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Wóxtjanato: A grammar by Jessie Sams

## 1. Introduction

In his book What if the Earth had two moons?, Neil F. Comins conducts a thought experiment, writing about potential consequences of Earth capturing a second large-mass moon. He details several possibilities, including more drastic high tides and fewer possibilities of coastal living without engineered planning, such as manmade structures to keep out the tides; brighter nights, potentially resulting in different camouflage systems for prey and more intelligent nocturnal predators that rely on other senses, such as smell, sound, and heat detection; more meteoric showers and, potentially, meteor impacts; more solar eclipses; and a more complex calendar with full and partial months. He further states that the new moon might have volcanic activity visible from Earth, a potential source of inspiration for mythical lore. On Cornell's Ask an Astronomer website, astronomer Amelie Saintonge writes that multiple moons could result in three or more high tides per day and a more irregular tidal cycle, but she writes that weather and seasons are less likely to be affected.

Inspired by these thought experiments of imagining a world with more moons, my conworld is set on a future Earth, where life as we know it was forever altered by the appearance of a second moon. This "new Earth" has stabilized since the appearance of the second moon, and human societies have redeveloped, appearing around the globe; however, they face more competition for land and living space. Our new Earth has less viable land for living because coastal living is more dangerous with the higher tides, especially when the two moons are aligned, causing the tide to rise even more, and because the new moon caused a period of intense tsunamis and earthquakes that changed the Earth's landscape. Furthermore, several intelligent predatory species that also compete for land space have evolved, threatening human civilizations around the world. The humans of this earth look very much like our humans of today with the exception of their eyes: their pupils are smaller, and they do not dilate as much or as easily because this new Earth does not experience as much darkness. While not visible with the naked eye, they also have more nerve endings, especially in their fingers and toes, with heightened touch sensors.

In the New Earth, humans are struggling, and even the heartiest who are surviving must combat both nature and human inclination to dominate the land or other available resources. When humans do come in contact with each other, battles frequently break out, resulting in more deaths. While human lore contains stories of civilizations past, the humans of New Earth struggle with daily life, having to essentially start over, rediscovering how to cope with nature. Although humans have repopulated areas around the globe, their civilizations are much smaller than modern ones, numbering in the thousands and rarely, if ever, numbering in the tens of thousands. The majority of settlements or villages number in the hundreds.

My focus is on one human civilization in particular, the Wóxtjana. The Wóxtjana village is large enough to accommodate their population of several thousand; depending on the year and circumstances, their population typically remains in the 3,000-5,000 range. The Wóxtjana have settled in Old Earth's western Europe; ${ }^{1}$ they live in a hilly, grassy area that, in happier times, could be an idyllic setting for a romantic, swashbuckling adventure story. As it is, though, the hills are both beneficial and ominous: on the one hand, they offer protection and visibility to the hilltop-dwelling Wóxtjana; on the other hand, their valleys provide sinister hiding places for enemies. In their hilltop city, the Wóxtjana have developed technologies reminiscent of our own Classical civilizations, including stone structures, fortification walls, ships primarily made for fishing or food gathering, aqueduct systems, mills, and swords. In low tides, they live nearly a mile from the nearest coast; however, in the highest tides, the water level rises to meet

[^0]their outer aqueduct structures and fill their reservoir that provides the city within their walls with water. The time of highest tides is a time of celebration. ${ }^{2}$

They are primarily an agrarian, self-sustaining society, living on means within their walls, taking advantage of planting and harvesting seasons to stockpile food for the seasons when food is scarcer. The bravest Wóxtjana are the soldiers and fishers, who explore the unpredictable sea to gather additional sources of food and are the first line of defense when the village is attacked. They prefer to brave the waters rather than hunt farther inland due to the dangers presented by predatory species that live and hunt on land.

Due to harsh living conditions, the Wóxtjana typically have shorter life spans, so their notion of "childhood" is different from many modern notions. After birth, babies are typically raised by their mothers and their mothers' extended family. All children are expected to help in the home with raising babies, growing food, and cooking until they begin their apprenticeship. Boys tend to become apprentices by the time they are 8 or 9 years old, readying themselves for service by the time they are 14 or 15 . Girls tend to begin their apprenticeships by the time they are 6 or 7 ; they often become $v w$ énbu ${ }^{3}$ starting when they are 13 to 15 years old. The family works together to care for their $v w \varepsilon ́ n b u$, often prioritizing their health to ensure their family line continues.

When children mature enough to be placed in an apprenticeship, they participate in an official naming ceremony and are publicly placed into an apprenticeship based on their skills and abilities. Each apprentice is also assigned a mentor in their future line of work, and they typically spend 6-7 years with their mentor before officially joining their line of work. Future employment opportunities include the soldiers (who are also fishers and hunters), stone masons, planters and millers, iron workers (or blacksmiths), animal tamers and caretakers, cookers and brewers, seamsters, ${ }^{4}$ tjáro, ${ }^{5} v w \varepsilon ́ n b u$, and scholars. Regardless of skill and ability, all Wóxtjana are expected to contribute to their community-so much so that their words for 'good' (júlom) and 'bad' (néxom) can also be translated as 'useful' and 'useless,' respectively, indicating that a person who is useful to their community is a good person while a person who does not contribute is useless and, therefore, a bad person.

In earlier times, they revered their scholars, who were sought out for their wisdom. Because the scholars tend to live longer than people in professions, they have less turnover and less need for new apprentices, and they are selective when choosing a young apprentice. More recently, the larger community has started to question how apprentices are selected, with the general sentiment being that the process is nepotistic, and they question the role of the scholars in their day-to-day running of the village. The scholars typically spend their days examining remedies, history, and patterns in the sky, especially focusing on the positions and movements of the three celestial bodies that embody their goddesses, Xlévwenda (the sun goddess), Kitวvu (the first moon goddess), and Xáqृ\&\&u (the second moon goddess). One point of contention with the larger community is that while the scholars share some information with the villagers, they refuse to share all their knowledge, including their vast knowledge of remedies. Perhaps keeping that knowledge to themselves is a way of securing their place within the village during this time of discontent.

The conflict between the community and scholars has started a rebellion, and thus far two scholars have already been assassinated, and the rebels have overthrown their government, which placed the scholars as leaders, in favor of a reigning warlord ${ }^{6}$ whose main purpose is to protect them from

[^1]invaders. The warlord is chosen through skill and strength; unfortunately, intelligence is only a factor insofar as their ability to outsmart another warlord to overthrow him. Along with their internal battles, attacks from outside invaders have become increasingly frequent and fatal. The more frequent the attacks become, the less unified the village becomes, and smaller bands led by rebels are attempting to undermine the current warlord's power. Unbeknownst to them, as they grapple over leadership rights and territory, bands of hungry krýksa ${ }^{7}$ advance closer to the village's outer boundaries; scholars have tried to warn the village that they are headed for another lean harvest season, putting more predators on the prowl than usual, but few are listening.

## 2. Sounds

Wóxtjanato is not related to any current world languages, so it does not belong to any known language family. With its phonemes, syllable structures, and stress patterns, though, it sounds vaguely Indo-European, which may indicate that the language shares ancient roots with one or more IndoEuropean languages of Old Earth. However, these potential roots become less viable when considering aspects of the language's grammar and vocabulary.

The language has 20 consonant sounds, which are provided in the following IPA chart. ${ }^{8}$ The language phonemically distinguishes between voiced and voiceless counterparts within three manners of production: stops, fricatives (with the exception of the velar fricative [ x$]$, which does not have a voiced phonemic counterpart), and affricates. All other manners of production appear as voiced phonemes only.

|  | Bilabial |  | Labiodental |  | Alveolar |  | Palatal |  | Velar |  | Uvular |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stop | p | b |  |  | t | d |  |  | k | g |  |  |
| Nasal |  | m |  |  |  | n |  | $\mathrm{n}^{*}$ |  |  |  |  |
| Trill |  |  |  |  |  |  |  |  |  |  |  | R |
| Fricative |  |  | f | v | s | z |  |  | x |  |  |  |
| Affricate |  |  |  |  | ts | dz |  |  |  |  |  |  |
| Approximant |  | $\mathrm{w}^{*}$ |  |  |  |  |  | $\mathrm{j}^{*}$ |  |  |  |  |
| Lateral <br> approximant |  |  |  |  |  | l |  |  |  |  |  |  |

Table 1. Wóxtjanato consonants
The three consonants appearing with an asterisk in Table 1 cannot serve as codas for syllables; all other consonants can function as both syllable onsets and codas.

The language includes nine vowel sounds, all of which are monophthongs; within the front vowels, the close and close-mid vowels have phonemically distinct rounded variations, leading to a slightly asymmetrical vowel system. ${ }^{9}$

[^2]|  | Front | Back |
| :--- | :--- | :--- |
| Close | $\mathrm{i}, \mathrm{y}$ | u |
| Close-mid | $\mathrm{e}, \varnothing$ | o |
| Open-mid | $\varepsilon$ | 0 |
| Open |  | a |

Table 2. Wóxtjanato vowels
Wóxtjanato vowels can occur in both closed and open syllables and do not appear in reduced forms; that is, even in unstressed syllables, the vowel quality remains the same. While vowels can be lengthened or nasalized in particular environments, neither qualities are phonemic.

The syllable structure, (C)(C)V(C), allows for onset consonant clusters that follow the sonority hierarchy below:

$$
\text { voiceless stop }>\text { voiced stop }>\text { fricative }>\text { nasal }>\text { trill }>\text { approximant }>\text { nucleus }
$$

This hierarchy is similar to many other languages and follows the basic universal hierarchy presented in Parker (2002), ${ }^{10}$ with the exception of the affricates, which cannot occur in Wóxtjanato consonant clusters. Further restrictions on consonant clusters include the following:

- consonants in a cluster must skip a step in sonority
- velar fricatives cannot appear as the second sound in a cluster
- the two consonants must have different places of articulation

Along with these restrictions, the alveolar fricatives are exceptions to many of these rules: they can appear before stops, placing them in front of the rest of the hierarchy and can co-occur with other alveolar consonants. The attested clusters are provided below:

| Initial alveolar fricative | $\mathrm{l} p, \mathrm{st}, \mathrm{sk}, \mathrm{sm}, \mathrm{sn}, \mathrm{sf}, \mathrm{sR}, \mathrm{sw}, \mathrm{sj}, \mathrm{sl}$ <br> $\mathrm{zb}, \mathrm{zv}, \mathrm{zR}, \mathrm{zw}, \mathrm{zj}, \mathrm{zl}$ |
| :--- | :--- |
| Initial voiceless stop | $\mathrm{pf}, \mathrm{ps}, \mathrm{pn}, \mathrm{pr}, \mathrm{pj}, \mathrm{pl}$ <br> $\mathrm{tr}, \mathrm{tw}, \mathrm{tj}$ <br> $\mathrm{ks}, \mathrm{kn}, \mathrm{kR}, \mathrm{kw}, \mathrm{kj}, \mathrm{kl}$ |
| Initial voiced stop | $\mathrm{br}, \mathrm{bj}, \mathrm{bl}$ <br> $\mathrm{dr}, \mathrm{dw}, \mathrm{dj}$ <br> $\mathrm{gn}, \mathrm{gR}, \mathrm{gw}, \mathrm{gj}, \mathrm{gl}$ |
| Initial fricative | $\mathrm{fR}, \mathrm{fw}, \mathrm{fj}, \mathrm{fl}$ <br> $\mathrm{vR}, \mathrm{vw}, \mathrm{vj}, \mathrm{vl}$ <br> $\mathrm{xw}, \mathrm{xj}, \mathrm{xl}$ |
| Initial nasal | mj <br> nw |

Table 3. Attested Wóxtjanato consonant clusters
Only vowel sounds can fill the nucleus of a syllable; that is, Wóxtjanato does not have any syllabic consonants. Finally, as mentioned previously, three consonant sounds do not appear as codas: [w], [j], and [ n ].

Stressed syllables often feature lengthened vowels, louder volume, and higher pitch. The stress pattern in left-edged, and primary stress is typically on the initial syllable, as in these examples, where the

[^3]syllable receiving primary stress is marked with an acute accent and the syllable receiving secondary stress is marked with a grave accent:

| a. (wó.xe) | 'country, land, territory' |  |
| :--- | :--- | :--- |
| b. | (wóx.tja).na | lit. 'people of the land' |
| c. | (wóx.tja)(nà.to) lit. 'language of the people of the land' |  |

As example (c) demonstrates, when secondary stress is assigned, it typically follows a trochaic rhythmic pattern. Furthermore, only syllables that are footed (i.e., they appear in parentheses above) receive stress, so [na] does not receive stress in (b) but does in (c).

Stress typically begins on the root of a word; for instance, the stress remains on the initial syllable of the base in the pair below:
(2) a. (xá.nc).dzu 'second moon goddess'
b. a.(xá.ne).dzu 'of the second moon goddess'

The majority of the grammatical prefixes, which will be discussed in the next section, are unstressed. The lack of stress on these prefixes make it more difficult to identify where stress should be placed and result in words with stress on final syllables, as in lei 'to me.'

Throughout the following sections, primary stress is marked on the nucleus of the syllable with an acute accent (áa), and any secondary stress on a prefix is marked with a grave accent (a). Only the secondary stresses falling on a prefix are marked, as all other secondary stress locations are predictable. For instance, the words in (2) are written as xáncdzu and axánċzu. These accent marks help not only in identifying the stressed syllables but also in identifying the word's root.

## 3. Grammar

The word order of Wóxtjanato is VSO, and its morphological type is largely agglutinating. Wóxtjanato shares many of the common correlations of other VO languages; the table below provides common features correlated with VO languages, based on $\operatorname{Dryer}(2011,1992)$, aligned with features in Wóxtjanato.

| VO languages | Wóxtjanato |
| :--- | :--- |
| V - PP | V - PP |
| T/A.prefix-V | V-T/A.suffix |
| aux-V | aux V |
| prep - NP | prep-NP |
| N - Gen | N- Gen |
| N - Dem | N-Dem |
| Art - N | N-Art |

Table 4. VO correlations
As the table above demonstrates, the majority of Wóxtjanato's grammatical features align with the common correlations expected for VO languages.

Bromberger (2011: 49) defines the distinguishing features of a 'word' by establishing "syntactic, phonological, and semantic features," focusing on information such as morphological clues (e.g., affixation, compounding) and stress assignment. The notion of 'word' in Wóxtjanato is akin to the notion of 'phrase' in English: a single Wóxtjanato word incorporates several layers of grammatical and semantic information. Because the notion of 'word' differs across languages, Haspelmath (2012: 123) argues for using the term 'root' instead, and relying on the term 'root' helps to distinguish among the types of roots and their features in Wóxtjanato, including grammatical and phonological features.

Haspelmath (2012: 123) identifies the three major categories of roots cross-linguistically: "thingroots (e.g. tree, door, child), action-roots (e.g. run, talk, break) and property-roots (e.g. good, old, small). These groupings of roots typically behave similarly (i.e. 'tree' behaves like 'door', 'run' behaves like 'talk', 'good' behaves like 'old', etc.)." In Wóxtjanato, the property-roots behave grammatically similar to the action-roots; in other words, Wóxtjanato adjectival roots follow the same structures as verbs, though they are more restricted in their inflections than verb roots, which is a common feature across languages that have verb-like adjectives (cf. Dixon 2004: 16).

Therefore, Wóxtjanato has two major root categories: verb roots, which includes a subcategory of verb-like adjectives, and noun roots, which includes a subcategory of pronouns. The language does not have a clear class of adverbs or adverb roots, ${ }^{11}$ and grammatical information is encoded through affixation on the root categories. Phonologically, all roots share these features: the initial syllable of roots carry primary stress, and the final syllable is open. The majority of Wóxtjanato prefixes are unstressed, but suffixes can carry secondary stress, following a trochaic rhythm that begins on the initial syllable of the root. The following sections provide further information about Wóxtjanato grammatical structures, focusing first on verb roots and noun roots before turning to larger clause structures.

