#### **Proposal to Encode Chisoi in the Universal Character Set**

Biswajit Mandal

(biswajitmandal.bm90@gmail.com)

Nov 01, 2022

#### 1. Introduction

This is a proposal to encode Chisoi in the Universal Character Set. Chisoi is used to in West Bengal, Odisha and Jharkhand for writing the Kurmali /Kudmali language. This document provides a description of the writing system, implementation details, a code chart and names list, and a few specimens. It supersedes the following documents:

- L2/21-183 'Proposal to Encode Chisoi in the Universal Character Set'
- L2/22-218R 'Proposal to Encode Chisoi in the Universal Character Set'

It incorporates comments regarding previous proposals made in:

- L2/21-174 'Recommendations to UTC #169 October 2021 on Script Proposals'
- L2/22-248 'Recommendations to UTC #173 November 2022 on Script Proposals'

#### 2. Backgrounds

Chisoi(৯১৯৩১/৯১৯৯১) is a script used for writing Kurmali (Devanagari:কুরুদালি, Bengali:কুড়মালি, Odia:କୁଡମାଲି, Chisoi:פּגששה, IPA:[kurma:li]) (ISO 639-3:kyw), is an Indo-Aryan language (classified under Bihari group) of 311,175 people (census 2011) primarily spoken in Seraikela Kharsawan, Khunti, East Singhbhum, West Singhbhum Districts of Jharkhand; Mayurbhanj, Keonjhar, Balasore Districts of Odisha; Purulia, Bankura, Jhargram, South Dinajpur and Paschim Medinipur Districts of West Bengal. Kurmali is closely related to Khortha language of Jharkhand. Panchapargania (ISO 639-3:tdb) is a dialect of Kurmali language. It is spoken by 257,000 people (2011)(Ethnologue) in 'Panchapargana' (Bundu, Silli, Rahe blocks of Ranchi; Tamar, Arki blocks of Khunti and Jhalda I & II blocks of Purulia) region of India. It is an unwritten language. Kurmali<sup>2</sup> is also mother tongue of some people of Chhattisgarh, Assam and other parts of India even in Bangladesh and Nepal. Kurmali language is spoken by Kur(d)mi people. Kur(d)mi people of Assam (Golaghat district) mostly referred Assamese as their first language as like Kur(d)mi people of Nepal [13] referred Bhojpuri. Kur(d)mi people of Bangladesh<sup>2</sup> (Sylhet, Moulavibazar and Habigonj districts) still using Kurmali as their primary language. Kur(d)mi includes Mahato, Mahata, Kurmi, Kudumi, Mohanta, Mahanta, Bagal, Kamar, Kamhar, Tanti, Harhi, Muchi, Napit, Dhopa, Dhai, Morol, etc sobriquet. Kurmali was recognized as an additional official language of Jharkhand and West Bengal.

Kurmali Language written in four scripts i.e. Chisoi, Devanagari, Bengali and Odia. Devanagari and Bengali are commonly used in official purposes in Jharkhand and West Bengal, but Chisoi is the own script of Kurmali Language. Many peoples and Kurmali linguists created their own version of Kurmali script in last few decades, but unfortunately those are not accepted by the people and not implemented later. Jayanta Kumar Mahata of Bamundiha village, Medinipur district had invented Chisoi scripts in 1986. He gets inspiration to create a new writing system from his grandfather. His grandfather was one of the famous Kurmali folklore singer of his time. He started to collect various ancient symbols, Rangolis, Alpanas, ritual signs of Kurmali community from his school time [see fig.1]. After completing his graduation, he created a new script in 1986[see fig.6] and named 'Chisoi'. Most of the letters derived from \, reflects their deity Buṛhābābā. This symbol \ also known as 'Svastika' in Bengali Hindu community.



Figure 1: Showing various Kurmali traditional symbols as well as Rangoli and Alpanas.

#### 2.1 Developments

Jayanta Kumar Mahata named the script as 'Kurmali Lipi'. But the word 'Chisoi' is very popular and well known among to Kudmali community. There is a very famous rhyme among the Kurmali linguistic community i.e

'Cis Cisôi Cisio, Cisā Cisi Sikhio' करस करसर करसर, करसर करसर सरकारक'

And the meaning of word 'Chisoi' is drawn /written in Kurmali language. Therefore he considered 'Chisoi' is an appropriate name for this new script. He used name Chisoi first time in his publication 'Kurmali Chisoi Chinhap' in 1994.

In 1994, Jayanta Kumar Mahata established 'All India Kurmali Chisoi-A Society' হন ইন্টেইলাই ইংটেইলাই สอสตระร and 'Kurmali Chisoi-A writers and Artist Association' in 2009. In 2016, Jayanta Kumar Mahata, Narayan Mahata along with 3 more people established 'Kurmali Chisoi Chari Foundation' trustee-board. Later, he established 'Kurmali Chisoi-A Teachers' Association' তথ্যপারের তথ্যতে ত তথ্যতে ম মেলমারের মান্তর্বার মেলমারের মান্তর্বার মান্তর্বার

All India Kurmali Chisoi-A Society opened first Kurmali private elementary schools and adult education center in 2009. In 2021-22, 49 new primary schools got opened only in Purulia district. At present Jhargram has 20 schools, 606 students and 49 teachers. Similarly, there are 52 schools, 817 students, 104 teachers in Purulia and 3 schools, 8 teachers and 61 students in Paschim Medinipur. And 2 schools run over Jharkhand and Odisha. These schools are specifically for Kurmali and Chisoi learning. In 2009, some schools got formal recognition from State Government. Nowadays, 10 Kurmali elementary schools are running under Govt. of India's Samagra Shiksha Mission समग्र शिक्षा अभियान schemes, like Gadra, Sonakhuli, Joypur, Barsole, Dwarkanath, etc. Some other private organizations are teaching Chisoi script in Odisha and Jharkhand.

In 2009, All India Kurmali Chisoi-A Society published first ever Kurmali primer 'Kurmāli Cisoi Cinhāp' ระบบและ ชิวัติ ชัวทุบโต for class-l [see fig.7]. Later on Mangal Mahata compiled another primer 'Kuṛmāli Ô-Bô-Āi Suluk Pũthi' ชะเงนเซลเราอ-เซ แะละช ซึ่งเหรี in 2017. Ujjwal Mahata from Rajshahi, Bangladesh compiled first ever Kurmali primer 'Gidôrũenke Kurmāli Cisôi' ฟระพื้นเหลา ฮะเพนส ระสะร for Kurmali speakers of Bangladesh in Feb 21, 2021. In Bangladesh, Tapan Mahato conducting online Chisoi teaching learning workshops for Kurmali speakers of Bangladesh.

Two digitized fonts are available for Chisoi, "KurmaliChisoy" (True Type) was designed by Pankaj Mahato in 2000. All old Kurmali books, magazines, banners, pamphlets, etc used this font. Another True Type font "Biswa\_Chisoi" designed by Biswajit Mandal in the year of 2021. It is being used to print all new editions of books; banners, etc. like new edition of textbooks *'Kurmāli Sārā Bāhār' ซะเ*นนตง สแบด for III &'Kuṛmāli Sāṛā Bāhār' ขะบนเล่ะ สเเบเซ อเบเเซ for IV.

#### 2.2 Usage

Chisoi is currently used in writing and print for various purposes:

#### **Educational Materials**

Primary level educational materials for Kurmali published by All India Kurmali Chisoi-A Society, for class-I and *'Kuṛmāli Cisoi Cinhāp Dôṛi Khỗaṛā' ซะ*เมนตละ ฮะสะุ ฮะตุบเต ุ ยนะ ซึ่งเนนต for class-II, etc in 2009. [see fig.7]

Mangal Mahata compiled another primer 'Kurmāli Ô-Bô-Āi Suluk Pũthi' ชะเขนเลง ช-อ-ห แผลเฮ ข็นพระ in 2017. Ujjwal Mahata (Bangladesh) compiled first ever Kurmali primer 'Gidôrũenke Kuṛmāli Cisôi' ฟระพริเมชน ช่วยหมาง ระหะ for Bangladesh in 2021. [see fig.27]

Chariyan Mahato has written pre-primary textbook 'Hāmôr Kuṛmāli Cisôi' מושלא של ששוע לעשור in 2022.

#### Newspaper

A weekly newspaper of Kurmali 'Āddās' क्ष्याम in Chisoi first time published in 16<sup>th</sup>June 2013, edited by Narayan Mahata. Now it is not publishing from 2 years due to COVID pandemic. New edition will be published in new font so soon. Another monthly magazine 'Pôrôm' পরম (2017) published in Bengali, sometime it carries Kurmali articles.[see fig.26]

#### **Ephemera**

"Kurmali Chisoi-A Teachers' Association" จะเทนเลง จะสอง ส เสองสามเสนห produces and distributed various posters, banners and pamphlets. [see fig.22]

#### Linguistic works

The Kurmali-to-English dictionary 'Kurmāli Sārābhỗārār' อะเบษเซา แพบเซาะเซนซ published in 2014. And Chisoi-to-English-to-Bengali – Kurmali dictionary *'Kuṛmāli Sāṛā bhỗāṛār' ชะเ*มนะ อัสเบเซ published in 2022.[see fig.19]

#### **Literary Works**

Kurmali poetry book 'Kurmāli Cāri Disā' ซะเมนะ ะ ซะเม by Mangal Mahata in both Chisoi and Bengali scripts in 2016 [see fig.29].

Kurmali poetry book 'Cāriceṭhā' อนเมองประเท by Narayan Mahata in 2014 [see fig.30].

The Kurmali prose 'Bulān' acalem by Maniklal Mahata in 2018 [see fig.28].

#### Workshops

'All India Kurmali Chisoi-A Society' รูป รูปกระชา สะบนตน สะเนนตร สายและระ conducts Half Yearly Chisoi Teaching-Learning Workshop every year. In 2017, it conducted a workshop in Jharkhand collaborately with 'Kurmi Sanskriti Bikas Samiti Dhalbhumgarh'.[see fig. 16(d)]

In 2022, 'One day workshop on Kurmali Chisoi chari education & its future aspect' organized by 'Manbhum Dalit Sahitya O Sanskriti Sangha' in Jhargram. [see fig.16(e)]

#### **Digital Works**

'All India Kurmali Chisoi-A Society' launched 'All India Kurmali Shaksharta Mission of Chisoi' and 'ChisoiKurmali' Android App (available in Google Playstore) in the November, 2021. It is a digital platform to learn Chisoi. [see fig.31]

#### 3. Script

The script is assigned the name 'Chisoi'. The proposed characters are intended for presenting current forms of Chisoi. The set consists of 40 characters: 28 letters, 2 signs and 10 digits. [see fig.6,7,10]

#### 3.1 Structure

Chisoi (also called as Kuṛmāli Cisoi ইংএএমে বৈ ইমেওই, Cisôi lipi ইইমেই নাইলাই or Cisoi lipi ইইমেউ নাইলাই) is written from left-toright. It has a feature of an alphabet: vowels are written as full letters. However consonants may have an inherent vowels; it typically is pronounced [3] or [7], normally never occurs in final position but some cases it can occur during to pronounce 'Tadbhav तद्भव' words. It means 'a word used in one language which is a distorted from of a word in another language'. For examples: ሣመሪያ 'māhātô' Surname, ዝርዝሁ 'sāntô' Peaceful, ዛዝሁ 'môstô' Big in size, วอุงหษา 'ôbgônôtô' Known, etc[see fig.19].

The script has no regular system of conjuncts but it has SISO to mute the inherent vowel[see fig.2,3,4 &5]. The letter : JARAHA[h] is used after consonants to indicate aspirations: 8: khô [khɔ], W: ghô [ghɔ], S: chô [thɔ], W: jhô [ʤʰɔ], etc.

