

Script and sound system of Meiteilon

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Abstract

Meiteilon [*məitəilon*] is a tibeto-burman language spoken mainly in the state of Manipur, Northeast India. The paper provides an account of the history and development of Meitei Mayek or Meiteilon script, and attempts to present a diachronic analysis of the sound system in Meiteilon. Of the different versions of Meitei Mayek in existence, three versions namely: the 18 scripts, 27 scripts and 35 scripts systems which have been connoted by the local scholars are taken into consideration. In the early part of the 18th century, the Bengali script was adopted by the Meitei kings as an official writing system for the language. Subsequent studies have revealed the existence of a huge gap between the old and new *Meiteilon*, particularly concerning aspects of phonology. The reason may be located in the addition of more letters or graphemes into the original set of Meiteilon script due to language contact. Chelliah (1997:365) states that with the adoption of Hinduism in the 18th century, the Bengali alphabet became popular for the writing of Meiteilon, and from the 19th century onward the use of *Meitei mayek* (Meitei script) for all genres of writing declined. In the year 1980, the Government of Manipur recognised the 27 script as official *Meetei mayek* or *Meitei mayek* in Gazette notification (Meitei and Meetei are the terms that refer to the same community).

Keywords: Meetei, puya, Meiteilon, diachronic, grapheme

1. History of Meitei Mayek:

The earliest evidence of the *Meitei Mayek* [alphabets system of *Meiteilon*] is found in the archaic handwritten scriptures known as the *Puya(s)* of the Meitei people. Owing to disturbances and destruction caused by external colonial forces much of the old *Puya(s)* have been lost to time, but it may be understood that the ancient handwritten scriptures which were a valuable part of the administrative and chronicling work carried out by the court scholars approved by rulers of Manipur throughout history.

The titles of the *puya* are usually associated with the terms namely, *lon~lol*, *t^hilen*, *sakok*, *sin̄kək*, *yan̄pi*, *jimpi*, *laihui*, *l̄mpubə*, *naujom*, etc., relating to the subject matters in specific areas. The name associated with “*lon*” deals with the description or detail knowledge of a particular subject; “*t^hilen*” indicates that the *puya* is a research work; “*l̄mpubə*” indicates about the administration of kings; “*laihui*” indicates the lineage; etc. So, *puya* are documents related to various subjects in science and arts including all kinds of their branches.

Unfortunately, many *puya(s)* were gathered and destroyed (by incinerating) during the reign of King Pamheiba in the early 18th century. The ancient manuscripts discovered so far are found to be as early as 18th century CE. These manuscripts deal with various subject matters. Meitei scholars claim that many of them were copied from the original manuscripts just before the vandalism by the order of King Pamheiba (Garibniwaja). A note is included in the *puya* “*wakoklon hi'lel t^hilel salai ə'ma'ilon pukok*”, mentioning that the very *puya* was copied by a courtier named *Caupa* before the vandalism of all *puya* by the king. According to Kalidas Nag, Meitei script existed long before King Ashoka's period (Khelchandra, N 2004: 29).

It is also accepted by the Meiteis that King Maliyapham palcha had introduced an era called Maliya Kum (the year of Maliya) and it has been included in the modern Meitei calendar also. Note that the year 2022 is 3420 in Maliya Kum, which means, the 3420th year of King Maliyapham palcha in Meitei Calendar. Therefore, Maliya Kum started in 1398 BCE (i.e. 3420 - 2022 = 1398). Thus, many scholars opined that Meitei writing system or numerals might have been in existence as early as 14th century BCE.

1.1 The Meitei script

There are multiple versions of *Meitei mayek* of which only three versions namely: the 18 scripts, 27 scripts, and 35 scripts systems have been connoted by the local scholars. It is these three authorized versions that have been taken into consideration for this paper. The three script systems are explained briefly below:

- i. **18-script system:** This script system consist of 18 main symbols or phonemes transcribed in IPA(International Phonetic Alphabets): 𑜀𑜃𑜫 - /p/, 𑜁𑜃𑜫 - /t/, 𑜂𑜃𑜫 - /c/, 𑜃𑜃𑜫 - /k/,

E - /p^h/, Ɔ - /t^h/, Ɔ - /k^h/, Ɔ - /m/, Ɔ - /n/, Ɔ - /ŋ/, Ɔ - /s/, Ɔ - /l/, Ɔ - /h/, Ɔ - /y/,
 Ɔ - /w/, Ɔ - /ə/, Ɔ - /i/, and Ɔ - /u/. This system is based on hand-written text or
puya, namely, *wakoklon hi'lel t^hilel salai əma'ilon pukok* and *wakoklon ŋasapaki siŋkak*
 respectively (Kangjiya, Ng 1978: 7). According to this *puya*, the term *Meetei* is used
 instead of *Meitei*, hence the script system is known by the name *Meetei mayek*. The
 unique characteristic feature found in 18 script system is the derivation of voiced
 consonants from voiceless consonants by marking a dot below the voiceless consonants,
 such as, the grapheme Ɔ[p] with a dot below it denotes the voiced phoneme [b]. In the
 18-script system, tones are marked by putting a dot on the tone bearing segment. There
 are two register tones in Meiteilon; high tones are marked and low tones are unmarked.
 For example;

High tone

1. Ɔ.Ɔ

ha'i

'(be) say'

Low tone

2. ƆƆ

hai

'(be) swing'

27-script system: This script system has 27 main symbols. It contains 18 symbols which
 are similar with the 18-script system (except the dots on the three vowels). There are 9
 other consonantal phonemes, namely, /b/, /d/, /l/, /g/, /bh/, /dh/, /gh/, /h/ and /r/ which
 are derived from voiceless consonantal phonemes, such as, /p/, /t/, /c/, /k/, /p^h/, /t^h/, /k^h/,
 /s/ and /l/. One unique feature of this system is the introduction of a mechanism for
 consonant cluster formation. A ligature also known as *əpun iyek* is placed under the two
 consonants forming the cluster. The text *cətləm yaŋbi puya* mentioned about the 27
 symbols of *Meitei mayek*. In this *puya*, it had been mentioned that during the reign of
 King Khagemba (16th Century CE), a man by the name Nongsamei sought permission
 to introduce 11 (eleven) more symbols to the “**original 27 (twenty seven) symbols**” so
 that the Meitei script would match with the Bengali script (Chinglen, N 2015: 162).
 From the above information, it is also noted that Meitei script system may have been
 influenced with the arrival of eastern Indo-Aryan languages.

- ii. **35-script system:** This system is based on *puya*, namely, *taobiroilai yan̄bi*, *mayek laisak takpa puya*, respectively. In this system there are 34 consonant phonemes which are matched with the 34 consonants in Bengali script; and a symbol for /ə/ sound is added to make the system to 35 main symbols. Unlike the other two script systems, in 35-script system vowel sounds like /i/ and /u/ were not included in the inventory of the sound system. Nonetheless, it is observed that most of the symbols used in this system are similar with that of 27-script system except with the extra 9 symbols (cf. Table 1). It is to be noted that this system might be devised by Nongsamei as mentioned in the above system of 27- script. Scholars like N. Khelchandra supported the 35-script system as true Meitei script (Khelchandra, N 2004: 29).

The following Tables 1, 2, 3, 4 and 5 shows the variations of the three systems of scripts (i.e. 18, 27 and 35 script systems) and Bengali script for reference. The sound system of Meiteilon is transcribed in IPA in all the tables.

Table 1. Consonant graphemes

		I P A	18 Script system	27 script system	35 script system	Bengali script	Remarks
Stops	Voiceless Unaspirated	p	ᱯᱟ	ᱯᱟ	ᱯᱟ	প	
		t	ᱠᱚ	ᱠᱚ	ᱠᱚ, ᱠ	ত, ট	In 35 script system, out of the two graphemes for the sound /t/ the second one is rarely used.
		c	ᱪᱚ	ᱪᱚ	ᱪᱚ	চ	
		k	ᱫᱚ	ᱫᱚ	ᱫᱚ	ক	
	Voiced Unaspirated	b		ᱛᱚ	ᱛᱚ	ব	
		d		ᱤᱞ	ᱤᱞ, ᱤ, ᱤ	দ, ড	In 35 script system, out of the two graphemes for the sound /d/ the second and third ones are rarely used.
		ɟ		ᱠᱚ	ᱠᱚ	জ	
		g		ᱡᱚ	ᱡᱚ	গ	
	Voiceless	p _h	ᱦᱚ	ᱦᱚ	ᱦᱚ	ফ	
		t ^h	ᱢᱚ	ᱢᱚ	ᱢᱚ, ᱢ	থ, ঠ	In 35 script system, out of the two graphemes for the sound /t ^h / the

