GRAMMATICALIZATION OF DEVERBAL MARKERS: 
TOWARD A CROSS-LINGUISTIC STUDY IN THE 
SEMANTIC EXTENSION OF MOTION VERBS¹

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0 Introduction
The development of serial verbs into other grammatical categories has been widely studied, e.g. Matisoff (1991), Heine et al. (1991), Lord (1993), Bisang (1996). In this paper we will take a close look at some motion verbs in Thai, namely, paj ‘to go’, and maa ‘to come’, caak ‘to leave’, thut ‘to arrive’, lorn ‘to pass, exceed’, and examine directions of their semantic extensions. The presentation is mainly data-oriented, but the cognitive basis of semantic extension will also be discussed.

1 Background and Proposed Patterns
Concerning the functions of serial verbs, Thepkanjana (1986) has stated the following characterizations: (a) complementing the initial verb, which results in the semantic implications of causative, passive, or resultative; (b) indicating direction and aspect; (c) acting as grammatical markers and/or case markers, i.e. coverbs; and (d) indicating purposive and simultaneous actions (for the functional extensions of Thai verbs, also cf. Kolver 1984, Areemit 1986, Bilmes 1995). However, she did not fully discuss the pathways of semantic extension of the verbs we are going to discuss. We start from Bisang (1996: 575), who proposes two pathways of grammaticalization in the domain of verb (a list of abbreviations is given at the end of this paper; CV=causative verb).

(1)          -->  TAM  -->  CONJV
            (XXI) V  -->  RES  -->  Vd  -->  TAM
(XXII) V  -->  CV  -->  CONJV
           -->  COV  -->  CONJV

These pathways are found across Mainland Southeast Asian languages, but it is also known that they are not strictly unidirectional processes. Rather, the Thai verbs in question still maintain their original meanings and verbal functions while developing into

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grammatical units. Keeping this in mind, we propose two directions of change in (2), which show mapping from prototypical meanings to extended grammatical meanings. Note that the extended meanings are in the hierarchical relations to each other.

(2)  
Type I:  
V --> Vd --> TAM --> COV --> CONJV --> CONV --> LEX  
Type II:  
V --> COV --> CLM (LEX)  

We divide the five motion verbs we take up into two groups based on our proposed patterns in (2). In the next section, we will illustrate them with examples taken from narrative data. They are natural spoken discourse by Thai native speakers based on the animated film ‘Pingu: The Most Cheerful Penguin in the World’. Also, some examples are taken from two Thai narrative stories as supplementary data.\(^2\)

2 Two Directions of Grammaticalization  
The two directions of grammaticalization in the domain of motion verbs we wish to propose are based on the idea that synchronically observed polyfunctionality patterns should reflect processes of semantic extension (which we call “motivation approach”, cf. Ohori 1998). Below are relevant examples:

2.1 Type I: V --> Vd --> TAM --> COV --> CONJV --> CONV --> LEX  
The first array of functional extensions is summarized in Table 1. Type I features various uses of *paj* and *maa* where the function of a lexical word extends into a grammatical word with such functions as directional verb, tense-aspect-modality marker, coverb, conjunctural verb, and converb. Then through the process of lexicalization, it shifts into a particular meaning which functions as an eventual marker.

**Table 1: The Chains of Polyfunctionality with *paj* and *maa***

<table>
<thead>
<tr>
<th>Categories</th>
<th><em>paj</em> ‘to go’</th>
<th><em>maa</em> ‘to come’</th>
</tr>
</thead>
<tbody>
<tr>
<td>V</td>
<td>to move away from the</td>
<td>to move towards the</td>
</tr>
<tr>
<td></td>
<td>speaker’s viewpoint</td>
<td>speaker’s viewpoint</td>
</tr>
<tr>
<td>Vd</td>
<td>away from the speaker’s</td>
<td>towards the speaker’s</td>
</tr>
<tr>
<td></td>
<td>viewpoint</td>
<td>viewpoint</td>
</tr>
<tr>
<td>TAM</td>
<td>pass away</td>
<td>up to the present</td>
</tr>
<tr>
<td></td>
<td>progression</td>
<td>continuity</td>
</tr>
<tr>
<td></td>
<td>imperative sense</td>
<td>imperative sense</td>
</tr>
<tr>
<td></td>
<td>1PL ‘let’s’</td>
<td>1PL ‘let’s’</td>
</tr>
<tr>
<td></td>
<td>2SG/PL direction</td>
<td>2SG/PL direction</td>
</tr>
<tr>
<td>COV(+NP)</td>
<td>‘to’ indicating what is</td>
<td>the same as <em>paj</em></td>
</tr>
</tbody>
</table>

