Ellipsis resistance and focus intonation in Japanese

Ryuta Ono・Doshisha University

NELS 55 @ Yale

Introduction

- Japanese has Argument Ellipsis (AE), which directly targets grammatically required arguments such as subjects and objects (Oku 1998, Saito 2007, Takahashi 2007, a.o.).
- There are notable exceptions to AE: One case is wh-arguments (Sugisaki 2011, Ikawa 2013). With (1a-b) as its antecedents, (1c) cannot be interpreted as a wh-question:

(1) a. Taro-wa nani-o anotoki mita no?   b. Furamingo-dayo
     Taro-TOP what-ACC at.that.time saw Q   flamingo-COP
     'What did Taro see at that time?'   'Flamingos.'
    c. * Zyaa, Hanako-wa Δ mita no?
        then Hanako-TOP   saw Q
        '(Int.) Then, what did Hanako see?'

- The study argues that such items' ellipsis resistance is best explicated in the eyes of prosody, in particular, focus intonation (Ishihara 2003).
- Another aim of the study is to show that focus intonation is at work even in ellipsis sites, which offers a novel consequence for a hotly debated topic of an underlying mechanism responsible for AE, i.e., LF-Copy, PF-deletion, null pronoun, etc.

Focus Intonation in Japanese

- Focus intonation in Japanese (Nagahara 1994, Deguchi & Kitagawa 2002, Ishihara 2003, 2007, Sugahara 2003, a.o.) consists of two prosodic phenomena in (2):

(2) **Focus intonation pattern (FIP)**:   (Ishihara 2003: 33)
    a. P(rosodic)-focalization
       The F_0 peak of an element bearing FOCUS is raised (i.e., F_0-boosting).
    b. Post-FOCUS reduction
       The F_0 peaks of the material after the element bearing FOCUS are lowered.

- Wh-questions in Japanese consist of a wh-phrase and its associated Q-particle (*no* or *ka*). The scope of wh-questions is syntactically determined by a Q-particle.
- F_0 peak on a wh-phrase is raised and the subsequent domain undergoes F_0-reduction.
- Ishihara (2003) argues that the FIP prosodically functions as a wh-scope-marker on a par with Q-particles and puts forward (3):

(3) **FIP-Wh-scope Correspondence (FWC)**:   (Ishihara 2003: 59)
    The domain of FIP corresponds to the scope of wh-question.

