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A counterfactual cycle: Evidence from the French imperfect

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Abstract

The paper investigates the existence of a linguistic cycle for counterfactual imperfect constructions based on data from Latin and French. The study further aims at explaining why (imperfective) aspect is 'fake' in counterfactuals (Iatridou 2000). After arguing for a strict definition of counterfactuality, I expand on the idea that imperfects may trigger counterfactual implicatures. Then I explore the pragmatic origin and conventionalization of the counterfactual imperfect in Latin data and French corpora. Data unveil the repetition of a cycle: (i) the imperfect first develops in counterfactual contexts to refer to the past; (ii) it then expands to non-past counterfactual contexts and becomes part of the construction; (iii) finally the cycle ends when the imperfect construction is reanalyzed as a marker of unreality. In my analysis, aspect is 'fake' in counterfactuals because it has bleached as a consequence of the constructionalization of the imperfect counterfactual construction.

Keywords

Past tense, imperfect, fake aspect, counterfactuality, linguistic cycle, diachrony, Latin, French

4.1 Research questions

4.1.1 Aspect puzzles

During the last two decades, after Iatridou's seminal work (Iatridou 2000), the 'counterfactual' uses of past tenses have received extensive attention, notably in the domain of formal semantics.

'Counterfactuality' is generally taken to describe the meaning conveyed by tense constructions making reference to situations that are contrary-to-facts or merely potential (e.g. *I wish I had a Ferrari* or *if he won the lottery, he would travel the world*). These uses pose many challenges, among which the biggest is certainly the knotty issue of the manifold interaction with aspect. Indeed, aspect is structurally involved at different levels of counterfactual constructions and may cause diverse temporal-modal interpretations.

A first aspectual parameter is the opposition between a perfect past and a non-perfect past (see Iatridou 2000; Ogihara 2000; Arregui 2007; or Ippolito 2013 for different accounts), which expresses what I call here 'strong counterfactuality' *vs* 'weak counterfactuality' following Ippolito (2006, 2013). This amounts to the distinction between situations that are definitely contrary-to-facts and situations that may contextually be possible or unreal (see section 4.2 for a more thorough definition):

¹ In a previous paper (Patard 2019), I advocated for the more accurate terminological distinction between 'counterfactuality' and 'unlikelihood', cf. section 4.2 for the confusing use of the term 'counterfactuality' in the literature.

² Note that strong counterfactuality is temporally flexible whereas weak counterfactuality is restricted to the present and future domains (see for instance Declerck and Reed 2001, Ippolito 2003, Patard 2018, von Prince 2019). This point is developed in section 4.2.1.

(1) a If I **had won** the lottery, I would have travelled the world. (strong counterfactuality) b If I **won** the lottery, I would travel the world. (weak counterfactuality)

A second parameter is lexical aspect. With atelic predicates, the situation is by default present and contrary-to-facts, but it becomes realizable in the future – though unlikely – with telic predicates (see Martin 1991; Gosselin 1999; Arregui 2007³). The latter case corresponds to what Iatridou has dubbed 'Future Less Vivid' (2000: 234):

(2) a If Paul **was** on foot, he would be late at the meeting. (counterfactual) b If Paul **missed** the bus, he would be late at the meeting. (future-less-vivid)

A final and important parameter is the opposition between imperfective aspect and perfective aspect, which the present study will be primarily about. The imperfective/perfective distinction is at play when it is merged with indicative tense morphology and restricted to the past domain as is the case in some Romance languages or in Greek (see for instance Iatridou 2000; Ippolito 2004,; 2013; Bjorkman and Halpert 2013; Patard 2019). In those languages, the imperfective past tense (or 'imperfect') is obligatory in counterfactuals while the perfective past tense is unacceptable or renders the interpretation factual, as illustrated for French in (3) and (4):

(3) a Si je gagnais au loto, je voyagerais dans le monde entier. If in the entire world I the lottery Ι travel_{COND} win_{PST.IPFV} 'If I won the lottery, I would travel the world'. b Si *gagnai au loto, voyagerais dans le monde entier. je je If Ι in the entire world win_{PST,PEV} the lottery Ι travel_{conp} 'If I won the lottery, I would travel the world'. (4) de plus elle tombait. (counterfactual) a Un pas et One of more she $fall_{PST.IPFV}$ and step 'One step further and she would have fallen'. de plus tomba. (factual) b Un pas et elle One of more step and she fall_{PST,PFV} One step further and she fell'.

The obligatory use of the imperfect is very puzzling because aspect paradoxically proves to be 'fake' in such contexts (term coined by Iatridou (2000)): despite the imperfective morphology, the interpretation may be perfective. Let us consider the following French example:

(5) Si Philippe **finissait** un jour cette étude, il la dédierait à Mia. If Philippe **finish**_{PST,IPFV} one day this study he it dedicate_{COND} to Mia 'If Philippe **finished** this study one day, he would dedicate it to Mia.' (T. Benacquista, *Homo erectus*)

Here, *finir cette étude* 'finish this study' is an achievement that, despite the imperfect, is viewed as completed, as it is the condition of the consequent event described in the apodosis (*la dédier à Mia* 'dedicate it to Mia').

The issue of 'fake imperfects' in 'counterfactuals' has become a hot topic in the recent literature (see Anand and Hacquard 2010; Caudal 2011; Ippolito 2004, 2013; Bjorkman and Halpert 2013;

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³ For Arregui (2007), it is the stative/eventive contrast that is at stake.

Grønn 2013; Karawani 2014; Ferreira 2016 among many others). However the question of their origin has barely been explored, although diachronic investigation could provide precious insights and help understand why imperfects may become 'fake' when expressing 'counterfactuality'.

In the line of a previous work (Patard 2019), the paper proposes to tackle the diachronic issue by tracing back the origin of the French so-called *imparfait contrefactuel* (Berthonneau and Kleiber 2003, 2006; Bres 2006, 2009):

(6)Un peu plus, tu m' échaudais la main! Α little more, you me scald_{PST,IPEV} the hand 'A little more and you would have scalded my hand.' (R. Martin du Gard, Vieille France)

Discussion of Latin data and analysis of two French diachronic corpora will enable me to address the following questions:

- (i) How did imperfects become 'fake' in counterfactuals?
- (ii) What is 'fake' aspect?

4.1.2 Linguistic cycles

The present study will also be about linguistic cycles and the idea that language change is often unidirectional and cyclical. For van Gelderen (2011: 3),

A **cycle** can be defined as a time span during which certain events take place and come to a conclusion. Towards the end of the cycle, **similar events start again**, but they are (slightly) different and happen at a different pace. The changes are therefore unidirectional.⁴

Accordingly, I consider that when a similar sequence of events affects a language more than once in its history, we have the repetition of a *linguistic cycle*. The notion of *spiral* has also been used for a long time and is still used in the literature (cf. Meillet 1921 or more recently Haspelmath 2018) to insist on the fact that a motif of changes never leads back to the exact same starting point and that each round differs in a way or another. However, I prefer the term *cycle* also employed (see for instance Heine et al. 1991 or van Gelderen 2013) because it stresses the existence of regular patterns that may recur in time and the idea that linguistic expressions tend to go through similar paths of evolution.

Processes of grammaticalization are typically cyclical. Indeed, the renewal of grammar involves rounds of grammaticalization: older grammatical constructions are constantly challenged and ultimately ousted by emerging constructions undergoing grammaticalization. This idea is expressed since the earlier works on grammaticalization (Meillet 1921: 140). As far as the TAM domain is concerned, much has been written on the future cycle which was first described by Meillet (1921: 140). The future cycle is considered to be *anasynthetic* (term proposed by Haspelmath 2018: 101) as it involves the replacement of an old synthetic form by a new analytic form that later becomes synthetic in turn. This cycle is well attested in Latin and French (see Fleischman 1982 or more recently Detges 2020), where the etymological future *cantabo* has been replaced by the originally periphrastic romance future, e.g. Fr *chanterai*, itself challenged since the 15th century by the periphrastic go-future *vais chanter*⁵:

(7) Latin cantabo (synthetic)

⁴ Boldface is mine.

⁵ One more round may be observed in Haïtian French that uses the synthetic future *m'ap-chanté* coming from the coalescence of *moi après chanter* (ME AFTER SING 'I will sing') (cf. Hagège 2013: 121).

(8) a Late Latin cantare habeo (analytic)
b Romance *[cantar + ajjo]⁶ (analytic)
c Old French chanterai (synthetic)

(9) Modern French vais chanter (analytic)

Other TAM cycles are well attested and discussed (cf. the 'path of the perfect' – see Lindstedt 2000 – or the 'progressive cycle' – see Deo 2015), but very little has been written so far on the 'counterfactual cycle'. Only Dahl (1997: 108-109) sketches the life-cycle of counterfactual markers based on the diachrony of the Germanic past markers (amongst which pluperfects and conditional tenses). There would be, according to him, four steps:

- (i) The marker is optional to express 'strict' counterfactuality and is restrained to past reference;
- (ii) The marker become obligatory to express past counterfactuality;
- (iii) The marker expands to non-past contexts;
- (iv) The marker expands to hypothetical contexts, thus expressing 'open' counterfactuality.

