degree or another were extremely helpful, however, and with their aid I have been able to interpret the transcription system used in the 1890s by James Owen Dorsey, a field linguist for the Bureau of American Ethnology. This, in turn, has given me a large collection of Quapaw texts and notes, as well as a typescript dictionary with which to work. The only area left unclarified by the field recordings plus the Dorsey collections is that of vowel quantity.

I should like to offer my heartfelt thanks to all of the Quapaws who have encouraged my work and want especially to thank those who recalled Quapaw words and sentences for me. These are, in chronological order, Odestine McWatters; †Alice Gilmore; †Mary Red Eagle; †Bill, Kugee, and Charles Supernaw; and, through her recordings, †Maude Supernaw. Without them this work simply would not have been possible. Gah-nee-geh.

4. Their term for themselves is Okáxpa, which contains the common Mississippi Valley Siouan root \*kaγ- 'south' or 'downstream'. They were called Akans(e)a by the French. There are many variant spellings. The actual term was borrowed from Algonquian, and it shows the Algonquian ethnonymic prefix a- ( < \*o-), but the root is likely Siouan. There is a kká·ze (Kansa) tribe and a kká·ze clan within most other Dhegiha-speaking groups, so it appears to be an old ethnonym. The Illinois Algonquian tribes and the Shawnees called the Ohio River or one of its tributaries River of the Akansa' and the pecan 'the Kansa nut' (Ives Goddard, p.c.). The Quapaws even told Dorsey at one point "We are 'Kanze' too," so it is possible that this was once the ethnonym of the Dhegiha-speaking people generally. The term is often said to have to do with the wind or the south wind, but there are other pan-Dhegiha terms for both of these concepts, so it is unlikely that that was the original meaning of kká·ze.

- 5. Wolff's statement, though inaccurate, has been quoted by linguists, archaeologists, and ethnohistorians numerous times. It is difficult to know what impressionistic criteria his Osage linguistic informant used in rendering such a judgment. He may have based his opinion on low-level phonological differences. Quapaw itself was so poorly known during this period that Wolff said that "Kansa and Quapaw material is so scanty that it is impossible at the present time to give the phonemes of these dialects" (1950:64).
- 6. See Rankin (1988) for additional discussion of some of these features.
- 7. The distinction in Quapaw may be be dual vs. plural. However, "the Lakhota facts are that ?µk- alone is used for 'you and I, dual subject'; any non-singular object and any non-dual, as well as all exclusives, requires -pi. I think that indicates an inclusive/exclusive distinction in the dual" (David Rood, p.c.). The situation is less clear in Dhegiha, where the plural may not be exclusive of the person addressed, so perhaps Nichols's predictions are not quite fulfilled by Quapaw.
- 8. Siebert (1989) writes the Quapaw tense stops as post-aspirated stops (Ch) word-initially but as pre-aspirates (hC) medially. His transcription of the initial stops, based as it was on only a brief field session with the language, would have to be judged incorrect, as reflexes of common Dhegiha \*hC stops are quite uniform throughout the subgroup and it is not possible that these consonants were post-aspirates circa 1940. His short sample did not include any terms with actual post-aspirated stops that would have permitted him to hear the contrast, however. If he heard pre-aspirates medially, then there must have been a variant of Quapaw spoken in the 1940s in which tense stops were preaspirated (hC) rather than the geminates (CC) which I recorded. Dorsey's transcriptions from the 1890s show no preaspirates either, but the tense stops of neighboring Osage are preaspirated even today, and one group of Quapaws lived among the Osages for an extended period. It is probable that Siebert's speakers were from among this group.
- 9. Quapaw sibilants are often retroflexed when preceding non-front vowels. This is another areal feature in the Southeast found also in Muskogean, Tunica, and Natchez (Rankin 1977b). This feature seems to be lacking in all four of the other Dhegiha dialects.
- 10. There is some evidence to suggest that long a becomes q in Quapaw. Systematic differences with other Dhegiha dialects in this regard may help us understand vowel length to a degree.

