# RECONSTRUCTION OF THE PROTO-LANGUAGE OF BARANUSA-KEDANG-LAMAHOLOT IN EASTERN INDONESIA

## Yunus Sulistyono

Indonesian Education Department

Faculty of Teacher Training and Education Science – Universitas Muhammadiyah Surakarta Ahmad Yani street Tromol Pos 1 Pabelan, Surakarta 57102, Indonesia

yunus.sulistyono@ums.ac.id

### Abstract

This paper aims to reconstruct the proto-language of Baranusa spoken in North West of Pantar, Kedang spoken in East Lembata and Lamaholot spoken in East Flores. From previous research, the three languages have been proven to be closely related according to its lexicostatistic analysis. However, this conclusion still needs further explanation in order to prove the relation of the three languages qualitatively. Proto-language reconstruction as part of qualitative analysis is done in this research by applying bottom-up reconstruction. The specific technique of diachronic study is used in order to formulate proto-language of Baranusa-Kedang-Lamaholot. The result shows a specific lexical and phonological characteristic of the proto-language as a part of Flores group.

## Keyword: Proto-language, reconstruction, Baranusa, Kedang, Lamaholot, East Flores

## **Presenting Author's Biography**



Yunus Sulistyono. Graduated from Indonesian department of Universitas Gadjah Mada and has a Master degree in Linguistics from the same university. He is now a full-time teaching staff at Indonesian Education department of Universitas Muhammadiyah Surakarta and focusing his research in phonology, historical linguistics, and applied linguistics.

## 1. Introduction

Language is a unique substance of human speech production. By the time scientists began to realize that there are certain patterns in language change, many have interested in doing research on how language changes and its relation to one another. From the era of Ferdinand de Saussure when he started to reconstruct the relation of Indo-European languages in the 19th century until modern linguists at the moment, diachronic study in linguistics has never lost its charm.

From thousands of languages around the globe, Austronesia is one of the most interesting language families to discuss. Spreading from the islands of Hawaii in the eastern edge to the land of Madagascar in the western edge, Austronesian family has more than 350 million speakers and consists of 1200 languages [1]. This makes the Austronesian language family is about a fifth of the total number of languages in the world. As part of Austronesian speaking area, Indonesia has more than 200 Austronesian languages spoken in the western and the middle part of the nation and around 400 Papuan languages spoken in the eastern part and some of them are endangered languages. This linguistic situation makes Indonesia to be one of the best language laboratories in the world.

Baranusa or better known as a variety of Alorese is a language spoken in the sub-district of North West Pantar, Alor District, East Nusa Tenggara. Baranusa speaking area is the center of commerce, fishery, and education in the island. It is also being nominated to be the future capital of Pantar District (to be developed as separated district in the near future).

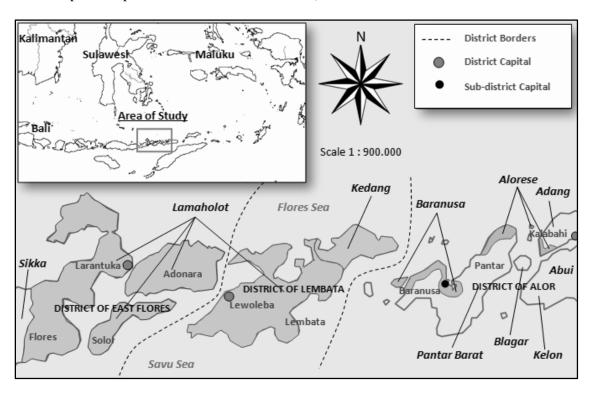


Figure 1. Languages of East Flores, Lembata and Pantar (map based on SIL's [3])

