

# Social media and Tourism Destinations: TripAdvisor Case Study

J. Miguéns, R. Baggio, and C. Costa

**Abstract** — Online social networking sites are the most popular sites on the internet. The second generation of web based services is characterized by having a consumer generated content (CGC), which allow people to share information. This paper examines CGC on TripAdvisor, with a case study on the city of Lisbon. Along with a discussion on the radical changes implied by new forms of collaboration and business models, it is explored how the users collaborate to image a destination. It is analyzed a sample of all the hotels in TripAdvisor.Com for the city of Lisbon, as well as forum authors and advisors profile. The information available on forums and reviews is generated by users/consumers and provides relevant data for travel planning.

**Index Terms** — Social Networking, TripAdvisor, Web 2.0, Travel 2.0.

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1 INTRODUCTION

Social networks are online communities of people who share common interests and activities. They provide a user with a collection of various interaction possibilities, ranging from a simple chat, to multiple video conferences, and from the exchange of plain email messages to the participation in blogs and discussion groups. Online social networks may also contain categorized relationships (e.g. former classmates), means to connect with friends (with self-assembled description pages), or recommendation systems for some kind of objects or activities. Popular spaces combine different functions of this type. Some of the most widely attended are systems such as MySpace (190 million users in 2007), Orkut (over 62 million), or LinkedIn (over 5.5 million).

These websites are the epitome of the phenomenon known as Web 2.0. The website is no longer just a static page, but a dynamic platform which allows users the autonomous generation of content and the possibility of telling their own experiences. Tim O'Reilly describes the emergence of Web 2.0 in this way: "We're just at the beginning of understanding how the social graph will change every web application... what is emerging is the identity and social subsystem of the future internet operating system." [1].

The Web2.0 is strongly characterized by an unprecedented easiness of interactivity which fosters the formation of communities and the generation of user-driven content. Its diffusion has been rapid and widespread, so that today, for example, blogs are counted in

billions.

It is no surprise then to find out that travel and tourism related topics are among the most popular issues in this environment. Travel plans, destinations and hotels reviews, tourist guides, suggestions for restaurants or exhibitions are ever growing discussion subjects and the term Travel 2.0 has started denoting this trend.

Tourism on the Internet was already one of the major 'players' [2], and the online travel market has assumed very a consistent size. In Europe, for example, it represents (in 2007) almost 19.4% of the total market [3]. Moreover a continuing sensible growth is predicted for the next years.

Aim of this paper is to examine one exponent of the Travel 2.0 world: TripAdvisor and to assess the effects socially-enhanced recommendations have on the popularity and the business of the most typical tourism business: an hotel. As an example, the hotels in Lisbon are considered.

## 1.1 Web 2.0 and Travel 2.0

The World Wide Web is currently undergoing a further revolution. While e-commerce played a key factor at the end of 1990s, a new form of collaborative activity emerges online today. Rather than more or less sophisticated e-commerce platforms, Web 2.0 business models provide services that invite users to a direct and strong participation and derive profitable returns from the several forms of advertising present online [4].

The Internet diffusion and technological evolution is still happening at a fast pace, and the new forms of online social networking are

unsure yet of their future. There is an on-going discussion about the consequences and the effects of social network sites, both for practitioners and researchers [5].

Tourism is one of the sectors with a very close relationship with the new information and communication technologies. It is deemed that a good understanding of the quality and quantity of the mechanisms for spreading information online can facilitate tourism managers (whether of a DMO an hotel or any other tourism related company) to market effectively own organization online [2].

An important feature of Web 2.0 applications is the rich wealth of user generated content. This can prove highly influential in directing tourists' choices, but can be also of extreme value for the comprehension of preferences, needs and reactions which can (or should) inform many decisions from a management point of view.

Web 2.0 applications in the tourism sector have been named Travel 2.0 applications by Philip C. Wolf (president and CEO of PhoCusWright, a leading consultancy firm in the tourism arena) and are creating, for the umpteenth time, a cultural change in the tourism world. Traditional operators are facing a new consumer, which can easily access information and easily share own views, comments and suggestions in an informal and collaborative way, increasing the value and influence power as determinants of choice for other consumers. The Web is shifting from a business-to-consumer marketing to a peer-to-peer model for the sharing of information. All tourism businesses are thus facing the need to implement strategies and tools (websites or portals) based on user generated contents or, at least, to incorporate these new technologies to enrich their multimedia contents.

