# Changes in the Functions of the Word *tita* 'when' in Alutor

# NAGAYAMA Yukari

# 1. Introduction

Alutor, a language of the Chukchi-Kamchatkan family spoken in Northern Kamchatka, has a set of question words, such as 'when,' 'what,' and 'where.' The word *tita* 'when' is used in interrogative sentences to indicate the question of 'at what time'(1). It can also be used as a conjunction to mark a subordinate clause indicating time (2).

(1)	tita	jat-ti?						
	when	come-2sg.pfv						
	'When did you come?'							
(2)	ayi	saŋitat-yə?ət,	tita	na-ntəmŋiv-na				
	very	frighten-3DU.S	when	INV-lose-3pl.p				
	winqure	a-lwən.						

female.domestic.reindeer-group(ABS)

'They were very frightened when they lost a group of female reindeer.' (Kilpalin 1993: 111)

In early texts collected at the end of the 19<sup>th</sup> century and toward the beginning of the 20<sup>th</sup> century, the usage of *tita*, as a clause marker, is rarely found. However, it is frequently found in texts from the mid-20<sup>th</sup> century and later, when contact with the Russian language became more frequent. Thus, the expansion of the word's function was possibly due to the Russian influence. The following are the Russian examples.

## (3) Когда он придет?

'When will he come?' (Ozhegov and Shvedova 1992: 275)

(4) Когда началась война, моему отцу было двадцать лет.
'When the war started, my father was twenty years old.' (Kuznetsov 1998: 436)

In this study,<sup>1</sup> I examined the usage and frequency of the question word, *tita* 'when' in texts collected at different times over the past 100 years. In addition, I showed that the function of this word has been extended to a subordinate-clause marker during the close contact with Russian in the mid-20<sup>th</sup> century.

# 2. Background

#### 2.1 Alutor and Koryak

Alutor had been considered a dialect of a closely related language, Koryak, in studies of the early Soviet Union (USSR). However, many linguists have considered Alutor as a language, not as a dialect of Koryak. In addition, speakers of Alutor have always distinguished between their language and standard Koryak. In 2000, the Russian Federation granted the Alutor people the status of an independent ethnic group.

Ethnic Koryaks are traditionally divided into two groups: Reindeer Koryaks (Chawchu), whose language has been adopted as the basis for standard Koryak, and Maritime or Settled Koryaks (Nymylan), whose language differs from standard Koryak to such an extent that Reindeer Koryaks find it difficult to understand. Alutor people and a few small Koryak groups belong to the Maritime Koryaks.

#### 2.2 Language contact with Russian

The first contact of the Alutor and other indigenous peoples in Kamchatka with Russians was at the end of the 17<sup>th</sup> century. However, for morethan 200 years, except for a few sentences in Koryak at the end of the vocabulary list published by Krasheninnikov (1755), no texts or sentences were published until Bogoras's works (Bogoras 1904, 1917).

Close contact between Alutor and Russian occurred after the 1940s, when the number of Russian speakers rapidly increased, and a widespread campaign for the eradication of illiteracy (Likbez) had begun throughout Kamchatka. Nevertheless, according to the local people, until around the 1960s, the elderly and women had limited opportunities to speak Russian, and the indigenous language was still spoken at home (Nagayama 2013).

This correlated with my observation that the Russian spoken by native female speakers born in the 1930s was strongly influenced by the indigenous language, contrary to bilingual speakers born after the 1950s who grew up in boarding schools.

Thus, there should be differences in the degree of Russian influence in Bogoras's texts (Bogoras 1904, 1917) and texts collected after the 1950s.

#### 2.3 Texts used for analysis

The oldest texts of the Koryak language were collected in 1900–1901 in North Kamchatka by Bogoras (1904, 1917). Most of his work is based on the Kamenskoe dialect, which is spoken around the Kamenskoe village in the Penzhina region near Magadan State. As the standard Koryak is based on another dialect, Chawchu, his studies are the only materials of the Kamenskoe dialect. The Kamenskoe dialect shares certain common features with Alutor and Koryak. Despite the dialectal differences, this is the oldest material that is currently available. Thus, it is referenced in this paper as a reliable resource for the comparison of diachronic changes in Koryak and Alutor. Bogoras (1917: 3–4) collected texts with the help of a half-Russianized Koryak, Nicholas Vilkhin, who was an interpreter for W. Jochelson. Therefore, Bogoras's materials had extremely little Russian influence.

