Information structure and particle choice:
Native and near-native speakers of Japanese and Korean

Sun-Hee Bae and Miwako Hisagi
(Harvard University)
Overview

• Background
• Current study
• Nominal Domain
  • Nominatives (Korean)
  • Accusatives (Korean & Japanese)
  • Locatives (Korean & Japanese)
• Verbal Domain
  • Passives/Causatives (Korean)
  • Evidentials (Japanese)
• Concluding remarks
Background
Heritage speaker

- A speaker who grew up hearing (and possibly speaking) language L at home but who as an adult is more comfortable in the dominant language of the society
- Heritage speakers are a common phenomenon in the US, with about 30% American undergrads coming from non-English speaking homes
Heritage Korean / Japanese speakers in the US

- Listened to their parents speak Korean/Japanese at home and acquired it (including receptive acquisition) since childhood, as L1
- Conversational skills acquired by communication with other family members at home
- Currently use American English as primary language of communication
- Second generation decedents of Korean/Japanese immigrants in the US
Many Korean/Japanese immigrant families promote communication in Korean/Japanese language at home, offering bilingual environment to their children who receive formal education in English.

Other immigrant parents raise their children in a monolingual environment, so that they can “integrate” into the American society more easily (Jeon, 2008).

Heritage language speakers oftentimes do not maintain their Korean/Japanese language skills to a fluent level.
### Historical Population Change

**HK**

<table>
<thead>
<tr>
<th>Year</th>
<th>Population</th>
<th>Change</th>
<th>Percent Change</th>
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<tbody>
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<td>1970</td>
<td>69,130</td>
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<td>+3940.3%</td>
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<td>1980</td>
<td>354,593</td>
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<td>2010</td>
<td>1,423,784</td>
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<td>+32.2%</td>
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**HJ**

<table>
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<th>Year</th>
<th>Population</th>
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<th>Percent Change</th>
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<tbody>
<tr>
<td>1970</td>
<td>591,290</td>
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<td>1980</td>
<td>700,974</td>
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<td>2010</td>
<td>763,325</td>
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Corpus studies on HK & HJ

- Heritage Korean (written corpora)
  - Honorifics
  - Passives
  - Word order
- Heritage Japanese
  - N/A
Current study
How do HK&HJ speakers talk?

Videos: Dooly, Ppororo, and Tom & Jerry
How do HK&HJ speakers talk?

- What characterizes heritage Korean / heritage Japanese language?
  What types of errors do heritage Korean / heritage Japanese speakers make?

- Polinsky Language Sciences Lab Dataverse
  [http://dvn.iq.harvard.edu/dvn/dv/polinsky](http://dvn.iq.harvard.edu/dvn/dv/polinsky) (transcriptions available to public)
# Participants

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<th>Korean</th>
<th>Japanese</th>
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<tbody>
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<td>Native</td>
<td>10 (4M) 26Y (20-33)</td>
<td>10 (4M) 26y (19-30)</td>
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<tr>
<td>Heritage*</td>
<td>14 (4M) 20Y (17-25)</td>
<td>11 (5M) 25y (18-30)</td>
</tr>
</tbody>
</table>

*All the participants have one or more of their parents who speak Korean/Japanese as the native language.
Nominatives
Missing nominatives (Kor.)

- 코끼리[가] 되게 화난 모습 보이면서
  khokkili[-ka] toykey hwana-n mosup po-i-myense
  elephant[-NOM] very angry-ADN image see-CAUS-LK

‘the elephant seems to be very upset’

[HK_121016_16]
Missing nominatives with –issta (Kor.)

- <그> 방엔
  <ku> pang-eyn
  <that> room-LOC

창문

- <그> 방엔
  <ku> pang-eyn
  <that> room-LOC

창문

There was a window in the room,

[HK_121013_03]

- 놀이공원 가서
  no1.l-i-kongwen ka-se
  amusement-park go-LK
  코끼리[가] 있는 걸 뭐 서
  khokkili[-ka] iss-nun ke-l pw-ase
  elephant[-NOM] exist-ADN thing-ACC see-LK

‘Because (Dooly) went to the amusement park and saw an elephant there,’

[HK_121016_16]
Allomorph substitution for nominatives (Kor.)

- 그래서 커튼가[%-이] 내려갔어요.
  
  kulayse khethun-ka[%-i] nayly-e-ka-ss-e.yo.
  
  so curtain-NOM go.down-LK-go-PST-DECL
  
  ‘(as) the curtain went down,’

- 톰가[%-이] 구멍에 들어갔어요.
  
  thom-ka[%-i] kwumeng-eytul.e-ka-ss-e.yo.
  