(4) a. Naoya-wa [Mari-ga nani-o nomiya-de nonda to] imademo omotteiru no?
       Naoya-TOP Mari-NOM what-ACC bar-LOC drank C even.now think   Q
       'What$_i$ did Naoya still think that Mari drank t_i at the bar?'
    b. Naoya-wa [Mari-ga nani-o nomiya-de nonda ka] imademo oboeteiru
       Naoya-TOP Mari-NOM what-ACC bar-LOC drank Q   even.now remember
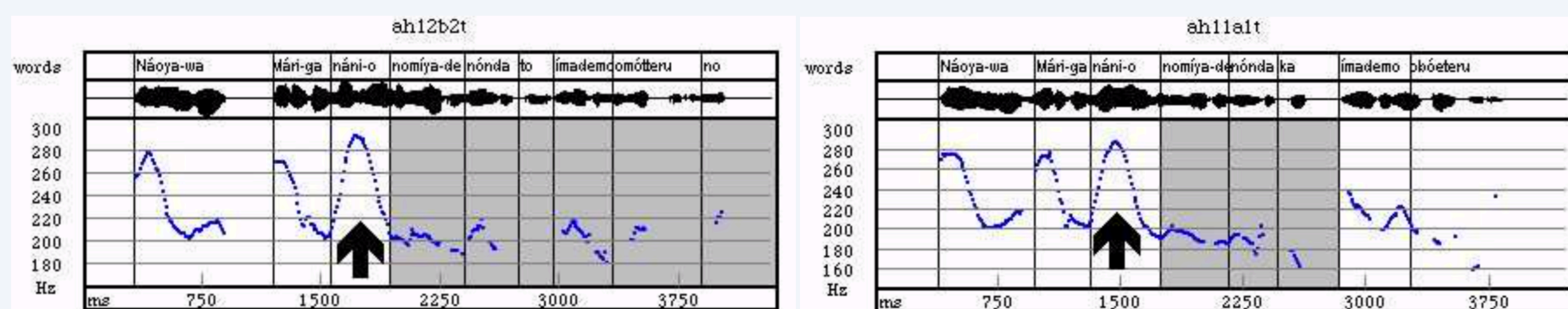   'Naoya still remembers what$_i$ Mari drank t_i at the bar.'
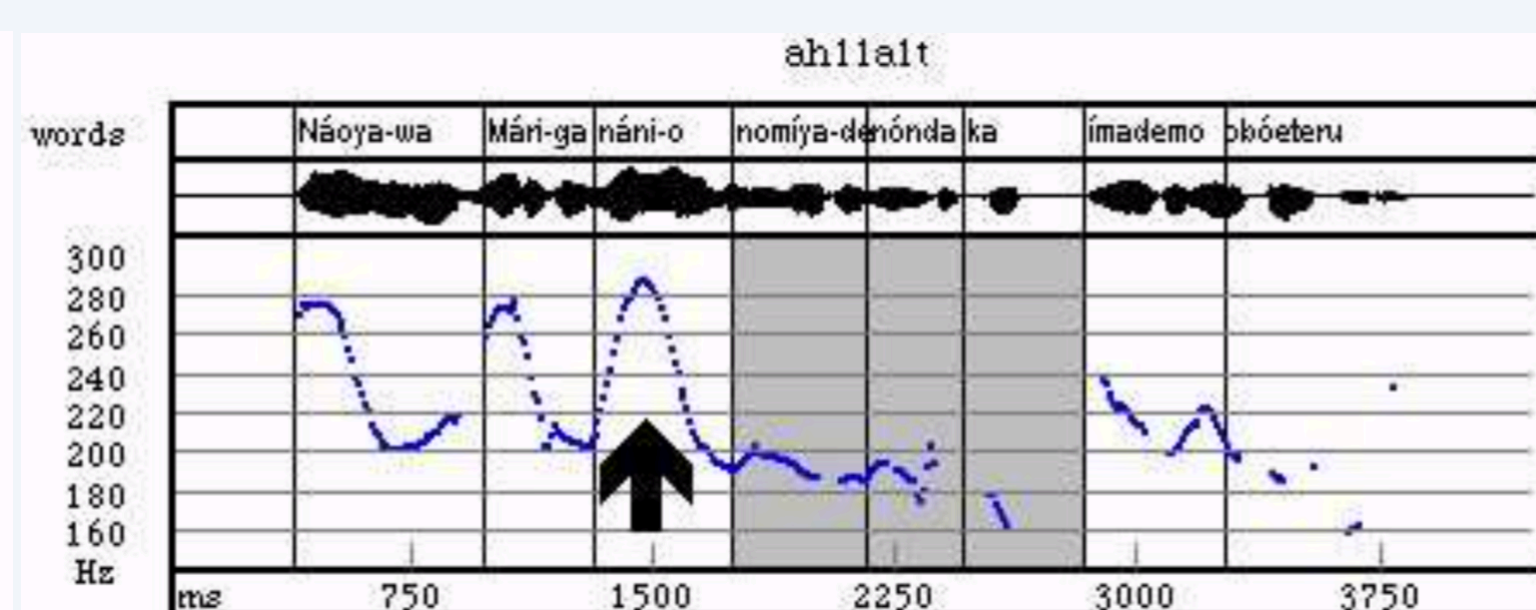

Figure 1: F_0 contour of (4a)

Figure 2: F_0 contour of (4b)

- Notice that Figure 2 exhibits the so-called pitch reset effect: The pitch reduction is canceled after the Q-particle *ka*, which marks the end of the wh-scope.

Claim

- Based on (3), the study puts forward the following condition:

(5) **Requirement of maintaining FIP-Wh-scope Correspondence**:
    FIP-Wh-scope Correspondence (FWC) must not be disrupted.