	I P A	18 Script system	27 script system	35 script system	Bengali script	Remarks
Voiced Aspirated						second grapheme is rarely used as the following ঠ [tʰ] are found in Bengali alphabets. Note that the voiceless aspirated retroflex stop is absent in Meiteilon.
	k _h	𑒧	𑒧	𑒧	থ	
	b _h		𑒧	𑒧	ভ	
	d _h		𑒧	𑒧, 𑒧, 𑒧	ধ, ঢ	In 35 script system, out of the three graphemes for the sound /d ^h / the second and third ones are rarely used.
	ɟ ^h		𑒧	𑒧	ঝ	ম
	ɡ _h		𑒧	𑒧	ঘ	
Nasal	m	𑒧	𑒧	𑒧	𑒧	
	n	𑒧	𑒧	𑒧	𑒧, 𑒧, 𑒧	ন, ণ, ঞ
	ŋ	𑒧	𑒧	𑒧	𑒧	ঙ
Fricative	s	𑒧	𑒧	𑒧	𑒧, 𑒧, 𑒧, 𑒧	স, শ, ষ, ছ
	h	𑒧	𑒧	𑒧	𑒧	হ
Lateral	l	𑒧	𑒧	𑒧	𑒧	ল
Approximant	w	𑒧	𑒧	𑒧	𑒧	ৱ
	j	𑒧	𑒧	𑒧	𑒧	য
	ɹ			𑒧	𑒧	ৱ
					𑒧	ঋ

Table 2 Vowel graphemes

	IPA	18 script system	27 script system	35 script system	Bengali script	Remarks
Monophthongs	ə	ঐ.	ঐ	ঐ	অ	
	i	ঈ.	ঈ	ঈ	ই	Not included in the inventory of main symbols in 35 script system, but found in many texts. In this system, I [i] is replaced by ঐ [yi] in many written texts.
	u	ঊ.	ঊ	ঊ	উ/ঔ	Not included in the inventory of main symbols in 35 script system but, sometimes used as /u/ or /əu/.
	o	ঔ	ঔ	ঔ	ও	
	e	ঐ	ঐ	ঐ	ঐ	Not included in the main symbols of 35 script system but, a symbol similar to the Bengali script ঐ is found in many texts.
	a	ঐ	ঐ	ঐ _a	আ	
Diphthongs	əu	ঐ	ঐ	ঐ	ঐ	Looks slightly different in 35 script system.

	IPA	18 script system	27 script system	35 script system	Bengali script	Remarks
	əi	ঐ	ঐ	(ঐ)/ঐৱ	ঐ	Some puya written in 35 script system use both AE and AI for [əi].
	ui	ঊৱ	ঊৱ	-	উই	In 35 system a variation 'wui' is used instead.
	oi	ঔৱ	ঔৱ	-	ওই	In 35 system a variation 'woi' is used instead.
	ai	ঐৱ	ঐৱ	ঐ	আই	Looks different in 35 script system.
	au	ঐৱ্ব	ঐৱ্ব	ঐৱ	আউ	Looks different in 35 script system.

The demerits in 35-script system can be summarised as follows:

- i. The symbol of /i/ and /u/ are not included in the inventory of 35 symbols.
- ii. Use of some vowel symbols as dependent vowel signs or vowel matras is quite common in text written in 35-script. This method seems to be intended for tonal distinction. This is quite different from the writing style of *puya* as in 18 or 27-script systems.
- iv. The words in Meiteilon like, [isiŋ] 'water', [ucek] 'bird' are written as [yisiŋ] and [wucek] in some text written with 35-script system in an attempt to avoid the use of the symbols /i/ and /u/ respectively. From the etymological point of view, *yisiŋ* and *wucek* make no sense.

The following illustration gives the usage of *cəitəp/cəinəp* "dependent vowel signs (vowel matras)" in the three versions of Meitei script.

Table 3 cəitəp/cəinəp “Dependent vowel signs”

	IPA	18 script system	27 script system	35 script system	Bengali script	Remarks
Vowel diacritic marker	i	□◌, ◌◌̆	◌̆	□◌, ◌̆	ি, ি	There are two variants of i [i] in 18 and 35-script system. They are based on tone; if placed before a consonant, it denotes a low tone, whereas, if placed after a consonant then it denotes a high tone. In the case of low tone the loop is in the opposite direction.
	o	◌̆	◌̆	◌̆	ো	
	u	◌̆	◌̆	◌̆□, ◌̆	ূ	In the 35 script system the [u] matras are of two kinds of which the first one is marked for low tone and the other for high tone.
	e	◌̆	◌̆	◌̆	ে	
	a	◌̆	◌̆	◌̆	া	
	əi	◌̆	◌̆	◌̆	ৈ	
	əu	◌̆	◌̆	◌̆	ৌ	
ai			◌̆		This symbol is not present in any of the other script systems	
Consonant modifier/diacritic	ŋ	◌̆	◌̆	◌̆	ং	
	n			◌̆	ঞ	These graphemes seem to be an imitation from Bengali script. There are many consonant
	y			◌̆	ক্য	
	r			◌̆	ফ	
r			◌̆	ক্		

	IPA	18 script system	27 script system	35 script system	Bengali script	Remarks
	w			ৎ	ক	modifier or diacritic markers in 35 script system, but, not available in the native sound system .

Table 4 *lonsum* “Syllable final consonant graphemes”

IPA	18 script system	27 script system	35 script system	Bengali script	Remarks
p	ᵛ	ᵛ	ᵛ	প্	In Meiteilon, grapheme of consonants are represented into two kinds based on their position in a syllable i.e., initial or final. Those consonant graphemes which can occur in syllable initial position are known as <i>iyek mæpi</i> and those which can occur in syllable final consonant graphemes are known as <i>lonsum</i> . In case of 18 script system, the vowel symbols □, □, □ (without the dots) are considered as <i>lonsum</i> .
t	ᵚ	ᵚ	ᵚ	ত্	
k	ᵛᵛ	ᵛᵛ	ᵛᵛ	ক্	
m	ᵛᵛ	ᵛᵛ	ᵛᵛ	ম্	
n	ᵛᵛ	ᵛᵛ	ᵛᵛ	ন্	
ŋ	ᵛᵛ	ᵛᵛ	ᵛᵛ	ঙ্	
l	ᵛᵛ	ᵛᵛ	ᵛᵛ	ল্	

Table 5 *cəisɨŋ iyek* “Numerals” in the three script systems and Bengali script

Roman	18 script system	27 script system	35 script system	Bengali script	Remarks
0	0	0	0/0	০	In 35 script system the Bengali numerals were adopted for writing the manuscripts. But, there are different symbols for the numerals. Hence, this peculiarity also proves that the manuscripts written in 35 script system were written during the
1	১ ^০	১	১/1	১	
2	২	২	২/V	২	
3	৩	৩	৩/Δ	৩	
4	৪	৪	৪/△	৪	
5	৫	৫	৫/⊃	৫	

The above lines in the figure 1. are transliterated in IPA with literal meanings as follows:

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nahumna nahum 1(əma) oire. nuṣsa 2 (əni) koŋgai nahum 2 (əni) koŋgai pukniṣ 4 (məri) na pukniṣ 1 (əma) oire...

“One flapping of ear makes one ‘*nahum*’. Two *nuṣsa* (i.e. to inhale and exhale), two flappings of ear and four wishes make one ‘*pukniṣ*’”.

We assumed that the above lines refer to the time calibration.

The naming of graphemes reveals a very unique philosophy. Each grapheme shows how they look-alike and how they represent a particular sound. According to the text, *wakoklon hi'lel t'hilel salai ə'ma'ilon pukok*, the 18 graphemes i.e. *iyek məpi* ‘main symbols’ are derived from the human body parts. This is illustrated as follows;

<u>Grapheme</u>	<u>Phoneme</u>	<u>Name</u>	<u>Gloss</u>
𐎀	/k/	kok	‘head’
𐎁	/s/	səm	‘hair’
𐎂	/l/	lai	‘fore head’
𐎃	/m/	mit	‘eye’
𐎄	/p/	pa	‘eye lash’
𐎅	/n/	na	‘ear’
𐎆	/c/	ci'l	‘mouth’
𐎇	/t/	til	‘saliva’
𐎈	/k ^h /	k ^h əu	‘throat’
𐎉	/ŋ/	ŋəu	‘palate’
𐎊	/t ^h /	t ^h əu	‘chest’
𐎋	/w/	wai	‘soul’
𐎌	/y/	yaŋ	‘spine’
𐎍	/h/	huk	‘skeleton’
𐎎	/u'/	u'n	‘skin’
𐎏	/i'/	i'	‘blood’
𐎐	/p ^h /	p ^h əm	‘genital organ’
𐎑	/ə'/	ə'tiŋ-a	‘space/womb’

It is believed that our soul and body was created by taking the same layout of the universe or the Almighty god himself. Similarly, in the 18-script system, usage of distinct symbols for punctuations, as well as numerals is also related spiritually with the creation of human beings. On the other hand, according to the text *mayek laisak takpa puya*, the graphemes of the 35 script system have been put forward with a similar philosophy.