  Tom-NOM hole-LOC step.into-LK-go-PST-DECL
  
  ‘so, Tom stepped into the hole,’
Comitative in place of nominative (Kor.)

• 돌리와 친구와[%-가]

\textit{twulli-wa} \textit{chinkwu-lang[\%-ka]}

Dooly-with friend-with[\%-NOM]

\textlt{<그> zoo에} \textlt{걸어가는데}

\textlt{<ku> zoo-ey} \textlt{kel-e-ka-nuntey}

\textlt{<that> zoo-LOC walk-LK-go-CONN}

\textlt{코끼리를} \textlt{봤어요}

\textlt{khokkili-lul} \textlt{pw-ass-e.yo}

\textlt{elephant-ACC} \textlt{see-PST-DECL}

‘Dooly and his friend were walking to the zoo, and they saw an elephant.’

\[HK_121115_24\]
Nominative vs. Topic

Nominative

- encodes a purely syntactic category
- no interpretive constraints (can be non-specific, new, etc.)

Topic

- encodes the referent that the utterance is about (Reinhart 1981, inter alia)
- corresponds to the specifier of the Topic phrase above TP
Topic in place of nominative (Kor.)

- 그리고 &제리하 [//]
  kuleko &ceyli-ha [//]
then &Jerry-ha [//]
제리는[%/가] 그 여자 고양이하고
ceyli-nun[%/ka] ku yeca ko.yangi-hako
Jerry-NOM that girl cat-with
춤을 # 추는 동안
chwum-ul # chwu-nun tongan
dance-ACC do-ADN while
‘Then Jerry [//] while Jerry is dancing with that cat girl.’

[HK_121011_09]
Nominative in place of topic marker (Kor.)

I: 그 여자 펭귄은
ku yeca pheyngkwin.un
that female penguin-NOM
‘The female penguin,’

누구를 가장 좋아하는 것 같아요?
nwukwu-lul kacang coh.aha-nun kes kath-ayo?
who-ACC best like-ADN thing similar-Q
‘who do you think (the female penguin) liked best?’

S: 그 여자 펭귄이[%-은] 어@fp
ku yeca pheyngkwin-i[%-un] e@fp
that female penguin-NOM[%-TOP]

악어를 좋아하는 것 같아요[%-아요].
ak.e-lul coh.aha-nun kes kath-ayyo[%-a.yo].
crocodile-ACC like-ADN thing similar-DECL
‘I think the female penguin likes the crocodile.’

[HK_121013_03]
Accusatives
Datives in place of accusatives (Kor.)

- 쌌끄만   <뭐> crumb 이 있어서
  ccokkuma-n <mwe> crumb -i iss-ese
  small-ADN well crumb-NOM have-so
  그거한테 [%그거를] 코끼리한테
  kuke-hanthey [%kuke-lul] khokkili-hanthey
  that-to [%that-ACC] elephant-to
  &주 # 어@fp # 썼어요.
  &cwu # e@fp # cw-ess-eyo.
  &gi # e@fp # give-PAST-DECL
  ‘but well (he) had a small crumb so (he) gave to that to the elephant.

[HK_121011_09]
Comitative in place of accusative (Kor.)

- 그래서 손님하고[%손님을] <그> 커피하고
  kulayse sonnim-hako <ku> khephi-hako
  so guest-and <that> coffee-and
  ‘so the guest, coffee, and’
  <막> 쿠키 [//]
  <mak> khwukhi [//]
  <recklessly>
  ‘cookie, …was it a cookie?
  비스킷인가 xxx 모르겠는데 <그>
  pisukhis-i-n-ka xxx mol-u-keyss-nuntey <ku>
  biscuit-be-ADN-Q NEG-know-PST-CONN <that>
  ‘maybe biscuit, I don’t know’
  그런걸로 대접을 하고 있었는데
  kulen-kel-lo taycep-ul ha-ko i-ss.-e-ss-nuntey
  such-thing-INS serving-ACC ha-ko i-ss.-e-ss-nuntey
  ‘when (he) was serving with something like that,’

[HK_121115_19]
-ni in place of -o (Jap.)