Chisoi is an alphabetical script that is written from left-to-right. There are no attested ligatures. The typical didactic presentation of Chisoi is shown with one major section; signs are included in this section. The section is a chart with ten rows and three columns, where first to fourth, sixth and seventh row's first letter is a vowel, and the letter names are based on Brahmic style. [see fig.6,7,8,9,10]

5	7	চ
A	ВА	AAI
স	Ч	þ
AA	GA	TA
L	<b>2</b> 1	M
E	SA	NA
5	r	พ
<u> </u>	КА	RA
ч	υ	ν
MA	НА	RRA
ç	£	ન
U	DA	LA
9	ፚ	\$
0	NYA	NGA
8	य	미
CA	JA	PA
ំ	리	υ
ANUSVARA	YA	DDA
5	0	্
TTA	JARAHA	SISO

# 3.2 Chisoi sign ANUSVARA<°>

- The sign (°) is written on the top of the vowels and consonants in question except JARAHA. It is a nasalization mark of Chisoi. It corresponds to the Candrabindu in Devanagari, Bengali and Odia. Its IPA is [~].For examples:  $\mathring{\boldsymbol{z}}$ [ $\tilde{\boldsymbol{z}}$ ],  $\mathring{\boldsymbol{z}}$ [ $\tilde{\boldsymbol{z}}$ ], etc. To represent the nasalized aspirated consonants, the position of sign ( $\mathring{\circ}$ ) will be, For examples:  $\mathring{\sigma}: [k^h\tilde{\circ}], \mathring{v}: [g^h\tilde{\circ}], \mathring{v}: [p^h\tilde{\circ}], \mathring{v}: [d^h\tilde{\circ}], etc.[see fig.18]$
- In the attached specimens sign ANUSVARA shown as (0), it is due to font's standard. The actual sign of ANUSVARA is (°). It has similarity in glyph with 'COMBINING RING ABOVE' U+030A (°), but this proposal for separate encoding of CHISOI SIGN ANUSVARA.

#### Position of Chisoi Sign ANUSVARA<\*> 3.2.1

The position of sign (°) will on the top of the both vowels and consonants. But in the old font "KurmaliChisoy" shows different positions for different letters. It occurs due lack of Unicode standardization. Actually the correct position of sign (°) is the top middle of the letters. For example:

# <u>ප්ථාද්දශ්රීප්රේජීමේ ප්රථාද්දම් ප්රථාද්දම්</u>

Figure 2: Comparison between original font (first line) and new font (bottom line). Old font is showing non similarities in position of Anusvara but the new font showing accurate top middle position of Anusvara.

#### 3.3 Chisoi letter JARAHA<\$>

- The letter (3) JARAHA 'Jôrô'hô' พพบ means 'to add'. It is used after consonants to indicate aspirations [h].JARAHA never place in the initial position of any Kurmali words, always used after consonants. For examples:  $[^h]^{+}[^h]^{-1}$ ,  $[^h]^{+}[^h]^{-1}$ ,  $[^h]^{+}[^h]^{-1}$ ,  $[^h]^{-1}$ ,  $[^h]^{-1$
- In Kurmali writing system there is no use of visarga. JARAHA is the unique character which is not available in Devanagari, Bengali and Odia scripts because it used to make aspirated consonants. It has similarity in glyph with 'BENGALI SIGN VISARGA' U+0983 (\$), but this proposal for separate encoding of CHISOI LETTER JARAHA.

#### 3.3.1 Position of Chisoi letter JARAHA<\$>

- To represent the nasalized aspirated consonants, the position of (3) JARAHA will be after the sign ANUSVARA, For examples:  $7 + ^1 + ^2 = ^2 \cdot [k^5], \quad \forall + ^1 + ^2 = ^3 \cdot [p^6], \quad \forall +$ etc.[see fig.13][§ 3.2]
- To represent the inherent vowel less aspirated consonants, the position of (3) JARAHA will be after the SIGN SISO, For examples: 7+ + = 7  $[k^h], \ \forall + + = 1$   $[g^h], \ \forall + + + + = 1$   $[p^h], \ 7+ + + + + = 2$   $[t^h], \ \nu + + + + + = 2$   $[t^h], \ \nu + + + + + = 2$   $[t^h], \ \forall + + + + + = 2$   $[t^h], \ \forall + + + + + = 2$   $[t^h], \ \forall + + + = 2$   $[t^h], \ \forall + + + + = 2$   $[t^h], \ \forall + + + + = 2$   $[t^h], \ \forall + + + = 2$ fig.13][see fig.][§ 3.4]

### 3.4 Chisoi Sign SISO<>

- The sign (ু) 'Sis'ó' মধ্যে is written in the beneath of the letters in question. Chisoi has no regular system of conjuncts, SISO functions as like to mute the inherent vowel either [ɔ] or [ə] of the consonants. For examples:  $\mathfrak{F}[k] + \mathfrak{F}[k]$ ,  $\mathfrak{h}[g] + \mathfrak{h}[g]$ ,  $\mathfrak{h}[p] + \mathfrak{h}[p]$ ,  $\mathfrak{h}[n] + \mathfrak{h}[n]$ , etc.
- To represent the inherent vowel less aspirated consonants, the position of sign () will be, For examples:  $v_{+} = v_{+} = v_{+$ there is no single letter in Chisoi orthography which is containing both SISO and anusvara together like है, ທໍ່, ຫໍ etc.

#### 3.4.1 Other uses of Chisoi Sign SISO <>

Glottalizational mark: If the last consonant letter of any word carries SISO <>, it reflects glottal stop phoneme. For examples: ៥ዚህ ([cnhɔr̩?] 'inexpert', ሌካዛ [cgcmʔ] 'not moving', ኤጳጳኒ ([cbʤar̞ʔ] 'dirtful', etc.

> If any word ended with letter LETTER A <2> and its left sided letter contains SISO <2>, then that letter will carry glottal stop phoneme. For example: 報報 [sis?ɔ] 'stop', etc.[see fig.17,12]

If LETTER I <\$> carries SISO <> in a word, then left sided letter of <\$> will pronounce with inherent phoneme [ɔ] or [ə]. For examples: ἔξίμελι [cajinɔṭal] *(Eight',* ងវូ៩រដ [ʤɪcha] *(warrior'* and ፚፘዚ [ʧisɔi] *'Chisoi'* [see fig.12].

#### 3.5 Chisoi letter AAI<₹>

It is a diphthong vowel letter with combination of LETTER AA and LETTER I. Its glyph is a combination of two letters ឌ+ፘ=๒. Its IPA is [ai]. To represent this sound we use आइ (in Devanagari), আই (in Bengali) and ଆଇ (in Odia). For examples: ৮েমে [aina:] আহ্না/আইনা/আଇନା, 'Mirror' and ৮ মৈ [aĩsa:] আহ্মা/আইসা/আଇঁথা, 'name of a month', etc.

#### 3.6 Chisoi letter RRA<♥>

It is the voiced retroflex flap r[r] of Chisoi. To represent this sound we use র (in Devanagari), ড় (in Bengali) and @'Meaningless', ৫১৬৭৫ (kurma:li) কুরুমালি/কুড়মালি/କୁଡ଼ମାଲି, etc.

#### 3.7 Digits

There is full set of decimal digits: 0 ZERO, & ONE, & TWO, O THREE, & FOUR, S FIVE, @ SIX, P SEVEN, U EIGHT, W NINE [see fig.10, 25].

#### 3.8 Punctuation

Chisoi uses danda <|> and double danda <||> at the end of the sentence. double danda <||> was not included in previous proposal L2/21-183 [24]. Many Indic scripts use the danda U+0964 and double danda U+0965 from the Devanagari block. Since Bengali uses danda and double danda from the Devanagari block vis script extensons and therefore keyboard layouts in the area share the same character, it is proposed to extend the same danda and double danda usage to the Chisoi script as well, to avoid confusion and additional complexity for users.

There are no script-specific punctuation marks. Latin marks, such as:; "()?/-and! are used [see fig.24].

#### 4. Character names

The name of the script is Chisoi 'Cisoi' 'Cisoi' 'Written' or 'Drawn'. The name Chisoi first time found in the literature of Kurmali 'Kurmāli Cisoi Cinhāp' in 1994. Proposed character names for this proposal are given below [see table no.1].

<u>A</u>	<u>B</u>	<u>C</u>	<u>D</u>	<u>A</u>	<u>B</u>	<u>C</u>	<u>D</u>	<u>A</u>	<u>B</u>	<u>C</u>	<u>D</u>
5	Α	ô	[c]	7	KA	kô	[kɔ]	र	NGA	ô'n	[ŋɔ]
7	ВА	bô	[cd]	พ	RA	rô	[cn]	3	CA	cô	[ʧɔ]
গ	AAI	ā'i	[ai]	Ч	MA	mô	[cm]	य	JA	jô	[ඡුා]
7	AA	ā	[a]	V	НА	hô	[hɔ]	히	PA	pô	[cq]
ካ	GA	gô	[gɔ]	v	RRA	ŗô	[cŋ]	ំ	ANUSVARA	õ	[~]
þ	TA	tô	[t̪ɔ]	5	U	и	[u]	리	YA	ôy	[cj]
L	E	e	[e]	£	DA	dô	[dɔ]	ν	DDA	ô′ḍ	[cþ]
H	SA	sô	[ca]	ન	LA	Ιô	[cl]	2	TTA	ţô	[cj]
М	NA	nô	[cn]	9	0	0	[o]	•	JARAHA	jôṛô'hô	[ <sup>ħ</sup> ]
5	1	i	[i]	W	NYA	'iñ	[cn]	্	SISO	sis'ô	

Table 1:column A is showing letters and signs, column B is showing proposed character names, column C is showing native name of letters and column D is showing IPA.

#### 5. Character Shapes

The Chisoi proposed here for encoding in the UCS in the Standard Chisoi, the font "BISWA\_CHISOI" for the proposed was drawn by Biswajit Mandal in the year 2021. The original font "KURMALICHISOY" was drawn by Pankaj Mahato in the year 2009. All the Kurmali books, documents, specimens, etc those attached here are in original font. The new "BISWA\_CHISOI" font used here because original font having lots of imperfections ,that islack of standard qualities in glyphs, problems in positioning of signs, non collinearity in letters and kerning problems in letters. The comparison table no. 1 includes Pankaj Mahato's original font "KURMALICHISOY" and new "BISWA CHISOI" font [see table no.2].

#### 5.1 Shapes and collinearities

In the original font having the problem of standard quality in glyphs of letters as well as having problem in coaxial of letters. Some letters heights and sizes are different from others. Attached specimens are showing this problem. The new font is perfectly collinear and good looking.

# ZOIZICVIM\_CMZCWUU UCENOUDZECOOUVC <u>รอนเรษยรฐพยนายนรรษยมาคร</u>

Figure 3: Comparison between original font (first line) and new font (bottom line). Old font is showing non collinearities of letters but the new font showing perfect collinearities as well as beautiful sorts.

# KICUMLENIZOWUUUCEAAWXZZVOUVC

# ZURPRS2MPHADAPSSURPTALAINQ2

Figure 4: Comparison between original font (first line) and new font (bottom line). Old font is showing the wrong position and size of letter AAI, I and NGA but the new font showing the perfectness.

#### 5.2 Kerning issues between two letters

We are having the proper kerning problem between two letters in the original font. Letters are not perfectly set in the position that is why some letters become stuck with each other and look like a conjunction. [see fig. 13]



Figure 5: Comparison between original font (first line) and new font (bottom line). Old font is showing the kerning issues between two letters but the new font showing accurate gap between two letters.

