

Certain Contractual Offers as Integrated Questions & Assertions

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1. *The Basics of Contract Formation*

For our purposes here, a **contract** is defined as a series of events via which two speakers of a language (in this case, English) come to create reciprocal rights and duties.

Example:

- (1) Speaker A: If you wash my car, I'll give you \$20.
- (2) Speaker B: I accept!

As the result of this conversation, Speaker A has a duty to pay and corresponding right to a wash; Speaker B has a reciprocal duty to wash and a corresponding right to a payment.

Of course, as linguists we're not interested in whether the law would recognize the conversation in (1) and (2) as creating a legal obligation or even whether Speaker A and Speaker B would refer to their rights and duties as a "contract." Still, some legal terminology will be helpful.

Under American law (inherited from the common law of England), in order to form a contract there must be an **offer**, an **acceptance**, and **consideration** – the last element meaning that in order for Speaker B to have right to Speaker A's performance, Speaker B must (agree to) reciprocally perform – in other words, the conversation in (3) and (4) would not result in a contract:

- (3) Speaker A: I'll give you \$20.
- (4) Speaker B. Thanks!

At first, the legal requirement of consideration appears to be just that – a legal requirement – in the sense that naïve speakers report that both of the conversations above create commitments on the part of Speaker A. (Under the law, only the first conversation creates a commitment on the Part of Speaker A to pay Speaker B \$20; in general, the only legal commitment created for Speaker A in the second conversation is to compensate B for the value of her reliance on what Speaker A said.) As for Speaker B's commitments, however, even for naïve speakers, only the first

conversation creates a commitment on the part of Speaker B to do something (other than accept the \$20, and maybe not even that). Moreover, (1) and (3) seem to differ in that speakers report that (1) creates a commitment on the part of Speaker A only upon Speaker B’s utterance of (2) or upon Speaker B’s washing of the car (call this B’s **acceptance**), whereas (3) seems to create a commitment on the part of Speaker A even in the absence of Speaker B’s utterance in (4). For these reasons, I’ll say that (1) reflects an **offer**, whereas (3) reflects a **promise**, and I’ll assume for the duration of this talk that whereas offers require acceptance and are revocable at any time before acceptance, promises don’t require acceptance and are irrevocable once made.

- | | | |
|-----|----------------------------------------------------------------------------------------------------------------------|--------------------|
| (5) | offers: are revocable and require acceptance
promises: are irrevocable and don’t require acceptance | cf. Hancher (1979) |
|-----|----------------------------------------------------------------------------------------------------------------------|--------------------|

Now, it seems that promises can be conditional, as in (6): [more on this later]

- (6) If you need money, I’ll send you \$20.

So it’s not strange to assume that contractual offers are conditional promises, with the condition being a condition of reciprocal performance from the offeree – as had more or less been assumed by linguists (and many jurists) before Buffington (2015) – see Schane (2006); Tiersma (1986, 1993).

There’s one more important legal distinction for our purposes here: the law (and legal intuition) distinguishes between **unilateral offers**, which can be accepted only via performance, not via verbal acceptance as in (2) and **bilateral offers**, which can be accepted either via performance or via verbal acceptance.

- | | |
|-----|--------------------------------------------------------------------------------------------------------------------------------------------------|
| (7) | unilateral offers: can be accepted only by performance
bilateral offers: can be accepted by performance or by verbal acceptance |
|-----|--------------------------------------------------------------------------------------------------------------------------------------------------|

The quintessential unilateral offer is a reward offer, as in (8), but non-reward examples exist, as in (9), and comparing the (8) - (10) suggests that, at least for conditional (‘if P then will Q’) sentences – arguably the linguistic archetype for contractual offers – the unilateral/bilateral distinction is pragmatic, not semantic. But we will see later that this may not be entirely true.

- | | | |
|------|----------------------------------------------------------------|--------------|
| (8) | If you find my wallet and return it to me, I’ll pay you \$500. | [unilateral] |
| (9) | If you exercise daily for a week, I’ll pay you \$500. | [unilateral] |
| (10) | If you rent me your apartment for a week, I’ll pay you \$500. | [bilateral] |

2. *Some Interesting Properties of Conditional Sentences as Contractual Offers*

Conditional ('if P then will Q') sentences as candidates for contractual offers seem to be "ambiguous" between "assertion" and "offer" interpretations:

(11) If John gives Mary some candy, she will stay up later than usual. ["ambiguous"]

This isn't surprising, since (12) is ambiguous, too, between "assertion" and "promise" interpretations:

(12) Mary will stay up later than usual. ["ambiguous"]

For both (11) and (12), the "ambiguity" seems to be located at the level of "illocution" in the theory of speech acts à la Austin (1962) & Searle (1969), and perhaps related to the phenomenon of performativity, in the sense that offers and promises have an intuitive "word-to-world" direction of fit – see e.g. Searle and Vanderveken (1985) – although this may be difficult to diagnose:

(13) That's not true! [# a response to (10) as an offer and (11) as a promise?]

Fortunately, conditional sentences have some interesting properties that reveal the "ambiguity" between "assertion" and "offer" interpretations more explicitly – specifically:

■ SEMANTIC NON-DIRECTIONALITY

As assertions, conditional sentences are naturally interpreted as involving temporal precedence of the antecedent / causation of the consequent – see e.g. Horn (2000). Not so for bilateral contractual offers; thus, in (11) neither John nor Mary necessarily performs first.