All other texts were told or written by bilingual speakers during various periods. Kibrik et al. (2000) conducted field research several times during the 1970s in the Wywenka village of the Oliutor district, Koryak Autonomous Okrug. Their work comprised three parts, folklore texts, grammar, and a dictionary with rich examples of usage. Although they did not publish the ages of their consultants, judging by their names, their years of birth are probably between the 1920s and 1950s. Kibrik's work also contains seven unpublished texts collected by Vdovin (1907–1996) in the mid-1950s and preserved in the collection of the Museum of Anthropology and Ethnology of the Russian Academy of Sciences in St Petersburg<sup>2</sup>. Four texts out of seven were told by a native speaker, Ivtakrat, born in 1916 in the Vetvei village of the Oliutor district; the speakers of the other three texts are unknown. Kilpalin (1930–1991) was also born in the Vetvei village; his folktales and stories were published with Russian translation in 1993 (Kilparlin 1993). My main language consultants were born in the 1920s–30s, and some were born in the 1910s and 1940–60s in the regions between the Vetvei village in the North and the Tymlat village of the Karaga district in the South.

#### (5) List of resources

- a. Bogoras, W. (1917) Koryak Texts. (24 texts)
- b. Kibrik, A. E., Kodzasov S. V., Muravyova I. A. (2000) *Iazyk i folklor aliutortsev*. (41 texts and 2741 sentences in part of a root dictionary)
- c. Kilpalin, K. V. (1993) Ania: Skazki Severa. (9 texts)
- d. Nagayama, Y (ed.) (2015, 2020) Materials of the Language of Nymylan-Alutor 1, 2, and other unpublished texts in a personal database. (A total of 126 texts in Alutor, including 35 translations from standard Koryak and 485 elicitated sentences)

# 3. tita 'when' and temporal clauses in early Koryak texts

# 3.1 The function of *tita* in early Koryak texts

In Bogoras's studies, there are two examples where *tita* 'when' is used to indicate questions. This is probably related to the fact that the genre of the text is restricted to folk stories, which include many monologues by the narrator. There is no example where the word is used as a temporal clause marker. The following is an example of Koryak Kamenskoe.

(6) *tita* yəmmə tə-rajt-ək? witču tə-rajt-ək.
when I.ABS 1SG.S-go.home-1SG.PFV just.now 1SG.S-go.home-1SG.PFV
'When have I been at home? I have arrived just now.' (Bogoras 1917: 68, Text 13-24)

There are three other instances of *tita* used in Bogoras's text where the function is unclear. Considering that they differ from the functions discussed herein, they were excluded from consideration.

# 3.2 Temporal-clause markers in early Koryak texts

There are certain ways to mark temporal clauses. In the example below, the connective word,  $kikič \sim kičič$  'as soon as' is used.

(7)	<b>kikič</b> ya-jalqiw-lin(et) in		inejeyeŋ-	ng-etən, yanəko					
	as.soon.as	RES-enter-RES.3D	U.S	sleeping.	room-proi	L there			
	<i>ya-yənŋəčaŋəvo-lenat,</i> res-make.love-res.3du.s		və\$aj	vəSajuk qujqən <sup>i</sup> n <sup>i</sup> aq		aqu	gu ya-jal-lin		
			sudd	ddenly PSN.ABS.SG		SG	RES-come-RES.3SG.S		
	ya-kumŋa-l	lin.							
RES-call.out-RES.3SG.S									
	'Just as soon as they entered the sleeping-room and began to make love there, then Big-Raven came								
back, and called out.' (Bogoras 1917: 72, Text 16-16)									
(8)	kičič	ŋaw?ilj?aljŋətum	y-ən	jəlqat-	İ,	awwi		ŋatəŋəno-jtəŋ	
	as.soon.as	female.cousin-AI	BS.SG	sleep-3	3sg.s.pfv	immedi	ately	outside-PROL	
	mal-yəntas	- <i>i</i> .							
good-run.away-3sg.s.pfv									
'As soon as her cousin went to sleep, Kylu run away out of the house' (Bogoras 1917: 100.								e' (Bogoras 1917: 100.	
	Text 24.1-1	2)							

A similar example was found in a text by a speaker of the Mikino subdialect of the Kamenskoe dialect who was born in 1930.