#### 6. Tentative Characters Properties

```
16D80; CHISOI LETTER A; Lo; 0; L;;;;; N;;;;;
16D81; CHISOI LETTER BA; Lo; 0; L;;;;; N;;;;
16D82; CHISOI LETTER AI; Lo; 0; L;;;;; N;;;;
16D83; CHISOI LETTER AA; Lo; 0; L;;;;; N;;;;;
16D84; CHISOI LETTER GA; Lo; 0; L;;;;; N;;;;
16D85; CHISOI LETTER TA; Lo; 0; L;;;;; N;;;;;
16D86; CHISOI LETTER E; Lo; 0; L;;;;; N;;;;
16D87; CHISOI LETTER SA; Lo; 0; L;;;;; N;;;;;
16D88; CHISOI LETTER NA; Lo; 0; L;;;;; N;;;;
16D89; CHISOI LETTER I; Lo; 0; L;;;;; N;;;;
16D8A; CHISOI LETTER KA; Lo; 0; L;;;;; N;;;;
16D8B; CHISOI LETTER RA; Lo; 0; L;;;;; N;;;;;
16D8C; CHISOI LETTER MA; Lo; 0; L;;;;; N;;;;;
16D8D; CHISOI LETTER HA; Lo; 0; L;;;;; N;;;;
16D8E; CHISOI LETTER RRA; Lo; 0; L;;;;; N;;;;
16D8F;CHISOI LETTER U;Lo;0;L;;;;N;;;;
16D90; CHISOI LETTER DA; Lo; 0; L;;;;; N;;;;;
16D91;CHISOI LETTER LA;Lo;0;L;;;;;N;;;;
16D92; CHISOI LETTER 0; Lo;0;L;;;;;N;;;;
16D93; CHISOI LETTER NYA; Lo;0;L;;;;;N;;;;
16D94; CHISOI LETTER NGA; Lo; 0; L;;;;; N;;;;;
16D95; CHISOI LETTER CA; Lo; 0; L;;;;; N;;;;;
16D96; CHISOI LETTER JA; Lo; 0; L;;;;; N;;;;
16D97; CHISOI LETTER PA; Lo; 0; L;;;;; N;;;;;
16D98; CHISOI SIGN ANUSVARA; Mn; 0; NSM;;;;; N;;;;
16D99; CHISOI LETTER YA; Lo; 0; L;;;;; N;;;;
16D9A;CHISOI LETTER DDA;Lo;0;L;;;;N;;;;
16D9B; CHISOI LETTER TTA; Lo; 0; L;;;;; N;;;;;
16D9C; CHISOI LETTER JARAHA; Lo; 0; L;;;;; N;;;;
16D9D; CHISOI SIGN SISO; Mn; 9; NSM;;;;; N;;;;
16DA0; CHISOI DIGIT ZERO; Nd;0;L;;0;0;0;N;;;;;
16DA1;CHISOI DIGIT ONE;Nd;0;L;;1;1;1;N;;;;;
16DA2; CHISOI DIGIT TWO; Nd; 0; L;; 2; 2; 2; N;;;;;
16DA3; CHISOI DIGIT THREE; Nd; 0; L;; 3; 3; 3; N;;;;;
16DA4; CHISOI DIGIT FOUR; Nd;0;L;;4;4;4;N;;;;;
16DA5; CHISOI DIGIT FIVE; Nd; 0; L;; 5; 5; 5; N;;;;;
16DA6; CHISOI DIGIT SIX; Nd; 0; L;; 6; 6; 6; N;;;;;
16DA7; CHISOI DIGIT SEVEN; Nd;0;L;;7;7;7;N;;;;;
```

```
16DA8; CHISOI DIGIT EIGHT; Nd; 0; L;; 8; 8; 8; N;;;;;
16DA9; CHISOI DIGIT NINE; Nd; 0; L;; 9; 9; 9; N;;;;;
```

#### 6.1 Linebreak.txt

```
16D80..16D97; AL # Lo [25] CHISOI LETTER A.. CHISOI LETTER PA
           ;CM # Mn [01] CHISOI SIGN ANUSVARA
16D99..16D9C;AL # Lo [04] CHISOI LETTER YA..CHISOI LETTER JARAHA
           ;CM # Mn [01] CHISOI SIGN SISO
16DA0..16DA9; AL # Nd [09] CHISOI DIGIT ZERO..CHISOI DGIT NINE
```

#### 6.2 ScriptExtensions.txt

# -----

# Script\_Extensions=Beng Deva Dogr Gong Gonm Gran Gujr Guru Knda Mahj Mlym Nand Orya Sind Sinh Sylo Takr Taml Telu Tirh Chis

; Beng Deva Dogr Gong Gonm Gran Gujr Guru Knda Mahj Mlym Nand Orya Sind Sinh Sylo Takr Taml Telu Tirh Chis # Po DEVANGARI DANDA

# Total code points: 1

# Script\_Extensions=Beng Deva Dogr Gong Gonm Gran Gujr Guru Knda Limb Mahj Mlym Nand Orya Sind Sinh Sylo Takr Taml Telu Tirh Chis

; Beng Deva Dogr Gong Gonm Gran Gujr Guru Knda Limb Mahj Mlym Nand Orya Sind Sinh Sylo Takr Taml Telu Tirh Chis # Po DEVANGARI DOUBLE DANDA

# Total code points: 1

#### 6.3 Script Metadata

Script Name Chisoi Size 40 Origin Country India Density Likely language Kurmali Lang\_Code kyw ID Usage **Exclusion** RTL No LB letters No Shaping required Min TMF No Case No

#### 7. Collations

The collation order is as follows:

7 A < 7 BA < 16 AAI < 7 AA < 19 GA < 19 TA < 16 E < 7 BA < 19 MA << 0 O < W NYA <  $^{2}$  NGA < 3 CA < 4 JA <  $^{4}$  PA <  $^{\circ}$  SIGN ANUSVARA < 4 YA < > DDA < 7 TTA < 1 JARAHA <  $\bigcirc$  SIGN SISO < 0 DIGIT ZERO < \$ DIGIT ONE < \$ DIGIT TWO < \$ DIGIT THREE < \$ DIGIT FOUR < \$ DIGIT FIVE < € DIGIT SIX < ₱ DIGIT SEVEN < ♥ DIGIT SEVEN < DIGIT SEVE < W DIGIT NINE

#### 8. 'Confusable' characters

Below is a list of Chisoi characters that are 'confusable' with those encoded in other scripts blocks:

L	CHISOI LETTER E	;	L	004C	LATIN CAPITAL LETTER L
М	CHISOI LETTER NA	;	М	004D	LATIN CAPITAL LETTER M
ч	CHISOI LETTER MA	;	Ч	0427	CYRILLIC CAPITAL LETTER CHE
9	CHISOI LETTER O	;	θ	0472	CYRILLIC CAPITAL LETTER FITA
υ	CHISOI LETTER DDA	;	ঢ	09A2	BENGALI LETTER DDHA
:	CHISOI JARAHA	;	ଃ	0983	BENGALI SIGN VISARGA
্	CHISOI SIGN SISO	;	্	09CD	BENGALI SIGN VIRAMA
0	CHISOI DIGIT ZERO	;	0	0030	DIGIT ZERO
٥	CHISOI DIGIT ONE	;	չ	09E7	BENGALI DIGIT ONE
٥	CHISOI DIGIT THREE	;	O	09E9	BENGALI DIGIT THREE
е	CHISOI DIGIT SIX	;	е	0065	LATIN SMALL LETTER E
P	CHISOI DIGIT SEVEN	;	ρ	03C1	GREEK SMALL LETTER RHO
U	CHISOI DIGIT EIGHT	;	U	0055	LATIN CAPITAL LETTER U
ω	CHISOI DIGIT NINE	;	ω	03C9	GREEK SMALL LETTER OMEGA

#### 9. Acknowledgement

I would like to thank Jayanta kumar Mahata, Narayan Mahata, Dr. Deborah Anderson, Nurul Alom Ador, Susanta Mahata, All India Kurmali Chisoi-A Society and Kurmali Chisoi-A Teachers' Associations for support on a draft of this proposal and sharing insights on various aspects of encoding Chisoi.

	16D8	16D9	16DA
0	<b>7</b>	<b>£</b> 16D90	<b>0</b> 16DA0
1	<b>7</b>	<b>ત</b>	<b>ბ</b> 16DA1
2	16D82	<b>6</b>	<b>6</b> 16DA2
3	T 16D83	<b>&amp;</b> 16D93	<b>Ú</b> 16DA3
4	<b>너</b>	<b>8</b>	<b>8</b>
5	<b>P</b>	<b>8</b>	<b>S</b> 16DA5
6	<b>L</b> 16D86	<b>以</b> 16D96	<b>e</b>
7	<b>4</b>	<b>ರ</b> 16D97	<b>P</b>
8	<b>M</b> 16D88	16D98	<b>U</b> 16DA8
9	<b>č</b>	<b>ઢ</b>	<b>()</b> 16DA9
Α	<b>7</b>	<b>V</b> 16D9A	
В	<b>&amp;</b> 16D8B	<b>7</b>	
С	<b>U</b> 16D8C	0 0 16D9C	
D	<b>V</b>		
Ε	<b>1</b> 6D8E		
F	<b>d</b> 16D8F		

## Letters and signs

- 16D80 7 CHISOI LETTER A
- 16D81 7 CHISOI LETTER BA
- 16D82 ₹ CHISOI LETTER AAI
- 16D83 C CHISOI LETTER AA
- 16D84 Y CHISOI LETTER GA
- 16D85 P CHISOI LETTER TA
- 16D86 L CHISOI LETTER E
- 16D87 % CHISOI LETTER SA
- 16D88 M CHISOI LETTER NA
- 16D89 CHISOI LETTER I
- 16D8A 7 CHISOI LETTER KA
- 16D8B ២ CHISOI LETTER RA
- 16D8C 4 CHISOI LETTER MA
- 16D8D V CHISOI LETTER HA
- 16D8E V CHISOI LETTER RRA
- 16D8F c CHISOI LETTER U
- 16D90 € CHISOI LETTER DA
- 16D91 A CHISOI LETTER LA
- 16D92 6 CHISOI LETTER O
- 16D93 ₺ CHISOI LETTER NYA
- 16D94 **?** CHISOI LETTER NGA
- 16D95 8 CHISOI LETTER CA
- 16D96 ধ CHISOI LETTER JA
- 16D97 ज CHISOI LETTER PA
- 16D98 CHISOI SIGN ANUSVARA
- 16D99 ៧ CHISOI LETTER YA
- 16D9A V CHISOI LETTER DDA
- 16D9B C CHISOI LETTER TTA
- 16D9C : CHISOI LETTER JARAHA
- 16D9D ੑ CHISOI SIGN SISO
  - a consonant vowel-killer

### **Digits**

- 16DAO 0 CHISOI DIGIT ZERO
- 16DA1 ∂ CHISOI DIGIT ONE
- 16DA2 6 CHISOI DIGIT TWO
- 16DA3 0 CHISOI DIGIT THREE
- 16DA4 & CHISOI DIGIT FOUR
- 16DA5 \$ CHISOI DIGIT FIVE
- 16DA6 e CHISOI DIGIT SIX
- 16DA7 P CHISOI DIGIT SEVEN
- 16DA8 U CHISOI DIGIT EIGHT
- 16DA9 ω CHISOI DIGIT NINE

