UTAH, The Criterion Theta, and how they fare against Telugu data

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- Two influential mapping theories from the GB era govern the assignment of theta/thematic roles:

  - **Uniformity of Theta Assignment Hypothesis**   Baker (1988)
    Identical thematic relationships between items are represented by identical structural relationships between those items at the level of D-structure.
  - **Theta Criterion**   Chomsky (1981)
   Each argument bears one and only one theta role and each role is assigned to one and only one argument

- Both theories require biuniqueness between role and (syntactic) argument/position:

  - **UTAH**

    a. Each theta-position is associated with a specific theta-role
    b. Each theta-role is associated with a specific theta-position

  - **Theta Criterion**

    a. Each argument bears one and only one theta-role
    b. Each theta-role is assigned to one and only one argument

- At the time of conception, both theories were *principles* of grammar — they could act as filters to weed out representations, and also serve as aids for acquisition.

- Over the years, with the dissolution of D-structure as a distinct level of representation, the two theories can't be *principles* anymore, but can be treated as *generalizations* that need to be derived (see for instance, Chomsky 1995 on the Theta Criterion and Baker 1997 on UTAH), and tested.

- Previous work has called into question the veracity of these generalizations, or at least one half of them (Hornstein, 1999; Borer, 2005; Ramchand, 2008; Sundaresan, 2012; Bruening, 2013; Legate, 2014, *i.m.a.*).

- For example, Legate (2014), based on data from Acehnese and related languages, argues that the Passive Voice has nothing merged in its specifier, but a modifier merged with the Voice head restricts possible initiators. The by-phrase in Long Passives assigns an independent initiator theta role (see also Landman 2000; Bruening 2013, *i.a.*).

(1)   *Acehnese*   (Legate, 2014, p. 40)
    Lôn di-kap   lé uleue nyan
    1SG 3FAM-bite by snake DEM
    'I was bitten by the snake'

(2)
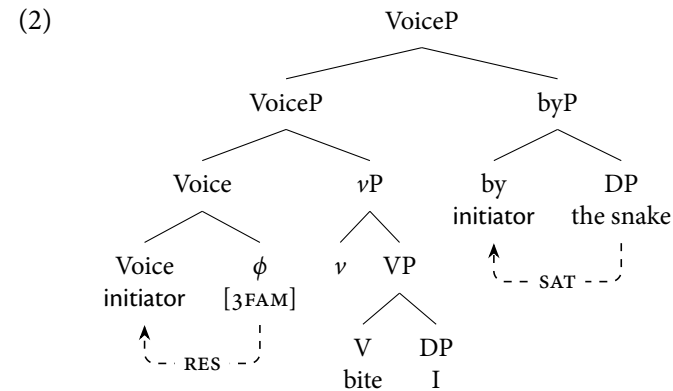
- Notice that this theory violates UTAH (b.) — the same thematic role is associated with two different positions.

> **Today,**
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> -
>
> - Verbal Reflexives in Telugu are best analysed by a theory that violates **both** parts of UTAH and The Theta Criterion.
>
> - The argument against the (b.) halves (only one role for one position/argument) comes from **theme** interpretation, adding to the arguments from agent interpretation.

1 Telugu Reflexives

- Telugu has a verbal reflexive *kun*. In its presence, the anaphor is optional.

(3) *Agent = Theme*
akhil (tana-ni tanu) poguḍu-**kun**-aa-ḍu
akhil (3SG-ACC 3SG) praise-VR-PST-3MS
'Akhil praised himself'

- In addition to agent=theme reflexivity, it also marks agent=beneficiary (4), agent=location (5) and agent=instrument (6) reflexivity, among others. I will call this property *kun*'s '**Thematic Variability**'

(4) *Agent = Beneficiary*
sowmya (tana-kosam tanu) talupu moosu-**kun**-in-di
sowmya (3SG-BEN 3SG) door close-VR-PST-3NS
'Sowmya closed the door for herself'

(5) *Agent = Location*
akhil (tana-lo tanu) sowmya-ni poguḍu-**kun**-aa-ḍu
akhil (3SG-LOC 3SG) sowmya-ACC praise-VR-PST-3MS
'Akhil praised Sowmya silently'   (silently = within oneself)

(6) *Agent = Instrument*
akhil (tana-to tanu) banti aapu-**kun**-aaḍu
akhil 3SG-INSTR 3SG ball stop-VR-PST.3MS
'Akhil stopped the ball with himself'

- I will treat *kun* as a Voice head. Two properties suggest this analysis: Agent orientation, and its structural position.