(9) kicit k-awsi-ŋi Sek ko-ŋvo-ŋe səlqat-ək.
 as.soon.as PRES-eat-PRES.3DU.S well PRES-begin-PRES.3DU.S sleep- INF
 'As soon as they eat, they begin to sleep.' (Nagayama 2007: 22)

In many cases, two continuous actions are placed next to each other without the marking of a clause linkage. Verbs may appear in any tense or aspect. In the following example, two actions ('a louse bit her' and 'they shook her combination suit') occurring successively are located one after the other. The first action takes a form in the circumfix na-...-qin that expresses the state of an object or person but is often interpreted as an imperfective or a present tense.

(10) məml-a nə-nu-qen, qalŋe-qaj
louse-ERG STAT-eat-3SG.S/P combination.suit-DIM.ABS.SG
ya-tewla-len.
RES-shake-RES.3SG.S/P
'(When) a louse bit her, they shook her combination suit' (Bogoras 1904: 778)

In the following example, continuous actions that had occurred long before the moment of speech are expressed in the resultative. This is frequently used in folk stories to describe actions or events that are not directly experienced by the speaker.

(11) ya-lqəl-lin jajt-etə, ya-jaitə-yvo-len,
RES-go-RES.3SG.S house-PROL RES-approach.to.the.house-INC-RES.3SG
ya-la-yvo-len.
RES-come.close-INC-RES.3SG.S
'He went home; and when he was approaching, and came close to the house,
(he shouted all of a sudden)' (Bogoras 1917)

Contrarily, in the following example, the preceding action is described in the resultative, and the action that is currently happening or occurs after the preceding action is described in the imperfective.

(12)mitiw ye-čSal-len ənkata təlajvə-jkən nellə. next.day RES-dawn-RES.3SG.S/A at.that.place walk-IPFV.3sg.s herd.ABS.SG 'Next day, after it had dawned, at that place a herd was walking' (Bogoras 1904: 779)

The first verb of two continuous actions can also be expressed in a converb form. In the next example, the verb tawitkani- 'intend to steal; pilfer' occurs with a suffix -k that forms a converb, and the next action vannanta- 'lose one's tooth' is expressed in the form of a finite verb.

(13)qəčən ənan tawitkəni-k ya-vannənta-len. it.turns.out she.ERG pilfer-CVB RES-lose.one's.tooth-RES.3SG.S/P 'Indeed, when pilfering she lost a tooth.' (Bogoras 1917:34, Text 3-21)

#### 4. Functions of *tita* 'when' in modern Alutor

The word tita, has several functions in modern Alutor, and its most basic function is to clarify the time 'At what time?'. There are many examples indicating indefinite time in the past 'once upon a time' and examples with negation indicating 'never.' Furthermore, there are many examples where tita marks clauses indicating time.

## 4.1 tita as a question

Similar to Bogoras's texts (Bogoras 1904, 1917), a few examples of tita as a question 'when' are used in texts after the 1950s. This may be because questions frequently occur more in dialogues than in narratives. Another possible reason is that certain parts of data are collected through elicitation, which is often conducted through the translation of a single sentence. In the text by Kibrik et al. (2000), two examples of tita, as a question word, are found in 4,232 sentences from 41 narrative texts and examples of usage in the dictionary. Kilpalin (1993) contains one example in 1,069 sentences in nine texts. There are ten examples in my 126 written narrative texts of 9,230 sentences, and no example is found in the elicitation data. Examples of each resource are given below.

and

- (14)tita ta-jatə-ŋ yəninnə *qəliktumy-ən?* When 3sg.s/A-fut-come-fut your.3sg brother-ABS.SG 'When will your brother come?' (Kibrik et al. 2000) (15)jaqqe tita tə-ta-ləSu-yət tu manki? then when where
  - 1sg.s/A-fut-see-2sg.p 'Then, when will I see you and where?' (Kilpalin 1990: 118)

(16) čareq, tita t-awwav-əŋ? PSN.ABS.SG when FUT-leave-3SG.S.FUT 'Chareq, when are you leaving?' (Aleksei Uichan, pers. comm., 2000-04-15)

In my texts, four of ten examples were recorded during interviews of elder speakers by younger speakers, that is, these examples were stated in spontaneous speech, in the form of a dialogue.

- (17) yavanyət tita yan itə-lqivə-tkən?
  women.festival.ABS.SG when there be-INC-3SG.S.IPFV
  'When has there been a Women's Day?' (Vladimir Nutayulgin, pers. comm., 2001-04-06)
- (18) *anpaŋav* tita laśu-yalŋa-tak?
   old.woman.ABS.SG when see-each.other-2DU.S.PFV
   'When did you meet your wife (lit. old woman)?' (Egor Chechulin, pers. comm., 2000-04-15)
- (19) [В каком году?] tita?
  [in what year] when
  '[In what year?] (in Russian) When?' (Egor Chechulin, pers. comm., 2000-04-15)

## 4.2 tita indicating indefinite time in the past

In most cases, the question word, *tita* 'when' often expresses an indefinite time in the past and rarely in the future. There are no examples in early Koryak texts by Bogoras (1904, 1917), but it is very typical in texts and speeches by bilingual speakers. This extension of usage is possibly due to the influence of the Russian language.