■ SYNTACTIC DIRECTIONALITY

In spite of the semantic non-directionality of contractual offers like (11), they're syntactically directional in that (11) isn't a viable candidate for a contractual offer on behalf of *John*. Cf. (14):

(14) If I give you \$20, you'll wash my car. [# as an offer]

■ REMOTENESS IN TENSE / MOOD

Just as "remoteness" in the "tense" or (subjunctive) mood of a conditional sentence is connected to remoteness in subjective probabilities [Iatridou (2000); Ippolito (2003)], remoteness in the tense

or mood of (11a) seems to be connected to remoteness in probability that an offer is being made:

(11a) If John gave Mary some candy, she would stay up later than usual. [% as an offer]

■ NEGATIVE POLARITY ITEMS

While NPI's are generally licensed in the antecedents of conditionals [von Stechow (1999) inter alia],

(11b) seems to be interpretable only as an assertion, not as an offer:

(11b) If John gives Mary any candy, she will stay up later than usual. [# as an offer]

This last fact in particular raises the possibility that “ambiguity” in (10) is “in the semantics.”

3. *Apparent Problems with a Semantic Analysis*

For the linguists who've looked at contractual offers in the past, a given locution must be semantically “equivalent” to a prototype containing the word ‘promise’ in order to qualify as a contractual offer:

(15) Schane's (original) archetype for contractual offers:

I promise that if you do X, I will do Y.

(16) Tiersma's archetype for (bilateral) contractual offers:

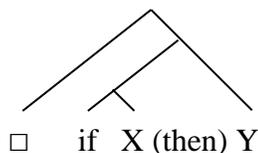
I propose that if you promise to do X, I will promise to do Y.

But given some form of the Stalnaker-Lewis analysis of conditionals, as in (17) [see e.g. Bennett (2003) for a history, and note that (1) and (11) don't involve “biscuit conditionals”]:

(17) $[[\text{if } P \text{ (then) will } Q]] = 1$ iff in all foreseeable future situations in which P is true, Q is true

it seems that we can't come up with a compositional analysis of conditionals and silent promise elements (\square) that yields that right result – i.e. we can't semantically embed the speech act:

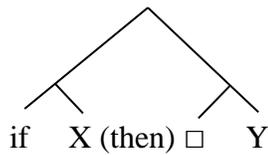
(18)



applied to (11) \approx Mary promises that if John gives candy ...

\rightsquigarrow WRONG MEANING: ■ as a promise, (18) isn't revocable – but offers are

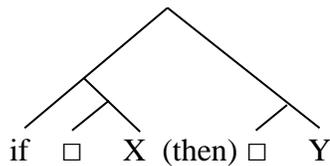
(19)



applied to (11) ≈ If John gives candy, then Mary promises...

- ~w> WRONG MEANING:
- Mary has no liability unless John gives candy
 - doesn't allow for bilateral offers

(20)



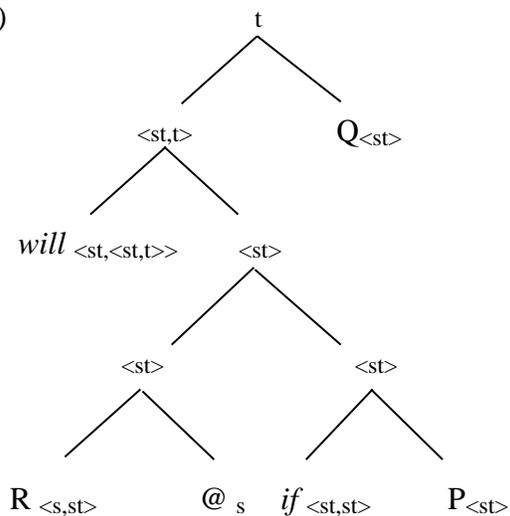
applied to (11) ≈ If John promises, then Mary promises ...

- ~w> WRONG MEANING:
- simple present tense not normally interpreted as promise
 - doesn't allow for unilateral (or bilateral) offers

So it seems that contractual offers aren't semantically equivalent to "conditional promises" in the sense of embedded speech acts, which may be a shame, since a semantic difference between assertions and offers may have helped us explain some of the data in Section 2 (esp. the NPI data).

A Kratzerian (1986, 2012) analysis of conditionals as in (21) may seem to be a more auspicious means of accomplishing a semantic analysis of the ambiguity in (11) and (12), given that that style of analysis involves an inherent connection between conditionals and modals like *will* and posits the existence of a silent variable R ranging over accessibility relations.

(21)



In such an analysis, the assertion interpretations of (11) and (12) would presumably involve R being assigned to an doxastic relation and the offer and promise interpretations of (11) and (12) respectively would involve R being assigned to a deontic relation (such that *will* is interpreted as something like *must*), with a contractual offer being nothing more than an explicit conditional where P expresses the proposition of the offeree's reciprocal performance.

However, such an analysis doesn't seem to be in a better position to explain much of data than the earlier analysis to the effect that contractual offers involve silent promise elements. For example, whereas contractual offers don't involve temporal precedence, deontic conditionals seem to:

(22) If you double park, you must pay a fine.

Perhaps more importantly, offers and promises seem to involve simultaneous doxastic and deontic accessibility relations in the sense, for example, that if Speaker A's statement in (1) were to be interpreted purely deontically, she should be able to "defend" against B's assertion for breach of contract by saying something like the following (which seems preposterous):

(23) I said that if you washed my car I'd *have to* give you \$20, not that I actually *would*.

In other words, when interpreted as a contractual offer, (1) seems to convey something like the following:

(1a) If you wash my car, I'll give you \$20 ... and if I don't, I'll be in trouble.

which raises the possibility that when conditional sentences are interpreted as contractual offers, the contractual offer interpretation results from some form of "pragmatic strengthening."