1.1 Agent Orientation

- The verbal reflexive is agent oriented, like in many other languages (Reuland, 2018). In (3–6), the subject is an agent.

- As (7–8) shows, it is incompatible with experiencer subjects, irrespective of case.

(7) fatima-ki tana-miida tana-ku koopam vačč-(*kun)-in-di
fatima-DAT 3SG-ON 3SG-DAT anger come-VR-PST-3NS
'Fatima got angry at herself'

(8) fatima tana-ni tanu maraci-poo-(*kun)-in-di
fatima.NOM 3SG-ACC 3SG forget-go-VR-PST-3FS
'Fatima forgot herself'

- It's not the case, however, that *kun* doesn't tolerate experiencers at all. In (9), it is used to signal agent=experiencer reflexivity.

(9) Ravi (tana-ku tanu) paaṭa vinip-incu-kunn-aa-ḍu
Ravi (3SG-DAT 3SG) song hear-CAUS-VR-PST-3MS
'Ravi made himself listen to the song'

- So, the only restriction on roles is that one of the participants in the reflexivity established by *kun* has to be an agent.

- Since *kun* is always tied to an agent, treating it as a Voice, the locus of agent-introduction, is the simplest possible option.[1]

1.2 Structural Position

- Structurally, *kun* is found between the causative and the passive morphemes.

(10) aisu karig-indi
ice melt-PST.3NS
'The ice melted'

(11) sarita aisu karig-inc-indi
sarita ice melt-CAUS-PST.3NS
'Sarita melted the ice'

(12) sarita aisu karig-incu-kun-indi
sarita ice melt-CAUS-**VR**-PST.3NS
'Sarita melted the ice for herself'

(13) aisu karig-incu-kuna-baḍ-indi
ice melt-CAUS-**VR**-PASS-PST.3NS
'The ice was melted'

- Between a causative head and the passive head is again where one would find a Voice head (see Bruening 2013 and Alexiadou et al. 2015, *a.o* for why we need a separate passive head, at least in some languages.)

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[1] See Appendix C for issues with analyses that treat *kun* as a head distinct from Voice (Sundaresan, 2012; Balusu, 2019)

A note on Anticausative use

- *kun* also marks the intransitive member of a causative alternation.

  (14) a. suma talupu moos-in-di
            suma door   close-PST-3NS
            'Suma closed the door'

        b. talupu moosu-**kun**-in-di
            door   close-VR-PST-3NS
            'The door closed'

- This is another agent-related property, and hence can be used to motivate the Voice analysis.

- However, this *kun*, and the reflexive *kun* make different semantic contributions, and can't be treated as one syntactic item.

- See Appendix B for more details.

1.3   *kun* disallows proxy readings

- Another property that will be relevant for us later: *kun* disallows proxy readings.

  (15) *Proxy Readings*   (Jackendoff, 1992; Safir, 2004a,b)
        Ringo saw himself in the wax museum
        (himself = statue of Ringo)

  (16) Ringo tana-ni   tanu wax museum lo   čuus-(*kun)-ææ-ḍu
        Ringo 3SG-ACC 3SG wax museum LOC see-VR-PST-3MS
        'Ringo saw himself in the wax museum'

- To convey what the English (15) conveys, the anaphor is needed, and the verbal reflexive disallowed (16).

- This state of affairs is quite similar to the English contrast in (17)

  (17) a. John shaved   ✗ proxy
        b. John shaved himself   ✓ proxy

- The difference between the two languages is the (optional) presence of the anaphor in Telugu.

- Note that *the string* in (16), with *kun*, is fine. When it is present,

– and the anaphor is interpreted as a proxy, *kun* necessarily conveys an agent=beneficiary or agent=location meaning.

– and the anaphor is not interpreted as a proxy, no other reflexive interpretation need arise (but it can).

Interim summary

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- *kun* is a kind of Voice
- *kun* disallows proxy readings
- *kun* displays Thematic Variability

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2   Analysis

- How do we account for the thematic variability seen in (3–6)?

