Tense and Aspect in Swing Conditionals *

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1 Introduction

This paper focuses on past subjunctive conditionals (**PSCs**) in French. In French, PSCs do not have a subjunctive but rather a *conditionnel* 2 in the **consequent**, cf. (1).¹

(1) Si on avait réfléchi, on n' aurait pas signé. If we have-IMP. thought, we NEG have-COND NEG signed 'If we had thought about it, we wouldn't have signed.'

It is often assumed that French (like Greek) requires imperfective aspect as a counterfactual (CF) marker in the **antecedent** of PSCs (cf. e.g. [Iatridou, 2000]). This should explain why we find in the antecedent of PSCs the *plus que parfait*, combining imperfective morphology with a layer of perfect, cf. (1). Tenses without imperfective morphology, i.a. the *passé composé* (that has both simple past and present perfect uses), are said to be banned there, as confirmed by the unacceptability of (2).

(2) * Si on a réfléchi, on n' aurait pas signé. If we have-PRST thought, we NEG have-COND NEG signed 'If we 'have thought' about it, we wouldn't have signed.'

I start from the observation that this empirical picture should be refined. One easily finds relevant occurrences of conditionals with a *conditionnel* 2 in the consequent and a *passé composé* in the antecedent in corpora, cf. e.g. (3)-(6), all taken from the internet, and judged acceptable by my informants and myself.

- (3) Si un missile sol-air a effectivement été utilisé, il aurait été tiré
 If a missile ground-air has indeed been used, it have-COND been launched partir d' un bateau au large de Long Island.
 from a boat at the coast of Long Island
 'If a surface-to-air missile 'has indeed been' used, it would have been launched from a boat off the Long Island coast.'
- (4) Si vos vacances n'ont pas été réussies, il aurait été simple de venir If your vacations NEG have NEG been succeeded, it HAVE-COND been simple to come nous en parler.
 PRN-DAT-1PL of-it speak

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 $^{^1\}mathrm{I}$ nevertheless follow the tradition and call them PSCs despite of the absence of subjunctive morphology, because alternative names (would have conditionals, counterfactual conditionals...) are problematic, too.

'If your vacations 'haven't worked out' well, it would have been simple to come to us to speak about it.'

- (5) Si l'ancien proprio a tapé [le moyeu], il aurait ruiné la jante et If the previous owner has hit [the hub], he have-COND destroyed the wheel and il l'aurait donc changée, il y a un truc que je ne comprends pas. he it have-COND therefore changed, there is a thing that I NEG understand NEG 'If the previous owner 'has hit' the hub, he would have destroyed the wheel and he would have therefore changed it, there is something I don't understand.'
- (6) Si le chef d' état-major a réellement tenu les propos rapportés par la presse,
 If the Chief of Staff has really made the comments reported by the press,
 il aurait commis un acte grave.
 he have-COND committed a act serious

'If the Chief of Staff really 'has made' the comments reported by the press, he would have committed a serious act.'

The context of uses of these examples makes clear that they are not confined to a substandard variant of French, even if they are banished by some prescriptive grammars. Since conditionals like (3)-(6) mix the morphologies typical of PSCs and **past indicative conditionals** (**PICs**), I call them **'swing' PSCs**. The paper is organized as follows. I show how swing PSCs differ from standard PSCs in section 2, and from PICs in section 3. Section 4 provides arguments for the claim that swing PSCs are well and truly a non-standard subtype of PSCs rather than a non-standard subtype of PICs. Section 5 points to the conclusions that swing PSCs enable one to draw on the respective role of tense/aspect morphology in the antecedent vs. the consequent of PSCs. Finally, in section 6, I briefly sketch two potential analyses of the way morphology contributes to the interpretation of swing PSCs.

2 Swing PSCs vs. standard PSCs

Swing PSCs differ from standard PSCs in at least two properties. Firstly, swing PSCs are systematically odd if the antecedent p or $\neg p$ follows from the context C (the set of worlds currently taken to be epistemically accessible by all participants, cf. [Stalnaker, 1978]): they require p to be *undecided* relative to C. This suffices to explain the problem of (2), since there, C most probably entails either p or $\neg p$. Also, if the examples in (3)-(6) are preceded by an assertion of $\neg p$, they become odd:

(7) # L'ancien proprio n' a pas tapé le moyeu. S'il l' a tapé, il aurait The previous owner NEG has NEG hit the hub. If he it has hit, he have-COND ruiné la jante. destroyed the wheel.

