

Parametric View on Tense Projection

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Towards a Theory of Syntactic Variation

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1. Introduction

Secondary predication has been researched by many linguists; most notably Simpson (1983), Roberts (1988), Carrier, Jill and Randall (1992) and Guéron, Jacqueline and Hoekstra (1995) for syntactic accounts, Washio (1997), Rappaport Hovav and Levin (2001) and Rothstein (2001) for semantic accounts.

Based on the research above, we will show that languages differ as to how the event time of secondary predication is specified, and offer a parametric account for the variation of secondary predication with regard to TP projection.

In English, it seems that we rely on context as to how we interpret a secondary predication.

- (1) <English secondary predication sentence>
John hit Mary sober.
(i) resultative ‘John hit Mary, as a result she became sober.’
(ii) depictive ‘John hit Mary, while he was sober.’

However, in Mongolian, for instance, the way of interpreting a secondary predication is not dependent on context. It looks to be fixed grammatically.

- (2) <Mongolian secondary predication sentence>
John Mary-g nuzgen shalga-san.
John Mary-ACC naked examine-PST
(i) resultative *‘John examined Mary, as result she became naked.’
(ii) depictive ‘John_i examined Mary_j (while s/he was) naked_{i/j}.’

- c. [Scrambling the whole embedded clause to the sentence initial position in (b)]
[helber n' havtgai bol-tol]_i John ene metal-ig t_i davt-san.
 shape 3.POSS flat(Adj) become-CVB John this metal-ACC hammer-

PST

‘John hammered the metal, as a result its shape became flat.’

- d. [Scrambling only RP is impossible in (b)]

**John ene metal-ig [havgai bol-tol]_i [helber n' t_i] davt-san.*

John this metal-ACC flat(Adj) become-CVB shape 3.POSS hammer-PST

‘John hammered the metal, as a result its shape became flat.’

- e. [Accusative marking on the adding notional subject]

John ene metal-ig [helber-ee havtgai bol-tol] davt-san.

John this metal-ACC shape-REFL.POSS flat(Adj) become-CVB hammer-

PST

‘John hammered the metal, as a result its shape became flat.’

<As for (5b,e) & (6b,e)> In Mongolian, the embedded subject can be either nominative-marked or accusative-marked (Guntsetseg 2010 and von Heusinger, Klein and Guntsetseg 2011). Thus, the fact that the nominative case of the embedded subject NP can be converted to the accusative case proves that the additional NPs in (5b, 6b) are indeed the subjects.

- (6) a. [Canonical *V-tal* resultative sentence]

John ene shal-ig [gyalalz-tal] uгаа-san. --(4)

John this floor-ACC glitter(V)-CVB wash-PST

‘John washed the floor shiny.’

- b. [Additional subject to (b)]

John ene shal-ig [öngö n' gyalalz-tal] uгаа-san.

John this floor-ACC colour 3.POSS glitter(V)-CVB wash-PST

‘John washed the floor, as a result its colour became glittering.’

- c. [Scrambling the whole embedded clause to the sentence initial position in (b)]

[öngö n' gyalalz-tal]_i John ene shal-ig t_i uгаа-san.

colour 3.POSS glitter(V)-CVB John this floor-ACC wash-PST
 ‘John washed the floor, as a result its colour became glittering.’

d. [Scrambling RP is impossible in (b₂)]

**John ene shal-ig [gyalalz-tal]_i [öngö n’ t_i] ugaa-san.*
 John this floor-ACC glitter(V)-CVB colour 3.POSS wash-PST
 ‘John washed the floor, as a result its colour became glittering.’

e. [Accusative marking on the adding notional subject]

John ene shal-ig [öngö-öö gyalalz-tal] ugaa-san.
 John this floor-ACC colour-REFL.POSS glitter(V)-CVB wash-PST
 ‘John washed the floor, as a result its colour became glittering.’

(7) [Syntactic structure of Mongolian resultative]

Subj NP₁-ACC [_{TP} NP₂:NOM RP-*tAl*] V.

2.2 Mongolian depictives

Three types of Mongolian depictive look-alike constructions;

(8) [Structures of Mongolian Depictive Candidates]

- | | | | | |
|----|------|---------|-------------------------------------|---|
| a. | Subj | Obj-ACC | X-INSTR{-Ø/-REFL.POSS/3.POSS} | V |
| b. | Subj | Obj-ACC | X-COP-INF-DAT{-Ø/-REFL.POSS/3.POSS} | V |
| c. | Subj | Obj-ACC | X{-Ø/*-REFL.POSS/*3.POSS} | V |

(9) [Mongolian depictive sentences]

<Subject-oriented depictives>

a. *John Mary-g nuzgen-eer-ee shalga-san.* --(8a)
 John Mary-ACC naked-INSTR-REFL.POSS examine-PST
 ‘John_i examined Mary naked_i.’

b. *John Mary-g nuzgen bai-h-d-aa shalga-san.* --(8b)
 John Mary-ACC naked be-INF-DAT-REFL.POSS examine-PST
 ‘John_i examined Mary naked_i.’