- I will argue that the best way to model *kun*'s behaviour is to treat it as a Voice head that introduces **agent** and some other (nonspecific) thematic role:[2]

  (18) $[\![\text{kun}]\!] = \lambda x \lambda e.\ \text{agent}\, x e \wedge \exists R \in \Theta' : R x e$

  (19) $\Theta = \{\, \text{Agent, Theme, Goal, Loc, Ben, Instr, Cause, (\dots)}\,\}$

  (20) $\Theta' = \Theta - \{\text{Agent}\}$

- Reflexivity is the result of two roles introduced by the same head (and bound by the same λ).

- Baking reflexivity this way already violates Theta (a.): Each argument bears one and only one theta-role.

- It also violates UTAH (a.): Each Theta-position is associated with a specific theta role, on the "one and only one" interpretation of "specific".

- Before further examination of the proposal, let us see why other possible theories don't cut it.

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[2]Myler & Mali (2021) (independently) propose a similar nonspecific role to account for the variability in the SpecVoiceP's interpretation in isiXhosa's, although the existential ranges over fewer roles in their account.

- Minimally, there are two syntactic relations: MERGE and AGREE. If the choice of the second thematic role for *kun* is determined syntactically, then it has to be the result of one of these two processes. Let's start with Agree.

2.1 Agree theories

- Given that two entities are linked (in some fashion), one could entertain an Agree-based theory for finding the two entities (Baker, 2022; **?**). Schematically:

(21) [AG … VR … IA]
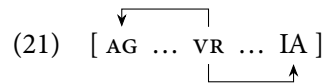
- Any Agree based theory must be subject to the intervention condition: Given two nominals such that one asymmetrically c-commands the other, and the probe c-commands both, the higher nominal should always be the goal for VR's probe.

- This makes the right predictions for Lubukusu:

(22) *Lubukusu*

    a. Maria a-a-i-elesy-a   omw-eene si-anua
        Maria CL1-PST-REFL-gave-FV CL1-own   CL7-gift
        'Maria gave herself a gift'

    b. *Yohana a-a-i-okesy-a   bab-aana omw-eene
        John   CL1-PST-REF-show-FV CL2-child CL1-own
   'John showed the children himself'

(23) [AG … VR … IO … DO]
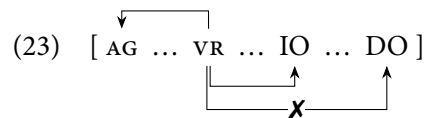
- But not for Telugu. In a ditransitive, there is no restriction on which thematic role can be equated to the agent (24). Similarly for the direct object, and what might be an applied object (25).

(24) a. miina tana-ku tanu pustakam ičču-kun-in-di
        miina 3SG-DAT 3SG book   give-VR-PST-3FS
        'Meena gave the book to herself'

    b. miina kumari-ki   tana-ni tanu ičču-kun-in-di
        miina kumari-DAT 3SG-ACC 3SG give-VR-PST-3FS
   'Meena gave herself to Kumari'

(25) a. vaḷḷu ravi-kosam tama-ni tamu koṭṭu-kunn-aa-ru
        3PL ravi-FOR   3PL-ACC 3PL hit-VR-PST-3PL
        'They hit themselves for Ravi's benefit'

    b. vaḷḷu tama-kosam tamu ravi-ni   koṭṭu-kunn-aa-ru
        3PL 3PL-FOR   3PL ravi-ACC hit-VR-PST-3PL
        'They hit Ravi for their own benefit'

(26) [AG … VR … IO … DO]
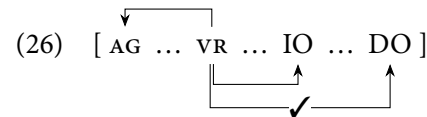
- To get around this, we can try and relativize the probing to find indices, or features specific to anaphors (like Safir's 2014 D-bound).

- This won't do either. (27) has three anaphors: a beneficiary, a location and a theme. Once again, there is no restriction on which anaphor (or thematic role) can enter into *kun*'s reflexivity.