2. Impact of Bengali script

Originally, consonant cluster was not available in the phonology of earlier Meiteilon (Sarangthem, 2014: 246-273), but due to language contact, especially, with the writing system of Bengali script, consonant clusters began to appear in the written text, e.g. “*laesna*” (refer figure 2. with the diamond box). Thus, new consonant diacritics were introduced to Meitei *mayek* to make equivalent sound productions with loan words and also native terms which are deviated from the original ones. A consonant following a consonant is represented by a modifier called consonant modifier (cf. Table 3.), such as, /r/ “*raphla*”, /j/ “*japhla*”, /w/ “*waphla*” and /r/ “*riphla*”. The presence of “*raphla*” and “*waphla*” are shown in figure 2 (marked by square and circle in the text).

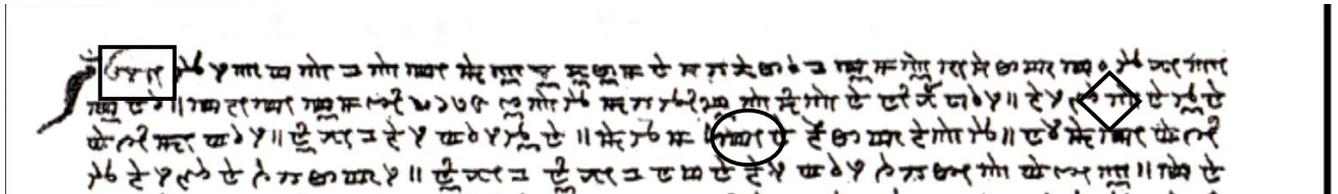


Figure 2 Source: Parratt, Saroj Nalini Arambam 2005, *caitharol kumpapa*

The above excerpt is transliterated with literal meanings (Capital letters indicate the consonant clusters in the above text marked by square, diamond box and circle) as follows:

SRI ta.epəŋpalpaki mapubu khurumna cə.itharol kumpapu jicarakke tai^hipikuno|| kəliki kumsin̄ 3135 supata mə.itin̄ju pak^həŋpana nin̄t^həu wo.e|| la.eSNA panatuna ahin̄ mi o.e|| nuŋt^hil la.e o.etuna|| matəm KWIna ləirəklapata|| noŋmaki ahin̄ta la.esnana ha.irək.e|| nuŋt^hil nuŋt^hil nəŋna la.e o.e ha.iri^hpa asipu. kana

“By praying to Sri almighty god let me write the ‘*caitharol kumpa*’, pardon me for any mistakes. In the year 3135th of Kəli ‘*pakhəŋpa*’ becomes the king of Meiteis. He had ruled for a long time with ‘*la.esna*’ as his queen in the form of god during daytime and in the form of human during night time. Then

one night 'la.esna' asked him why he had taken in the form of god during daytime”

The mixing of words written in Bengali script within the Meitei script were found in a text written in 18th century; shown in figure 3 and figure 4 (encircled). By the 19th century, Bengali script became the dominant mode of recording written matters.

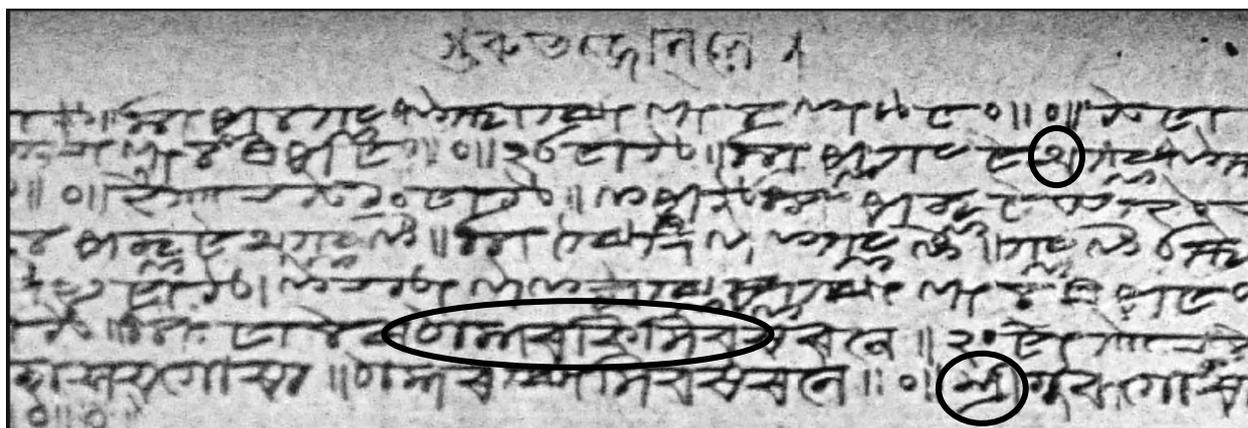
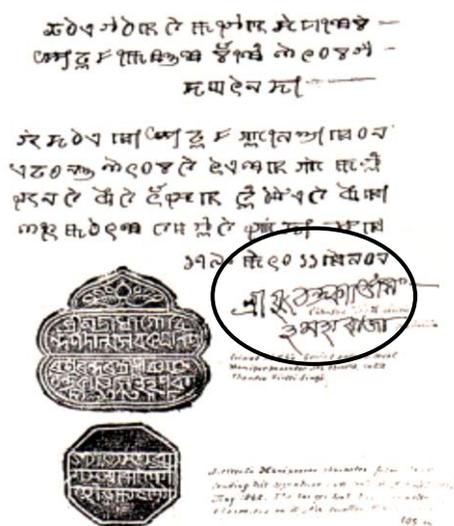


Figure 3 Source: Manipur state archives



Transliteration:
*t^hoitokna matik cawiraba--
 srijut mistar bourij saheb(a)ta--
 k^hahalk^hi-----
 jak^hoeki srijut pulitikel
 ejelt saheb(a)na haerakpa matun
 jilna aina haucik nunjaena aigi
 sa-- mohar namtuna pik^hi sak
 1790 mahe 11kalel*

(seal) (Signature of the king Chandrakirti in Bengali script)

Figure 4 Source: *The lost Kingdom: Royal chronicle of Manipur-*
A letter from King Chandrakirti

3. Phonological perspective

Meiteilon lacks oral voiced consonants except voiced lateral, nasal and approximants in its earlier period. But, the 18 script system has a mechanism to make voiced consonants out of voiceless phonemes /p/, /t/, /c/, /k/, /p^h/, /t^h/, /k^h/, /s/ and /l/ to derive its voiced counterpart, such

as, /b/, /d/, /j/, /g/, /b^h/, /d^h/, /g^h/, /j^h/ and /r/ respectively by putting a dot below the graphemes of the voiceless consonants to make it possible to write loan words (Kangjiya, Ng 1978: 46). Under the 27 script system, 9 more graphemes known as *lom m̄ayek* i.e. voiced consonants were introduced. Even though the 35 script system has more number of consonants (both voiced and voiceless) in its inventory; however the nine *lom m̄ayek* were used for writings. Note that voiced consonants, such as, /b/, /d/, /j/, /g/ and /r/ are the first group of voiced consonants found in Meiteilon. As noted, during the time of king Pamheiba (18th Century), the borrowed terms like *ravan*, *rama*, *radha*, *guru* were found to be written as “*lapol~rapol*”, “*lam*”, “*lat^ha*”, “*kuru*” respectively. This suggests that the voiced sounds were gradually added to the Meiteilon sound system. The following are illustrations of how the changes have taken place.

<u>Loan words</u>	<u>Archaic</u>	<u>Modern</u>
3. <i>ravən</i> ‘Ravan’ changes to	<i>lapol/n</i> → <i>rapol</i> → <i>rabon</i> (note /l/ and /n/ occur as free variants).	
4. <i>ram</i> ‘Ram’ changes to	<i>lam</i> →	<i>ram</i>
5. <i>rad^ha</i> ‘Radha’ changes to	<i>lat^ha</i> →	<i>rad^ha</i>

There is also shifting of voiceless sounds in archaic Meiteilon to the voiced counterpart in modern Meiteilon. For example;

<u>Archaic</u>	<u>Modern</u>	<u>Gloss</u>
6. <i>hai-tə-pa-la</i> → tell-NEG-NMLZ-Q	<i>hai-tə-pa-ra</i> → <i>hai-də-bra</i> tell-NEG-[bə+ra > Q]	‘Didn’t (I) say?’

In the above example it is noted that there is a contracted form of **para** as **pra-bra** by deleting vowel /a/.