In the present study, I will look at Latin and French data and consider another tense that also exhibits counterfactual usage: the imperfect. Because the TAM system is different from Germanic and because the imperfect merges past and imperfective morphology, the study will permit to complete the global picture in the counterfactual life-cycle. While doing so, I also address some general questions formulated by van Gelderen about linguistic cycles (2016: 8):

- (i) Which cycles exist and why?
 - i. Which semantic and grammatical features participate in cycles?
 - ii. What are the sources of renewal?⁷
 - iii. At what point in the cycle does the renewing element appear?
- (ii) Are there typical steps in a cycle?
 - i. Why are some changes frequent or infrequent?
 - ii. What structural factors interfere in this process?

Before analysing the data, I present the theoretical foundations of the study.

4.2 'Counterfactuals' and counterfactuality

4.2.1 'Counterfactual' constructions

In line with previous work (Patard 2019), I claim that the widespread use of the term 'counterfactuality' is confusing because it refers to two semantic interpretations that are generally conveyed by distinct constructions across languages. The first one is 'weak counterfactuality', which I will briefly characterize below but disregard in the rest of the paper. The second one is 'strong counterfactuality' which I consider to be genuine *counterfactuality* and that will be the very subject of the study.

From a morphological point of view, markers of 'weak counterfactuality' are typically marked by 'one layer of past morphology' (to borrow Iatridou's (2000) terminology), i.e. an imperfect or indefinite past, and may be combined with subjunctive or future morphology. Here are some examples where the denoted situation is unreal:

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⁶ Form reconstructed by philologists.

⁷ The original question: 'what are the sources of renewal once a cycle has desemanticized a lexical item', is not relevant in the case of imperfects.

(10) English If your plants $\mathbf{had}_{\underline{PST}}$ enough light, they **would be doing**_{FUT.PST} much better. (Arregui

2007)

(11) Italian Se **avessi**_{SBJV.PST} dei soldi, mi **comprerei**_{FUT.PST} una Ferrari.

'If I had money, I would buy a Ferrari.'

Note that they may also correspond to Iatridou's 'Future Less Vivids', which denote situations that are not fully excluded from reality but may still happen in the future:

(12) French Je **souffrirais**_{FUT.PST} trop, si tu **revenais**_{PST.IPFV}.

'I would suffer too much, if you came back.' (Cl. François)

(13) German Wenn morgen die Sonne **schiene**_{SBJV.PST}, **ginge**_{SBJV.PST} ich spazieren.

'If the sun shined tomorrow, I would go for a walk'.

This suggests that the meaning encoded by the construction is *unlikelihood* – the speaker assumes that not p is more likely than p $(\neg \pi p)^8$, but that the context may specify p's status and implicate *unreality* – non p $(\neg p)$. Several contextual parameters have been identified in the literature: present time reference, stative/atelic predicates, world knowledge, epistemic state of the speaker etc. (see Martin 1991, Gosselin 1999, Arregui 2007, Patard 2018). Another common denominator of contructions expressing 'weak counterfactuality' is their present/future interpretation. 'Weak counterfactuality' can never be past as shows the incompatibility with past adjuncts (e.g. If Grannie **missed**_{PST} the last bus *yesterday, she would walk_{FUL,PST} home).

As for (strong) *counterfactuality*, it is usually expressed by 'two layers of past morphology' (in Iatridou's (2000) terminology) which in European languages take the form of a past perfect. Again, it may be combined with subjunctive or future morphology:

(14) English If JFK had not been assassinated_{PST,PRF}, he would obviously have been re-

 $elected_{FUT.PST.PRF}$.

(15) German Wenn gestern die Sonne **geschienen hätte**_{SBJV.PST.PRF}, **wäre** ich spazieren

gegangen_{SBJV.PST.PRF}.

'If the sun had been shining yesterday, I would have gone for a walk'.

However, as is less well recognized, constructions with simplex indicative pasts may also mark *counterfactuality*. They all happen to be *imperfects* that have to be present at least in the apodosis (see Ippolito 2004, 2013; Patard 2019).

(16) Spanish Si lo **sabía**_{PST,IPFV}, **venía**_{PST,IPFV}. (Martinez-Atienza 2012)

'If I had known it, I would have come.'

(17) Italian Se **partivi**_{PST,IPFV} domani, **incontravi**_{PST,IPFV} mia sorella. (Ippolito 2004)

'If you had left tomorrow, you would have met my sister'.

(18) French Si je n'étais pas intervenu, ça **se finissait**_{PST,IPFV} au couteau. (Patard 2007)

'If I hadn't intervened, it would have ended up with stabbing.'

From a semantic point of view, these constructions never license anything but *counterfactuality stricto sensu*. The situation described is definitely excluded from reality, even when it belongs to the future domain. Another feature of true counterfactual sentences is their temporal interpretation: time reference is past by default but possibly flexible. A temporal adjunct may permit a non-past interpretation:

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 $^{^{8}}$ 'It is not probable that p is the case' (π stands for 'probable').

(19) a If John had run the Boston marathon, he would have won. (past) b If John had run the Boston marathon TOMORROW, he would have won. (future)

From what precedes, one may conclude that there is not one type but two types of 'counterfactual constructions' with distinct morphological and semantic features:

- (i) past constructions expressing *non-past reference* and *unlikelihood*; contextually, *unlikelihood* may yield a more specific interpretation: *unreality* ('weak counterfactuality');
- (ii) past perfect or imperfect constructions with a *past default interpretation* and a *counterfactual* meaning in the strict sense ('strong counterfactuality'); time reference is flexible if the context demands it.

The present study focuses on counterfactual constructions in the strict sense and specifically on one-past indicative constructions that have been less studied than two-past constructions. But first, a more precise definition of *counterfactuality* is needed to distinguish it conceptually from *unreality*. This is the aim of next section.

4.2.2 Towards a definition of counterfactuality

As Dahl (1997) demonstrates, *counterfactuality* (in the strict sense) always says something about the past: it crucially relies on a past *choice point* (p. 107) from which a 'blocking factor' (Leirbukt 1991) prohibits the realization of the situation. In a branching-futures model à *la* Tedeschi (1981), where the infinite possibilities of the course of events are represented as tree-like bifurcations, the past *choice point* corresponds to the deciding moment when the actual branch has bifurcated from the alternative hence counterfactual - branches. For instance, in the context of Tedeschi's example:

(20) If Germany had invaded England, they would have won the war.

The past choice point would be the battle of Britain and the counterfactual branches would be all the possible scenarios arising from the defeat of the British air force. To draw a parallel with the domain of literary genres, counterfactuality is precisely what defines the genre of uchronia⁹ or 'alternate history'¹⁰. What is depicted in uchronias is counterfactual worlds close to ours but that have forked from actual history at some point in the past: if Carthage had triumphed against the Roman empire ..., if the Union had lost the American Civil War..., if the Nazis had invaded England... In languages, counterfactual markers just do the same: they serve to evoke unreal situations that were possible in the past, but have been prevented to happen. In a sense, counterfactual markers are 'real pasts', they always refer to a past moment (known or presupposed) which constitutes the origin of the divergence between factuality and counterfactuality.

This conception of *counterfactuality* may be formalized the following way:

(21)
$$\exists t < \mathbf{S}$$
 [$< \mathbf{t}$, \mathbf{p} or $\neg \mathbf{p}$] [$> \mathbf{t}$, $\neg \mathbf{p}$]

(21) reads: there exists a time t preceding the time of speech S; before t, p and non p are open possibilities and after t we have only non p. In other words, a situation is counterfactual when it ceased to be possibly the case at some past time. It follows that *counterfactuality* is conceptually more

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⁹ Greek compound meaning literally '(in) no time' (from privative *u*- and *chronos* 'time').

¹⁰ See for instance Hellekson (1998).

restricted than *unreality* which says nothing about the past. Unreal worlds are just different worlds where the situation is not the case ($\neg \mathbf{p}$), nothing is said about whether they have diverged in the past from the actual course of events. This conceptual difference can be captured by looking at counterfactual and unreal conditionals in languages. In English for instance, it is marked by the opposition between 'one-past' conditionals and 'two-pasts' conditionals (supra 4.2.1). Compare Lewis's (1973) famous example in (22a) to its counterfactual version in (22b):

(22) a If kangaroos **had** no tail, they **would topple over**. (*unreality*) b If kangaroos **had had** no tail, they **would have toppled over**. (*counterfactuality*)

Example (22a) merely says that p is not the case, because indeed kangaroos do have a tail. By contrast, the interpretation of (22b) is a bit more specific as it seems to refer to some past moment. Indeed, (22b) would be most adequate in a context like this: there was a time, in the history of species evolution, when kangaroos could have had no tail, but something happened (a mutation spread?) and the ancestor of the kangaroo grew a tail. As a consequence, the possibility not to have a tail has been ruled out ever since. These contextual implications based on a presupposed past moment could not be conveyed by (22a). In a nutshell, *counterfactuality* suggests a bifurcation from actuality, but *unreality* does not.

4.2.3 To sum up

Figure 4.1 represents the conceptual domains of *counterfactuality*, *unreality*, and *unlikelihood* evoked so far which all belong to the domain of *hypotheticality*¹¹.