4. *A Pragmatic Sketch*

Buffington (2015) suggested that the "offer" interpretation of conditional sentences results from some form of pragmatic strengthening of "assertions." We're used to seeing "pragmatic strengthening" in connection with the negation of stronger alternatives along Horn scales, as when the utterance of (24) implicates (25):

(24) I ate some of the candy. \mapsto relevant scale: < some, all >

(25) I didn't eat all of the candy.

But other forms of pragmatic strengthening exist. For example, Buffington (2012) argues that the fact that the quantity implicature seen in (26) to (27) – in which a stronger alternative (and not its negation) is inferred from the weaker one – is more robust in the answer to a how-many question than otherwise can be better explained on the basis of a pragmatic utility calculation than on the basis of silent exhaustivity operators:

- (26) There are two coins on the table. \mapsto
(27) There are only two coins on the table.

So it doesn't seem strange to suggest that "pragmatic strengthening" can involve the move from a weaker form to a stronger form, rather than its negation, especially when we're not dealing with scales comprised of lexical alternatives. [If there's time, discuss: Horn's pinkies and thumbs.] Indeed, from a set-theoretic perspective, (27) is as stronger than (26) as (25) is than (24), so "strengthening" seems like an acceptable term to use in both cases.

Of course, we'd like to have a model of when, where, why, and how speakers (and hearers) make the move from (1) to (1a). Presumably, this sort thing happens as a function of context in connection to the **felicity conditions** for offers as well as **Gricean maxims**. For example, (11) requires a context in which the speaker has or is perceived to have authority to speak on behalf of Mary, and in which the speaker believes or is perceived to believe that Mary would like for John to give her some candy, and in which the speaker believes or is perceived to believe that John would not give Mary some candy regardless of when she goes to bed, etc. In theory, an ambitious model could be constructed to predict when the speaker would go to the trouble of saying (1a) as opposed to (1). The more modest ambition of Buffington (2015) was merely to show that the data in Section 2 could be explained in ways that are consistent with a pragmatic (i.e. non-semantic) analysis of the "ambiguity" in (11). But there are problems for a pragmatic approach to the data:

5. *Earlier Pragmatic Explanations, and Problems*

5.1. *Semantic Non-Directionality*

Buffington (2015) suggested that the lack of semantic directionality (precedence / causation) between the antecedent and the consequent of a conditional sentence interpreted as a contractual offer could be explained by the phenomenon of "conditional perfection," i.e. the conversion of *if* to IFF:

- (28) If you wash my car, I'll pay you \$20. \mapsto
 (29) If and only if you wash my car, I'll pay you \$20.

which can suppress the tendency to infer directionality from the antecedent to the consequent:

- | | |
|--------------------------------------------|-----------|
| (30) If X happens, Y will happen. | [X > Y] |
| (31) Only if X happens will Y happen. | [X <> Y] |
| (32) If and only X happens, Y will happen. | [X <?> Y] |

There is disagreement in the literature as to how (28) implicates (29) – see e.g. Horn (2000) – but many believe that the move is a pragmatic one, perhaps via (33) to (34) or (35) to (36):

- (33) If P, then Q. \mapsto
 (34) Not (Q unconditionally).
 (35) If P, then Q. \mapsto
 (36) Not (If P' then Q).

But what we're interested in is when (28) implicates (29) ... or more precisely why conditional perfection seems to happen as matter of necessity in contractual offers but not in assertions. At first, this seems easy: When I'm making you a contractual offer, I want to give the impression that your reciprocal performance (the thing that I want) constitutes the only condition under which I will perform what I'm "promising" to perform; by default, there's no such motivation in assertions.

But there's a problem: Contractual offers can be unperfected, as in (11c).

- (11c) Heck, even if John gives Mary some gum, she'll stay up later than usual.
 [cf. *Even only if X, then Y.]

and yet the semantic non-directionality for the bilateral offer (11c) remains. So it seems that conditional perfection can't be the explanation for the lack of this directionality.

5.2. Syntactic Directionality

Buffington (2015) suggested that the reason why (11) isn't easily interpreted as an offer on behalf of John / why (14) isn't easily interpreted as an offer by the speaker can be explained in reference to the Kratzerian analysis of conditionals in (21), in which the antecedents of conditionals are essentially optional modifiers to modal statements:

- (11) If John gives Mary some candy, she will stay up later than usual. [# as an offer on behalf of John]

(14) If I give you \$20, you will wash my car. [# as an offer]

In other words, (14) can't be an offer any more than (14a) can be a promise:

(14a) You will wash my car. [# as a promise]

So the suggestion in Buffington (2015) was that the problem with interpreting (14) as an offer is that it's presumptuous for the speaker to utter the sentence (i.e. the "assertion") truthfully. But is presumption really the issue? I know a number of presumptuous lawyers, but I wouldn't expect many – in fact, any – of them to utter (11) as an offer on behalf of Mary. This seems to be a problem.

5.3. *Tense / Mood*

Buffington (2015) suggested that the reason why (11a) isn't easily interpreted as a contractual offer is that the intuition that John is unlikely to give Mary some candy (or the speaker's unwillingness to presume that John will do so) generated by the use of past tense / subjunctive mood in the conditional antagonizes the act of making the offer. Iatridou (2001) and Ippolito (2003) *inter alia* argued that the intuitions like the one in (11a) that John is unlikely to give Mary some candy arise as a matter of implicature. The details are complicated, but Iatridou, at least, argues that these implicatures arise as the result of the fact that the speaker chose to make an assertion about possible worlds (or situations) in which the antecedent is true other than the actual world. And further confirmation of the equality in this respect of assertions and offers seems to come from Ippolito's examples: Whereas "non-past" subjunctive conditionals like (37) implicate that John's marrying Mary tomorrow is unlikely, "mismatched-past" subjunctive conditionals like (38) implicate that John's marrying Mary tomorrow is impossible:

(37) If John married Mary tomorrow, he would make her happy.

