

Exploring the impact of platforms' affordances on the expression of negativity in online hotel reviews

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Abstract

In the current era of digitalization, most hotels are present on the Internet and most booking decisions are made online. Several online public review platforms exist, and it is crucial to know how their specific affordances influence the formulation of online negative reviews, as differences in the make-up of online reviews are likely to affect hotel managers' responses to these reviews and other customers' decisions. This research explores the impact of TripAdvisor's and Booking.com's affordances on the content of hotel reviews. Using a multilingual corpus, we selected 100 negative reviews written in French on each of these two platforms and compared them in terms of review length, the number of constitutive negative review components, how a particular component is realized, and the use of upgraders and downgraders. We predicted reviews to be more explicitly negative on TripAdvisor than on Booking.com because Booking.com's affordances elicit both positive and negative comments, as the platform provides a blank text template for positive comments and one for negative comments, and because it invites feedback in the form of lists instead of narratives, thus decreasing the likelihood of dissatisfaction narratives to unfold. Our results confirm these predictions: TripAdvisor reviews are longer than Booking.com reviews; the former are also more explicit, and include a larger variety of negative evaluations.

1 Introduction

1.1 General background

This research addresses the relationship between peculiarities of two online public platforms, TripAdvisor and Booking.com, and the expression of negativity in the linguistic realization of negative hotel reviews on these platforms. The definition of an online negative review that we will assume is based on Hennig-Thurau et al. (2004: 39) and Mudambi & Schuff (2010: 186). Accordingly, an online negative review is a type of online written discourse that consists in the negative evaluation, by a customer, of a product or service they have had experience with, and which they share with other potential customers in order to inform them about the quality of the product or service, and also with the company to give it a chance to improve its quality (cf. Yoo & Gretzel 2008).¹

¹ Regarding the differences between direct complaints and negative reviews in terms of addressee orientation, we would argue that complaints are primarily aimed at the responsible of the offense, while negative reviews inherently are oriented both towards the responsible of the offense and other customers (arguably, the orientation towards other peoples is the most prominent one). That being said, online complaints can also be read by other customers, even though these are still primarily directed towards the responsible of the offense (see XXX2). The upshot is that Boxer's (1993) distinction between direct and indirect complaints gets blurred in online environments.

In the current era of digitalization, online public platforms enable (and, sometimes, explicitly request) hotel guests to share their feedback about their stay with the hotel and other consumers in the form of online reviews. Large amounts of online hotel reviews have already been written (for example, more than 25 million on Booking.com)², and their influence is unquestionable: Consumers' purchase decisions are known to be influenced to a large extent by other customers' reviews (Ludwig et al. 2013; Yin et al. 2014; Vermeulen & Seegers 2009). Given their impact, negative reviews pose a direct threat to the public self-image of hotels—in Brown & Levinson's (1978) words—their positive face, and on some occasions, they also go against their negative face, i.e., their freedom of action, such as when a request for compensation is made by a dissatisfied customer.

Recent research in computer-mediated communication (CMC) demonstrates the active role played by online platforms' affordances on users' behaviour (Hutchby 2001; boyd 2010). However, while formulated by Ren (2018a), the question how platforms' affordances shape the form and content of online reviews has not yet been addressed in previous linguistic research (for a brief overview of pragmatic research on complaints and negative reviews, see Section 2). On top of comparing the realizations of negative reviews on two different online public platforms, TripAdvisor and Booking.com, we will differentiate negative reviews and complaints. The distinction between both discourse genres has often been blurred in previous research or has been left unaddressed (e.g., Cenni & Goethals 2017; Dayter & Rüdiger 2014; Vásquez 2011; XXX1). As an additional theoretical contribution to genre studies, we will shed light on the similarities and differences between complaints and negative reviews in our analysis. However, due to space limitations and because our major aim is to compare the realization of negative reviews on two online platforms, an extensive comparison between both genres is beyond the scope of this article.

1.2 Previous linguistic research on online complaints and negative reviews

In the field of linguistic pragmatics, complaints and negative reviews have received some attention, with an interest in the (para-)linguistic realizations of these speech acts (SAs) and in their interactional dynamics. Several studies, mainly adopting a conversation-analytic (CA) perspective, have focused on spoken complaints in private and professional settings (e.g., Drew & Walker 2009; Heinemann 2009; Orthaber & Marquez-Reiter 2011; Ekström & Lundström 2014; Kevoe-Feldman 2018). In discourse-pragmatic studies on complaints and negative reviews, a variety of discursive strategies related to, for instance, objectification, narration, authenticity, audience involvement, stance, and (in)directness, have been examined, with the focus shifting from studying spoken complaints in the context of second language acquisition (Olshtain & Weinbach 1993), also by comparing the speech of native and non-native speakers (Trosborg 1995; Chen et al. 2011), to studying digital/online complaints and negative reviews (Vásquez, 2011; Dayter & Rüdiger 2014; Vásquez 2015; Decock &

² https://www.booking.com/reviews.fr.html?aid=356980;label=gog235jc-1DEgdyZXZpZXdzKIIICOQgHSDNYA2hNiAEBmAEYuAEM2AED6AEBiAIBqAIDuAKdsNGKBsACAdICJDU0YWI4MDC0LTgxYzgtNDQ2Ny1iNjk3LTJiZTZhYjE5MTAwMtgCBOACAQ;sid=4b70635f2702c62bdffeba9701c8646f;keep_landing=1&page=0&page_size=0&type=all& (September 29, 2021).

Spiessens 2017), also from a cross-linguistic perspective (e.g., Cenni & Goethals (2017) compared Italian, English, and Dutch negative reviews).

To this day, complaints (XXX1; Vásquez 2015) and negative reviews (Cenni & Goethals 2017) both have been approached in terms of “speech act sets” (Murphy & Neu 1996; Tanck 2002; Vásquez 2011), that is, SAs that are best conceived of as a combination of individual utterances/SAs that make up the whole complaint/negative review, thus constituting an instance of a discursive genre or activity type in the sense of Levinson (1992). Moreover, XXX1 have characterized complaints as SA sets consisting of different constitutive components. More specifically, they argue that a complaint situation consists of four constitutive components which can be made explicit (Decock & Depraetere 2018); these components can be traced back to House & Kasper’s (1981) and Trosborg’s (1995) work on complaints. Component A refers to the complainable, i.e., the negative event about which the customer is complaining. Component B refers to the expression by the complaining customer of some degree of dissatisfaction with respect to the complainable. Component C identifies the person or institution that is considered by the customer to be responsible for the complainable. Finally, component D concerns the customer’s wish for the offence to be remedied. Each of these components can be realized in different ways. For example, customer dissatisfaction (component B) can be expressed by using negative evaluative adjectives, adverbs, verbs, nouns or expressions, through emoji which convey negative emotions (Danesi 2017; Seargent 2019), through exclamation marks, etc. XXX1 consider the number of constitutive components that are linguistically realized in a complaint as a measure of its overall explicitness qua speech act set: the higher the number of components expressed in a complaint, the more explicit the complaint.