<u>Archaic</u>	<u>Modern</u>	<u>Gloss</u>
7. <i>ta-t^hi-pi-ku-no</i> → <i>ta-t^hi-bi-gə-no</i> → <i>ta-t^hi-bi-gə-nu</i>		‘Please don’t get annoyed’

hear-bad-HON-ASP-NEG

hear-bad- HON-ASP-NEG

Here the negative marker *-no* changes to *-nu*, likewise *-ku* changes to *-gə* and *-pi* changes to *-bi* respectively.

3.1 Consonant cluster

In modern Meiteilon, clusters of two consonants are possible. In the case of monosyllabic, the initial syllable can have the first member either the stop phonemes or the fricative /s/, and /h/. The second member may be either semi vowel or liquid, that is, /j/, /w/, /l/, and /r/. For example, *kwak* ‘crow’, *k^hyaw* ‘dry quickly’. In native words, the initial clusters are confined to a few phonemes in a small number of instances, that also with /k and k^h/. Note that

it is possible for other phonemes like /p, t, k, c, j, g, b, p^h, t^h, m, n, ŋ/ can occur in the initial position with /r,w,y/ as second member, but those are commonly onomatopoeic words. For instances; *groŋ-groŋ* ‘roaring sound’, *ŋrəŋ-ŋrəŋ* ‘buzzing’, *crok crok* ‘sound of moving water’ etc. For loanwords, the first members could be /p, t, k, b, d, g, and p^h/ and the second member as either /l or r/. For example; *plet* ‘plate’, *tren* ‘train’, *klas* ‘class’ and *p^hlait* ‘flight’ respectively. However, the loanwords in English are adapted to native sound patterns by vowel epenthesis, i.e, insertion of a vowel between the two consonants, such as, *front* (in English) becomes *p^həran* (in Meiteilon), club becomes- *kəlap*, horn becomes-*horon*. However, these loan words could be written in cluster formation such as, *p^hrən* and *kləp*; but *horon* cannot be written as *horn*, because there is no final cluster in this language. Again, in a disyllabic syllable, the second syllable can have a maximum of two consonants only. The first member in second syllable are / p, t, k, p^h, t^h, k^h, b, d, c, j, g, m, ŋ, s/ and the second members are /r &w/, for instance; *məŋ-gra* ‘sweet potato’, *su-gnu* ‘name of a place’, *kəp-treŋ* ‘spinning machine’, *məu-pwa* ‘younger brother (female ego)’, *pom-p^hri* ‘a kind of blanket’, *lai-srəm* ‘ a surname’

Sound change in the language happened by the introduction of consonant clustering. This is illustrated in the following examples (cf. 8-12) which are found in the written scripts. Here, the first lines are transcribed in IPA (International Phonetic Alphabets) whereas the second lines are the written forms found in the texts:

	Before clustering	After clustering	Gloss
8. IPA	<i>səna</i>	<i>sna</i>	‘gold’
Written forms	sna	꠰ꠦ	
9. IPA	<i>kəri</i>	<i>kri</i>	‘what’
Written forms	kri	꠰ꠦ꠰	
10. IPA	<i>kuinə</i>	<i>kwinə</i>	‘for a long time’
Written forms	kuin	꠰ꠦ꠰ꠦ	
11. IPA	<i>kijampa</i>	<i>kjampa</i>	‘proper name’
Written forms	kiyampa	꠰ꠦ꠰ꠦ꠰	
12. IPA	<i>huijel</i>	<i>hwel</i>	‘war’
Written forms	huiyel	꠰ꠦ꠰ꠦ	

As shown in the above examples (cf.8-12), the effect of clustering after the invention of the consonant cluster due to language contacts is apparent. Interestingly, the pronunciation

remains with those before the introduction of consonant clusters even though it has been written in clustered forms. In other words, changes took place in the written forms but didn't change in the spoken forms, but in due course of time, ultimately the written forms are the ones used as spoken forms, such as, 𑜀𑜢𑜤𑜰𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫 [*kijampa*] is written as 𑜀𑜢𑜤𑜰𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫 [*kjampa*] in modern approved *Meitei mayek*.

We can observe that the mechanism of consonant clustering is somewhat different in 18 script system as mentioned in *wakoklon hi'lel t'ilel salai ama'ilon pukok*; this is explained in details under the section § 4.

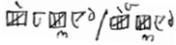
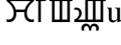
3.2 Change in Vowel sound:

In archaic Meiteilon written in the 35 script system, the vowel /e/ and semivowel /je/ in the final positions are changed to /i/ in modern Meiteilon. The 35 script system intentionally avoids the use of /i/ in order to conform to their system. However, use of /i/ would be the correct form. It is illustrated as follows:

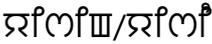
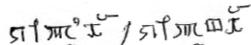
<u>Archaic</u>	<u>Modern</u>	<u>Gloss</u>
<i>wo.e</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>oi</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	'be'
<i>la.e</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>lai</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	'god/deity'
<i>həu.e</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 / 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>həu.i</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	'start/begin'
<i>si.e</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>si</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	'die'
<i>təukətəne</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>təugədəbəni</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫	'ought to do'
<i>təuk^hije</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>təuk^hi</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫	'did'
<i>hoŋje</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 / 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>hoŋ.i</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	'shifted'
<i>pokje</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>pok.i</i> 𑜃𑜂𑜫 𑜃𑜂𑜫 𑜃𑜂𑜫	'give birth'
<i>kəuje</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	<i>kəu.i</i> 𑜃𑜂𑜫 𑜃𑜂𑜫	'called'

From the written texts, it can be observed that ŋ° (/e/) was used till late 17th century CE then has changed as ɾ° (/je/) till late 18th century CE.

Further, the vowel phoneme /o/ or semi-vowel /wo/ present in the final position changes to /u/ in modern Meiteilon is shown below;

<u>Archaic</u>	<u>Modern</u>	<u>Gloss</u>
<i>kaukuno</i>	<i>kaugənu</i>	‘don’t forget’
		
<i>ciŋ.o</i>	<i>ciŋju</i>	‘hill/pull’
		
<i>jom.o</i>	<i>jommu</i>	‘pack/wrap’
		
<i>t^hetlo</i>	<i>t^hetlu</i>	‘attach’
		
<i>cətluwo</i>	<i>cətlu</i>	‘go’
		

It is also observed that diphthong /ji/ changes to monophthong /i/ in modern Meiteilon. These phenomena have taken place due to the impact of writing in the 35 script system. In the olden period before the onset of the 35 script system, the usage of /ji, wo and je/ were not found in the texts written in the 18 or 27 script systems. Illustration;

<u>Archaic</u>	<u>Modern</u>	<u>Gloss</u>
<i>jisiŋ</i>	<i>isiŋ</i>	‘water’
		
<i>jimom</i>	<i>imom</i>	‘my daughter’
		
<i>təujikumpasun</i>	<i>təuigumbəsun</i>	‘but’
		
<i>jipun^həu</i>	<i>ibud^həu</i>	‘great grandfather’
		

Again, one of the interesting features is the sound change of diphthong /oe/ to /oi/ and also, the first person plural *ya* “we” changes to *ei* ‘we’ in modern Meiteilon. For example;

13. *ja-k^hoe-ki* → *ja-k^hoi-gi* → *ei-k^hoi-gi* ‘Our’

1PL-GEN

1PL-GEN

Contraction by deleting morpheme is taken place in the present day context which is shown by the following example (cf. 14), where the morpheme *noŋ* 'day' is deleted in modern Meiteilon ;

- 14. *atu-noŋ-ki* → *atu-noŋ-gi* → *adu-noŋ-gi* → *adu-dəgi* 'From then onwards'
- DET-day-GEN
- DET-GEN

The following are some Meiteilon archaic terms in comparison to modern terms indicating how the changes have taken place.

<u>Archaic</u>	→	<u>Modern</u>
15. <i>ək^həipa</i>	→	<i>əroibə/ət^hejbə</i> 'the last/late'
16. <i>ətij-a</i>	→	<i>ətija</i> 'sky'
17. <i>əton noŋjai</i> → <i>ədon noŋjai</i> →		<i>k^humən nupa</i> 'a man of Khuman clan'
18. <i>ətusuj mətomte</i> → <i>ədusuj mədomde</i> → <i>ədutəsū nət-te/ədunəsū loibə nət-te</i>		'not only this'
19. <i>t^həwai micak /t^həwai picak</i> →		<i>t^həwan micak</i> 'star'

4. Orthographic rule of 18 script system as mentioned in *wakoklon hílel t^hilel salai əmailon pukok*:

In the text *wakoklon hí'lel t^hilel salai əmailon pukok*, besides the writing system, various orthographic rules are mentioned in it. The followings are some of the rules found in the text.