\(^2\) The two Thai narrative stories are:  
(a) ‘taam sadet klaj baan’ or Retour the route to Europe as visited by King Rama V, Amporn Jirattikorn, Bangkok, Matichon Publisher, 2540 (1997)  
(b) ‘phuuuan’ or Friends, prabhatson sewikun, Bangkok, dok-yaa Publisher, 4th edition, 2540 (1997)
reached or approached

CONJV purposive the same as *paj*
sequential

CONV V *paj* V *paj* not applicable
indicating two on-going actions

LEX V *paj* V *maa* --> indicating repetition of the action --> shifting to a particular meaning which denotes the eventuality and functions as an eventual marker (showing adverb-like function)

<table>
<thead>
<tr>
<th>(3) <em>paj</em></th>
</tr>
</thead>
<tbody>
<tr>
<td>V</td>
</tr>
<tr>
<td>a. khòphkhun màak phôm <em>paj</em> kòndn</td>
</tr>
<tr>
<td>thank you very much I (MASC) GO:V before</td>
</tr>
<tr>
<td>nà? kràp</td>
</tr>
<tr>
<td>SFM POLITE</td>
</tr>
<tr>
<td>‘Thank you very much. I have to go now.’</td>
</tr>
<tr>
<td>Vd</td>
</tr>
<tr>
<td>b. pingu khò? pràtuu hàənəám lèu wàəd dàon</td>
</tr>
<tr>
<td>Pingu knock door toilet CONJ open walk</td>
</tr>
<tr>
<td>khàw <em>paj</em></td>
</tr>
<tr>
<td>enter GO:Vd</td>
</tr>
<tr>
<td>‘Pingu knocked on the door, opened it and walked into the toilet.’</td>
</tr>
<tr>
<td>TAM</td>
</tr>
<tr>
<td>c. pingu kò? nòn kòt tükka thíi mèe</td>
</tr>
<tr>
<td>Pingu CONJ lie hold teddy bear REL M mother</td>
</tr>
<tr>
<td>hàj maa con lâp <em>paj</em></td>
</tr>
<tr>
<td>give come CONJ sleep GONE:pass away</td>
</tr>
<tr>
<td>‘Pingu held the teddy bear that his mother had prepared for him until he fell asleep.’</td>
</tr>
<tr>
<td>d. lèu w lòok pengûin kò? dàon <em>paj</em> dàon</td>
</tr>
<tr>
<td>then child penguin CONJ walk go walk</td>
</tr>
<tr>
<td><em>paj</em> rùtuay rùtuay</td>
</tr>
<tr>
<td>GO:progression continuously</td>
</tr>
<tr>
<td>‘Then little penguin (Pingu) kept on walking continuously.’</td>
</tr>
<tr>
<td>e. <em>paj</em> raw kláp kanthò nawa</td>
</tr>
<tr>
<td>let’s we return together Nawa</td>
</tr>
<tr>
<td>‘Nawa, let’s go back.’</td>
</tr>
<tr>
<td>f. <em>paj</em> khàw hàənəám dàj lèu</td>
</tr>
<tr>
<td>direction enter toilet possibility now</td>
</tr>
<tr>
<td>‘Go to the toilet now.’</td>
</tr>
</tbody>
</table>

---

3 The Term CONV (converb) is defined here as a nonfinite verb form whose main function is to mark adverbial subordination (cf. Haspelmath 1995:3).
COV
g. wanníi pen wan thîi pingu cà dàoíthaŋ
today COPULA day REL M Pingu will travel
paj bään páa khondiaw
TO:COV house aunt alone
‘Today is the day that Pingu will travel to his aunt’s house alone.’

CONJV
h. pingu dàoñ paj cào bään láŋ núŋ
Pingu walk GO:CONJV find house CLF one
‘Pingu walked and then found a house.’ (sequential)
i. phrî? wan níi pingu cà dàoíthaŋ paj hâa khun pâa
because day this Pingu will travel GO:CONJV see HO aunt
‘Because Pingu will go to see his aunt today.’ (purposive)

CONV
j. raw dàoñ paj khui paj kantò
we walk GO talk GO together
‘Let’s walk along and talk together.’