Previous studies of Badan Bahasa [2] and Summer institute of Linguistics [3] have not mentioned Baranusa as a specific language spoken in the island of Pantar. The language map of East Nusa Tenggara published by Klamer [4] set out from the language map by Stokhof, *et al.* [5] reveals that the Baranusa speaking area is included in the Alorese speaking area. Previous studies on the grammar of Alorese also done by Klamer [4] with a conclusion that there are some aspects of Papuan features found in Alorese. Languages inventory of Alor-Pantar was done by Martis, *et al.* [6], but there were no notes on Baranusa and Alorese. Articles on Indo-pacific hypothesis by Greenberg [7] mentioned that languages of Timor and Alor are included to the Phylum Trans-New Guinea. However, the sample of the languages only includes Abui, Bunak, Makasai, and Oirata. Language grouping by Stokhof [8]

revealed that Alorese of Pantar is mainly spoken in coastal area and is assumed to be Austronsian. This fact leads to the hypothesis that there is an Austronesian language spoken in the island. Holton's publication on Lamma language dictionary [9] stated that Baranusa is a coastal language that is living contiguously with Lamma. Moreover, Samely [10] explained that one out of twelve languages spoken in the island of Pantar is Austronesian. Ino [11] informed that Baranusa is an Austronesian language in Pantar among many other Papuan languages spoken in the island.

The study of Kedang and Lamaholot each has come to the stage where they have been grouped into one certain group of languages. Fernandez [12] & [13] made a grouping of languages in the island of Flores and made a conclusion that Kedang and Lamaholot are members of Flores group. However, this grouping does not include other Austronesian languages outside Flores and Lembata. The possibility of Baranusa to be a member of this particular group of languages is quite big considering Baranusa speaking area is not too far away from Lembata and East Flores (Kedang and Lamaholot speaking area).

The previous research conducted by Sulistyono [14] reveals that Baranusa is a member of East Flores subgroup along with Kedang and Lamaholot lexicostatistically. This leads to the assumption that Baranusa is a partial member of Flores group. After the three languages have been proven to be closely related lexicostatistically, the next step to reveal the historical relations of those languages is by applying qualitative analysis with bottom-up reconstruction technique. This particular technique is used in order to formulate proto-language of Baranusa, Kedang and Lamaholot.

## 2. Research Objective

This research is focusing on the reconstruction of the proto-language of Baranusa-Kedang-Lamaholot. The reconstruction includes bottom-up reconstruction technique. The three modern languages are being compared in order to reconstruct the proto-form in the past. The comparison of each modern language includes phonology and lexical level.

#### 3. Methods

The data used in this research were taken directly from the field in 2014. The visited areas include the village of Baranusa at the sub district of North-west Pantar, Alor for Baranusa, the city of Lewoleba, Lembata for Kedang and the village of Beloaja, Tanjung Bunga district, East Flores for Lamaholot. The collected data include phonological and lexical inventory of the three languages. The main methodology applied in this study is qualitative analysis with reconstruction technique, mainly bottom-up reconstruction.

## 4. Result

#### 4.1 Bottom-up reconstruction of Proto Baranusa-Kedang-Lamaholot (PBKL)

Qualitative analysis on the search of genetic identity of languages involves certain techniques used to formulate proto-form of the compared modern languages. This particular technique is called bottomup reconstruction. The technique is applied by formulating proto-form etymon of Baranusa, Kedang and Lamaholot. The reconstruction of proto-form of languages is a study on prediction of old-form of modern languages. These old forms are hypothesized to occur in the past before modern languages existed [15]. The formulation of proto-form involves phonological and lexical characteristic of modern languages.

The bottom-up reconstruction is done by arranging proto-form of modern languages. The formulation of proto-language of Baranusa-Kedang-Lamaholot (PBKL) etymon was referring to the sound correspondences and proto-Austronesian etyma reconstructed by Dempwolf [16] and Dyen and Blust [17]. The reconstruction of PBKL also refers to the phonological system of each language in order to seek the compatibility of sound so that the proto-form can be formulated precisely.

From the previous research done by Sulistyono [14], 92 lexicon of each modern language of Baranusa, Kedang and Lamaholot showing cognate form can be compiled. These 92 lexicons were compared in

order to formulate the PBKL. The comparison includes Proto-language of Austronesia (PAN) and lexicon of each language. The following descriptions are the details of the formulation of a part of the 92 lexicons found in the comparison of Baranusa, Kedang and Lamaholot in order to formulate the proto-form of the modern languages.