#### References

- [1]. Mahata, Jayanta kumar.2009. All India Kurmali Chisoi-A Society. 'Kuṛmāli Cisoi Cinhāp' ฮะเพนะส่ว ฮิวิเลยาร์ (for class-I). All India Kurmali Chisoi-A Society.
- [2]. Mahata, Narayan.2009. *'Kuṛmāli Cisoi Cinhāp Dôŗi Khãṛā' อะเ*ชษและ ฮะสะธ ฮะหุบต<del>ล</del>ะบธ ฮะหับต (for class-II). All India Kurmali Chisoi-A Society. XYZ printers.
- [3]. Mahata, Narayan.2022. *'Kuṛmāli Sāṛā Bāhār' ซะเ*บนเซน (for class-III). All India Kurmali Chisoi-A Society.
- [4]. Mahata, Jayanta Kumar.2022. *'Kurmāli Sārā Bāhār' อะเ*ษและ สเตน อเตเต (for class-IV). All India Kurmali Chisoi-A Society.
- [5]. Mahata, Narayan พยงเซพ นเบเตง. 2007. *Kurmāli Sārā Bāhār' ซะ*เบนเชส สเยน วเบเตง (for class-V). All India Kurmali Chisoi-A Society.
- [6]. Mahata, Narayan หนังเวเพา. 2014, Feb 21. 'Cāriceṭhā' ชนงประเว. All India Kurmali Chisoi-A Society.
- [7]. Mahata, Mangal นซิฟล นหมพ. 2016, May 08. 'Kurmāli Cāri Disā' ชะผนหล่ง สหมัง อะลห, Chisoi chari Foundation. XYZ Printing Works.
- [8]. Mahata. Narayan พธพธมห บริเพาะ 2014.*'Kurmāli Sārā bhỗārār'* ๕๔๗๒๘ สิงพริง .All India Kurmali Chisoi-A Society.
- [9]. Mahata, Maniklal งแพระสาย งเรษายา .2018. 'Bulān' อะเมษา
- [10]. Mahata, Narayan ทธพัติยท เดิงและ from 357/1/12. 2016, Dec 01. 'Addas' เออเลน XYZ Printing Works,
- [11]. Mahata, Narayan প্রমেশ খার্মেশ ISSN 2395-7370, 2017. 'Pôrôm' পরম খাম্ম
- [12].Mahata, Mangal หรืบผ หมายค. 2017. 'Kurmāli Ô-Bô-Āi Suluk Pũthi' ขะบทยะประจ-ษ สเลเร ข้เมาะ, XYZ printing Works, Raghunathpur, Jhargram.
- [13]. Mahata, Ujjwal. Feb 21, 2021. *Gidôrũenke Kurmāli Cisôi'* ฟริยชั้นและ ฮะชุงเลง ฮะสะร, Chisoi chari Foundation, Maa Shakuntala Digital, Jhargram, West Bengal.
- [14]. Chisoi, Endangered Alphabets. https://www.endangeredalphabets.com/2021/09/01/designing-newscripts-chisoi/
- [15]. Mandal, Biswajit. L2/21-183 'Proposal to Encode Chisoi in the Universal Character Set'.
- https://www.unicode.org/L2/L2021/21183-chisoi.pdf
- [16]. Anderson, Deborah. L2/21-174 'Recommendations to UTC #169 October 2021 on Script Proposals'. https://www.unicode.org/L2/L2021/21174-script-adhoc-rept.pdf
- [17]. Panchpargania, Ethnologue. https://www.ethnologue.com/language/TDB
- [18].ChisoiKurmali, Google Playstore. <a href="https://play.google.com/store/apps/details?id=com.study.chisoikurmali">https://play.google.com/store/apps/details?id=com.study.chisoikurmali</a> https://chisoikurmali.com/chisoiRegistrationform.php
- [19]. Mandal, Biswajit. L2/22-218R 'Proposal to Encode Chisoi in the Universal Character Set'.
- https://www.unicode.org/L2/L2022/22218r-chisoi.pdf
- [20]. Anderson, Deborah. L2/22-248 'Recommendations to UTC #173 November 2022 on Script Proposals'. https://www.unicode.org/L2/L2022/22248-script-adhoc-rept.pdf

ORG	<b>NEW</b>	ORG	<b>NEW</b>		
Z	5	0	9		
D	σ	w	ъ		
حا	গ	સ	\$		
7	7	8	8		
ъ	Ч	ひ	Z,	ORG	<b>NEW</b>
M	þ	ठा	히	0	0
L	L	ំ	ំ	5	٥
검	સ	ય	리	۷	ሪ
Μ	М	ν	υ	ণ্ড	Ů
ح	5	ζ-	2	8	8
ट	7	8	8	S	S
w	ช	্	্	е	е
Ч	Ч			P	P
υ	υ			U	U
᠙	υ			W	ω
ح	ç				
€	€				
ବା	ન				

Table 2: Comparison of Chisoi font 'KurmaliChisoy' drawn by Pankaj Mahato(column 'ORG' ) and Nurul Alam Ador and Biswajit Mandal's font 'Chisoi' (column 'NEW')

<u>CHISOI</u>	<u>DEV</u>	<u>BEN</u>	<u>ODIA</u>	<u>CHISOI</u>	<u>DEV</u>	<u>BEN</u>	<u>ODIA</u>
5	अ	অ	ଅ	य	ज	জ	ଜ
7	ৰ	ব	ବ	ಠ	प	প	ପ
চ	आइ, ाइ	আই, াই	ଆଇ, ାଇ	ំ	ै	ঁ	ं
স	आ, ा	আ, া	ଆ, ା	리	य	য়	ଯ୍
Ч	ग	গ	ଗ	υ	ड	ড	ଡ
þ	त	ত	ତ	2	ट	ট	ଟ
L	ए, े	এ, ে	ଏ, େ	8	N/A	N/A	N/A
स	स	স	ସ	্	્	्	্
М	न	ন	ନ				
5	इ, ि	ই, ি	ଇ, ି				
7	क	ক	କ	0	o	0	0
พ	र	র	ର	٥	8	ઠ	6
ч	म	ম	ମ	ડ	२	R	9
υ	ह	হ	ହ	v	3	<b>©</b>	୩
v	ड़	ড়	ଡ଼	8	४	8	۵
ç	उ, ु	উ, ু	ଉ, ୁ	S	ч	¢	8
€	द	দ	ଦ	е	Ę	৬	9
ન	ल	ল	ଲ	٩	૭	9	9
9	ओ, ो	ও, ো	ଓ, ୋ	U	۷	Ь	Γ
ፚ	স	ලු	ষ্ট	ω	9	৯	Q
ફ	ङ	હ	ଙ				
3	च	চ	ଚ				

Table 3: Comparison of Chisoi with Devanagari, Bengali and Odia. In Chisoi letter Jaraha is used to make aspirated letters but it is absent in Devanagari, Bengali and Odia.

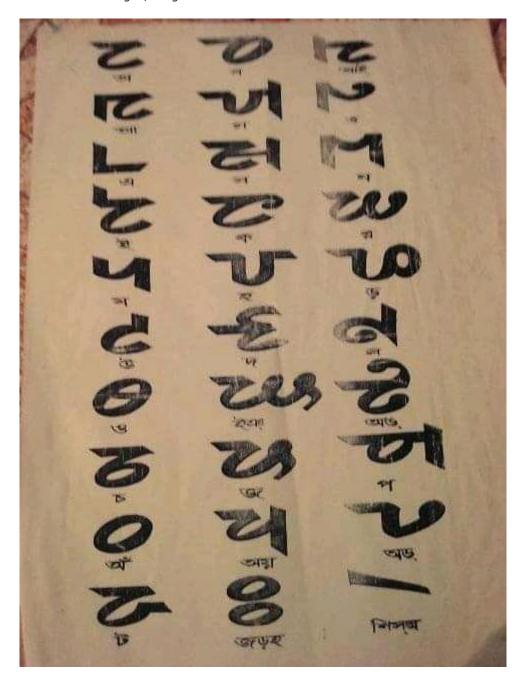
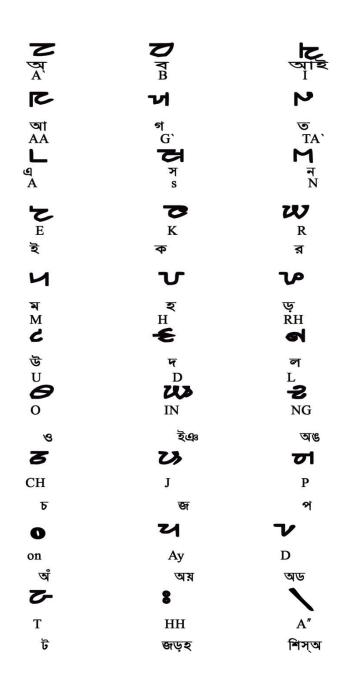


Figure 6: A chart showing letters of Chisoi with Bengali pronunciation from first ever draft of 'Kuṛmāli Cisoi Cinhāp' (1986).



**5** S

Figure 7: A chart showing letters of Chisoi with Bengali pronunciation from book 'Kuṛmāli Cisoi Cinhāp' करणाहनी ชะนะ ชะทุบเซฟ (for class-I) (15:2009).

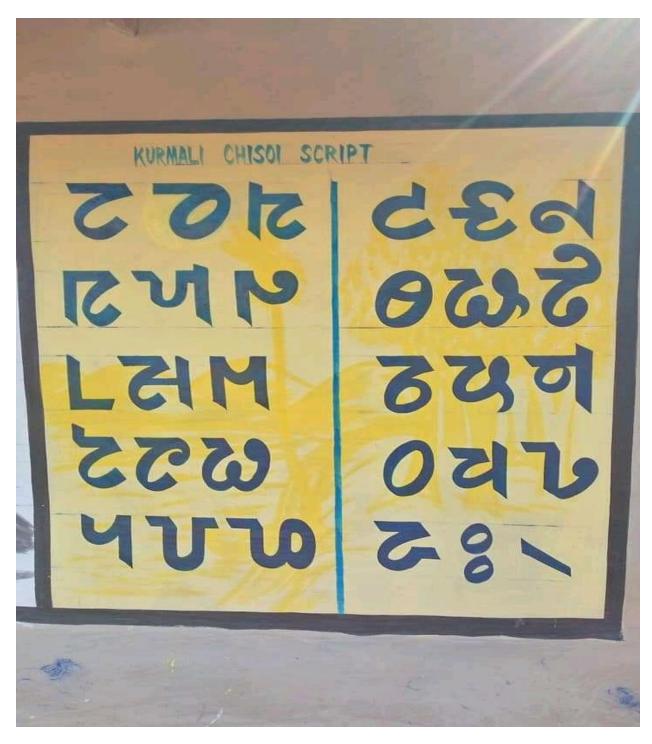


Figure 8: A school wall showing letters of Chisoi (2019).



Figure 9: showing chart of Chisoi drawn by a school student.

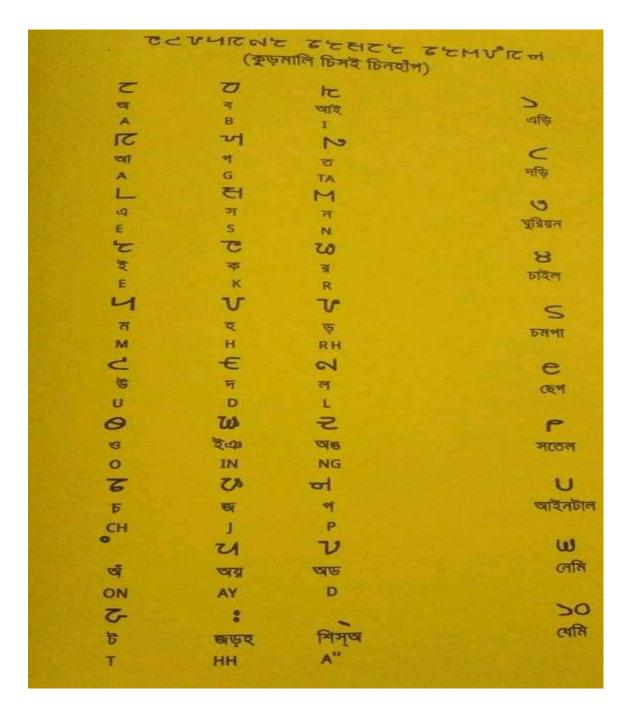


Figure 10: showing chart of Chisoi and numerals.(courtesy:Facebook)



Figure 11(a): Showing the first edition of Kurmali newspaper 'Āddās' दृद्दास(Jun 16th, 2013).



Figure 11(b): Showing the front page of Kurmali newspaper 'Addas' REERH (Dec 1st, 2016).