The Russian word *koeda* 'when'can be followed by the particle, *-mo*, indicating the indefiniteness of pronouns and adverbs, *koeda-mo* 'sometime' and *kmo-mo* 'somebody.'

(20) Когда-то по берегам Дона росли вековые дубравы.

'Once upon a time, the banks of the Don were lined with centuries-old oak groves.'

(Kuznetsov 1998: 436)

Examples indicating indefinite time are given below. Kibrik et al.'s (2000) work contains eight examples, and there are 16 examples in my text data. The following example (21) is a fragment of a folk story, in which the action occurred at an uncertain time, long before the moment of utterance.

 (21) tita=qa qutkəniniaqu maŋki ana ya-la?u-lin ənnə?ən when=EMP PSN.ABS.SG there maybe RES-see-RES.3SG.S/P fish.ABS.SG
 'One day Qutkinnaqu found a fish somewhere.' (Kibrik et al. 2000: 20, Text1-2)

In addition to representing an uncertain time in the mythical age, as mentioned above, *tita* can also describe the past (a few decades ago). In the following example, the older speaker remembers an event in her childhood. Here, the verb, *vukki* 'tie up' is used in the resultative because she did not see the moment of the construction of the tent, but she saw how it stood and how the Koreans lived there.

(22)tita qun mil<sup>j</sup>utəna-k nanək nə-meŋə-qin when well PLN-LOC there ADJ-big-ADJ.3SG [prezentapulatka] ya-vu-lin kuraj-in. canvas.tent.ABS.SG(Russ) RES-tie.up-RES.3SG.S/P Korean-poss>3sg 'At one time, there in the village Ilpyr, a large canvas tent was built for the Koreans.' (Nagayama 2020: 24)

An example indicating indefinite time in the future is found in the text by Kibrik et al. (2000). This was taken from Vdovin's unpublished work. In this example, *tita* is used with the word, *avaqqa* 'later', indicating the time of an action that will occur sometime after the utterance.

(23)	ŋavaq	wuttaqu-wwi	ətgina	un <sup>i</sup> ı	un <sup>j</sup> u-wwi	a-nmə-ka		
	if	this-ABS.PL	their>31	PL chil	d-ABS.SG	NEG-kill-N	EG	
	<i>tə-ta-ntə-ŋə-naw,</i> 1sg.a-fut-aux-fut-3pl.p		to	tita	avaqqa	yəməkəŋ	Soro	
			and	when	later	I.dat	after.that	
	tanŋ-u ta-n?al-la-ŋ		jə-t.					
	enemy-E	ss FUT-becom	e-PLUR-F	ut-3nsc	a.s			
	'If I don't kill their children, then some time later they would become enemies to me.'							
	(Kibrik et al. 2000: 122, Text20-82)							

#### 4.3 tita with negation

Using *tita* with negative particles often indicates 'never.' It indicates negation for the past time and the future, as the Russian word *hukozda* 'never.'

(24) Никогда там не бывал.

'I've never been there.' (Ozhegov and Shvedova 1992: 409)

- (25) Никогда не забуду.'I will never forget.'
- (26) Никогда не забывай.'Never forget.'

This usage is not found in early Koryak texts but is frequently found in modern Alutor texts. Various particles, adverbs, and word forms for negation can occur with *tita*, for example, a particle *al~alla* and a circumfix *a-...-ka* 'no, not' which is used for verbal negation; *qatamma* 'never' (negative volition for the first person); *katval* 'never, do not' (prohibition for the second person); *aktaka* 'not able to'; and *in/as* 'enough.'

There are three examples from Kibrik et al. (2000), one from Kilpalin (1993), and 14 from my published and unpublished texts.

The following examples include the negative particle, *alla*. In (27) below, *tita* is placed immediately after *alla*, indicating that the action did not occur in the past. In (28), the negative particle modifies both  $at^{2}u$  'more, also' and *tita* 'someday,' indicating that the action will not occur in the future. The next example (29) is a sentence from a folk story in which the dragon describes his constant act of 'not eating orphans.'