Until now, however, the focus in linguistic research on complaints and negative reviews was always on one platform, i.e., Twitter (XXX1), TripAdvisor (Cenni & Goethals 2017; Vásquez 2011), Airbnb (Hernández-López 2020), and Amazon (Feng & Ren 2020). The research presented in this article builds on earlier linguistic studies on complaints and negative reviews (see the references mentioned in this section), as we will conduct a detailed, corpus-based analysis of the linguistic realization of negative reviews, approaching them in terms of speech act sets. It will also complement previous studies, because we will approach negative reviews from a new angle, i.e., using a cross-platform perspective taking into account the influence of platform affordances on the content of negative reviews, and because we will carefully distinguish between complaints and negative reviews.

1.3 Platform affordances

The affordances associated with online platforms and online social networks are of two types: “social functional affordances” and “content functional affordances” (O’Riordan et al. 2011). While the former concern the functionalities related to the personal profiles of the users and the services they can use to connect and interact with each other, the latter have to do with the creation and the retrieval of content. For example, “public commenting tools” available on Facebook enable users to create text and comment on other users’ publications (boyd

2010), and templates not only support users in their writing, but also “assist and gradually replace [them] when creating and distributing information” (Eisenlauer 2014: 76). However, as Eisenlauer remarks, most studies to date have focused on social rather than content-related affordances.

The existence of different online platforms for making booking decisions, such as Booking.com, TripAdvisor, Google reviews, Hotels.com, etc., each with specific “content functional affordances”, raises the question of how these affordances, rapidly evolving as new apps are being constantly developed, shape the form and content of customer reviews. In this article, we focus on two very popular online platforms where customer reviews are published on a daily basis: Booking.com and TripAdvisor. Booking.com is an online travel agency for booking accommodation, headquartered in the Netherlands; its website is available in 43 languages. TripAdvisor is an online travel agency too, but its headquarters are in the United States. While both platforms invite customers to write reviews about accommodations, it is only possible to publish a review concerning a past reservation on Booking.com if one has a booking number associated with the reservation; this is not required to write a review on TripAdvisor. In line with Eisenlauer (2014), we consider Booking.com and TripAdvisor as “third authors”, as they provide, in the form of different blank text templates, formal constraints on customer reviews. A first difference concerning the writing of reviews on the two platforms is that reviews cannot exceed 20,000 characters on TripAdvisor, while, to the best of our knowledge, no such limit applies to Booking.com reviews. With respect to the format of the reviews themselves, the third author on Booking.com refers to the fact that one box with a “smiling” emoji is intended for positive comments (“positive box”) while another box with a “sad” emoji is intended for negative feedback (“negative box”) (Fig. 1). Note that the positive box can be left empty; we observed this on several occasions in our sample of reviews (this also applies to the negative box). On TripAdvisor, however, authors are presented with one empty box in which they can insert their review (Fig. 2).

Using corpus-based data in French, a language associated with a confrontational style (e.g., Béal 2010; Decock & Spiessens 2017; Tobback & Lauwers 2016), we will compare the linguistic realization of negative reviews on the two platforms, thereby addressing the impact of the “third author” provided by both platforms on the way customers phrase their negative reviews. We propose, as Eisenlauer (2014) did for Facebook, that the Booking.com and TripAdvisor platforms determine, to some extent, via their content functional affordances, the structure and content of the negative discourse. At the same time, we assume that customer reviews are creative text actions, because the customers have a larger control than the platform on the act of writing the review and the content of the individual utterances that compose it.

Figure 1: Pictorial representation of the template for writing a review on Booking.com

😊 **What did you like?**
 What did you think of the breakfast? How was the location?

☹️ **What did you not like?**
 What could be improved?

Summarize your trip in a short sentence.

Figure 2: Pictorial representation of the template for writing a review on TripAdvisor

Title of your review
 Summarize your visit or highlight an interesting detail

Your review (200 character minimum)
 By sharing your experiences, you're helping travelers make better choices and plan their dream trips. Thank you!

When did you travel?
 Select one v

I certify that this review is based on my own experience and is my genuine opinion of this hotel, and that I have no personal or business relationship with this establishment, and have not been offered any incentive or payment originating from the establishment to write this review. I understand that Tripadvisor has a zero-tolerance policy on fake reviews.

Submit

Even though this is not visible on Fig. 1, on Booking.com, there are written prompts in the review template that invite reviewers to help other prospective customers. The difference with TripAdvisor is that the prompts are displayed when the review is being written, and the content of these prompts changes as the review progresses, e.g., after 50 characters "That's a good start, tell us a bit more!"; after 100 characters "That's perfect, continue like that!"; after 200 characters "Fantastic! Informative comments are always very appreciated by other travelers". These prompts are provided in French on the French version of the platforms (e.g., booking/index.fr).

1.4 Research question and hypotheses

Assuming that different affordances of online public platforms will result in differences in the way reviews are formulated, we hypothesize that Booking.com's third author should reduce both the level of negativity and narrativity of a review. First, Booking.com's third author guides customers to express both positive and negative comments, as it provides a blank text template for positive comments (with a smiling emoji) and one for negative comments (with

a sad emoji). In so doing, Booking.com's third author imposes a formal constraint on the comments, in the sense that positive comments and negative comments should be written separately. Second, Booking.com's third author, by providing these separate boxes for positive and negative comments, discourages customers from providing feedback in a narrative format and instead invites them to provide feedback in the form of lists. Reviews in the form of listed comments can be expected to be less long than reviews following a more narrative format. As longer reviews correlate with higher perceived dissatisfaction (Zhao et al. 2019), Booking.com's reviews, which should be shorter than TripAdvisor's, can also be expected to be less explicitly negative for that reason.

Our hypothesis will be tested, against the null hypothesis, on the basis of comparisons between 1) the total length of the review, 2) the number and the type of constitutive components of negative reviews that are expressed in a review, 3) the frequency of occurrence of different realizations of individual components, and 4) the use of linguistic modification (upgraders and downgraders).

The article is structured as follows. In Section 2, we present the methodology used to annotate our corpus of negative reviews and compare them between Booking.com and TripAdvisor; we describe our corpus, illustrate it with examples, and address relevant ethical issues. In Section 3, we report on the results of the corpus analysis, and we discuss their implications in Section 4. Section 5 concludes and outlines directions for future research.

2 Methodology

2.1 Ethical issues

Due to their public nature, online reviews are available to anyone who has access to the Internet. It therefore seems, at first glance, unnecessary to ask the authors of reviews for authorization to use the content of their reviews in scientific research. However, from an ethical perspective, the picture is more complicated. The use of Internet data for research purposes entails several issues that have to be acknowledged and dealt with appropriately (Webb et al. 2017). Following the recommendations made by Bolander & Locher (2014) and Locher & Bolander (2019), and in line with the guidelines published by the Association of Internet Researchers (Markham et al. 2012; Franzke et al. 2020), we briefly discuss the ethical dilemmas we faced and explain how we have addressed them.

A first issue concerns anonymity. Despite the fact that, in order to avoid any possible identification of a customer, a hotel, a staff member of any other third party, the names and email addresses of the authors of the reviews, hotel names, and all the links to the original reviews, have been deleted from the data and replaced by generic labels (e.g., "hotel name"), complete anonymity is difficult to achieve because of the traceability of the content of reviews (Zimmer 2010). It is indeed possible to trace an original review by using its content as displayed in this paper. A second issue pertains to informed consent. Although we can assume that Booking.com and TripAdvisor users are perfectly aware that their reviews will be read and that they are the only persons to be responsible for their content, we must acknowledge that the authors of the reviews gathered in our corpus were not aware that their reviews were used

for scientific research. Obtaining informed consent, however, would be difficult and very time-consuming (Eysenbach & Till, 2001), and it could be argued that it is not necessary. Indeed, the reviews in the present corpus do not contain any sensitive information (we did not remove insults, as these are central to this research, but we checked that no review involved a particular, identifiable, individual being insulted) or any other personal information. The likelihood that the authors will be morally harmed by our use of their reviews is therefore extremely small.