### 3.1 Verb roots and verb phrases

Verb roots can combine with six categories of inflectional affixes; the object- and subjectagreement markers can carry secondary stress.

| -3 <br> Mood | $\begin{gathered} -2 \\ \text { (Object) } \end{gathered}$ | $-1$ <br> (Negation) | $\begin{gathered} \hline 0 \\ \text { ROOT } \\ \hline \end{gathered}$ | $+1$Tense |  | $+2$ <br> Aspect | +3 <br> Subject |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\emptyset$ - ind. | tji- 1 s | ne- neg. |  | - $\varnothing$ | pres. | - $\varnothing$ simple | -ji | 1s |
| xet- int. | doo- 2 s |  |  | -k | past | -ع1 habit. | -os | 2 s |
| jif- sbj. | trø- 3s |  |  | -po | dist.past | -wi perf. | -عn | 3s |
|  | ska- 1p |  |  | -za | fut. |  | -0 | 1 p |
| dak- imp. | tsi- 2 p |  |  | -m | inf. |  | -su | 2p |
| le- opt. | twe- 3 p |  |  |  |  |  | -e | 3 p |
|  |  |  |  | -d | narr. |  | - $\varnothing$ | neut. |

Table 5. Wóxtjanato verb position chart
Of the six categories, the object marker and negation are optional while the other four are required. Wóxtjanato marks verbs for the following moods: indicative, interrogative, subjunctive, imperative, and optative. The examples below demonstrate the differences of interpretation of these prefixes, using the verbal root $x a$ 'laugh.'

```
a. xá-os
    laugh-2S,SUB
    'You laugh' (or 'You are laughing')
b. xet-xá-os
    INT-laugh-2S,SUB
    'Are you laughing?'
c. jif-xá-os
    SBJ-laugh-2S,SUB
    'If you are laughing' or 'I doubt you are laughing'
d. dak-xá-os
    IMP-laugh-2S,SUB
    'Laugh!'
```

[^4]e. le-xá-os

OPT-laugh-2S,SUB
'May you laugh.'
The imperative and optative prefixes can only be used with the unmarked present tense and simple aspect. If the imperative appears with a second-person subject marker, it is interpreted as a command: laugh! However, if it appears with a third-person or first-person subject, the interpretation shifts to a hortative mood to suggest encouragment or an urging: Let him sing! or Let me sing!

Wóxtjanato verbs can be conjugated for five tenses and an infinitive. The present tense is unmarked while the other forms are marked through suffixes. Wóxtjanato has a binary past-tense distinction with a recent past and a distant past suffix; however, the future tense has a single marker. The following examples demonstrate the conjugations for tense on the verb ubum:

```
a. úbu-m
    run-INF
    'to run' or 'to be running'
b. úbu-ji
    run-1S.SUB
    'I am running'
c. úbu-k-ji
    run-PAST-1S.SUB
    'I ran' or 'I was running'
d. úbu-po-ji
    run-DIST.PAST-1S.SUB
    'I ran (in the distant past)' or 'I was running (in the distant past)'
e. úbu-za-ji
    run-FUT-1S.SUB
    'I will run' or 'I will be running'
f. úbu-d-ji
    run- NARR-1S.SUB
    'I run' or 'I ran' (used only in narrative accounts)
```

The present tense carries an interpretation of an ongoing state or action, as in (b), but the other tenses offer two potential interpretations when translating to English. The narrative tense appears only in storytelling and offers a wide potential of interpretations; it is similar to English's historic present tense, yet the surrounding context could indicate a past tense reading.

The aspectual markers interact with tense markers to create more distinct meanings. So far, all examples have been in simple tenses, meaning there are no overt aspectual markings on the verb forms. The following examples demonstrate the two explicit aspectual markers in Wóxtjanato:

```
a. gázo-\varepsilonl-\varepsilonn
    work-HAB-3S.SUB
    'S/he works (habitually)'
b. gázo-k-\varepsilonl-\varepsilonn
    work-PAST-HAB-3S.SUB
    'S/he used to work'
c. gázo-po-wi-\varepsilonn
    work-DIST.PAST-PERF-3S.SUB
    'S/he had worked (in the distant past)'
```

```
d. gázo-za-wi-\varepsilonn
    work-FUT-PERF-3S.SUB
    'S/he will have worked'
```

The habitual marker indicates an event or action that repeatedly occurs over time while the perfective aspect marks completion that occurred over time.

All Wóxtjanato verbs are marked for subject ${ }^{12}$, taking the subject marker that matches in person and number with the subject, as seen in the examples above. Verbs can optionally agree with the object, too, to create a more emphatic reading.


The object-agreement marker on the verb emphasizes the object, pulling attention to its status in the sentence structure, as in (a) and (b); in (c) and (d), the lack of the object-agreement marker provides a more neutral reading.

Wóxtjanato lacks an explicit passive voice; however, a passive interpretation exists when the subject suffix is neutral, or unmarked, and the object is both overtly marked on the verb and expressed in the larger sentence structure. In these instances, the subject is not expressed in the sentence structure.

| twe-blýza-k | to-kóni |
| :--- | :--- |
| 3P.OBJ-plant.and.grow-PAST | OBJ-flowers |
| 'Flowers were planted and grown' (or 'Someone planted and grew flowers') |  |

While the verb phrase is in the active voice, its structure lends to a passive interpretation.
The object-agreement marker on the verb allows for object-pronoun deletion in the full sentence structure, which is typically found in frequent expressions, such as the following:
(8) dzo-wíle-ji

2s.OBJ-love-1S.SUB
'I love you’
In more frequent expressions, such as ctowileji, the interpretation is a neutral one; that is, no emphasis is placed on the object. In other expressions, though, the object-agreement marker creates a slight change in interpretation:

[^5]```
dzo-dízo-za-ji
2S.OBJ-fight.with.swords-FUT-1S.SUB
'You, I will fight with swords'
```

The interpretation emphasizes the object of the verb, but even more emphasis can be provided by including both the marker and the object pronoun:

```
dzo-dízo-za-ji to-tý
    2s.OBJ-fight.with.swords-FUT-1S.SUB OBJ-2S
    'As for you, I will fight you with swords'
```

Perhaps because subjects are marked on all verbs, the same emphatic options are not available for subjects; in other words, inserting the subject pronoun into the utterance above would not provide a more emphatic reading.

The final inflectional morpheme in the verb position chart is the negation prefix, which, when used, appears directly before the root:

$$
\begin{align*}
& \text { ne-slǿftu-e }  \tag{11}\\
& \text { NEG-crawl-3P.SUB } \\
& \text { 'They are not crawling' }
\end{align*}
$$

When negating the present tense, the interpretation is that the action or state is not ongoing as of this moment, as in the example above. Adding the habitual aspect (ne-slóftu- $\varepsilon l-e$ ) creates the interpretation of 'they do not crawl,' which is ambiguous as to whether they are unable to do so or choose not to do so.

Wóxtjanato has a subcategory of verb-like adjectives, which tend to be more grammatically restricted in their use: they only appear in simple tenses and cannot take object-agreement markers because they carry an intransitive reading. Furthermore, while the imperative and optative prefixes may be used with some of these verbs, those options are much more restricted. The position chart for verb-like adjectives is provided below:

| $\begin{gathered} -2 \\ \text { Mood } \\ \hline \end{gathered}$ | -1 <br> (Negation) | $\begin{gathered} 0 \\ \text { ROOT } \\ \hline \end{gathered}$ | $\begin{gathered} +1 \\ \text { Tense } \end{gathered}$ |  | +2 <br> Subject |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\varnothing$ - ind. | ne- neg. |  | -ø | pres. | -ji | 1s |
| xe- int. |  |  | -k | past | -os | 2 s |
| jy- sbj. |  |  | -po | dist.past | -عn | 3 s |
|  |  |  | -za | fut. | -0 | 1 p |
| da- imp. |  |  | -m | inf. | -su | 2p |
| le- opt. |  |  |  |  | -e | 3 p |
|  |  |  | -d | narr. |  | neut. |

Table 6. Wóxtjanato verb-like adjectives position chart
While these verb-like adjectives tend to appear as intransitive verb forms (i.e., lacking an object), they can be used in transitive constructions to create a reading of "X caused Y to become Z." For instance, the verb binim means 'to be upright.'

```
a. bíni-\varepsilonn
        upright-3S.SUB
    'It is upright'
b. bíni-ji to-ná
    upright-1S.SUB OBJ-3S.C4
    'I set it upright'
```

```
c. *twø-bíni-ji
    3S.OBJ-upright-1S.SUB
```

Example (a) provides its typical use, which translates as a description of an object's state; however, in example (b), the presence of an object forces a transitive reading, indicating that, in this case, I changed its state to an upright position. Even with the transitive reading, though, object-agreement markers cannot appear with these verb-like adjectives, as demonstrated by (c), which is marked as ungrammatical.

### 3.2 Noun roots and noun phrases

Wóxtjanato has four noun classes, and the majority of nouns fall into the first three classes, which can be likened to gender in other languages. The Wóxtjana associate the classes with their three goddesses:

CLASS 1: Xlévwenda, the sun goddess
Class 2: Kítovu, the first moon goddess
CLASS 3: Xáncla, the second moon goddess
CLASS 4: ambiguous or unknown
In general, the fourth class is only used for vague or unknown referents, such as an object, animal, or person the speaker is not familiar with. Common nouns more arbitrarily belong to these classes, which affects their inflections and associated pronouns.

Proper nouns, though, are specifically associated with one of the three classes, based on qualities exhibited by the person or place.

CLASS 1: Xlévwenda, the sun goddess $\rightarrow$ intelligence, emotional strength, courage, honesty

CLASS 2: Kítovu, the first moon goddess $\rightarrow$ physical strength, aggression, unpredictability, liveliness

CLASS 3: Xánela, the second moon goddess $\rightarrow$ loyalty, patience, steadfastness, trustworthiness
CLASS 4: ambiguous or unknown $\rightarrow$ unfamiliarity, lack of unique qualities

Traditionally, children belong to class 4 until they are officially named, which typically occurs when a child is appointed an apprenticeship; throughout life, a child or adult may be renamed as different characteristics and traits emerge, and each name belongs to one of the classes, so the appropriate pronoun depends on the name rather than gender. ${ }^{13}$ Informally, though, men tend to be grouped into classes 1 or 2 while women tend to be grouped into class 3.

The position chart for Wóxtjanato nouns is provided below, providing the five major inflections nouns can carry.

| $-2$ <br> (Preposition) | $\begin{gathered} -1 \\ \text { Case } \end{gathered}$ |  | $\begin{gathered} 0 \\ \text { ROOT } \end{gathered}$ | $+1$ <br> Number |  | $+2$ <br> (Determiner) |  | $\begin{gathered} +3 \\ \text { (Class) } \end{gathered}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{aligned} & \varnothing- \\ & \text { } \text { to- } \\ & \text { le- } \\ & \text { a- } \\ & \hline \end{aligned}$ | subj. <br> obj. <br> dat. <br> gen. |  |  | sing. <br> pl. | $\begin{aligned} & \text {-an } \\ & \text {-ix } \\ & \text {-Ron } \\ & \text {-gan } \\ & \hline \end{aligned}$ | def prox.dem med.dem dist.dem |  | $\begin{aligned} & \hline \mathrm{c} 1 \\ & \mathrm{c} 2 \\ & \mathrm{c} 3 \\ & \mathrm{c} 4 \\ & \hline \end{aligned}$ |

Table 7. Wóxtjanato noun position chart

[^6]The unmarked form of common count nouns is the indefinite plural form (e.g., búre 'legs' and búret 'leg'). Class suffixes only appear with determiners and must follow the determiner suffix; therefore, indefinite NPs do not take a class marker, as demonstrated in these examples.

| a. | Rónsfe-e | vwýczi |
| :---: | :---: | :---: |
|  | flow-3P.SUB | rivers |
|  | 'Rivers are flowing' |  |
| b. | Rónsfe-e | vwýdzi-an-ja |
|  | flow-3P.SUB | rivers-DEF-C3 |
|  | 'The rivers are flowing' |  |
| c. | Rónsfe-cn | vwýczi-t |
|  | flow-3P.SUB | rivers-SG |
|  | 'A river is flowing' |  |
| d. | Rónsfe-\&n | vwýczi-t-an-ja |
|  | flow-3P.SUB | rivers-SG-DEF-C3 |
|  | 'The river is | wing' |

```

Because class markers require a definite or demonstrative marker to precede them, examples (a) and (c) are not marked for class while (b) and (d) are.

Non-count nouns (e.g., frégo 'origin') cannot take the singular marker and grammatically pattern as a plural noun, requiring plural pronouns and plural verb agreement markers.
\(\left.\begin{array}{lll}\text { a. } & \begin{array}{l}\text { Rónsfe-e }\end{array} \quad \text { íkro } \\
\text { flow-3P.SUB } & \text { uncontrolled.fire }\end{array}\right]\)\begin{tabular}{l} 
'An uncontrolled fire is flowing/spreading quickly'
\end{tabular}

As with count nouns, the class marker only appears with a determiner suffix, as in (b).
Proper nouns, especially nouns referring to well-known locations, deities, or concepts (such as a language name), do not need a singular marker to pattern grammatically as a singular noun and do not necessarily take a determiner and class marker pairing. For instance, kitวvu is the name of the first moon goddess and is a proper noun:
\begin{tabular}{ll} 
úbu-عl-єn & kítovu \\
move.quickly-HAB-3S.SUB & Kitovu \\
'Kitovu moves quickly' &
\end{tabular}

This well-known proper noun does not require the singular, definite, or class markers to grammatically behave as a singular definite noun. Personal names, though, can take the markers -tanwe, -tanu, -tanja, or -tani (with the final form being the least frequent as it indicates an absence of unique characteristics). \({ }^{14}\)

Within the determiner category, Wóxtjanato has three demonstrative suffixes: proximal ('this'), medial ('that'), and distal interpretations ('that way over there').

\footnotetext{
\({ }^{14}\) Not using the suffixes is a sign of respect or of an intimate relationship because it indicates the speaker knows what pronouns are appropriate for that person. If a person becomes so famous that their name is recorded throughout history, the ending eventually drops off entirely (e.g., a warlord whose memory lives on in tales told long after his death).
}
```

(16) a. Rónsfe-e vwýđi-ix-ja
flow-3P.SUB rivers-PROX.DEM-C3
'These rivers are flowing'
b. Rónsfe-e vwýdzi-t-ix-ja
flow-3P.SUB rivers- SG-PROX.DEM-C3
'This river is flowing'
c. Rónsfe-\varepsilonn vwýdzi-ron-ja
flow-3P.SUB rivers- MED.DEM-C3
'Those rivers are flowing'
d. Rónsfe-en vwýdi-t-gan-ja
flow-3P.SUB rivers-SG- DIST.DEM-C3
'That river way over there is flowing'

```

As these examples demonstrate, the demonstrative suffixes can appear with either singular or plural forms and, like the definite marker, require a class marker to follow. The distal demonstrative is typically used for non-visible nouns; therefore, example (d) is appropriate if the speaker knows the river is flowing but is standing in a position where it is so far away that the speaker cannot see it.

Nouns inflect for four cases: subject, object, dative, and genitive. The unmarked case is the subject, and all other cases are marked with an unstressed prefix.
\begin{tabular}{llll} 
a. & \begin{tabular}{ll} 
éle-e & vwéntja \\
plant-3P.SUB & women(C3)
\end{tabular} & \begin{tabular}{l} 
to-kóni \\
OBJ-flowers(C1)
\end{tabular} \\
& 'Women are planting flowers'
\end{tabular}
b. éle-k-en ákje-t-an-u to-éfi
hand.out-PAST-3SG.SUB leaders-SG-DEF-C2 OBJ-seeds(C1)
le-tja-ix-ja
DAT-women-PROX.DEM-C3
'The leader handed out seeds to these women'
\(\begin{array}{lll}\text { c. } & \text { xet-éle-\&n } & \text { ákje-t-an-u } \\ \text { INT-hand.out-3P.SUB } & \text { leaders-SG-DEF-C2 } & \text { to-kóni } \\ & \text { OBJ-seeds(C1) }\end{array}\)
a-tja-t-an-ja
GEN-women-SG-DEF-C3
'Is the leader handing out the woman's flowers'
In each example, the direct object carries the object case, which is marked with the to- prefix. The dative case, le-, typically represents an indirect object, which follows the direct object. Finally, the genitive case, \(a\)-, typically indicates the possessor, and, as seen in (c), the genitive NP follows the noun being possessed. Examples (b) and (c) further demonstrate that vwéntja loses its initial syllable when a grammatical prefix is added, becoming tjá.

Prepositions appear as prefixes on NPs, yet they differ in that they receive secondary stress with the initial syllable of the noun receiving primary stress. Prepositions require case-marking, and the majority of prepositions require the object case, as in the following examples:
```

a. ksì-to-ré-t
near-OBJ-trees(C3)-SG
'near a tree'
b. sàbjc-to-kwóne-gan-we
toward-OBJ-mountains-DIST.DEM-C1
'toward those mountains'

```

The preposition requires the following noun to be marked for case, with the case-marking syllable remaining unstressed.