Examples are already available online. The Tourism British Council has been one of the first destinations to include blogs and user generated content in their marketing strategy, and the Florence Official Tourist Office (like many others) embraces geo-referenced contents regarding about tourism attractions through GoogleMaps [6].

Social media influenced by social networking is pressing suppliers and buyers who value more and more the opinions, reviews and referrals of fellow travelers. These information agents (Travel 2.0 users) represent a more reliable and trustworthy source than the suppliers themselves.

## 1.2 TripAdvisor

Online social travel networking is also changing the way tourists plan their trips. These websites allow users to interact and provide reviews on hotels or on local tourist attractions. Some examples of these websites are TravBuddy.com, Travellerspoint, WAYN, Woophy, Passportstamp, and TripAdvisor.com. The latter is probably the largest travel community on the Web. It was founded in 2000 and currently covers 212 000 hotels, over 30 000 destinations, and 74 000 attractions worldwide [7].

TripAdvisor is a website based on the idea that travelers rely on other travelers' reviews to plan their trips, or at least can be satisfactorily helped in their decisions by them. Presently TripAdvisor contains 10 million travel reviews and opinions and written by 5 million registered members and counts 25 million visitors per month. [7]

Friendship Web 2.0 sites such as Facebook base their social networking on some kind of former relationship [8], or on strong affinity in terms of interests or curiosities. Unlike them, travel networking websites users do not have pre-existing associations. Their only connections are the discussion forums and the reviews and ratings generated by other users.

As an evidence of the growing importance of online search and influence on travel behaviors, a survey of the hotel and restaurant industry in Europe in 2007 concluded that 80% of UK consumers are researching online before booking a hotel and half of them maintained to have refrained from booking a specific hotel as a consequence of a negative review on TripAdvisor-like websites [9].

TripAdvisor, as said, is a website where most information posted is autonomously generated by its users. They post reviews, comments and ratings on a destination, a hotel, an attraction or any other tourism related 'object' or service. Furthermore, it is possible to add multimedia elements (photos and videos) or travel maps of previous trips or take part in discussion forums, web-based applications that allow users to post some material and discuss some specific topic. The forum's authors need to be registered; this entitles them to create a profile containing basic data (nickname, residence etc.).

As a new feature in TripAdvisor, launched in 2007, is the Traveler Network. It allows users to add acquaintances to their travel maps, by connecting to pre-existing 'sources' (e.g. email addresses, other blogs etc.). This way friends may help planning a trip in a

more efficient way: a tourist can create a network of travelers who can help by contributing their suggestions, reviews, advice. These linkages with people a user might be traveling with, or might be (even independently) heading for the same destination, form a real social network and is designed to save time on finding those who share travel similar tastes.

A future implementation will be the possibility to link directly other Web 2.0 'entities' such as Facebook and LinkedIn.

## 2 METHODOLOGY

With the growing importance of Travel 2.0 and user-generated contents, this study aims to explore how hotels information is displayed on a Web 2.0 platform and how the users that generate content are influencing tourism destinations. The impact of Travel 2.0 is analyzed for hotels and discussion forums about destination tourism attractions. The analysis is made on TripAdvisor.com, probably the largest travel community online. The data were collected on 25<sup>th</sup> February, 2008.

Data of all the hotels for the city of Lisbon, Portugal (total of 191) included in TripAdvisor.com were collected. In order to compare different ways of rating hotels in the TripAdvisor travel community, the forum discussing Lisbon as a destination has been analyzed. Hotels, in this study, are compared based on different rating scales: the traditional star-rating system, the one based on guests' evaluations, and TripAdvisor ranking.

One of the main strengths of TripAdvisor community is the use of user-generated content. This poses a challenge to hotel managers, namely that new rating methods may be influencing hotel image.

The reviews generated by users are also personalized, on forum posts, dealing with information on diverse topics such as destination attractions, hotels, transportation etc. Examples are: "*am wondering what is the best part of the city to stay in for sight seeing, restaurants, nightlife, shopping*", or "*are there any hotels any of you could recommend in the area which are no more than 70 euros a night!*".

As discussion rooms have users asking for information and other requesting so, the profile of both TripAdvisors is an important factor for an effective strategy. Organizations, locals or past tourists providing information about a destination may influence destination's image.

On the discussion rooms users exchange information, not only about accommodations, but also on transportation, restaurants weather, prices, and so on.

A demographic analysis of the users is performed for forums discussion and hotel rating categories are compared. The findings are discussed in the following section.