'The previous owner 'hasn't hit' the hub. If he 'has hit' it, he would have destroyed the wheel.'

By contrast, standard PSCs are, of course, unproblematic in a context where p is taken to be counterfactual, since standard PSCs regularly presuppose their antecedent as false.² Secondly,

 $^{^{2}}$ The 'subjunctive inference' of counterfactual antecedent falsity has been analysed as a presupposition, an implicature, or an antipresupposition. I adopt here von Fintel 1998's view that the counterfactual antecedent falsity is only one of the possible intantiations of the 'subjunctive inference' (see Section 4 below), and that this inference is a presupposition.

swing PSCs are typically used when p is contextually salient but not yet accepted nor rejected in the context C - p is on the Table/at issue ([Farkas and Bruce, 2010]). An evidence for this is the frequent presence in corpora of anaphorical adverbials like *effectivement/vraiment* 'indeed/really' in their antecedent. Asserting a swing PSC can therefore be seen as a way to address the issue p.

Interestingly, doing so through the assertion of a swing PSC projects a different *projected set* (ps) than through the assertion of a standard PSC. The projected set of an assertion characterizes the speaker's proposal when she makes her assertion: it is the set of future common grounds relative to which the issue on the Table is decided ([Farkas and Bruce, 2010]). Accepting an assertion amounts to accepting its projected common grounds. (Note that an assertion adds on the Table not only its literal content but also its implicated content). Let me illustrate the difference between the projected set of standard PSCs and swing PSCs through the dialogue in (8)-(10). The crucial point concerns the way we interpret Marie's confirmation (10) of Pierre's reaction (9).

- (8) Marie. Peut-être que le Boeing 747 a été détruit par un missile.'Perhaps the Boeing 747 was destroyed by a missile.'
- (9) a. Pierre. S'il avait été détruit par un missile, il aurait été lancé par l'US Navy! 'If it had been destroyed by a missile, it would have been launched by the US Navy!'
 - b. Pierre. S'il a été détruit par un missile, il aurait été lancé par l'US Navy!
 'If it 'has been' destroyed by a missile, it would have been launched by the US Navy!'
- (10) Marie. Tu as raison. 'You're right.'

Both of Pierre's reactions (9a) and (9b) have the same literal content $p \to q$. They also both presuppose that q is false or at least unlikely in the current (input) context C_1 . But they differ through the way they project p in the future common grounds, as reflected in the way we interpret Marie's confirmation Tu as raison 'You are right'. As an answer to (9a), (10) is easily understood as a confirmation of $p \to q$ but also of $\neg p$, because the rule of modus tollens is applied (implicated and literal contents are not kept apart here):

(11)
$$ps \text{ of } (9a) = \{C_1 \cup p \to q \cup \neg p\}$$

As an answer to (9b), (10) cannot be interpreted as an acceptance of the ps in (11). In fact, the reaction (9b) to Marie's proposal (8) to add p to the future common grounds is inconclusive: (9b) feels like a question — an invitation to think more about what to do about p. More precisely, it invites one to choose between (i) rejecting p and (ii) challenging the presupposition $\neg q$ (or at least raising its probability from unlikely to likely) and accepting both p and q. In other words, through (9b), Pierre is suggesting: 'Either you retract your proposal p, or here is the price to pay' (namely, accepting the false/unlikely proposition q in the future common ground). The context state after a swing PSC is thus inquisitive wrt to p: its ps contains two future common grounds, and consequently does not help to settle the issue p:

(12)
$$ps \text{ of } (9b) = \{C_1 \cup p \to q \cup \neg p, C_1 \cup p \to q \cup p\}$$

By reacting through Tu as raison 'You are right', Marie only signals that she accepts the implication $p \rightarrow q$ and the imposed choice, not that she accepts one of the two alternatives. She can then go on after this acceptance and signal which future common ground she goes for (or signals she cannot choose neither of them):

- (10) Tu as raison...
 - ...You are right.
 - (i) anti-conspiracist reaction (Marie withdraws p and goes for ¬p)
 ...La théorie des missiles est après tout très improbable.
 - ...You are right. The missile theory is after all very unlikely.
 - (ii) conspiracist reaction (Marie goes for p)
 ...Après tout ce n'est pas la première fois que l'US Navy est impliquée dans de tels désastres.
 - ...After all it isn't the first time the US Navy is involved in such disasters.
 - (iii) agnosticist reaction
 - ...C'est difficile de trancher.
 - ...It is difficult to decide.