Wóxtjanato's pronoun roots are more restricted in how their phrases are formed; the table below provides the pronoun roots:
\begin{tabular}{|l|l|l|}
\hline & Singular & Plural \\
\hline First person & i & kwo \\
\hline Second person & ty & tsu \\
\hline Third person, c1 & da & dje \\
\hline Third person, c2 & vu & øve \\
\hline Third person, c3 & de & ccae \\
\hline Third person, c4 & na & ni \\
\hline
\end{tabular}

Table 8. Wóxtjanato personal pronoun roots
Noun class is distinguished in both the singular and plural forms of third-person pronouns. A noun phrase headed by a pronoun root follows this pattern:
\begin{tabular}{|c|ll|l|ll|}
\hline \begin{tabular}{c}
-2 \\
(Preposition)
\end{tabular} & \multicolumn{2}{|c|}{\begin{tabular}{c}
-1 \\
Case
\end{tabular}} & \begin{tabular}{c}
0 \\
ROOT
\end{tabular} & \multicolumn{2}{c|}{\begin{tabular}{c}
+2 \\
(Determiner)
\end{tabular}} \\
\hline & \(\emptyset-\) & nom. & & -x & prox.dem \\
& to- & acc. & & -Ron & med.dem \\
& le- & dat. & & -gan & dist.dem \\
& a- & gen. & & & \\
\hline
\end{tabular}

Table 9. Wóxtjanato pronoun position chart
Demonstrative pronouns and possessive pronouns are built with the same prefixes as other NPs, placing the appropriate pronoun into the root position. While any pronoun can appear in a possessive phrase (e.g., aty' 'yours' or aóve 'theirs ( c 2 )'), only third-person pronouns can be demonstratives with a determiner suffix (e.g., *týgan 'that (2s)' is ungrammatical, but óvegan 'those way over there (c2)' is grammatical). Because the root indicates the noun class, the noun class suffix is not needed when adding the demonstrative suffix; therefore, teéx means 'this' and refers to a class 2 noun, and *teéxu is ungrammatical.

\subsection*{3.3 Clause structure}

As seen throughout examples in the previous sections, Wóxtjanato clauses are formed following a \(\mathrm{VSO}_{\mathrm{d}} \mathrm{O}_{\mathrm{i}}\) word order. In general, modifying phrases are placed directly after the constituent they are modifying; for instance, when the PP in the cave is moved within the clause structure in the examples below, the resulting interpretation shifts.
\begin{tabular}{|c|c|c|}
\hline \multirow[t]{5}{*}{a.} & kátnyso-el-en & àl-le-vóske-t-an-ja \\
\hline & examine-HABIT-3S.sUB & in-DAT-caves-SG-DEF- \\
\hline & to-brótsije & \\
\hline & OBJ-hoarfrost(c3) & \\
\hline & 'In the cave, the oracle & examines hoarfrost' \\
\hline
\end{tabular}
jézena-t-an-we oracle-SG-DEF-C1

OBJ-hoarfrost(c3)
'In the cave, the oracle examines hoarfrost'
```

b. kátnyso-\varepsilonl-\varepsilonn jézena-t-an-we àl-le-vóske-t-an-ja
examine-HABIT-3S.SUB oracle-SG-DEF-C1 in-DAT-caves-SG-DEF-C3
to-brótije
OBJ-hoarfrost(c3)
'The oracle who is in the cave examines hoarfrost'
c. kátnyso-\varepsilonl-\&n jézena-t-an-we to-brótsije-an-ja
examine-HABIT-3S.SUB oracle-SG-DEF-C1 OBJ-hoarfrost-DEF-C3
àl-le-vóske-t-an-ja
in-DAT-caves-SG-DEF-C3
'The oracle examines the hoarfrost, which is in the cave'

```

In each instance, the PP modifies the constituent directly before it.
Wóxtjanato lacks adverbs, instead relying on preposition phrases, which convey adverbial modification for the verb, as in the example below.
```

krýczo-os sà-to-ká
blather-2s.SUB with-ACC-intensity
'You are really blathering'

```

Manner is typically expressed with the sà preposition, as in this example.
There are two types of relative clauses in Wóxtjanato: attributive and (non-)restrictive. Verb-like adjectives can be used to create attributive readings of a relative clause, and these clauses differ in that they lack modality, tense, and aspect marking and carry agreement with the subject's noun class. Furthermore, this type of clause can only be used with nouns, third-person pronouns, or neutral subjects.
\begin{tabular}{|c|c|c|c|c|}
\hline \begin{tabular}{l}
\[
-1
\] \\
(Negation)
\end{tabular} & \[
\begin{gathered}
0 \\
\text { ROOT }^{v a}
\end{gathered}
\] & \[
\begin{aligned}
& \hline+1 \\
& \text { Rel } \\
& \hline
\end{aligned}
\] & \begin{tabular}{l}
\[
+2
\] \\
Subj. Num.
\end{tabular} & \begin{tabular}{l}
\[
+3
\] \\
Subj. Class
\end{tabular} \\
\hline ne- neg. & & -tj rel. & -\&n 3s & -we c1 \\
\hline & & & -e 3 p & -u c2 \\
\hline & & & -o neut. & -ja c3 \\
\hline & & & & -i c4 \\
\hline
\end{tabular}

Table 10. Wóxtjanato attributive relative clause structure
Regardless of the type of relative clause, they must directly follow the noun they modify. The example below demonstrates an attributive relative clause structure.
\[
\begin{array}{ll}
\text { gáva-k-e } & \text { kóni-an-we } \quad \text { ǿpra-ti-e-we }  \tag{21}\\
\text { bloom-PAST-3P.SUB } & \text { flowers-DEF-C1 red-REL-3P-C1 } \\
\text { 'The red flowers bloomed' }
\end{array}
\]

As in this example, the relativizer - \(t j\) follows the verb root, and the noun class of the subject is required for subject-verb agreement.

Full relative clauses can follow any noun phrase and are more diverse. Furthermore, they follow the object of the full clause structure (i.e., they appear at the end of the clause), regardless of which noun phrase is being modified. These relative clauses are introduced by a dependent clause marker, which is formed by placing the prefix \(i\) - before the appropriate pronoun, such as \(i d a \dot{a}\) 'who (3s, c1).' The rest of the clause structure follows that introductory pronoun, including only the full NP constituents that differ from the antecedent (i.e., the antecedent NP is referred to by the relative pronoun and does not appear within the RelCl structure).
\begin{tabular}{|c|c|c|c|c|}
\hline \multirow[t]{3}{*}{a.} & gáva-k-e & kóni-an-we & i-djé & ǿpra-e \\
\hline & bloom-PAST-3P.SUB & flowers-DEF-C1 & DEP-3P.3C & red-3p \\
\hline & \multicolumn{4}{|l|}{'The flowers, which are red, bloomed'} \\
\hline \multirow[t]{2}{*}{b.} & né-k-e & kóni-an-we & i-djé & gáva-k-e \\
\hline & wilt- PAST-3P.SUB & flowers-DEF-C1 & DEP-3P.3C & bloom-PAST-3P \\
\hline
\end{tabular}

In these examples of simple relative clause structures, the relative pronoun plays the subject role and appears at the beginning of the relative clause.

In the example below, even though the relative clause modifies vwéntjaronja 'those women,' it appears at the end of the clause after the direct object toléfjo 'berries.'
\begin{tabular}{llll} 
kítsi-k-e & vwéntja-Ron-ja & to-lćfjo & i-ć̇ce \\
squeeze-PST-3P.SUB & women-MED.DEM-C3 & OBJ-berries(C3) & DEP-3P.3C \\
ómwe-k-e & to-kóni & \\
grow-PST-3P.SUB & OBJ-flowers(C1) & \\
'Those women who grew flowers juiced berries'
\end{tabular}

Within the relative clause structure, the relative pronoun iźcze introduces the clause and plays the subject role within the clause.

When the relative pronoun plays the direct object role within the relative clause, the objectagreement marker is required. For instance, in the example below, itodé refers to 'woman' and plays the object role in the relative clause structure; the verb, then, carries the \(t_{R \sigma} \sigma\) - prefix to agree with the thirdperson singular object.
\begin{tabular}{|c|c|c|c|c|}
\hline \multirow[t]{4}{*}{(24)} & é-¢l-¢n & \multirow[t]{3}{*}{vwéntja-t-an-ja women-SG-DEF-C3} & \multirow[t]{3}{*}{to-xáýદla OBJ-beauty} & \multirow[t]{5}{*}{\begin{tabular}{l}
i-to-cké \\
DEP-OBJ-3S.3C
\end{tabular}} \\
\hline & have-HABIT-3S.SUB & & & \\
\hline & trø-nýso-ji & & & \\
\hline & 3s.OBJ-see-1s.SUB & & & \\
\hline & 'The woman I see & autiful' & & \\
\hline
\end{tabular}

As in this example, when the relative pronoun represents the direct object of the verb, the object role is double-marked without creating an emphatic reading: the relative pronoun carries the to- object case marker, and the verb takes the object-agreement prefix.

Standards for comparison are provided in preposition phrases headed by gàla 'more than,' gìdu 'less than,' or sa 'like,' and the phrase appears at the end of the clause, as in the following examples.
\begin{tabular}{|c|c|c|c|}
\hline \multirow[t]{3}{*}{a.} & \multirow[t]{2}{*}{\begin{tabular}{l}
vjúdo-en \\
tall-3s.suB
\end{tabular}} & \multicolumn{2}{|l|}{kónsi gàla-to-mjéto} \\
\hline & & Konsi & more.than-obJ-Mjet \\
\hline & \multicolumn{3}{|l|}{'Konsi is taller than Mjeto'} \\
\hline \multirow[t]{3}{*}{b.} & ne-vjúdo-en & kónsi & gàla-to-mjéto \\
\hline & \multicolumn{3}{|l|}{NEG-tall-3s.sub Konsi more.than-OBJ-Mjeto} \\
\hline & \multicolumn{3}{|l|}{'Konsi is not taller than Mjeto'} \\
\hline \multirow[t]{2}{*}{c.} & vjúdo-\&n & kónsi & gidu-to-mjéto \\
\hline & tall-3s.SUB & Konsi & less.than-OBJ-Mjeto \\
\hline \multirow{4}{*}{d.} & \multicolumn{3}{|l|}{'Konsi is not as tall as Mjeto (but they are both tall)'} \\
\hline & vjúdo-\&n & kónsi & sà-to-mjéto \\
\hline & tall-3s.sub & Konsi & like-OBJ-Mjeto \\
\hline & \multicolumn{3}{|l|}{'Konsi is as tall as Mjeto'} \\
\hline
\end{tabular}

Examples (a) and (d) provide the general, neutral comparison. Because vjúdom 'to be tall' has the antonym twigom 'to be short,' the examples in (b) and (c) carry nuances. Example (b) would be used to refute someone erroneously saying that Konsi is taller than Mjeto; otherwise, the speaker would have said twígoen kj́nsi gàlatomjéto ('Konsi is shorter than Mjeto'). Example (c) carries the implication that both Konsi and Mjeto are tall, but, of the two, Mjeto is taller, another possible translation for that sentence is 'Konsi is tall, but less so than Mjeto.'

Wóxtjanato lacks a copular verb but offers two methods for describing subjects: (1) a copular construction, which places the predicative NP before the intended subject NP, or (2) denominalization of a noun to create a verb-like adjective through the addition of a derivational prefix, which carries the primary stress when added to the root. The prefix used depends on the type of noun being denominalized:
\begin{tabular}{|ll|c|}
\hline \multicolumn{2}{|c|}{-1} & 0 \\
\multicolumn{2}{|c|}{ Noun type } & ROOT \\
\hline tø- & CC & \\
kwa- & CN & \\
meo- & PN & \\
\hline
\end{tabular}

Table 11. Wóxtjanato denominal derivations
The following examples demonstrate the copular construction and the denominalization of a noun:
\begin{tabular}{|c|c|c|}
\hline \multirow[t]{3}{*}{a.} & \multicolumn{2}{|l|}{ákje-t mjéto} \\
\hline & leaders(C2)-SG Mjeto & \\
\hline & 'Mjeto is a leader' & \\
\hline \multirow[t]{3}{*}{b.} & tó-akje-¢n & mjéto \\
\hline & CC.vA-leaders(C2)-3s.sub & Mjeto \\
\hline & 'Mjeto is leader-like' or ' & has lea \\
\hline
\end{tabular}

In (a), Mjeto is being identified as a leader; however, (b) indicates that Mjeto is like a leader or has the qualities of a leader without indicating whether he is, in fact, a leader. The next section provides more derivations like this prefix.

Dependent clauses providing adverbial modification are introduced by an appropriate prepositional phrase, typically following the main clause they modify, as in the example below:
\begin{tabular}{lll} 
áwa-k-ji & to-ńla-t-an-ja & i-dì-to-náo-x \\
sense-PAST-1S.SUB & OBJ-storm-SG-DEF-C3 & DEP-after-OBJ-3S.C4-PROX.DEM \\
klí-k-e & frági & \\
appear-PAST-3P.SUB \(\quad\) clouds(C3) & \\
'I sensed the storm before clouds appeared' (lit. 'I sensed the storm; after this, clouds \\
appeared')
\end{tabular}

In this example, the main clause, áwakji tonólatanja 'I sensed the storm,' appears before the adverb clause iditonáox klike frági ‘before the clouds appeared.' The adverb clause is introduced by the PP iditonáox, which literally translates as 'after this,' but English speakers would be more likely to use the subordinating conjunction 'before' when translating this utterance. The dependent clause prefix \(i\) - is joined to the introductory PP, which typically takes a neutral demonstrative pronoun, such as náox, in adverbial dependent clause structures.

When a dependent clause acts as a direct object of another verb, it is introduced by the conjunction itové, which consists of the \(i\) - dependent clause morpheme, to- object marker, and vé 'what.' If a dependent clause acts as a subject predicative, it takes the ivé conjunction, which lacks the \(t o\) - object marker. The example below includes both conjunctions.
\begin{tabular}{|c|c|c|c|c|c|}
\hline zékjo-en & jóknu-t & itové & jif-ýse-عn & ivé & dwéni-m \\
\hline believe-3S.SUB & fools-SG & CONJ & SBJ-able-3S.SUB & CONJ & tame-INF \\
\hline \multicolumn{6}{|l|}{to-krýksa-t} \\
\hline OBJ-kryksa-SG & & & & & \\
\hline \multicolumn{6}{|l|}{'A fool believes he is able to tame a kryksa'} \\
\hline
\end{tabular}

The dependent clause itové jifýsesn ivé dwénim tokrýksat functions as the direct object of zékjocn 'believes.' Because the clause indicates a situation that they deem impossible, the main verb in that clause, ýsecn, is marked with the subjunctive mood prefix jif-. Finally, the verb following ivé appears in the infinitive form because of the auxiliary-like verb ýsem 'to be able to.'

Indirect speech is indicated with a dependent clause following a verb of speech, such as ám 'to say,' while direct speech is indicated with a full clause following the verb kwétom 'to say.' While both verbs share a meaning, their grammatical uses differ; furthermore, kwétom tends to only appear in narratives.


The grammatical differences between the two examples include these features: (1) the lack of the conjunction itové before the second clause; (2) the switch from subjunctive in (a) to indicative in (b); and (3) the switch from a third-person singular subject agreement marker in (a) to a first-person subject agreement marker in (b).

\section*{4. Word-formation processes}

The two most productive word-formation processes in Wóxtjanato are compounding and derivation. Some words behave irregularly when compounded, requiring a combining form rather than the full word; these irregular combining forms are indicated in the dictionary with a hyphenated form included with the head word (e.g., wóxe, wox-). Many compounds can be classified as semantically endocentric, though there are exocentric, or less predictable, compounds in the language. As Bauer (2008: 66) notes, "Compounds tend to become opaque over time, both phonologically opaque and semantically opaque." Indeed, the exocentric compounds were once endocentric but have lost their semantic connections over time. Furthermore, some common compounds can be considered exocentric because of the loss of the phonological connections with the original morphemes.