<Object-oriented depictives>

c. *John Mary-g nuzgen-eer n’ shalga-san.* --(8a)

John Mary-ACC naked-INSTR 3.POSS examine-PST

‘John examined Mary_i naked_i.’

d. *John Mary-g nuzgen bai-h-ad n’ shalga-san.* --(8b)

John Mary-ACC naked be-INF-DAT 3.POSS examine-PST

‘John examined Mary_i naked_i.’

e. *John Mary-g nuzgen bai-h-ad shalga-san.* --(8b)

John Mary-ACC naked be-INF-DAT examine-PST

‘John examined Mary_i naked_i.’

<Ambiguous types>

f. *John Mary-g nuzgen-eer shalga-san.* --(8a)

John Mary-ACC naked-INSTR examine-PST

‘John_i examined Mary_j naked_{i/j}.’

g. *John Mary-g nuzgen shalga-san.* --(8c)

John Mary-ACC naked examine-PST

‘John_i examined Mary_j naked_{i/j}.’

(A) *Similarly* replacement test

The *similarly* replacement test (10) shows that depictive phrases in (9) are not manner adverbs though adverbs and adjectives are morphologically identical in Mongolian.

(10) <Subject-oriented depictives>

a. #*John Mary-g nuzgen-eer-ee shalga-san ba*

John Mary-ACC naked-INSTR-REFL.POSS examine -PST and

Bill ch gesen Mary-g adilhan shalga-san.

Bill also Mary-ACC similarly examine-PST

‘John_i examined Mary naked_i, and Bill also examined Mary similarly (similarly ≠ naked)’

b. #*John Mary-g nuzgen bai-h-d-aa shalga-san.*

John Mary-ACC naked be-INF-DAT-REFL.POSS examine-PST

ba Bill ch gesen Mary-g adilhan shalga-san

and Bill also Mary-ACC similarly examine-PST

‘John_i examined Mary naked_i, and Bill also examined Mary similarly (similarly ≠ naked)’

<Object-oriented depictives>

- c. #John Mary-g **nuzgen-eer** **n'** *shalga-san* *ba* *Bill*
John Mary-ACC naked-INSTR 3.POSS examine-PST and Bill
ch gesen *Mary-g* **adilhan** *shalga-san*.
also Mary-ACC similarly examine-PST
‘John examined Mary_i naked_i, and Bill also examined Mary similarly (similarly ≠ naked)’

- d. #John Mary-g **nuzgen** **bai-h-ad** **n'** *shalga-san*
John Mary-ACC naked be-INF-DAT 3.POSS examine-PST
ba *Bill* *ch gesen* *Mary-g* **adilhan** *shalga-san*.
and Bill also Mary-ACC similarly examine-PST
‘John examined Mary_i naked_i, and Bill also examined Mary similarly (similarly ≠ naked)’

- e. #John Mary-g **nuzgen** **bai-h-ad** *shalga-san* *ba* *Bill*
John Mary-ACC naked be-INF-DAT examine-PST and Bill
ch gesen *Mary-g* **adilhan** *shalga-san*.
also Mary-ACC similarly examine-PST
‘John examined Mary_i naked_i, and Bill also examined Mary similarly (similarly ≠ naked)’

<Ambiguous types>

- f. #John Mary-g **nuzgen-eer** *shalga-san* *ba* *Bill* *ch gesen*
John Mary-ACC naked-INSTR examine-PST and Bill also
Mary-g **adilhan** *shalga-san*.
Mary-ACC similarly examine-PST
‘John_i examined Mary_j naked_{i/j}, and Bill also examined Mary similarly (similarly ≠ naked).’

- g. #John Mary-g **nuzgen** *shalga-san* *ba* *Bill* *ch gesen*
John Mary-ACC naked examine-PST and Bill also
Mary-g **adilhan** *shalga-san*.
Mary-ACC similarly examine-PST

‘John_i examined Mary_j naked_{i/j}, and Bill also examined Mary similarly (similarly ≠ naked).’

(B) Insertion of notional subject to depictive clauses

In (11), a nominative-marked notional subject is added for each depictive clause.

(11) <Subject-oriented depictives>

- a. **John Mary-g* [_{TP} *biye-ee/n'* *nuzgen-eer-ee*]
 John Mary-ACC body-REFL.POSS/3. POSS naked-INSTR-REFL.POSS
shalga-san.
 examine-PST

Int. ‘John_i examined Mary while his body was naked_i.’

- b. *John Mary-g* [_{TP} *biye-ee/n'* *nuzgen*
 John Mary-ACC body-REFL.POSS/3. POSS naked
bai-h-d-aa] *shalga-san.*
 be-INF-DAT-REFL.POSS examine-PST

‘John_i examined Mary while his body was naked_i.’