Note that the continuation (ii) would not be a felicitous way to assent to (9a), given that (9a) implicates that p is false.³

In sum, I have argued for the following points. Firstly, the **antecedent** p of swing PSCs is at issue/undecided relative to the (input) context C_1 and relative to the projected set. On this point, swing PSCs differ from standard PSCs, which typically presuppose that p is false. Secondly, swing PSCs resemble standard PSCs in that they typically present their **consequent** q as false or unlikely.⁴

3 Swing PSCs vs. past indicative conditionals (PICs)

Swing PSCs also differ from PICs in three respects. Firstly, PICs can sometimes be used as a rhetorical device when p follows from C, as observed by e.g. [Dancygier, 1998], cf. (13). This is not possible with swing PSCs, cf. (14).

- (13) Il a plu. S'il a plu, le match a été annulé.
 It has rained. If it has rained, the match has been cancelled
 'It 'has rained'. If it 'has rained', the match 'has been' cancelled.'
- (14) # Il a plu. S'il a plu, le match aurait été annulé.
 It has rained. If it has rained, the match have-COND been cancelled
 'It 'has rained'. If it 'has rained', the match would have been cancelled.'

The second difference concerns past conditionals \dot{a} la Anderson ([Anderson, 1951]). Anderson nian PSCs are illustrated in (15). They are used to argue for the truth of p. As Anderson emphasizes, the existence of such conditionals shows that PSCs do not systematically presuppose that their antecedent is false.

(15) If Jones had taken arsenic, he would have shown just exactly those symptoms which he does in fact show. [So, it is likely that he took arsenic.]

It is well-known that Andersonian PICs (e.g. (16)) are odd (cf. [von Fintel, 1998] for an account in terms of uninformativeness). This is also true in French, cf. (17):

³On the contrary, the continuation (iii) would be felicitous as a way to assent to (9a), because (iii) can then mean that Marie does not want to choose between her initial proposal to adopt p and Peter's suggestion to adopt $\neg p$.

⁴Except in Andersonian cases, as we will see in the next section.

- (16) # If Jones took arsenic, he shows exactly those symptoms which he does in fact show.
- (17) # Si John a pris de l'arsenic, il a montré exactement les symptomes qu'il If John has taken of-the arsenic, he has shown exactly the symptoms that he a maintenant.
 has now
 'If John 'has taken' arsenic, he 'has shown' exactly the symptoms that he has now.'

By contrast, Andersonian swing PSCs are natural, as shown by the acceptability of (18). We can account for it the same way von Fintel 1998 explains the acceptability of the subjunctive in (15) if we admit that swing PSCs are a subvariant of PSCs, cf. the next section.

(18) Si John a pris de l'arsenic, il aurait montré exactement les symptomes If John has taken of-the arsenic, he have-COND shown exactly the symptoms qu'il a maintenant. that he has now
'If John 'has taken' arsenic, he would have shown exactly the symptoms that he has now.'

The third difference between PICs and swing PSCs is that except in Andersonian cases, the latter tend to presuppose that their consequent q is false/unlikely in C. This is not the case of PICs. Let us, for instance, compare the previous example (7) above with its (shortened) PIC variant (19):

(19) Si l'ancien proprio a tapé [le moyeu], il a ruiné la jante et If the previous owner has hit [the hub], he have-INDIC destroyed the wheel and il l' a donc changée. he it have-PRST therefore changed

'If the previous owner 'has hit' the hub, he 'has destroyed' the wheel and he therefore 'has changed' it.'

In example (7), the continuation 'there is something I don't understand' makes clear that the speaker can hardly believe q to be true (p has previously been proposed in one of the previous posts of the same forum), and thereby suggests that adopting p in the future common ground has a certain cost (namely, adopting the unlikely proposition q). This justifies the use of the conditionnel 2. The PIC variant (19) would make a very different contribution: it simply makes the consequence q of the proposal p under discussion explicit, without presenting this consequence as unlikely. In favour of the claim that swing PSCs differ from PICs in that they presuppose q as false/unlikely, one observes that in some of the examples of section 1, replacing the conditionnel 2 by the corresponding past indicative (i.e. the passé composé) brings about an inappropriate variant, precisely because q is taken to be false in the context of the original example. Compare e.g. the previous example (4) with its PIC variant (20). Example (4) was found in a forum of a vacation club; the organizer replies to a client complaining about his stay.