Regardless of whether the compound is endo- or exocentric, compounds tend to be head-final when subordinate in relationship (as in (b) and (c) below).
(30) a. endocentric compound, full: báma 'biological parents' ba 'fathers' + ma 'mothers'
b. exocentric compound, full: ómwetja 'women who raise a child they did not birth' omwe 'rear, raise' + tja 'women'
c. endocentric compound, partial: lávjandi ‘musical instruments'
lavja 'pleasing sounds' + andj \(\varepsilon\) (andi-) 'instruments, tools'
d. exocentric compound, partial: dizekjum 'challenge to a duel' dizo 'fight with swords' + akje 'leaders'

The endocentric compounds báma and lávjandi as a whole represent the meaning of their individual morphemes; the exocentric compounds ómwetja and dizzkjum are less transparent in their meaning and application. In (c), the full word meaning 'instruments' or 'tools' is ándje, but its combining form is andi, and, in (d), the full forms of both morphemes dizo and ákje have been reduced over time, leaving a phonologically distinct form, dizzkjum. Because new warlords are historically determined through physical challenges, such as fighting with swords, the meaning of dizekjum also connotes a fight over leadership. However, the challenge may or may not include sword fighting, thus making that compound exocentric.

Some derivations in Wóxtjanato do not affect the lexical category of the root, as in the following examples:
(31) a. kat- (creates an intensified reading of the root) nýsom 'see, look at' \(\rightarrow\) kátnysom 'investigate'
b. nø- (creates a reading of forced action indicated by a verb to occur) gázom 'to toil' \(\rightarrow\) nǿgazom 'to be forced to toil'
c. wu- (creates a reading of change for a verb-like adjective)
élim '(of plants) to be healthy' \(\rightarrow\) wúelim '(of plants) to become healthy'
As these examples demonstrate, derivations tend to be prefixes, and they carry the primary stress when added to a root.

Other derivations affect the lexical category of the root, either turning a verb into a noun or a noun into a verb. The examples below demonstrate derivations that create verbs from noun roots:
(32) a. -ena ('those who VERB,' typically resulting in a C3 noun)
jézom 'to divine' \(\rightarrow\) jézena 'oracles, seers'
b. \(\quad\) li- ('state or condition of \(\mathrm{VERB}^{\mathrm{A}}\),' resulting in a C 4 non-count noun)
vjúdom 'to be long' \(\rightarrow\) ǿlivjudo 'lengthiness'
c. uts- ('instances of VERB,' resulting in a C4 count noun)
nótem 'to hunt' \(\rightarrow\) útsnote 'hunts'
d. \(\quad \varepsilon \mathrm{m}\) - ('quality or likeness of VERB,' resulting in a C4 non-count noun)
klím 'to exist' \(\rightarrow\) ह́mkli 'existence'
While the majority of derivations are prefixes, (a) provides an example of a derivational suffix, -ena, which turns a verb into a noun. Furthermore, the final vowel of the verb root tends to drop out when this suffix is added, as in j \(\dot{z} e n a\), where the final \(o\) of the root \(j \dot{z} z o\) is dropped when the suffix is added. The other derivations are regular prefixes, creating related noun forms out of verb roots.

The derivations that create verbs from noun roots are more limited, with the two most frequent prefixes creating verb-like adjectives from the noun root.
a. tø- ('to have features of COUNT NOUN,' resulting in verb-like adjective) mégwo 'wings' \(\rightarrow\) tǿm \(\varepsilon g w o m\) 'to be winged'
b. kwa- ('to have features of NON-COUNT NOUN,' resulting in verb-like adjective) órancza 'woods' \(\rightarrow\) kwáorancza 'to be wooded'

As these examples demonstrate, these derivational prefixes are sensitive to the grammatical type of noun forming the root, with \(t \sigma\) - attaching only to count nouns and \(k w a\) - attaching only to non-count nouns. However, the prefixes are not sensitive to the noun class; for instance, mégwo is a Cl noun and \(i l i\) ' joints ,' a C3 noun, takes the same prefix to create the verb-like adjective tóilim 'to be bendable.'

\section*{5. Writing system}

The Wóxtjanato have rich oral traditions to entertain with stories and riddles, challenge with fables and metaphors, track solar and lunar movements, and share history, whether that history is personal or social. Gosden (2008: 335) points out the fact that societies which rely on oral traditions to preserve history rely on memory and mnemonics:

The means by which the past is conserved, which we call history, is linked intimately to the manner of its loss. In societies with texts loss is changed through the fact of writing: the possibility of recording the past in words leads to greater possibilities for curation, but might lead to loss of memory. In societies without texts the curation of the past is primarily through memory and the various mnemonics that exist in performances, artefacts, and landscapes. The existence of texts does not mean that the past is better preserved in a straightforward way, but it is differently curated.

The Wóxtjanato curate and share information through repetition of shared stories during frequent communal gatherings. These stories are often set to melodies played on musical instruments and require audience participation; for instance, a story leader may suddenly stop in the middle of speaking and look to the audience to complete the oft-rehearsed story in unison.

The scholars developed a writing system, which they teach only to their apprentices, making written texts available for the class of scholars. While scholars are not necessarily considered elite by the rest of the community, their learning is kept private through the writing system and, thus, they carved out their own permanent place in society by guarding the information they share. Their texts are largely restricted to recipes, procedures, and incantations related to medicinal remedies. The scholars write using quills or brushes dipped in hand-dyed inks, writing on small cards made from plant-based sources. These small cards are stored in intricate wooden boxes, and each scholar has their own box filled with remedies, much like we may envision witches having personal grimoires. When teaching an apprentice, a scholar shares cards they personally select, which the apprentice the copies out onto a new card to begin their own collection.

Writing the remedies not only privatized the information, making it inaccessible to non-scholars, but it also made it unnecessary for scholars to spend time or develop rituals for memorizing the information; as Senner (1989: 5) states, writing "free[s] the human mind from the arduous tasks of memorization necessary to store knowledge gained through natural speech." Being "freed" from the "tasks of memorization" is reflected in how scholars share information. Learning as a scholar is a much more individualized journey than general learning within the community because the ritualized sharing of knowledge is absent.

The development of the writing system is unknown, though as Harris (2011) points out, the more interesting questions often focus on the application of the writing rather than the development of the symbols: "The history of writing is marked by progressive expansion in the range of activities integrated, not by a succession of refinements in the symbols used. The first trader to mark the price on goods for sale in the market made a greater advance in the history of writing than the inventors of shorthand notation." According to their lore, the first scholar to use a written form to record knowledge was Rélav, \({ }^{15}\) who frequently took walks through the village while contemplating his work. During one such walk, he saw a group of young children playing games together, and one child made marks in the dirt with a stick while explaining rules to a game she had created for the group. As she explained the game, she referenced the marks in the dirt, saying what each one represented. These marks inspired Rélav, who set out to use written marks in much the same way to record information, including incantations, remedies, and notes on local flora and fauna.

\footnotetext{
\({ }^{15}\) The name rélav comes from re 'people who are emotionally strong and provide support and stability' and lavim 'to sing,' which may provide insight into Rélav's personality and skills.
}

The writing system is best classified as an abugida，but the glyphs are not a perfect representation of sound，nor do the texts follow all the grammatical features outlined in \(\S 3 .{ }^{16}\) The abugida is written vertically，read from top－to－bottom and right－to－left．The majority of the Wóxtjana are left－handed，and the right－to－left direction allows the ink to dry without fear of smudging previously written glyphs．The abugida is based on the vowel，or the nucleus，of the syllable with consonants being represented by diacritics marked onto the vowel symbol．However，not all consonants are represented in the glyph， including the second consonant of a cluster，and all consonant diacritics represent two potential consonant sounds．Furthermore，the methods in which the diacritics are added are not always consistent；for instance，one scholar may use the more standard cross－line \(\langle\mathrm{d} / \mathrm{z}\rangle\) diacritic while another may place the same diacritic above the line or completely to the right．In other words，depending on the scholar，the resulting glyphs and written forms may be distinct enough that even other scholars may not be able to decipher the text．This writing system was developed to keep secrets rather than to widely disseminate information．

The most common glyph shapes and placements of diacritics are provided in the chart below．
\begin{tabular}{|c|c|c|c|c|c|c|c|c|c|}
\hline \[
d \rho
\] & \[
\phi
\] & \(b\) & \[
\zeta
\] & \$ & \(\xi\) & \(\xi\) & \(\frac{3}{4}\) & 4 & \\
\hline a & e & \(\varepsilon\) & 1 & o & \(\bigcirc\) & \(\varnothing\) & u & y & \\
\hline 9 & \(\pi\) & to & \(\because\) & フ & カ & \(\checkmark\) & ツ & ＊ & or \\
\hline b／v & d／z & \(\mathrm{g} / \mathrm{R}\) & k／x & m／w & \(\mathrm{n} / 1\) & \(\mathrm{n} / \mathrm{j}\) & p／f & t／s & ts／d \\
\hline
\end{tabular}

The following sentence is one found within a recipe，which needs to be read top－to－bottom，right－to－left．


Image 1．Wóxtjanato written text
The sentence is provided below with its full gloss and translation；it conforms to basic expectations for clause structure in Wóxtjanato，but it lacks many grammatical features that have been described in previous sections．
（34）lǿsja bjátsi wo－ýđzego bjáki wo－múgti crush berries and－mix juice and－dried．herbs
＇Crush berries and mix their juice with dried herbs’

\footnotetext{
\({ }^{16}\) Damerow（2006）argues that the earliest examples of proto－cuneiform writing reflects a similar situation，where the written form was not related to spoken language in grammar or pronunciation：＂writing was fairly independent of phonetic coding，but its application was restricted to narrowly defined contexts and its signs and sign combinations did not yet represent universally applicable words but rather specific entities and activities in the context of administration＂（8）．
}

Three major grammatical differences as seen in this example are the following: (1) the verbs lack the imperative and subject inflections; (2) the objects lack the to- prefix; and (3) the conjunction wod 'and' is treated similar to the preposition wi- 'along with' but does not carry stress and is able to attach to verbs and nouns alike. These grammatical features are by no means representative of all written texts, as scholars write using a shorthand notation form meant to be read only by themselves and their apprentices.

\section*{6. A Fable Awóxtjana}

The Wóxtjana, like many other cultures, use fables or short parables to teach moral values and life lessons, which are shared orally, often during community gatherings in the evening around a fire. Fables have long been used as a teaching method because, as Short and Ketchen (2005: 817) note, they "convey rich lessons in a format that is poignant, straightforward, and memorable." Oftentimes, fables personify animals to teach these lessons; Clayton (2008: 197-198) writes the following about such animal-based fables:

The fables generally show us short, conflictual interactions between two animals that are unequal in power and who do not reflect on their situation or plan for the future. ... Human beings, in reading the fables and reflecting on them, can see that while humans have the same animal characteristics that lead the animals into these situations of inequality and injustice, they also have the unique characteristic of reason that enables them to reflect on the lesson found in the fables, plan for the future, and change their environment and behavior.

In Wóxtjana fables, additional entities in nature are personified, including plants and the four elements. In the fable provided below, the conflicting pair is a tree and the wind, and the tree turns to the goddesses for help. The moral of the fable focuses on the importance of adaptability and flexibility while also serving as a warning: the tree receives what it requests, but it does not end well for the tree.

The fable is presented in its full form side-by-side with its English translation below.
wúaklad \(\varepsilon n\) àllelát ret. fáid \(\varepsilon\) n itové jifé \(\varepsilon n\) swa aczé tomúgwe iùnolenáox íkside dézu adzé totjávi. øg nǿsludelen iàllepéatixwe klíen slúreanwe. gavjúdoden ganǿsluden. ùnolé́msluanni zékjodzn itové jiftsímpąn. kwétoden leslúreanwe: éji tomúgwe gàlatotý. đzoneýse ivé nýsom totý. xetnó vé totý drám toí. dakdéos. kwétoden slúreanwe neýseji ivé dém. béuos zǿm tonáox atjávi ivé leálee togámugwe letý.
zǿjaden rétanja toxáj\&đzu øg kwétoden néve. zǿjaden rétanja tokítovu \(\varnothing \mathrm{g}\) negédiden torétanja. zǿjaden rétanja toxlévwenda totjátanja axlદ́veanwe. kwétoden xetfájoos ivé íxeos tonáox. kwétoden rétanja jé náox íxeka ét aí. kwétoden sàtoóskat xlévwenda álezaji toútszø letý ináo trøzǿwios aí.
wugatǿmugwede wod wugaczégwede dézuanwe arétanja. tjéloden tomúgwe. klíden àllelátanwe slúreanwe. fáid \(\varepsilon n\) rétanja itové jifé \(\varepsilon n\) tomúgwe gàlatoslúreanwe wod xád \(\varepsilon \mathrm{n}\). øg klíd \(\varepsilon\) n sàtogamúgwe slúreanwe iditonáox káde wod nóde dézuanwe arétanja. kwétoden sàtobýkrit rétanja xetkáji áxi. kwétod \(\varepsilon\) n xlévwenda jifneýseos ivé slúm béuos kám.

A tree grows in a field. She believes that she herself possesses strength because of this: her branches are near to the sky goddesses. But she is forced to sway every time the wind blows. The taller it grows, the more it moves in the wind. Because of the movement, the tree feels she is weak. The tree says to the wind: I am stronger than you. You cannot be seen. Why are you annoying me? Go away. The wind answers: I cannot stop blowing. You should ask the goddesses to give you more strength

The tree asks Xanjedzu, but she says no. The tree asks Kitovu, but Kitovu does not hear the tree. The tree asks Xlevwenda, the lady of the sky. She asks: Are you sure this is what you want? The tree says: Yes, it is my only desire. Xlevwenda warns: I will give you what you have requested.

The tree's branches become stronger and harder. The tree enjoys her strength. The wind blows in the field. The tree laughs, believing she is too strong to be hurt by the wind. But the wind blows stronger, and the tree's branches snap off and fly away. The tree cries: How am I breaking? Xlevwenda answers: When you cannot move, you must break.

Table 13. Translated Wóxtjana fable

The fable is fully glossed in the examples below with additional commentary on particular grammatical features and notes on traditional Wóxtjana fable structure.

Fables typically open with a brief description of the setting and an introduction to the main character, often focusing on the trait or flaw that will cause trouble for the character. The opening sentences for this fable introduce a tree growing in a field, who prides herself for her strength.
```

wú-akla-d-\varepsilonn àl-le-lá-t Ré-t
become-big-NARR-3S in-DAT-fields-SG trees(c3)-SG

```
'A tree grows in a field.'
\begin{tabular}{llll} 
fái-d-cn & itové & jif-é-en & swá \\
believe-NARR-3S & COMP & SJV-possess-3S & self \\
to-múgwe & GEN-3S.C3 \\
OBJ-strength(c1) & i-ùno-le-náo-x & DEP-because.of-DAT-3S.C4-PROX.DEM & íksi-d-e \\
dézu & a-dear-NARR-3P \\
branches(c1) & GEN-3S.C3 & to-tjávi & OBJ-sky.goddesses(c1)
\end{tabular}
'She believes that she herself possesses strength because of this: her branches are near to the sky goddesses.'

The verb fáim 'believe' in (36) carries the connotation that the belief is not true or is untestable; the subjunctive marker on ém 'possess' further enhances the notion that the belief is not true. The sky goddesses are introduced in this sentence, indicating they will play an important role later in the story, which is often the case in their fables.

After setting the scene, conflict is introduced in the fable, typically through the addition of another character, and, in this case, it is the wind who acts as the tree's foe.
\begin{tabular}{|c|c|c|}
\hline \(ø \mathrm{~g}\) & nó-slu-d-cl-\&n & i-àl-le-péa-t-ix-we \\
\hline but & forced-sway-NARR-HABIT-3S & DEP-at-DAT-moments-SG-PROX.DEM-C1 \\
\hline klí-en & slúre-an-we & \\
\hline exist-3S & wind-DEF-C1 & \\
\hline 'But she & is forced to sway every time & wind blows.' \\
\hline
\end{tabular}
```

ga-vjúdo-d-\varepsilonn ga-nǿ-slu-d-\varepsilonn
more-tall-NARR-3S more-forced-sway-NARR-3S
'The taller it grows, the more it moves in the wind.'

```
```

unò-le-\varepsilonm-slú-an-ni zékjo-d-\varepsilonn itové jif-tsímpa-\varepsilonn
because.of-DAT-DEV-move-DEF-C4 feel-NARR-3S COMP SJV-weak-3S
'Because of the movement, the tree feels she is weak.'

```

When the subject of the verb klim 'exist' is an element of the weather, the verb is interpreted based on the specific element. For instance, in (37), it is translated as 'blow' because the subject is the wind. Example (38) demonstrates the \(g a \ldots g a\) construction in Wóxtajanato, where two elements are connected through change; in this instance, the more the tree grows, the more she sways when the wind blows.