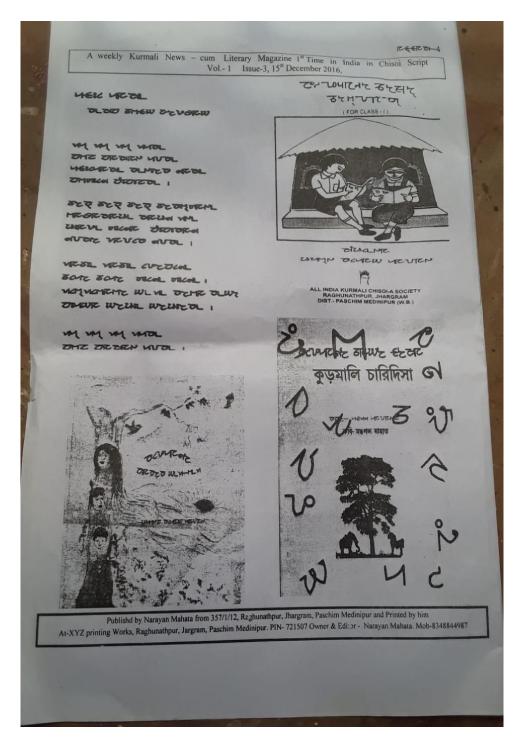


Figure 11(c): Showing the 4th page of Kurmali newspaper 'Āddās' **TEETH**(Dec 16th, 2016).

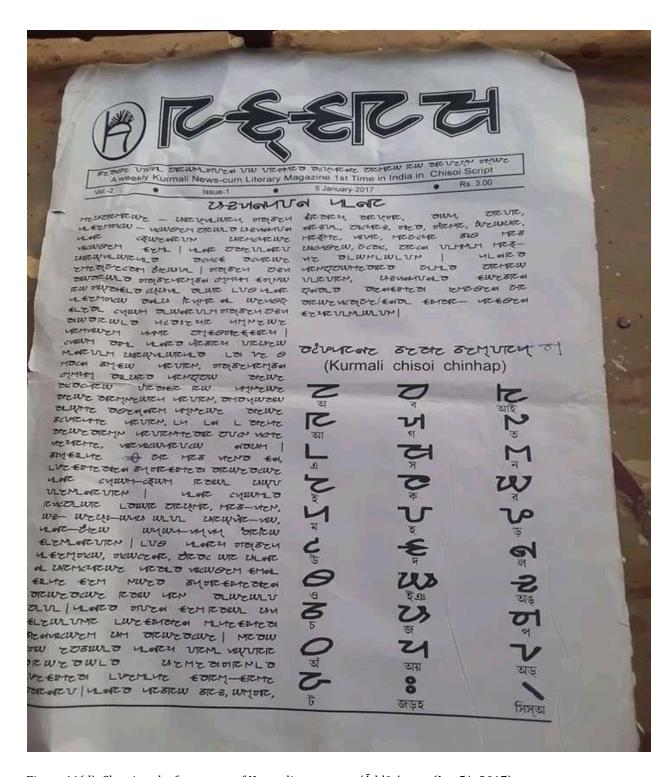


Figure 11(d): Showing the front page of Kurmali newspaper 'Āddās' teeth(Jan 5th, 2017).



Figure 11(e): Showing the  $3^{rd}$  page of Kurmali newspaper ' $\bar{A}$  dd $\bar{a}$ s' **REERH** with Chisoi chart (Jan  $5^{th}$ , 2017).

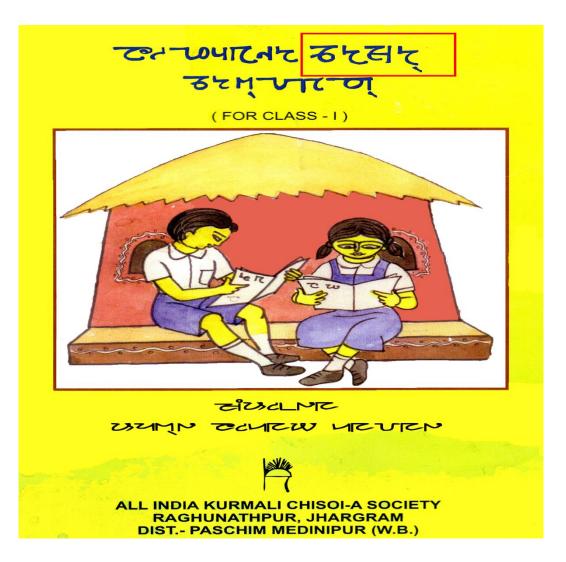


Figure 12: Heading showing the spelling of Chisoi សង់ខ្លែ(handwritten form)having LETTER I with SISO from the cover of Kurmali primer 'Kurmāli Cisoi Cinhāp ' ฮะมนะส รัสสร์ รัสมุขาส (for class-I)(2009)



Figure 13: Showing the banner of Kurmali Chisoi-A Teachers' Association' अध्यापान देव विकास विदेश विदे kerning issues between two letters.



Figure 14: Showing the keyboard layout of new 'Biswa\_Chisoi' font (2021).

	Class - IV	(FINAL EXAMINATION 2	(018-19) F.M-50
	Subject- Kurmali Name -		Time - 2 hour Date-4/12/201  Roll No -
1.0100000 4	ल छाटम छट ?		
	LOILM RUD D	~ ~ ~	2
	OLOLM RULO		2
			3
5. VEME RME		LM RVLO OZ OZ ?	3
			5
6. DELINEATE E	acore deal	en ?	5
7.al.0000 0.86		ic cicute of cit	5
	tren		
		DEVICUENC	
	ZOL		
		DISTEMIE	
	HE		
DNU - 7			
WAME OF OF			10
		OLUK OF ALOUM KIND	10
767 100 E			

Figure 15: Showing the class  $\boldsymbol{4}^{th}$  annual examination question paper of Kurmali subject from Sonakhuli Kurmali Primary School ESTD-2009(2019).



Figure 16(a): Showing the Chisoi teaching is going on in 'Ānganwāḍi' Courtyard Shelter school.



Figure 16(b): Showing the picture of Kurmali-Chisoi school from Mayurbhanj, Odisha.



Figure 16(c): Showing the picture of Kurmali-Chisoi school from Chakulia, Jharkhand.

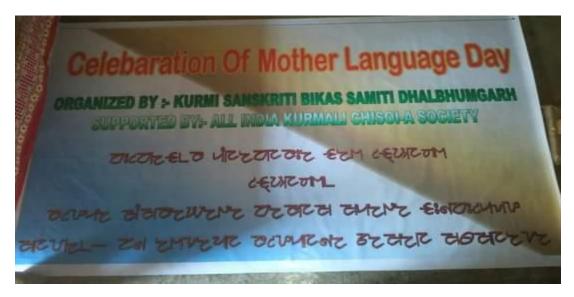




Figure 16(d): A workshop conducted on the occasion of International Mother tongue Day at Dhalbhumgarh, Jharkhand.(2017)

TWE ETHLE ME MISSEN LESSON
הביום מוניחוד בדבובה בעים ביוה ביוה שוני ביוה
one day workshop on -
KURMALI CHISOI- CHARI EDUCATION 3
AND ITS FUTER ASPECT. SOLIMAN S
12 to the furt
Inte: - 26.48. June - 2022, Sunday Time:
Vanue :- Khudiram makato manch. (Com. Hall of m.D. 35.5.) - Puruling Town
Signature of participants 130 VIERMERWER SIRVERO
Nome/MICH - Virco/Village
Clock.
- Puspubala Marato Kultar
Single of growing to Calchola to
4 MATERIA ARTHE ARSHA TOTHE
4 CLO TEMENTERS TO THE DESTRICT OF THE PROPERTY OF THE PROPERT
6 38 R R ZORME YRUNNE Puncha
7 MOELGAL MESTER GELFO
8 A MCKKYK ALERICH ERGSLAF
9 MUE NOTE SITURNI Balia
10 Anuesha Mahato Murguma
11 Puranima Mahato Pannadda
12 TM CSC 4 PEURNO GOI TMOUR
13 Mc old & wows (NUPUS) M'GUTTU /3URTURY
15 217 21 416 416 VIGUTEL Hetgugui (
16. TEGMINWANTE AMARRA /TOTOETT
17 MINITURE BUILD IE DIE BUILDEN
18 C TWMYTM TYTTUIGE Ahappah - Apsha
19 7/87N7U7 ZIL-211100 7/7077
- March Circulated Olect Circ
कारणामिति प्रदेशक कारणाम निष्यात या स्वापति विष्या विष्या विषया वि
21 VETOR CZW URUM WZ TI: CMRM: HETE
22. Hazekrishna Mahato Konapaza puncha
23. EITMISH COURS YOURS WE WENTCH: 40 W- 6
24 Satyajit mahato Dhunahi,
05 100 M 21 41/31/10 21/31/37
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
7 ST CM & YE ENTER WINDLAND
7 21 CM & JEGURW JUNITARW
YRVR PR

Figure 16(e): Participants list of 'Kurmali Chisoi Chari education and its future aspect' one day workshop at V Pally, Purulia.(2022)

<b>Z-</b>	8	
5-CY	711V	' टब्
2-52-21C	<b>:</b> 시기5	<b>ક</b> ર્લ્
S-Sel JIE	ZJ8ZUM	ME
コミュ	Wich C	मार्
MJWJJWJJ	210 W:-2	- દન્
05-05-0 <del>0</del> 5-05-0	<b>ए</b> शट माट M्	ИK



Figure 17: Showing the positioning of Jaraha and siso from book 'Kuṛmāli Cisoi Cinhāp' ਣਵਲਪਾਣ ਤੋਂ ਫੋਟੋਜ੍ਹ ਫੋਟੋਜ੍ਹ ਪਣਗ੍ਰ (for class-I) (14:2009).

0	24	マ
<b>2</b> -€	<b>छ</b> य	vw
35	<b>7</b> 124	JI:CV
ರೆ೯-€8	<b>7</b> 874	JOOK
<u>ડાક</u> -ડા <del>ડ</del>	SAMIN	VCOCO
2113€21C	CLWU	SUVIV
218€21W	<del>อ</del> เพบช	JOHON



Figure 18: Showing the positing of Chisoi sign Anusvara from book 'Kuṛmāli Cisoi Cinhāp' ਣਵਯਾਪਣ ਫੋਟੋਸਟ੍ਰੋ ਫੋਟੋਸਪਣ (for class-I) (13:2009).

## asially slaste steplense (Kurmali Sarha Bhnarhar) Z [a] - OCUMENT STEEDE UNDOLO ZQUICM | The first letter of the Kurmali chisoi alphabet. ZQии (abgarh)—ис. Stupid, Worthless MEUE DOZ€! ≥ [a]-a. aLcwm OLWIZ memorisation ZQUOZVIME (abgairhna)-VC.ill shaped; ugly wome o ore mevel Z[a]-a. EDEO OLWE exclamazquew (abgar)-t. harm; dissertion, -MM DEME | vice owe Z [a]-WK MEUZ DREZE nega-ਟਰਕ੍(abas)-ਅਟ. unruly; ਰਕ੍ tion. ME | CLWE MEVE UENLO uncontroellabla マレフトモミ Z [ah]-uc. J. yes टिक्टल् (abais)—भट. certainly; בם [ah ba] - שנ. סוב סוב שנישוב NSESH BESOS MENE DIEMME ATMINED SHOLD ENUE VICTIE DIENNE OUIC, IC. adzaw (absar)-t. leisure, respite, dressed between uncle and nephew; wowen olure | CHOIC DICECTO CICUIC ट्यूटाट (abka)—स. noisy playing or zown (abganata)ーた known frisking in sport; マスマ でしいて I NAMEN DEMES DIENW MEST EM SILML (MESMER) FOCK MEMIC JUMPLY ! ZQUにW (abgar)ーロ.た.harm CONCW zqwic (abra)—□. inactive; improper sittine position; MICHEWE ZOUCZME (abguina)—VK. having DOIZ WUTE | no qualities; अटच्य प्रथा भट्य ।

Figure 19: Showing the front page of Kurmali-English Dictionary 'Kurmāli Sārābhỗārār' ๕๔ษ๚ฅ๘๖ สเตอร์สเตอน (1:2014)



Figure 20: Showing the logo of 'Sarva Šikṣā Abhiyān' Education for All written in Chisoi (2019).