(20) # Si vos vacances n'ont pas été réussies, il a été simple de If your vacations NEG have NEG been succeeded, it have-INDIC been simple to venir nous en parler. come PRN-DAT-1PL of-it speak

'If your vacations 'haven't worked out' well, it 'has been simple' to come to us to speak about it.'

The predicate $\hat{e}tre\ simple\ de\$ 'be simple to' used in the consequent q resembles French 'enough constructions' studied in e.g. [Hacquard, 2006] in that it entails the truth of its complement with the *passé composé*, but not with imperfective morphology.⁵ Given the *passé composé* in its consequent q, (20) leaves open the possibility that the complement of $\hat{e}tre\ simple\ de$ is true in C. This clashes with the context of the original example (4), where it is taken for granted that the client did not previously contact the vacation club.

4 Swing PSCs are subjunctive conditionals

At this point, one might still wonder why one should endorse my claim that swing PSCs are subjunctive rather than (a strange subkind of) indicative conditionals. After all, they do not implicate that p is false, and their morphology only partly matches the one of PSCs.

I adopt here [von Fintel, 1998]'s view according to which the difference between PSCs and PICs mainly lies in the kind of domain (D(w)) the conditional quantifies over. According to von Fintel and others, the natural default pragmatic constraint on quantification over worlds performed by conditionals is that D(w) is entirely in C. The indicative being *unmarked*, it does not signal anything against this constraint $D(w)\subseteq C$. The subjunctive is *marked* and indicates a violation: SCs presuppose that D(w) is partly outside $C(D(w)\subsetneq C)$. This explains why standard PSCs are used when the antecedent p is taken to be counterfactual. But it also explains why we find PSCs when D(w) needs to be widened for some other reason, for instance if p and q follow from C but D(w) contains $\neg q$ -worlds, as in von Fintel's analysis of Andersonian PSCs. The facts described above allow to conclude that swing PSCs are well and truly PSCs: their D(w) contains either counterfactual/implausible q worlds (cf. e.g. (3)-(6)), or counterfactual/implausible $\neg q$ worlds (cf. the Andersonian swing PSC (18)).

5 The role of the imperfective

One of the interests of swing PSCs is that they allow one to better tease apart the semantic contribution of aspect/tense morphology in the antecedent and the consequent of PSCs. Their properties point to the two following conclusions. Firstly, the 'subjunctivehood' of the conditional (that we equate with $D(w) \subsetneq C$) directly depends on the *conditionnel 2* morphology in the consequent, common to swing and standard PSCs, rather than on the layer of imperfective morphology in the antecedent. This is additionally confirmed by the fact that one cannot obtain swing PSCs by combining a *plus que parfait* in the antecedent and a non-*conditionnel* indicative morphology in the consequent. Sentences of this type are either out, cf. (21a), or force a temporal interpretation of the *plus que parfait* and are PICs, cf. (21b):

- (21) a. *Si on avait réfléchi, on n' a pas signé. (ill-formed PSC) If we have-IMP thought, we NEG have NEG signed
 'If we had thought about it, we haven't had signed.'
 - b. S' il l' avait vue la veille, il lui a raconté l'histoire.If he her see-PQP the day before, he her has told the story'If he had seen her the day before, he told her the story.'

⁵In fact, differently from 'enough' constructions, *être simple de* P even presupposes the truth of P with the *passé composé*; but this difference between the 'enough' constructions and *être simple de* is irrelevant here, because this presupposition is not projected in the consequent of conditionals. For instance, S'il n'a pas pris son téléphone, alors il n'a pas été simple de lui parler 'If he 'hasn't taken' his phone, then it 'has not been simple' to speak with him' does not presuppose that one spoke with him.