Following the introduction of a conflict, there is typically a confrontation between the two characters, and, here, the tree confronts the wind.
(40)
\begin{tabular}{ll} 
kwéto-d-عn & le-slúre-an-we \\
say-NARR-3S & DAT-wind-DEF-C1
\end{tabular}
\begin{tabular}{ll} 
é-ji & to-múgwe \\
possess-1S & OBJ-strength(c1)
\end{tabular}

\section*{gàla-to-tý}
more.than-OBJ-2S
'The tree says to the wind: I am stronger than you.'
\begin{tabular}{llll} 
dzo-ne-ýse & ivé & nýso-m & to-tý \\
2S.OBJ-NEG-able & COMP & see-INF & OBJ-2S
\end{tabular}
\begin{tabular}{llllll} 
xet-nó & vé & to-tý & drá-m & to-1́ & dak-dé-os \\
INT-cause & what & ACC-2S & annoy-INF & ACC-1S & IMP-leave-2S
\end{tabular}
'Why are you annoying me? Go away.'
\begin{tabular}{lllll} 
kwéto-d-cn & slúRe-an-we & ne-ýse-ji & ivé & dé-m \\
say-NARR-3S & wind-DEF-C1 & NEG-able-1S & COMP & leave-INF
\end{tabular}
'The wind answers: I cannot stop blowing.'
\begin{tabular}{llll} 
béu-os & zó-m to-náo-x & a-tjávi & ivé \\
need-2S & ask-INF OBJ-3S.C4-PROX.DEM & GEN-goddesses(c1) & COMP \\
le-ále-e & to-ga-múgwe & le-tý & \\
OPT-give-3PL & OBJ-more-strength & DAT-2S & \\
\multicolumn{4}{l}{ 'You should ask the goddesses to give you more strength.' }
\end{tabular}

These examples demonstrate tense shifts when incorporating dialogue: the main clause is marked for narrative tense, but the dialogue is marked for present tense. They also demonstrate a classic problem featured in fabled confrontations: nature cannot be changed based on personal desire or whim. In this case, the wind cannot cease to exist on behalf of the tree; however, the goddesses could change a feature of the tree to lessen the perceived problem. Even in fables, the goddesses cannot change nature itselfthey cannot stop the wind, but they can help a character enhance a malleable trait.

The tree takes the wind's advice and turns to the goddesses to ask for more strength, and the tree begins with the goddess most likely to listen and grant requests on behalf of an individual: Xanjedzu, the second moon goddess, seen as loyal and beneficent. When Xanjedzu denies the request, which was a kindness the tree did not understand, the tree turns to Kitovu, the first moon goddess. However, Kitovu has no interest in such a small matter and ignores the tree. Finally, the tree turns to Xlevwenda, the sun goddess, who rules all other deities.
\[
\begin{array}{llllll}
\text { zǿja-d-cn } & \text { ré-t-an-ja } & \text { to-xáncctzu } & ø g & \text { kwéto-d-en } & \text { néve }  \tag{45}\\
\text { ask-NARR-3S } & \text { trees-SG-DEF-C3OBJ-Xanjedzu } & \text { but } & \text { say-NARR-3S } & \text { no }
\end{array}
\]
'The tree asks Xanjedzu, but she says no.'
```

zǿja-d-\varepsilonn ré-t-an-ja to-kítovu 的 ne-gédi-d-\varepsilonn
ask-NARR-3S trees-SG-DEF-C3OBJ-Kitovu but NEG-hear-NARR-3S
to-ré-t-an-ja
OBJ- trees-SG-DEF-C3
'The tree asks Kitovu, but Kitovu does not hear the tree.'

```
```

zǿja-d-\varepsilonn Ré-t-an-ja to-xlévwenda to-tjá-t-an-ja
ask-NARR-3S trees-SG-DEF-C3OBJ-Xlevwenda OBJ-women-SG-DEF-C3
a-xlćve-an-we
GEN-sky-DEF-C1
'The tree asks Xlevwenda, the lady of the sky.'

```

Example (47) demonstrates nominal apposition: the NP totjátanja axlévanwe 'the lady of the sky' provides modification for the NP toxlévwenda 'Xlevwenda.' The NPs appear side-by-side, carrying the same inflectional case.

In fables, the character is often given a second chance or an opportunity to make a better decision. Indeed, Xlevwenda listens to the tree's request and decides to grant it but first gives the tree a chance to reconsider. The tree, however, fails to consider her place in the natural world and assumes she deserves supremacy among the natural elements; she further assumes that physical strength is the best trait to demonstrate power over other elements.
\begin{tabular}{lllll} 
kwéto-d-en & xet-fájo-os & ivé & jif-íxe-os & to-náo-x \\
say-NARR-3S & INT-sure-2S & COMP & SJV-want-2S & OBJ-3S.C4-PROX.DEM
\end{tabular}
'She asks: Are you sure this is what you want?'
\begin{tabular}{llllll} 
kwéto-d-cn & Ré-t-an-ja jé & náo-x & íxeka & ćt & a-í \\
say-NARR-3S & trees-SG-DEF-C3 yes & 3S.C4-PROX.DEM & desire & one & GEN-1S
\end{tabular}
'The tree says: Yes, it is my only desire.'
Example (49) demonstrates number placement alongside nouns: ét 'one' follows íxeka 'desire' to create the reading 'one desire.'

Xlevwenda tells the tree she will grant the request, and the narrative portion around the dialogue alerts listeners to a key piece of information the tree misses: sàtoóskat 'with a warning' indicates the turn in the fable, moving from the confrontation and perceived solution to the larger moral of the story.
\begin{tabular}{lccl} 
kwéto-d-en & sà-to-óska-t & xlévwenda & ále-za-ji \\
say-NARR-3S & like-OBJ-warnings(C1)-SG & Xlevwenda & give-FUT-1S \\
to-úts-zø & le-tý & i-náo & trø-zǿ-wi-os \\
OBJ-DEV(C4)-request & DAT-2S REL-3S.C4 & 3s-request-PERF-2S & a-í \\
'Xlevwenda warns: I will give you what you have requested.' &
\end{tabular}

The appearance of the phrase sàtoóskat outside the dialogue is important because the tree does not realize what is being said is a warning; rather, the tree only hears that her request will be granted.

The main character will often enjoy a brief period of peace or pleasure, believing their troubles to be over, and the tree is allowed to experience her new strength with wonder and joy.


Leading up to (52), the clause structures are lengthier and more complex, and example (52) provides a short, simple clause to break the structure. It provides a grammatical reprieve but also a pragmatic clue that the story is about to shift.

The secondary character typically makes a reappearance at the end of the fable, and, in this instance, the wind returns. The tree, however, believes her strength will protect her from the wind and brazenly laughs at the wind's attempts to move her branches.
\begin{tabular}{ll} 
klí-d-en & àl-le-lá-t-an-we \\
exist-NARR-3s & in-DAT-fields-SG-DEF-C1 \\
'The wind blows in the field.'
\end{tabular}

\footnotetext{
slúRe-an-we
}
wind-DEF-C1
\begin{tabular}{llll} 
fái-d-en & Ré-t-an-ja & itové & jif-é-en \\
believe-NARR-3S & trees-SG-DEF-C3 & COMP & SJV-possess-3S \\
to-mágwe & gàla-to-slúre-an-we & wod & xá-d-cn \\
OBJ-strength & more.than-OBJ-wind-DEF-C1 & and & laugh-NARR-3S \\
'The tree laughs, believing she is too strong to be hurt by the wind.'
\end{tabular}

As the wind is reintroduced to the story, so, too, is the setting to remind listeners that the focus is now back on the tree standing in the field. In (54), the verb fáim 'believe' appears once again, aided by the subjunctive in its object clause, demonstrating that the tree's belief is not realistic.

The tree's fate becomes clear in the next sentence: as the wind blows stronger, her newly strengthened branches break.
\[
\begin{align*}
& ø g \text { klí-d-en sà-to-ga-múgwe slúRe-an-we }  \tag{55}\\
& \text { but exist-NARR-3S with-OBJ-more-strength(c1) wind-DEF-C1 } \\
& \text { i-dì-to-náo-x ká-d-e wod nó-d-e } \\
& \text { DEP-after-OBJ-3s.C4-PROX.DEM break-NARR-3P and fly-NARR-3P } \\
& \text { dézu-an-we a-ré-t-an-ja } \\
& \text { branches-DEF-C1 GEN-trees-SG-DEF-C3 } \\
& \text { 'But the wind blows stronger, and the tree's branches snap off and fly away.' }
\end{align*}
\]

The use of iditojáox 'after this' as the introductory element of the dependent clause structure reinforces the understanding that the breaking of the branches is a direct result of the wind blowing harder.

As the fable comes to a conclusion, the character often cries out to the goddesses for an answer, and a goddess answers with the lesson to be learned. Here, the tree cries out, and Xlevwenda answers.
\begin{tabular}{llll} 
kwéto-d-cn & sà-to-bykri-t & Ré-t-an-ja \(\quad\) xet-ká-ji & áxi \\
say-NARR-3S & with-OBJ-cries(c2)-SG & trees-SG-DEF-C3INT-break-1S & how \\
'The tree cries: How am I breaking?' & &
\end{tabular}
\begin{tabular}{lllll} 
kwéto-d-en & xlévwenda & jif-ne-ýse-os & ivé & slú-m \\
say-NARR-3S & Xlevwenda & SJV-NEG-able-2S & COMP & move-INF \\
béu-os & ká-m & & \\
be.obliged-2S & break-INF \\
'Xlevwenda answers: When you cannot move, you must break.'
\end{tabular}

The tree's arrogance and lack of consideration for consequences lead to her downfall, demonstrating that adaptability is necessary for personal growth and that physical strength without intellectual acuity leads to ruin. This particular fable is a fitting warning for the Wóxtjana to remember as they face new challenges during their rebellion.

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\section*{Glossary}

\section*{a}
a- noun prefix. noun prefix. indicates genitive (or possessive) case.
áfwa 1. \(n, c 3\). [CC] moons, celestial bodies that reflect light rather than producing it. 2. \(n, c 2\). [CN] moonbeams, moonlight.
áju \(n, c l\). [CC] hearts, referring to the organs that pump blood throughout our body.
ákje \(n, c 2\). [CC] 1. political and social leaders within a community. 2. warlords, who earn their leadership status through displays of skill or power.
áklam \(v a\). to be big or large in physical size.
áktonze \(n, c 2\). [CC] wars, battles (esp. involving fire warfare). [Origin: related to kitva 'fires, flames' and kitovu, the name of the first moon goddess]
àl prep. [+dat] 1. inside, in, within (a space); indicates a static location. 2. at (a time), during (a time).
álem \(v t\). to give [sth] to [sbd/sth, +dat], causing a change in location or ownership.
ám \(v t\). to say or utter [sth]. (Not used alongside dialogue or direct quotations; see kwetom.)
ájam vi. to speak or have the ability to speak. [Related to am 'say']
-an noun suffix. definite article.
ándje, andi- \(n, c 1\). [CC] instruments or tools used to accomplish a desired function.
ándilavja \(n, c 3\). [CC] music or musical songs, specifically music created with instruments. [Origin: andi'instruments' + lavja 'music']
árma \(n, c 3\). \([C C]\) spiders, arachnids.
áve, a- num. three.
áwam \(v t\). to feel or sense [sth] without requiring physical contact (e.g., feel a change in the weather, sense someone standing nearby).
áwi \(n, c l\). [CC] horses, mammals with manes and tails that can be domesticated.
áwubiso \(n, c 2\). \([C C]\) solutions, methods, or plans that are overly complex, especially to solve a simple problem or to learn simple material. [Origin: áwum 'be complex' + biso 'solutions']
áwum \(v a\). 1. to be complex, hard, or difficult to understand or remember. 2. to be confusing. 3. vt. to confuse [sbd].
áxem vi. 1. to breathe, take a breath. 2. to inhale. 3. to live, be alive.
áxi pro. how, interrogative pronoun.
\(-\mathbf{a z}\) verb suffix. indicates future tense.
ázbi \(n, c 2\). [CN] 1. resin, a sticky and flammable substance found in trees and plants. 2. any flammable substance or liquid. 3. [CC] arsonist or fire-starter [Origin: azbi is used for torches and starting fires].

\section*{b}
bá \(n, c 1\). [CC] biological fathers. [Origin: imitative of baby's first sounds]
bám \(v t\). 1. to have, own, or possess [sth]. 2. to be in control of [sth] or [some group].
báma \(n, c l\). [CC] biological parents. [Origin: \(b a\) 'fathers' \(+m a\) 'mothers']
béuli \(n, c 2\). 1. duties or obligations to someone or to society. 2. debts owed as repayment. [Origin: related to beum 'need']
béum \(v t\). [+ inf. verb form (without COMP)] 1. to need to do [sth]. 2. to have an obligation or duty to do [sth].
bínim \(v a\). to be straight, in a perpendicular or upright position.
bíso \(n, c 2\). [CC] 1. solutions to a problem. 2. methods for learning or remembering information. 3. plans for future events.
bjágo \(n, c 2\). [CC] 1. sticks or broken branches that can be used for kindling. 2. small branches still attached to trees, especially those at the lower portions of the tree.
bjáki \(n, ~ c l\). [CN] juice from a fruit or vegetable. [Origin: related to bjátsi 'berries' and kitsim 'to juice']
bjátsi \(n, c l\). [CC] small greenish berries used in foods and medicines; similar to gooseberries.
blýzam vt. 1. to plant and grow [sth]. 2. informal vi. to be pregnant.
bóka \(n, c 3\). [CC] caterpillars, wormlike insects that become butterflies or moths.
bózje \(n, c 1 .[C C]\) sheep or goats, woolly animals.
brótsije \(n, c 3\). [CN] ice crystals on plants or stones; frost, hoarfrost.
brótsim \(v i\). to freeze, turning a liquid substance into a solid substance.
búe, bu- \(n, c 4\). [CC] children, babies, infants; young human beings who have not yet gone through puberty.
búliba \(n, c 3\). [CC] 1. childhood games. 2. objects or toys associated with childhood games. [Origin: bu'children' + liba 'games']
búre \(n, c 3\). [CC] legs, limbs used for standing, walking, etc.
býkri \(n, c 2\). [CC] shouts, screams, or cries (using a raised voice, typically out of fear or surprise).