Focus intonation meets ellipsis resistance

Wh-questions

- Wh-arguments' ellipsis intolerance (cf. (1c)) is now accounted for by (5) because the omission of *nani* 'what' destroys the FWC (3).
- The analysis predicts that ellipsis of embedded interrogative clauses like (4b) is possible because it does not run against (5) ⇝ **Right**: (6b)

(6) a. Mari-wa [Ai-ga nani-o nonda ka] anohi   tazuneta
       Mari-TOP Ai-NOM what-ACC drank Q   that.day asked
       'Mari asked that day what Ai drank.'
    b. Ken-mo Δ anohi   tazuneta
       Ken-also that.day asked
       'Ken also asked that day Δ.'
    b'. * Ken-mo [Ai-ga Δ nonda ka] anohi   tazuneta
         Ken-also Ai-NOM drank Q   that.day asked
         '(Int.) Ken also asked that day what Ai drank.'

- The striking contrast between (6b) and (6b') may be similar in nature to the so-called ellipsis-as-rescue observations (cf. island-repair) (Ross 1969).

Wh ... mo constructions

- A wh-phrase, when used with a particle *-mo*, serves as an NPI (Kuroda 1965):

(7) Naoya-wa [Mari-ga nani-o nomiya-de nonda to]-mo Ai-ni iwanakatta
    Naoya-TOP Mari-NOM what-ACC bar-LOC drank C-MO Ai-DAT not.said
    'Naoya didn't say to Ai that Mari drank anything at the bar.'

- Ishihara (2003) observes that this construction, though different from a wh-question, exhibits focus intonation. If this is right, it is expected that ellipsis resistance kicks in when ellipsis targets a wh-phrase.
    ⇝ **Right**: Ikawa (2013) observes that the ellipsis is not possible:

(8) a. John-wa [Mary-ga nani-o homete mo] yorokoba-na-katta
       John-TOP Mary-NOM what-ACC praise MO happy-NEG-PAST
       'John was not happy no matter what Mary praised.'
    b. * Bill-wa [Lucy-ga Δ homete mo] yorokoba-na-katta
         Bill-TOP Lucy-NOM   praise MO happy-NEG-PAST
         '(Int.) Bill was not happy no matter what Lucy praised.'

-Sika-phrases

- *-Sika* is an NPI that occurs with negation for its licensing (Tanaka 1997).
- It is claimed that –*sika*-phrases are ellipsis-intolerant (Ikawa 2013, Mizuno 2022).

(9) a. Kinoo   Ken-sika ko-na-katta   b. * Kyoo-mo Δ ko-na-katta
       yesterday Ken-SIKA come-NEG-PAST   today-also come-NEG-PAST
       'Yesterday, no one but Ken came.'   '(Int.) Today, too, no one but Ken came.'

- In fact, Ishihara (2007) argues that –*sika*-phrases exhibit focus intonation. If this is right, the ungrammaticality of (9b) is a natural corollary of (5).

-Dake-phrases

- *-Dake* in Japanese is a non-NPI counterpart of *-sika* translated as *only*.
- Whether –*dake*-phrases can be elided is contentious (Sato 2020, Oku 2023).
- Let us see that a proper context makes it clear that the ellipsis is possible:

(10) [Mari and Ken, art trainees, were responsible for washing aprons.]
     a. Mari-wa [zibun-no epuron-dake] aratta
        Mari-TOP self-DAT apron-only   washed
        'Mari washed only her apron.'
     b. Ken$_i$-mo Δ aratta.
        Ken-also   washed
        (?* Demo, pro$_i$ hoka-no-ni   nanbai-mo   zikan-o kaketa)
            but   other-GEN-DAT many.times-also time-ACC spent
        '(Int.) Ken also washed Δ. But he spent many times more time on other aprons.'

- If the –*dake*-inclusive reading is possible, it yields infelicity. This is so because Ken must not have washed aprons of others when the elided object is construed as *zibun-no epuron-dake* 'only his apron'.