Etymon [kərawu?] 'ash' in Baranusa and [awu] 'ash' in Kedang and Lamaholot shows that there are similarities with PAN \*qabuq 'ash' reconstructed by Dempwolff [16]. [kərawu?] in Baranusa has a [?] innovation also an addition of [kə] in the first syllable. In the other hand, [awu] 'ash' in Kedang and Lamaholot shows a similar form of lexicon. Also, the placement of [w] in modern languages and [b] of [qabuq] 'ash' in PAN indicates that there is a continuation from a strong articulation [b] to a weaker articulation [w] in modern languages. This leads to the conclusion that [awu] has the most possibilities to be reconstructed as proto-language of Baranusa-Kedang-Lamaholot (PBKL).

Other samples show some characteristics on the sound changes on each lexicon. [wai] 'water' in Baranusa, [wei] 'water' in Kedang and [wai] 'water' in Lamaholot shows how similar those form of lexical are. The retention of [w] clearly happens to the three modern languages from PAN \*wahiR reconstructed by Dyen [17]. The variations of vowel [a] - [e] - [a] made a sound correspondence of the three modern languages. Vowel [a] indicated to be the retention form of PAN \*wahiR 'water'. As conclusion, [wai] 'water' estimated to be PBKL etymon for *water*.

[ramuk] 'root' in Baranusa [ramu?] 'root' in Kedang and [amut] 'root' in Lamaholot also show a cognate form of *root*. PAN etymon \*waka(R) reconstructed by Dyen for *root* also shows a similarity on the existence of plosive and fricative sound although they are not quite in the same place in the modern form. It means that there were shift on the placement of [r] and plosive sound. The existence of [k] in PAN is indicating that there was possibly retention on the modern form of [ramuk] 'root' in Baranusa. Therefore, [ramuk] 'root' were formulated to be the proto-form of PBKL. Table 1 below shows the result of the bottom-up reconstruction of PBKL.

No.	PAN Dempwolff	PAN Dyen	Baranusa	Kedang	Lamaholot	PBKL	Gloss	
1.	*qabuq	*qabu	kərawu?	awu	awu	*awu	abu	
2.	*wayər	*wahiR, *Danum	wai	wei	Wai	*wai	air	
3.	*aka(l)	*waka(R)	ramuk	ramu?	amut	*ramuk	akar	
4.	*anak	*anak	anaŋ	ana?	ana?	*ana?	anak	
5.	*haŋin	*haŋin	aŋgi	aŋin	aŋin	*aŋin	aŋin	
6.	*asu	*asu	aho	au	aho	*au	anjing	
7.	*apuy	*apuy	ape	api	ape	*ape	api	
8.	*hasap	*qa(s)u(?)	panuhuŋ	nuheŋ	nuhuŋ	*panuhuŋ	asap	
9.	_	*manuk	manuŋ	manu?	manu?	*manu?	ayam	
10.	*baru	*baqeru(h)	wunoŋ	weruŋ	wu?u	*wu?u	baru	
11.	*batuq	*batu?e	wato	wa?	wato	*wato	batu	
12.	*gawa(h)	_	karajaŋ	kareya?	kəriya	*kareya?	bekerja	
13.	_	*baliŋ	belo?	belo?	welo?	*welo?	belok	
14.	_	*baReq	baŋ	babaŋ	ba?a	*ba?a	bengkak	
15.	*bərat	*bərqat	ba	bara?	ba?at	*bara?	berat	
16.	*laŋuy	*laŋui	naŋge	naŋi	naŋe	*naŋi	berenang	
17.	*lakuq	*laku?	pana	paŋ	pana	*pana	berjalan	
18.	*kaRi,	*kaRi,	tutu apa	tutu?	tutu	*tutu?	berkata	
	*tutuR	*tutuR						
19.	*hasəŋ	*haseŋ	nahiŋ	nein	nain	*nahiŋ	bernafas	