\section*{d}
-d verb suffix. indicates narrative tense.
dá pro. third-person C 1 singular.
dak- verb prefix. indicates the imperative mood.
dásam va. 1. to be located or situated on the left-hand side. 2. to be dominant. [Note: Because the majority of the population is left-handed, the left side is considered the dominant side. Furthermore, when walking in a group, leaders stay to the left-hand side so as not to be hit by the swords of subordinates; swords are kept on a strap on the right-hand side of the body.]
dém 1. vi. to go, leave, or move away from a location. 2. to disappear, typically relegated to natural phenomena, such as weather (e.g., 'the wind stops blowing' requires this verb). 3. vt. to take [sth] away from a location.
déwoje \(n\), \(c 4\). [CN] width, measurement from side to side.
déwom \(v a\). to be wide, specifically to have more side-to-side space than average.
dézu \(n, c 1\). \([C C]\) branches that extend from trees.
di prep. 1. in front of (a location). 2. after (a time). [Origin: Related to dja 'chests'] (Note: Spatial representations of time represent the past as being in front of a person and the future as behind since we can see what has past but not what will come.)
dío \(n, c 2\). [CC] swords, spears; weapons with long blades.
dízzkjum \(v\) t. to challenge to a duel, specifically a duel to determine a new warlord. [Origin: dizom 'fight with swords' + akje 'leaders']
dízom 1. vt. to fight using swords. 2. vi. to train in sword-fighting.
djá \(n, c 3\). [CC] breasts or chests, the front surface of humans or animals between the stomach and neck. djé pro. third-person C1 plural.
djó \(n, c 2\). [CC] stones or rocks of large enough size to use for building.
djóm \(v t\). 1. to hit [sth/sbd] with fists or hands. 2. to run into or bump into.
dó num. five.
dø̀ prep. outside; indicates static location outside a structure, boundary, or area.
drám \(v t\). 1. to annoy, pester, or bother [sbd]. 2. to worry [sbd].
drány \(n, c 2\). [CC] small insects that live on humans or animals and cause a great deal of itching, such as lice and fleas. [Origin: related to dram 'to annoy']
dúe \(n, c 3\). [CC] necks, which on humans and animals connects the head to the rest of the body.
dwéne \(n, c 1\). [CC] animals, typically small forest animals, that are not viewed as dangerous to humans; however, they are often the prey of humans.
dwénim \(v t\). to tame or domesticate an animal. [Origin: related to \(d w e n \varepsilon\) 'animals']

\section*{dz}
đáskam \(v t\). [+dat] to endanger or put [sbd] in danger. [Origin: related to skae 'danger']
dé pro. third-person C 3 singular.
dégwem va．1．to have a hard，impenetrable surface，to be tough．
mékra 1．\(n, c 2\) ．［CN］roughness，characterized by a non－smooth surface that，when rubbed，could hurt the palm of the hand．2．\(n, c 2\) ．［CC］rough files or sandpaper－like surfaces used to round hard edges or smoothen surfaces．
délem \(v a\) ．to be wrong，incorrect，inaccurate，or false．
あénanwem \(v t\) ．to hold or grip tightly in the hands．［Origin：dzena＇hands＇\(+n w e m\)＇to hold tightly＇］
déna \(n, ~ c 1 .[C C]\) hands，the portion of the body that extends from the wrist and includes the palm and all fingers．
díva，di \(n, c 3\) ．1．［CN］unity or community；quality of working together as a whole for a desired purpose．2．［CC］communities，crews，or groups of people working together with a common goal．

あo verb prefix．indicates second－person singular object．
あóvre \(n, c 2\) ．［CN］newness or novelty，referring to an idea or invention that is original or unusual．
dzú \(n, c l\) ．［CN］soil，or dirt with nutrients suitable for growing plants．

\section*{e}
－e verb suffix．indicates third－person plural subject．
è prep．［＋gen］from，away from，out from；indicates movement away from a location or person．
édzo \(n, c 2\) ．［CC］teeth，referring to the hard，bone－like structures situated within the jaw and used for chewing．
égam \(v t\) ．to have faith in［deities and the three sky goddesses］．
éje \(n, c 3\) ．［CC］snails，mollusks with spiral shells．
élem \(v t\) ．1．to plant or sow without the expectation of caring for the seeds that have been planted．2．to spread，esp．referring to seeds or pollen．3．to mete out，hand out，or divide up［often with an indirect object］．
élim \(v a\) ．1．to be green or have a greenish hue． 2 ．of a plant，to be healthy．
ém \(v t\) ．to have or possess a quality or state of mind．
ému num．zero，none；indicates an absence of something．
étwa \(n, c 3\) ．［CC］leaves on trees or bushes，flat and thin green structures attached to branches．
étsu \(n, c 2\) ．［CC］bees，stinging insects that pollenate flowers and plants．
évja \(n, c 3\) ．［CC］rabbits，burrowing mammals with long ears and a fluffy tail．
éwa \(n, c 3\) ．［CN］1．moisture on an object or person；slight wetness or dampness．2．dew．
éxane \(n, c 3\) ．［CC］stars；distant celestial bodies that shine in the nighttime sky．［Origin：related to xane－ ＇soft，diffused light＇］

\section*{\(\varepsilon\)}

ع́bjo n, c1. [CC] 1. deities; gods and goddesses. 2. religious or spiritual beliefs (typically used with em 'to possess' to indicate a person's level of spirituality).
édze pro. third-person C3 plural.
éfi \(n, c l .[C C] 1\). seeds capable of producing new plants. 2. dried seeds for consumption.
éfom \(v t\). to push or exert force on an object or person, typically using the hands or upper body.
£́ktom \(v a\). to be square or rectangular in shape, with four straight edges.
\(-\mathbf{\varepsilon} \mathbf{l}\) verb suffix. indicates habitual aspect.
́́m- \(v \rightarrow n, c 4[C N]\) turns verbs into related common non-count noun.
émwa \(n, c 3\). [CC] 1. siblings or children who are raised together (whether or not they are biological siblings). 2. close friends.
-عn verb suffix. indicates third-person singular subject.
énele \(n, c 3\). [CC] feathers or plumage on a bird.
énemsgi \(n, c 3\). [CC] tailfeathers or feathered tail-like structures on birds. [Origin: \(\varepsilon n \varepsilon l e\) 'feathers' + mogi 'tails']

ع́t num. 1. one. 2. sole or only.
étka num. few. [Origin: et 'one' \(+k a\) - 'two']
étsum vi. to suck or draw into the mouth through an inward motion creating a vacuum.
ع́vom 1. vt. to smell or sniff [sth], sensing odors through the nose. 2. vi. to sniff without the purpose of smelling, taking short inhalations through the nose.
́́zu \(n, c 2\). [CN] fog, heavy mist, or low-lying clouds that obscure vision.

\section*{f}
fám \(v t\). 1. to think about or ponder [sth]. 2. to believe [sth] after careful thought or consideration.
fáim \(v t\). 1. to believe or have confidence in a particular idea or concept that is not necessarily true or provable. 2. to have faith in [sbd] (only used with non-deity object). [Origin: related to fam 'to think about']
fájom vi. to be sure or certain; typically followed by \(i v e\) and a clause to specify a fact, thought, or belief. [Origin: related to fam 'to believe']
féa \(n, c 3\). [CC] lips (of a mouth). [Related to \(f e m\) 'to kiss']
fém 1. vt. to kiss [sbd]. 2. vi. to purse the lips. [Related to fea 'lips']
fí \(n, c 3\). [CC] butterflies, flying insects with large, patterned wings.
fíam \(v t\). 1. to love [sbd] as a sexual partner or potential mate. 2. to lust after [sbd].
file \(n, c 1\). [CC] mates, sexual partners. [Origin: related to fiam 'to lust after']
fjála \(n, c 3\). [CC] lakes, or large bodies of water surrounded by land whose tides, while present, are less drastic.
fólski \(n, c 1\). [CC] towns or villages; populated areas with houses and other buildings and united by a leader or government. 2. communities of people living together as nomadic tribes.
fRági \(n\), \(c 3\). [CC] 1. clouds, or visible accumulation of condensed water in the sky. 2. objects or people that block one's path or hinder visibility.
frégo \(n, c l\). [CN] origin, beginning, or start of an event, process, activity, concept, or story. [Origin: related to the root \(f_{\text {Reo }}\) 'to begin, start']
fréom vi. 1. to begin or start [the subject is typically some process, activity, or event]. 2. to be born. fúm \(v i\). 1. to blow or expel air out of the nose or mouth. 2. to exhale, especially after holding the breath.
fúnu \(n, c 2\). \([C C]\) noses, projected portions of the face used for smelling and breathing.
fwé \(1 . n, c 3\). [CN] water. 2. n, c3. [CC] bodies of water.
fýzne \(n, c 2\). [CC] foxes, carnivorous mammals in the dog family.

\section*{g}
gá- 1. verb prefix. more, comparative without a standard for comparison (thus, creating a comparison with some previous state for the subject) (e.g., gavjudom 'to be taller'). Used in 'the more ... the more' constructions. [Origin: related to gala 'more than']. 2. noun prefix. more, comparative without standard for comparison.
gàla prep. more than (used for positive comparative constructions, with its object representing the standard for comparison).
-gan noun suffix. distal demonstrative.
gávam \(v a\). 1. of food, to be fresh, recently harvested, collected, hunted, or cooked. 2. of plants, to be newly grown or blossomed, such as a sapling or new bloom).
gázo \(n, c 2\). [CC] 1. workers or laborers who work in physical or manual jobs. 2. subordinate workers or soldiers.
gázom vi. to toil, labor, or work in physical jobs (e.g., farming, mills).
gédim \(v t\). to hear, perceiving sound through the ears.
gém \(v a\). to be afraid or to have fear.
géni \(n, c 3\). [CC] deer, hoofed mammal with antlers.
gía \(n, c 1\). [CC] days, when the sun is visible in the sky.
gí- verb prefix. less, comparative without a standard for comparison (thus, creating a comparison with some previous state for the subject) (e.g., gigem 'to be less afraid'). Used in 'the more... the more' construction. [Origin: related to gidu 'less than']
gìdu prep. less than (used for negative comparative constructions, with its object representing the standard for comparison).
gjém \(v a\). to be yellow.
gléa \(n, c 1\). [CC] ears, the external organ used for hearing and balance.
gnéby \(n, c 2\). [CC] fingernails or toenails. \(v t\). 1. to pry something open, often using the fingernails or a thin, hard lever. 2. to coax someone into revealing a secret.
góne \(n, c 2\). [CC] large balls of hail that cause damage to plants, animals, or buildings.
gǿ \(n, c 3\). [CC] ducks, water birds with bills and webbed feet.
gócte \(n, c 2\). [CN] heavy or large weight; heaviness. Used to refer to weight of objects or bodies that are picked up or moved.
góla \(n, c 3\). [CN] 1. evidence of rot or decay in an object or structure. 2. mold or fungus growing on food, plants, or wood. 3. mean-spiritedness or evilness in a person.
góndem \(v a\). to be correct, right, or true.
gúdé \(n, c 3\). [CC] slugs, mollusks without shells.
gúxam \(v t\). to drink or swallow.
gým \(v t\). to pull [sth], exerting force to remove the object or bring it closer to the one doing the pulling.

\section*{i}
i- prefix. dependent clause marker.
í pro. first-person singular.
íano inter. after all; indeed. This interjection creates a reading of surprise or contradiction and offers a sense of emphasis and even finality.
íba \(n, c l\). [CC] 1. backs or backsides of bodies. 2. backs or backsides of objects, or the sides not visible when looking at an object.
ídako \(n, c 3\). [CC] openings, spaces, or areas created by erosion, such as river banks. [Origin: idam 'to erode' + koi 'paths']
ídam vi. to wash away, erode, or wear down over time from natural causes.
ími \(n, c 2\). \([C C]\) mosquitos, biting insects with long legs and transparent wings.
ígwom \(v t\). to know or be familiar with [sbd].
ijem 1.va. to be physically small. 2. vt. to shrink or cause to become smaller in size.
íkro \(n, c 2\). [CN] 1. fire that is feared or uncontrolled, such as a forest fire. 2. wrath of a deity. 3. revenge or desire for revenge.
íksim \(v a\). to be physically near or close by, usually from the perspective of the speaker.
íli \(n, c 3\). [CC] knees, elbows, hips, or finger joints; joints that allow limbs, appendages, or bodies to bend.
ím \(v t\). to stab with a sharp instrument or weapon.
itové conj. introduces a nominal clause functioning as an object within another clause. [Origin: \(i\) dependent clause marker + to OBJ \(+v e\) 'what']
íva \(n, c 3\). [CN] snow that has accumulated on the ground.
ivé conj. introduces a dependent clause working alongside an intransitive verb that indicates semantic condition or modality, such as ysem 'to be able.'
-ix noun suffix. proximal demonstrative.
íxem \(v t\). to want, desire, or hope for [sth] not yet possessed, achieved, or accomplished.
íxeka \(n, c 3\). [CN] hope, feeling of desire or expectation. [Origin: related to ixem 'to want']
íxekno \(n, c 2\). [CN] 1. jealousy or envy. 2. general discontentment with what one has. [Origin: related to ixeka 'hope,' relating to the fact that having too many expectations or too much desire can lead to jealousy]

\section*{j}
-ja noun suffix. indicates a C3 noun.
jám \(v d t\). to name or label [sbd +obj\(]\) [sth +dat ]. [Origin: ja- 'names']
jáno, ja- \(n, c 4\). [CC] names, labels, or titles; a word or phrase used to refer to some referent.
játi pro. where, interrogative pronoun.
jé inter. yes; affirmative.
jénim \(v i\). of a plant, to die or become so wilted or withered that it is beyond use.
jézena \(n, c 1\). oracles, seers, priests/priestesses; people who divine information from signs. [Origin: jez- 'to divine' + -ena 'those who']
jézom \(v t\). 1. to divine from signs or omens, as an oracle or seer. 2. to interpret or explain the meaning of information, words, actions, or behaviors. 3 . to read written language.
-ji verb suffix. indicates first-person singular subject.
jib prep. 1. behind (a location). 2. before (a time). [Origin: Related to iba 'backs'] (Note: Spatial representations of time represent the past as being in front of a person and the future as behind since we can see what has past but not what will come.)
jif- verb prefix. indicates the subjunctive mood.
jó \(n, c 3\). [CC] geese, water birds with long necks and webbed feet.
jóknu \(n, c 2\). [CC] fools or foolhardy people, who act rashly or without thought; idiots.
jómu \(n, c 2\). [CN] sea, ocean, or large body of water that appears to have no end and whose tides can bury land under water.
jógni \(c, c 2\). [CC] 1. roots, or the portion of a plant that is typically underground and that soaks nutrients from the soil. 2. bottoms of icebergs.
jǿdøm \(v t\). 1. to attack or take action against. 2. [of an animal] to hunt, attack, and feed on.
júlom \(v a\). to be good or useful; to serve a desired purpose.

\section*{k}
-k verb suffix. indicates regular past tense.
kádji \(n, c 3\). [CN] smoothness, as characterized by an even surface.
káe \(n, c 2\). [CC] knives; instruments with blades used for cutting.
kákom vi. 1. to lose touch with reality or show signs of dementia. 2. to be confused about even obvious truths.
kám 1. vi. to break or snap into smaller pieces. 2. vt. to break or snap [sth] into pieces using force but without an instrument.
káro num. other, another; a different one. [Related to \(k a\) - 'two' and \(\boldsymbol{R o}\) demonstrative]
kátra, ká, kat- \(n, c 2\). [CN] intensity, as characterized by extreme force or strength.
kátnysom \(v\) t. to examine, investigate, or look at closely. [Origin: kat- 'intensity' + nysom 'to look at']
káts, ka- num. two.
káwam \(v t\). to cut or slice using a sharp instrument or tool. [Origin: related to kam 'break']
kéfo \(n, c 2\). \([C N]\) smoke from a fire or other burning substance.
kém \(v t\). 1. to draw or paint pictures or symbols meant to record history, stories, or tales. 2. to write. [The earliest forms of written records were drawings and paintings on rocks.]
kítovu \(n, c 2\). [PN] first moon goddess. [Origin: the first moon has visible volcanic action, which, from the earth, looks like bursts of fires; the first moon goddess bears a name similar to kitva 'fires, flames']
kítva \(n, c 2\). [CC] 1. fires that are controlled or contained in a small area (e.g., ovens, fire pits, torches). 2. flames of a fire.
kítsim \(v t\). 1. to squeeze, exerting force on more than one side of something. 2. to juice a fruit or vegetable.
kíxa \(n, c 3\). [CC] nights, when the sun is not visible and the moons shine brightest.
klám \(v t\). to split open or cause [sth] to open.
klói \(n, c 3\). 1. [CN] time (as a larger concept indicating the passage of existence). 2. lifetime. 3. [CC] generations. [Origin: related to klim 'to exist']
klím \(v i\). 1. to exist, be a reality. 2. to happen or occur. 3. to appear, typically relegated to natural phenomena, such as weather (e.g., 'the wind blows' requires this verb).
knúbi \(n, c 2\). [CN] bumpiness or roughness characterized by an uneven surface, often referring to walking areas, such as fields or paths, or the surface of the sea.
kói \(n, c 3\). [CC] 1. paths, grassy footpaths that have been beaten or worn down over time by footsteps. 2. natural clearings through wooded areas that can be used as walkways. 3. dirt pathways or roads that connect houses or buildings within a town. 4. opportunities for social advancement provided by mentors.
kóni \(n, c 1 .[C C]\) flowers, or the flowering, seed-bearing portion of plants with petals and sepals.
kóbe \(n, c 3\). [CC] 1. ends of events or activities. 2. limits of potential or abilities.
króna \(n, c 2\). [CC] 1. animal horns or antlers. 2. small sharpened knives, often made out of animal horns.
krýdzom vi. 1. to blather, chatter, or talk nonsensically. 2. to talk on and on without interruption. [Origin: perhaps imitative]
krýksa \(n, c 2\). [CC] members of the species of large intelligent predators that prey on humans and speak in a language that sounds like a series of nonsensical noises to human ears. [Origin: krydzom 'to blather' + \(k s a-\) 'predatory animal']
ksábi, ksa- \(n, c 2\). [CC] predatory or dangerous animals that cannot be tamed or domesticated and that pose a threat to humans or their livestock.
ksì- prep. near, close to, or next to. [Origin: Related to the verb iksim 'to be near']
kúm \(v t\). to scratch a surface, causing a mark to appear, but not so deep as to cut it open.
kwá- \(n[C N] \rightarrow v a\). turns a common non-count noun into a verb-like adjective.
kwén, kwe- num. four.
kwém \(v t\). to know or be aware of [sth].
kwétom \(v i\). to say or speak, only used to introduce dialogue. If addressee is included, addressee is marked with dative.
kwó pro. first-person plural.
kwóne \(n, c 1\). [CC] mountains or steep hills with an abrupt or sudden rise in elevation.
kwótam \(v i\). to fly or move through the air with volition.
kýni \(n, c 1\). [CN] 1. newness, referring to an object or structure that has been recently built, made, or acquired. 2. youth.