2.2 Data set

The corpus data reported in this research originate from a large corpus compiled in the context of a collaboration between a company that provides responses to online public reviews on behalf of the hotels targeted by the customers, and Ghent University. One important advantage of the service offered by this company is that they respond to every review, with hotels validating each proposed response. The corpus we used was compiled by the company and shared with us; it consists of several thousands of reviews and responses to these reviews as they were published between April, 12, 2017 and August, 20, 2019 on different online platforms and in a variety of languages. The online reviews contained in this corpus have already been annotated by company editors for features such as the type of platform, the language used, information about the hotel (name and location), information about the customer (location, gender if available), information about the review (date of publication, link to the original review, normalized rating given by reviewer on a scale from 0 to 100, whether the review is entirely positive, entirely negative, or combines positive and negative aspects (review valence), and information about responses to reviews (date of publication, ID of the company editor who wrote the response). Starting from this large corpus, we created a subcorpus consisting of all reviews written in French. We then selected, in this French corpus, a subset of negative reviews for TripAdvisor and Booking.com.

We consider a review to be “negative” when its rating is below 50/100. This way of distinguishing negative from other reviews differs slightly from the one adopted in previous research. For instance, Ho (2017) considers a review to be negative if it includes at least some negative comments and its rating on a 1-5 scale is 1 (terrible), 2 (poor), or 3 (average), and Ren (2018b) followed the Amazon platform’s classification of reviews, with 1-3 stars being critical/negative and 4-5 positive. Vázquez’ (2011) “negative” reviews are part of a selection of the worst reviews chosen by TripAdvisor and published once a week on their website; however, the inclusion criteria for the reviews in this sample remain unknown. As these reviews are some of the “worst reviews”, they do not constitute a sample representative of negative reviews more generally, and it is not certain that Vázquez’ conclusions would also apply to negative, albeit more mitigated reviews. Finally, Cenni & Goethals’ (2017) negative reviews have ratings of 1 or 2 out of 5, which makes their corpus amenable to comparison with the one used for the present research.

In order to make an unbiased selection of reviews, to arrive at a number of 100 negative reviews for TripAdvisor, we selected the first, third, fifth, etc. until we reached 100.

For Booking.com we took the first 100 reviews out of the 116 corresponding to the criteria. Reviews showing clear features of non-native speaker French were removed from the data. To preserve data authenticity, grammatical mistakes and typos were not removed from the original reviews, whereas non-native speaker French was identified on the basis of syntactically and semantically unacceptable (parts of) sentences that were consistent throughout the review. The sample of reviews thus selected were originally published between April 2017 and August 2019.

2.3 Coding of negative reviews

The coding of the present negative reviews corpus is based on XXX2's guidelines for complaints, and applied to a sample of French complaints posted on the Twitter pages of the French and Belgian railway companies. These guidelines provide a detailed characterization of different types of formal realization of the constitutive components of complaints.

Following XXX1's work on complaints, we will consider that the degree of explicitness of a negative review corresponds to the number of constitutive components that are linguistically expressed in a review: reviews in which all the components are realized are the most explicit ones, while one-component reviews are the least explicit ones. Review explicitness is thus assessed by analyzing the linguistic realization of each review and operationalized in terms of the presence (or not) of (one or more of) the constitutive components of a negative review situation.

Building on previous research such as Cenni & Goethals (2017), we propose that online negative reviews include the constitutive components of complaints—components A, B, C, and D—while adding several components absent in complaints.³ Two such components are the positive counterpart of the complainable, i.e., the positive element (positive component A), and the satisfaction the customer may express (positive component B) about this positive element. Our rationale is that, while a complaint is inherently negative, reviews can be negative, positive, or even both. Therefore, it makes sense to include positive component A as a component of a negative review, as it is constitutive of the macro-genre of “customer reviews”, while this is not the case for the genre of complaints. Even though nothing prevents complaints from including positive comments, we believe that the role of these positive elements in complaints is restricted to mitigating the face-threatening impact of the speech act of complaining; this assumption is in line with the analysis of positive comments in FTAs (Face-threatening acts) in terms of “disarmers” in Blum-Kulka et al.'s (1987) CCSARP framework, a polite strategy that consists in flattering the addressees to reduce the threat, to their positive/negative face, of the FTA that comes next. One more component that we coded is a recommendation for other customers, a subcategory of “future oriented SAs” in Cenni &

³ Following the insights provided by Blum-Kulka et al.'s (1987) cross-cultural speech act realization project (CCSARP) that focused on the speech acts of requests and apologies, several authors (e.g., Ho 2017 and Ding 2007 on complaints) propose that, for a given speech act set, some components are mandatory while others are optional. Unlike these authors, we will make no judgment as to the obligatoriness/optionality of some components of the speech act set for negative reviews.

Goethals' (2017) analysis, which we labelled "component E". Such recommendations are one of the most frequent reasons that customers provide for writing their reviews (Yoo & Gretzel 2008). Unlike in Cenni & Goethals' study (2017), in our data, advice for hotel owners/staff and for other hotel-related instances was subsumed under the component of wish for solution/compensation (component D).

The components of negative reviews present in the coding are the following:

- Complainable(s) (negative component A)
- Positive element(s) (positive component A)
- Customer dissatisfaction about complainable(s) (negative component B)
- Customer satisfaction about positive element(s) (positive component B)
- Person/institution responsible for complainable(s) (component C)
- Wish for the complainable(s) to be solved/compensated for (component D)
- Recommendation for other customers (component E)

We first coded whether each of the constitutive components identified for complaints (complainable, customer dissatisfaction, person/entity responsible for the complainable, wish for solution/compensation) were present in the corpus. The same procedure was applied to the other components constitutive of negative reviews. Second, we coded whether the reviews included the use of modification, i.e., upgraders and downgraders, as well as the formal realizations thereof. After the first coder (first author) had completed the whole coding for the two samples, a Master student in Multilingual Communication at Ghent University (second author) was hired to perform the same coding on the same corpus data, using the aforementioned guidelines. Information about inter-rater agreement will be provided in Section 2.3.3.

2.3.1 Examples of component combinations

Following XXX (2018), we consider that the higher the number of components that are linguistically realized in a review, the more explicit the review. The corpus examples below illustrate the different categories. These examples range from a minimal review (only one component is expressed) to more explicit reviews (6 components are expressed; no example including all 7 components was found).

(1) (Booking.com)

(-) Chambre très chère et beaucoup trop petite
<u>Translation</u> <i>Room very expensive and way too small</i>

(One component: negative A, i.e., the exaggerated price of the room and its small size.)

(2) (TripAdvisor)

[hotel name as title]

Petite chambre colorée en rouge et blanc avec l'entrée bleue foncée. Le lavabo est dans la chambre, ainsi que la douche, les WC sont petits mais séparés. Il faisait du vent et la fenêtre a laissé pass[er] l'air toute la nuit.

Petit déjeuner m[é]diocre.