In other words, French swing PSCs suggest that it is the tense/aspect marking in the *consequent* that is decisive for the subjunctivehood/counterfactuality of the conditional. Secondly, the properties of swing PSCs described above allow one to conclude that the presupposition of 'counterfactual *antecedent* falsity' regularly trigggered by PSCs directly depends, in French, not only on the *conditionnel 2* in the consequent, but also on the imperfective morphology in the antecedent. Given that the *conditionnel* can be analysed as the morphological spell-out of the imperfective plus the future ([Iatridou, 2000]), this is compatible with the view that in French, imperfectivity in the consequent and the antecedent is necessary to signal *counterfactual antecedent falsity*, rather than counterfactuality *per se*, also found with swing PSCs which regularly present their *consequent* as counterfactual/unlikely.

6 Analysis of tense/aspect morphology in swing PSCs

I still have to explain how tense/aspect morphology in swing PSCs should be analysed, and what the lack of the expected imperfective morphology in their antecedent indicates. I will briefly and very roughly sketch two potential analyses.

Analysis 1. Let us first look at the role of tense/aspectual morphology in their consequent. The easiest way to look at it consists in simply extending previous analyses of the morphology in the consequent of standard PSCs to swing PSCs. According to 'past-as-past' approaches of standard PSCs ([Ippolito, 2003], [Arregui, 2005]), PAST does not localize the described eventualities, but rather contributes to the interpretation of the modal. Under some of these analyses, the past tense morpheme in the main clause is used to go back to a time where the proposition could still be true. A way to implement this is to have the past tense outscope the modal (NOW PAST(MOD($p\rightarrow q$)). PAST has been said to be provided by would in the matrix clause, cf. e.g. [Arregui, 2009]. (In French, the imperfective morphology -ai- in the conditionnel is the correspondant of the past morphology in would.) I follow [Grønn and von Stechow, 2011] who argued that the shift towards the past is not done by would (or -ai- in French), but rather by the auxiliary have (avoir in French). Since the relevant past possibility is no longer available at utterance time, counterfactuality can then be pragmatically derived ([Condoravdi, 2002]). In principle, these proposals can be extended to the main clause of swing PSCs.

Tense morphology in the antecedent of standard PSCs has been analysed as a case of (sequence of tense) agreement with the past tense in the matrix clause ([von Fintel, 1998], [Arregui, 2005], [Anand and Hacquard, 2009]). For French, agreement is only partial, since the imperfective (-ai-) but not the future morphology (-r-) is present in the antecedent of standard PSCs. But Anand and Hacquard observe that the agreement is complete in Québecois French, where both the antecedent and consequent show conditional morphology. Also relevant is the fact that conditional morphology typically appears in the antecedent of conditionals in Child French. According to Analysis 1, swing PSCs can then be conceived as a case where agreement fails to hold. I propose that through this agreement failure, the speaker wants to indicate that subjunctivehood is obtained through another way than the counterfactuality of p, i.e. that it is not because p is counterfactual that D(w) reaches outside of the context set, but rather through the counterfactuality/unlikeliness of q. This may serve a diplomatic purpose, if p has been put on the Table by another participant to the discourse.

Analysis 2. According to a second potential analysis of swing PSCs, *avoir* provides a past/perfect used to locate the described eventualities, in the scope of MOD (we then have NOW MOD (HAVE-p \rightarrow HAVE-q). We then predict an absence of shift in the temporal reference of the antecedent. Since the possibility is still open at NOW, we expect not to derive counterfactuality *stricto sensu*. But these past conditionals are still expected to be subjunctive conditionals, and therefore to indicate a greater uncertainty wrt the past/perfect propositions expressed in their clauses than the corresponding indicative conditionals.

That swing PSCs are acceptable, as we saw with (4), in a context where q is taken to be *false* (rather than simply unlikely) *prima facie* militates against Analysis 2. However, one can observe that even PICs are in fact not so unacceptable in a context where q is taken to be counterfactual (contrary to what I concluded earlier from (20)), cf. the example below.

(22) Pierre ne lui a pas téléphoné. S'il a eu un accident, il lui a Pierre NEG to-him has NEG called. If he has had an accident, he to-him has téléphoné. called

'Pierre didn't call her. If he had an accident, he called her.'

Concluding that data like (4) invalidate Analysis 2 might then be too hasty. I believe that the analysis of swing PSCs with future adverbials (or 'mismatched' swing PSCs, cf. [Ippolito, 2003]) might help to see what it the right strategy to pursue. I leave this for future research.

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