- In fact, no focus intonation is observed in –*dake*-phrases, aligning with the judgement in (10b) (**Figure 3**). This is naturally expected from (5).
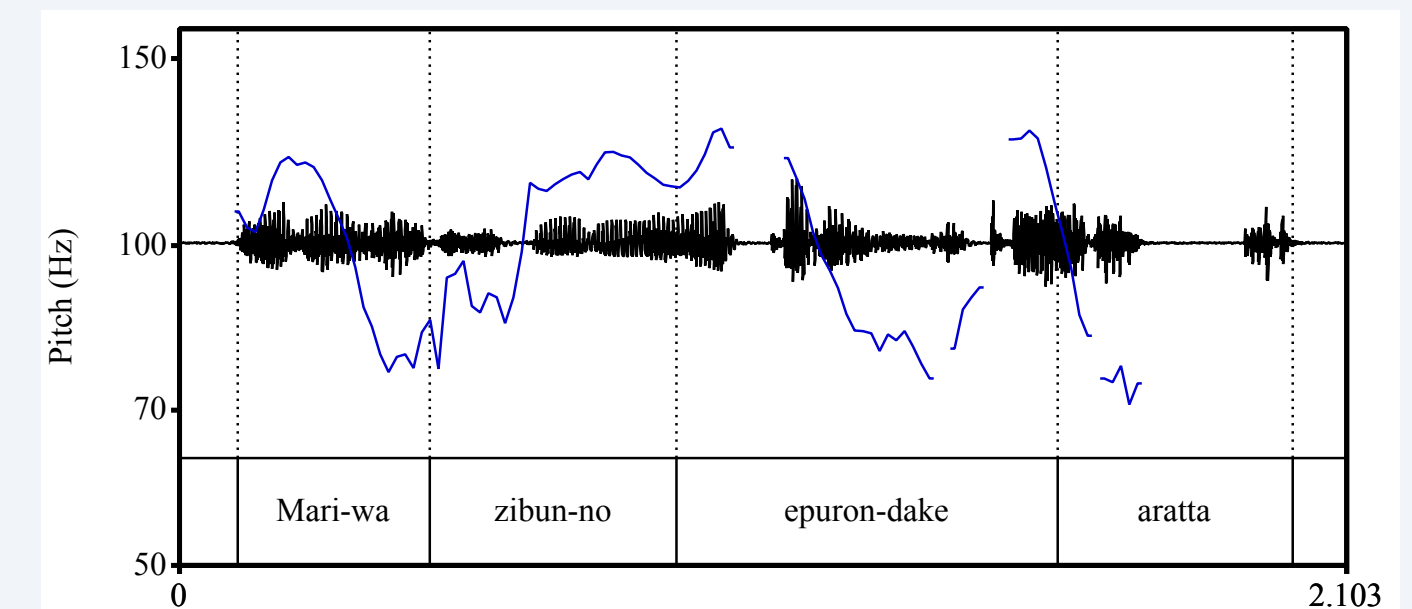

Figure 3: F_0 contour of (10a)

Ellipsis masks focus intonation

- I argue that focus intonation is at play even though the relevant domain is phonologically missing. One such example is an indirect wh-question:

(11) a. Makoto-wa [Mari-ga nani-o ie-de   nonda ka] anotoki oboeteita
        Makoto-TOP Mari-NOM what-ACC home-in drank Q   that.time remembered
        'Makoto remembered at that time what Mari drank at home.'
     b. Naomi-wa Δ anotoki oboeteinakatta
        Naomi-TOP that.time not.remembered
        'Naomi didn't remember at that time Δ.'

- The pitch tracks of (11a-b) (**Figure 4** and **5**) show that each of the matrix adverbs *anotoki* 'that time' marks the almost parallel F_0 height (132 Hz vs. 126 Hz).