(27) amit   tana-kosam tanu tana-lo   tanu tana-ni   tanu
     amit   3MS-BEN   3MS   3MS-LOC 3MS   3MS-ACC 3MS
     poguḍu-kunn-aaḍu
     praise-VR-PST-3MS
     'Amit praised himself in himself for his own benefit'

(28) [AG … VR … BEN … LOC … THE]
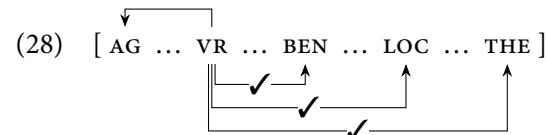
- (27) is fine in all the contexts below. Recall that *kun* disallows proxy readings. Proxy readings, however, are generally possible with anaphors. So whichever thematic role cannot receive a proxy reading, that's the second role in *kun*'s reflexivity.

  – **Context 1: Benefactive and Locative Proxies**
    There is a wax museum shaped like Amit. While standing inside this museum shaped like **him**, Amit finds out that the museum has run out of space

and hence is planning on getting rid of some statues. To prevent **his statue** from being melted/sold, Amit praises *himself* in the hope that the museum admin realise his importance and the value his statue adds to the museum.

- **Context 2: Locative and Theme Proxies**

  There is a wax museum shaped like Amit, which he also owns. While standing inside this museum shaped like **him**, Amit sees a group of visitors near a life-sized statue of his own. He goes on to praise **his statue** and the skill that went into it, in the hopes that these visitors get more of their friends to visit the museum – in the end benefiting *him*.

- **Context 3: Benefactive and Theme Proxies**

  Amit owns a wax museum. One day, Amit finds out that museum has run out of space and hence needs to get rid of some statues. The two options are his own statue and that of a footballer. While mulling over his choices, he praises the craftsmanship of his own statue. Retaining it would also benefit the statue because there is no anti-melt coating on it, whereas the footballer's does. So, this *internal monologue* praising **his statue** has the added advantage of benefiting **his statue**.

- An Agree theory would predict that the highest anaphor should always be interpreted as a non-proxy, contrary to fact.

2.2 Movement Theories

- If not Agree, then perhaps (Internal) Merge.

- We can entertain two possible movement theories

  1. **Phrasal Movement:**
     kun requires that some nominal (other than the agent) be internally merged into its specifier. Merge is free, so it doesn't restrict which DP/PP can move, like the Agree theories.
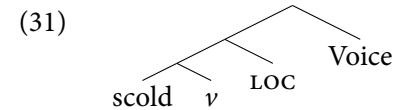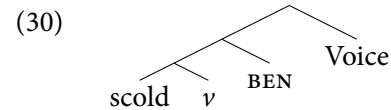
  2. **Head Movement:**
     Each thematic role is introduced by a particular head. If the head moves to Voice, then the agent and the holder of the head's thematic role are interpreted as being identical.
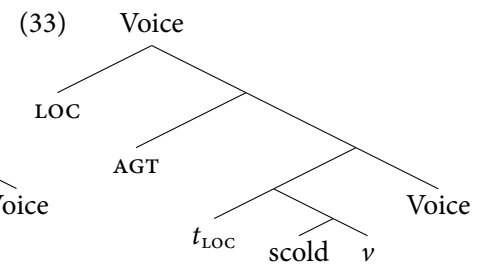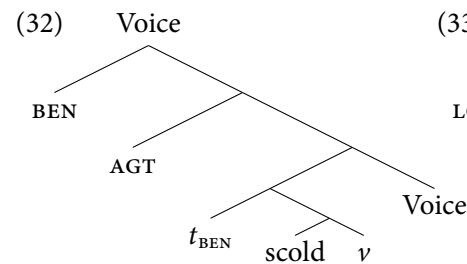
- Ellipsis facts argue against both these theories.

(29) akhil sameer-ni tiṭṭu-kun-aa-ḍu. rohan kuuḍa
      akhil sameer-ACC scold-VR-PST-3MS. rohan ALSO
      'Akhil scolded Sameer. Rohan did too.'
      ⇝ 'Akhil scolded Sameer for Akhil's benefit. Rohan scolded Sameer silently'

- The relevant reading for (29) is one where the antecedent is interpreted with agent=beneficiary with the elided clause interpreted as agent=location. (This is one among many other possible readings.)

- (29) shows that the second role in the elided clause's *kun* need not be the same as the second role in the antecedent.

