# Developing a Semantic Fieldwork Project November 5, 2013

#### I. Background reading:

Lisa Matthewson. On the methodology of semantic fieldwork. http://faculty.arts.ubc.ca/lmatthewson/pdf/fieldwork.pdf

#### II. Classes:

• Tuesday, November 5:

Introduction to elicitation methods in semantics; how do semanticists conduct research?

• Thursday, November 7:

Illustrating and practicing elicitation methods, hypothesis formation, and conclusion drawing with Navajo data.

- Tuesday, November 12:
  - 1. Develop a testable hypothesis about a construction in Italian
  - 2. Establish the predictions made by your hypothesis

There will be additional times for fieldwork sessions when you are revising your hypotheses for the second JYW assignment.

## III. Assignments based on fieldwork:

## A: Lab report, to be turned in as Homework 6

In the lab report, you will work in **small groups** on a data set from a language other than English. Your task, as a group, will be to:

- (i) Come up with a **hypothesis** regarding the semantic interpretation of this particular data set
- (ii) Formulate the **predictions** that your hypothesis makes
- (iii) Construct **contexts/target sentences** to test your predictions during the elicitation sessions.

You will receive feedback on your homework lab report which will help you revise for...

#### B: Second Junior Year Writing Paper (unless you've made other arrangements)

Your second JYW assignment will be a short paper based on our fieldwork session. The final paper, based on your revised hypothesis after the elicitation sessions, is due on the last day of classes.

# **Summary of Semantic Research Methodologies Based on Matthewson (2004) and Powerpoint Slides**

#### 1. Translations

- Ask for translations of complete sentences and open-lexical words only never ask for the translation of <u>functional words</u>.
- "Try to make the source string a grammatical sentence. Assume that the result string is a grammatical sentence.
- Do not expect your consultant to conduct analysis. This includes not asking him/her to compare an English construction (or a construction of your meta-language) to one in his/her language and produce something parallel".

## 2. Judgments

- A <u>judgment</u> "is something a native speaker is qualified to give, by virtue of knowing the language" (Matthewson 2004: 399)
- <u>Comment</u> "A comment is anything else the speaker might want to say about the structure or meaning of a string" (Matthewson 2004; 399)

### **Types of judgment:**

- A. <u>Grammaticality judgments</u> Commonly used in syntax; test whether a sentence is acceptable *at all* in a language or not
- B. <u>Truth value judgments</u> Test whether a sentence is True or False in a particular scenario
- C. Felicity judgments Test the acceptability of an utterance in the discourse context
- Truth value judgments have to do with truth conditions (or, asserted content). Felicity judgments relate to presupposed content (or, sometimes, implicatures).
- Record (when possible) and "take note of every single comment made by the consultant during an elicitation session. This includes statements the consultant makes about context, alternative ways of saying things, fine-grained grammaticality judgments, meanings of parts of words, comments about formality, alternative word order possibilities, etc." (Matthewson 2004)
- You may quote the comments of your consultant in your paper. See section 4.5. (page 408) in Matthewson (2004)'s paper.

# 3. A mock interview session using a verbal context

→ First, present the context <u>first</u>, then present the target sentence. For every new scenario you test, repeat the sentence <u>without modification</u> (F = fieldworker, C = consultant).

F: Say that Mary was dancing yesterday and right now she's resting. Could I say 'Mary danced'?

C: No, that's wrong.

F: Say that Mary is dancing right now. Could I say 'Mary danced'?

C: Yes, that's good.

F: Say that Mary is resting right now, but she's going to be dancing in an hour. Could I say 'Mary danced'?

C: No, that's not right.

- → Next step, part 1: Try a <u>minimally different</u> sentence in the same contexts so that you can compare your target construction with other data from the language.
  - F: Okay, say that Mary was dancing yesterday and right now she's resting. Could I say, 'Mary is dancing'?

. . .