- (27)inmə?ak, <u>allə</u> tita semək aŋqa-k it-ka. үәттә true not when I.ABS close sea-LOC be-NEG.PRED 'It's true that I had never been by the sea.' (Kibrik et al. 2000: 162, Text 32-8)
- (28)to təŋakjav allə at?u tita taqin iv-ka g-il-lin PSN.ABS.SG when about.what say-NEG.PRED RES-be-RES.3SG.S and not also 'And Tengakyav didn't say any more.' (Kibrik et al. 2000: 125, Text 22-69)
- (29) jewal<sup>j</sup>-pil<sup>j</sup>ŋaq <u>allə</u> a-nu-ka yəmnan tita.
   orphan-DIM.ABS.PL no NEG.PRED-eat-NEG.PRED I.ERG.SG when
   'I never eat orphans.' (Kilpalin 1993: 123)

The particle, *qətəm~qətəmmə* denotes the negative volition in the future, that is, the intention to not perform a certain action. When it is used with *tita*, it denotes the intention to not perform a certain action at a point in the future.

(30) at?u <u>qətəm</u> yəmnan tita mə-nawəjal-la-tək.
more NEG.FUT I.ERG.SG when OPT.1SG.S/A-feed.smb.-PLUR-2NSG.S/P
'I will never feed you again.' (Nagayama 2020: 27)

Although the word, *inias* literally means 'enough', it is frequently used with a verb in the optative and denotes the negative volition like the word *qətəm~qətəmmə*.

(31) <u>in/as</u> yəmnə tita mə-vitat-ək.
enough I.ABS.SG when OPT.ISG.S/A-EP-work-1SG.S
'There's no way I'm going to work.' (Nagayama 2020: 88)

The following example begins with a Russian word, and the sentence structure is extremely similar to Russian. The particle, *kətvəl* indicating prohibition shows a restriction on the following words: *miknaŋ* 'to someone' and *tita* 'when.' Such examples are comparatively rare, along with (32) told by the same bilingual speaker, Nikolai Kamak (born in 1948).

(32)	[Только]	<u>qətvəl</u>	mik-naŋ		tita	a-paninal?at-	ka.		
	just(Russ)	never	somebody	y-DAT	when	NEG.PRED-tel	l-neg.pre	D	
	'Just never tell anyone' (Nikolai Kamak, pers. comm., 2008-03-19)								
(33)	<u>aktəka</u>	am-pəlw	ənt-a	mən-ju	nal-la-mək		maŋki	tita.	
	impossible	ONLY-mo	oney-INS	OPT:1N	sg.s-live-p	LUR-1NSG.S	where	when	
	'Nowhere, never, we cannot live on money alone.' (Nikolai Kamak, pers. comm., 1998)								

# 4.4 tita as a temporal clause marker

The most frequent usage of *tita* in modern Alutor is as a temporal clause marker. There are 33 examples in the text by Kibrik et al. (2000), 2 examples in the text by Kilpalin (1993), and 9 in my text data. There are 50 such usages, constituting 44% of the total. They do not appear in early Koryak texts. Similar to the Russian conjunction,  $\kappa or \partial a$  'when', it marks clauses indicating time. The following are Russian examples.

- (34) Когда началась война, моему отцу было двадцать лет. (= 4)
   'When the war started, my father was twenty years old.' (Kuznetsov 1998: 436)
- (35) Позвони мне, когда приедешь домой.'Call me when you get home.'

Such usage is notably typical in the speech of bilingual speakers who speak Russian fluently, but it is also found in the speech of older speakers. In the following example, the action described by the verb, *jatti* '(the person) arrived,' in the temporal clause marked by *tita* precedes the action described by the main verb, *t-iva-lqi* 'I thought.'

(36)	tita	jat-ti		ənŋin	Sujamtawil?-	-ən	t-ivə-lqi:	
	when	come-3so	G.S.PFV	that.3sg	person-ABS.S	SG	1sg.s/A-think-INCH	
	tok,	yemat jəl?alŋə		ətumy-ən,	japlu,	yən	nnin.	
	well	possibly	male.co	ouisin-ABS.SG	after.all	my	>3sg	
	'When the man arrived, I thought: Oh, he is possibly my cousin.' (Nagayama 2020:22)							

Similar to Russian, a temporal clause may occur after the main clause. In the example below, the temporal clause, 'when they lost female reindeer,' is placed after the main clause 'They were very frightened.'