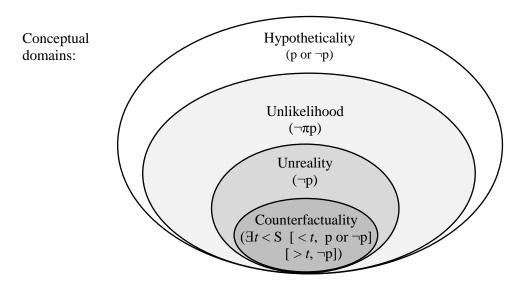


Figure 4.1 Counterfactuality and other conceptual domains

From now on, the study focuses on imperfect constructions expressing counterfactuality. But before turning to the data, I will introduce the pragmatic diachronic model that will be operationalized afterwards.

 $^{^{11}}$ A situation is hypothetical when the validity of p is not stated: it may be either p or non p (p or $\neg p$).

4.3 An implicature-based model

In a previous study (Patard 2019), which I briefly summarize here, I have argued that imperfects may develop a counterfactual interpretation through the conventionalization of a scalar implicature.

4.3.1 Counterfactuality as scalar implicature

The analysis I defend builds on the general idea formulated in previous works (Ziegeler 2000, Ippolito 2004 or Verstraete 2006) that past tenses may give rise to modal scalar implicatures that are derived from Grice's quantity submaxim 2: 'Do not make your contribution more informative than is required'. Past tenses are seen as less informative than alternative tenses that could occur in the same contexts thus forming a scale of informativeness. The under-informative use of the past tense in some marked contexts then triggers a Q-based implicature (Horn 1984, 1989), i.e. an 'upper-bounding' inference according to which the hearer should not interpret more than what is said. The implicature could then be that what is further said by the more informative tense does not hold, which leads to the counterfactual interpretation of its content.

In the case studied here, counterfactuality is an 'upper-bounding' inference triggered by an imperfect. Indeed, imperfects can be analysed as being less informative than 'bounded pasts' – perfective pasts or aorists – because, as 'unbounded pasts', they focus on the inner subintervals of a situation without taking into account its boundaries. By contrast, 'bounded pasts' construes a global viewpoint on the situation. As a consequence, when an imperfect occurs in a progressive context with a telic predicate, it produces an 'imperfective paradox' (Dowty 1979)¹²: it then fails to entail that the situation is completed because it is blind to its outcome (Fre *Pierre courait le marathon* 'Pierre was running the marathon' \Rightarrow *Pierre a couru le marathon* 'Pierre ran the marathon'). By contrast, a bounded past asserts that the situation has reached its natural endpoint and is completed. Hence the following scale of informativeness (the first element is the more informative, the second the less informative) that characterizes 'imperfective paradox' contexts:

(23) \(\begin{aligned}\) bounded past, unbounded past \(\rangle\) 'imperfective paradox'

In some contexts, the imperfective paradox is exploited by speakers to trigger a Q-based implicature, namely that the content conveyed by the more informative bounded past does not hold ($\Rightarrow \neg p_{\text{bounded past}}$). The following utterance from French is a typical example of an 'imperfective paradox' triggering the implicature $\neg p_{\text{bounded past}}$:

(24) French Paul **se noyait**_{PST.IPFV} (*vs* **se noya**_{PST.PFV}) lorsque le maître-nageur plongea. 'Paul **was drowning** (*vs* **drowned**) when the lifeguard dived'.

In (24), the imperfect *se noyait* indicates that the alternative utterance with the perfective past *se noya* is too informative. With the surbordinate clause *lorsque le maître nageur plongea*, it further implicates $\neg p_{\text{se noya}}$ (non p with *se noya*}. Eventually one infers that Paul did not drown. The bounded past *se noya* licenses the opposite interpretation: Paul did drown when the lifeguard dived. It is important to stress that counterfactuality is an implicature (and not the encoded meaning) and that, as such, it can be contextually cancelled (cf. *Il était déjà trop tard* 'it was already too late' in (24')):

(24') French Paul **se noyait**_{PST.IPFV} lorsque le maître-nageur plongea. *Mais il était déjà trop tard*. 'Paul **was drowning**, when the lifeguard dived. But it was already too late.'

The 'imperfective paradox' explains the constitutive elements of counterfactuality:

¹² Dowty's analysis of the 'imperfective paradox' is based on the English progressive, but the same analysis can be applied to imperfects.

- (i) because it is viewed as ongoing, the event is seen as possible but its outcome is undecided (p or \neg p may be valid);
- (ii) the imperfect may further implicate in some contexts that the event eventually did not occur and consequently become counterfactual $(\neg p)$.

This analysis buttresses the formalization of counterfactuality given in (25):

(25)
$$\exists t < S$$
 [$< t$, p or $\neg p$] [$> t$, $\neg p$] (implicature)

4.3.2 Conventionalization of counterfactuality

Counterfactuality may then conventionalize in some contexts under certain circumstances. To account for this, I adapt Heine (2002)'s model for semantic change. According to the model, the semantic evolution of a grammatical item from one meaning to another is marked by two types of intermediate stages or contexts: (i) *bridging contexts*, where the source meaning triggers an inference and both are contiguous in the interpretation, and (ii) *switch contexts*, where the source meaning is backgrounded or has become inconsistent with the interpretation. The semantic shift is completed when the target meaning has become the conventionalized meaning associated with the grammatical item. I further hypothesize that each type of context shows various degrees of fixation on a cline that may ultimately lead to a new grammatical construction or grammatical constructionalization (Traugott and Trousdale 2013). The intermediate stages of bridging and switch context would correspond to 'assemblies', which are 'recurrent configurations of existing constructions and their co-text/context, which do not (yet) have constructional status themselves' (Petré 2019: 159). One may also think that switch contexts may exhibit some constructional features although the whole assembly does not yet constitute a construction *per se* as it is not conventionalized as a proper linguistic unit.

If one applies this model to the emergence of counterfactual imperfects, one may predict the following scenario:

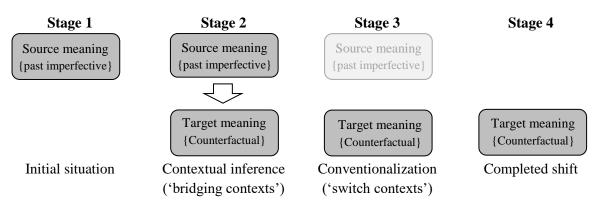


Figure 4.2 From past imperfectivity to counterfactuality

- (i) At first, only a past imperfective meaning is interpreted.
- (ii) Then the past and imperfective meaning of the imperfect is interpreted alongside a counterfactual implicature.
- (iii) In a more advanced stage, the imperfect has extended to new contexts where the past and imperfective meaning is backgrounded or has become inconsistent with the interpretation (cf. switch contexts in Heine's model). Counterfactuality is the only interpreted meaning. One may assume that the counterfactual implicature is

- conventionalizing at the expense of the tense and aspect meaning (past and imperfective morphology may be fake). ¹³
- (iv) Finally, counterfactuality no longer needs to be supported by the contexts that gave rise to it. The imperfect can be used with this interpretation in new contexts. The semantic shift is completed.

In the next sections, I present diachronic data that seem to confirm the pragmatic origin of counterfactuality, but also suggest the existence of a linguistic cycle with the repetition of similar events leading to the conventionalization of counterfactuality. First, I retrace a primary cycle that can be observed with the counterfactual imperfect in Latin. Then I discuss my own data for French based on the study of a corpus.

4.4 The counterfactual imperfect cycle in Latin

The present section describes a first round of the life of a counterfactual imperfect that takes place in Latin. Data highlighted by linguists (notably Haverling) show that Latin may have developed a counterfactual imperfect construction (4.4.1, 4.4.2, 4.4.3), which have then semantically evolved before disappearing (4.4.4).

4.4.1 Initial stage

The Latin imperfect is a typical imperfect with a past and imperfective meaning. It is mostly used to refer to background situations (see for instance Haverling 2008, 2010, 2018 or Pinkster 2015: section 7.18). The imperfect may then describe stative or iterative situations. It also frequently expresses the progressivity of contingent situations:

(26) ClaLat iamque iugis summae **surgebat_{PST,IPFV}** Lucifer Idae / **ducebat_{PST,IPFV}** que diem, Danaique obsessa **tenebant_{PST,IPFV}** / limina portarum, nec spes opis ulla dabatur. / Cessi et sublato montes genitore petivi.

'Now the Dawn Star **was rising** from the ridges at the top of Ida and **was bringing** the day. The Danaans **were holding** the entrances of the gates under guard and no hope of succour was offered. I gave way, picked up my father, and made for the mountain'. (*Aeneid*, Virgil, 1st century BC, *in* Pinkster 2015: 419)

In certain contexts, when combined with a telic predicate, it refers to a terminative event that is interrupted by another event. The *imperfect* may then be interpreted as 'conative' for the action is not successful (see Pinkster 2015: 380-381 or Haverling 2018: 239). In fact, the imperfect is the sole way to express interrupted progressivity in Classical Latin as the progressive periphrasis emerged only in Late Latin (cf. Haverling 2010, 2018).

(27) ClaLat **ueniebatis**_{PST,IPFV} in Africam (...) prohibiti estis in prouinci a uestra pedem ponere 'you **were going** to Africa (...) but you were prevented from setting foot in your province' (*Oratio pro Ligario* 24, Cicero, Ist century BC)

More generally, one may consider these types of contexts cases of an 'imperfective paradox' since the imperfect cannot entail the completion of the event in the past (cf. 4.3.1). And, as another event occurs during the unfolding of the first event and prevents its continuation, the imperfect further implicates counterfactuality (cf. 4.2): the first event was possible in the past (<t, p or \neg p), but it did not finally

¹³ My position differs from Heine's model which puts conventionalization only at the following and last stage.

occur (> t, \neg p). As the source meaning (imperfective past) and the target meaning (counterfactuality) are contiguous in the interpretation, these progressive contexts can be analyzed as bridging contexts.