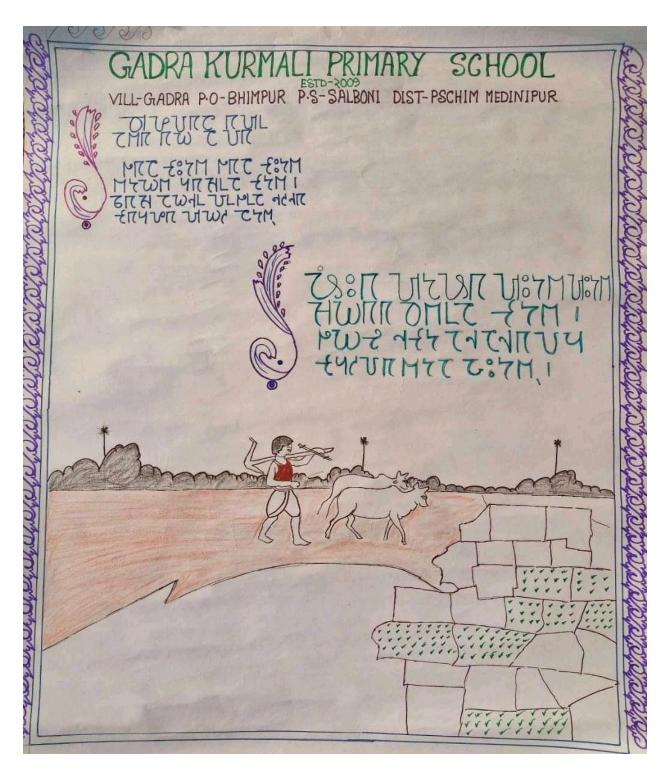


Figure 21: Showing the Kurmali poem chart drawn by a student from Gadra Kurmali primary school.





Figure 22: Showing the school banner and classroom of 'Gādrā Kuṛmāli Pərāimāri Iskul' שנטשע בעשער אל שנטיים אוויים אוויי *ઇસ*જ્૮ન.(2009)

2020 HKHER OLALE ZIRA Otew CLEVE 2020 HICHER TOS LE RESTORES January EDGEL REKE: PL ELCARE | Friday ZIWZINK SICZBRE EREST (-8 PREJECT STEEDING ZEKMKUKAKEL) Zasof Elcakel 1602 10 MILO MICO OF BUSH MICHM MUSEM ALTON MOSTER MONTH SOLD MICHM LEGIN KMK EKAKI NEW KMK EKAKEVIL NEW ELZIGHTENKEL ECTE ELMI TE:WEE ste; OKTOLE YET; redare + 41 Note + old Bleuwkette rewe Mry-ELIDA NEW ZIKZIKUL O; WK WICE & 48476 eo Hedkakorowi ERWELMICE PEWE OTHOGI VISLALE HUL WILL ALL CLUBI TSTOK TOOK ALLECL EKAREKAK ELWINI HLAER Saturday I WILE WEY NENTHE TOWE OTHERS MEDLALE REMIR - EST BYREMIK DIEN ESKEOK-ELTIK WOEL TECOMIC CLIDA, THE CORDA ELE OLAI I EELD MITO MIGO MIGO TOKNEM YELDYCEL TELDE ELEGINEE ARE OFK TO LMLE WILD RESERVE OTTO SICOSI DISTONEW Sunday 26 THEH-Ere BEZIREKEKE ERU ELTO 11 MEDIMIZE TEMPE OFFICE WIND 2 TO K 420 ETTER ECON ECONOS-ECTOS TORCOS MEXIMONICE EMILK UNTORNEL THE: ELKEL Z=80/- - streadel S S M T W T F S S M T W T F S S M T W T F S S M FEB 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 28 27 18 DKARIMES DIN ELDO, AKYOKNIE EKY AKOK!

Figure 23(a): Showing the diary maintaining in Chisoi, provided by Narayan Mahata. (2020, Jan)

ELTOY ELARERON : OFWO DEVERO MICENTEYM YICORD

BICTO YEST TLPLE METH - YETTS TOME DIEST DIES THEN BRIO UNTIL BETTE BROTHENK ordrok, yew 2201 अटसार संहर्षिक श्राम पटारे DETO: K DE TO: K TSKUTK TSKUTW, reiten Her: ETULE 25 WM KEN BEHEE DIKHKMI 45:24KH TLELE MIRWEM- 60KM MENDER BYSE PROPERTY ENTH TOKAL GAN OMOSTER ME ELTON ACTOM DMECHRUSKI the your ook thee: - TSLT: BOKN TREWEN ELWIR OFWOLE! Detroite Moder Moder of: W- 5WL; YRMAN WAVKM EKM E: WHEL YET:LI MENEN - SONNEN KULH NEW ELWH KHEWIL UKHKMU HEE:MI BEN 1000 NEWSNEEL WYUNE E: MUNES: KE 50 LYR-ARTO: RE HEU-OLTOR YRMILI DIRE- KAKM TINLE DIKER UKA I HEN NUMBERS NEETHOPERS NEW IS KE- TORKE OWO ORTHE EKML BLENZUR OFWO WLEN SIKUTE BEELI SIEHKM YEST - LYTE EKENPIE - EMIN DIKMARTOL YEKE KMIK EIRMEKER LEWMI E: KEYZYKM WWOKYK TKMKKMK NOKTOMK NAMES STATE ARMED STATE OF THE WAR DENS CONTROL OF THE RENTH

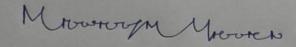


Figure 23(b): Kurmali poem written in Chisoi, provided by Jayanta Kumar Mahata. (2021)

Frac grace AM MCSI CILO U MSIUSKS

राध्याद्र राष्ट्रियाद्र या या प्राप्त BITEIT MAL CL? ULOS DEDCO UR KARA SICAR EL

DICH HEMEU VICH DIEVE DUNTO VIVICO ZION, UZE VLARUE VILVIE OCVIRO द्रान्यान्द द्रान्यान्द प्रथ

WORL HEAL US DWELL WEM COVEML BLZ याटडः याटडः एट पबटा MEDSIV SISTEM

DUISIE CLOSI NICEME NICEME CLWEUR DICELW MEEL VEUCO NENEW EWY WU बाटकाट ठाउडाट गंशहरा

22 (22)

Figure 24(a): Showing the Chisoi DANDA, DOUBLE DANDA and other punctuation marks from primer 'Kurmāli Ô-Bô-Āi Suluk Pũthi' ৫২৩৭৫ন১ হ-ত-৮ মুবনুহে শুবদঃই. (11:2017)

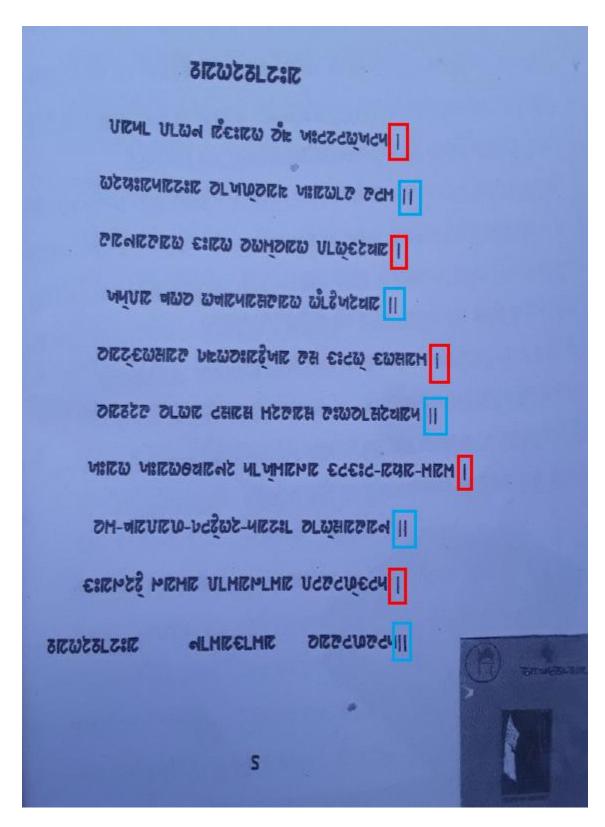


Figure 24(b): Showing the usage of Chisoi DANDA and DOUBLE DANDA from textbook 'Kuṛmāli Sāṛā Bāhār' સ્ટાપ્પાયનાટ สเซนต จะบะน (for class-III). (5:2022)

		S(D) SIEZO MLUZ	
	LVE	SO BY OR EDTE	3000 €MECTER
	5	SS BY OTE LIVE	50 00 00 €MEETE
	l eve		50 00 00 00 ENTERIE
	y newell	SO BY OR WILLIAM	
	प्र अटरन	८८ वर्गाट बाट्टन	
9		SS EYOR EYOR	
	5 ELV	Se symc sky	
-	Shace.	SP SYDE SNOWS 92	
[		SU BY DIE IEZMEREN	
	U MLHE	SM shar whe	
	CRAT	GO STEN ENTE	
20		62 STALVE	
5	S LVE LVE	6 Servi €rec	
	C LV2 €V2	EG BILY MICHEM	
	g we vectory	६८ छा प् अटरन्	
	प्र राज्य कार्य	ee BILY BILY	
	S LUE BY OR	EP BILLY ENGEN	
	CLUE BILY	EU BILLY RETMEREN	
	PLUE ENGEN	CO SILVI MLUZ	
	U LIVE RETMERED	bo shase ems	
	W LVZ MLYZ	by sharm the	
	O EVE EME	PC ENOTHERE	
	S €VE LVE	ba enseanement	
9	l €ve €ve	PRENETH SICKE	
5	g €ve vicwem	PS CHOSEN BY OR	
	४ ६४२ ठाटरन्	PP TNOTH BLU	
	S Eve syme	DD ENGTH ENGTH	
9	f eve oraca	DI SABLA ESMENE	
C	U for removed	PIU THOSE MLUTE	
9	W EVE MLYE	UO ECHERA EME	
	O VACUTEM EIME	115 ETMEREN LVE	
9	0	11) ESMETER EVE	
9	S VECWEM LIVE	UGICZMETER VIKWE	rą
9	e viewem eve	US ICTMENTA SICTOR	
	g newen newen	US REMEREN BY OR	
9	R MICHIEM BICKED	UE REMERCI BILLY	
9	IS NEWEN BY OR	Of Carping and	
9	HE VECTOR BILLY	Upicznera avez	A (3)
10	וף אושיבון במסבה	UU RETHERE RETHERE	X.
	IN MEMERY REPRESEN	UWIEZMEREN MLUZ	
		WOMLUZ ENTE	
	w newen mure	WS MLUZ LIVE	
	० डाटरन् स्माट	1010 MLUTE EVE	
8	3 sicked trac	10119 MLIFE VECTOR	
8	C SICZEL EVE	1012 MLHE SICE OF	
×	g sicral vicuri	1015 MLUZ BYOK	
Ü	४ शटरन् शटरन्	1017 MLUE BY OTC	
8	0 AT 7 6 68 14	WIP MLUZ THEZE	
8	S डाटरन् डारण्	WU MLUZ PEZMER	-d
N.	० डाटरन् डार्प	WW MLHE MLHE	
U	D BICZEL CNOZEL	SOO ENTER	
S	O SICZO ICZMERON	300 60 100	
0			

Figure 25(a): Showing the Chisoi digits from book 'Kuṛmāli Cisoi Cinhāp' ซะเบนตน อะหรุ อะหุบเตมุ class-l, last page (2009).



Figure 25(b): Showing the Chisoi digits 1-10 from pre-primary book 'Hāmôr Kuṛmāli Cisôi' בששושה בששושה בשוושה back cover (2022).