(38) If John had married Mary tomorrow, he would have made her happy.

Not surprisingly, the way the offeree, i.e. John's agent, would respond to (40) differs from the way he would respond to (39), if he wanted to pursue the deal in each case:

(39) If John gave Mary some candy tomorrow, she'd stay up later than usual. [= (10b)]

- AGENT'S RESPONSE: % I accept! / ✓ You seem to think that that's unlikely, but ...

(40) If John had given Mary some candy tomorrow, she'd have stayed up later than usual.

- AGENT'S RESPONSE: # I accept! / ✓ Wait, it's not too late – John can still do that!

Buffington (2105) asked: How could these kinds of facts be accounted for if contract formation didn't involve the exchange of assertions, especially if the fact that the speaker is making an assertion about non-actual worlds is the source of the relevant implicatures?

But all of this is just to suggest that contractual offers are, at some level, assertions – not that their offer interpretations are derived via pragmatic strengthening. This is a problem.

5.4. *NPI's*

Buffington (2015) entertained several explanations for the fact that (11b), repeated here, is infelicitous as a contractual offer ...

(11b) If John gives Mary any candy, she will stay up later than usual.

... and rejected most of them, including the (i) possibility that the antecedents of conditionals interpreted as contractual offers don't create Strawson-Downward-Entailing (SDE) environments [see von Stechow (1999)], (ii) the possibility that the infelicity of (11b) can be correlated with contrasts like (41) and (42) [a distillation of Lakoff (1969), which indicate a dispreference for NPI's in something like recommendations, as opposed to warnings:

(41) If you drink {some / # any} of this, you'll feel better.

(42) If you drink {# some / any} of this, you'll feel worse.

... and also (iii) the possibility that the NPI facts can be derived from a dispreference for NPI's in the antecedents of perfected conditionals (an explanation that fails under (11c) above):

(43) If you give him any coffee, he'll stay up later than usual.

(44) ? Only if you give him any coffee will he stay up later than usual.

(45) ?? If and only if you give him any coffee ...

Arriving at a uniform explanation of NPI behavior in contractual offers is challenging. One obstacle to explaining the resistance to NPI's in the antecedents of conditional sentences interpreted as contractual offers is that focused any seems to be perfectly fine in (11c), where it has the flavor of "any at all," i.e. it operates as a minimizing NPI [see Israel (1995)]:

(11c) If John gives Mary any candy, she will stay up later than usual. [ok as an offer]

Another challenge is the fact that unfocused *any* seems to be acceptable in certain positions within the antecedents of conditional sentences interpreted as contractual offers, as shown in (11d):

(11d) If you donate {some / # any} money to any charity, we'll hold a dinner in your honor.

Yet another obstacle is that *ever* seems to be fine in (11e), although as shown in (46) as a response to it, (11e) seems to be interpretable only as a unilateral offer, distinguishing it from (11).

(11e) If John ever gives Mary some candy, she will stay up later than usual.

(46) # On behalf of John, I accept!

Similarly, (48) is an infelicitous response to (47):

(47) If you ever wash my car, I'll give you \$20. [= (1) with *ever* in the antecedent]

(48) # I accept!

As for the behavior of *any*, my instinct is still, as it was in Buffington (2015), that the distinction between minimizing (e.g. focused *any*) and non-minimizing (e.g. unfocused *any*) NPI's is relevant and relates to the respective ability of each (as well as the ability of unfocused *some*) to "refer" to contextually defined quantities [again, see Israel (1995)]: One the legal requirements for a valid contract is that the offer identify the quantity of performance to be exchanged. (Note: I'm simplifying here.) If minimizing NPI's are able to "refer" to minimum quantities but non-minimizing NPI's are unable to "refer" to quantities at all, then there's some hope for an explanation of why (11d) isn't interpretable as a contractual offer: no quantity of performance is proposed to be exchanged.

For our purposes here, however, I'm more interested in the behavior of *ever* – specifically the fact that the presence of *ever* in the antecedent of a conditional sentence interpreted as a contractual offer seems to render the offer unilateral, whereas it would otherwise be bilateral, which appears to present a problem for the earlier hypothesis that the unilateral / bilateral distinction is (purely) pragmatic.

In addition, I'm interested here in exploring explanations for the fact that contractual offers with locutions in the form of (49) and (50) likewise seem to be interpretable only as unilateral, not bilateral, offers – a fact that remained unexplained in Buffington (2015).

(49) Everyone who brings me candy gets an A. [✓ as an offer, but only as a unilateral one]

(50) Bring me candy, and get an A. [✓ as an offer, but only as a unilateral one]

6. *Before Moving On ... Conditional Promises, Revisited*

Before moving on to further discussion of the unilateral / bilateral distinction, the audience might be wondering whether a more sophisticated semantics for the relevant conditionals would make it possible to correct the paraphrases of the structures in (18), (19), and (20), such that the right interpretation of conditional sentences as contractual offers would result from one of them, not only with respect to the possibility of interpreting the structures as bilateral (when pragmatically viable), but also with respect to possibility of modeling the conditional sentences as containing silent promise elements. Indeed, I wouldn't be surprised if the audience had in mind that idea that (11f) – a variant of (11) that, for many speakers (including me), is ungrammatical, but is familiar by virtue of the fact that similar examples have been heard from other speakers – is informative:

(11f) % If John will give Mary some candy, Mary will stay up later than usual.