Translation

Small room coloured in red and white with the entrance in dark blue. The sink in the room, the shower too, toilets are small but apart. It was windy and the window let the air go through all night long. Poor breakfast.

(Two components: negative A, i.e., the size of the toilet, the wind, the window that didn't shut properly, and the breakfast, and positive A, i.e., toilet separated from the rest of the room.)

(3) (TripAdvisor)

A fuir absolument.....

odeur d'humidité et de renfermé dans la chambre. Moisissure sur le bas des murs.

Evier salle de bain non utilisable.

Propreté général[e] de l'établissement.⁴

On se demande qui a attribué les 3 étoiles.

Translation

Be sure you run away... smell of moist and stuffy in the room. Mould at the bottom of the walls. Sink in the bathroom out of order. General clean condition. We wonder who gave the three stars.

(Three components: negative A, i.e., bad smells and dirt, negative B, i.e., ironic comment about the undeserved three stars, and E, i.e., the customers invites other customers to run away from this hotel.)

(4) (Booking.com)

(+) l'emplacement

(-) Établissement ayant besoin d'une sérieuse rénovation. odeur de moisi dans la chambre; volets qui claquent au vent...un ensemble bien défraichi. La non information de la présence d'un mariage le samedi soir !!!

Translation

(+) The location. (-) Accommodation that needs a serious renovation. Smell of mould in the room; shutters flapping in the wind... faded on the whole. The lack of information about the presence of a wedding on Saturday evening!!!

⁴ In response to a comment raised by one of the reviewers, we would like to stress that, in the context of the review, it is likely that this comment refers to a negative aspect of the experience, i.e., that "the hotel as a whole wasn't clean" (rather than being a positive statement about the hotel being clean).

(Four components: negative A, i.e., bad smell, shutters in bad state, wedding, negative B, i.e., conveyed by the use of exclamation marks, positive A, i.e., the location, and D, i.e., the suggestion that the hotel be renovated.)

(5) (Booking.com)

Je déconseille fortement cet établissement, dont je suis très mécontente [title]

(+) La nourriture La chambre était correcte

(-) Il était impossible de trouver un transat de libre, les gens laissant des serviettes dès le matin très tôt sur les transats alors que c'était interdit. Le soir, il n'y avait pas de place assise de libre pour assister aux spectacles proposés tellement il y avait du monde L'hôtel ne proposait quasiment aucune soirée dansante, alors qu'en Espagne tous les hôtels font des soirées dansantes Et il y avait en permanence un ascenseur sur deux en panne, ce qui a vraiment posé des problèmes.

Translation

I warn against this accommodation, about which I am very dissatisfied. (+) The food. The room was okay. (-) It was impossible to find a recliner free, as people leave towels from the early morning on the recliners, which is forbidden. In the evening, there wasn't any free seat to attend the shows offered because, as there were too many people. The hotel hardly provided a dance party, whereas in Spain any hotel organizes dance parties. And there was continuously a lift out of two out of order, which really caused inconvenience.

(Five components: negative A, i.e., issues with recliners, few dance parties, negative B, i.e., explicit mention of dissatisfaction, positive A, i.e., food and the state of the room, C, i.e., the hotel is considered to be responsible for the complainables, and E, i.e., other customers are invited to avoid the hotel.)

(6) (TripAdvisor)

Beau sur la photo [title]

Pour une première fois. Peut[-]être mettent ils les premières fois dans une chambre du rez de chaussée avec accès par un couloir morbide (s'il vous plaît refaites votre peinture), donnant sur un parking, avec une ventilation qui fait du bruit, un chauffage qui a du mal à se mettre à température... Le bémol c'est la cuisine qui reste allumée sauf si on enlève la carte, pénible si on est déjà couchée. L'accueil est correct mais à vouloir mettre des réceptionnistes qui parle[nt] plusieurs langues, on comprend à peine le français. Point positif, le pdj de qualité mais que je trouve quand même cher... Je conseille de solliciter une chambre en étage quand vous réservez.

Translation

Nice on the picture. For a first time. Maybe they put the first times in a room at the ground floor with access via a morbid corridor (please redo your painting), giving way to a parking, with a noisy ventilation, a heating that has trouble to adjust to the temperature... The downside is the kitchen that remains lit unless you remove the card, painful if you're already in bed. The reception is okay but since they want to put receptionists who speak several languages, you hardly understand French. Good point, the quality of the breakfast, which I find expensive nonetheless... I suggest you ask for a room upstairs when you make a reservation.

(Six components: negative A, i.e., ventilation, heating issues, etc., negative B, i.e., the irony (nice on the picture), positive A, i.e., the breakfast, C, i.e., “they” as the management, D, i.e., the hotel should redo the painting, and E, i.e., the suggestion for other customers at the end of the review.)

2.3.2 Methodological issues

An issue that arose during the early steps of the coding phase concerns the status of the “title” or “short summary” that customers are prompted to provide in addition to the content of their review (“Summarize your visit or highlight an interesting detail” on TripAdvisor; “Summarize your stay in a short sentence” on Booking.com). A preliminary look at the data revealed that different components of negative reviews are expressed in these titles. Therefore, we did not code the title of the review as a separate component. A second reason for not considering the title apart from the reviews themselves is that all the information they contained could also be retrieved elsewhere in the reviews.

It was sometimes difficult to delineate different realizations of component A (whether negative or positive) on the basis of the use of punctuation by customers. That is, they do not systematically start a new sentence with a capital letter and end it with a punctuation mark. We therefore relied on a combination of capitals and final punctuation mark to separate sentences. More precisely, we considered that the following signs delineate two distinct realizations of Component A: hyphen, semi-colon, suspension points, period, exclamation mark, and question mark. We made, however, an exception for sentences that expressed negative and positive aspects at the same time, e.g., by coordinated noun phrases (NPs): these sentences were coded both as negative component A and positive component A. If two different clauses were connected, e.g., a noun phrase (NP) coordinated with a declarative, or a declarative followed by an exclamative, we only coded it once, i.e., as a declarative and as an exclamative, respectively. A special type of realization for component A was “Sans parler de NP” (*not to mention NP*), “Sans compter NP” (*to say nothing of NP*), which we coded as NPs, as what precedes the NP refers to negative Component B (customer dissatisfaction), and was coded accordingly as an “expression”. In the same vein, we also coded negative or positive aspects of the customer’s experience when they were embedded in the realization of a different component, such as Component E (recommendation), as in *Don’t go to this smelly hotel*, where smelly hotel is negative component A.

Concerning negative component B, we coded references to expectations as realizations of this component, rather than as negative component A, for the reason that these comments relate to customers' expectations about hotel experiences. We slightly modified the content of XXX1's guidelines, as we added the declarative as a possible realization of component B. Another feature of negative reviews concerns a customer making a statement about the future, in general expressing their intention not to repeat the experience. In Cenni & Goethals (2017), the category of "future-oriented SAs" encompasses "recommendations for peer travelers" (component E in our coding), "intentions (self-orientations)" (component B in our coding), "advice for hotel owners/staff" and "advice for other instances" (component D in our coding). As in the case of customers' expectations, utterances expressing "customer's intention not to go to the hotel again" were coded as negative component B, and often took the form of a declarative future-oriented sentence. In our classification of different realizations of B, we considered such utterances as threats.