- Let us now consider (12), where focus intonation is irrelevant (i.e., declarative):

(12) a. Makoto-wa [Mari-ga nanika-o   ie-de   nonda to] anotoki itta
        Makoto-TOP Mari-NOM something-ACC home-in drank C   that.time said
        'Makoto said at that time that Mari drank something at home.'
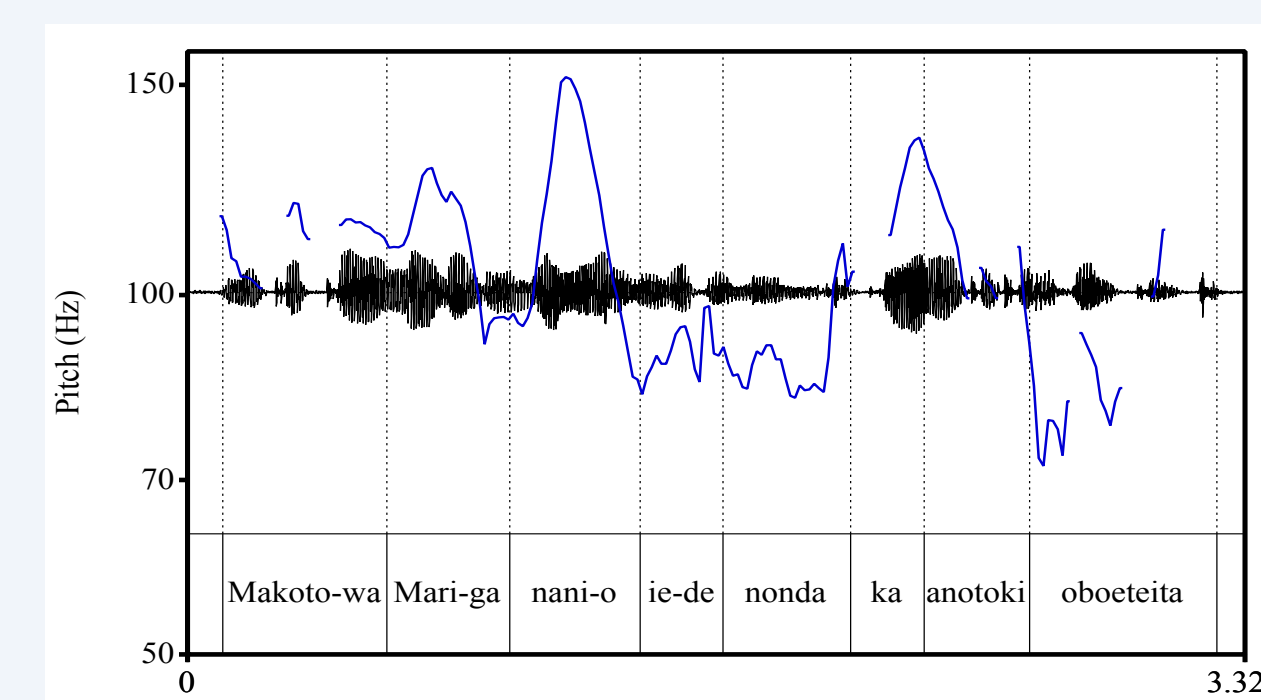   b. Naomi-wa Δ anotoki iwanakatta
        Naomi-TOP that.time not.said
        'Naomi didn't say at that time Δ.'   (see **Figure 6** and **7**)

- The pitch height on *anotoki* 'that time' in (12a-b) is 112 Hz and 105 Hz, respectively.
- It is a mystery that the pitch values of (11b) and (12b) is rather different (126 Hz vs. 105 Hz) even though they consist of the same order (i.e., subject-Δ-adverb-verb).
- **This line of observation is expected if the ellipsis position has full-fledged structure in narrow syntax, where computation of focus intonation (Ishihara 2003) is done, and it is phonologically deleted at the PF component.**
    ⇝ This analysis predicts the "pitch reset" effect found in *anotoki* in (11b) as a by-product of focus intonation.

- If the argument so far is right, AE should be explained by PF-deletion (Takahashi 2020), but not LF-Copy (Oku 1998) and null pronoun (Kasai 2014), because the latter two analyses have no way to predict the observed "pitch reset" effect.