- → Next step, part 2: Try to figure out whether the 'bad' sentences were false or infelicitous in the context. Imagine that you got the following results:
- (1) *Context:* You are riding the bus with your friend Bill talking to you about his family. He says to you, out of the blue,
  - a. My cousin looks like Elvis.
  - b. # It's my cousin who looks like Elvis.
- (2) *Context:* Your friend Bill tells you that someone in his family looks like Elvis, but he can't remember who. You are looking through photos of his family together. Bill sees one of his cousin and says,
  - a. My cousin looks like Elvis.
  - b. It's my cousin who looks like Elvis.
- Is (1b) false or infelicitous in the context? What is the difference between the two contexts? In (2) but not (1) included in the context is the information that someone in Bill's family looks like Elvis.
  - o **Intuition:** The *it*-cleft construction *it's my cousin who looks like Elvis* presupposes that there is *someone* who looks like Elvis.
- Try to 'hey wait a minute test' to see if you can target this presupposition to the exclusion of other (asserted) content.
- (3) A: It's my cousin who looks like Elvis.
  - B1: Hey, wait a minute! There's someone who looks like Elvis in your family?!
  - B2: #Hey, wait a minute! I didn't know that your cousin looks like Elvis!
- It seems like the 'badness' of (1b) is due to it being infelicitous in the context, rather than it being false.

# Illustration of Fieldwork Methodology with Navajo Modals

# 1. Background on English modality

- In all languages, you can talk about events possibly or necessarily happening.
- Modals can be **possibility** (or, 'weak') modals or **necessity** (or, 'strong') modals. *Might* is an example of a possibility modal in English, while *must* is an example of a necessity modal.
- In English, sentences modals are typically **ambiguous** (they have at least two different sets of truth conditions) between **belief**, **law**, and **ability** meanings (or some subset of these meanings).
- (1) a. The dog must be outside.
  - 1.) What you know: you haven't seen the dog inside anywhere; you searched high and low for it and haven't seen it anywhere.
  - 2.) What the rules are: the dog is required to be outside; it would be against the rules for the dog to come inside.
  - b. They dog may be outside.
    - 1.) What you know: you haven't seen the dog inside, but you're not totally sure if she's inside or outside. It's possible that she's outside.
    - 2.) What the rules are: The dog is allowed to be outside; it wouldn't be against the rules for the dog to be outside.
  - c. The dog can go outside.
    - 1.) What the rules are: The dog is allowed to be outside.
    - 2.) What the dog is physically able to do: It's legs work, it's not in a crate.
- Modals are ambiguous between a number of different readings:
  - o **Belief:** What is possible or necessary given what you know about the world.
  - o Laws: What is possible or necessary given what the rules or laws are.
  - **Ability:** What is possible or necessary given someone's abilities (e.g. physical abilities).

# 2. Introducing the Navajo Data

- There are two particles in Navajo that have been described as being 'modal': daats'i and shiji.
- Intuition from the previous literature: Willie (1996) writes that daats't is somehow 'weaker' than  $sh\tilde{t}\tilde{t}$ .

**Hypothesis 1:** *shîî* is completely equivalent to English *must. Daats'î* is completely equivalent to English *might*.

**Prediction of this hypothesis:** We will be able to use  $sh\hat{i}\hat{i}$  in any context where must is possible in English. We will be able to use  $daats'\hat{i}$  in any context where a belief use of might is possible in English.

**Testable question:** Do we find *shîî* being used in all the environments where we find English *must*? Crucially, *must* can get both belief and law readings. Do we find *daats'î* being used with both belief and law readings?

• In order to examine belief vs. law readings of modals, we used two storyboards. Storyboards are series of pictures that form a narrative designed to elicit particular sorts of constructions.

### (2) Storyboard designed to elicit law modals

Context: Mary's friends are asking if she can come out and play. Her mother gave her a number of chores to do, however.



• How would you narrate this slide in English?

- How is it narrated in Navajo? Do we see daats'i in the first sentence and shii in the second? No. We find people using constructions like the following:
- (3) Mééwii 'ání, "Doo bíighah da. leets'aa' tábi'niigiz."

  Mary says not PRT not dishes I.will.wash.them

  Free translation: Mary says, I can't do it, I'm going to wash the dishes.

I asked consultants if (4) was possible. They said it was not.

(4) \* Mééwii 'ání, "Doo daats'í da. łeets'aa' shíí tábi'niigiz."

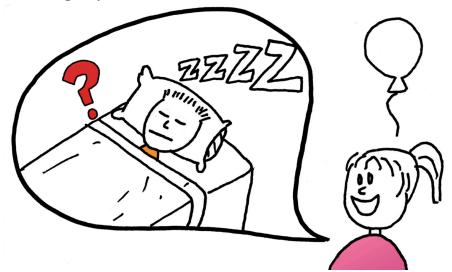
Mary says not PRT not dishes PRT I.will.wash.them

**Methodological question:** Why should I be careful about the judgment that (4) is 'bad'? What are some of the reasons why the sentence might have been rejected?