(37)	ayi	saŋitat-yə?ət,	tita	na-ntəmŋiv-na			
	very	frighten-3DU.S	when	INV-lose-3pl.p			
	winqura-l <sup>-</sup>	wən.		(=2)			
	female.domestic.reindeer-group(ABS)						

'They were very frightened when they lost a group of female reindeer.' (Kilpalin 1993: 111)

In the following example, the event, 'she gave birth to a child,' in the main clause occurred at the same time as the action, 'Amamqut went home,' in the temporal clause.

(38)	tu	leqtəŋ	tita	amamqı	ıtikal	ya-retə-lin,	awən		
	and	one's.way.back	when	PSN.ABS	.SG	RES-go.home-RES.3SG.S/P	already		
	ən	juŋjuŋawət-nak	nika	ya-jtu-l		-lin			
	PRTCL	PSN-ERG	dummy.	ABS.SG RES-giv		ve.birth.to-RES.3SG.S/P			
unʲunʲu-pilʲ.									
	child-D	IM.ABS.SG							
	'And when Amamqut was on his way back home, the Yungyunaut gave birth to a little baby.'								
	(Nagayama 2015: 63)								

The word *tita* can also mark clauses expressing actions or events that will take place in the future. In the following example, the forthcoming event that the salmon running starts is expressed by a temporal clause with *tita*.

(39) tita ənnəru?ə-tkən, mətə-ŋvu-la-tkət ənnəŋərtə-k
 when fish.come-IPF.3NSG.S 1NSG.S-begin-PLUR-3NSG.S.IPF catch.fish-INF
 'When the fish come, we begin to fish.' (Kibrik et al. 2000: 179, Text 33-25)

## 4.3 Traditional ways of marking temporal clauses in Alutor

In Alutor, there are 'traditional' ways to indicate a time when an action or event occurs. These usages are frequently observed in the narratives of speakers born before the 1930s. One is the use of the word, *kitkit*, the Alutor equivalent of *kikič* ~ *kičič* in Bogoras's text (7, 8). This word originally denotes quantity or degree and is translated as 'a little bit,' but it can also denote time. The following is a sentence from a folk story told by Maria Chechulina (born in 1935).

(40)	kitkit	jəlqə-lqiv-la-t	lqiv-la-t ənŋina		tiniSaŋawət		
	as.soon.as	sleep-inch-plur-3nsg.s/p	those.3PL	in.a.hurry	PSN.ABS.SG		
	ŋəvu-jji	waŋil?atə-k.					
	begin-3sg.s	S.PFV Sew-INF					
'As soon as they fell asleep, Tinianawt began sewing.' (Nagayama 2003: 2							

In addition, there are other ways to use the converb expressed with the suffix -k or the adverb, *maŋinias* 'how much, to what degree.' In (41), the action expressed in the converb form (Egor calls) precedes the action in the main clause (call me). A temporal clause with a converb can also be used for a past event.

(41)	zvonitə-k	jəyor,	nural	q-in-iv-i.					
	call(Russ)-CVB	PSN.ABS.SG	immediately	OPT.2S/A-1SG.P-say-2SG.A.PFV					
	'(When) Egor calls, tell me right away.' (Nagayama 2011: 275)								
(10)		<b>,</b>	. ,						

(42) tojusav-fanqavo-k unjunju-wwi nuta-ŋ ujisvo-sqiv-la-t.
 study-finish-INF child-ABS.PL tundra-DAT play-PURPOSE-PLUR-3NSG.S
 'Finishing study, children went to tundra for playing.' (Nagayama 2011: 275)

Temporal clauses marked by maninias occur frequently. A larger part of the 67 examples in published

texts and my database is used in temporal clauses. It is often used in folk stories, including those from the mythological period.

- (43)
   mayinjas
   ya-mal-itil-laŋ,
   y-ar?a-pal-laŋ.

   how.many
   RES-good-come.to.a.boil-RES.3PL.S/P
   RES-boiled.fish-boil-RES.3PL.S/P

   'When water (in the pot) came to a boil, (they) boiled fish.' (Nagayama 2015: 66)
- (44)əjo ənkəjap, manin<sup>j</sup>as nutalqən yanvulin long.time.ago long.time.ago how.many earth.ABS.SG RES-begin-RES.3SG.S/P tuŋvatək, nanək ninvit?armas?ə-nti itənvə-nti RES-form-RES.3SG.S/P. there master.of.devils-ABS.DU master.of.our.being-ABS.DU ya-tvaya-linat, naqam kusəratku-tkə-t. RES-sit-RES.3DU.S/P just play.cards-IPFV-3NSG.S

'A long time ago, when the earth had just begun to form, the Master of devils and the Master of our being sat together and played cards.' (Nagayama 2015: 7)

There are no examples of the Koryak equivalent for *maŋin/as* used in temporal clauses in Bogoras's text; however, this may be due to a limited amount of data.

