

TUAHAUMUA

Tuaaumua [tūḥzū'mū], lit. ‘stampage’, was a defective syllabary used for the Sabasasaj language¹. It was written by scratching with a pointy stylus in clay, not in fact typically by stamping, although stamped official documents are known.

It must be imagined that the script was originally a logography, passing through a complex script stage before reaching the syllabic stage. Sadly, a relay run on a logography would have turns measured in years. The bipartite Sabasasaj verb isn’t particularly well suited to logographic treatment anyhow.











The direction of writing was boustrophedon, with the first line at the top of the text running right to left. Reorienting the individual glyphs in left-to-right lines was not usual.

GLYPHS





























The glyphs have values following the acrophonic principle, and in perhaps the majority of cases are still recognisable as pictures. For interest’s sake I have given the words they stand for in the table.
























I have ignored variation of shape in the glyphs. Several of them had alternate forms, usually more ornate than the one I’ve shown.

Many syllables are represented by more than one glyph in free variation. Individual scribes may show preferences in which words contain which, but few such preferences can be stated globally. (This variation is gradually dying out; there were yet more a hundred years ago.) In this case, the glyphs are listed in the table below in descending order of frequency, and all but the first are given names with subscripts, like **ga**₂.

	a	i	u
ph	 pha <i>phaia</i> ‘teeth’	 phi <i>phinkarama</i> ‘inheritance’	 phu <i>phulumu</i> ‘sweat’
th	 tha <i>thasan</i> ‘knot’	 thi <i>thisa</i> ‘woman’  thi ₂ <i>thiuida</i> ‘locust’	 thu <i>thuusiba</i> ‘heart’
kh	 kha <i>khanda</i> ‘eye’	 khi <i>khigiumaan</i> ‘bargepole’	 khu <i>khuir</i> ‘cow’

¹Slightly old versions of a Sabasasaj grammar and lexicon are online.

		 khi₂ <i>khisuuu</i> 'portion of food'	
p~b	 ba <i>paumaa</i> 'tongue'  ba₂ <i>baltau</i> 'wound'	 bi <i>piuhrum</i> 'king'	 bu <i>butha</i> 'moon'
t~d	 da <i>dawitah</i> 'face'  da₂ <i>takuia</i> 'arm'  da₃ <i>tatagauman</i> 'statue'	 di <i>diman</i> 'fish'  di₂ <i>tihidi</i> 'wheat'	 du <i>tuam</i> 'house'  du₂ <i>tudjasuuda</i> 'mouse'
k~g	 ga <i>gadii</i> 'dog'  ga₂ <i>kaakhasa</i> 'torch'  ga₃ <i>gawwa</i> 'four'	 gi <i>ginsidaian</i> 'rollers'	 gu <i>kukarii</i> 'cock'
m	 ma <i>mandaan</i> 'potter's wheel'  ma₂ <i>madakunruua</i> 'table'	 mi <i>mjaai</i> 'cat'	 mu <i>mugara</i> (placename)
n	 na <i>namandaan</i> 'pot'  na₂ <i>naitaraah</i> 'dust (cloud)'	 ni <i>niwui</i> 'two'	 nu <i>numiduah</i> 'footprint'
r	 ra	 ri	 ru

	— ²	—	—
l	 la <i>laguila</i> 'folded (cloth)' 	 li <i>lihii</i> 'snake'  li₂ <i>ljagassa</i> 'snare trap'	 lu <i>luthui</i> 'owl'  lu₂ <i>luisajaldi</i> 'bitter vetch'
s	 sa <i>sanniaj</i> 'door'	 si <i>siarua</i> 'tree'  si₂ <i>sinwa</i> 'three'  si₃ <i>siwthuaaawniw</i> 'chest'	 su <i>sulu</i> 'hand'
h	 ha <i>haam</i> 'man'  ha₂ <i>haumtia</i> 'nest of eggs'	 hi <i>hjaakhiuldu</i> 'forecourt'	 hu <i>huala</i> 'apple'  hu₂ <i>hwiakansaj</i> 'hide'
∅	 a <i>aataua</i> 'stone'  a₂ <i>aahagansia</i> 'road'	 i <i>irua</i> 'sun'  i₂ <i>iakhisua</i> 'pointy end'  i₃ <i>insiasuua</i> 'antler'  i₄ <i>ikhasuu</i> 'falling snow'	 u <i>udaram</i> 'onion' ³  u₂ <i>ukhasa</i> '(built) fire'

As for punctuation, inter-word space was not used, nor was any special notice taken of cases where single words were broken across a line. Clauses and subclauses

²**r** does not occur initially in Sabasasaj. The **r** series was formed by inverting the **n** series; the language shows some alternations between **r** and **n**.

³Yeah, I know what it looks like. Minds out of the gutter.

were set off by a simple vertical | scored across the line of text. More significant breaks, and the end of the text, used multiple verticals, typically three |||.