• Having found that *daats'i* and *shiji* cannot be used in contexts where we find law modals in English, I looked at belief modals in Navajo with a second storyboard.

# (5) Storyboard designed to elicit belief modals:

*Context:* George has not arrived to his birthday party. His friends are wondering why he is not there.



• How would you narrate this slide in English?

• How was this slide narrated in Navajo? Did we see people using daats'i or shij?

Yes. We found people using both.

- (6) a. K'ad hooghandi **shíi** t'óó 'ajiłhosh. now at.home PRT still 4Subj.sleeps
  - b. Jóoj daats'í t'ahdii 'ałhosh.George PRT still 3Subj.sleeps

**Hypothesis 2:** *Shī̃į* is a strong belief modal. *Daats'i* is a weak belief modal.

**Prediction of this hypothesis:** We will be able to use  $sh\tilde{i}\tilde{i}$  in any context where a belief use of *must* is possible in English. We will be able to use *daats'i* in any context where a belief use of *might* is possible in English.

**Hypothesis 3:** *Daats'i* and *shiji* interchangeable since both were volunteered in (6). Both are equivalent to *must* and *might*.

**Prediction of this hypothesis:** We can use daats'i and  $sh\tilde{i}i$  in exactly the same contexts. They are totally interchangeable.

• In order to test these hypotheses, we have to think about the differences between possibility and necessity belief modals in English.

# 2.1 Having too much direct evidence rules out the use of must

- Is the same true for Navajo daats'i and shiji?
- (7) *Context:* You see pieces of a plate on your kitchen floor.

You say: leets'aa' shii sits'il

(sentence constructed by me)

plate PRT it.broke

Comment: "You wouldn't use shij here at all. If you see the pieces, it's funny. If you just heard the sound, then it's okay."

- (8) Context: You drive past Ellen's house and see her walking past the window.
  - a. You say: Ellen shii sidá.

(sentence constructed by me)

Ellen PRT she.sits

Comment: "You see her, and say Ellen shii sida? That doesn't sound right."

b. You say: Ellen daats'í sidá. (sentence constructed by me)

Ellen PRT she.sits

Comment: "Why would you voice possibilities if the evidence is there?"

What do these data suggest about our hypotheses 2 and 3?

# 2.2 *Must*, but not *might*, can be used where the speaker have a lot of evidence for a particular conclusion

(9) *Context:* You look out the window. In the distance, you can see dark clouds gathering. You also can smell the damp pavement smell that typically precedes rain, and feel a cool breeze blowing. You tell me what you're thinking about the weather. In English, I might say 'It must be going to rain.' What would you say in Navajo?

Tł'odi **shíi** nahooniiłtah outside PRT rain

(free response by consultant)

- (10) Context: You see very fresh elk tracks in the mud while hiking. You say,
  - a. Dzééh **shíi** kóó' naaghá

(sentence constructed by me)

elk PRT here it.goes

Comment: "You can say  $sh\tilde{i}\tilde{i}$  in this context. If you don't have  $sh\tilde{i}\tilde{i}$ , then you need to see it close by. The elk is pretty close."

b. Dzééh **daats'í** kộợ naaghá

(sentence constructed by me)

elk PRT here it.goes

Comment 1: Shîî sounds better here. When you say daats'i, you're not really sure. With shîî you're more leaning to the positive that it happened.

With *daats'i* you're not really sure there's an elk around here"

Comment 2: "This sentence is also okay with daats' i - I wonder if it is still nearby."

(11) *Context:* You work indoors in an office building. There aren't any windows near your desk. You see people coming in with wet clothing and dripping umbrellas. In English, I might say 'It must be raining.'

Tł'oodi **shii** nahałtin. (free response by consultant)

outside PRT rains

Comment: "If you say daats' then it sounds like you're not too sure, you're questioning yourself."

(12) *Context:* You are playing a game with three cups. Mary asks you to figure out which cup is hiding the pebble. You have already asked her to turn over Cup 1 and Cup 2: the pebble wasn't under either one of them. You say to Mary,

Díí **shỹ** tsé biyaa si'á (sentence constructed by me) this PRT rock it.under it.sits

Comment: "You could say this. It's the last option. Shiii is more definite than daats'i, so it's good where it's the only option left."