LEX
k. pingu tham taa klîñ klîñ paj maa
Pingu make eyes roll roll GO COME
‘Pingu rolled his eyes round repetitively.’
l. têe kòn méê kô? màjdaí sôncæi
from before mother CONJ NEG be interested in
duǒdaaw rôk têê... (omitted) kruu hâj
4
stars PRT but teacher give
tham raayŋaan... (omitted) paj paj maa maa
do report GO GO COME COME
kô?lôaj hànn maa chôop duu daaw paj dùay
CONJ turn come like look star go too
‘I hadn’t been interested in the stars before, but after my teacher ordered me to
write a report (about the astronomer), at last I began to like the star too.’

(4) maa

V
a. khâw maa roonrían sàay thûk wan
s/he COME:V school late every day
‘S/he comes to school late everyday.’

Vd
b. mii rôt khôn khôn kháp phàaan maa
there is car carry thing drive pass COME:Vd
‘There is a freight car coming by.’

TAM

4 rôk is a particle used after a negative statement to make the sense milder.
Grammaticalization of motion verbs

The examples in (3) and (4) above illustrate various functions of the two motion verbs. Although the surface forms of these verbs are the same, their functions differ according to the environment in which they occur. Let us take pajaŋ for instance. We can see that the positions of pajaŋ in the serial verb constructions (henceforth SVCs) are different. That is, the verb can develop into a Vd when modifying the preceding verb as path or direction markers (cf. (3 and 4b)). In (3 and 4g), it can take a prepositional argument and function as a COV. Further, it functions as a CONJ, i.e., it links the following action to the preceding one, expressing such relations as purpose and temporal sequence, while conjunctions express the simultaneity of two actions. Moreover, we can see that both pajaŋ and maa can denote the sense of repetition that leads to a particular meaning, functioning as a near-lexicalized eventual marker.

2.2. Type II: V --> COV --> CLM (LEX)

This type of grammaticalization pattern has three typical examples, namely cāak ‘to leave’, thūŋ ‘to arrive’, and lāj ‘to pass, exceed’. These tend to be natural choices, since there are corresponding usages of motion verbs in other languages, for example, Vietnamese (cf. đēn ‘to arrive’).5

5 The similar phenomenon can be seen in Vietnamese too. The examples of đēn ‘to arrive’ are cited below (based on Nguyen 1979):

COV --> ALLATIVE: Xe chay đēn ga mới dō khách.
  ‘The bus will not discharge its passengers until it arrives at the station’

TEMPORAL: đōc báo đēn hai giō sáng
  ‘to read newspaper until 2 am.’
Table 2: the chain of polyfunctionality with câak

<table>
<thead>
<tr>
<th>Categories</th>
<th>câak ‘to leave’</th>
</tr>
</thead>
<tbody>
<tr>
<td>V</td>
<td>to depart from a reference point</td>
</tr>
<tr>
<td>COV</td>
<td>ablative</td>
</tr>
<tr>
<td></td>
<td>‘since’</td>
</tr>
<tr>
<td></td>
<td>agent</td>
</tr>
<tr>
<td></td>
<td>instrument</td>
</tr>
<tr>
<td></td>
<td>(tool, force, material, means)</td>
</tr>
<tr>
<td>CLM (LEX)</td>
<td>cause and reason</td>
</tr>
<tr>
<td></td>
<td>mūaان câak ‘because’</td>
</tr>
<tr>
<td></td>
<td>nôk câak ‘except for’</td>
</tr>
<tr>
<td></td>
<td>lâŋ câak ‘after’</td>
</tr>
<tr>
<td></td>
<td>câak nán ‘after that’</td>
</tr>
</tbody>
</table>

(5) câak

V

a. khâw câak bâan kòt paj tâŋtēe jaŋ dēk
s/he LEAVE:V home to be born go since still child
‘S/he left his (her) hometown when s/he was still a child.’