Even though the complainable and the customers' voicing their dissatisfaction about the complainable are conceptually distinct, it was sometimes very difficult, in practice, to disentangle them and to code them separately. This is especially true in the case of (negative) evaluative adjectives that are used to describe negative aspects of an experience in a particular hotel, such as *dirty*, *disgusting*, *smelly*, *awful*, etc. Their use in sentences of the type "X is ADJ", where ADJ stands for a negative evaluative adjective, implies that the person who utters that sentence has a negative attitude towards some aspect of their hotel experience, such as disapprobation, disgust, etc. We therefore coded as realizations of negative component B only those adjectives, adverbs, etc. that are used to qualify the experience as a whole, and only separate evaluative statements bearing on and following (already negative) descriptions, as in *The room was dirty, that is disgusting*; where the first part of the sentence expresses the negative component A, and the second (underlined) part is the negative component B. In that respect, our coding—and XXX2—is different from Cenni & Goethals' (2017), who only distinguish between, on the one hand, evaluative statements such as, for instance, *horrible place* (component A in our coding) and *Not a pleasant experience!* (negative component B in our coding), and, on the other hand, non-evaluative statements they call "descriptions", e.g., *We stayed at the hotel for 3 nights*.

To the best of our knowledge, to date, the positive elements in negative reviews have not been analyzed in terms of formal realizations. For this reason and in order to avoid multiplying categories beyond necessary, we used the same categories as for the coding of negative component A.

When coding for component C, it was important to distinguish between cases where a hotel, a chain of hotels, or the hotel management is the target of the negative review, from cases where hotel employees are seen by the customers as the people responsible for the complainable. Only in the former cases was the entity or person identified as component C. First, employees and other customers are not accountable for the complainables and they

cannot be asked for compensation (at least, not in customer reviews). Second, only hotel management is entitled to write a response to the negative review.

When coding for component D (wish for compensation), we included infinitive clauses such as “Hotel à revoir” (Hotel should be revised), as they both depict a complainable (the hotel is not ok), and a request for change.

2.3.3 Interrater reliability

The Booking.com and TripAdvisor corpora were coded by two coders, and the results enabled us to check interrater reliability for the presence/absence of individual components, and fine-tune the coding guidelines where needed. However, we were only able to compute agreement rates and Kappa scores for the components shared by complaints (i.e., Components A negative, B negative, C and D), as detailed guidelines for the other components of negative reviews were not yet available at the time of coding (Tables 1 and 2).

Table 1: Interrater reliability scores for Booking.com reviews.

	% agreement 2 raters	Kappa score
Component A negative	100%	1
Component B negative	93%	0.77
Component C	97%	0.87
Component D	98%	0.82

Table 2: Interrater reliability scores for TripAdvisor reviews.

	% agreement 2 raters	Kappa score
Component A negative	100%	/ ⁵
Component B negative	98%	0.49
Component C	90%	0.77
Component D	96%	0.86

3 Analysis of negative reviews

3.1 Review length

On average, reviews are more than twice as long in our TripAdvisor sample (M = 125.7 words; SD = 102.7 words; median = 101 words; range: 34-732) than in our Booking.com sample (M= 57.8 words; SD = 54.7 words; median = 38.5 words; range: 2-251). The results of a Shapiro-Wilk normality test carried out with R software are: $w = 0.82$; $p < .001$ for the Booking.com sample and $w = 0.73$; $p < .001$ for the TripAdvisor sample. This indicates that the distribution of the review length data is significantly different from normal distribution, so that normality cannot be assumed. An unpaired two-sample Wilcoxon test, which can be used for data that are not normally distributed, was therefore used. The results of a Wilcoxon rank sum test with continuity correction show that the difference between the mean of the two samples is statistically different at $p < .001$ ($w = 2125$). It is very unlikely that this difference can be

⁵ A Kappa score could not be calculated, as all decisions made by the two coders were identical, i.e., the reviews included at least one complainable(s).

accounted for in terms of the maximal review length for TripAdvisor reviews, i.e., 20,000 characters, as the longest review in our sample has 4,442 characters (spaces included).⁶

3.2 Explicit realization of A, B, C and/or D

The number of reviews that include each constitutive component is mentioned in Table 3.

Table 3: Frequency of realization of the different components of negative reviews.⁷

	Booking.com	TripAdvisor
Component A complainable	98	100
Component A positive	51	65
Component B negative (references to expectations)	82 (45)	98 (64)
Component B positive	4	12
Component C	12	25
Component D	6	16
Component E	21	36

While no difference between the two platforms was found for the most frequent components, i.e., component A (complainable/positive) and component B negative, TripAdvisor reviews more often included a positive evaluation; the same finding applies to components C (responsible for the complainable), D (wish for the complainable to be compensated for), and E (recommendation against the hotel).

3.3 Degree of explicitness

We also compared the Booking.com and TripAdvisor samples in terms of the number of different components expressed per review, that is, in terms of their degree of explicitness (Table 4).

Table 4: Number of components expressed.

	Booking.com	TripAdvisor
One component	6	0
Two components	38	14
Three components	35	38
Four components	18	33
Five components	3	15

Overall, negative reviews are more explicit on TripAdvisor than on Booking.com, as shown by the higher number of reviews including at least four components on TripAdvisor, and the higher number of reviews containing only two components on Booking.com. Only three

⁶ Regarding the number of reviews that use lists, we found: 41 reviews with a list format in the Booking.com sample; 18 reviews with a list format in the TripAdvisor sample. The large majority of these take the form of enumerations of elements separated by commas or full stops.

⁷ In this table and the following, we highlight in bold the figures for which a statistically significant difference was computed (using chi-square tests with $p < .05$ as significance threshold).

reviews containing the maximal number of components (i.e., six) were found, all of them originating from the TripAdvisor sample.

3.4 Formal realization of A, B, C and D

3.4.1 Negative component A (Complainable)

The frequency of different realizations of the complainable (“negative component A”) in our samples is represented in Table 5 below. Note that when a particular review included, for instance, two or more realizations of A belonging to the same type, we coded this as ‘only’ one occurrence of the type of realization. In our coding scheme, inspired by XXX2, the first part of the category stands for the speech act or “illocutionary force” of the utterance, the second part for the sentence-type (declarative, interrogative, imperative or exclamative) or syntactic expression (e.g., noun phrase (NP)). For interrogative sentences, information is also provided about the type of interrogative, i.e., yes/no (Y/N) or Wh- (WH).

Table 5: Formal realizations of the complainable (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
Assertion_NP	69	73
Assertion_declarative	46	82
Expressive_exclamative	26	39
Rhetorical question_interrogative	3	6
Request for action_imp	0	2
Request for information_Y/N	0	1

The number of reviews including (at least) a declarative realization of the complainable was larger for TripAdvisor reviews than for Booking.com reviews.