What do these data suggest about our hypotheses 2 and 3? Does this picture change at all when we look at (13)?

(13) *Context:* You looked at the weather forecast for the upcoming week and saw the prediction for tomorrow's weather said that there is a 30% chance of rain.

Nahoodoołtíił shii.

will.rain PRT

Comment 1: "There's a possibility that it's going to rain tomorrow."

Comment 2: "With 30%, shii sounds best."

What sorts of interim conclusions might you draw here? What further data would you want to see?

# 2.3 How does daats' compare with might?

- In the following examples, how would it have sounded if you had used *might*?
- (14) *Context:* You don't know if it is raining or not. Your coworker has been in your windowless office with you all day so you know she doesn't know. You say to her,

Nahałtin daats'í

it.is.raining PRT

Free translation by speaker: 'I wonder if it's raining,' 'Maybe it's raining.'

- (15) *Context:* You went to school before your sister Mary. She was still in bed when you left. You know she had a stomachache this morning.
  - a. Mary bibid diniih. 'Ólta'góó daats'í doogááł.

    Mary her.stomach it.hurts school-to DAATS'í she.will.go
    'Mary has a stomachache. I wonder if she'll go to school…maybe she will go to school, or not.'
  - b. # Mary bibid diniih. 'Ólta'góó **shíí** doogááł.

    Mary her.stomach it.hurts school-to MODAL she.will.go
    'Mary has a stomachache. She'll probably go to school.' *Comment:* "Sounds more positive that Mary will go to school. Sounds weird unless you have 'áko ndi ('but') before the second sentence."

Do these data suggest any differences between *daats'i* and *might*? How do these data change our working hypothesis?

#### 2.4 The problem of translations of *daats'i* sentences

- Recall that one of the problems that Matthewson (2004) discusses for the use of translations as anything more than clues is that morphemes or constructions in two languages may not have perfect correspondences.
- When speakers offered free translations of sentences with *daats'i* in them, there was a lot of variation. What does this variation mean?
- (16) Nahałtin **daats'í** it.is.raining DAATS'Í
  - a. 'Is it raining?'
  - b. 'I wonder if it's raining.'
    'I don't know if it's raining or not.'
    'It might be raining.'

**Daats'i** hypothesis 1: Sentences with *daats'i* are ambiguous between questions and '*might*' sentences (or something like them, viz. §2.3).

**Prediction:** We will find sentences with *daats'i* used in the same contexts as questions in Navajo and English (assume that Navajo and English questions work the same way).

**Methodological Point:** The following materials show a variation on the 'judgment in a context method.' Here, the context includes material following the target sentence. This helps you to see what kinds of discourse situations a particular sentence is felicitous and/or true in.

- **Difference 1:** While questions (in both Navajo and English) require a response from the Addressee and are not appropriate as answers to previous questions, *daats'i* sentences can stand alone as answers and do not require replies.
- (17) *Context:* You (Speaker) and a friend (Addressee) are discussing who'll come to a party.

Speaker says:

Ted=ish yiighah Ted-Q he.will.come 'Will Ted come?'

Addressee says:

a. Ted **daats'í** yiighah c. Ted **shíí** yiighah Ted PRT he.will.come Ted PRT he.will.come

b. 'Aoo, Ted yiighah
Yes Ted he.will.come

d.# Ted=ish yiighah
Ted=Q he.will.come

- **Difference 2:** Sentences with *daats'i* are somehow sufficiently informative such that action can be taken on their basis. Questions are not.
- (18) *Context:* You (Speaker) and a friend (Addressee) are discussing what food to make for the party on the basis of which guests might come.

A: Ted daats'í yiighah

Ted PRT he.will.come

B: 'Akóshíí, dah diniilghazh ła' 'adeeshliish.

okay.then frybread some I.will.make.it

'Okay then, I will make some frybread (...because Ted likes frybread).

(19) *Context:* You (Speaker) and a friend (Addressee) are discussing what food to make for the party on the basis of which guests might come.

A: Ted=ísh yiighah

Ted=o he.will.come

'Will Ted come?

B: # 'Akóshíí, dah diniilghazh ła' 'adeeshliish.

okay.then frybread some I.will.make.it

'Okay then, I will make some frybread (...because Ted likes frybread).'

On the basis of these data, do we want to claim that one meaning of *daats'i* sentences is a question meaning? Do they function like questions?