COV

b. tɔɔnnən kâ? mii khôŋ tôk câak rôt praŋsanii
at that time CONJ there is thing fall FROM:COV car post
‘At that time there was something falling from the post-car.’
c. câak wannii paj tūkuǎan cä klâp kuuun
FROM:COV today go everything will be back return
maa mūuun dɔɔm
come like before
‘From now on, everything will be alright as before.’
d. lēew pingu kɔ? dâj khôŋ kin câak
then Pingu CONJ there fall HO aunt side house
khun pâa khâŋ bâan
‘Then Pingu received some food from the neighbouring aunt.’
e. lūuk sâap câak kaan ǎan nǎŋsūuuphim
I know BY MEANS:COV NOM read newspaper
‘I know it by reading the newspaper.’

FOCUS PARTICLE: tiâu dēn 20 dōng
‘to spend as much as twenty dong’

DEGREE MARKER: đóc dēn râc dâu
‘to read so much as to have a headache’

EVEN: đēn (câ) õng, nòi cùŋ khōng sō.
‘He is not afraid even of you.’

TERMINAL: biêt dēn ‘to know about/of’; nghi dēn ‘to think about/of’;
ñoi dēn ‘to remember’
f. lúuk súuu khɔ̄ŋ phʊuaŋ ní ciak ɲən sínəɔ̄t
I buy thing NUMBER this INSTRUMENT:COV money betrothal
‘I bought these things with the betrothal money.’
g. phr5? nùuuay ciak kaan dɔ̄nθaŋ
because be tired CAUSE:COV NOM travel
‘Because (Pingu) is tired due to his travelling.’

CLM
c. nùan ciak sòŋ sìŋ daŋ kɔ̄ŋlɔɔŋ tham hàj
BECAUSE (OF) send noise loud CONJ make/do give
nɔŋ tʊtʊn
brother awake
‘Because of a loud noise, his brother was awoken.’

Next, we will list up the interconnection between various functions of thʊŋ ‘to arrive’ as shown below.

**Table 3: The Chain of Polyfunctionality with thʊŋ**

<table>
<thead>
<tr>
<th>Categories</th>
<th>thʊŋ ‘to arrive’</th>
</tr>
</thead>
<tbody>
<tr>
<td>V</td>
<td>to get to a place</td>
</tr>
<tr>
<td>COMPLEMENT V</td>
<td>indicating the achievement</td>
</tr>
<tr>
<td>COV</td>
<td>allative ‘until’ recipient terminal</td>
</tr>
<tr>
<td>FOCUS MARKER</td>
<td>to emphasize the amount</td>
</tr>
<tr>
<td>DEGREE MARKER</td>
<td>to indicate degree of an action or state by preceding the modificational phrase thʊŋ kàŋ; thʊŋ khanàat</td>
</tr>
<tr>
<td>PREVERB</td>
<td>a colloquialism of cув, introducing the resultant statement. It can be used as a clause-linkage marker, too.</td>
</tr>
<tr>
<td>CLM (LEX)</td>
<td>‘even’ 6</td>
</tr>
<tr>
<td></td>
<td>concessive thʊŋ mée wàa; thʊŋ jàŋ raj thʊŋ krànánk3? təam</td>
</tr>
</tbody>
</table>

(6) thʊŋ

---

6 The difference between EVEN and CONCESSIVE of thʊŋ can be briefed as follows:

<table>
<thead>
<tr>
<th>Subordinate clause &amp; Main clause</th>
</tr>
</thead>
<tbody>
<tr>
<td>EVEN: thʊŋ (pen) [NORM]</td>
</tr>
<tr>
<td>CONCESSIVE: thʊŋ [EXPECTATION]</td>
</tr>
</tbody>
</table>
V
a. pingu troŋ paj rûwaâyûway naj thîisût kô?
Pingu walk-straight go keep on in the end CONJ
thûn bâan khun pâa
ARRIVE;V house HO aunt
‘Pingu kept on going straight ahead, and at last (he) arrived at his aunt’s house.’

COMPLEMENT V
b. lôn ùthaan jàaaŋ khîít máj thûn
she exclaim like think NEG ARRIVE;COMP
‘She exclaimed surprisingly.’

COV
c. khun luŋ khàp maa thûn thanŋ yêek
HO uncle drive come ALLATIVE;COV way separate
‘The uncle drove along until the crossroad.’
d. thûk thií hên yuū thûn hâathûm sɔŋyaam
every time see be UNTIL;COV 11 pm 12 pm
‘I usually see him here until 11 or 12 pm.’
e. fâak khwaam khîthûn thûn khun pàa dúaj
deposit NOM regards RECIPIENT;COV HO aunt too
‘(Please) give my regards to your aunt.’
f. mûuua thorasâp paj thûn bâan lêew
when telephone go TERMINAL;COV house finish
‘When (Pingu’s aunt) telephoned (Pingu’s) house,...’