4.4.2 Counterfactuals

In Early Latin, counterfactual conditionals require the use of a subjunctive imperfect to refer to past situations but in Classical Latin the subjunctive imperfect becomes temporally flexible and spreads to non-past contexts (28). It is then progressively replaced by the subjunctive pluperfects (Thomas 1938; Sabanééva 1996; Haverling 2013). During the same period, indicative pasts are increasingly used in the apodosis of past counterfactual conditionals to describe 'what would certainly be the case if a certain condition were fulfilled' (Haverling 2010: 143). They could either be imperfects (29), pluperfects (30), or perfects (31), even though the latter is less frequent (Pinkster 2015: 660). Indicative pasts seem to be preferably used with modal expressions (see *posse* 'can' in (30) and (32)), concessive expressions, negation (see *tamen* 'however' and *non* 'not' in (29)) or adverbials meaning 'almost' like *paene* (cf. Haverling 2013: 33-35; Pinkster 2015: 660).

- (28) ClaLat Non dissimulo me nescire ea quae, etiam si **scirem**_{SBJV.PST}, **dissimularem**_{SBJV.PST}.

 'I do not hide from you that I do not know what I **would have hidden** from you, if I **did know** about it'. (*De Domo Sua* 121, Cicero, Ist century B.C., *in* Haverling 2010: 142)
- (29) ClaLat Sed is fieri nullo modo **poterat**_{PST.IPFV}, si Herodotus quidam adesset_{SBJV.PST}.

 'But he **would** not **have been able** (lit. **was**) to get the position (sc. as High priest), if a certain Herodotus had been present'. (*In Verrem* II.2.128, Cicero, Ist century BC, *in* Haverling 2010: 144)
- (30) ClaLat Inimicum habebas neminem; si haberes_{SBJV.PST}, tamen non ita **vixeras_{PRF.PST.IPFV}** ut metum iudici propositum habere deberes.

 'You had no enemies. If you had had any, you **would have** not **lived** (lit. **had lived**) so as to be able to fear the courts'. (*In Verrem* II.5.74, Cicero, Ist century B.C., *in* Pinkster 2015: 660)
- (31) ClaLat (...) deleri totus exercitus **potuit**_{PRF}, si fugientes persecuti uictores essent_{SBJV.PST}.

 'the whole army **could** have been destroyed (lit. **could** be destroyed), if the victors had pursued the routed enemy'. (*History of Rome* 32.12.7, Livy, 1st century BC, *in* Haverling 2010: 144)

The expansion of indicative pasts in counterfactuals may be explained by the growing temporal uncertainty of the subjunctive imperfect. The indicative pasts may have been attracted in these counterfactual contexts to disambiguate the time reference of the situations, hence meeting a semantic need. The fact that both bounded (pluperfects and perfects) and unbounded tenses (imperfects) are used indicates that their function is essentially temporal; they compensate for the subjunctive imperfect's ambiguity by anchoring the situation in the past domain. Furthermore, according to Haverling (2010: 144-145), such uses produce a 'clash' between the realis sense of indicative pasts and the irrealis sense expressed by the subjunctive in the protasis. One may consequently see them as 'extravagant' uses (Haspelmath 1999) or 'expressive' means (Detges and Waltereit 2002) that enable the speaker to emphasize that the situation would have certainly been valid if only the adequate conditions had been met. By contrast, the past and pluperfect subjunctives simply present the situation as unreal (cf. Harris 1986: 416; Bybee et al. 1994: 239; Haverling 2010: 143).

Such contexts correspond to a second type of counterfactual bridging context (besides the 'conative' contexts described above): the imperfect keeps its past and imperfective meaning while occurring in a counterfactual context. But contrary to 'conative' contexts, counterfactuality is only

based on the context (a past or pluperfect subjunctive used in the protasis) and the imperfect does not implicate ¬p.

In another type of context, the imperfect occurs in the apodosis of counterfactuals with telic predicates (like in the 'conative' use). The imperfect then shows the event as unfolding (in (32) the mothers and sisters are on their way to the trial), and says nothing about the completion of the event. These are cases of 'imperfective paradox' (see section 4.3.1):

(32) ClaLat [...] si per Metellum licitum esset_{SBJV.PST}, matres illorum miserorum sororesque **ueniebant**_{PST.IPFV}; quarum una ... mihi obuiam uenit.

'if Metellus had allowed it, the mothers and sisters of those poor creatures **would** surely **have come** (lit. **were coming**); one of them came to meet me'. (*In Verrem* II.5.129, Cicero, 1st century BC, *in* Haverling 2010: 145)

Here, the imperfect further involves counterfactuality: because it cannot entail the completion of the event, it contextually implicates that the event is not completed. In doing so, the imperfect is semantically in harmony with the conditional context it occurs in. Aspectually, the imperfect indicates that the event was already unfolding, which further emphasizes the certainty of its realization if not for the blocking event denoted in the protasis. So it seems that the combination of the imperfect with telic predicates enhances its 'expressive' or 'extravagant' potential in the counterfactual by comparison with other tenses.

The aforementioned contexts may correspond to another type of bridging contexts in which the imperfect and the counterfactual conditional form a pattern or 'assembly' (Petré 2019), which provides an expressive way to describe counterfactual events that were prevented though they were set to happen.

4.4.3 Switch contexts

Signs of conventionalization are found in Classical Latin (from the 1st century onwards according to the consulted data) as the imperfect extends to non-past counterfactuals. This happens in parallel to the generalization of the pluperfect subjunctive to refer to past counterfactual situations instead of the imperfect subjunctive that was used before (Thomas 1938; Sabanééva 1996). Let us consider the two examples from Seneca:

(33) ClaLat Si hoc ei optares_{SBJV.PST}, cuius nullum beneficium haberes, inhumanum **erat**_{PST.IPFV} uotum.

'if you wished this to be the fortune of one from whom you received no benefit, your desire **would be** (lit. **was**) cruel'. (*De Beneficiis* VI.26.2, Seneca, 1st century AD, *in* Haverling 2010: 143)

(34) ClaLat Non **poterat**_{PST.IPFV} capi nisi capere vellet_{SBJV.PST}.

'He **could** not have been captured (lit. **could** not be captured), if he had not wanted to be captured'. (*Thyeste*, 289-290, Seneca, 1st century AD, *in* Sabanééva 1996: 116)

The two counterfactual situations described by the imperfect have a different temporal grounding: one is non-past (33), the other is past (34). This temporal flexibility suggests that the construction is losing its past meaning, i.e., tense is going fake while counterfactuality is becoming the sole encoded meaning. One may hypothesize this goes together with the fixation of the configuration, which means that the imperfect is now a constitutive element of a new counterfactual construction: [si p_{SBJV.PST}, q_{PST.IPFV}]. However, this construction is rarely used and/or little documented; further corpus studies would be needed to confirm its constructional status. What we know for sure is that [si p_{SBJV.PST},

 $q_{PST.IPFV}$] undergoes crucial changes in the post-classic period, which bring an end to the counterfactual cycle.

4.4.4 End of the cycle

In Late Latin, [si p_{SBJV.PST}, q_{PST.IPFV}] expands to new contexts and seems to be reanalyzed as a marker of *unlikelihood* (see section 4.2). From around 400 AD, the construction begins to refer to unlikely situations which are not necessarily unreal and may occur in the future (cf. (35) and (36)). Such contexts become very common in 6^{th} - 7^{th} century texts (Haverling 2010, 2013):

- (35) LatLat Tamen tu neque diues neque pauper es. Hoc si agnosceres_{SBJ.PST}, felix **eras_{PST.IPFV}**. 'but you are not rich nor are you poor. If you could recognize that, you **would be** happy'. (*Querolus*, Anonymous, around 400 AD, *in* Haverling 2010: 148)
- (36) LatLat Ecce! Pater tuus senuit (...). Si (...) illi moreretur_{SBJV.PST}, recte tibi (...) regnum illius **reddebatur**_{PST.IPFV}.

 'I ook! Your father is old ___if he were to die his kingdom **would** correctly **he give**

'Look! Your father is old ... if he were to die, his kingdom **would** correctly **be given** back to you'. (*History of the Franks*, Gregory of Tours, 6t^h century, *in* Haverling 2010: 148)

At this stage, counterfactuality is not encoded anymore by the construction which now more broadly refers to unreal or unlikely situations. This semantic generalization ends the counterfactual cycle.

During the same period, the construction [si p_{SBJV.PST}, q_{PST.IPFV}] increasingly uses the modal periphrasis INF + habere to emphasize the inevitability of the situations if the right conditions are met (Thomas 2012, Patard and De Mulder 2014). This is not a trivial observation, for the periphrasis in the imperfect - INF + habebam – is the source structure of certain Romance conditional tenses like the French $conditionnel^{14}$. Here is an example of the Latin ancestor:

si diceret_{SBJV.PST} « fines terrae », et non diceret « uniuersi fines terrae », **dicere**habebant_{PST.IPFV} (...).