Figure 4: F_0 contour of (11a)

Figure 5: F_0 contour of (11b)
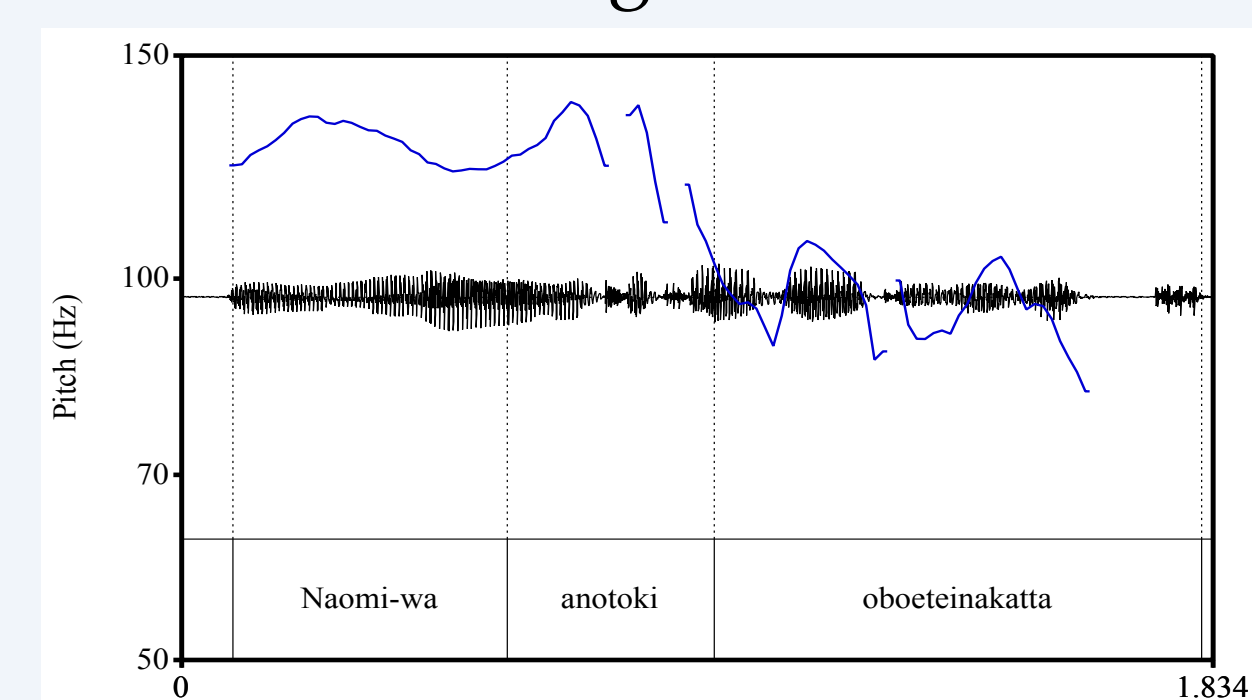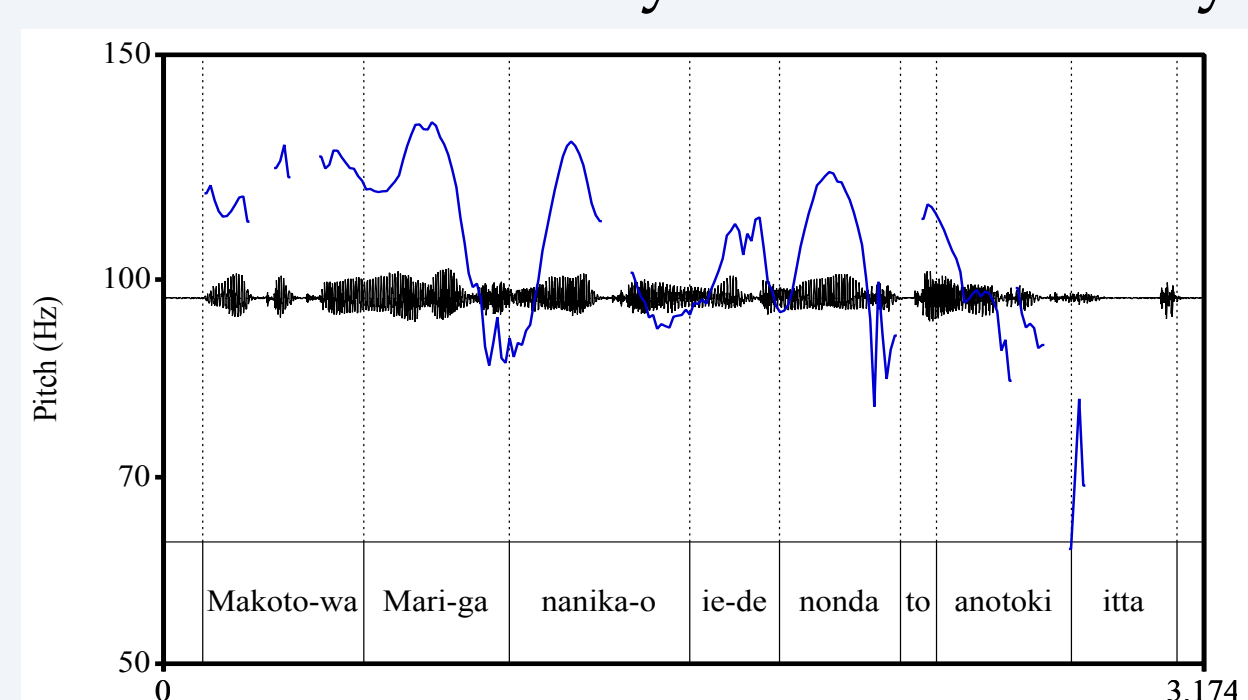