FOCUS MARKER
g. kaan dàŋthaan kin weelaa thûn cêt dwaaN
NOM travel eat time EMPHASIS 7 months
‘The travel took times as much as 7 months.’

DEGREE MARKER
h. khàw króot màak thûnkâp phûut máj ɔɔk
he be angry much DEGREE speak NEG come out
‘He was so angry that he could not speak.’

PREVERB
i. thammaj thûn dâj khît wâa phûuaak phûi
why PREVERB possibility think say NUMBER this
pen nàkmuay là? khrâp
be boxer particle POLITE
‘Why do you think we are the boxers?’
j. phôm paj thií bòrisât koon lêew thûn
I (MASC) go to company first then PREVERB
maa thîinìi
come here
‘I went to the company first, then came here.’

CLM
k. thûn pen khon këe khàw kô? màj lûk
EVEN IF: CLM be person old s/he CONJ NEG get up hāj nāŋ ('even')
give sit
‘He never offer the seat to anyone, even to old people.’
1. thūn jaŋ dēk khāw kōŋ mī khwaam
THOUGH: CLM still child s/he CONJ have NOM
ráphítchâŋ (concessive)
responsibility
‘Though he is still a child, he has a sense of responsibility.’

The last member of this type is łąŋj ‘to pass, exceed’. This item also shows its polyfunctionality in line with the other two items illustrated above.

**Table 4: The Chain of Polyfunctionality with łąŋj**

<table>
<thead>
<tr>
<th>Categories</th>
<th>łąŋj ‘to pass, exceed’</th>
</tr>
</thead>
<tbody>
<tr>
<td>V</td>
<td>to pass or exceed the reference point</td>
</tr>
<tr>
<td>Vd</td>
<td>past, through</td>
</tr>
<tr>
<td>COV</td>
<td>excessive</td>
</tr>
<tr>
<td>POSTVERB</td>
<td>past the reference time</td>
</tr>
<tr>
<td>EMPHASIS MARKER</td>
<td>manner adverbial ‘immediately’</td>
</tr>
<tr>
<td>CLM</td>
<td>to emphasize the degree of an action or state determined by the speaker’s attitude.</td>
</tr>
<tr>
<td></td>
<td>showing the resultant state or the following action</td>
</tr>
</tbody>
</table>

(7) łąŋj

V

a. thāā łąŋj baŋpuu paj lēew cā hāa
if PASS:V Bangpuu go PERFECT will find ráān aahāan jāak dúay
shop food difficult too
‘If (we) go beyond Bangpuu, it’s difficult to find the food shop.’

Vd

b. phōm mācoh łąŋj paj thī koosōn
I (MASC) look PAST:Vd go at Koson ‘I looked at Koson.’

COV

c. rōtmee lēen łąŋj pāaj
bus run PAST:COV bus stop
‘The bus ran past the bus stop.’

**POSTVERB**
d. pâa bôok pingu wâa “kin lôôj câ”
aunt tell Pingu say eat IMMEDIATELY POLITE
‘His aunt told Pingu that “Please have it (at once).”’

**EMPHASIS MARKER**
e. Hûh! jän cháaw yûu lôôj
interjection still morning be EMPHASIS MARKER
‘Huh! It’s too early to get up.’

**CLM**
f. pingu thânj nûuay lé? hîw lôôj kin môt
Pingu both be tired and be hungry PASS:CLM eat all
‘Pingu was tired and hungry, so he ate everything.’
g. pingu kô? lâp paj lêew pâa lôôj pit
Pingu CONJ sleep go PERFECT aunt THEN:CLM switch off
faj háj nôn há?
light give lie POLITE
‘After Pingu went asleep, his aunt then switched off the light for him.’

Considering examples (5) to (7) together with (3) to (4) exemplified earlier, we can
safely state that these verbs have extended their semantics from lexical words to
grammatical words and developed polyfunctionality following the course of extension as
in other serial verb languages.

In the next section, we try to explicate differences in the functions of these verbs as
lexical verbs and grammatical markers by looking at their syntactic properties based on the
analysis of càak and thùng.