- If the thematic variability of *kun* is due to different applicative heads (presumably silent) moving to Voice, the structures for the antecedent and elided clause should be as follows, and hence ruled out (Rudin, 2019):

(30)   (31)
```
        ___Voice                          ___Voice
       /    \                            /    \
      /      BEN                        /      LOC
   scold   v                        scold   v
```

- The structures below represents a possible analysis of *kun* where instead of different applicative heads, the thematic variability were due to different (possibly silent) anaphors in the syntax that associate with *kun* via movement.

(32)   Voice   (33)   Voice
```
      /    \                             /    \
    BEN     \                          LOC     \
    /        \                         /        \
  AGT         \                      AGT         \
   \         Voice                    \         Voice
    \        /   \                     \        /   \
 t_BEN   scold  v                   t_LOC   scold  v
```

- First, any theory of movement that depends on Agree will face the same problems as we saw in the last section.

- Assuming movement is free, on these accounts, agent=beneficiary readings arise when the beneficiary anaphor moves to the specifier of Voice. *Mutatis mutandis* for agent=locative.

- The possibility of different anaphors moving is what's behind the thematic variability observed (we can think of this as an extension of Ahn's (2015a) proposal for Kannada).

- Such an account also has trouble accounting for (29) since the posited structures in the antecedent and elided clauses are not identical.

- When the anaphors are overt, the relevant reading of (29) is unavailable.

(34) akhil sameer-ni **tana-lo tanu** tiṭṭu-kun-aa-ḍu. rohan kuuḍa
akhil sameer-ACC **3SG-LOC 3SG** scold-VR-PST-3MS. rohan ALSO
'Akhil₁ scolded Sameer silently. Rohan did too.'
⤳'Akhil₁ scolded Sameer silently. Rohan scolded Sameer silently too.'
⤳̸ 'Akhil scolded Sameer silently. Rohan₂ scolded Sameer for his₂ benefit'

- Moreover, these accounts fail to explain the conjunction facts:

(35) *One conjunct is an anaphor*
* akhil **tana-ni tanu** mariyu uma-nu tiṭṭ-kun-aa-ḍu
akhil 3SG-ACC 3SG and uma-ACC scold-VR-PST-3MS
'Akhil scolded himself and Uma'

(36) *Both conjuncts are anaphors*
pillalu **tama-ni tamu** mariyu **okari-ni okaru** tiṭṭ-kun-aa-ru
child.PL 3PL-ACC 3PL and one-ACC one scold-VR-PST-3PL
'The children scolded themselves and each other'

- While the ungrammaticality of (35) follows on these accounts, the same need to move to SpecVoice must apply equally to both conjuncts in (36) and hence, be ungrammatical — contrary to fact.

- Finally, as we will soon see there is no way of capturing the lack of proxy readings on these theories.

- Movement is not what's behind *kun*'s properties, especially Thematic Variability.

2.3 Underspecification Theories

- It could be the case that the second role associated with *kun* is some underspecified role, an umbrella role that covers all internal argument roles, say INTERNAL.

- Underspecified roles should be compatible with mixed role scenarios the way verbal reflexives allows mixed reflexive-reciprocal scenarios, or how polysemous items behave.

(37) abbayilu poguḍu-**kunn**-aa-ru
boys praise-VR-PST-3PL
a. 'The boys praised themselves'
b. 'The boys praised each other'
c. 'Some boys praised themselves and some boys praised each other'
d. 'The boys praised themselves and each other'

(38) The students write books.

- But unlike mixed reflexive-reciprocal scenarios, mixed role scenarios aren't compatible with *kun*

(39) pillalu poguḍu-kunn-aa-ru
children praise-VR-PST-3PL
'The children praised {themselves, someone else for their own benefit}'
*Some praised themselves and some others praised *x* for their own benefit

3 Some derivations, and Thematic Uniqueness

- Given that none of these theories make the right predictions, it seems to me that the best way to go about it is to formalize the descriptive generalization

- *kun* establishes reflexivity between agent and some other thematic role.

(40) ⟦kun⟧ = $\lambda x \lambda e.$ agent $x\,e \wedge \exists R \in \Theta' : R\,x\,e$

(41) $\Theta = \{$ Agent, Theme, Goal, Loc, Ben, Instr, Cause, (…) $\}$

(42) $\Theta' = \Theta - \{$Agent$\}$

- Let us work through some derivations to see how this system works, starting with the simpler case of agent=location/beneficiary.