\section*{I}
lá \(n, c l\). [CC] fields, meadows; grassy, open areas.
láfjem \(v i\). 1 . to sleep 2 . to rest in a reclining position without necessarily going to sleep.
lávim vi. to sing or chant.
lávja \(n, c 3\). [CC] 1. pleasing or soothing sounds. 2. music, musical songs or compositions. [Origin: related to lavim 'to sing']
lávjandi \(n, c 3\). [CN] musical instruments. [Origin: lavja 'pleasing sounds' + andi- 'instruments, tools']
le- noun prefix. indicates dative case (benefactor or recipient). 2. verb prefix. indicates the optative mood. [Related to alem 'to give']
lézjym \(v t\). 1. [req. direct object and genitive object] to distinguish [sth/sbd] from [sth/sbd] else. 2. to separate or acknowledge [sth/sbd] from a group.
léfjo \(n, c 3\). [CC] berries, or small fruits without stones or pits.
líba \(n, c 1\). [CC] games or other recreational competitions involving mental or physical skills.
líum \(v t\). to hold or have [sth] in one or both hands, typically with an open or semi-open handshape.
lóla \(n, c 2\). [CC] wolves, mammals in the dog family that hunt in packs.
lóm \(v a\). to be thick in consistency, such as a liquid that does not flow freely.
lói \(n, c 2\). [CC] mice; small rodents with pointed snouts and long tails.
lósjam \(v t\). to crush or press, putting pressure on [sth] to smash or otherwise squeeze it.
lónk\&fjo n, c2. [CC] poisonous berries. [Origin: based on lınkam 'unfit for eating' \(+l \varepsilon f j o ~ ' b e r r i e s '] ~\)
lónkam \(v a\). 1. to be dirty or unclean. 2. of food, to be unfit for eating.
lú \(n, c 1\). \([C N]\) sun or sunshine.
lýptom \(v t\). 1. to turn or twist [sth]. 2. [with reflexive pronoun as object] to turn one's body around.
lýzo \(n, c 2\). [CN] 1. guts, entrails; inner organs. 2. inner workings or mechanisms of a machine or tool.

\section*{m}
-m verb suffix. indicates infinitive form.
má \(n, c l\). [CC] biological mothers; female parents who birthed a child. [Origin: imitative of baby's first sounds]
máxam \(v t\). 1. [with reflexive pronoun] to lie down or recline. 2. to lay [sth] down, moving it from a standing or upright position to a reclining or sideways position.
méwi \(n, c 2\). [CC] bats, nocturnal flying mammals.
méo- \(n[P N] \rightarrow v a\). turns a proper noun into a verb-like adjective.
mégwo n, \(c 1\). [CC] 1. wings, appendages used for flight. 2. feathers or structures added to the backs of arrows to stabilize their flight.
míbum vi. to play or to engage in fun, leisurely activities.
míde \(n, c 2\). [CN] ash or residue from a fire.
mjáno \(n, c l\). [CN] 1. quality of being old or having a long life. 2. quality of being unoriginal or nonunique.
mjédzom \(v t\). to toss or throw [sth] with enough force that it moves through the air but not enough that it could go a long distance or cause damage.
mjéza \(n, c 3\). [CN] 1. skin or flesh on a human being. 2. skin or flesh of an animal.
móe \(n, c 4\). [CN] there, that place or location (some place or location other than where the speaker is).
mókam \(v t\). to sew, mend, or hem clothing or cloth material.
mózim \(v t\). 1. to find [sth] or [sbd], especially as a result of a search. 2. to select one option from many.
mótsa \(n, c 2\). [CN] 1. earth, dirt, or clay; substance within the ground that can cause something to become dirty. 2. dirt incapable of sustaining plant life because it lacks adequate nutrients.
mógi \(n, c 2\). [CC] tails, or extensions of the spine on vertebrate animals.
múgwe, mug- \(n, c 1\). [CN] good physical health or strength. [Origin: mug- 'stomach']
múgo \(n, c l\). [CN] stomach, the internal organ reponsible for digestion.
múgula \(n, c 3\). [CC] natural remedies for ailments or medicinal herbs (fresh herbs). [Origin: mug- 'good health']
múgti \(n, c 3\). \([C C]\) mix of dried herbs used in natural remedies. [Origin: mugula 'natural remedies' + tilom 'hang to dry']
mýja \(n, c 3\). [CN] 1. darkness characterized by the absence of light. 2. nighttime.

\section*{n}
ná \(n, c 2\). [CC] men, male human beings.
náfile \(n, c 2\). [CC] male mates or sexual partners. [Origin: na 'men' + file 'mates']
nánofile \(n, c 2\). [CC] husbands. [Origin: na 'men' + nofile 'spouses']
náo pro. third-person C 4 singular.
náswe \(n, c 2\). [CC] biological brothers or half-brothers. [Origin: na 'men' \(+s w e\) 'siblings']
ne- verb prefix. indicates negation.
néjam vi. 1. to float on the surface of a liquid. 2. to rise to the top of the surface of a liquid. 3. to have buoyancy or the ability to float.
néve, né inter. no.
nézwi \(n, c 2\). [CC] bears, omnivorous mammals with thick fur, short tails, and large paws.
-ni noun suffix. indicates a C4 noun.
níko, ni- num. tens.
níni \(n u m\). many, tens and tens. [Origin: ni- 'ten']
nóm vi. to fly or soar through the air, non-volitionally, typically propelled or thrown by some force.
nófile \(n, c 1\). [CC] spouses, end-of-life partners. [Origin: noram 'to die' + file 'mate.' The Woxtjana do not take spouses until late in life; a spouse is meant to be a partner for growing old and dying.]
nóram vi. of a human or animal, to physically die.
nótem \(v t\). to hunt [sth], using weapons.
núe pro. who, interrogative pronoun referring to human.
núm vi. 1. of bipeds, to walk or move using the legs at a pace slower than running. 2. of species with more than two legs, to stand upright on the back two legs and walk or move.
nwèl prep. [+gen] with [an instrument]; using [an instrument].
nwém \(v t\). 1. to hold physically close to the body. 2. to hold or grip tightly with the arms. 3. to embrace or hug.
nýsom \(v t\). to look at, watch, or see [sth], or to otherwise use the eyes to perceive some stimulus. [Origin: related to nyto 'eyes']
nýto \(n, c 1\). [CC] eyes, organs capable of sight.

\section*{n}
nám vi. 1. to come or move toward the speaker. 2. to arrive at a desired location.
ném \(v i\). of a plant, to wilt, losing its physical structure, or to wither, losing its moisture or shape. However, the plant is still salvageable or otherwise usable for herbal remedies.
jémi \(n, c 1\). \([C N]\) brightness, or quality of having a great deal of light.
jńxom \(v a\). to be bad or of no use.
jí pro. third-person C4 plural.
jía \(n, c 4\). [CN]. here, this place or location (the same place as the speaker).
jízum \(v a\). to be narrow, specifically to have less side-to-side space than average.
jóa \(n, c 3\). [CC] frogs, amphibious animals that can leap.
nóm \(v t\). 1. to cause [sth] or make [sth] happen. 2. to be the source of [sth]. 3. vi. to be the cause or reason (for some action, event, or result).
nớ- \(v \rightarrow\) forced/caused \(v\). creates an interpretation of non-volitional cause for the verb (e.g., slum 'to sway' in a neutral sense; nøslum 'to be forced or caused to sway').
jóla \(n, c 3\). 1. \([C N]\) rain, or precipitation in liquid form. 2. [CC] rains, or storms with liquid precipitation.
jú \(n, c 2\). [CC] owls, birds with large eyes and a hooked beak that tend to hunt at night.

\section*{0}
-o verb suffix. 1. indicates first-person plural subject. 2. indicates neutral subject for attributive verb-like adjective phrases.
ógi \(n, c 3\). 1. [CN] skin or flesh of a soft fruit, berry, or vegetable. 2. [CC] cloth coverings placed around or on top of objects to protect the surface. 3. cloth tents or tent coverings.
ókala \(n, c 2\). [CC] bark of a tree, or rough coverings of a plant; when singular, piece of bark.
ómwem \(v t\). 1. to grow [sth], such as a plant. 2. to take care of or nurse. 3. to rear or bring up [sbd], such as a child.
ómwena \(n, c 3\). \([C C]\) men who raise a child who they did not produce. [Origin: omwe 'to rear' + na 'men']
ómwetja \(n, c 3\). [CC] women who raise a child who they did not birth. [Origin: omwe 'to rear' \(+t j a\) 'women']
óni 1. \(n, c 3\). [CN] ice, frozen water. 2. \(n, c 2\). [CC] icicles or ice shards hanging from a structure or surface like a stalactite.
-op verb suffix. indicates distant past tense, more than one year in the past.
órandza \(n, c 1 .[C N]\) forest, woods, or heavily treed areas with dense plant growth.
-os verb suffix. indicates second-person singular subject.
óska \(n, c l\). [CC] warnings, signs, or omens of potential danger to come. [Origin: related to skáe 'danger']
ótje num. some of a group or some portion of an amount.
ótsim \(v t\). 1. to burn [sth] with fire. 2. [with reflexive pronoun] to burn oneself by touching flames or a hot surface.
ówom \(v a\). to be round or spherical in physical shape.
óxo \(n, c l\). [CC] pigs or hogs, mammals with snouts that root for food in soil.

\section*{\(\sigma\)}
óba \(n, c 1\). [CC] cows, oxen, bovine animals.
ǿbje \(n, c 1\). [CC] years, consisting of each of the four seasons.
ǿda \(n, c 1\). [CC] lizards, reptiles with legs.
ǿfle \(n, c 3\). [CN] quality of dullness as opposed to being physically sharp, such as a dull knife blade incapable of cutting through a surface.
\(\boldsymbol{0 g}\) conj. but (indicates contradiction to a previously stated idea).
óli- \(v a \rightarrow n, c 4[C N]\) turns a verb-like adjective into a related non-count noun.
ǿmem \(v i\). 1. to sit down on a surface. 2. to be in a sitting position.
óni \(n, c 1\). [CC] 1. livers, kidneys, or other small organs in the torso of humans. 2. small edible organs in animals.
ǿnam \(v i\). to swell, becoming rounder, larger, and potentially firmer. na \(\sim\) to have an erection.
ǿpram \(v a\). to be red.
óve pro. third-person C2 plural.
ǿxom vi. to be likely or probable. When used to introduce a clause stating a condition or event that will likely occur, it is followed by ivé and an infinitive verb form.
©́xte \(n, c 4\). [CN] likelihood; good probability or chance (of something). [Origin: related to øxom 'be likely or probable']

\section*{0}
ófni \(n, c 1\). [CC] sand found on beaches or riverbanks; when singular, a clump of sand.
óka \(n, c 2\). [CC] bones of a skeleton, whether human or animal.
j́klam va. 1. of a surface, to be flat or level, without inclines, hills, or valleys. 2. of a person, to be emotionless or overly objective.
ólo \(n, c 1\). [CC] moths, flying insects that have large wings, are attracted to light, and are most active at night.
óne \(n, c 3\). [CC] reptile or fish eggs, which have a leathery or soft shell.
ópa \(n, c 3\). [CC] gnats, small flying insects.
j́zim \(v i\). to behave or act (usually followed with a prepositional phrase to specify mannerism).

\section*{p}
pátem va. 1. (of an event or occurrence) to be sudden. 2. (of a person) to be spontaneous.
pátesju \(n\), \(c 3\). [CC] coincidences or surprising occurrences. [Origin: pátem 'be sudden' + sjúm 'be connected']
péa \(n, c l\). [CC] moments, brief periods of time.
pépjo \(n, c 2\). [CN] 1. sleet or small balls of hail; crystallized precipitation that causes stings or hurts when it hits the skin. 2. small pebbles or rocks used as ammunition in a sling shot or other catapult.
pfífi \(n, c 3\). [CN] quality of being light in physical weight or of being easily picked up or moved.
píksa \(n, c 1\). [CC] salt; when singular, a pinch or dash of salt.
\(\mathbf{p j} \varepsilon \mathbf{m} v t\). to kill, taking the life of a living being.
plétøm \(v a\). 1. to be straight without curves or in a straight line. 2. to be standing in a rigid erect posture; to be ramrod straight.
plýve \(n, c l\). 1. [CN] nostalgia, homesickness, or other strong feelings of yearning for bygone or faraway times, people, or places. 2. daydreaming or spending idle time thinking. 3. [CC] people who spend too much time reminiscing or daydreaming (usually in a negative connotation). 4. clumsy people. [Origin: connection between daydreaming and not paying attention to the world around them]
plývom 1. vt. to miss or yearn for [sth] or [sbd] known. 2. vi. to daydream or get lost in one's thoughts. 3. to miss something said or done due to inattention.
pói \(n, c l\). [CN] ants, social insects that can sting.
pRá \(n, c l\). [CC] 1. heads; upper portions of bodies containing the brain. 2. highest portions of upright structures (e.g., tops of poles) or terrain (e.g., peaks of mountains).
psílo \(n, c 2\). [CN] 1. blood; bodily fluid that is typically red and is carried through veins and arteries. 2 . life or animacy, typically after the verb em 'to have or possess,' to indicate someone or some animal is alive.
púa \(n, c 2\). [CC] flies, flying insects with transparent wings.

\section*{R}

Rài prep. in, into; indicates movement into a new location.
ré \(n, c 3\). [CC] 1. trees, or plants with bark, branches, and leaves. 2. people who are emotionally strong and provide support and stability for those around them.
-Ron noun suffix. medial demonstrative.
Rónsfem vi. 1. to flow (as in water), moving freely along a course. 2. to run or spread quickly (as in fire), moving freely across an open area.

Rówam \(v t\). to tie, join, or connect [sth] to [sth +dat.] else, typically by physically binding them together.
Róne \(n, c 3\). [CN] 1. calmness, serenity, or peace, often mentally or emotionally. 2. feeling of being free from anxiety or distress.

Rótsam \(v a\). to be thick with opposing sides farther apart than average (e.g., thick tree).
Rúdem 1. vi. to vomit. 2. vt. to forcefully eject [sth]. 3. to force [sbd] to leave a location (with PP to indicate location).

\section*{S}
sà prep. 1. like, resembling, similar to. 2. with [a mannerism or quality]. [Origin: related to zazo 'quality, likeness']
sàbje prep. at, toward; indicates movement in the direction of a specified location.
sábrem \(v t\). 1. to count [sth] to determine the total amount. 2. to add numbers together to find a total amount.
sári \(n, c 3\). [CN] snowflakes or snow falling through the air; crystallized precipitation that does not hurt when hitting the skin.
satoká intens. lit. 'with intensity.' [Origin: \(s a\)-, katra]
sfítim \(v i\). 1. to be in an upright standing position. 2. to stand up, moving from a seated or reclined position to an upright one. 3. to possess the quality of doing well under pressure; to be reliable or trustworthy.
sfúm \(v t\). 1. to wash or clean [sth] to remove dirt or grime. 2. (with reflexive pronoun as object) to bathe.
sfúnem \(v a\). to be clean, being free of dirt, grime, or other visible contaminants. [Related to sfum 'to wash']
síjo, si- num. nine.
sjóm \(v a\). 1. of an environment or situation, to be quiet or tranquil. 2. of a person, to be quiet or still.
sjúm 1. va. to be connected, referring to concepts, ideas, or relationships (e.g., one idea is connected to another). 2. vt. \([+d a t]\) to transition or segue into [sth] else.
ská- verb prefix. indicates first-person plural object.
skáe \(n, c 2\). [CN] 1. danger; possibility of being harmed. 2. foreboding feeling or sense of doom, especially before leaving on a dangerous quest.
sjévrom 1. vt. to create or invent [sth]. 2. va. to be creative or inventive.
slóftum vi. 1. of bipeds, to crawl using all four limbs to move along the ground. 2 . of species with more than two legs, to walk or move using all legs.
slúm \(v i\). 1. to sway or move, as in the wind or breeze. 2. to sway from side to side while standing or sitting upright.
slúre \(n, c 1\). [CN] wind or breeze; movement of the air. [Origin: related to slum 'to sway or move in the breeze']
sném \(v a\). 1. to be white. 2. (of a person) to have unrealistic expectations or to be naïve. [Origin of second sense: metaphor for someone who believes they can clean their tunics so well that no dirt remains.]
sóli \(n, c 1\). [CC] feet; the lowest extremities of human or animal legs that touch the ground when walking.
sRúm \(v t\). to rub [sth] with the hands or to rub two surfaces together, creating friction and heat.
stílu \(n, c 2\). [CN] 1. meat from an animal, typically cooked for consumption. 2. sustenance or source of nourishment. tsai- \(\varepsilon\) l to \(\sim\) to be wealthy or well-off (lit. 'to habitually eat meat').
-su verb suffix. indicates second-person plural subject.
swá \(n, c 4\). [CC] selves or persons, indicating someone's body, soul, and being. Often followed by a genitive pronoun form to create a reflexive reading (e.g., swa akwo 'ourselves') or by a genitive NP to create the interpretation of well-being (e.g., swat abuetanni 'the child's well-being').
swája n, c1. [CC] names or titles of people. [Origin: swa 'selves' \(+j a\) - 'names']
swé \(n, c 1\). [CC] biological siblings or half-siblings. xettó~os a question used to hit on or express sexual interest in a potential mate (lit. 'Are you a sibling?'). [Because a person may have multiple mates in life, siblings are not necessarily raised by the same people. This question serves a practical purpose: to avoid accidental incest. If uninterested, the person answers sàtoǿxte 'probably' (lit. 'with probability'). If interested, the person provides the names of their bama 'parents.']