PHONOLOGY AND GLYPH USAGE

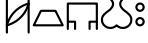

The maximal Sabasasaj syllable is CGVVC, where G is a glide /β j/.

Onsets. Sabasasaj has the following consonant phonemes.

	m	n		
p ^h	p	b	t ^h	t d
				k ^h k g
		β	s	j
				h
			r	
			l	

Romanisation is mostly as expected; /p^h t^h k^h/ are *ph th kh*, /r/ is *r*, /j β/ are *j w*.

Tuahaumua systematically ignores the distinction between tenuis and voiced stops, e.g. /pi/ and /bi/ are both  **bi**. It also ignores consonantal allophony: significant cases are that /k^h k g h/ become [c^h c ɟ ç] next to tautosyllabic /i j/, and are slightly uvularised or pharyngealised in the vicinity of [ɣ], while /h/ before /β/ is [ɸ]. [ʔ] is a variant rendering of intervocalic /h/.

The consonants /j β/ are written as though they were the vowels /i u/. This is not wholly unjustified, as /i u/ become /j β/ between vowels; under the same circumstances /a/ becomes [ɣ]. Note also that /j β/ are [j w] post-consonantly. (The only consonants /β/ may follow within a syllable are velars and /h/.) For example, *njuhiaba* ‘poison’ can be written as  **ni-u-hi-a-ba**₂, and *hwasi* ‘pig’ as  **hu-a-si**.

Some writers spell /j β/ [ɣ] with **i**₂ **u**₂ **a**₂ relatively consistently. The converse of this consistency is not observed: **i**₂ **u**₂ **a**₂ are still also used for vowels proper.

Nuclei. Tuahaumua has no trouble with the vowels of Sabasasaj, which phonemically number just three, /a i u/. These have peripheral values [ä i u] when stressed, but are [e ɪ u] when unstressed, and [ɑ^(ɻ) ɛ̃^(ɻ) ɔ̃^(ɻ)] near [ɣ]. Stress, incidentally, is predictable and unmarked in the script.

Clusters of two phonemic vowels have special realisations.

V ₁ ↓ V ₂ →	/a/	/i/	/u/
/a/	[ɑ:]	[æi]	[ɜ̃u]
/i/	[iɛ]	[i:]	[iu]
/u/	[uɔ]	[ui]	[u:]

Long vowels are spelled the same as single vowels in Tuahaumua, and indeed two successive identical vowel phonemes tend to be simplified in spelling even when one has become a consonant. But the clusters of nonidentical vowels are spelled out, **Ci-a** for [Ciɛ] and so forth.

Codas. Tuahaumua exhibits two strategies to deal with coda consonants, omission and prop vowels, aside from coda /j β/ which, as elsewhere, are consistently spelled as if they were /i u/.

Omission of codas is more common for sonorants, especially nasals, and is also more common for codas which never paradigmatically alternate with onset consonants, such as codas internal to multisyllabic morphemes. E.g. *jambu* ‘sea’, which is monomorphemic, might be $\text{C}\Delta\text{V}$ **i₂-a-bu**.

The *prop vowel* strategy refers to spelling V_iC as V_iCV_i , with a duplicate of the preceding vowel. This is more common for non-sonorants, and for codas which alternate with onsets. A straightforward prop-vowel spelling is $\text{H}\text{O}\text{L}\text{O}$ **i-gu-i-si₃** *igwis* ‘glass’.

An important complication is that Sabasasaj does not permit stops as codas. Stops are neutralised to continuants: in particular /p^h t^h p t/ become /s/, /k^h k/ become /h/, and /d/ become /r/. In words where this alternation is sufficiently obvious to speakers, stop + prop vowel may be written for what is phonetically a continuant coda. For instance *khuir* ‘cow’ has typical spellings like $\text{X}\text{L}\text{+}$ **khui-di**; note that its plural is *khuidu*. The third singular inanimate object marker /d, r/ also tends to be spelled fairly consistently **d**.

ALPHABETICAL ORDER

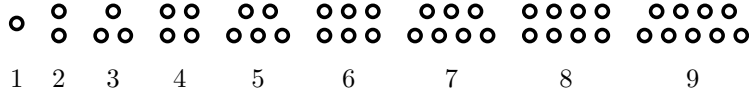
Although there is no tradition of alphabetical sorting of lists, orders of the graphemes of Tuahaumua are beginning to emerge through teaching document traditions. The strongest tradition orders the glyphs taxonomically according to what they depict. Below is a consensus order of the glyphs in the table.

bi ha da₃ thi
 da phu kha pha ba
 hu₂ su da₂ ba₂ thu nu ru
 khu ga mi i₃
 lu gu du₂ di li thi₂ ha₂
 si di₂ khi lu₂ hu u
 i bu i₄ a na₂
 mu a₂ gi du hi sa si₃ ma₂
 na ra ma phi
 u₂ ga₂ khi₂ i₂ li₂ tha la
 ni ri si₂ ga₃

NUMBERS


One family of logographs which did survive in Tuahaumua is the numbers. Given that numbers appear among the syllable glyphs, I’ll include a treatment of the full system here.