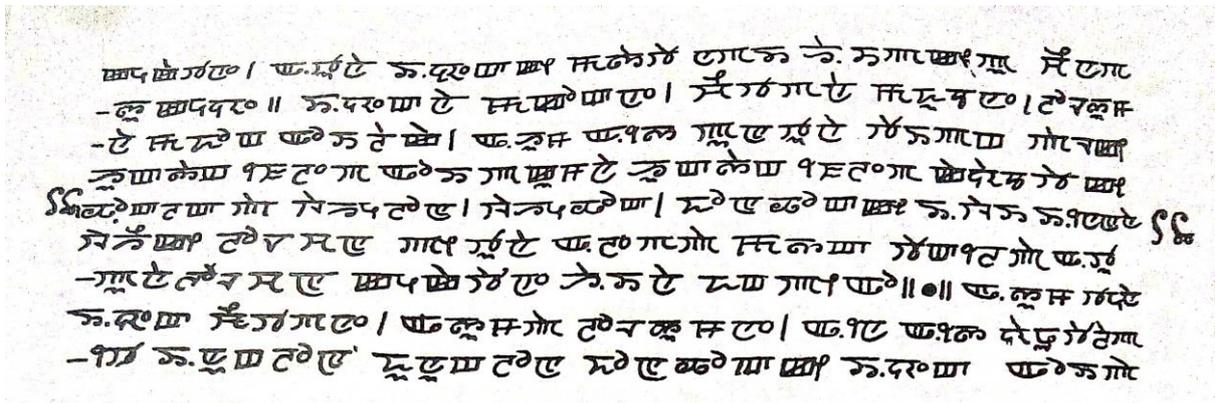


Figure 5 Source : *wakoklon hílel t^hilel salai əmailon pukok puya*, Published by Mangangcha K. Ibomcha, 2019, p.26.

“... *kəukatne | ətuna íyekkí məsata nəp-i haəipəkípu cəinəpsu kəuye || íyekna məkokne | cəitəpna mək^hutne | lonsumna mək^hoŋə oilaka | əəhum əəsi puntuna taipəŋə palkí huksəŋə p^hilep oipəkumna huksəŋə p^hilep kayataki*

*t^hoklakpa wahaulon | wahaut^hok | k^hont^hokki iwai ininna wahaiiki lolcən pítuna
 ə̀leppa məsək taklipa ə̀tupuna lolcən kəukatane haɛina k^həŋəpío ||o||
 ə̀sum təuna íyek cəitəpne | ə̀sumpa lolsumne | ə̀ni ə̀si yau talapəti
 inuŋəlon k^hunuŋəlon k^hont^hokkií íyek oipa (yaloíye ||)*”

“...to be called as (*cəitəp*), it sticks to an *íyek* (main alphabet); that is why it is also called as *cəinəp*. The *íyek* (main alphabet) is the head, *cəitəp* is the hand, and, *lonsum* is the leg. By combining these three (head, hand and leg) gives a definite structure of a human; in this way by combining *íyek*, *cəitəp* and *lonsum* will give a definite structure of a morpheme, words and its own sound pattern. This is to be understood as a spelling rule. Thus, without *cəitəp* and *lonsum* it is not possible to express the meaning and the spoken form of the language.”

In *wakoklon hi'lel t^hilel salai ə̀mailon pukok*, henceforth WHTSAP, the alphabets got their unique names, which are derived from the human body parts. In contrast to the 27 approved alphabets and their sound representation published in Government gazette in 1980, WHTSAP consonant alphabets do not carry the inherent vowel /ə/. For example, the symbol 𑄀 is called as *kok* ‘head’ and it produces the sound /kə/ in the Government’s approved system, but, according to WHTSAP, the symbol 𑄀 is called as *kok* and it produces the sound of /k/ as it does while pronouncing the word *kok* ‘head’. Its association with the sound /ə/ is when it occurs alone in a syllable. For example, 𑄀𑄁 is transcribed as *kə-na* ‘who’. This is confirmed by the rule that a word written using the alphabets described in WHTSAP should end either with a *lonsum*, or a consonant with a *cəitəp*. In WHTSAP, *lonsum* is described as symbols or alphabets which represent syllable final consonant, there are 10 (ten) *lonsum*, they are: 𑄀, 𑄁, 𑄂, 𑄃, 𑄄, 𑄅, 𑄆, 𑄇, 𑄈 and 𑄉. Here, *lonsum* are the sounds which make an abrupt stoppage with no inherent vowel. In the approved system as well as in WHTSAP, the three vowel symbols 𑄈, 𑄉 and 𑄊 represents the sounds /u/, /i/, and /ə/ respectively. But, according to WHTSAP, the sounds /u/, /i/, and /ə/ are retracted; the full vowel sounds would be 𑄈., 𑄉. and 𑄊. representing the sounds /uə/, /iə/ and /əə/ respectively. Let us consider the following examples; 𑄈 𑄉 is transcribed as *u-i* ‘see+DCL’; 𑄀 𑄁 𑄉 is transcribed as *cak-i* ‘burn+ DCL’; 𑄀 𑄁 is transcribed as *ca-u* ‘eat+IMP’. These examples conform to the rule in WHTSAP. Thus, 𑄀 𑄁 𑄂 *cət-pə* ‘to go’ in the approved orthography will be written as 𑄀 𑄁 𑄂 *cət-pə* ‘to go’ in WHTSAP orthography rule, because, 𑄂 as word final in 𑄀 𑄁 𑄂 *cət-pə* ‘to go’ is not acceptable.

In WHTSAP orthographic rule, except the *cəitəp* (also called as *cəinep*) / 〇 / (nuŋ), another *cəitəp* cannot attach to a consonant or vowel if it already has a *cəitəp*. For example, 𑜇𑜨 *lan* ‘net’ is acceptable. But, this is not accepted in the approved orthography rule in which only one *cəitəp* is acceptable to a consonant or vowel. In terms of approved orthographic rule the above term will be written as; 𑜇𑜨𑜨 *lan* ‘net’. In this case, an anomaly in writing rule will surface while tone marking is considered but, in case of WHTSAP orthographic rule, tone marking is precisely included. In fact, for the approved orthographic rule, no tone marking is done; only the context in the sentence or the situation decides the tone while reading.

4.1 Tone marking in WHTSAP orthographic rule:

According to WHTSAP, there will be an occurrence of *lumpa* ‘heavy’ sound in our speech sounds. This is denoted by putting a dot (◌) at the right side of the vowel or a consonant or a consonant with a *cəitəp*, which is a dependent vowel signs (also known as *cəinəp*). The *lumpa* ‘heavy’ sound signifies the high tone occurrence in Meeteilon (Meeteilon is also known by the name Meiteilon or Manipuri, however in WHTSAP the term Meeteilon is used). In other words, there are two tones in Meeteilon. It is also verified by many linguists. In WHTSAP, there are two *cəitəp* for /i/; one is low tone which is attached to the left side of the consonant and another high tone is attached to the right side of the consonant. Another interesting observation is that the use of syllable final consonant 𑜇 [ŋ] as heavy sound or high tone whereas use of the *cəitəp* “ 〇 ” (nuŋ) [ŋ] for the low tone!

The following examples illustrate the marking of tones according to WHTSAP;

20. **High Tone:** 𑜇𑜨

IPA i ‘blood’

Low Tone: 𑜇

IPA i ‘thatch’

21. **High Tone:** 𑜇𑜨𑜨

IPA uɛn ‘skin’

Low Tone: 𑜇𑜨

IPA un ‘ice’

22. **High Tone:** 𑜇𑜨𑜨𑜨

IPA hɔɛnpa ‘to dig/prick’

Low Tone: 𑜇𑜨𑜨

IPA hɔnpa ‘to return/older’

23. **High Tone:** ຈ໋ເງເ
 IPA ca≡pa ‘to eat’
Low Tone: ຈ໋ເງເ capa ‘a shoal of fish’
24. **High Tone:** ຈ໋ເງເ
 IPA k^həŋ≡pa ‘to know/understand’
Low Tone: ຈ໋ເງເ
 IPA k^həŋpa ‘frightened/shocked’.

4.2 Device for voiced sound denotation in WHTSAP:

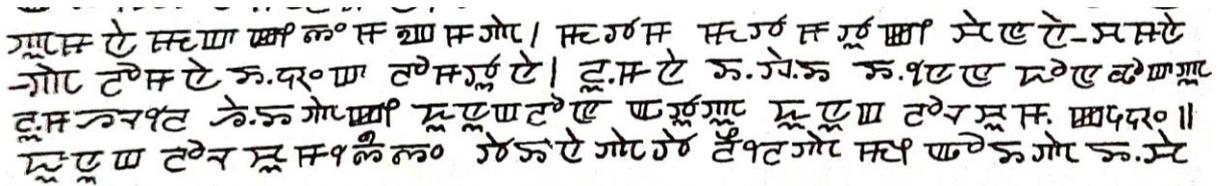


Figure 6 Source : wakoklon hílel t^hilel salai ə≡mailon pukok puya,

Published by Mangangcha K. Ibomcha, 2019, p 39.