- スキーに していた 話をしていて、
  Ski-ni  shite-ita  hanashi-o  shite-ite
  "Was talking about skiing～"

- ジェリーに 追いかけて初めて、
  Jerry-ni  oikake  hajimete
  "beginning to chase Jerry…"

- お父さんのほうに 見て、
  otoosan-no  hoo-ni  mite
  "Looking at the father ～"

- ペンギンさんのことに考えてます。
  penguin-san  no  koto-ni  kangaete-imasu.
  "(He) is thinking of the Penguin.”  (thinking about〜)  =>  then  ni-tsuite)
Locatives
Locatives

• Korean
  • -ey (static)
  • -eyse (dynamic)

• Japanese
  • -ni (static)
  • -de (dynamic)
-ey in place of –eyse (Kor.)

- 자기가 어增添了 산 위에[%에서]
  caki-ka etten san wi-ey[%-eyse]
  self-NOM some mountain top-LOC

스키 타고 있는데
  sukhi tha-ko iss-nuntey
  ski ride-CONJ exist-CONN

‘he was skiing on a mountain’

[HK_121013_03]
-eyse in place of -ey (Kor.)

- 둘이 뛰었는데
  twul-i ttwi-ess-nunty
  two-NOM jump-PST-CONN

- 쇼파 위에서[%-에] 올라가고
  syopha wi-eyse[%-ey] ol-la-ka-ko
  sofa above-LOC climb.up-LK-go-CONJ

  ‘The two jumped, went onto the sofa’

-ni in place of –de (Jap.)

- ～所に （で）
  tokoro-ni
  place at
  “at the place”

- 側に（で）ジェリーが笑っているのをみて （それに怒って、追いかけ
  るっていう、シーンです。）
  soba-ni Jerry-ga waratte-ru no-o mite
  the side at Jerry laughing look at
  “Looking at Jerry who is laughing at the side”

- 近くに来たところに （で）、 （少しずつ、そのゴキブリ触りたくない
  から）
  chikaku-ni kita-tokoro-ni
  near-by came
  “came nearby”

Sun-Hee Bae & Miwako Hisagi (Harvard University)
-de in place of –ni (Jap.)

- 家の中で（に）いて

  ie-no naka-de (supposed to be ni) ite
  house inside was

  “was inside of the house”
Locatives

- Korean
  - -ey (static, also goal)
  - -eyse (dynamic, also source)

- Japanese
  - -ni (static)
  - -de (dynamic)

Datives

- Korean
  - -eykey / -ey
    Cf. -eykese (source)
  - -hantey
    Cf. -hanteyse (source)

- Japanese
  - -ni
VERBAL DOMAIN
Passives/Causatives
Passive / Causative

Korean
- Passive: mek-hi-ess-ta
  * eat-PASS-PST-DECL
  * ‘was eaten’
- Causative: mek-i-ess-ta
  * eat-CAUS-PST-DECL
  * ‘made someone eat, fed’

Japanese
- Passive: tabe-rare-ta
  * eat-PASS-DECL
  * ‘was eaten’
- Causative: tabe-sase-ta
  * eat-CAUS-DECL
  * ‘made someone eat, fed’
Passives (Kor.)

- Affixal passives involve passive derivational morphemes.
- Lexical passive verbs do not have a passive morpheme
  - ttaylita ‘hit’ vs. macta ‘be hit’.
- Phrasal passives consist of a verb followed by –e/-a and the inchoative verb cita ‘get to be, become’,
  - cwuta ‘give’ vs. cwu-e cita ‘be given’ (Sohn 1999).
Missing passives (Kor.)

• 밑에 있는 어항에
  
  *mith-ey iss-nun ehang-ey*

  bottom-LOC exist-ADN fish.bowl-LK

  몇 번 담가 [//]

  *myech pen tamk-a [//]*

  several times soak-LK

  담가다가[%담겼다가]

  *tamk-a-taka[%tamk-y-ess-taka]*

  soak-LK-CONN[%soak-PASS-PST-CONN]

  ‘(Tom) was soaked into the fish bowl below for several times’

  [HK_121013_05]
Causatives (Kor.)

• Short-form causatives involve causative derivational morphemes
  • direct causation

• Long-form causatives involve addition of –key ha(y) ‘cause to do/be’ after a predicate
  • indirect causation
Missing causatives (Kor.)

- 제리가 불을 낳어요 [%낮어요]
  
  ceyli-ka pwul-ul na-ass-e.yo [%na-y-ss-e.yo]
  
  Jerry-NOM fire-ACC break.out-PST-DECL [%break.out-CAUS-PST-DECL]
  
  ‘Jerry started a fire’

  [HK_121126_18]
Overuse of causatives (Kor.)

- 발이
  
  "He feels his foot burning."

\begin{verbatim}
발이 태우는[%타는] 그것을
pal-i thay-wu-nun[%tha-nun] kes-ul

느껴요.

nukky-e.yo.
feel-DECL

烧-CAUS-ADN[%burn-ADN] thing-ACC

[HK_121013_03]
\end{verbatim}
Passive & Causative: No errors (Jap.)