Research is still ongoing on examples of traditional markings for temporal clauses and their frequency. Further investigation is required to determine whether these usages are decreasing or not in parallel with the expansion of the usage of *tita* and should clarify if there are differences in frequency depending on the age of the materials.

# 4.4 Statistics of tita 'when'

Table 1 summarizes the usage of *tita* in Bogoras's texts and Table 2 summarizes the results of the analysis in subsection 4.1 through 4.3 based on texts collected in the late 20<sup>th</sup> century. The number of usages of *tita* is 101, which is not large. However, in terms of the proportion of usage, the late 20th-century sources contain an increasing number of usages, which are not found in Bogoras's texts. Notably, the large number of usages marking time clauses accounts for 44% of the total. New features, such as once and never, also appear, accounting for 26% and 18% of the total, respectively. As previously mentioned, this can be attributed to the influence of contact with the Russian language.

Oppositely, its original function as an interrogative is less common, accounting for 13% of the total. This is because, as previously mentioned, most of the texts are monologues. In conversation, its use as an interrogative is still frequently observed.

Resource	Number of texts	Number of sentences	Question	Clause marker	Uncertain time	Negation
Bogoras	24	1,312	2	0	0	0

 Table 1. Frequency of occurrence of *tita* in Bogoras's texts

Table 2. Frequency of occurrence of tita by usage in modern Alutor

Resources	Number of texts	Number of sentences	Question	Clause marker	Uncertain time	Negation
Kibrik et al.	41	1,491	0	22	10	2
Kibrik et al. Dictionary	_	2,741	2	11	0	1
Kilpalin	9	1,069	1	2	0	1
Nagayama	126	9,230	10	9	16	14
Nagayama (Elicitation)	_	485	0	0	0	0
Total	176	15,016	13	44	24	18
(%)			13%	44%	26%	18%

# 5. Final remarks

This study analyzed and compared the usage of the question word, *tita* 'when' in texts in the Kamenskoe dialect of Koryak collected in the early 20<sup>th</sup> century and Alutor texts collected or written in the late 20<sup>th</sup> century. The results indicated that the function of the question word *tita* was significantly extended during the second half of the 20<sup>th</sup> century. The examples from Bogoras's text are too few (only two) to be statistically significant, perhaps. However, it is important to note that many new uses of *tita* not found in Bogoras's texts were observed in the texts of the late 20<sup>th</sup> century. In particular, the number of examples of time-clause markers was remarkably high. This most likely originated from contact with the Russian language.

Unfortunately, it is highly unlikely that any new Koryak texts from the early 20<sup>th</sup> century or earlier will be found in the future for the further study of the diachronic change of the word, *tita*. However, a more detailed analysis of the materials analyzed in this study may lead to further discoveries. Specifically, the genres of the text (folk story, narrative, or conversation) or the types of the example (spontaneous speech, elicitation, written texts, or translation from other languages) can be explored.

In addition, there are unpublished materials in Russia, collected in the 1920s and 1950s that have

not yet been studied and that need to be analyzed. Furthermore, since Bogoras collected Chukchi texts at the end of the 19<sup>th</sup> century, which have genetic relation with Koryak and Alutor, it would be meaningful to compare them with Koryak and Alutor texts. Although only Alutor texts were included herein, future studies can conduct comparable investigations of texts in standard Koryak and Chukchi.