The methods used for the analysis presented here can be summarized as follows:

- data were gathered on 25<sup>th</sup> February 2008 from TripAdvisor.com;
- information about all the hotels for the city of Lisbon regarding rank, rating, number of reviews and mean price per room was collected;
- information on the discussion room (forum) regarding profile of the users searching for information (authors) and of those providing information (advisors) was identified;
- a list of key word topics is searched on the forum, and their frequency on the discussions are recorded.

## 3 RESEARCH FINDINGS

Tripadvisor.com was the platform studied to gain a deeper understanding about the way hotels, tourists and residents of a given destination are changing the tourism online marketplace.

With the development of such web platforms, tourists tend more and more to book hotels on the internet. This change brings a new way of competition and favours the development of new business models for hotels. We start by analysing the way hotels are ranked and rated online (section 3.1). As the ranks and rates are based on prior reviews of users, we analyze the profile of online forums (section 3.2).

The choices of tourists are based not only on categorized rankings, but also on discussion rooms where specific questions about the destination can be formulated. In these forums tourists are interested in many aspects about the destination such as transportation, restaurants, prices (section 3.3), as the destination is a single product that the tourist is experiencing.

### 3.1 Hotels Rating Analysis

The analysis of the data gathered shows that the traditional star rating is in accordance with Tripadvisor rating. The Tripadvisor ranking order is also based on the popularity of the hotels by tourist preferences, and other

not available measurement.

The results are displayed in Table 1. Hotel rating is actually ordered in accordance with the traditional star rating. The TripAdvisor ratings and the mean rank in Lisbon hotels follows star rating for all star categories. A different result was found on London hotels, with 5-star hotels scores not following star rating [10]. Therefore, more results on other cities are needed in order to assess possible differences.

The mean price for a room in Lisbon booked on TripAdvisor also follows the star rating. And the mean room rate is 119 Euros, which considerable lower than the values for London city, 282 euros.

TABLE 1  
HOTELS RATING

Star	%	Mean Rank Lisbon	Mean TripAdvisor Rating	Mean nº Reviews	Mean Room Rate
NA	47	83,6	3,39	21	99
1	4,3	102	3,4	26	86
2	7	88,6	3,35	35	97
3	30	57,4	3,85	39	140
4	7,7	50,2	3,95	52	167
5	4	9,7	4,5	67	332
<b>Total</b>		<b>100,8</b>	<b>3,72</b>	<b>32</b>	<b>119</b>

Curiously, the user reviews also follow star rating increase (see Table 1). There is an average of 32 reviews per hotel. The reviews are highly important as they are the basis of a user-generated content business model. Consumers evaluate hotels based on reviews and evaluations made on the destination, and their evaluation on previous trips to the destination [11].

The low number of hotels in Lisbon with an online travel strategy is considered a weakness. Only 191 hotels are represented in TripAdvisor.com.

### 3.2 Destinations Product

Forum authors are searching for customized information about the tourist destination, and

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typically they look for advice matching some specified preference. These can be related to accommodation facilities, sightseeing, locations, planning tips, etc. The TripAdvisor area on Lisbon contains about 1660 topics (forum).

This information has two core factors: it is freely available and has a peer-to-peer structure. The users are looking for simple and reliable information about the destination that may help the planning. The website has most of the information focused on hotels.

TABLE 2  
DESTINATION BUSINESS

Destination Tourism Companies	% In Forums (approx)
Hotel	74
Restaurant/Bars	26
Rent-a-Car	10
Sightseeing	10
Tour Guides	9
Transports	14
<b>Others</b>	
Prices	16
Weather	14

Other information elements concern sightseeing, rent-a-car, tour guides, transportation, restaurants/bars or prices and weather conditions (see Table 2). These help the tourist in the decision process. Knowing if a certain hotel is a good choice may require elements different from those strictly connected with the hotel as the destination is seen as a single product by the tourist.

### 3.3 Forum Analysis

In TripAdvisor, a user can create a topic and any other user can post comments. In this way tourists may have a highly customized advice. It is possible to distinguish the users in *Authors* and *Advisors*. They have different profiles. Authors represent the tourists far from the destination. The advisors are local residents or fellow tourists, who have already visited the destination. All the participants are voluntary and don't have any form of reward.

The results of Lisbon forum on TripAdvisor.com are presented in Table 3.

On the average, users registered themselves in the period 2005-2008 (mean date is 2006). Authors and advisors post a 2,3 and 2,5 reviews (mean value). The number is small but

probably reflects the relatively young 'age' as participants. Users post relatively few photos and videos. That is to say that they prefer textual contents and descriptions to pictorial information.