- 11. This has long been known to be the case for Crow, and it is also evidently the case for Hidatsa (A. Wesley Jones, p.c.) and for Mandan (Richard T. Carter, p.c.). Kenneth Miner, in numerous publications, has established a similar rule for Winnebago. These four at least seem to be mora-counting languages. In addition, Dorsey's considerable difficulty determining the correct placement of accent in his Biloxi materials may reflect a search for stress in a language where pitch was the primary feature. Dorsey and Swanton (1912) show a great deal of variation in accent placement.
- 12. Some Dakotan nouns are affected also, e.g., šýka~šýke 'dog'. This may have occurred when such nouns acted as predicates, or there may be more complex historical reasons. In a few instances, e.g., \*ré·(he) 'go', accented vowels are affected also. The best treatment of the Dakota data is probably still Boas and Deloria (1941), as it is the least affected by particular theoretical assumptions about phonology in general. Boas and Deloria considered the unaccented, ablauting -a of Dakota to be epenthetic, and, although this solution may be made to work synchronically, it cannot be the case diachronically throughout Siouan, since the vowel is present as -e (or a reflex thereof) in virtually every Siouan language. If epenthesis was ever involved, and I doubt that it was, it must have happened over three thousand years ago.
- 13. Koontz (p.c.) mentions the same four conditioning environments in closely-related Omaha. This is not to imply that he analyzes the rest of the problem as I do. Any differences of analysis here will probably revolve around assigning the a to the plural and negative morphemes instead of, irregularly, to the end of the verb stem (with the plural and negative analyzed as -wi/-we; -že). The clitic particles cognate to -aže and -awi/-awe are clearly separable in Osage (Carolyn Quintero, personal communication) and in Kansa though, and can be pronounced (with their initial a-) in relative isolation. With such evidence available, it strikes me as obscurantist to label this phenomenon ablaut in the true sense of the word. Nevertheless, alternation of tte 'potential' with tta preceding conjugated forms of nikhé 'continuative', as well as the presence of the -a variant in reduplications, remain phonetically unexplained in the vowel-coalescence scenario.
- 14. The prefixal distinction supposedly found in Dakota between body parts that can be controlled willfully and those that cannot is not found in Quapaw or in any other Siouan language outside of Dakota.
- 15. Quapaw, like all of the Dhegiha languages, has an Omaha-type kinship system. The system is much too extensive to present in detail here. Suffice

it to say that the vast majority of Omaha kinship terms have exact Quapaw cognates. The system of possessives and the special terms for one's own mother and father are also shared by all five Dhegiha tongues. There is also a pan-Dhegiha system of special birth names for first, second, third, etc. sons and daughters.

- 16. Note that there is no inclusive (dual) inalienable prefix; the system is limited to the first three persons. There is, however, an alienable inclusive.
- 17. Dorsey lists the third person singular possessive prefix as e-rather than the i-that I have heard.
- 18. Dakotan, for example, has ki (usually just ki) 'the' and a second article,  $k^2\mu$ , often translated as 'past' or as 'the aforementioned'. The latter is most likely a historical compound of ki and  $^2\mu$  'do'. The verb  $^2\mu$  often forms the basis for a past tense marker (in Quapaw the imperfective) across much of Siouan. The usual initial syllable vowel syncope would apply, as in the case of pronominal prefixes.
- 19. Lack of cognacy specifically within the Muskogean positional verb system and its suppletive stems suggests that the category spread across Muskogean in response to some stimulus (Rankin 1978). Different Muskogean languages responded to this stimulus by creating a system of suppletive positional auxiliaries from a diverse set of pre-existing verb roots.
- 20. This system of marking subject and object noun phrases (i.e., nominatives and accusatives) with different articles in Omaha-Ponca may cross-cut the active-stative system described here for Dhegiha verbs. However, Koontz (p.c.) has suggested that these articles may be participating in a kind of proximate-obviative marking system and not a subject-object marking system at all. More research in the extant Dhegiha languages is clearly needed on this interesting subject.
- 21. There has never been a satisfactory explanation as to why an enclitic that marks plurals nearly exclusively in other contexts is also used with the third person singular forms of verbs in their non-continuative forms. Use of -awi/-awe (or their cognates) in the third person singular is characteristic of all five Dhegiha dialects, though.
- 22. The Quapaw continuative auxiliary nikhé be sitting appears to form a nasal subclass of R-stems. Its conjugated forms 1s mikhé, 2s nikhé, and 3s nikhé are distinctive, but historically the second person singular form was \*š-nikhé, so that only the first person singular form may be irregular. The expected form, if the verb is indeed an R-stem variant, would have been a non-occurring first person singular \*\*m-nikhé. Otherwise, the verb is unique.

23. The ? in the third person singular form is underlying. It surfaces in various compound verbs, but in the plain form of the third person singular it is generally not present. In Quapaw it is replaced by n- in the imperfective auxiliary variant of the verb.

24. This is one of very few verbs in this subclass. The prefix i- is probably a lexicalized instrumentive prefix. It gives the verb the appearance of having infixed pronominals. The verb 'be lying' is another well known W-stem in Dakota. In the L-dialect it takes the form yuka and in the D-dialect the form waka. To ask' is irregular in different ways in the several Dhegiha dialects. I have tried to choose the most conservative forms in each case for this sketch, but in Omaha-Ponca there are a number of variants. Quapaw first person dual and first person plural forms are not attested. Kansa has moved the verb into the R-stem class, while Osage has competing sets, one with an R conjugation and the other with the W conjugation. Koontz (p.c.) has suggested that W-stems are really glottal stems with the ? replaced with an epenthetic \*w or \*r, depending on the language. The conjugation patterns are rather similar. Koontz's analysis should be kept in mind, since lay, one of the Dhegiha verbs of placing, has a root in ?o which is probably related to \*wuke be lying'. Thus, W-stems may indeed be secondary in Siouan. The reason for much of the variability in these stems is that the Proto-Siouan sequence "wy is inherently unstable and resolves itself via dissimilation into either wa or ru; i.e., either the vowel or the consonant regularly dissimilates.