Tab. 1 Proto-language of Baranusa-Kedang-Lamaholot Etyma

20.	*tu(m)buh	*tubuq	tawaŋ	tawe	tawa	*tawa	bertumbuh	
21.	*bintaŋ	*bi(t)uqen	tamala	male	tala?	*tamala	bintang	
22.	*bulan	*bulan	wulaŋ	wula	wulan	*wulan	bulan	
23.		*manuk	kələŋ	kolon	kolon	*kolon	burung	
24.	*bauq	*bahu	wau	name?	wau	*wau	bau	
25.	*dataŋ	*mai, *maRi	dai	mai	mai	*mai	datang	
26.	*daun	*Dahun	lələŋ	1010	lolon	*lolon	daun	
27.	*duwaq	*Duwa	rua	sue	rua	*rua	dua	
28.	*dukduk	*DukDuk	təbə	tebe	tobo	*tobo	duduk	
29.	*buntut	*wikuR	ikuk	ekor	ikuq	*ikuk	ekor	
30.	*əmpat	*epat	pa	apa?	pat	*pat	empat	
31.	*a(n)daw, *wari	*qajaw	lara	loyo	leron	*loyo	hari	
32.	*atay	*qatey	ateŋ	ate	ate	*ate	hati	
33.	*ijuŋ	*ijuŋ	niruŋ	niŋ	iru	*niruŋ	hidung	
34.	*bəlum	*quDip	mori	murun	morit	*morit	hidup	
35.	*i(n)təm	*qitam	mitɛŋ	miteŋ	miten	*miten	hitam	
36.	*hujan	*quzan	uraŋ	uja	uran	*ujan	hujan	
37.	—	*qu(tT)an	utaŋ	otan	utan	*utan	hutan	
38.	*inaq	*ina	ina	ina	ina	*ina	ibu	
39.	*ikan	*ikan	ikaŋ	i?a	ikan	*ikan	ikan	
40.	—	*Zaqət	date	daten	datə	*datə	jahat	
41.	*jalan	*zalale	pana	lala	laran	*lala	jalan	
42.	*jauh	*zauq	doaŋ	doa	doan	*doan	jauh	
43.	*kaki	*kaki(?h)	leiŋ	lei	lei	*lei	kaki	
44.	*kamiq	*kami?	kame	kame	kame	*kame	kami	
45.	*kamuq	*kamu?	mo	mo	mi	*mo	kamu	
46.	*ijan	*(q)ija(n)	erepira	arapiye	rampira	*arapiye	kapan	
47.	*kaju?	—	kajo	kajo	ai	*kajo	kayu	
48.	*karaŋ	*ma-maja, *ma- Raŋaw	mara?	maya	mara	*maya	kering	
49.	—	*kilat	hila	kila?	kihilat	*kihilat	kilat	
50.	*kitaq	*kita?	tite	ete	tite	*tite	kita	
51.	*kulit	*kulit	kamaŋ	ama?	kama?	*kama?	kulit	
52.	*kuniŋ	*iRaq	kumoŋ	umaŋ	kuma	*kuməŋ	kuning	
53.	*kutu	*kutu	kuto	utu	kuto	*kuto	kutu	
54.	*laki	*laki	kalake	laqi	belaki	*laqi	laki-laki	
55.	*[t]asik	*tasik	tahi	tahi	tahik	*tahik	laut	
56.	-	*meñak	worak	woya?	woraŋ	*worak	lemak	
57.	*dilah	*dilaq	wewel	ebɛl	wewe	*wewel	lidah	
58.	*ka	*kaqen	taka	kameŋ	kan	*kan	makan	
59.	*malu(?)	*malu?	maniaŋ	miaŋ	mia	*maniaŋ	malu	
60.	*mata	*mata	mataŋ	mato	mata	*mata	mata	
61.	*matay	*patey	mate	mate	mata	*mate	mati	