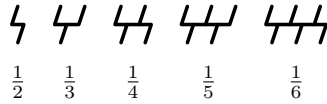
The small naturals are clusters of small circles:

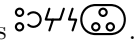



Sabasasaj has a mixed base 10/120 system. Here are the larger units in frequent use; larger ones yet can be generated on the same pattern.



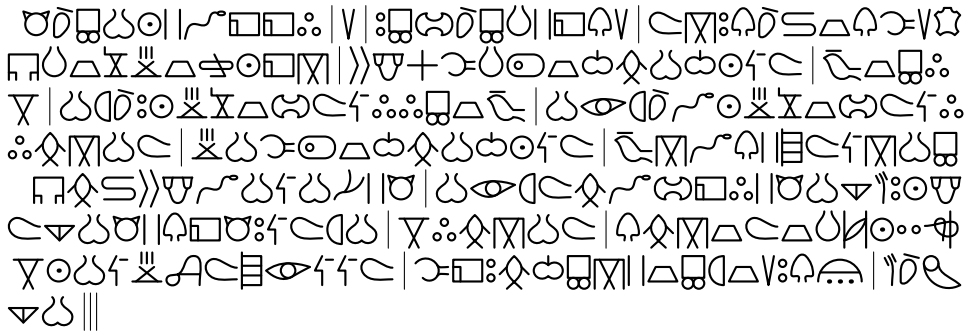
Multiples of 120 used clusters of small circles inside a large loop, as in  360. The unit fractions are also important; the first several are below.



Their importance is due to the fact that Sabasasaj represented the decades from 20 up not as multiples of 10 but using *fractions of 120*. For example, the number 472 was spoken as $120 \cdot (3 + \frac{1}{2} + \frac{1}{3}) + 10 + 2$, and spelled out likewise as . Even when a multiple of 120 was not present, the fraction signs were used: e.g. the number $20 = \frac{1}{6} \cdot 120$ was spelled as , and was therefore ambiguous with the actual fraction $\frac{1}{6}$, though context could generally be relied on to tell them apart. Note however that the notation proceeded from larger units to smaller, so $28 \frac{1}{6}$ was distinguished from $8 \frac{1}{6}$.

SAMPLE TEXT

This is the text from LCC relay 2, which you can follow along with at <http://dedalvs.com/relay/previous/lcc2results/4.html>.



hu₂-i₂-su-si-a-la nu-si-ni-bi ba | i₂-si-du-a₂-na gi nu-mu-gi-ni | i₂ | si₂-du-du li-a₂-i-u gi nu-mi-hi-na a-da₃-u₂-a thi₂-i-du-bi | da₂ ga-khu-su-na phi-a hu di-u-hu-i-da-ba | gu-a-gi si₂-si₂-da-ba mu a-da₃-u₂-i-li-nu bu-kha-u | gu-a-gi si₂-si₂-da-ba mu a-da₃-u₂-i-ni-nu bu-u | ha si₂-di-bi-u-ba | u₂-u-su phi-a hu di-u-hu-i-da-ba | gu-bi-li-si a₂-sa ba-da bi-u-gi-ga i-ni di₂

thi-u mi-a₂ si₂-du-mu-li-di-ba bu-kha-u | mi-a₂ i₃-u-da-u-li-ga da₂-la-di-
hi ba thi-u mi-a₂ si-du-mi-ni-da-ba bu-u | ha si-di-bi-u-ba | si₂-di-bi-a-ba
a-na ba₂-i-ri tha-lu-nu di₂ | phu-si-ni i₂-a-bu gi a-a₂-bi gi hu di-ni-du-su
| ba-da-da kha-sa ba li₂-u₂-da-u i ha thi-u |||

Hwisunsial nunsinbi ba, insiduana gi numugin "ii!" sidur liaiur gi numihinam aataua thjirpi. Ta kaakhusna phjaa hu tjuhuindaba: "Kuagi sisidaba mu aatauili-innu, puukhau?". "Kuagi sisidaba mu aatauinnu, puuu." ha sidinbiuba. Wus phjaa hu tjuhuindaba: "Kubiliis as paar piugikaan in din thiu mia sidumlirpa, puukhau?". "Mia judauliga taladih ba thiu mia sidumindaba, puuu." ha sidinbiuba. Sidinbias anaa pairi thalun din, phulsin jambu gi aaabi gi hu tiindus. Badalda khas ba liwdau i ha thiu.