“.....| mətəm mətəmtukí canna cəmnapa lomna íyek lomtuna | lu≡mna íwa≡
 ínín k^hont^hokpu lu≡mhəlli ha≡ipakí k^hunuŋ≡lon ətupu k^hunuŋ≡lolcum kəuye ||
 k^hunuŋ≡lolcumsinse tainapata ləilipa mioipa íca....”

“From time to time adjustment of sounds may happen to the spoken words due to production of voiced sounds and high tone sounds; for this reason these spoken words are termed as altered language. Writing system for these altered words is meant for the future generations...”

As mentioned earlier, the 18 Script-systems did not include symbols of voiced sounds. This is because of the fact that earlier there were no voiced sounds in Meeteilon vocabulary. But, WHTSAP mentioned that in view of evolving nature of language, or language changes with time voiced sounds may be used in future due to language contacts; in that case the voiced sound could be derived from the available voiceless sounds by a denotation in which a dot is marked just below the symbol of the voiceless sound. For example, /g/ sound is denoted by putting a dot (.) just below the symbol 𑌒 /k/, in this way for producing the sounds /j^h/, /r/, /b/, /j/, /d/, /g^h/, /d^h/ and /b^h/ are respectively derived from /s/, /l/, /p/, /c/, /t/, /k^h/, /t^h/ and /p^h/ by putting dots just below each respective symbols. As language is dynamic, new vocabulary either native or foreign may be added to the lexicon of the language (Meeteilon or Meiteilon). In order to do so, the role of *lom íyek* would be incredible. Thus, it is possible for *lom íyek* along with the *lonsum íyek* of /k/, /l/, /p/ and /t/ to produce the corresponding voiced *lonsum íyek* as /g/, /r/,

/b/ and /d/ respectively, so that we could easily write foreign terms like ‘big’, ‘rubber’, ‘club’ and ‘board’ as follows;

- 25. Big - ᳵ᳚᳚᳚᳚᳚᳚᳚᳚ [big]
- 26. Rubber - ᳚᳚᳚᳚᳚᳚᳚᳚᳚ [rəbər]
- 27. Club - ᳚᳚᳚᳚᳚᳚᳚᳚᳚ [kləb]
- 28. Board - ᳚᳚᳚᳚᳚᳚᳚᳚᳚᳚ [bord]

4.3 Consonant clusters in WHTSAP:

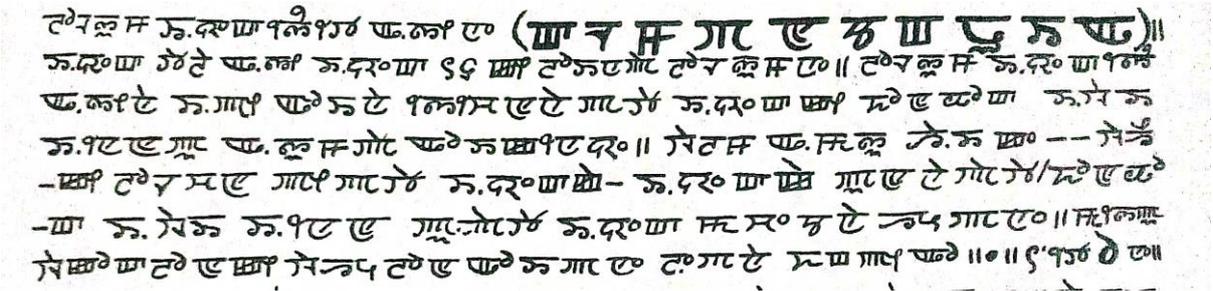


Figure 7 Source : wakoklon hílel t^hílel salai ə᳚mailon pukok puya, Published by Mangangcha K. Ibomcha, 2019, p.25.

“*lolsum íyeksi᳚ti ə᳚sine (᳚ ᳚ ᳚ ᳚ ᳚ ᳚ ᳚ ᳚ ᳚ ᳚)* || *íyek tala ə᳚si íyek18kí loinápa lolsumne* || *lolsum íyeksi᳚ ə᳚sina ípí oina sicinnapta íyekkí k^hont^hok íwai íninpu e᳚sumpa oikəniye* || *waləm ə᳚məsu ha᳚ike--wahəikí lolcən pípəta íyekka-íyekka punnapata* | *k^hont^hok íwai ínin pupata íyek məcetna həupəne* || *məsipu wakoklonkí wahəulon oipəne le᳚pna k^hə᳚᳚pí-o ||o||”*

“These are *lolsum íyek* : ᳚, ᳚, ᳚, ᳚, ᳚, ᳚, ᳚, ᳚, ᳚, ᳚. These ten symbols are associated with the 18 main symbols. These *lolsum íyek*, when used as standalone symbol, their sound will be abrupt. To get a correct pronunciation of a consonant cluster one has to take care of the spellings while writing to achieve the right sound of clustering. Therefore, it is essential to have the first member of the consonant cluster with a *lolsum íyek*. This is also a rule of generating words, please be understood for certain.”

From the above writings, it is clear that though there are no consonant clusters in Meeteilon, nevertheless, in WHTSAP the rules that govern consonant cluster are well-defined. This may be keeping in view of the evolving nature of languages. In Modern Meeteilon, many consonant clusters are present in its vocabulary. According to WHTSAP, for the formation of

consonant clusters the first member of the cluster should be a *lolsum*; and it is observed that there are only 10 (ten) *lolsum*. So, all possible clustering could not be achieved using this system alone. The use of a ligature call *əpun k^hudam* used for consonant clustering in the Govt. approved system is not mentioned in WHTSAP. The following examples illustrate the rules for consonant clustering described in WHTSAP as compared to Govt. approved system with ligature;

29. WHTSAP: ກໍ່ງາວໂວ [məupwa] ‘younger brother (female ego)’

Govt. approved system: it is written as ກໍ່ງາວໂວ

30. WHTSAP: ກຳເຕັງ [klas] ‘class’

Govt. approved system: it is written as ກຳເຕັງ

31. WHTSAP: ກໍ່ງາວໂວ [məŋgra] ‘sweet potato’

Govt. approved system: it is written as ກໍ່ງາວໂວ

32. WHTSAP: ກຳເຕັງ [bord] ‘board’

Govt. approved system: it is written as ອໍເຣັດ [borədā] (here in this case no cluster is formed)

Certain forms of clustering which are unable to write by following the Government’s approved system are easily presented by following the rules of consonant clustering in WHTSAP (see for reference number example 32).

Note: In the above examples *lom iyek* is represented by the marker “ ◻◻”.

4.4 Punctuations in WHTSAP:

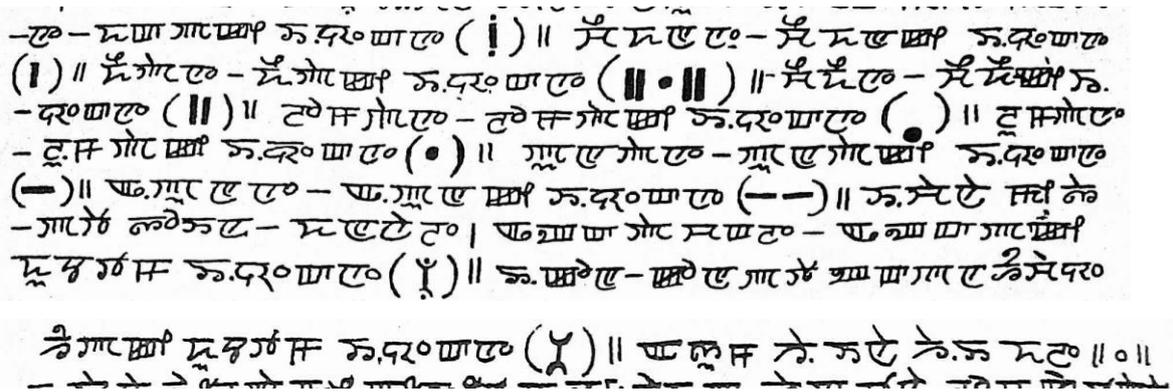


Figure 8 Source : wakoklon hílel t^hilel salai ə≡mailon pukok puya,

Published by Mangangcha K. Ibomcha, 2019, p 33-34.