Heritage
Passive: 46
(-rareru: 32; -reru: 14)
Causative: 6
Total: 52

Japanese
Passive: 38
(-rareru: 23; -reru 15)
Causative: 10
Total: 48

• Most examples were from “Tom & Jerry” and “Dooly2” in both groups.
• Heritage group: mostly high proficiency speakers
Evidentials
mitai- in place of mitai-na (Jap.)

- can soften the impact of statement as well as allowing a speaker to distance him or herself from the truth of a statement

- reflects the speaker’s judgment (as opposed to a third party’s judgment) and the confidence level is reasonably high. The judgment is often based on observed evidence.

- ~MITAI is quite common in informal speech. In contrast to expressions softened with something like DAROO, an expression with ~ MITAI is always more than a simple guess.

- It also occurs in the following patterns where similar differences in degrees of confidence are reflected.

  e.g.,

  イギリス人みたいな日本人。

  igirisu-jin mitai-na nihonjin
  English/British seems Japanese
  “A Japanese person who seems English.”
mitai-na → mitai-な (Jap.)

- フラッシュバック みたい(な) のが ある
  flashback  mitai-(な)-no-ga  aru
  flashback  seems like  there is
  “it seems like a flashback~”

- 水槽 みたい(な) のに
  suisoo  mitai-(な)-no-ni
  fish tank  seems like
  “it seems like a fish tank~”

- 掃除機 みたい(な) ので
  soojiki  mitai-(な)-no-de
  vacuum cleaner  seems like  things by
  “by the things which seems like a vacuum cleaner...”

- 恐竜 みたい(な) 緑色のキャラクターを
  kyooryuu  mitai-(な) midoriiro-no-kyarakutaa-o
  dinosaur  seems like  green of character
  “it’s a green character like a dinosaur..”
Concluding remarks
Types of particle errors

- Wrong/missing particles
  - Nominative
  - Accusative
  - Locative
  - Passive/causative
  - Evidentials
## Comparison

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<th>Japanese</th>
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<tr>
<td>Nominative</td>
<td>Errors</td>
<td>Possible errors?</td>
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<tr>
<td>Accusative</td>
<td>Errors</td>
<td>Errors</td>
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<td>Locative</td>
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<td>Passive/Causative</td>
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<td>Evidentials</td>
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<td>Errors</td>
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</table>
Discussion

Why are the errors in the nominal domain more numerous than in the verbal domain?

Beyond Japanese and Korean: stronger nominal vulnerabilities in Inuktittut and Circassian despite simple nominal morphology and complex verbal morphology
Heritage Inuktitut (polysynthetic, ergative)

- High and low proficiency heritage speakers were asked to judge structures with
  - tense-agreement reversal,
  - agreement mismatches,
  - omission of the instrumental case,
  - the use of the instrumental case instead of the nominative (overt marked case instead of unmarked)

(Sherkina-Lieber et al. 2011)
Heritage Inuktitut

(Sherkina-Lieber et al. 2011)
Heritage Inuktitut

- Nominal morphology is more strongly affected than verbal morphology
  - In nouns, case is most vulnerable
  - In verbs, agreement is more affected than tense
Circassian, Northwest Caucasus (polysynthetic, ergative)

- two cases (ABS and ERG), both marked
  ABS: noun-\textit{r} \quad (lə-r ‘dog’) 
  ERG: noun-\textit{m} \quad (lə-m ‘dog’) 
  the ergative form is also licensed by postpositions 
- very complex verb forms 
agreement with subject, object, and multiple applied objects licensed by applicative heads (all prefixal)
### Heritage Circassian: DP errors

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<th>ERG in place of ABS</th>
<th>ABS in place of ERG</th>
<th>ERG omitted</th>
<th>ABS omitted</th>
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<td>28/115 (24%)</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>3/115 (2%)</td>
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</table>

N=199 DPs; case is not overtly marked on 1 and 2 pronouns, names, or kinship terms

Directionality: ERG wins over, possibly a frequency effect

ABS is replaced by ERG both in the subject and object position, therefore, not a simple subject effect
Heritage Circassian : Verb errors

586 forms transcribed; 52 errors (8.8%)

- Embedded instead of matrix negation
- Omission of interrogative form (same as in Korean)
- Over-marking of the causative
- Agreement errors (use of overt marking instead of null marking)
Heritage Circassian (Polinsky in prep.)
Thank you!