The intuition seems to be that whereas (11) is interpretable either as an offer or as a non-offer assertion, (11f) is interpretable only as an offer (and as an assertion only to the extent that offers are assertions). More specifically, the intuition seems to be that *will* in the antecedent of (11f) conveys something like the meaning of *is willing to* (which seems to open the door to a bilateral interpretation) although it's unclear how such an interpretation is derived from the lexical item *will*, and in any case it would seem that the future meaning of *will* would still have to be conveyed, anyway, since otherwise (11f) would present the same sort of problem illustrated (24): (11f) doesn't mean that Mary will stay up later than usual if John is merely willing to give her some candy (and doesn't).

Still, there is a sense in which (51) seems to be a close paraphrase of (1) when (1) is interpreted as a contractual offer, suggesting that the structure in (19) may be a viable model for (1), after all:

(51) All foreseeable continuations of the situation I think we're in in which you wash my car at some time $t_i > \text{now}$ are situations in which I promise to give you \$20 at some time $t_j > \text{now}$.

The idea is that the introduction of an independent time variable in the antecedent t_i renders the antecedent worlds (or situations) less like “wash worlds” (as articulated above) and more like “will-wash worlds,” which may make it possible for the speaker of (1) to be conceived as a promise-maker when the hearer of (1) informs the speaker of (1) that all foreseeable continuations of the perceived current situation are, in fact, “will-wash worlds,” for example by uttering (52):

(52) I will wash your car.

In what follows, I suggest that how the time of the event in the antecedent of a conditional sentence is interpreted is in fact important in determining whether the conditional sentence is interpretable as a contractual offer (and also whether it's interpretable as a bilateral one), but for now:

First, the pure assertion interpretations of sentences like (1) and (11), which involve apparent present tense in their antecedents, generally seem to involve interpretation of the event in the antecedent as happening in the future, however that futurity is derived, so the paraphrase in (51), by itself, would not seem to distinguish the offer and assertion interpretations of (1) and (11).

Second, the distinction between the offer and pure assertion interpretations of sentences like (1) and (11) doesn't seem to be attributable just to the present or absence of silent promise elements in the consequents of the conditionals [as in (19)] for the following reason, at least:

Eckardt (2012) demonstrates that performative *hereby* is a syntactic element that participates in compositional semantics and refers to an ongoing act of information transfer; moreover, the agent of the information transfer need not be the agent of the performative verb that the adverb *hereby* modifies; hence (11g) is a viable paraphrase of (11), where the speaker is the agent of the information transfer, and Mary is the agent of the "speech act" or commitment [in (11), an offer]:

(11g) Mary hereby offers to stay up later than usual if John gives her some candy.

But if this is true, and if (19) is a viable model for the offer in (11) as well as the offer in (1), etc. – i.e. if (1) and (11) were truly conditional promises, i.e. conditional sentences with promises in the consequents, then it's not at all obvious why (53) isn't a sensible response to (1) and (54) isn't a sensible response to (11):

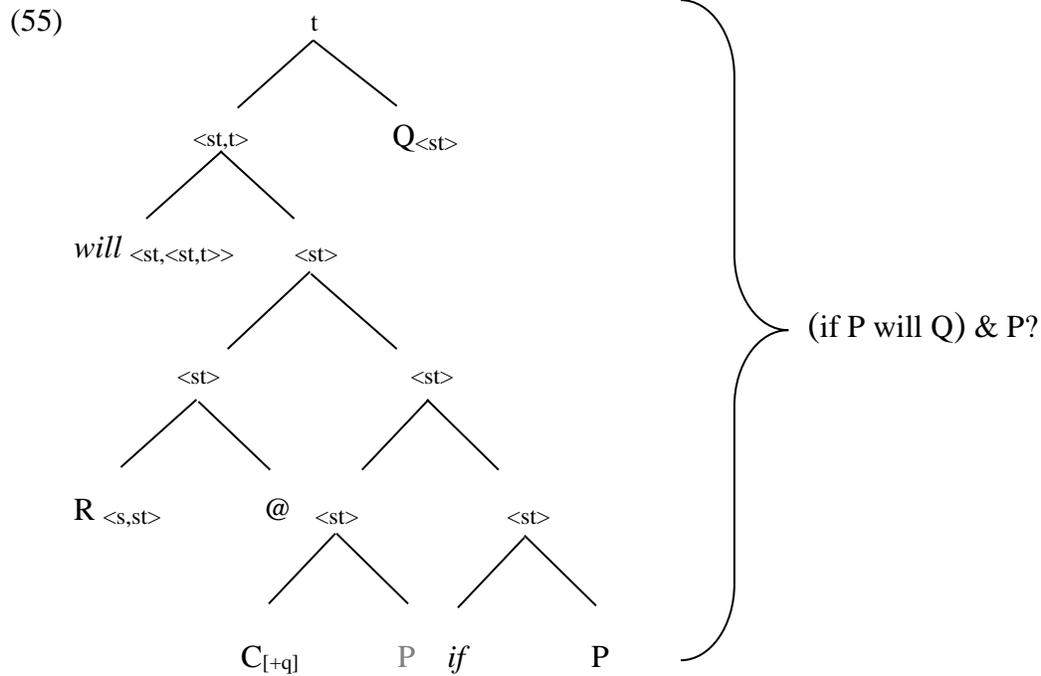
(53) ☒ {I accept / I will wash your car}, and you hereby promise to pay me \$20.