25. Distinctive first person dual and plural markers are cognate only across Mississippi and Ohio Valley Siouan; Mandan, Crow, and Hidatsa forms are unrelated. Where the forms are cognate they are prefixed to the left of nearly all other elements. This in itself suggests relatively recent origin or reanalysis. In addition, first person dual and first person plural fail to participate in the inalienable possessive paradigms with the other persons. The prefix is reconstructible in the subgroups where it occurs as \*wậk- and as such is homophonous with the root for 'person', a possible source.

26. Dual and plural first person patient forms are not included here as they are not widely attested and not at all attested for this verb. The likely form would be \*\*(w)óthiwe (from underlying wa-ó-thi-awe) 's/he hit us'. Such a form is ambiguous however, as -(a)wi/-(a)we can mark third person singular forms and also can pluralize either the agent or an animate patient, so that the meaning might be 's/he hit us', 'they hit us', 's/he hit them', etc.

27. This by no means exhausts the conjugation types or possible combinations of pronominals, locative prefixes (a- 'at, on', o- 'in', i- 'toward', and i-

- 'with'), instrumentals, etc. There are many other minor classes that could only be detailed in a much larger work.
- 28. I lack the Omaha-Ponca forms for this verb. However, the stative prefixes are 1s a-, 2s  $\delta i$ -, 3s  $\emptyset$ , and 1d wa-; i.e., perfect cognates for the Quapaw and Kansa (and Osage) forms.
- 29. The same initial syllable syncope rule and cluster reduction that affects the other person prefixes (above) apparently collapses underlying kik- $diž\acute{a}$  to k- $diž\acute{a}$ . This rule affects all R-stems, i.e., Quapaw verbs beginning with d-, the local reflex of  ${}^{\bullet}r$ .
- 30. The inner instrumental prefixes would seem generally to be the older ones, those found with cognates across Siouan. The outer group would appear to be newer prefixes. Tá- by extreme of temperature' (usually by heat') has cognates in many languages including Catawba (where it is a verb), but still may be a recent addition to the instrumental set. It is the only one of the prefixes that can be used in Quapaw in conjunction with another instrumental prefix.
- 31. This pattern is reminiscent of the patterns found in Muskogean languages with -ka 'middle voice' and -li 'active voice' as well as with Muskogean causatives. In the eastern Muskogean languages -ka and -li have taken on person-number marking and function as full-fledged auxiliary verbs (see Booker 1980). In western Muskogean they have remained simple voice marking morphemes and no trace of person-number marking is present.
- 32. This is a provisional translation for -he; a more specific meaning is hard to establish. It does not occur as an independent stem separate from these compound verbs in any Siouan language as far as I can tell. It is conjugated like 'say', with which it is partially homophonous, but any etymological connection with 'say' would be extremely speculative at this point.
- 33. All are derived via what is beginning to look like a frozen causative prefix k-, which, in passing, might also explain the relationship between Dakotan  $t^2E$  'die' and kte 'kill'.
- 34. Note that 'set' uses the root na rather than the current Quapaw article for sitting objects, nikhé. As mentioned above, na was the common Dhegiha article for inanimate sitting objects, replaced in Quapaw, Osage, and Kansa by other articles but still current in Omaha and Ponca. It has been kept here, frozen in the derived causative verb.

- 35. The causative takes the regular person markers and does not behave phonologically like an R-stem (i.e., a verb with Quapaw initial d) because the d in this instance is historically epenthetic.
- 36. Those OV languages with ADJ-N order are members of language families (such as Altaic and Uralic) in which there is a well-defined class of adjectives. Under such circumstances adjectives would naturally be dependents, and their nouns would be heads. In the numerous right-headed American Indian languages that have N-ADJ order there is no well-defined class of adjectives. "Adjectives" in those languages (including Quapaw) are all inflected as stative verbs, and as such may be looked upon as the heads of their respective constructions. The treatment of the category labeled adjective in most studies of syntactic typology has generally been quite Eurocentric.
- 37. Trechter (1993) shows that female use of male clitics (and vice versa) is not uncommon in Lakota. Her exception types and strategies very likely extend to other Siouan languages as well.
- 38. Unfortunately Mrs. Supernaw's very clear taped pronunciation also strongly suggests that Dorsey failed to transcribe initial hn- clusters in Quapaw, omitting the h in each instance (hn- here from Proto-Siouan \*sn-).