(43) himanish Akhil-ni poguḍu-kunn-aa-ḍu
himanish Akhil-ACC praise-VR-PST-3MS
'Himanish praised Akhil { silently, for his own benefit}'

(44)

VoiceP
$\lambda e.\ \text{praise}\ e \wedge \text{theme a}\ e \wedge \text{agent h}\ e \wedge \exists R \in \Theta' : R\,\text{h}\,e$

- DP: *Himanish* — h
- Voice′: $\lambda x \lambda e.\ \text{praise}\ e \wedge \text{theme a}\ e \wedge \text{agent}\ x\,e \wedge \exists R \in \Theta' : R\,x\,e$
  - VP: $\lambda e.\ \text{praise}\ e \wedge \text{theme a}\ e$
    - DP: *Akhil* — a
    - V: *poguḍu* — $\lambda x \lambda e.\ \text{praise}\ e \wedge \text{theme}\ x\,e$
  - Voice: *kun* — $\lambda x \lambda e.\ \text{agent}\ x\,e \wedge \exists R \in \Theta : R\,x\,e$
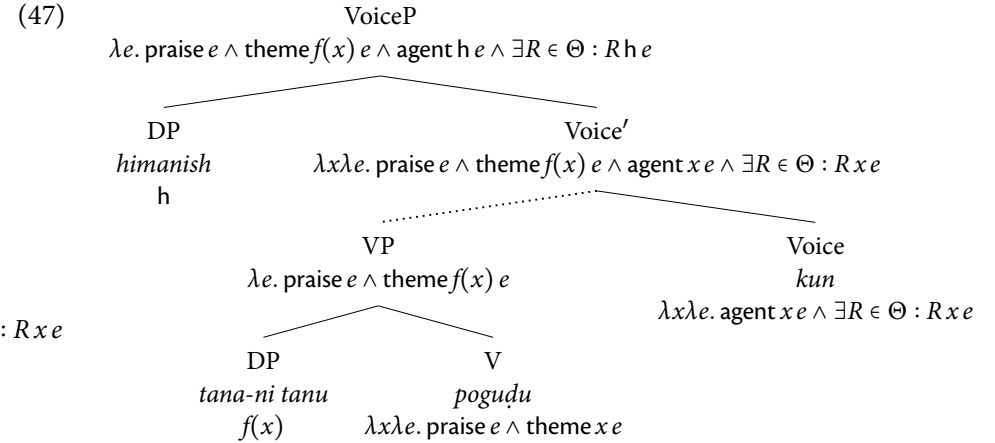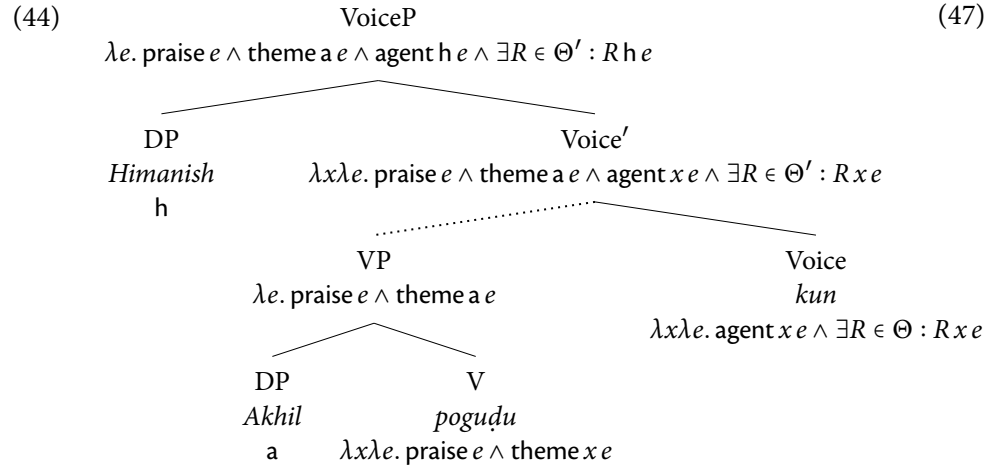
(45) $[\![(43)]\!] = \exists e.\ \text{praise}\ e \wedge \text{theme a}\ e \wedge \text{agent h}\ e \wedge \exists R \in \Theta' : R\,\text{h}\,e$

   a. $\exists e : \text{praise}\ e \wedge \text{theme a}\ e \wedge \text{agent h}\ e \wedge \text{location h}\ e$

   b. $\exists e : \text{praise}\ e \wedge \text{theme a}\ e \wedge \text{agent h}\ e \wedge \text{beneficiary h}\ e$

- There is no anaphor in the structure above, and that's not a problem since the second role comes directly from *kun*.