(54) ☒ {On behalf of John, I accept / John will give Mary some candy}, and Mary hereby promises...

especially when, from a jurist's perspective, a contractual offer involves the offeror's transfer of authority to the offeree to bind the offeror to the offeror's "promise" – see Owens (2006). [Note that *thereby* doesn't fare any better in examples like (53) or (54), even with past tense in the proper place. Perhaps Eckardt's intent (or agency) to define is what's missing here. FOR DISCUSSION: Example of a divorce mediator in front of both spouses: "You_{s1} hereby promise to pay alimony."]

7. *A New Proposal*

I hereby propose that there may be a better way to model the distinction between the assertion and offer interpretations of sentences like (1) and (11), namely this: When interpreted as bilateral offers, conditional sentences like (1) and (11) involve the integration of a silent question into the assertion, perhaps as in (55), where C_{+q} is a silent yes/no question morpheme and its complement P is a silent copy of the antecedent P :



A few details will follow, but there are two things I want to make clear at this point: The first is to confess that the proposal was not born out of necessity in the sense of being the only apparent analysis in light of the data presented so far; rather, it was born out of a return to the elementary recognition that, unlike assertions, bilateral contractual offers invite a specific kind of response, and the essence of that response is an indication of whether or not the performance “requested” in the antecedent of the offer will be delivered. If this is on the right track, then important questions become (i) why the presence of *ever* in P seems to render the structure in (55) unavailable and (ii) why alternative locutions for contractual offers like the quantified expressions in (49) and pseudo-imperatives in (50) resist the integration of questions into their structures. Again, some details will follow, but the second thing I want to do first is to try to soothe any instant reactions to the potentially inflammatory idea proposed in (55) by showing that integrated questions likely exist elsewhere in English.

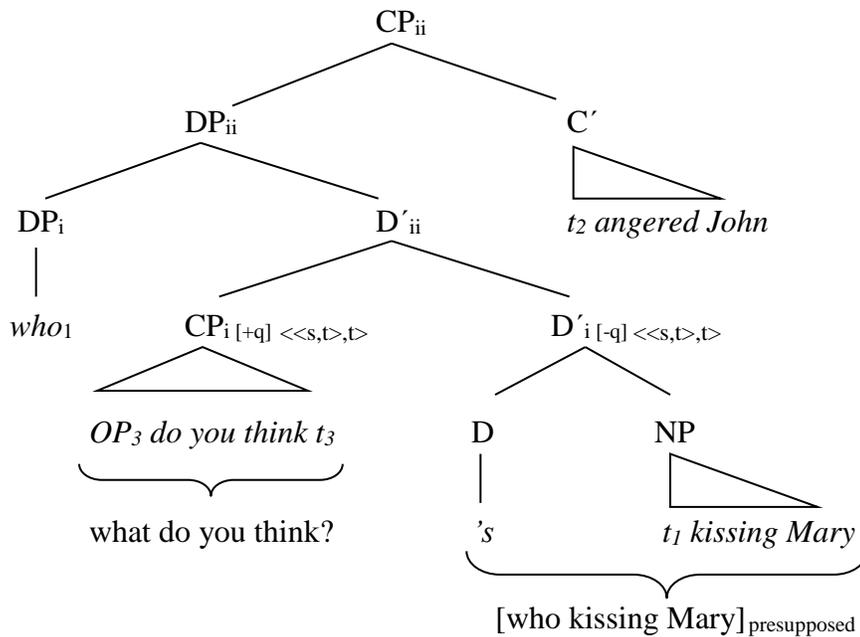
7.1. *Integrated Questions Elsewhere in English*

Buffington (2013) argues that a sentence like (56), which is perfectly grammatical for many speakers of English:

(56) Who₁ do you think t₁'s kissing Mary angered John?

does not, contrary to appearances, involve the extraction of *who* from within the genitive gerund subject, which of course would violate the Condition on Extraction Domains [Huang (1982), Stepanov (2007)] but rather involves the integration of a constituent OP_3 *do you think t₃* that has the semantics of a question – similar to certain German examples discussed by Reis (1995), (2002).

(57)



$[[DP_{ii}]] = \text{What do you think?} \bullet [\text{Who kissing Mary}]_{\text{presupposed}}$

$[[CP_{ii}]] = \text{What do you think?} \bullet [\text{Who kissing Mary}]_{\text{presupposed}} \text{ angered John?}$

The idea was that, somewhat similar to the semantic operation of predicate modification, there exists a semantic operation of question modification of the following sort [à la Potts (2002)]:

(58) QUESTION MODIFICATION: If α is a node whose daughters are β and γ , and β and γ are both of type $\langle\langle s,t \rangle, t \rangle$, then $[[\alpha]] = [[\beta]] \bullet [[\gamma]]$, where $x \bullet y$ indicates that x is “parenthetical” (i.e. semantically inert).

A full presentation of the content of Buffington (2013) would consume too much of our resources

here. What's important is that the idea of integrating questions into other constructions in English isn't too exotic.

Still, one empirical point in Buffington (2013) is particularly relevant to today's analysis of contractual offers – namely that CED effects seem to persist for speakers of English who accept sentences like (56) in the sense that they reject sentences like (59):

(59) * Who₁ do you think t₁'s kiss angered John?

... suggesting that questions can't be integrated with constituents that aren't interpreted as propositions. (I assume à la Portner (1992) that gerunds denote minimal propositions, and that common nouns do not.)