The following examples illustrate the six different types of formal realization of the complainable:

(7) Assertion_NP (Booking.com, 16)

(-) La literie le manque de place à la piscine le manque d’hygiène
<u>Translation</u> <i>The bed linen, the lack of space at the swimming pool, the lack of hygiene</i>

(8) Assertion_declarative (TripAdvisor, 93)

Le b[â]timent est perdu au milieu d'immeubles, les logements sont vraiment moyens.
<u>Translation</u> <i>The hotel is lost in the middle of buildings, the accommodations are really mediocre.</i>

(9) Expressive_exclamative (Booking.com, 73)

Les murs sont tr[è]s mal isolés!
<u>Translation</u> <i>The walls are very badly isolated!</i>

(10) Rhetorical question_interrogative (TripAdvisor, 6)

Ça veut dire que les chambres standards sont encore pires ?
<u>Translation</u> <i>Does that mean that the standard rooms are even worse?</i>

(11) Request for action_imp (TripAdvisor, 70)

s'il vous plaît refaites votre peinture
<u>Translation</u> <i>Please repaint</i>

(12) Request for information_Y/N (TripAdvisor, 69)

Quant aux serviettes de bain en location le tapis de bain n'est pas inclus[s] Peut-être à régler en supplément ?
<u>Translation</u> <i>Concerning the bath towels in rent, the bath carpet is not included, maybe available as an extra?</i>

3.4.2 Positive component A

The differences in terms of the number of realizations of positive component A, i.e., positive element of the hotel experience, between the two platforms are given in Table 6.

Table 6: Formal realizations of positive component A (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
Noun phrase	46	35
Assertion_declarative	11	39
Expressive_exclamative	0	2

The total number of reviews containing (at least) one realization of positive component A as an assertion was largest in the TripAdvisor sample. The three realizations of positive component A found in our samples are illustrated below.

(13) Assertion_NP (Booking.com, 61)

(+) Nombre cor[r]ect de pi[s]cines
<u>Translation</u> <i>Right number of swimming pools</i>

(14) Assertion_declarative (TripAdvisor, 97)

Malgr[é] tout l'équipe d'accueil est sympa et dynamique. L'emplacement au pieds des télésiège[s] du [D]iable très bien.

Translation

That being said, the welcoming staff is very nice and dynamic. The location at the foot of the "Diable's" ski lift [is] very good.

(15) Expressive_exclamative (TripAdvisor, 86)

Réservation faite sur internet... photos très alléchantes!!

Translation

Booked online... very attractive pictures!!

3.4.3 Negative component B

We found a variety of formal realizations of negative component B (customer dissatisfaction) (see Table 7), including expectations not being met using adjectives such as *décevant* (disappointing) or declaratives such as *Les 5 étoiles ne sont pas justifiées* (doesn't deserve 5 stars), negative evaluative adjectives such as *scandaleux* (scandalous), *dégoûtant* (disgusting), *mauvais* (bad), adverbs such as *ridiculement* (ridiculously), noun phrases such as *la galère* (a misery) *un désastre* (a disaster), expressions containing verbs such as *nous ne sommes pas d'accord* (we don't agree), negative evaluative expressions such as *jamais vu cela* (never seen before), *foutage de gueule* (blunt hypocrisy), hyperboles such as *rien* (nothing) in the box for positive comments and *tout* (everything) in the box for negative comments on Booking.com, respectively, negative evaluative emoji (angry, sad, thumbs down), the use of one, two, or three question or exclamation marks as paraverbal expressions of negative emotions, rhetorical questions as in (16), and irony/sarcasm as in (17), threats as in (18), insults as in (19), and capitalization as in (20).

(16) Rhetorical question (Booking.com, 46)

Comment peut-on proposer une telle chambre en Rez de chaussée avec vue sur une colonne d'aération ?

Translation

How is it possible to propose such a room on ground level with a view on a ventilation shaft?

(17) Irony/sarcasm (TripAdvisor, 34)

Vue sur le parking et jolie terrasse sur le local poubelle !!!

Translation

View on the parking and beautiful terrace on the bin storage area!!!

(18) Threat (Booking.com, 6)

Je ne réserverai plus jamais cet hôtel

Translation

I will never book this hotel again.

(19) Derogatory language to describe experience (Booking.com, 33)

[...] nous n'arrivons pas a dormir à cause des imbéciles qui font le bordel dans les couloirs et les chambres
<u>Translation</u> <i>We cannot sleep because of the assholes who are fucking up in the corridors and in the rooms.</i>

(20) Capitalization (TripAdvisor, 81)

GRANDE DECEPTION!!!!
<u>Translation</u> <i>BIG DISAPPOINTMENT!!!!</i>

Like for the complainable and positive component A, Table 7 and following depict the number of reviews that featured a particular component realization rather than the absolute frequency of these realizations.

Table 7: Formal realizations of negative component B (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
Reference to expectations	42	64
Negative evaluative adjective/adverb	29	47
Punctuation (...)	23	48
Exclamation mark !	24	37
Irony and sarcasm	17	39
Negative evaluative noun	17	20
Threat	14	18
Triple exclamation or question marks ???/ !?/ !!!/...	11	16
Exaggeration	23	2
Negative evaluative expression	7	13
Flooding of letters or punctuation marks (more than 3)	6	14
Capitalized letters	9	10
Double exclamation or question marks (!/ ?!/ ??/ !?)	6	8
Rhetorical question	3	7
Negative evaluative verb	4	5
Negative evaluative emoji	5	0
Derogatory language	1	1

When it comes to particular types of realizations, four categories of negative component B were significantly more frequently included in the TripAdvisor data: expectations, negative evaluative adjectives and adverbs, suspension points, and sarcastic remarks. By contrast,

reviews including the categories of exaggeration and negative evaluative emoji were significantly more frequent in the Booking.com data.

Concerning the number of different realizations of negative component B per review (Table 8), reviews including three or four different types of realizations of this component were more frequent in the TripAdvisor sample compared to the Booking.com sample.

Table 8: Total number of distinct realizations of B within one review

	Booking.com	TripAdvisor
One type	18	10
Two types	26	16
Three types	13	26
Four types	11	24
Five types or more	14	22

3.4.3.1 Expectations

The formal realizations of the references to customers' expectations were coded separately (Table 9).

Table 9: Formal realizations of negative component B (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
Negative evaluative adjective/adverb	31	34
Negative evaluative verb	3	1
Negative evaluative noun	6	12
Negative evaluative expression	3	2
Declarative sentence	11	24
Irony and sarcasm	5	13

The only statistically significant difference concerns the use of declaratives to make statements about expectations not being met, as in (21): this realization was more often included in our TripAdvisor sample.

(21) Reference to expectations (declarative) (TripAdvisor, 34)

le petit déjeuner à 20 euros alors qu'affiché [à] 15 euros sur ce site
<u>Translation</u> 20 euros for the breakfast whereas it was indicated at 15 euros on this website

3.4.4 Positive component B

We found a few different formal realizations of positive component B (customer satisfaction), i.e., expectations being met, e.g., *chambre correspondant en tout point à ce qui avait été annoncé* (room that corresponds in every aspect to what had been announced), positive evaluative adjectives such as *assez bon* (quite ok), *bien* (good), adverbs such as *heureusement* (fortunately), verbs such as *nous avons profité d'un peu de calme* (we have enjoyed a bit of

quiet), positive evaluative expressions such as *nickel* (perfect), *tout se passe pour le mieux* (all goes for the best), and exclamation marks as paraverbal expression of positive emotions.

No difference was found in terms of the particular realizations of positive component B, i.e., customer satisfaction, between the TripAdvisor and Booking.com samples (Table 10).

Table 10: Formal realizations of positive component B (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
Positive evaluative adjective/adverb	2	8
Positive evaluative verb	1	1
Positive evaluative expression	0	3
Reference to customer's expectations	1	2
Single exclamation mark	0	2
Double exclamation mark	0	1

3.4.5 Component C (entity responsible for the complainable)

In comparison with the Booking.com data, we found a significantly higher number of reviews that used NPs to make at least one reference to component C, i.e., entity/person responsible for the complainable, in the TripAdvisor data.