'if he said "the limits of the earth", and not all the limits of the earth", they **would say**(...)' (*The Enarrations on the Psalms*, Augustine of Hippo, 21.2.28, around 400 AD, *in*

Thus, the use of a plain imperfect without the periphrasis in the construction [si p_{SBJV.PST}, q_{PST.IPFV}] will not survive in French but it is replaced by a newly grammaticalized conditional tense. Thus, the formerly counterfactual construction based on the imperfect is now of the form [si p_x¹⁵, q_{COND}]. The meaning has also changed: the construction does not express counterfactuality but unlikelihood and it is no more temporally flexible but can only refer to non-past situations (cf. 4.2.1). See the Old French example:

(38) OldFre Se ore esteie_{PST.IPFV} de son père vengiez, molt en **sereie**_{COND} balz et joianz et liez. 'If I were now avenged on his father, I **would be** happy, cheerful and glad.'

(*Coronement du Roy Looye*, Anonymous, 12th century, in Wagner 1939: 260)

4.5 The counterfactual imperfect cycle in French

Haverling 2010: 150)

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¹⁴ Note however that, in other Romance languages, it is the perfect form of habere + INF - habui + INF - that is the source construction. This is the case for the Italian conditional tense.

¹⁵ X can be an indicative imperfect or a subjunctive past form.

A second round of the life of the counterfactual imperfect takes place in French and leads to the grammaticalization of a new counterfactual imperfect construction, the so-called 'imparfait contrefactual' (see Berthonneau and Kleiber 2003, 2006; Bres 2006, 2009) also known as the 'imparfait d'imminence contrecarrée' because it very often bears an imminent/proximative connotation (see for instance Guillaume 1971; Wilmet 1997; Busuioc 2004; Kronning 2017):

(39) Un peu plus, tu m'échaudais la main!

'A little more and you would have scalded my hand.' (R. Martin du Gard, Vieille France)

It has a bipartite structure with a left non-verbal element x: [x, PST.IPFV] (e.g. *un peu plus* 'a little more', cf. Berthonneau and Kleiber 2006). For Bres (2009), it corresponds to a correlative construction like [the more x, the more x]. The left element can take many different forms but most frequently it serves to build an 'exceptive' construction (e.g. sans x, q 'without x, p', cf. Busuioc 2004) or a '(de)cumulative' construction (e.g. un peu plus (et) p / un peu moins (et) q 'a little more (and) p' / a little less (and) q', cf. Busuioc 2004)¹⁶.

The present section aims at tracing the emergence of these counterfactual imperfect constructions in the history of French on the basis of a corpus-based analysis.

4.5.1 Corpora and methodology

Two diachronic corpora were exploited to unveil the origin of the counterfactual imperfect constructions: the *BFM* (*Base du Français Médiéval*) and *Frantext*. In the BFM, I used the sub-corpus that is POS-tagged and verified: it amounts to 39 texts (1 500 798 words and punctuation marks) ranging from the 11th century to the 15th century. The *Frantext* corpus (262 860 963 words) has been used to supplement the medieval data with additional examples and explore later periods from the 16th century until the 21st century. To extract the data, I used the following methods.

For the *BFM*:

- (i) I identified all the finite verb forms from the 'verified' sub-corpus with the tag 'VERcig'.
- (ii) I manually sorted the finite verb forms in order to make two lists: one for the imperfect forms and one for the subjunctive imperfect forms of *avoir* and *estre*, the auxiliaries of the subjunctive pluperfect. For the sake of feasibility, the indicative imperfect list was restricted to the 250 more frequent forms.
- (iii) On the basis of the two lists, I extracted the collocations of every indicative imperfect with *avoir* and *estre* in the subjunctive imperfect and the conjunction se^{17} ('if') within a contexts 20 words *via* the tool *Contexte*.

In other words, I targeted counterfactual conditionals using a subjunctive pluperfect in the protasis and an imperfect in the apodosis (*se* p_{SBJV.PRF.PST}, q_{PST.IPFV}), for the subjunctive pluperfect morphologically corresponds to the auxiliary *estre* ('be') or *avoir* ('have') in the subjunctive imperfect and the main verb in the past participle. The query also permitted to extract the subjunctive imperfect of *avoir* and *estre*, the two more frequent verbs of French. Indeed, the subjunctive imperfect is the expected verb form used in Old French counterfactuals until it starts to be challenged by the subjunctive pluperfect in the 13th century and becomes much less used in the 14th century (see Wagner 1939: chap. 2)¹⁸. It was consequently important to be able to extract at least the subjunctive imperfect of these two verbs for

¹⁶ See also Berthonneau and Kleiber 2006; Bres 2009 or Kronning 2017 for a detailed analysis of these constructions.

¹⁷ All the possible forms of *se* were also taken into account.

¹⁸ The subjunctive imperfect continues to be used in Middle French only with a few verbs: *estre*, *povoir*, *voloir*, *devoir*, *valoir* etc. (see *ibidem*).

the earlier period. I did not look for the configuration with an indicative imperfect in the protasis because in French the counterfactual imperfect only occurs in the apodosis (contrary to other Romance languages like Italian or Spanish, cf. examples (16)-(17) quoted above).¹⁹

For *Frantext*, the goals were the same but the methodology was slightly different because conjugated verbs are not tagged in the database. I consequently had to use CQL syntax to search for the verb forms.

- (i) I first formulated a CQL query to identify imperfect forms from their endings.²⁰
- (ii) To target counterfactual conditionals, I retrieved the forms of *avoir* and *être* in the subjunctive imperfect, but also in the indicative imperfect. Indeed, from the end of Medieval French, subjunctive counterfactuals are challenged by indicative counterfactuals that use indicative pluperfects in the protasis (see Wagner 1939). It was thus necessary to look for both types of counterfactuals. To do so, I used the tool *Liste de mots*, which identifies all the forms of a given lemma in order to isolate the imperfect forms of *avoir* and *être* in the indicative and in the subjunctive.
- (iii) I then searched for the collocations of an imperfect with *avoir* or *être* in the indicative or subjunctive imperfect followed by a past participle and with the conjunction *si* ('if') *via* the tool *Recherche avancée*.

This method allowed me to target counterfactual conditionals with an indicative or subjunctive pluperfect in the protasis and an imperfect in the apodosis: si $p_{SBJV,PRF,PST}$, $q_{PST,IPFV}$ and si $p_{PRF,PST}$, $q_{PST,IPFV}$. The CQL syntax covered all the tokens with an imperfect, whatever the verb. However, because of technical limitations, I had to restrict the contexts to a maximum length of 15 words. Because I ended up with a very large amount of hits, I also had to limit the subsequent analysis to random samples. The samples were made for each construction (indicative or subjunctive) and for each century by extracting around 500 hits, and manually eliminating false hits. But, as the subcorpora vary greatly in size in Frantext, the extracted samples could not be quantitatively compared.

As for the correlative constructions of the type $[x, q_{PST.IPFV}]$, I chose to focus on two types of structures that are described as typical in the literature: (i) the 'exceptive' $[sans\ x, q_{PST.IPFV}]$ ('without p, q') and (ii) the '(de)cumulative' $[x\ de\ plus/moins\ (et)\ q_{PST.IPFV}]$ ('x $more/less\ (and)\ q$ ') and $[un\ peu\ plus/moins\ (et)\ q]$ ('a little $more/less\ (and)\ q$ '). For the $[sans\ x, q_{PST.IPFV}]$ construction, I looked for examples where x corresponds to a maximum of two words and is separated from the imperfect by a maximum of 3 words. For the '(de)cumulative' construction, there was a maximum of 6 words between de/un + plus/moins and the imperfect. The investigation was carried out in Frantext using CQL syntax and the tool $Recherche\ avanc\'ee$. Random samples were also used.

This method allowed me to extract 453 tokens of counterfactual imperfects in conditionals, exceptive and (de)cumulative constructions. Because of methodological constraints, the collected data are skewed to some extent: less frequent verb forms and long sentences could not be retrieved and analyzed and when I used samples (from the 16th century), many tokens were discarded. Moreover, my method of working with selected samples makes it impossible to compare the constructions' frequencies across time and is consequently inappropriate to conduct a proper quantitative analysis. However, I consider the data to still offer a good empirical base to investigate the counterfactual cycle in French. To do so, I adopt a qualitative approach that will be complemented by quantitative information.

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¹⁹ However, there is a possible configuration evoked by linguists with two counterfactual imperfects, one in the protasis and one in the apodosis (*?Si tu avançais, je frappais,* 'If you would have walked forward, I would have hit' cf. Kronning 2016), but the examples given are always constructed and no authentic attestation is documented.

The following query was used: [word=".*(ais|ois|oys|oie|oies|oit|oyt|ait|ions|iez|iés|aient|oyent|oient)"%c & word!="voi[st]|doi[st]|croi[st]|sai[st]|vai[st]|fai[st]|tai[st]"%c & pos="V"].

4.5.2 Bridging contexts and context-based counterfactuality in Medieval French

The most common way to express counterfactuality in Medieval French is to use a conditional sentence with past subjunctive forms (subjunctive imperfects or pluperfects). However, past indicative tenses – imperfect, pluperfect or *passé simple* – may also occur in the apodosis since Old French. According to Wagner (1939: 252), the use of an imperfect or a *passé simple* is attested from the 12th century. Further examples from the BFM corpus are given under (cf. (40)-(42)). As far as the pluperfect is concerned, it is found in my data from the 14th century (43).