7.2. *An Integrated Question Analysis of the Earlier Data*

If we take the following (simplified) lexical entries:

- (60) (i) $[[C_{+q}]] = \lambda p. \lambda w. p(w) = p(@)$
 (ii) $[[if]] = \lambda p. \lambda w. p(w) = 1$

... and an operation like (61), modeled on QUESTION MODIFICATION above:

- (61) PROPOSITION INTEGRATION: If α is a node whose daughters are β and γ , and β and γ are both of type $\langle s, t \rangle$, then $[[\alpha]] = [[\beta]] \& [[\gamma]]$, where:
 (i) if β is $_{+q}$ and γ is $_{-q}$ then $\& = \bullet$
 (ii) else $\& = \cap$

... and further assume that the tense of P is parasitic to *will* [see below], then (55) gives an intuitive interpretation of contractual offers: (1) / (11) are now paraphrased as something like (62) / (63):

- (62) If you wash my car, I'll give you \$20. Will you wash my car? [Discuss dynamic effects.]
 (63) If John gives Mary some candy, she'll stay up later than usual. Will John give Mary some candy?

Depending on theoretical desiderata, we might want to invest the offer/assertion “ambiguity” into a polysemous lexical entry for *if* (i.e. complicate the lexicon to simply the semantics). For empirical reasons, too, we might want to alter the lexical meaning of *if* (with felicity conditions) to prevent over-generation of the integration of questions and assertions. [Discuss: limitations on the productivity of questions like (56), as shown e.g. by accusative vs. genitive gerunds.]

7.3. *Some of the Mysteries Solved?*

The audience may wonder at this point whether we're in the realm of science or science fiction: What's the advantage of moving the questionish nature of contractual offers into the semantics? What does it mean for the tense of P to be "parasitic"? How does any of this help solve the earlier mysteries regarding the differences between the offer and assertion interpretations of conditional sentences like (11)? Taking these questions one at a time ...

The primary advantage of moving the questionish nature of contractual offers into the semantics is that if it's true that modification (or integration) operations work only when merging semantically matched constituents, then we have a ready-made reason why quantified expressions like (58) and pseudo-imperatives like (59) don't seem to be interpretable as bilateral offers, i.e. as inviting a verbal acceptance: a yes/no question, a proposition, can't be integrated with the properties denoted by relative clauses [see Heim and Kratzer (1998)] or imperatives [see Portner (2004)]. (Alternatively, again, we could invest the integrated meaning of bilateral contractual offers into one of the lexical meanings of *if* and simply ascribe the absence of integrated meanings in sentences like (58) and (59) to the absence of *if* in such sentences, although this feels too easy.)

As for the suggestion that the tense of P is "parasitic," here's the problem to be solved: The morphological tense in the antecedent clauses of (1) and (11) is present, but the proposed paraphrases in (62) and (63) involve future readings of the antecedents. Why wouldn't the integration of the question of P result, for example, in the interpretation of (1) as (64)?

(64) If you wash my car, I'll give you \$20. Do you wash my car?

The answer might be that (matrix) morphological present tense in the antecedents of conditional sentences is in fact non-tense (even if finite) or the morphological exponent of a free tense variable. While I have nothing of substance to say here about how such non-tense is interpreted in conditional sentences intended as pure assertions (where temporal precedence and/or causation is interpreted), it doesn't seem unreasonable to suggest that tenseless questions are askable – and yet for a contractual offer expressed as a conditional, the speaker (the offeror) is presupposing that the hearer (the offeree) has not performed the act denoted by the antecedent in the relevant past and isn't doing so in the present. In that sense, the tense of P in (1) is effectively presupposed as future or, one might say, parasitic to the future nature (and felicity conditions) of offers.

I admit that these ideas are far-fetched and frail by virtue of their informality, but they don't seem to be utterly foreclosed. So let's assume for the short duration of this presentation that the meaning of (1) and (11) when interpreted as bilateral contractual offers is as in (62) and (63), respectively, and see if such an assumption helps us solve any of the earlier mysteries regarding the differences between the offer and assertion interpretations of such conditional sentences. If so, the perhaps pursuing these ideas in future research will be fruitful. Using (11) as the primary example...

■ SEMANTIC NON-DIRECTIONALITY

Whatever the explanation for the “semantic directionality” between the antecedent and the consequent of (11) when (11) is interpreted as a pure assertion (i.e. the interpretation of temporal precedence and/or causation between the antecedent and consequent), if (11) is interpreted as in (63) when (11) is interpreted as a contractual offer, then the “semantic non-directionality” between offeror and the offeree's performance may result from the fact that the antecedent is interpreted with parasite future tense; in other words, there are effectively two instances of *will* in (11) when (11) is interpreted as a bilateral offer. With two effective instances of *will*, neither the antecedent nor the consequent can be interpreted as preceding the other. [This explanation seems preferable to the explanation based on conditional perfection, in light of the evidence in (11c).]

■ SYNTACTIC DIRECTIONALITY

If (1) is interpreted as in (62) when (1) is interpreted as a contractual offer, then the syntactic directionality of (1) may reduce to the fact that, even in the context of negotiation, it's generally infelicitous to question one's own future acts:

(14b) #Will I give you \$20?

Similarly, if (11) is interpreted as in (63) when (11) is interpreted as a contractual offer, then the fact that (11) can't be interpreted as an offer on behalf of John reduces to the fact that it's infelicitous for an agent to question his or her principal's future acts. [This seems preferable to the explanation based on the presumptuousness of (14a).]

■ REMOTENESS IN TENSE / MOOD

If (11) is interpreted as in (63) when (11) is interpreted as a contractual offer, then the fact that past tense (real or otherwise) in the antecedent P antagonizes the parasitic tense in P is expected.

[This explanation seems preferable to an explanation that merely recognizes contractual offers as assertions in part.]