<Object-oriented depictives>

- c. **John Mary-g* [_{TP} *biye n'* *nuzgen-eer n'*] *shalga-san.*
 John Mary-ACC body 3.POSS naked- INSTR 3.POSS examine-PST

Int. ‘John examined Mary_i while her body was naked_i.’

- d. *John Mary-g* [_{TP} *biye n'* *nuzgen bai-h-ad n'*]
 John Mary-ACC body 3.POSS naked be-INF-DAT 3.POSS
shalga-san.
 examine-PST

‘John examined Mary_i while her body was naked_i.’

- e. *John Mary-g* [_{TP} *biye n'* *nuzgen bai-h-ad*] *shalga-san.*
 John Mary-ACC body 3.POSS naked be-INF-DAT examine-PST

‘John examined Mary_i while her body was naked_i.’

<Ambiguous types>

- f. **John Mary-g* [_{TP} *biye-ee/n'* *nuzgen-eer*] *shalga-san.*

John Mary-ACC body-REFL.POSS/3.POSS naked-INSTR examine-PST
 Int. ‘John_i examined Mary_j naked_{i/j} while his/her body was naked.’

g. **John Mary-g* [_{TP} *biye-ee/n'* *nuzgen*] *shalga-san*.

John Mary-ACC body-REFL.POSS/3.POSS naked examine-PST

Int. ‘John_i examined Mary_j naked_{i/j} while his/her body was naked.’

(C) Accusative marking on the embedded subject

As mentioned in the resultative section, in Mongolian, the embedded subject can be either nominative-marked or accusative-marked.

(12) [Differential subject marking for (11b,d,e)]

a. [for (11b)]

John Mary-g [_{TP} *biye(-ig) n'* *nuzgen bai-h-d-aa*]

John Mary-ACC body-ACC 3.POSS naked be-INF-DAT-REFL.POSS
shalga-san.

examine-PST

‘John_i examined Mary while his body was naked_i.’

b. [for (11d)]

John Mary-g [_{TP} *biye(-ig) n'* *nuzgen bai-h-ad n'*]

John Mary-ACC body-ACC 3.POSS naked be-INF-DAT 3.POSS
shalga-san.

examine-PST

‘John examined Mary_i while her body was naked_i.’

c. [for (11e)]

John Mary-g [_{TP} *biye(-ig) n'* *nuzgen bai-h-ad*] *shalga-san*.

John Mary-ACC body-ACC 3.POSS naked be-INF-DAT examine-PST

‘John examined Mary_i while her body was naked_i.’

(13) [Structures of Mongolian depictives]

a. Subj Obj-ACC [_{sc}(*NP:NOM) X-INSTR{-Ø/-REFL.POSS/3.POSS}] V

b. Subj Obj-ACC [_{TP}(NP:NOM) X-COP-INF-DAT{-Ø/-REFL.POSS/3.POSS}] V

c. Subj Obj-ACC [_{sc}(*NP:NOM) X{-Ø/*-REFL.POSS/*3.POSS}] V

(15) [T is necessary in Mongolian resultatives]

a. *John ene metal-ig* [_{TP}(*helber n'*) *havtgai bol-tol*] *davt-san*.
John this metal-ACC shape 3.POSS flat(Adj) become-CVB hammer-PST
'John hammered the metal, as a result its shape became flat.'

b. *John ene shal-ig* [_{TP}(*öngö n'*) *gyalalz-tal*] *ugaa-san*.
John this floor-ACC colour 3.POSS glitter(V)-CVB wash-PST
'John washed the floor, as a result its colour became glittering.'

All Mongolian resultatives have a TP structure; there is no bare-AP resultative.

<English>

(16) [No T in English secondary predication]

- a. John hammered the metal [_{sc} (*its shape) flat]
b. *The dog bit the cat [_{sc} miss the mouse]. (Guéron & Hoekstra, 1995)

(17) John hit Mary sober.

- (i) resultative 'John hit Mary, as a result she became sober.'
(ii) depictive 'John hit Mary, while he was sober.'

Whether the event of *sober* takes place at the same time of or after the event of the main verb fully depends on the context.

<Japanese>

(18) a. <No T in Japanese resultatives>

Taroo-ga kuruma-o* [_{sc}(hyoomen-ga*) *pikapika-ni*] *migai-ta*
Taroo-NOM car-ACC surface-NOM shiny-ni polish-PST
'Taro polished a car (its surface) into a brilliant shine.'

b. <No T in Japanese depictives>

Taroo-ga suupu-o* [_{sc}(ondo-ga*) *atuatu-de*] *non-da*
Taroo-NOM soup-ACC temperature-NOM hot-de drink-PST

‘Taro drank the soup (its temperature) hot.’

In Japanese, it seems that when the secondary event takes place is interpreted with the help of the particles *-ni* and *-de*.

4. Summary

Languages can be categorised into two types in the way of interpreting SP events. Mongolian type languages allow secondary predication to project TP inside, which may be used to signal its temporal relation, and English & Japanese type languages do not. The latter type of languages resorts to other means to assign secondary predications an appropriate temporal relation relative to the matrix tense.

5. References

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