Table 11: Formal realizations of component C (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
NP identifying the entity held responsible for the complainable <i>l'hôtel, la direction, les responsables, le patron, ils, on</i>	9	21
possessive pronoun <i>vos/votre/ses</i>	4	8
<i>vous</i> (responsible of complainable/of remedying it)	5	3
Imperative (remedy offense)	0	2

3.4.6 Component D (wish for compensation)

We found four different types of realizations of component D: declarative request (for action) (22), infinitive request (23), request performed with a suggestory formula (24), and imperative request (25).

(22) Request for action (declarative) (Booking.com, 23)

Je pense que cet hôtel devrait fermer pour un temps afin de le remettre en état et aux normes européennes.
<u>Translation</u> <i>I think this hotel should close for a while so that it is refurbished and complies with the European regulations again.</i>

(23) Request for action (infinitive) (TripAdvisor, 52)

Rénovation à prévoir!
<u>Translation</u> <i>Renovation to provide!</i>

(24) Request for action (suggestory formula) (TripAdvisor, 39)

attention à avoir plus de tact avec les clients....
<u>Translation</u> <i>Make sure you are more tactful with your customers...</i>

(25) Request for action (imperative) (TripAdvisor, 16)

le saint nectaire est un fleuron d'Auvergne , donc arrêtez le St nectaire en sachet qui vient d'une usine du 77 ou ne mettez rien
<u>Translation</u> <i>The Saint Nectaire is one of Auvergne's flagships, so stop the St Nectaire in bags coming from a factory of the 77 [department of the Parisian area] or don't put anything.</i>

Component D, i.e., wish for compensation, was the least frequent in the whole corpus. It was realized as a request for action, but not by using different formal means in the TripAdvisor vs. Booking.com data.

Table 12: Formal realizations of component D expressed as a request for action (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
Declarative	5	8
Infinitive	1	5
Suggestory formulae	0	4
Imperative	0	2

3.4.7 Component E (recommendation)

A considerable amount of reviews include a more or less negative recommendation, e.g., urging other customers not to go to the hotel described in the review. The recommendation, however, is not always completely negative, as in few cases, such as *Chambre pour jeune voyageur sac au dos* (Room for young traveller with their backpack) (Booking.com, 57). Other realizations of Component E include infinitives such as *à déconseiller* (to be warned against), explicit performatives such as *Je déconseille fortement cet établissement* (I strongly warn against this hotel), imperatives such as *Fuyez!* (Run away!), sarcasm as in (26), declaratives such as *Ce n'est pas une étape absolument nécessaire* (This isn't an absolutely necessary step) in (27), and expressions such as *pour une nuit, pas plus* (for a night, not more).

(26) Sarcasm (TripAdvisor, 46)

Si vous souhaitez un divorce, alors il faut inviter sa femme pour un week end dans un [HOTEL NAME]
<u>Translation</u> <i>If you want a divorce, then you should invite your wife for a weekend in a [HOTEL NAME]</i>

(27) Declarative (TripAdvisor, 39)

Emplacement à conserver, pour un futur projet mais d'ici là et pour le reste ce n'est pas une étape absolument nécessaire.
<u>Translation</u> <i>Location to keep in mind, for a future project, but before then, and for the rest, this is not an absolutely necessary step.</i>

As illustrated in Table 13, the number of reviews including at least one sarcastic realization of component E is significantly larger on TripAdvisor.

Table 13: Realizations of component E (figures refer to the number of reviews that contain at least one type of realization)

	Booking.com	TripAdvisor
infinitive	10	15
explicit performative	5	11
imperative	4	9
irony/sarcasm	0	6
declarative	0	2
Other (e.g., idiomatic expression, noun phrase)	1	1

3.5 Linguistic modification of negative components A and B

The rationale behind our coding for linguistic modification is that the expression of complainables and customer dissatisfaction in online reviews comes with degrees, and it can be reinforced with the use of upgraders such as adverbial intensifiers (*It was a really bad experience*), or attenuated, as with negation (*It was not a nice experience*).

On the whole, no difference between the Booking.com and TripAdvisor samples was found in terms of the number of reviews that include at least one downgrader (Table 14). However, there was a tendency for customers to more often include at least one upgrader in the TripAdvisor sample.⁸ The rates of agreement and associated Kappa scores for the presence/absence of downgraders and upgraders in the two corpora are given in Tables 15 and 16.

Table 14: Linguistic modification (figures refer to the number of reviews that contain at least one modifier).

⁸ This difference was marginally significant ($p = .0502$).

	Booking.com	TripAdvisor
Downgraders	29%	32%
Upgraders	69%	94%

Table 15: Interrater reliability scores for Booking.com reviews.

	% agreement 2 raters	Kappa score
Downgraders	85%	.55
Upgraders	94%	.86

Table 16: Interrater reliability scores for TripAdvisor reviews.

	% agreement 2 raters	Kappa score
Downgraders	74%	.38
Upgraders	98%	.85

A few statistically significant differences in terms of the presence of different upgraders emerged between the two platforms (Table 17). As in Section 3.3, we coded the number of reviews including each type of formal realization, and not the total number of realizations per review. For instance, reviews more often included at least one adverbial intensifier, such as *very*, and an epistemic marker of skepticism, such as *honestly*, in the TripAdvisor sample.

Table 17: Types of upgraders (figures refer to the number of reviews that contain at least one type of upgrader)

	Booking.com	TripAdvisor
UP: adverbial intensifier (e.g., <i>very</i>, <i>completely</i>, <i>in addition</i>)	54	83
UP: adjectival intensifier (e.g., <i>big</i> , <i>full</i> , <i>alleged</i>)	21	25
UP: determiner (e.g., <i>all (this)</i> , <i>none</i>)	15	27
UP: epistemic marker expressing certainty, conviction (e.g., <i>honestly</i> , <i>obviously</i>)	14	21
UP: time adverbial intensifier (e.g., <i>every (time/day)</i> , <i>never</i>)	10	14
UP: idiomatic expression, noun phrase (e.g., <i>etc.</i> , <i>not to mention</i> , <i>by the way</i>)	7	7
UP: time intensifier (<i>from start to finish</i> , <i>as soon as possible</i>)	3	10
UP: epistemic marker expressing skepticism, doubt, distrust (e.g., <i>so-called</i>, <i>what they call</i>)	2	10
UP: time adjectival intensifier (e.g., <i>frequent</i> , <i>permanent</i>)	2	2
UP: negation (<i>neither</i>)	0	1

The only difference between our Booking.com and TripAdvisor data in terms of downgrader use concerns epistemic markers of uncertainty: the number of reviews including this particular realization was larger in the TripAdvisor data.