3 Some Evidence from the Syntactic Side
The grammaticalized verbs exemplified in the preceding section do not appear with agent-
oriented adverbials and take neither an obligation marker nor a negation marker, whereas
fully lexical verbs do. These points are borne out by the following tests. First let us start
with an obligation marker.

(8) a. kháw tōn càak bâan kòêt
s/he OBLIG LEAVE:V home to be born
‘S/he had to leave her/his hometown.’
b. *pingu dàjráp khanômpaŋ tōn càak khon khâŋ thaaŋ
Pingu receive bread OBLIG FROM:COV person wayside
‘Pingu received some bread *must from the wayside people.’
c. *tōn càak kaan thi khâw khajân
OBLIG BECAUSE NOM REL M s/he diligent
kháw cuŋ sɔŋp dáj  
s/he CONJ test POSSIBILITY  
‘Must because of his/her diligence, s/he can pass the exam.’

Second, the contrast can be attested by using the subject-oriented adverbials such as _rew_ (early; quickly; fast) and the postverbal NP ellipsis rule.

(9)  
a. kháw thűn báan _rew_  
s/he ARRIVE:V house early  
‘S/he arrived her/his house early.’  
b. *đaak khwaam khí thũn thũn khun paa _rew_  
deposit NOM regards TO:COV HO aunt quickly  
‘Please give my regards to your aunt *quickly.’  
c. *thũn _rew_ jaŋ dèk kháw kó? mii khwaam  
THOUGH quickly still child s/he CONJ have NOM  
rápphitčʰɔ̀p  
responsibility  
‘Though *early/quickly s/he is still a child, s/he has the sense of responsibility.’

These examples show a clear-cut distinction in the words _càak_ and _thűŋ_ between lexical uses as in (8a) and (9a) and deverbal uses as in (8b, c) and (9b, c). Third, the same point can be made with regard to the negative marker _mâi_.

(10)  
a. kháw jaŋ _mâi thũn_ (báan)  
s/he yet NEG ARRIVE:V (house)  
‘S/he has not arrived yet.’  
b. *kháw thoorasàp _mâi thũn_ phũuuauan  
s/he phone NEG TO:COV friend  
‘S/he phoned *not to her/his friend.’  
c. *_mâi thũn_ jaŋ dèk kháw kó? mii khwaam  
NEG THOUGH still child s/he CONJ have NOM  
rápphitčʰɔ̀p  
responsibility  
‘*Not though s/he is a child, s/he has the sense of responsibility.’

From these pieces of evidence, we may assume that the two patterns of grammaticalization of motion verbs which we proposed earlier are well-established.

4 Crosslinguistic Validity of Image Schemas  
The motivation for these motion verbs to develop polyfunctionality can be attributed to the similarity of schematic meanings. That is, this phenomenon can be understood in terms of the ‘gestalt preserving’ nature of semantic extension (cf. Ohori 1995: 703, who discusses Japanese _kara_ ‘from/since’ and other case marker-clause linkage marker parallels; see Talmy 1988; Sweetser 1988). For a recent argument that image schematic meanings are  

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The word ‘polyfunctionality’ adopted here is used to mean that a lexical word in the isolating languages, such as Thai, Vietnamese, Cambodian etc., commonly has a versatile usage without
not strictly preserved, see Matsumoto (1998) on Japanese o motte and ni yotte.

Now, let us draw out the image schemas of cāk ‘to leave’, thūŋ ‘to arrive’, and lōj ‘to pass, exceed’. Based on our analysis above, these three verbs seem to preserve their basic image schemas in accordance with the general tendency. But at the same time, we find some aspects of the image schemas are modified to suit the communicative needs. The basic patterns of extension are:

(11)  

<table>
<thead>
<tr>
<th>SOURCE</th>
<th>GOAL</th>
<th>PATH</th>
</tr>
</thead>
<tbody>
<tr>
<td>SPATIAL</td>
<td>ablative</td>
<td>allative</td>
</tr>
<tr>
<td>TEMPORAL</td>
<td>since</td>
<td>until</td>
</tr>
<tr>
<td>ANIMATE</td>
<td>agent</td>
<td>recipient</td>
</tr>
<tr>
<td>LOGICAL</td>
<td>cause/reason</td>
<td>concessive</td>
</tr>
</tbody>
</table>

Lōj can take ANIMATE ARGUMENT for PATH as well, but there is no difference in function whether lōj takes ANIMATE or SPATIAL as its argument.