“...*k^həkpəne* - **!** *k^həkpəkí íyekne* () // *cəik^hənne* - *cəik^hənkí íyekne* (|) // *k^həipəne* - *k^həipəkí íyekne* (||o||) // *cəik^həine* - *cəik^həikí íyekne* (||) // ... *punpane* - *punpakí íyekne* (-) // *əɛpune* - *əɛpunkí íyekne* (- -) // ... **‡** *əŋəkpa*
‡ *cəŋɛle* - *əŋəkəkí k^huttəm íyekne* () // ... *həŋəkí k^huttəm íyekne* ()
 ||”

“ ...it is discontinued - its **!** symbol is (). It is blocking stick - its symbol is (|). It is the terminal/boundary - its symbol is (||o||). It is **‡** terminal stick - its symbol is (||). **‡** ... It is compounding - its symbol is (-). It is all to gather - its symbol is (- -). It is exclamation - its symbol is (). ... It is symbol for interrogation ().”

In WHTSAP, distinct symbols of punctuation were defined. There are 8 (eight) punctuations as shown in the above excerpt text (fig. 8) from the *puya*. Three other symbols for the insertion of text are: i) a dot which is encircled by a dotted line (fig. 9). This marked the insertion point and the inserted text is also marked with the same symbol; ii) a dotted line just above the text which indicates the emphasis (*highlighting of words*) in the written text (fig. 10) and iii) a parenthesis is used ‘()’ compare fig. 11, which is known as *səmpəl* ‘fence’ for putting some information separately inside a sentence.

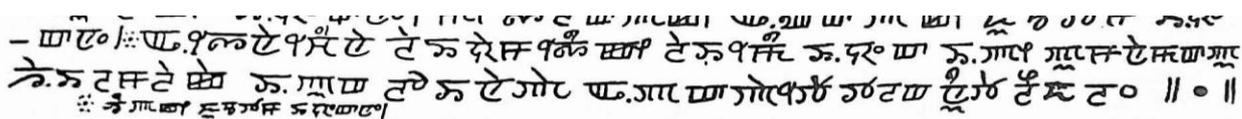


Figure 9 Illustrating text insertion, Source: WHTSAP

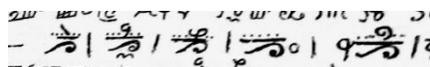


Figure 10 Illustrating the highlighting of words, Source: WHTSAP

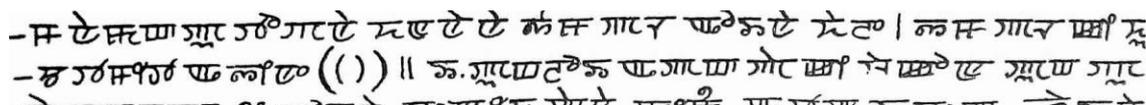


Figure 11 Illustrating *səmpəl* ‘bracket’

The first of the eight punctuation symbols is known as *k^həkpa*, which is rarely used; it is used when the topic in the expression is to be changed thereafter. The second symbol is *cəik^hən*

which is very similar to the *comma*; it is used to separate series of words or during a short interruption. The third symbol, *k^həipa* is used to demarcate a paragraph; as there is no space between the paragraph, *k^həipa* symbols indicates the end of one para and to begin the next para without a space, i.e., to save the space. The fourth symbol *cəik^həi* is similar to *full stop*; it is to mark the end of a sentence. The fifth symbol *punpa* is used as *hyphen* to connect the parts of a compound word. It is also used to connect parts of a word divided at the end of a line, but *punpa* is placed in front of the next line. The sixth symbol *əpun* is used for the quotation as well as a *colon*. The seventh symbol *əṅəkpa k^huttəm* is similar to *exclamatory mark* and the eighth symbol *həṅpa k^huttem* is similar to *interrogation mark*.

Modern Meiteilon orthography follows the universal punctuation, except the *full stop*, which is replaced with the *cəik^həi* symbol ‘||’ to indicate the terminal of each sentence.

5. Language movement of Meitei mayek

Since 1958 a strong movement has started to revive the indigenous script. An organisation called the Mayek Luptin Committee was formed and organised numerous meetings to discuss the revival of the indigenous script. A meeting was held on November 9, 1969 and a decision was taken that 18 grapheme found in the Puya, *wakolon hi'lel t^hilel salai ə'ma'ilon pukok* is the original, true and genuine Meetei alphabet and had agreed to recommend it as Meetei national alphabet. Subsequently, it was submitted for its recommendation to the Government of Manipur. The conferences of both 1958 and 1969 discussed the different script systems of Meitei Mayek including the Naoriya Mayek, Mayek 46, Mayek 48, Mayek 42, Mayek 36, Mayek 35, Mayek 27, Mayek 18, Mayek 16 and Mayek 25. On September 11, 1976, the Progressive Writers' Association organised a meeting to discuss the issues on the script. After that a conference in November, 1976 endorsed the 27 letter script. Now Manipur government has recognised the 27 scripts as standard Meitei/Meetei script by a gazette notification; Manipur Gazette (Extraordinary) No. 33 Imphal, Tuesday, April 22, 1980. (Kangjia, Ng 1978, p 38). Currently, this script has been introduced as a mandatory subject and adopted for writing throughout primary level to higher education in Manipur. The Meitei writing system which was long forgotten has been reintroduced to the younger generations. Meiteilon is now written using its original alphabets representing its own phonemes. However, existing literatures of Meiteilon are written using Bengali script and there is a need to transliterate them. This would be a long and challenging task as older generations has to relearn the *Meitei mayek* anew in order to be able to read literature written in Meitei scripts.

6. Conclusion

This paper has comprehensively discussed the script and sound system of *Meiteilon* available to the Meitei community which marks their social, religious, historical and linguistic identity. The paper discussed the origin and evolution of the *Meitei mayek*. One of the unique features of the script is naming the graphemes from the human body parts in relation to the philosophy of the creation of our universe. As per the observation studied in this research, the 18 main alphabets in the 18 script system are also present in the 27 script system and 35 script system. It may be argued that diachronically the 18 script system evolved earlier than the 27 script and 35 script systems respectively. The Meitei script evolved and new graphemes were created to represent voiced counterparts of voiceless consonants such as /k/, /s/, /p/, /t/ etc. Clustering mechanism for consonants were also introduced as language contact with other Indo-Aryan languages took place (Bengali numerals) due to colonial activities.

This paper has also examined the various aspects of writing rules mentioned in *wakoklon hi'lel t^hilel salai ə≡mailon pukok*, such as, derivation of voiced consonants from voiceless through the usage of *lom íyek*; which is denoted by a dot beneath the symbol of voiceless consonant. Again, the well-formed mechanisms of writing consonant cluster in *wakoklon hi'lel t^hilel salai ə≡mailon pukok* have been discussed in detail. Tone markings were observed only in the 18 script system, and were found to be absent in the other systems. Finally, it can be understood that since the government of Manipur recognised the 27 scripts as standard Meitei/Meetei script in 1980, a formal revival of the *Meitei mayek* has taken place in school and higher educational institutes. This recent orthographic reform has made spelling more consistent and standardized ultimately leading to a better writing system. But since a majority of the 20th century Manipuri literatures still exist in Bengali script, there is still a monumental project required to transliterate them to the native script for posterity.

Abbreviation

ABL- Ablative; ASP - Aspect; DET - Determiner; GEN - Genitive; HON - Honorific; NEG - Negative; NMLZ - Nominalizer; PL - Plural; Q - Question marker; WHTSAP - *wakoklon hílel t^hilel salai ə≡mailon pukok*.

Appendix I

List of some ancient texts or *puya* written in Meitei Mayek

We have already mentioned *puya* may be categorised according to the subject matter. There are many *puya* titles available at the Manipur State Archives and in the hands of private

collectors; most of the works are believed to be written in late 16th century CE to early 18th century CE. The following are some titles.

- a. *chāitharol kumpapa* - It is the court chronicle of Manipur from 33CE.
- b. *wakolon hi'lel t^hilel salai ə'ma'ilon pukok* - It deals in the development of 18 script system and creation theory.
- c. *cajnərol*- This manuscript is about warriors and dual fightings.
- d. *tuteŋlon* - It is a text written about the dredging of rivers during the time of king Yoimongba and his brother Tauthingmang.
- e. *poirəiton k^hunt^hok* - This manuscript deals in the immigration of *poirəiton*.
- f. *kont^həujəm noŋkarol* - It deals with the legend of goddess *kont^həujəm lairembi*.
- g. *numit kappa* - Based on a revolt against the king in the form of aligory.
- h. *panthoipi k^hoŋkul* - It deals about goddess *panth^hoipi*.
- i. *ləirol* - This text deals with the description of various flowers found in Manipur.
- j. *sənaməhi laikən* - Deals in the protection of *sənaməhi* -ism against Hiduism.

The above texts are now available in transliterated and printed form in Bengali script. The followings are sample from the pages of the *cajnərol*, *k^həmlaŋ jireŋ puwar* and *wakolon hi'lel t^hilel salai ə'ma'ilon pukok* respectively with their transliterations in IPA and free translations.