- How does this work, though, when there *is* an anaphor in the structure? The most common of these cases is agent=theme reflexivity, but the same principles apply for cases when there is an overt 'applied' anaphor:

(46) himanish tana-ni tanu pogudu-kunn-aa-ḍu
       himanish 3SG-ACC 3SG praise-VR-PST-3MS
       'Himanish praised himself'

(47)

VoiceP
$\lambda e.\ \text{praise}\ e \wedge \text{theme}\ f(x)\ e \wedge \text{agent h}\ e \wedge \exists R \in \Theta : R\,\text{h}\,e$

- DP: *himanish* — h
- Voice′: $\lambda x \lambda e.\ \text{praise}\ e \wedge \text{theme}\ f(x)\ e \wedge \text{agent}\ x\,e \wedge \exists R \in \Theta : R\,x\,e$
  - VP: $\lambda e.\ \text{praise}\ e \wedge \text{theme}\ f(x)\ e$
    - DP: *tana-ni tanu* — $f(x)$
    - V: *poguḍu* — $\lambda x \lambda e.\ \text{praise}\ e \wedge \text{theme}\ x\,e$
  - Voice: *kun* — $\lambda x \lambda e.\ \text{agent}\ x\,e \wedge \exists R \in \Theta : R\,x\,e$

(48) $[\![(46)]\!] = \exists e.\ \text{praise}\ e \wedge \text{theme}\ f(x)\ e \wedge \text{agent h}\ e \wedge \exists R \in \Theta : R\,\text{h}\,e$

   a. **Proxy interpretation**
      $\exists e : \text{praise}\ e \wedge \text{theme}\ f(x)\ e \wedge \text{agent h}\ e \wedge \text{location h}\ e$

   b. **No proxy interpretation**
      $\exists e : \text{praise}\ e \wedge \text{theme}\ f(x)\ e \wedge \text{agent h}\ e \wedge \text{theme h}\ e$

- Following Lidz (2001) and Reuland & Winter (2009), I assume here that proxy interpretation is the result of a 'proxy generator'. This is a patently unsatisfactory account of these readings, but all that we need here is a distinction at LF between the representation of an anaphor and the representation of the holder of the second thematic role contributed by *kun*.[3]

- When the anaphor *is* present, there are two possible interpretations. The simpler case is when the anaphor receives a proxy interpretation (48a)

- As long as the nonspecific role is precisified to any role other than theme, a proxy interpretation is possible.

- As for the non-proxy interpretation (48b), something more needs to be said.

- Since *kun* here contributed agent=theme reflexivity, no proxy reading of the anaphor is allowed, but the possibility of proxy readings is the default for anaphors (and all other nominals).

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[3]Note that something similar needs to be said for the classic examples of *John shaved* and *John shaved himself* too. A distinction at LF is necessary.

- I suggest that the anaphor's freedom is constrained by the fact that the interpretation of *himanish* on which the anaphor is dependent, fixed, and the constraint of Thematic Uniqueness (Carlson, 1984).

(49) **Unique Role Requirement** (Landman, 2000, p. 38)
   If a thematic role is specified for an event, it is uniquely specified

- Notice that this second derivation violates both conditions of UTAH and both conditions of the Theta Criterion.
- Since *kun* assigns two roles, the requirement that each argument/position be associated with only one role is violated.
- Since theme is held by two different syntactic arguments, and assigned at two different positions (one by the verb, and the other by *kun*), the requirement that each role be associated with one position/argument is also violated.