(40) MidFre [...] il ne s'en osa oncques aler sanz leur congié, pour ce que s'il eust esté reprins_{SBJ.PRF.PST} par iceulx Engloiz, il savoit bien qu'il **estoit_{PST.IPFV}** mort.

'He never dared to leave without their permission, because if he had been caught by these Englishmen, he knew he **was** dead. (*Registre criminel du Chatelet*, 1389-1392, BFM corpus)

(41) OldFre Onques ne **fu**_{PST.PFV} meillor paiene S'ele n'eüst_{SBJ.PST} amor soutaine Mais ele ama trop follement Savoirs ne li valut noiant.

'There **would** never **have been** (lit. **was**) a better heathen if she had not known a sudden love, but she loved too madly, and her wisdom was of no use to her. (*Eneas*, Anonymous, v. 2142, around 1155, BFM corpus)

(42) OldFre [The narrator meets a lion on an island. Facing death, he recalls his beloved lady and adresses to her a last time. Suddenly the lion renounces to attack him.]

[...] S'en merciay devotement Ma dame et Amours ensement, Car j'estoie a ma fin **venu**_{PRF,PST,IPFV}, Se d'eaus ne me fust souvenu_{SBJ,PRF,PST}.

'I devotedly thanked My lady and Love equally, for my end **would have come**, if I had not recalled them.' (*Le Dit dou Lyon*, Guillaume de Machaut, 321-324, 1342, BFM corpus)

The fact that indicative pasts are attracted again in the apodosis of past counterfactual conditionals (like in Latin, see 4.3.2) may be linked to the semantic evolution of the subjunctive. Indeed, the subjunctive imperfect inherited from Latin²¹ (e.g. *eüst* in (38)) in which it was used to express past counterfactuality, has become temporally ambiguous in Old French: it could refer to a past or non-past counterfactual situation (cf. Wagner 1939: 295-296, Yvon 1958: 166-167, Buridant 2000: 631). This may explain why it got progressively replaced by less ambiguous forms: the pluperfect subjunctive (see Wagner 1939: chap. 2) but also sometimes indicative pasts. Thus, indicative pasts may meet a semantic need in counterfactuals by disambiguating the time reference of the situation. The fact that both bounded (passé simples and pluperfects)²² and unbounded tenses (imperfects) can occur indicates that their function is first temporal: they compensate for the counterfactual's ambiguity by anchoring the situation in the past. It is however important to note that aspect is a constraining parameter: until the end of 15th century, the imperfect only applies to stative predicates (mostly *estre* 'be' followed by an adjective, cf. *estoit mort* 'be dead' in (43)), verbs in the passive diathesis (see (46) below) or modal verbs (e.g. *pouvoir* 'can' or *devoir* 'must').

The function of indicative pasts may also allow the speaker to be "extravagant" (Haspelmath 1999; Detges and Waltereit 2002). According to Henry (1952: 396), the use of the indicative mood in the apodosis underlines the 'ineluctable' realization of the situation if it had not been prevented by the given conditions. This echoes the expressivity of the counterfactual imperfect observed in the

²¹ The French subjunctive imperfect is the continuation of the Latin subjunctive pluperfect (e.g. *fuisset* > *fust*).

literature (see Gougenheim 1938: 190; Le Bidois and Le Bidois 1967: §1623; Berthonneau and Kleiber 2006: 53; Bres 2009: 44-47; Kronning to appear). The expressivity of the imperfect here would then come from the marked use of a realis tense in a counterfactual context. As for the counterfactual interpretation, it is not implicated by the imperfect itself, but produced by its combination with contextual markers: the *if*-sentence and the subjunctive in the protasis which both present the situation as hypothetical.

In a nutshell, there exist in Medieval French counterfactual patterns or 'assemblies' (Petré 2019) mixing subjunctive and indicative forms for semantic and expressive purposes. They may correspond to bridging contexts in which context-based counterfactuality coexists with the temporal and aspectual source meaning of the indicative pasts (including the imperfect). The BFM data tentatively suggests that the use of the imperfect in such modally mixed counterfactuals expands in the 15th century (5 tokens for the 13th-14th centuries against 26 tokens for the 15th century).

It is interesting to remark that, from Old French onwards, the imperfect frequently occurs within the lexicalized conditional construction [*se ne estre*_{SBJ.PST} SN, q²³] ('if it was not /had not been for SN, q'). This construction typically describes an imminent situation that has been prevented in the past. It may thus be seen as a proximative or frustrative construction (cf. Kuteva 1998, 2001; Schwellenbach 2013; Kuteva et al. 2019). For instance, in (43), king Guion and the master of Rhodes were almost defeated if it were not for the intervention of a furious knight:

(43) MidFre Et ceulx leur comptent [...] comment le roy Guion d'Armenie et le maistre de Rodes **estoient desconfiz**_{PSS,PST,IPFV}, <u>si ne feust_{SBJ,PST} un chevalier</u> tous forcenez qui y survint a tout un pou de gent et crie : [...].

'And they relate to them [...] how King Guion of Armenia and the ruler of Rhodes were defeated, if it was for a completely enraged knight who came up with a few people and cried out: [...].' (*Mélusine*, Jean d'Arras, 220, 1392, BFM corpus)

Note that in these conditionals the imperfect only applies to stative verbs or verbs in the passive diathesis and that telic verb take a bounded tense – a passé simple or a perfect form. One may conclude that [se ne estre_{SBJ,PST} SN, q] also corresponds to a bridging context where counterfactuality is context-based and where the imperfect retains its past imperfective meaning. These contexts are well attested in our data until the 16th century, but no attestation is found since the 17th century.

4.5.3 Bridging contexts and implicature-based counterfactuality in Medieval French

As far as conditionals are concerned, it is only at the very end of the 15th century that the imperfect is first attested with telic predicates (the first example in the corpora is from 1497²⁴ and it is preceded by 19 examples with an atelic predicate). In this context, the imperfect seems to implicate counterfactuality via the imperfective paradox (see section 4.3.1):

(44) MidFre [...] s'il [the duke] ne l'eust accepté_{SBJ.PRF.PST}, ilz le **bannissoient_{PST.IPFV}** perpetuellement et **confisquoient_{PST.IPFV}** tous ses biens'

'if the duke had not accepted it, they **would have banished** (lit. **were banishing**) him forever and confiscated (lit. **were confiscating**) all his possessions (*La légende des Vénitiens*, Jean Le Maire de Belges, 1509, Frantext corpus)

This context resembles the conative use where the imperfect produces an imperfective paradox (see section 4.3.1). The imperfect presents the telic events (the banishment and the confiscation) as

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²³ Different tenses may also occur: a passé simple, a subjunctive past or a conditional tense.

²⁴ It corresponds to the Commynes example quoted by Henry (1952: 396).

ongoing, but, because it cannot entail their completion, the imperfect further implicates that they did not occur (their final endpoint was not reached). Counterfactuallity has consequently become implicature-based in what may be seen as a new type of bridging context.

By focusing on their inner sub-intervals, the imperfect presupposes that the events were already unfolding. This emphasizes the 'ineluctable' realization of the event (see section 4.4.2) if they were not averted by the blocking situation denoted in the protasis. One may further argue that, because there is no information on the outcome of the event, the imperfect is aspectually the most adequate tense to underline the prevented realization of the imminent event. It is not incidental that the imperfect is very much used in contexts with a proximative or frustrative flavor, in which the apodosis describes the immediate consequences of the protasis. One may think that the marked combination of the imperfect with telic predicates enhances its 'expressive' potential by comparison with other tenses by construing a dramatic 'lively' viewpoint on the situations.²⁵ This has probably favored the later development of the imperfect in the apodosis of counterfactuals.

4.5.4 Constructionalization

The conditional context described above is well attested from Renaissance French until the 19^{th} century with many tokens to be found for the whole period (114 out of the 219 conditional examples of the Frantext corpus) – see e.g. (45):

(45) ModFre Le 4 décembre, Louis Bonaparte eût été arraché le soir même de l'Élysée, et la loi **triomphait_{PST,IPFV}**, s'il eût été_{SBJ,PRF,PST} un de ces hommes qui hésitent devant un massacre.

'On December 4, Louis Bonaparte would have been torn away that very evening from the Elysee, and the law **would have triumphed** (lit. **were triumphing**), if he had been one of those men who hesitate before a massacre.' (*Napoléon le Petit*, Victor Hugo, 1852, Frantext corpus)

This situation may be seen as a sign of conventionalization of the specific construction [*si* p_{SBJV.PRF.PST}, q_{PST.IPFV}] with a more narrow sense of ineluctable realization (of an averted situation). Conventionalization is confirmed by the fact that from the 16th-17th centuries the use of the subjunctive pluperfect in conditionals is shrinking to the benefit of indicative tenses (see for instance Patard et al. 2015, Combettes 2018). Contrary to this general tendency, [*si* p_{SBJV.PRF.PST}, q_{PST.IPFV}] is well maintained until the 19th century, presumably because it is well entrenched as a construction.