Table 18: Types of downgraders (figures refer to the number of reviews that contain at least one type of downgrader)

	Booking.com	TripAdvisor
DOWN: downtoner (e.g., <i>sometimes, rarely</i>)	8	9
DOWN: epistemic markers expressing uncertainty (e.g., <i>I think, it seems</i>)	7	18
DOWN: understater (e.g., <i>not great, not very reassuring</i>)	14	10
DOWN: politeness markers (<i>please, have a nice day</i>)	1	1
DOWN: grounder (e.g., reason for choosing a room with a fridge)	1	0
DOWN: disarmer (e.g., complainer is a regular customer of hotel chain)	3	3

4 General discussion

The results of the comparison between the composition of our Booking.com and TripAdvisor samples of negative reviews indicate that negative reviews are, on average, two times longer on TripAdvisor in comparison with Booking.com. It is surprising that, despite the presence of prompts inviting reviewers to help other prospective customers, the reviews are still shorter on Booking.com. In addition, the number of reviews including components C, D, E, and also positive component B (in particular, realized as a NP) is higher on TripAdvisor. In addition, four- and five-component reviews are more frequent on TripAdvisor, and two-component ones more frequent on Booking.com. When it comes to the formal realizations of each constitutive component, there are several differences between the two platforms. The number of TripAdvisor reviews that express negative component B as references to expectations, negative adjectives and adverbs, suspension points, and—both for negative component B and component E—sarcasm, is larger on TripAdvisor. However, reviews including exaggeration and negative evaluative emoji are more frequent in the Booking.com sample. Concerning the number of different realizations of negative component B per review, reviews including three or four different types of realizations of this component are more frequent in the TripAdvisor sample. Regarding the use of upgraders and downgraders, customers are more likely to use adverbial intensifiers, and to express an epistemic stance in our TripAdvisor sample, whether negative (skepticism towards the hotel) or positive (mitigation of negative aspects).

First, our results indicate that negative hotel reviews are more explicit in our TripAdvisor sample than in our Booking.com sample, in the sense that the former sample contains a higher number of reviews in which the different constitutive components of negative reviews are linguistically expressed. Second, they indicate that TripAdvisor negative reviews are also re longer, are more likely to contain components C, D, E, and positive component B, include a larger variety of specific realizations of negative component B (expectations, sarcasm), and more often contain up- and downgraders marking epistemic stance. These characteristics point towards a more narrative, nuanced way of presenting one’s evaluation for the following reasons: 1) A review that is more narrative tends to be longer, as

a description would merely require the customer to sum up things; 2) When more components of a review situation are present in a written review, it results in a 'fuller story' of the review situation; 3) Expressing expectations is part of a narrative frame, and sarcasm would also not fit a mere descriptive approach; 4) Epistemic stance is also more characteristic of a narrative than of a description because it involves providing insight in the reviewer's stance and it reflects more personal involvement (vs. a more neutral description). This higher degree of explicitness, taken together with the more diverse formal realizations of negative component B and the use of upgraders in the TripAdvisor reviews, strongly suggest that the expression of negativity will be perceived as stronger on this platform. Indeed, it has been shown that, the longer the review, the higher the degree of perceived dissatisfaction (Zhao et al. 2019), and that both higher explicitness and the presence of negative component B increase perceived customer dissatisfaction (XXX3). We can thus conclude that the hypothesis that the third author on Booking.com reduces the level of negative explicitness in hotel reviews, in comparison with TripAdvisor, is confirmed.

The finding that Booking.com reviews more often included exaggeration and negative emoji can seem surprising, as the majority of significant differences were in the same direction, that is, higher frequencies of a component or a particular component realization for TripAdvisor. It is less surprising in the light of the observation that, as Booking.com's third author does not invite long reviews, these two formal realizations enable customers to voice their dissatisfaction in an effective way while allowing for brevity. This is especially true of very negative experiences, where, instead of making a long list of negative items, customers could just write 'everything' in the box for negative comments or 'nothing' in that for positive ones.

5 Conclusions and perspectives for future research

This research explored the role of a platform's functional affordances and more specifically their "third author" on the way negativity is expressed in online hotel reviews. To do this, we compared a sample of Booking.com reviews and TripAdvisor reviews in terms of the length of the review, the number of constitutive components linguistically explicit, how particular components are realized, and of the use of upgraders and downgraders. According to our hypothesis, Booking.com's third author should reduce the level of explicit negativity, as it imposes a formal constraint on the comments, i.e., positive comments and negative comments should be written separately. The analysis of our sample data largely supports this hypothesis, as reviews are more explicit and longer on TripAdvisor, and they include a wider variety of formal realizations of customer dissatisfaction. There are, however, a few exceptions to this tendency, namely the higher use of negative emoji and exaggeration on Booking.com, which can nonetheless be explained by the peculiarities of the platform. All these characteristics of TripAdvisor hotel reviews indicate that the expression of negativity is more pronounced in these reviews compared to negative reviews on Booking.com. The approach adopted in the present research can be applied to other online public platforms in order to gain better insights into the impact of platform affordances on the content of reviews.

We also made a modest theoretical contribution to research on negative discourse online by making a first step towards a systematic comparison between complaints and negative reviews. To this day, complaints (XXX1; XXX2; XXX3) and negative reviews (Cenni & Goethals 2017; Ho 2017; Vásquez 2011) have both been approached in terms of “speech act” sets, with XXX1 describing the speech act set of complaint based on the identification of “constitutive components”, but a fine-grained distinction between these two discursive genres was lacking. We proposed that negative reviews share the constitutive components of complaints while including several components absent in complaints, namely, the positive counterpart of the complainable and a positive evaluation thereof, which characterize the genre of customers reviews in general. We also considered that negative reviews include a component E (recommendation).

This study evokes several ideas for follow-up research. As narratives are generally perceived as more persuasive than lists of items (Braddock & Dillard 2016), it is likely that reviews with a higher level of narrativity will be considered as more credible and thus more persuasive. While Vásquez’ (2012) analysis of TripAdvisor negative reviews indeed suggests that narrative negative reviews are likely to attract readers’ attention because they engage them by means of narrative features (Pollach 2005), such as second-person pronouns, questions, and reported speech, the hypothesis that more narrative online negative reviews are perceived as more persuasive has not yet been empirically tested.

In this article, we focused on unambiguously negative reviews. However, bearing in mind that a certain number of negative reviews involve a mixture of positive aspects and complainables (51/100 reviews in our Booking.com sample and 65/100 in our TripAdvisor sample contain at least one positive element) and that positive and mixed reviews also influence customers’ purchase decisions (e.g., Sharifi 2019), it will be important to address, in future work, the realization of online reviews in general. This will enable us to see to what extent the constitutive components we have proposed for negative reviews also apply to mixed and positive reviews. For instance, it is highly unlikely that unambiguously positive reviews will include component D, i.e., a request for compensation or for a solution to the complainable, as no complainable would be part of the review situation; it is also doubtful whether they would include a positive counterpart of component D.

A final idea for follow-up research concerns the gender of the customer who wrote a review, which had been annotated by company editors, and which we checked manually using as criterion a combination of linguistic marking of gender (masculine/feminine) in French and the first name of the customer who wrote the review. We will investigate possible gender-based differences in the realization of negative reviews in our future research. That being said, gender is surely not the only variable that can be expected to affect negative review realization. The impact of other inter-individual variables such as, for example, generation/age, and socio-economic status recently explored by Feng & Ren (2020), also deserves further investigation.

Our results have concrete implications for customer service managers. As customer reviews published on Booking.com are more constrained than those published on TripAdvisor, they should be easier to ‘keep under control’ in terms of negativity. Our approach could therefore help identify the peculiarities of online platforms that are most efficient in “keeping down” the negativity expressed by dissatisfied customers.

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XXX2

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