62.	_	*bunuq	gawo	belo?	belo	*belo?	membunuh	
63.	_	*dəkap	paha	pene	pehe	*pehe	memegang	
64.	_	*peReq	peme	pere?	pira	*pere?	memeras	
65.	*pilih	*piliq	pile	pil	pile	*pile	memilih	
66.	-	—	mula	mule	mula	*mula	menanam	
67.	-	*takaw	tamaka	ma?o	təmaka	*tamaka	mencuri	
68.	-	*kalih	galiŋ	kaliŋ	gəlin	*kaliŋ	menggali	
69.	*gigit	*kiki, *karat	gaki	ki?i	gike	*ki?i	menggigit	
70.	-	_	panoe	moa	рәтэа	*pəməa	menguap	
71.	*jahit	*zaqit	haər	hewuŋ	hawu	*hewuŋ	menjahit	
72.	*luwah	*mutaq	muta	mute	muta	*muta	muntah	
73.	*agan	*ŋajan	naraŋ	naya	nara	*naraŋ	nama	
74.	*ñamuk	*namuk, *lamuk	kapuŋ	hepuŋ	kənəpuŋ	*kənəpuŋ	nyamuk	
75.	*ga(l)an	*ma-panas	pelatiŋ	pana	pəlate	*pana	panas	
76.	*anjan	*qa(n)a(d)u	balaha	lawa	bəlaha	*balaha	panjang	
77.	*pənuh	*pənuq	teiŋ	tiŋ	taiŋ	*teiŋ	perut	
78.	*kasiu?e	—	pukoŋ	թս?εŋ	pukən	*pukən	pohon	
79.	*putih	*putiq	bura	buya?	bura	*buya?	putih	
80.	*kapak	*kapak	kapik	api?	kəpiq	*kapik	sayap	
81.	*susuq	*susuq	tuho	tu	tuho	*tuho	susu	
82.	*tahu	*tahuq	koiŋ	tui	noi	*koiŋ	mengetahui	
83.	*tahun	*taqun	tuŋ	tuŋ	sun	*tuŋ	tahun	
84.	*tanah, *tanəh	*taneq	tana	tana	tanah	*tanah	tanah	
85.	*taŋan	*lima?	limaŋ	liŋ	lima	*limaŋ	tangan	
86.	*taliŋa	*taliŋa	tiluŋ	til	tilu	*tiluŋ	telinga	
87.	*(t)əluy	*CeluR	taluk	tələr	təluq	*təluq	telur	
88.	*lə(m)bay	*ləmbay	bakaŋ	ba?a	bəka	*bəka	terbang	
89.	*təluq	*telə?	talo	telu	tələ	*telu	tiga	
90.	*duRi	*DuRi	ru?iŋ	luriŋ	riuq	*luriŋ	tulang	
91.	*ular	*ulaR	ula	ular	ulaq	*ular	ular	
92.	*tinahi	*bi(t)uka, *(t)in-aqi	teiŋ	teiŋ	tain	*teiŋ	usus	

Of all the changes that have been found, some unique phonological features of the corresponding sound lead to the assumption that each language shared a similar characteristic of vowel and consonant. This can be seen from the sound appearance on PBKL that representing the old-form of Baranusa, Kedang and Lamaholot. The following chapter will describe the phonological inventory of PBKL.

## **4.2 PBKL Phoneme Inventory**

Phoneme inventory of PBKL described below includes vowel and consonant. PBKL has 15 consonant, they are [\*p], [\*b], [\*t], [\*d], [\*k], [\*?], [\*m], [\*n], [\*n], [\*n], [\*l], [\*r], [\*j], [\*y], and [\*w]. The following table shows consonant distribution of PBKL.

		articulation												
Articulation	Voice or voiveless	bilabial	labiodental	apiko-dental	apiko-alveolar	apiko-prepalatal	apiko-palatal	lamino-alveolar	lamino-palatal	medio-palatal	dorsovelar	uvular	laryngal	glottal
plosive	VL	*p		*t							*k			*?
	V	*b		*d						*j				
nasal	V	*m			*n						*ŋ			
literal	V				*1									
fricative	VL												*h	
	V													
trill	VL				*r									
	V		*w							*у				

Tab. 2 PBKL Consonant inventory og PBKL

PBKL has five vowel /i/, /e/, /a/, /o/, and /u/. /e/ has two allophone [e] and [ə]. In addition, /o/ has two allophones [o] and [ɔ]. Figure two below shows vowel distribution of PBKL.