4 Conclusion

- I showed that Agree and Movement based theories cannot account for all properties of the Telugu verbal reflexive.
- I argued that the best treatment of *kun* is as a Voice head that introduces the agent and some other thematic role.
- Given that it introduces more than more thematic role, it violates UTAH (a.) and Theta (a.).
- Given that anaphors can co-occur with *kun*, and the latter can restrict the former's interpretation, the subject and the anaphor must have the same thematic role, violating Theta (b.). Since anaphors and subjects are merged in different positions, UTAH (b.) is also violated.
- UTAH and the Theta Criterion are not valid empirical generalizations.

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A   Optionality of the reflexive

- We noted earlier that with *kun*, the anaphor is optional even in agent=theme reflexivity.

- Assuming the lack of an overt anaphor signals the lack of a direct object in the syntax, there are a few different possibilities for modelling the facts. I have found no reason (yet) to choose one over the other, so here I assume that the internal role is never introduced:

(50)   himanish pogudu-kunn-aa-ḍu
       himanish praise-VR-PST-3MS
       'Himanish praised himself'

(51)

VoiceP
$\lambda e.\, \mathsf{praise}\, e \wedge \mathsf{agent}\, \mathsf{h}\, e \wedge \exists R \in \Theta : R\, \mathsf{h}\, e$

DP *himanish* h

Voice′
$\lambda x \lambda e.\, \mathsf{praise}\, e \wedge \mathsf{agent}\, x\, e \wedge \exists R \in \Theta : R\, x\, e$

VP *poguḍu*
$\lambda x \lambda e.\, \mathsf{praise}\, e$

Voice *kun*
$\lambda x \lambda e.\, \mathsf{agent}\, x\, e \wedge \exists R \in \Theta : R\, x\, e$

(52) $[\![(50)]\!] = \exists e : \mathsf{praise}\, e \wedge \mathsf{agent}\, \mathsf{h}\, e \wedge \exists R \in \Theta : R\, \mathsf{h}\, e$

   a. $\exists e : \mathsf{praise}\, e \wedge \mathsf{agent}\, \mathsf{h}\, e \wedge \mathsf{theme}\, \mathsf{h}\, e$

B   Anticausative use

- Like in many other languages, the same string used to mark reflexives is also found on marked anticausatives in Telugu:

(53)   a.   suma talupu moos-in-di
            suma door   close-PST-3NS
            'Suma closed the door'

       b.   talupu moosu-**kun**-in-di
            door   close-VR-PST-3NS
            'The door closed'

- At least two reasons to think this is homophony, and not underlying identity:

- The anaphor is disallowed on this use, and a reflexive interpretation is disallowed:

(54)   talupu (* dan-ni   adi) moosu-**kun**-in-di
       door   3NS-ACC 3NS   close-VR-PST-3NS
       'The door closed (* itself)'

- Has a different meaning. It contributes a *no agent* presupposition. (Note that the predicate *virugu* 'break' can be optionally suffixed with *kun*)

(55)   addam   virig-in-di
       window break-KUN-PST-3NS
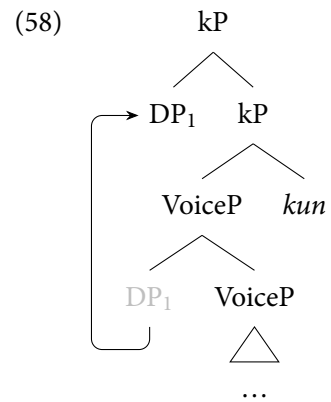   'The window broke'

(56)   addam   virugu-kun-in-di
       window break-KUN-PST-3NS
       'The window broke'

(57)   HWAM! I didn't know windows could break by themselves

- (56) can be followed up with (57) but not (55). I suggest that the *by themselves* in (57) is the presupposition contributed. It can be filtered with an overt *by themselves*.

- Anitcausative *kun* clearly differs in its meaning from reflexive *kun*.

9

C   Middles and movement

- Instead of making *kun* the Voice head, and letting it introduce two roles, we can imagine *kun* c-commanding a Voice head, and then associating with the agent, perhaps via movement. This is the route Sundaresan (2012) and Ahn (2015b) take.

(58)

```
              kP
            /    \
        DP₁      kP
                /    \
          VoiceP      kun
          /    \
      DP₁     VoiceP
                △
                …
```

- Such an account fails to predict the agent orientation, for when the agent is absent, say with experiencer subject verbs, the experiencer is now associated with *kun* and we know that can't be true.