MEET MEOMORAGE OCOMESTE DIRECTO EMELO ICM MUTE EMELO COUNTED BEMUTE VLACUTEN OCCUPANT STORE TEM OCCUPANT SECRET OF ASOF ASSESSED AND ASOFT THE MAISTENEMENT DIECOZ -UL DIECOIZ OCUM OCORCSICWZ MEMCETOL ERCUEI ELORUL-THE DIRECT COME CONCERNE MEMORIAL MEM ELACUL TOW ELACUL ICUANO ME OUT OICHIE COMMEO CILORM | SECIOE-LO SE VICHL VENEUL MONES SIGNE IEM SIGE VENEUL MONES SIEVIEZOIEME SIGNE | LV EVE SIGNE MESTED NEW VLSICUL DIRECTED LVE HUIC CIONE WICOW EICHIC OCCUPANT DISCOR LIVE DECICORORE WOOD ELOST ELACULO দুই বাংলার আর বাংলার বাইরের পরমবন্ধুর হদিশ উপদেস্টা মণ্ডলী অনুপম মিশ্র, প্রশান্ত চট্টোপাধ্যায়, জয়া মিত্র, সুখবিলাস বর্মা, জাকির হোসেন, ড. শিশির মজুমদার, সুনীল প্রসূন ভৌমিক, অরূপশঙ্কর মৈত্র, শক্তিমান ঘোষ, সুজয় চক্রবর্তী, সৈকত ভট্টাচার্য

চন্দ, রুবি পালটোধুরী, নন্দিতা পালটোধুরী, হিমাংশু হালদার, রতন বসু মজুমদার, দীপদ্ধর দৈ, রাজা গুহ, মধুমঙ্গল মালাকার, মজু মালাকার, সুনীল মালাকার, ডমন মুর্মু, গণেশ রবিদাস, ক্ষিরোদাবালা সরকার, ষষ্ঠী জয়সোয়াল, আকুলবালা সরকার, কার্তিক দাস, বাতালু রায়, সাঞ্জুলাল সরকার, তপন সরকার, অশোক রায়, অঞ্জলী রায়, হৃষিকেশ রায় অবিভক্ত দিনাজপুর, নারায়ণ চন্দ্র পৈত দ ২৪ পরগণা, শীতল ফৌজদার বিষ্ণুপুর, গীতা কর্মকার, শিল্পডাঙা বিকনা বাঁকুড়া, শ্যামল মিস্ত্রী, মধু নায়েক, নারায়ণ মাহাত, যতীন মাহাত

পশ্চিম মেদিনীপুর, গজেন্দ্র মালাকার, জিতেন বর্মন, নমিতা সরকার, গনাত রাভা, অনিমেষ মালাকার জলপাইগুড়ি, সন্তোষ দে জ্যোৎস্না দে দেওয়ানহাট, দেবব্রত সরকার রসিকবিল কোচবিহার, আশু বাগচী নকশালবাড়ি দার্জিলিং, বিশ্বেন্দু নন্দ, ইন্দুভূষণ নন্দ, বিশ্বেশ্বরী পঞ্চাধ্যায়ী, ড. ললিতা ঘোষ, সৌমিত্র ভট্টাচার্য, তুহিন মুখোপাধ্যায়, ড. সোমা মুখোপাধ্যায়, মুণাল গোস্বামী কলকাতা, স্বপন মিত্র, আসানসোল আশিস মালাকার বনকাপাসি বিকাশ জয়নাবাদ, দুর্গাপুর, মাণিক সূত্রধর, নতুনগ্রাম বর্ধমান, চন্দ্রশেখর ভট্টাচার্য কোনগর হুগলি, মোহন বিশ্বাস উ ২৪ প্রগণা, ধর্মেন্দ্র সূত্রধর চড়িদা, নিতাই নন্দী রঘুনাথপুর পুরুলিয়া, পার্থ পঞ্চাধ্যায়ী পূর্ব মেদিনীপুর, বড় বাস্কে বোলপুর সুনীল সরেন রবিন সরেন সিউড়ি সুবল দাস বৈরাগ্য বঙ্গনগর বীরভূম, হরিপদ বসাক ফুলিয়া নদীয়া, শ্রীনাথ টুড় বিধান টুড় মালদা, অরুণ ভাষ্কর মুর্শিদাবাদ

এবিএম আনিসুজ্জামান, মো. শাহিনুর রশিদ ঢাকা চন্দন শফিকুল কবীর ইতালি সোফি রিখটার, সুজয় চক্রবর্তী জামানি

সম্পাদক বিশ্বেন্দ্র নন্দ

সম্পাদকীয় দপ্তর ২৪/১৮, নাবালিয়া পাড়া রোড বড়িয়া কলকাতা ৭০০০০৮, ৯৪৭৫২১৩৭৮৮, ০৮৩৩৫০১৪৮০৮ উত্তরবঙ্গ মধুমঙ্গল মালাকার, মুস্কিপুর, বড়গ্রাম দক্ষিণ দিনাজপুর, ৭৩৩১২৮, ০৯৭৩২৩৭০৯৪৬ lokfolk.blogspot.in, buybengalihandicrafts.blogspot.in, facebook.com/

ourparam, biswendu@yahoo.com অক্ষরবিন্যাস কলাবতী মুদ্রা ।। ছাপা ইউনিক প্রিন্টাস ।। পরম মূল্য ২৫ টাকা অঙ্কন: সৌমিত্র ভট্টাচার্য, বিধান বিশ্বাস, গোপী দে সরকার, চন্দন শফিকুল কবীর নামাঞ্চন সৌমিত্র ভট্টাচার্য সংগঠনের জন্য যোগাযোগ বাংলাদেশ, নাগরিক উদ্যোগ, লালমাটিয়া, ঢাকা।। উত্তরবন্ধ, মধ্মঙ্গল মালাকার

চতর্থ বছর ।। উনত্রিশ কল ।। পৌষ ১৪২৪।। ৬

Figure 26: Showing the monthly magazine 'Pôrôm' written in both Kurmali and Bengali (2016).

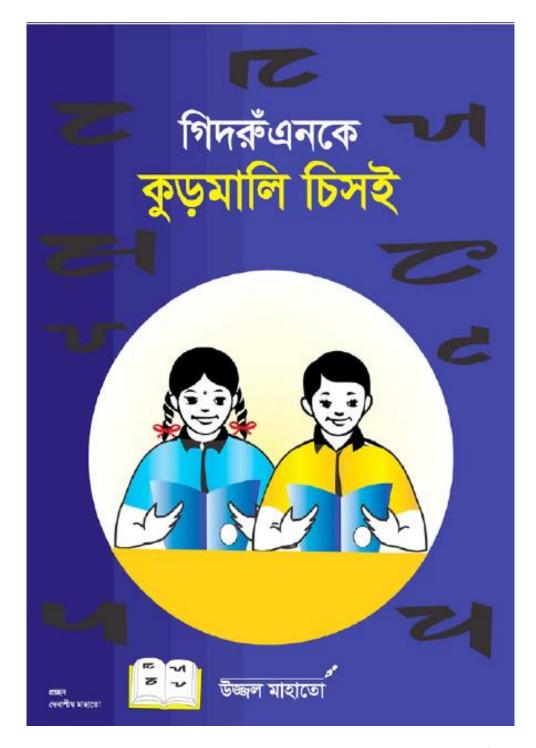


Figure 27: Cover picture of first ever Kurmali primer of Bangladesh 'Gidôrũenke Kuṛmāli Cisôi' ฟริธมิฝั่นหลุน ซะผินหลุ่ง שלאלג, using the latest font. (2021)

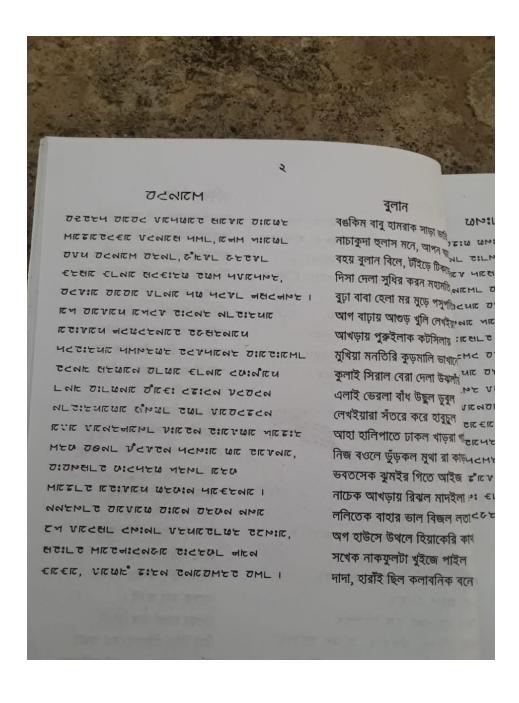


Figure 28: Showing the first poem of Kurmali book @ZAIRH 'Bulān' written in both Chisoi and Bengali script (2:2018).

174 **4८€८२ 4८₹८२** 

פוראיור מודפיו אכער, מראש בובפנים אכתני पट€टर पटसटर पटसटार पटणत छर मीत्रधार । סבלהט סטובא עלא סבעה בלסהט, ו מאוים בא אמלם באשר אומם אומם אומם ו סהסכל אלטבל פלאה ELTC:L סכאב, בעודט מבע אדט מבע מדע בכבאר ו そしてでいい チレマでいい ひょって ひていろ שוש שואו שואו שואול שואול שואול שואו ECUICO HEVOL DICOLE I DICOURU T: CT VUT:L ETM CT UL CT VOLC, DN BL LEL NECL SECK HUHR EZNL LE:M E: RULT NEE:L MICUR ETOLE ד € L ש אונער בוצא אובאסרב הטר ו

15

Figure 29: Showing Kurmali poem 'Mudun Musun' 446228442428 from book 'Kurmāli Cāri Disā' कटफपलनेट उद्यक्ष ६८सार (15:2014).

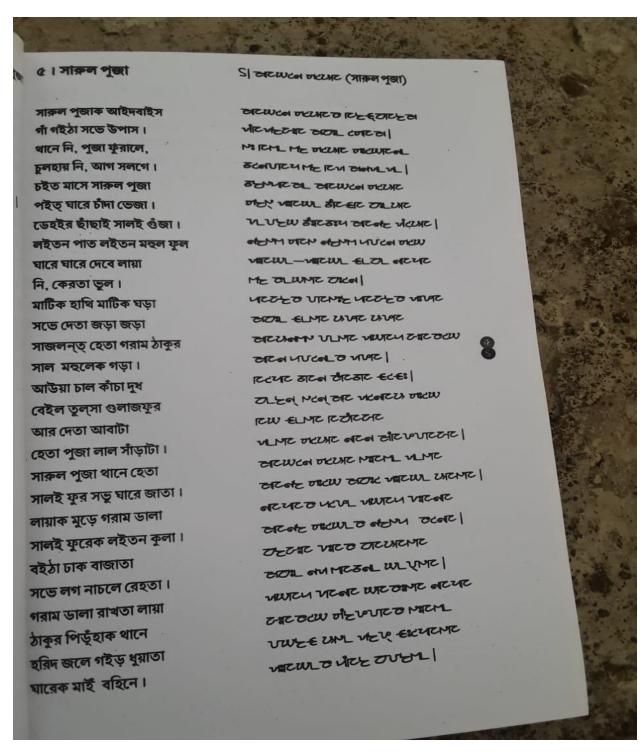


Figure 30: Showing the 5<sup>th</sup> poem 'Sārul Pujā' written in both Chisoi and Bengali scripts from book 'Cāriceṭhā' 3EWZ3LZ8E (5:2014).



d Here.

# **ALL INDIA KURMALI** CHISOI SAKSHARATA **MISSION**

Figure 31: web page of All India Kurmali Shaksharta Mission of Chisoi (2021).