■ NEGATIVE POLARITY ITEMS

As suggested above, there may be no mystery to solve with respect to *any* – its behavior may be predictable on the basis of its lexical semantics, the semantics of focus or minimization, and the need for contractual offers to relate a quantity of performance to be rendered. As for the fact that the introduction of *ever* into the antecedent in (11) seems to render (11) interpretable only as a unilateral offer: If the bilateral offer interpretations of (11) is as in (63), then this fact may be explained by whatever explains the fact that (66) is an incomplete response to (65):

(65) Will John ever give Mary some candy?

(66) # Yes.

[This explanation is preferable to the absence of any explanation for the *ever* facts.]

■ FELICITOUS REPLIES

Finally, as suggested at the start of this section, if (11) is interpreted as in (63) when (11) is interpreted as a contractual offer, then there's a natural way to explain why bilateral offers invite verbal acceptances and yet (for some speakers) may still be denied with sentences like (13): such offers are integrated questions and assertions. [This explanation is preferable to the absence of any explanation of why offers invite different replies than assertions if offers are merely assertions that are pragmatically strengthened, as in (1a), although a remaining question is why “yes” isn't a viable form acceptance – perhaps because the question in the antecedent is tenseless?]

8. *Conclusion*

Some (and maybe most) of the data from earlier work on contractual offers may be better explained by the idea that certain offers – namely conditional sentences interpreted (or interpretable) as bilateral offers – involve the integration of questions and assertions. Exactly how this integration happens, especially with respect to tense, remains to be explored and made explicit in future work, but the integration of a question into an assertion may be less exotic than expected, and good things sometimes happen when we follow intuition to unusual places.*

* “Traveler, there is no path. Paths are made by walking.” – Antonio Machado, *Caminante no hay Camino*.

9. POSSIBLE TOPICS FOR FURTHER DISCUSSION

- embeddability issues
- intonational differences in offers vs. assertions
- Korean promissives and jussive syntactic heads, a la Zanuttini et al. (2012)
- contractual offers and the hearsay rule
- why I'm wrong (also, whether linguists and other scientists are lawyers for ideas)

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11. REFERENCES

- Austin, J. 1962. *How to Do Things With Words*. Harvard University Press.
- Bennett, J. 2003. *A Philosophical Guide to Conditionals*. Oxford University Press.
- Buffington, J. 2012. This is (Not) a Lie: Analyzing At-Least Answers to How-Many Questions as Mention-Some Answers. ms. UCLA.
- Buffington, J. 2013. What Do You Think's Happening in English is Surprising? ms, UCLA.
- Buffington, J. 2015. *The Logical Form of Contract Formation*. PhD dissertation, UCLA.
- Eckardt, R. 2012. *Hereby* explained: An event-based approach to performative utterances. *Linguistics and Philosophy* 35:21-55.
- von Stechow, K. 1999. NPI licensing, Strawson entailment, and context dependencies. *Journal of Semantics* 16(2):97–148.
- Hancher, M. 1979. The classification of cooperative illocutionary acts. *Language and Society* 5.
- Heim, I. & Kratzer, A. 1998. *Semantics and Generative Grammar*. Blackwell.
- Horn, L. 2000. From *if* to *iff*: conditional perfection as pragmatic strengthening. *Journal of Pragmatics* 32: 289-326.
- Huang, J. 1989. *Logical Relations in Chinese and the Theory of Grammar*. PhD dissertation, MIT.
- Iatridou, S. 2000. The grammatical ingredients of counterfactuality. *Linguistic Inquiry* 31(2): 231-270.
- Ippolito, M. 2003. Presuppositions and implicatures in counterfactuals. *Natural Language Semantics* 11: 145-186.
- Israel, M. 1995. Negative polarity and phantom reference. *Proceedings of the Berkeley Linguistics Society* 21:162-173.
- Kratzer, A. 1986. Conditionals. *Chicago Linguistics Society* 22(2):1–15.
- Kratzer, A. 2012. *Modals and Conditionals*. Oxford University Press.
- Lakoff, R. 1969. Why there can't be any some-any rule. *Language* 45(3): 608-615.
- Portner, P. 1991. Interpreting Gerunds in Complement Positions. *Proceedings of WCCFL* 10: 375-385.
- Portner, P. 2004. The Semantics of Imperatives within a Theory of Clause Types. *Proceedings of SALT*.
- Owens, D. 2006. A simple theory of promising, *The Philosophical Review* 115: 51–77.
- Potts, C. 2002. The Syntax and Semantics of As-Parenteticals. *Natural Language & Linguistic Theory* 20: 623–689.
- Reis, M. 1995. Wer Glaubst Du Hat Recht? On So-Called Extractions from Verb-Second Clauses and Verb-First Parenthetical Constructions in German. *Sprache und Pragmatik* 36: 27-83.
- Reis, M. 2002. On the Parenthetical Features of German *Was...Wh*-Constructions and How to Account for Them. In Lutz et al, *supra*.
- Searle, J. 1969. *Speech Acts*. Cambridge University Press.
- Searle, J. & Vanderveken, D. 1985. *Foundations of Illocutionary Logic*. Cambridge University Press.
- Schane, S. 2006. *Language and the Law*. Continuum Press.
- Stepanov, A. 2007. The End of the CED? Minimalism and Extraction Domains. *Syntax* 10(1): 80-126.
- Tiersma, P. 1986. The language of offer and acceptance: Speech Acts and the Question of Intent. *California Law Review* 74:189-232.
- Tiersma, P. 1992. Reassessing unilateral contracts: The Role of Offer, Acceptance and Promise. *U.C. Davis Law Review* 26:1-86.
- Zanuttini, Raffaella, Miok Pak, and Paul Portner. 2012. A syntactic analysis of interpretive restrictions on imperative, promissive, and exhortative subjects. *Natural Language and Linguist Theory* 30:1231–1274.