(12)  
rōmüe lēen lōj pāaj/Mary  

bus run exceed bus-stop/Mary  

‘The bus passed the bus-stop/Mary’

The image schemas of cāk ‘to leave’, thūŋ ‘to arrive’, and lōj ‘to pass; exceed’, with illustrations of conceptual networks, are given in (13) through (15) respectively.

(13)  
a. cāk ‘to leave’

```
  ● →
```

SINCE

<table>
<thead>
<tr>
<th>b. cāk — ABLATIVE — AGENT</th>
</tr>
</thead>
<tbody>
<tr>
<td>INSTRUMENT (tool, force, material, means)</td>
</tr>
<tr>
<td>CAUSE — REASON [CLM]</td>
</tr>
</tbody>
</table>

any overt morphological marking. Therefore, the lexicon has no clear-cut boundaries in grammatical categories, and yields a chain of interlinking loop as its meaning slightly changes due to the practical use. Note that the notion of polyfunctionality is different from polysemy in the sense that the semantic net or meaning chains of the so-called polyfunctional word are associated with various grammatical categories, whereas the various meanings of a polysemous word are connected with one grammatical category alone.
(14) a. ถูน ‘to arrive’

(15) a. ถอย ‘to pass, exceed’

5 General Remarks
Based on the above schemas, a number of interesting observations arise, some of which are given below.

First, does the same happen in other languages as well? Given the generality of image schemas, we would say that may be true in a lot of cases, but there are certain language-specific differences. For example, the use of the source marker to encode agents is limited in Thai. In a well-developed case marking language such as Japanese, it is possible to mark the agent of speech event verbs with カラ ‘from’, but this is not the case in Thai.

(16) watasi-kara kodomo-ni chuui si-masu
    I-FROM kid-DATIVE complain do-POLITE
    ‘I will advise the kids.’

(17)  *càak chán cà dùu dèk
      FROM I will scold kid
It would be interesting to see how broad the coverage of the adpositional uses of motion verbs can be in non-case marking languages.

Secondly, the concessive use of ประเทศไทย ‘to arrive’ seems at first surprising. One may expect, for example, that it would mark result. We are not yet certain why this is the case, but one possibility is that a concessive interpretation implicitly assumes some scale. The form ประเทศไทย in its deverbal use may mark an intermediate goal, and there may be a further, implicit goal which is the true endpoint. See the schema in (18).

(18) X does something or is at state Y with a further reference point of Y’

   X ------ Y -------> Y’

In this connection, it seems interesting to see origins of concessive markers in typologically similar languages.

Finally, the present study is expected to promote our understanding of serial verbs (cf. Lefebvre 1991) and contribute to the typology of event integration (cf. Talmy 1991). According to Talmy’s study, there are two basic types of language, namely verb-framed languages, where the notion of path is incorporated in the verb (as Spanish), and satellite-framed languages, where path is realized as a satellite, the verb incorporated manner (as in English). Talmy also notes that Japanese is a verb-framed language while Chinese a satellite-framed language. Then, what about other East Asian languages? Kessakul (1998) shows that Thai has both properties, though it is perhaps closer to a verb-framed language. In fact, this distinction seems best understood as a typological continuum. Li (1997) has argued that Modern-Day Chinese has changed from a verb-framed language into a satellite-framed language over the past millennium (and maybe more), showing that the verb-complement constructions encode path, state change, and realization. Although verbs we have taken up retain lexicality in Thai, this may not always be the case in other languages. For example, Chinese 诳, ‘to go up’ is used as a main lexical verb less frequently than its counterpart in Thai. Further inquiry into the details of event integration from the viewpoint of areal typology, including the study of serial verbs as a site of typological change, is expected in the near future.

**Abbreviations**
CLF classifier
CLM clause-linkage marker
COMP complement
CONJ conjunction
CONJV conjunctional verb
CONV converb
COV coverb
CV causative verb
HO honorific
LEX lexicalization
MASC masculine
NEG negative
NOM nominalizer
OBLIG  obligation
PRT    particle
REL M  relative marker
RES    resultative verb
SFM    sentence-final marker
TAM    tense-aspect-modality
Vd     directional verb
1SG/PL 1st person singular/plural
2SG/PL 2nd person singular/plural

References
Kolver, Ulrike. 1984. Local Prepositions and Serial Verb Constructions in Thai, *AKUP Nr. 56*.