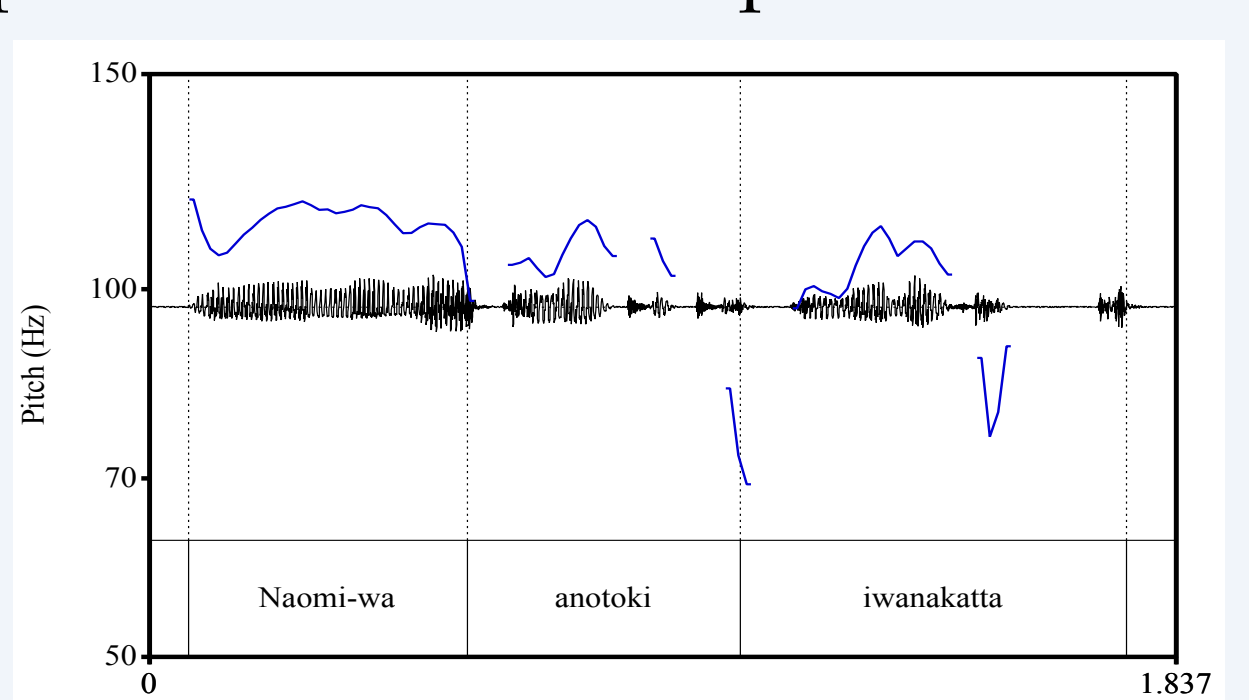

Figure 6: F_0 contour of (12a)

Figure 7: F_0 contour of (12b)