Figure 32: New Banner of 'Sarva Šikṣā Abhiyān' in Chisoi (2021).(courtesy: Facebook)

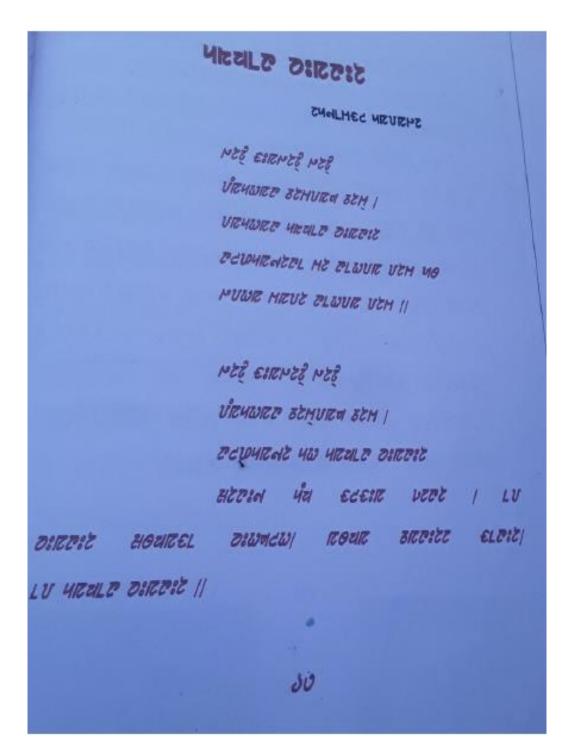


Figure 33: Extracted from textbook 'Kuṛmāli Sāṛā Bāhār' ชะเพนะส มหาย (for class-III) (13:2022).



Figure 34: Extracted from textbook 'Kuṛmāli Sāṛā Bāhār' ขะบนและ สเบน ซมแนน (for class-IV) (16:2022)

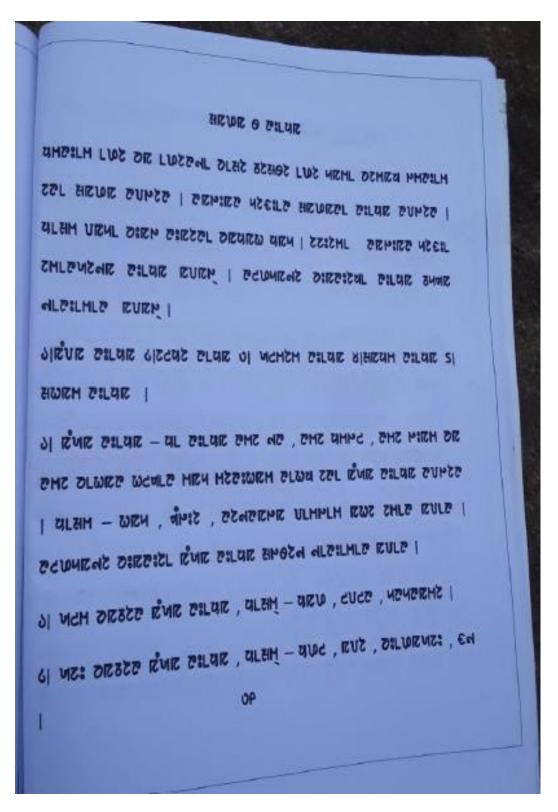


Figure 35: Extracted from textbook 'Kurmāli Sārā Bāhār' ชอบพอง ฮอบตอง (for class-IV) (37:2022)

# OCUMENT RESIDENT PERSONS FOR THE PROPERTY LEADERLEAM

## KURMALI CHISOI-A TEACHERS' ASSOCIATION

Regd.No.- S0005660 of 2019-2020

Head Office

BAMUNDIHA:: P.O.- TULIBARH:: P.S.- JAMBONI:: DIST.- JHARGRAM:: PIN -721503 Phone No.: - 8945041514/9734435098:: Email Ld:- kurmalichisoiateachers@gmail.com

Ref: 07/2021

Dr. Deborah Anderson **Unicode Technical Director** Unicode Technical Committee, USA Date:-27/07/2021

Subject: Support application for "Proposal to Encode Chisoi in Universal Character set.

#### Dear Madam,

In reference to the above subject it is to inform that Kurmali Chisoi-a Teachers' Association is the Leading organization of Kurmali-Chisoi-a Linguistic Community of India now. It is a non-profitable organization . The main objective of this organization is to preserve and propagate Kurmali Language and Kurmali culture scientifically among Kurmi people and many other people like Rajwar, Dhopa, Napit, Kamar, Kumore etc. Many of them use Kurmali Language in their day to day lives and they all belong to Kurmali Linguistic community. More than 50 Lakh of people of India Use Kurmali Language. There are also Kurmali speaking people in Bangladesh and Nepal. Now thousands and thousands of people use the Chisoi Script to write Kurmali language . There are many Kurmali Chisoi- Medium primary schools in West Bengal of India which had been registered by the SSM 'Samagra Siksha Mission' Education Mission of Govt. of India. Now Kurmali is a recognized language in the state of West Bengal and Jharkhand.

#### The History of Chisoi script

The Chisoi is one kind of Alphabetic Script. It was created by Jayanta Kumar Mahata in 1986, a linguist of West Bengal. It is nothing but the sumtotal of some religious and cultural symbols of Kurmali Cultural Community. The symbols have been logically and scientifically arranged in the Chisoi. It is used to write Kurmali Language. Several books and a weekly newspaper have been published in the Chisoi Alphabet . There are forty characters (8 vowels, 20 Consonants , 2 signs and 10 digits) in the Chisoi Alphabet, Pankaj Kumar Mahata of Jhargram, an engineer designed a digitized true type font in the year 2000 first. It has been widely used by the Kurmali Chisoi-a Community. Another true type font was designed by Biswajit Mandal and Nurul Alam Ador for chisoi in 2021. It is easier to use . So it has been also accepted by the Kurmali Chisoi-a Community. Now it is used to write Kurmali Language . After thirty four years journey (Debate, discussion, work-shop, seminar etc.) Chisoi is a popular script among Kurmali Linguistic Community.

So, our humble request to Unicode Committee to Encode our Chisoi Script as soon as possible for smooth development of the Kurmali Language.

Yours sincerely

ELGEITHP UTTTP

(SUSANTA MAHATA) President / Secretary ASSOCIATION

#### ISO/IEC JTC 1/SC 2/WG 2

### PROPOSAL SUMMARY FORM TO ACCOMPANY SUBMISSIONS FOR ADDITIONS TO THE REPERTOIRE OF ISO/IEC 10646 $_{\mathrm{TP}}^{-1}_{\mathrm{PT}}$

Please fill all the sections A, B and C below.

Please read Principles and Procedures Document (P & P) from http://std.dkuug.dk/JTC1/SC2/WG2/docs/principles.html uth for guidelines and details before filling this form.

 $\textbf{Please ensure you are using the latest Form from {\tt HTU} \underline{http://std.dkuug.dk/JTC1/SC2/WG2/docs/summaryform.html{\tt UTH-latest}.} \\$ 

See also http://std.dkuug.dk/JTC1/SC2/WG2/docs/roadmaps.html uth for latest Roadmaps.

#### A. Administrative

1. Title:	Proposal to Encode the Chisoi in Universal Character Set					
2. Requester's name: Biswajit Mandal (biswajitmandal.bm90@gmail.com)						
3. Requester type (Member body/Liaison/Individual contribution): Individual Contribution				on		
4. Submission date: 01/1		01/11/2022				
5. Requester's reference (if applicable):						
6. Choose one of the	following:					
	mplete proposal:			Yes		
(or) More information will be provided later:				No		
B. Technical – Gener	al					
1. Choose one of the	following:					
a. This propos	sal is for a new script (set of ch	aracters):		Yes		
Proposed name of script: Chisoi		Chisoi				
b. The propos	al is for addition of character(s	s) to an existing block:				
Name	e of the existing block:					
2. Number of charact	ters in proposal:			40		
3. Proposed category	(select one from below - see	section 2.2 of P&P document):	· :			
A-Contemporary	X B.1-Specialized (	(small collection)	B.2-Specialized (large collection)			
C-Major extinct	D-Attested extin	nct	E-Minor extinct			
F-Archaic Hierogl	yphic or Ideographic	G	-Obscure or questionable usage symbols	5		
4. Is a repertoire incl	uding character names provide	 ed?		Yes		
•	= :	the "character naming guidelir	nes"			
	nex L of P&P document?	0.0		Yes		
b. Are the character shapes attached in a legible form suitable for review?			Yes			
5. Fonts related:		-				
	ovide the appropriate comput	terized font to the Proiect Edit	or of 10646 for publishing the standard?			
		vajit Mandal (biswajitmandal.)	· -			
b. Identify the	party granting a license for us	se of the font by the editors (ir	nclude address, e-mail, ftp-site, etc.):			
	Bisv	vajit Mandal (biswajitmandal.)	bm90@gmail.com)			
6. References:						
	ces (to other character sets, d	ictionaries, descriptive texts et	tc.) provided?	Yes		
b. Are publish	ed examples of use (such as sa	amples from newspapers, mag	azines, or other sources)			
of proposed o	haracters attached?		Yes			
7. Special encoding is	ssues:					
· -		character data processing (if a	pplicable) such as input,			
	·	ransliteration etc. (if yes please		Yes		
		See proposal for addition	nal details			
8. Additional Informa	ation:					
		formation about Properties of	the proposed Character(s) or Script that	will assist in correct		
		·	r script. Examples of such properties are			
=			as line breaks, widths etc., Combining be	=		
		•	Up contexts, Compatibility equivalence			
normalization related	d information. See the Unicod	le standard at нти <u>http://www.u</u>	ınicode.orgயா for such information on o	ther scripts. Also see		
Unicode Character D	atabase (http://www.unicod	o org/reports/tr/// ) and asso	ciated Unicode Technical Reports for inf	formation pooded for		

consideration by the Unicode Technical Committee for inclusion in the Unicode Standard.

## C. Technical - Justification

1. Has this proposal for addition of character(s) been submitted before?	No			
If YES explain				
2. Has contact been made to members of the user community (for example: National Body,				
user groups of the script or characters, other experts, etc.)?	Yes			
If YES, with whom?  Jayanta Kumar Mahata, Narayan Mahata, Bikash Mahata, Amalendu Ma  Mahata, etc	hata, Susanta			
If YES, available relevant documents: See citations in text proposal				
3. Information on the user community for the proposed characters (for example:				
size, demographics, information technology use, or publishing use) is included?	Yes			
Reference: See text of proposal				
4. The context of use for the proposed characters (type of use; common or rare)	Common			
Reference: See text of proposal				
5. Are the proposed characters in current use by the user community?	Yes			
If YES, where? Reference: See text of proposal				
6. After giving due considerations to the principles in the P&P document must the proposed characters be entirely				
in the BMP?	No			
If YES, is a rationale provided?				
If YES, reference:				
7. Should the proposed characters be kept together in a contiguous range (rather than being scattered)?	Yes			
8. Can any of the proposed characters be considered a presentation form of an existing				
character or character sequence?	No			
If YES, is a rationale for its inclusion provided?				
If YES, reference:				
9. Can any of the proposed characters be encoded using a composed character sequence of either				
existing characters or other proposed characters?				
If YES, is a rationale for its inclusion provided?				
If YES, reference:				
10. Can any of the proposed character(s) be considered to be similar (in appearance or function)				
to, or could be confused with, an existing character?				
If YES, is a rationale for its inclusion provided?				
If YES, reference:				
11. Does the proposal include use of combining characters and/or use of composite sequences?	No			
If YES, is a rationale for such use provided?				
If YES, reference:				
Is a list of composite sequences and their corresponding glyph images (graphic symbols) provided?				
If YES, reference:				
12. Does the proposal contain characters with any special properties such as				
control function or similar semantics?	No			
If YES, describe in detail (include attachment if necessary)				
2. 129 describe in detail (include describe in including)				
13. Does the proposal contain any Ideographic compatibility characters?	No			
If YES, are the equivalent corresponding unified ideographic characters identified?				
If YES, reference:				
11 TE3, Telefelice.				