# NOTE

<sup>1</sup>This paper is based on my presentation "On the contact of Chukchi-Kamchatkan (Koryak) languages with Russian" at the 4<sup>th</sup> panel session, "Language contact between Siberian indigenous languages and the Russian language" of Slavic Linguistics Society 17 (2022, September 19–21, Slavic Eurasian Research Center, Hokkaido University). I would like to express my gratitude to the symposium participants for their helpful comments on my presentation and to the language consultants for their expertise during my investigation. In addition, this research was primarily supported by the following grants: MEXT Grant-in-aid for scientific research on priority research (A) "Endangered Languages of the North Pacific Rim [ELPR]" (No. 11171101, 1999-2003, headed by O. Miyaoka), JSPS Grant-in-aid for scientific research (KAKENHI) (B) "A Study of Digital Archive Environment and Language Documentation for Minority Languages in North-East Eurasia" (No. 23401025, 2011-2014, headed by I. Nagasaki), KAKENHI (C) "A Study of Constructing Lexical Databases and Dictionaries of Endangered Paleosiberian Languages" (No. 20419211, 2013-2016, headed by Y. Nagayama), KAKENHI (C) "Development of and Linguistic Research with Corpora of Siberian Indigenous Languages" (No. 19K00564, 2019-2023, headed by I. Nagasaki), and KAKENHI (B) "Basic Research on Dialects and Lexicon of Siberian Indigenous Languages" (No. 2010260, 2020-2024, headed by Y. Nagayama), KAKENHI (A) "A comprehensive study of minority languages in Siberia: focusing on the typological diversity in the early stages" (No. 21H04346, 2021-2025, headed by F. Ebata).

<sup>2</sup>Fond 36, Opisi No.1, Museum of Anthropology and Ethnography, Russian Academy of Sciences.

А	agent	INS	instrumental	PRED	predicative
ABS	absolutive	INV	inverse	PRES	present
ADJ	adjective	IPFV	imperfective	PROL	prolative
AUX	auxiliary verb	LOC	locative	PSN	person name
CVB	converb	NEG	negative	RES	resultative
DAT	dative	NSG	non-singular	S	subject
DIM	diminutive	OPT	optative	SG	singular number
DU	dual	Р	patient	STAT	state
EMP	emphasize	PFV	perfective	1	first person
ERG	ergative	PL	plural	2	second person
ESS	essive	PLN	place name	3	third person
FUT	future	PLUR	pluralizer	-	morpheme boundary
INCH	inchoative	POSS	possessive		

# Abbreviations

#### References

- Bogoras, W. (1904) The Chukchee (The Jesup North Pacific expedition / edited by Franz Boas, v. 7. Memoir of the American Museum of Natural History, New York). Leyden: Brill; New York: G.E. Stechert. Reprint, New York: AMS Press, 1975.
- Bogoras, W. (1917) Koryak Texts. (Publications of the American Ethnological Society 5). Leyden: Brill; New York: G.E. Stechert. Reprint, New York: AMS Press, 1974.
- Kibrik, A. E., Kodzasov S. V., Muravyova I. A. (2000) Iazyk i folklor aliutortsev. Moscow: Nasledie.
- Kilpalin, K. V. (1993) Ania: Skazki Severa, RIO KOT: Petropavlovsk-Kamchatsky.
- Krasheninnikov, S. P. (1775) Opisanie zemli Kamchatki: v dvukh tomakh. St.-Petersburg: Nauka. Reprint, Petropavlovsk-Kamchatsky: Kamshat, 1994.
- Kuznetsov, S. A. (1998) Bolshoi tolkovyi slovar russkogo iazyka. St. Petersburg: Norint.
- Nagayama, Y. (2003) *Ocherk grammatiki aliutorskogo iazyka*. (Endangered Languages of the North Pacific Rim Publication series A2-038) Osaka Gakuin University: Osaka.
- Nagayama, Y. (2007) Koryak Text in Mikino Dialect: Disobedient Children. In: Languages of the North Pacific Rim, vol.14: Sapporo: Graduate School of Letters, Hokkaido University: 19–34.
- Nagayama, Y. (2011) Alutor. In: Y. Yamakoshi (ed.) Grammatical sketches from the field. Tokyo: Research Institute for Languages and Cultures of Asia and Africa, Tokyo University of Foreign Studies: 257–302.
- Nagayama, Y. (2013) Personal Experience of Cultural Succession in Northern Kamchatka: The Case of an Alutor, Journal of the Center for Northern Humanities 6: 137–156.
- Nagayama, Y. (ed.) (2015) Materials of the Language of Nymylan-Alutor (Materials of Siberian Languages 2). The working group of the Grant-in-Aid for Scientific Research (B) "A Study of Digital Archive Environment and Language Documentation for Minority Languages in Northeast Eurasia."
- Nagayama, Y. (ed.) (2020) Materials of the Language of Nymylan-Alutor 2 (Materials of Siberian Languages 7). Kushiro: The working group of the Grant-in-Aid for Scientific Research (B) "Typological Study for Syntactic Structures of Indigenous Languages of Siberia."
- Ozhegov, S. I., Shvedova N. Iu. (1992) Tolkovyi slovar russkogo iazyka. Russkii iazyk: Moscow.