\section*{t}
-t noun suffix. indicates singular noun form.
tánde num. all of a group or a whole amount.
táwa \(n, c 3\). [CC] 1. grass (when singular, blade of grass). 2. other vegetation that grows naturally and has the appearance of grass with long green blades growing from the earth.
táwakoni \(n, c l\). [CC] wildflowers or flowering weeds. [Origin: tawa 'grass' + koni 'flowers']
téu \(n, c 1\). [CC] hills with slow or slight rises in elevation.
tíli \(n, c 1\). [CC] 1. vines of plants, which tend to wrap around other objects as they grow. 2. ropes or strong cords, typically used to tie up or bundle objects.
tílom \(v t\). to tie up or hang [sth] (e.g., hanging herbs to dry). [Origin: tili 'vines']
-tj rel. relativizer suffix that attaches to an adjective-like verb to indicate a relative clause.
tjáfile \(n, c 3\). [CC] female mates or sexual partners. [Origin: tja 'women' + file 'mates']
tjánadzi, tjana \(n\), c1. 1. [CC] people, human beings. 2. [retains full form in all inflections] civilizations, cultures, or societies. 3. [CN] humanity. [Origin: tja 'women' \(+n a\) 'men' \(+d z i\) 'community']
tjánofile \(n, c 3\). [CC] wives. [Origin: tja 'women' + nofile 'spouses']
tjáRo \(n, c l\). [CC] matchmakers; typically women who identify suitable mate pairings for the best possible offspring. [Origin: tja 'women' + rowam 'to connect']
tjáswe \(n, c 3\). [CC] biological sisters or half-sisters. [Origin: tja 'women' \(+s w e\) 'siblings']
tjávi \(n, ~ c l .[C C]\) the three sky goddesses: Xlevwenda, Kitovu, and Xaneczu.
tjéb, tje- num. seven.
tjélom 1. va. to be happy. 2. vt. to enjoy [sth]. 3. [+dat] to love or like [sbd] without sexual attraction or familial sense of duty.
tjí- verb prefix. indicates first-person singular object.
to- noun prefix. indicates object (accusative) case.
tólavja \(n, c 3\). [CN] singing or chanting. [Origin: to- 'languages, speech' + lavja 'pleasing sounds']
tónem va. 1. to be in halves or in two pieces (e.g., after being cut). 2. to naturally exist in halves (e.g., cloven hooves).
tónkawam \(v t\). to split, cut in half. [Origin: tonem 'to be in halves' + kawam 'to cut or slice']
tóntem \(v t\). 1. to bite [sth/sbd] using the teeth. 2. to bite into [sth] for the purpose of eating it.
tóva, to- \(n, c 3\). 1. [CC] languages, shared systems of communication among communities. 2. [CN] speech; communicative expression of inner thoughts or feelings.
tózvim \(v t\). to argue with [sbd] or fight using words, threats. [Origin: to- 'language' \(+z v i-\) 'to fight']
tó- \(n[C C] \rightarrow v a\). turns a common count noun into a verb-like adjective.
tóli \(n, c l\). [CC] strands of hair grown on a body.
tró- verb prefix. indicates third-person singular object.
túim vi. to spit, forcing saliva out of the mouth.
túrmi \(n, c 2\). [CC] walls or structures built to support roofs while creating separate rooms.
twé- verb prefix. indicates third-person plural object.
twígom va. 1. to be short or small (in length). 2. to be short in stature or height.
tý pro. second-person singular.
tým vi. to live or reside in a location (requires PP of location).

\section*{ts}
tsá \(n, c 3\). [CN] cold or coldness of temperature. Typically used with em 'to possess.'
tsáim \(v t\). to eat or consume food for nourishment.
tséo \(n, c l\). [CC] burns or burned areas on the skin, typically resulting from contact with fire or a hot surface.
tsćki \(n, c 3\). [CC] worms; invertebrate animals that burrow into the ground.
tsi- verb prefix. indicates second-person plural object.
tsíki \(n, c 2\). \([C N]\) sharpness, the ability to pierce or cut a surface.
tsímpam \(v i\). to be physically weak, lacking power, strength, or ability.
tsú pro. second-person plural.
tsúgo \(n, c 3\). \([C C]\) tongues; organs inside the mouth used for speaking and swallowing.
tsúke \(n, c 2\). [CC] crabs, lobsters, or other shellfish with pincers.
tsúmbo \(n, c 1 .[C C]\) bellies; external, visible area of the stomach. 2. torsos; area between hips and shoulders.
tsýkom \(v a\). to be thin with opposing sides closer together than average (e.g., thin tree).

\section*{U}
-u noun suffix. indicates a C2 noun.
úano \(n, c 3\). [CC] ponds, puddles, or small bodies of water surrounded by land that are largely unaffected by tides.
úbum vi. to run or move quickly on foot.
údo \(n, c 3\). \([C C]\) turtles, reptiles with shells.
úgem \(v t\). to propel, throw, or cause [sth] to fly through the air.
ùno prep. [+dat] because, because of, due to; indicates a reason or cause. [Origin: related to nom 'to cause']
úts- \(v \rightarrow n, c 4\) [CC]. turns a verb into a related common count noun.
úvkre \(n, c 2\). [CC] rats; rodents with a pointed snout and long tail that often appear underground or in unclean places and carry disease.
úxnu \(n, c 2\). \([C N]\) dryness; the quality of lacking moisture.
V
váza \(n, c 1\). [CN] 1. warmth, relating to temperature. 2. body heat. em to \(\sim\) to still be alive, esp. in a situation where the expectation is that the human or animal has already died or should have died (lit. 'to have body heat').
vé pro. what, interrogative pronoun referring to non-human.
véklu \(n, c 4\). [CC] 1. instances or examples of an idea, quality, or activity. 2. events, occurrences, or incidents; happenings.
véx- \(n[C N] \rightarrow n\lceil C C]\) turns a non-count noun into a related count noun. [Origin: related to veklu 'instances']
véxane \(n, c 3\). [CC] candles; small objects that are lit with fire to provide light and are often waxy.
[Origin: vex- 'instances' + xaףe- 'soft, diffused light']
vína, vi- num. eight.
vjúdom \(v a\). 1 . to be long in length. 2 . to be tall in height.
vlómo \(n, c 3\). [CN] 1. fat, blubber, or fatty substance that creates oily or greasy texture when cooking. 2 . fatty layer underneath the skin.
vóske \(n, c 3\). 1. hollow areas within a larger surface. 2. caves, areas underground hollowed out by water.
vǿfo \(n, c 2\). [CC] dogs or wolves; animals belonging to the canine family.
vólom vi. to swim, propelling the body through water or other liquid substance.
vú pro. third-person C2 singular.
vwébu \(n, ~ c 1\). [CC] women capable of having babies. [Origin: vwenbue, vwen- initial syllable of respect for women + bue 'babies']
vwéntja, tjá \(n, c 3\). [CC] ladies, women, female humans. [Note: The older form of the word is \(t j a\), but the initial syllable was added as a sign of respect for a woman's ability to produce life, modelling the goddess Xlevwenda's name.]
vwýdei \(n, c 3\). [CC] rivers, or large streams that flow into another body of water and that are typically home to fish and other aquatic animals.

\section*{W}
wáwa n, \(c 3\). [CC] 1. foods, items for consumption and nourishment. 2. meals or dishes prepared for consumption.
-we noun suffix. indicates a C1 noun.
wélem \(v a\). to be full or filled with a substance (as in a container or river).
wém \(v t\). to wipe [sth] with a swiping or rubbing motion, often to clean it.
-wi verb suffix. indicates perfective aspect.
wílem \(v t\). to love or care deeply about [sbd]. Used to indicate emotions of familial attachment or strong friendship.
wótsam \(v a\). 1. to be black. 2. to be so dirty, filthy, or grimy as to appear black or very dark in color.
wóxe, wox- \(n, c 1\). [CN] 1. land; physical terrain not covered by water. 2 . country or territory associated with a particular group or community.

ẁ̀ prep. with, along with, or accompanied by [sbd]. [Origin: related to wode 'and']
wod, wo- conj. and, in addition to (provides a grammatical connection among equally ranked constituents).
wú- \(v a\). become [verb] or change to a particular state; attaches to a verb-like adjective root to indicate a change in state. [Origin: related to wuzom 'to change']
wúzom \(v i\). to change or shift, taking on new qualities.

\section*{X}
xám \(v i\). to laugh, showing humor or entertainment. [Origin: imitative]
xánétu \(n, c 2\). [PN] second moon goddess. [Origin: related to xanem 'soft, diffused light']
xánela \(n\), \(c 3\). [CN] 1. social grace or poise, especially in dire or complex situations. 2. (of a person) beauty. [Origin: related to \(x a \eta \varepsilon d z u\), the name of the second moon goddess, who represents elegance and beauty]
xáne \(n, c 3\). [CN] soft, diffused light, such as light from a candle, light seen through a cloth, or twilight. xét- verb prefix. indicates the interrogative mood.
xílom \(v t\). to touch or feel [sth] by physically coming into contact with it.
xjétom va. 1. to be located or situated on the right-hand side. 2. to be subordinate. [See note at dasam.]
xléve, xle- \(n, c l\). [CN] 1. sky or air above the earth. 2. heavens, associated with the realm of the goddesses.
xlévwenda \(n\), cl. [PN] sun goddess. [Origin: related to xle- 'sky, air, heavens']
xógem \(v t\). to dig into, using an instrument or tool.
xúm va. 1. to be full or sated (as in appetite). 2. to be satisfied or content.
xwáli \(n, c 2\). [CN] dust, pollen, or any fine powder consisting of smaller particles that settles on stationary structures.

\section*{y}
ý \(n, c l .[C C]\) bird eggs, which have a harder, solid shell (as opposed to reptile or fish eggs).
ýdegom \(v t\). 1. to mix substances together, typically in a stirring motion. 2. to churn, turning a liquid substance into a solid one, such as milk into butter.
ýne \(n, c 3\). [CC] streams, creeks, or small rivers that can be easily crossed.
ýsem \(v i\). to be able, have the ability. When used to introduce a clause indicating an event or condition that can occur, it is followed by ivé and an infinitive verb form.
ýzje \(n, c 1\). [CC] sweet, edible fruits of trees or vines that contain seeds.

\section*{Z}
záikro \(n, c 1\). [CN] heat, esp. heat felt from a large source (i.e., heat from the sun, a large fire; heat felt all over). [Origin: \(z a\) - 'quality' \(+i k_{R o}\) 'fire']
zákitva \(n, c 2\). [CN] heat, esp. heat felt from a small source (i.e., a pinprick of heat). [Origin: \(z a\) - 'quality’ + kitva 'fires, flame']
zázo \(n, c 4\). [CN] quality, likeness, or similarity.
zá- \(n[C C] \rightarrow n[C N]\) turns a count noun into a related non-count noun. [Origin: related to zazo 'quality']
zbúm vi. 1. to fall down from a standing position. 2. to fall or drop from a higher location. 3. to fall or roll down an incline (e.g., roll down a hill).
zéwa pro. when, interrogative pronoun.
zékjom \(v t\). to believe, feel, or think [sth], typically without evidence or rational thought.
zígi \(n, c 2\). \([C C]\) snakes; reptiles without limbs that slither.
zláta \(n, c 1\). 1. [CC] birds; feathered animals typically capable of flight. 2. [CN] freedom, ability to act as one wishes.
zóvja \(n, c 1\). [CC] cats; animals belonging to the feline family.
zǿjam 1. vi. to ask or pose a question. 2. vt. to question [sbd] to get information. [Origin: related to zøm 'supplicate' and \(a m\) 'say']
zǿm \(v t\). to ask or request [sth, acc] from [sbd, gen].
zǿne n, cl. [CC] mouths; oral cavities typically containing tongue and teeth.
zRóm va. to be far in distance.
zúli, zu- num. six.
zválje \(n, c 2\). [CC] 1. sweets foods or desserts, typically made with some kind of sugar and reserved for special occasions. 2. rewards in recognition of an accomplishment or achievement.
zvé \(n, c 3\). [CC] fish; aquatic animals.
zvénim, zvi- \(v t\). to fight [sbd], typically with fists and bodily strength.
zwízom va. to be crooked or uneven (typically used to indicate straight line or edge is either not parallel or not perpendicular to some other surface).

\section*{NUMBERS}

0 ému
1 ह́t
2 káts, ka
3 áve, a
4 kwén, kwe
5 dó
6 zúli, zu
7 tjéb, tje
8 vína, vi
9 síjo, si
10 níkot, niko, ni
11 nízt
12 níka
18 nívi
20 kániko
21 kánict
30 ániko
49 kwénisi
100 níniko
101 níni६t```


[^0]:    ${ }^{1}$ They live roughly in what we would call western Germany, but the landscape has changed so much that it is difficult to pinpoint their exact location.

[^1]:    ${ }^{2}$ An exception to this is when both moons are aligned during an equinox, creating two new moons or two full moons on the same day as an equinox; when that occurs, the tide floods the village.
    ${ }^{3}$ One possible translation of this word is 'babymakers.' The word indicates women who are capable of having babies, which means they have matured to an age that they are capable of giving birth and are both fertile and healthy.
    ${ }^{4}$ Modern English lacks a word that is inclusive of gender; while many seamsters are, in fact, seamstresses, there are male seamsters.
    ${ }^{5}$ The tjáro are a class of matchmakers who study genetics and patterns of births; they are typically women, and they identify suitable mate pairings for the best possible offspring.
    ${ }^{6}$ While most warlords are male, one female warlord lives in infamy-both for her intelligence and brutality.

[^2]:    ${ }^{7}$ Krýksa are large intelligent predators of humans that communicate with sounds that the humans have interpreted as nonsensical language noises. Due to the way they attack, it appears they behave as an organized group with planned actions and frontlines; it is unknown whether they are actually using a language and attacking according to a plan or if they simply have a strong sense of "pack mind."
    ${ }^{8}$ The labio-velar [w] has been included in the bilabial column, as it is in many versions of the IPA chart; furthermore, this placement reflects the fact that Wóxtjanato allows [kw], [gw], and [xw] clusters but not [mw], [bw], or [pw].
    ${ }^{9}$ Tent (1993:357) argues that any vowel system with rounded front vowels will be asymmetrical due to the lack of unrounded back vowels.

[^3]:    ${ }^{10}$ Parker (2002: 240) provides this hierarchy: voiceless stop/affricate $>$ voiced stop/affricate $>$ voiceless fricative $>$ voiced fricative $>/ \mathrm{h} />$ nasal $>$ trill $>$ laterals $>$ approximants $>$ vowels $(\dot{i}>\rho>$ high vowels $>$ mid vowels $>$ low vowels).

[^4]:    ${ }^{11}$ The lack of an adverb category follows the parts-of-speech hierarchy identified by Haspelmath (2012: 125): predication (verb) $>$ reference (noun) $>$ attribution (adj) $>$ adverbation.

[^5]:    ${ }^{12}$ Infinitive verb forms are typically unmarked, indicating a neutral subject; however, they can be marked for subject in certain cases, especially constructions providing a reading of for $X$ to $V E R B$ (e.g., for you to understand).

[^6]:    ${ }^{13}$ While renaming ceremonies do occur, renaming is taken very seriously and indicates either a big event has occurred (e.g., becoming a warlord, disgracing the family) or a major shift in personality traits has occurred.