Interestingly there seems to be a drop in use in the 20th century with no tokens found in my data. This is very likely due to the emergence of the corresponding configuration with an indicative pluperfect (*si* p_{PRF.PST.IPFV}, q_{PST.IPFV}). This indicative pattern is attested from the 17th century (4 tokens found in Frantext, cf. (46)) and expands progressively (26 tokens found for the 18th century and 20 tokens for the 19th century)²⁶, until it fully replaces the modally mixed construction in the 20th century (47).

(46) ClaFre [...] et s'il ne nous **avoit veus_{PRF.PST.IPFV}** ce matin, il **appareilloit_{PST.IPFV}** pour aller à Siam, parce qu'il croyoit que nous pourrions bien estre allez par Tennasserim.

²⁵ See Bres 2009 or Kronning to appear for alternative analyses of the expressivity of the counterfactual imperfect.

²⁶ The lower frequency in the 19th century between the two numbers may be meaningful but one should be cautious when interpreting it for the reasons exposed in section 4.5.1. A proper quantitative analysis should be conducted to confirm it.

'and if he **had** not **seen** us this morning, he **would have got** (lit. **was getting**) underway to go to Siam, because he believed that we could well be going by Tennasserim.' (*Journal du voyage de Siam fait en 1685 et 1686*, François Timoléon de Choisy, 1687, Frantext corpus)

(47) ModFre J'avais tous les bonus allumés, déplora-t-il, tous !... Si t'**étais** pas **entré**_{PRF.PST.IPFV}, sûr que je **battais**_{PST.IPFV} mon record et que je me **claquais**_{PST.IPFV} trois boules gratuites... Enfin c'est pas grave !

'I had all the bonuses on, he lamented, all of them! ... If you **hadn't come in**, for sure I **would have broken** (lit. **was breaking**) my record and **blown** (lit. **was blowing**) three free balls ... Well, it's no big deal!' (*Les Noces barbares*, Yann Queffélec, 1985, Frantext corpus)

The fact that the indicative conditional is also well attested in the corpus from the 18^{th} century supports the claim of a conventionalized construction [si p_{PRF.PST.IPFV}, q_{PST.IPFV}].

A crucial change in the paradigm of counterfactuals is the emergence of correlative patterns or 'assemblies' (Petré 2019) recognised in the literature as the 'imparfait contrefactual' (Berthonneau and Kleiber 2003, 2006; Bres 2006, 2009). The first assembly noted in the corpus (16th century) is the 'exceptive' one based on *sans* (Busuioc 2004): *sans* x, p 'without x, p' (48). As for '(de)cumulative' assemblies based on the comparative adverbs *plus* 'more' or *moins* 'less', they are attested from the 18th century (49). These contexts are well entrenched in Modern French and even seem to have largely outgrown imperfect counterfactual conditionals in the 20th-21st centuries (54 tokens of correlatives against 23 tokens of conditionals found in Frantext).²⁷

(48) ModFre [...] chez luy, il trouva tant de pleurs, tant de gemissements de ses mere, et soeurs, qu'il se laissa transporter tout hors de luy, et sans moy il **tomboit**_{PST,IPFV} par les degrez tout pasmé de douleur [...]

'at home, he found so many tears, so many moans from his mother, wife, and sisters, that [...] without me he would have fallen (lit. was falling) in the stairs as passing out from pain'

(Lettres: t. 6, Nicolas de Peiresc, 1602, Frantext corpus)

(49) ClasFre [...] convenez, monsieur, que vous l'avez manqué belle. C'est ici un véritable château de coupe-jarrets. <u>Un peu de gras de jambe de plus</u>, vous **rejoigniez**_{PST.IPFV} le camp à cloche-pied.

'agree, sir, that you had a narrow escape. This is a real ham-cut castle. With a little more leg fat, you would have hopped (lit. were hopping) up to the camp.' (*Ollivier*, Jacques Cazotte, 1763, Frantext corpus)

The left (exceptive or (de)cumulative) element of the correlation can always be replaced by an if-conditional (see for instance Berthonneau et Kleiber 2006): e.g. sans moy ↔ si je ne l'eusse retenu 'If I had not held him back' in (47) or un peu de gras de jambe de plus ↔ si vous aviez eu la jambe un peu plus grasse 'if your legs had been a little fatter' in (48). Hence the left element may be analyzed as a 'reduced protasis' of the conditional constructions described above: [si psbjv.pre.pst, qpst.ipfv] and [si ppre.pst.ipfv, qpst.ipfv]. The left element allows expressing the same thing – the conditions that prevented the realization of the 'ineluctable' situation – but in a more economical way. This syntagmatic economy can be seen as the side effect of the constructionalization (and thus

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²⁷ But this tendency needs to be confirmed by further quantitative analyses for the reason exposed in section 4.5.1.

conventionalization) of a family of correlative constructions with the pattern [x, $q_{PST,IPFV}$] that includes exceptive [sans x, $q_{PST,IPFV}$] and (de)cumulative [x plus/moins (et) $q_{PST,IPFV}$].

4.5.5 Switch contexts

More advanced conventionalization is clearly shown by the extension to futurate contexts. The earliest example is from the 18th century within a conditional context (50). The first correlative example found is from the 19th century (51). The existence of futurate contexts has also been reported by Bres in Modern French (2009: 48).

- (50) ClasFre Que fussions-nous devenus, si je ne vous eusse pas aimé au point de tout exposer pour vous ? On m'unissoit_{PST.IPFV} demain à Raimbert, à votre lâche ennemi! 'What would have become of us if I had not loved you so much that I exposed everything for you? I would have been wed (lit. was wed) tomorrow to Raimbert, your cowardly enemy! (L'Honneur perdu et recouvré, Jacques Cazotte, 1788, Frantext corpus)
- Vous voyez bien que je ne puis pas venir vous voir. Sans cela, j'allais_{PST,IPFV} partir <u>la</u>
 semaine prochaine apparemment. Triste effet du triste événement.

 'You can see that I cannot come and see you. Without that I was going to leave next week apparently. Sad effect of the sad event.' (*Lettres*, Eugénie de Guérin, 1831-1847, Frantext corpus)

In these rare but attested contexts, the denoted situation is not past but yet to come as shown by the adverbs *demain* 'tomorrow' and *la semaine prochaine* 'next week' in (50)-(51) (see also example (52) below). There is in such contexts a discrepancy between the past time denoted by the imperfect and the time of the situation. Sometimes, this discrepancy is made explicit by the prospective *go*-periphrasis *aller* + INF (cf. *allais partir* in (51)) which expresses the ulteriority of the situation with respect to some past moment. But because the foregrounded reference time lies in the future, one can say that the temporal meaning of the imperfect is backgrounded. The only focused meaning is that of ineluctable realization and counterfactuality: without the circumstances that the protasis or the left element is referring to, the situation would have inevitably happened. Nevertheless, the past feature is not ruled out, for it is a defining constituent of counterfactuality (see section 4.2.1): the bifurcation between factuality and counterfactuality caused by some blocking event lingers in the past. In (50) the past blocking condition is the fact that the speaker 'exposed everything' and in (51) it is the funeral and visits after the speaker's grandmother's death. This is what the imperfect's past time is now referring to. In a nutshell, the past feature is still there as a component of counterfactuality but it is not focused upon. We are at the stage of switch contexts.

One can remark that there can be no proximative or frustrative flavour in such contexts since the counterfactual event is not imminent but some time separates the blocking circumstances from the situation's expected realization. This means that the proximative or frustrative dimension that may have originally favored the use of the imperfect due to its extravagance or expressiveness is no longer present in the futurate switch contexts. Berthonneau and Kleiber 2006 also remark that the proximative/frustrative dimension is not obligatory in Modern French. A permanent feature is by contrast the sense already mentioned of ineluctable realization or 'certitude' (cf. Berthonneau et Kleiber 2006, see also Le Goffic 1986) that distinguishes the imperfect from other possible tenses (present tense and past conditional tense): the imperfect is the sole tense signifying that, without the blocking circumstances, the situation was certain to occur.

With respect to the imperfective aspect, other types of contexts indicate that it may have been backgrounded just like the past tense. These are contexts where temporal adjuncts construe a perfective viewpoint on the situation:

(52) ModFre Ce n'est pas très argentifère, - à cause du froid ! - voilà tout. Sans le froid, j'avais_{PST.IPFV}, en dix jours, 1500 francs de conférences. J'ai eu ici de grands succès de presse et de futur pour la fin d'été prochain. Mais [...] Quels appartements de 200 mètres ![...] et un froid de 12 degrés constants sans calorifère. Je pars pour Gand demain.

'It does not bring much money - because of the cold! - that is all. Without the cold, I **would have had** (lit. **had**), in ten days, 1,500 francs from lectures. I have had here a great press success and still to come for the end of next summer. But [...] What apartments of 200 meters! [...] And a constant cold of 12 degrees without heaters. I'm leaving for Ghent tomorrow.' (*Correspondance générale*, Adam Villiers de l'Isle, 1888, Frantext corpus)

With the durative adjunct *en dix jours* 'in ten days', the situation is viewed globally as fully completed in a counterfactual world despite the use of the imperfect: it would have been the case that the narrator earns 1,500 francs from lectures, if not for the cold. Here imperfectivity is inconsistent with the interpretation and aspect morphology has thus become fake. Note that tense morphology is also fake here: the situation is not past but extends to the future. This points toward a well-entrenched correlative construction (here [sans x, q_{PST.IPFV}]), whereby counterfactuality has prevailed over tense and aspect.