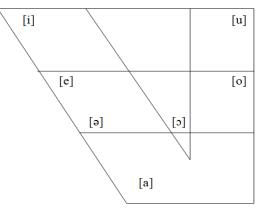


Figure 2. PBKL vowel distribution

#### **5.** Conclusion

The reconstruction of proto Baranusa-Kedang-Lamaholot leads to the conclusion that the proto-form of languages can be estimated from the lexical and phonological characteristic of the modern languages that are being compared. The formulation of the proto-form can give us some overview on the phoneme characteristic and inventory of the proto-language in the past. Further research on the sound correspondences of Baranusa, Kedang, and Lamaholot with PAN and PBKL is needed in order to seek the reflexes of the modern languages to the proto-form.

#### Refferences

- [1] Grimes B. F., Grimes J. E., Ross M. D., Grimes C. E., and Tryon D. T. 1994. Listing of Austronesian Languages in Tryon (ed.) *Comparative Austronesian Dictionary: an introduction to Austronesian studies.* Berlin: Mouton de Gruyter. Pp. 121-279.
- [2] Pusat Pengembangan Bahasa. 2008. *Bahasa dan Peta Bahasa di Indonesia*. Jakarta. Pusat Pembinaan dan Pengembangan Bahasa, Departemen Pendidikan Nasional.
- [3] Summer Institute of Linguistics. 2006. *Bahasa-Bahasa di Indonesia (Languages of Indonesia)*. Jakarta: SIL International Indonesia Branch.
- [4] Klamer, Marian. 2011. A Short Grammarof Alorese (Austronesian). Munich. LINCOM.
- [5] Stokhof, W.A.L. 1975. *Preliminary notes on the Alor and Pantar languages (East Indonesia)*. Canberra. Pacific Linguistics.
- [6] Martis, Non, Wati Kurniawati, Buha Aritonang, Hidayatul Astar, dan Ferry Feirizal. 2000. *Monografi Kosakata Dasar Swadesh di Kabupaten Alor*. Jakarta. Pusat Pembinaan dan Pengembangan Bahasa, Departemen Pendidikan Nasional.
- [7] Greenberg, Joseph H. 2005. The Indo-Pacific Hypothesis (1971). *Genetic Linguistics: Essays on Theory and Methods*. pp. 193–276. William Croft (ed.). London. Oxford University Press.
- [8] Stokhof, W.A.L. 1983. Holle List: Vocabularies in languages of Indonesia Vol. 6 (The Lesser Sunda islands) in *Pacific Linguistics*. Series D no. 59. Canberra. Department of Linguistics, Research School of Pacific Studies, The Australian National University.
- [9] Holton, Gary. 2008. *Concise dictionary of the Western Pantar Language*. Unit Bahasa dan Budaya GMIT.
- [10] Samely, Ursula. 2013. A Dictionary of the Kedang language. Leiden, The Netherlands. Konninklijke Brill NV.
- [11] Ino, La. 2013. Protobahasa Modebur, Kaera, dan Teiwa: Bahasa Kerabatan Non-Austronesia di Pulau Pantar, Nusa Tenggara Timur. Doctoral thesis. Denpasar. Universitas Udayana.
- [12] Fernandez, Inyo Yos. 1988. *Rekonstruksi Proto-Bahasa Flores*. Doctoral thesis. Yogyakarta. Universitas Gadjah Mada.
- [13] Fernandez, Inyo Yos. 1996. Relasi Historis Kekerabatan Bahasa Flores. Ende. Nusa Indah.
- [14] Sulistyono, Yunus. 2015. Historical relations of Baranusa spoken in Pantar with Kedang spoken in Lembata and Lamaholot spoken in East Flores: A Diachronic Linguistics Study. Research Master thesis. Universitas Gadjah Mada.
- [15] Crowley, Terry. 2010 An Introduction to Historical linguistics. Auckland. Oxford University Press.
- [16] Dempwolff, Otto. 1938. Vergleichende Lautlehre des Austronesischen Wortshatzes. Berlin. Dietrich Reiner.
- [17] Dyen, Isodore dan Curtis McFarland. 1970. *Proto-Austronesian Etyma*. (Sources and Abreviations).