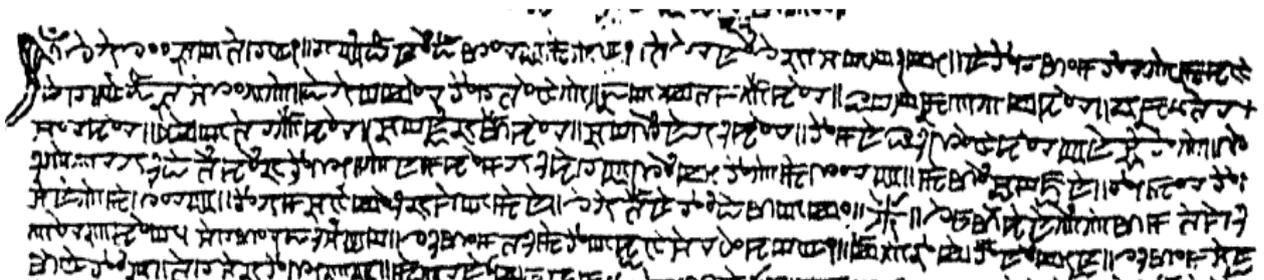


Figure 12 Source: Hemchandra, Ch. 2006, *cajnərol*

Transliteration:

*hajahe he likla.i.o|| ipuŋt^həu noŋt^həurelpumapa.o nahalnoŋ haji
 cəkŋ.eki||nata.irem təlpə mik^hənk^ha.i || at^həu licaheppa|| t^hajaŋ kolta.i lonpa||
 t^hikkri ləmpauk^hol huŋŋə mikəpkək^hol|| jumit lalcelkhol|| kwak lal pauk^hol||
 ciŋnuŋ jirauk^hol|| ciŋsaŋ nay.ek^hol|| tamna hu.esonk^holpu nacuŋtapa
 sa.epapəlj.et^ha laŋk^hoŋ jitasi|| panəm khomj.ek^ha.ipu soŋkitapa maselpu||
 maroŋ cuŋ p^huna|| timel ta canapé maselpu|| tajəmcinko.e jiwakmana|| haja
 launa teŋtharəkke||o|| ha.urəi khana paŋparəm lawa.e polpik^hok | ca.irel*

*thə.ecəŋpuŋ|| hə.rrem lə.ematak k^huncal 10(təra) khəŋ.o|| kəupati
katauŋoŋkino|| h.erem canura atəŋpi|| la.ica jitasipipu|| mapəlna krəu.....*

“Oh supreme lord, the creator of everything, during the time of ‘*həji cək*’, the brave followers of yours with manly swordsmanship and in war-like situations; without any care of fearsome war cry which echoed along the mountain ranges; they fought bravely each other using swords and spears till blood ran like streams from their bodies. I, the writer, would like to narrate this story in your name, oh! almighty. In the southern direction, there was a place known as ‘*lawa.e polpik^hok ca.irel t^hə.ecəŋpuŋ hə.irem lə.ematak k^huncal 10(təra) khəŋ*’. It was so named because of the incident of a “*h.irem*” girl who was known for her beauty died due to drowning and came to know only after 10 days...”

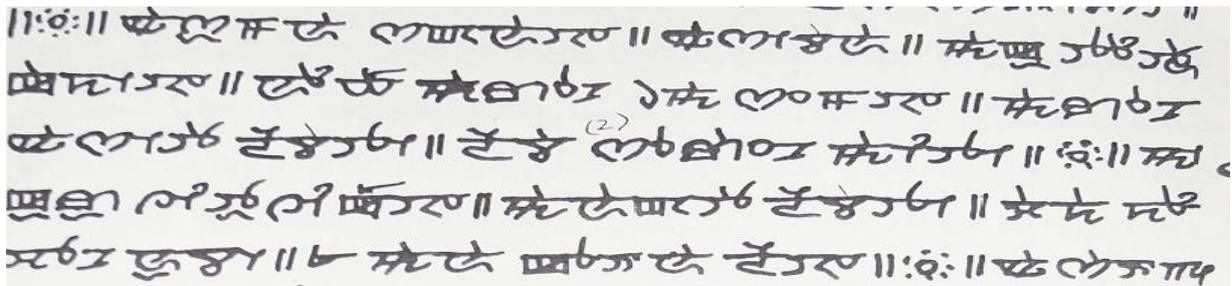


Figure 13 Source: khəmləŋ jireŋ puwari

Transliteration:

*...asumna səknaje|| asibəna|| maku toytuna kakhije|| noŋthəu marol əma
semje|| marol asita ləibəti|| ləiba sorarel mamɨŋti||0|| mi kuru hiŋtuhiŋ kəuje||
manakta ləibəti|| cakha khəŋcil nubi|| 8mana ko.ina ləije||0|| asa.igi...*

“... described as... The death soul rides the owl to heaven. A new world is created. The king of this new world is known as ‘*kuru hiŋtuhiŋ*’. There are 8 ‘*cak^ha k^həŋcilnubi* (fairies)’ associated with him. And...”

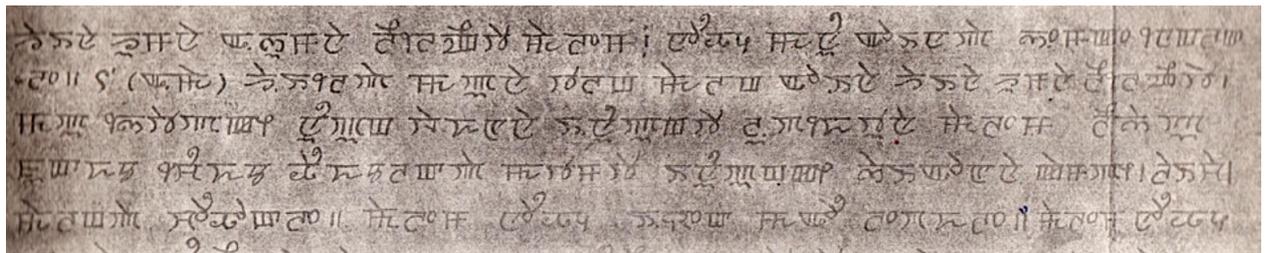


Figure 14 Source: Chingtamlen, W 2006. *wakoklon hi'lel t^hilel salai ə'ma'ilon pukok*

Transliteration:

...haina human ə'sumna læiliŋəita malem; noŋtʰəu mənuŋ oinəpa semke niŋ'ləkke || 1(ə'ma) ha'ilipa məpuna tələŋ' maləŋ' oina haina humna læiliŋəita, məpu sitapəki' nuŋpuŋ' wakʰəna i'nuŋ'ta lu'pkʰituna malem læisapu pʰukkʰət ciŋkʰət tʰaŋkʰətləkpa mətəmta i'nuŋpuŋki' saionna kampi', laica, maləŋ'pa coŋtʰoklə|| malem noŋtʰəu i'yek məoŋ elpkʰəle || malem noŋtʰəu...

“When the Almighty god was evolving in its own movement, He wished to make a definite form of the earth and the sky. The immortal owner of all (Almighty god) who is known by the symbol, 1 (əma “one”), being in a shapeless form, sink deep inside in itself and pulled out physical substances leading to the creation of fire, water and air. A definite shape of the earth and the sky came into existence. ...”

References

- Chelliah, Shobhana L. (1997). *A grammar of Meithei*, Berlin and New York: Mouton de Gruyter.
- Chinglen, N. (2015). *niŋthəurol inot*, Gloria Printers, Imphal.
- Chingtamlen, W. (2006). *wakoklon hi'lel tʰilel salai ə'ma'ilon pukok (puya əsigi' wapʰəm kʰəraŋi'wahəntʰok pi'bəga loynəba) yoinəna mənipursərkargi' skul əŋaŋsiŋda təmbi'nəba putʰokliba mi'təi məyekki' mətaŋda əhəkpa yani'ŋdəba kʰəra*, Kangleipak Historical and Cultural research centre, Imphal.
- Hemchandra, Ch. (2006). *cainərol*, Lamyamba Printers, Imphal.
- Ibomch, K. M. (2019). *wakoklon hilel tʰilel salai əmailon pukok*, Mannaba Apunba Marup, Kangleipak (Manipur).
- Kangjiya, Ng. (1978). *kəŋləi i'jekki wari'*, Geeta Printers, Imphal.
- Khelchandra, N. (1969). *əribə mənipuri sahityagi itihās*, Churachand Printing works.
- Khelchandra, N. (1969). *History of Ancient Manipur Literature*, Manipur Sahitya Parishad.
- Parratt, Saroj Nalini Arambam. (2005). *The Court Chronicle of the Kings of Manipur-The Cheitharon Kumpapa*. Routledge Tylor & Group.
- Sarangthem, B. (2014). “A Case Study on Consonant Clusters in Meiteilon and Bengali”. *Language in India*, 14(11), 264-273.