4.5.5 A completed shift? schematicization

New contexts suggest there might exist a superordinate construction [x (et) q_{PST.IPFV}] in Modern French. Consider the following example that is neither exceptive nor (de)cumulative:

(53) ModFre Seul, j'**étais**_{IPFV.PST} avec toi, nous **restions**_{IPFV.PST} ensemble. Le premier voyage d'aprèsguerre : tu n'as pas le droit de le faire avec une autre.

'Alone [if you had left alone without another woman], I **would have been** (lit. **was**) with you, we **would have remained** (lit. **was remaining**) together. The first post-war travel: you don't have the right to do it with another one. (*Les Mandarins*, Simone de Beauvoir, 1954 in Bres 2009)

The left element only consists of a dislocated adjective (*seul* 'lonely'). Bres comments that an adjective or a prepositional phrase may enter the construction 'as long as it co(n)textually actualizes a quality contradicted by reality' (2009: 37). Indeed, it is not difficult to imagine examples of this type with a counterfactual imperfect (see (54)). Note that a dislocated element suggesting a discrepancy between two opposing situations is required to interpret the bifurcation from reality (otherwise the interpretation is factual by default).

(54) Il est huit heures et demi, tu es en avance ! A neuf heures tu arrivais_{IPFV.PST} à l'heure. 'It's half past eight, you're early! At nine o'clock you would have arrived (lit. were arriving) on time.'

²⁸ My translation of: 'pour peu que co(n)textuellement il se présente actualisant une qualité démentie par la réalité'.

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These facts indicate that a general schema may have developed from the aforementioned family of correlative constructions. Accordingly, on may conclude that the 'imparfait contrefactuel' may correspond in Modern French to an abstract construction of the form $[x (et) q_{PST,IPFV}]$.

4.5.6 To sum up

The diachronic map in Figure 4.3 summarizes the chain of constructionalizations that seems to have led to the emergence of the counterfactual imperfect construction [x (et) $q_{PST,IPFV}$].

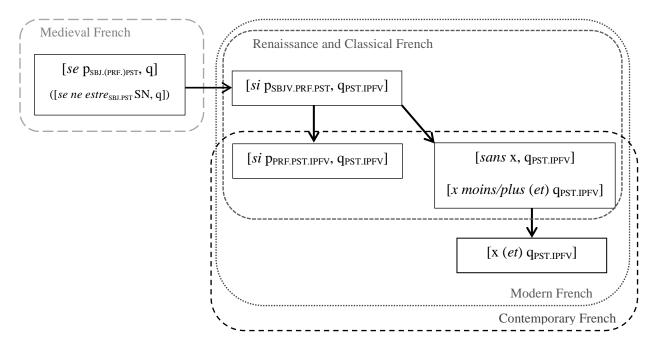


Figure 4.3 Diachronic map of the French counterfactual imperfect construction

As far as the semantic change is concerned, the data analysis suggests the following steps: a. Bridging contexts:

- (i) Since Old French, the imperfect is attracted in the apodosis of [se p_{SBJ.(PRF.)PST}, q] with atelic predicates (preferably in a proximative/frustrative context like ([se ne estre_{SBJ.PST} SN, q]) to disambiguate temporal reference and underline the ineluctable realization of the situation under the right conditions. Counterfactuality is context-based. The imperfect does not contribute to its interpretation.
- (ii) From late Middle French, the imperfect expands to telic predicates. Counterfactuality is not only context-based but also implicature-based. The imperfect contributes to its interpretation thanks to the imperfective paradox.
 Crucially, the counterfactual constructions that developed later [si p_{SBJV.PRF.PST}, q_{PST.IPFV}] (the indicative conditional and the correlatives) directly jumped to step (ii): from the start the imperfect could occur with telic predicates. This confirms that the two steps need to be distinguished.

b. Switch contexts:

(iii) From the 18th century, the past and imperfect meaning of the imperfect is clearly backgrounded as it may not be consistent anymore with the interpretation (non-past and/or perfective). Counterfactuality and ineluctable realization are the sole meanings in the foreground of the interpretation.

It is possible that the backgrounding of the imperfect's source meaning took place before that as an effect of the frequent repetition of the pattern from late Middle French and the constructionalization of [si p_{SBJV.PRF.PST}, q_{PST.IPFV}], but the collected data provide no evidence.

c. Completed shift:

As for Heine's last stage, it is difficult to say here whether it should be distinguished from the preceding stage of switch contexts. Indeed, in Modern French the past meaning is still present because it is a constitutive feature of counterfactuality: it is in the past that the situation (past or not) ceased to be possible. As soon as this feature disappears, the counterfactual meaning turns into something else (see section 4.2). Moreover, there are positive signs of the existence of exceptive and (de)cumulative constructions that have a modal meaning (counterfactuality and ineluctable realization) and are independent from the aspecto-temporal uses of the imperfect. Nonetheless, the development of a schematic construction $[x (et) q_{PST.IPFV}]$ that may subsume these correlative constructions could be analyzed as the completion of a semantic shift: the counterfactual imperfect can now extend to new contexts distinct from the bridging and switch contexts that have initiated its semantic change.

4.6. Conclusions and perspectives

The analysis of the Latin and French data suggests the following four steps for the counterfactual imperfect cycle in Romance.

- (i) In stage 1, the cycle starts when the imperfect is attracted in counterfactual contexts to refer to the past.
- (ii) In stage 2, the imperfect extends to new contexts where it implicates counterfactuality through the imperfective paradox. Time reference is still past.
- (iii) In stage 3, the imperfect occurs in new contexts where counterfactuality is conventionalizing at the expense of the source meaning which is put to the background (possible 'fake' tense and aspect morphology). Hence the imperfect has gained temporal flexibility.
- (iv) In the last stage, the imperfect leaves the functional domain of counterfactuality and expresses unlikelihood/unreality (only attested in Latin). The cycle ends.

This cycle is very similar to that sketched by Dahl on the basis of Germanic data but for the second step. Contrary to Dahl's scenario, the past counterfactual marker in Latin and French was not obligatory before it could be reanalyzed as temporally flexible. In French, the counterfactual imperfect is never obligatory but can always be replaced by the past conditional tense (*aurait chanté* 'would have sung'). They actually form a dyad of counterfactual markers in which the past conditional tense is the unmarked member and the imperfect the marked member in that it conveys an additional sense of 'ineluctable' realization. Moreover, there is an additional step in my scenario due to the nature of imperfective aspect: the imperfect is first used within harmonic imperfective contexts, i.e. with atelic predicates describing unbounded situations, before it expands to non-harmonic contexts with telic predicates describing bounded situations, triggering the imperfective paradox. There is no such intermediate stage with Germanic pluperfects because they can indiscriminately occur with telic or atelic predicates.

More generally, the present study confirms the diachronic link between past reference and counterfactuality which, as suggested by Dahl (1997), may take the form of a cycle. Generalizing from the Germanic, Latin and French data, the cycle involves three stages:

- (i) The past marker is used in counterfactual contexts and forms a counterfactual assembly restrained to past reference;
- (ii) The marker expands to non-past contexts and is part of a conventionalized counterfactual construction;
- (iii) The marker expands to hypothetical contexts, the construction has been reanalyzed as a marker of unlikelihood/unreality (or 'open' counterfactuality).

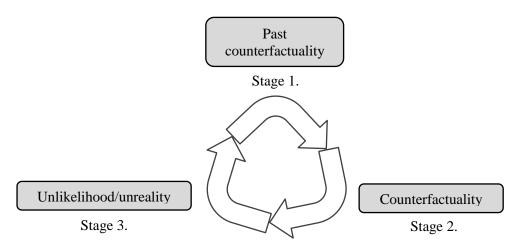


Figure 4. The counterfactual cycle

What causes the start of a new cycle is, in my analysis, the necessity to specify time reference, the usual counterfactual marker being temporally ambiguous. It could be further favored by the fact that the past tense offers an expressive or extravagant way to describe the situation. This is the case with indicative pasts (e.g. the Latin imperfect or the French imperfect) which draw a dramatic picture of the counterfactual situation by underlining the certainty of its realization, if not for the blocking event. An imperfect like the French imparfait may further express counterfactuality thanks to the 'imperfective paradox' and contextually emphasize the imminence and frustration of the blocked situation. This expressive potential directly follows from the imperfect's imperfective aspect and for that reason one may think that imperfective pasts constitute very good candidates across languages for the counterfactual cycle.

To conclude with the aspect puzzle proper, the study suggests that aspect is fake in counterfactuals – the interpretation may be perfective despite the imperfective morphology – because it has been backgrounded over time in favor of counterfactuality. It should be seen as the consequence of the increasing use of the imperfect in counterfactual assemblies that has led to the constructionalization of new counterfactuals where imperfectivity and pastness have been ruled out. The mechanisms at stake due to frequent repetition are loss of saliency through habituation – the 'imperfective paradox' progressively ceased to be perceived as the imperfect occurred more with telic predicates – and the subsequent reanalysis into a construction carrying no aspectual meaning. Fake aspect is thus the result of the imperfect's integration into a new piece of grammar, a counterfactual construction, where the aspectual (and temporal) source meaning is dissolved into the constructional meaning. Imperfective morphology is just the formal trace of one of the construction's building blocks, the imperfect, which can no longer be analyzed as a semantically autonomous component.

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