TABLE 3  
AUTHORS AND ADVISORS

Mean	Authors	Advisors
Registration Date	2006	2006
Reviews	2,3	2,5
Reviews in Lisbon	0	0,4
Photos	0,4	2,7
Videos	0	0
Forums	46	161
Forums in Lisbon	4	18
Date Posted	2007	2007
Travel Network	0,8	1
Travel Map	30	43

The forums, as generators of personalized content for trip planning, have a higher participation of Advisors (mean = 161) than Authors (mean = 46). Advisor have 11,2% of their forum participations on the city of Lisbon, while Authors have 8,7%. The analysis of Advisors and Authors was conducted separately, as they have different characteristics.

The geographical origins of Advisors are prominently within the country of the destination. This means that most of the suggestions provided are generated by local people. In our study, most of the forums Advisors were from Portugal. U.K. and U.S.A. were the other two countries with a significant participation as Advisors (see Fig. 1).

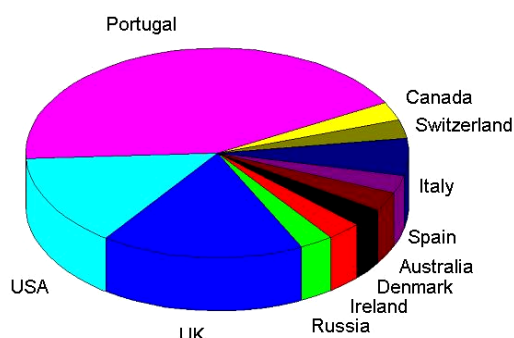


Fig.1 Advisors origin on TripAdvisor.com forum for the city of Lisbon, Portugal.

Authors origins are almost completely from UK and USA (Fig. 2). This may be due to higher participation and impact of TripAdvisor.com in English speaking countries (the website

language is English).

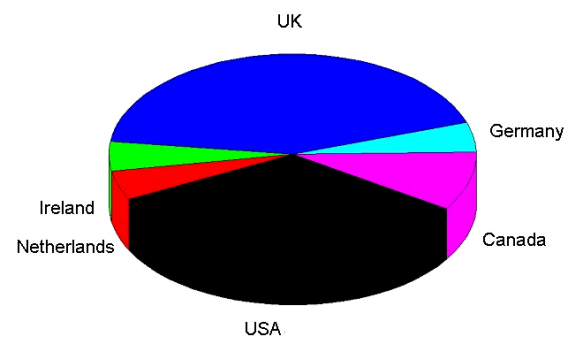


Fig. 2. Authors Origin on TripAdvisor.com forum for the city of Lisbon, Portugal.

The origins of Authors (see Fig. 2) are mostly from UK and the USA. Also for the Authors we find much higher participation of English speaking countries, as the analysis was conducted on the English page of TripAdvisor.

#### 4 DISCUSSION AND CONCLUSIONS

Web 2.0 and Travel 2.0 may have a huge impact on the travel and tourism industry. If social network websites will continue their growth as predicted [12], tourism related topics will be of central importance for travel planning. Online communities have proved to have a strong influence on consumer behaviour [2,8,13], and, consequently, on the image and the marketing of hotels [5,14,15].

On TripAdvisor.com, the user-generated content is a main tool for rating hotels. The high importance of online travel market, lead to consider a crucial factor the positioning of hotels on the Web, and in particular on Travel 2.0 websites such as TripAdvisor.

Our findings show that Lisbon has a very low number of hotels marketed on social travel websites (only 191 hotels are represented in TripAdvisor). This can be well considered a weakness for an effective online marketing strategy for a destination.

The TripAdvisor ratings of these hotels follow closely the traditional star classification. The participation is quite good, given the high number of reviews. Information provided on the discussion forums contain mainly textual contents. Authors (people looking for information or advice) are predominantly located in USA or UK, while advisors (people providing information or advice) are mostly locals. This gives evidence of a high interest and participation of Lisbon's citizens in welcoming possible tourists and can be considered an important asset for the destination, which

would deserve high attention and, possibly, encouragement by destination management authorities.

The study presented here is a further confirmation of the importance online social media may have in promoting single operators and the destination as a whole. On their part, hotel owners and managers definitely need to acknowledge this role and should intensify their efforts to develop and expand their usage of today's online interactive technologies in order to improve their position on the market.

## ACKNOWLEDGMENT

J.M. wishes to thank the Foundation for the Science and Technology, research over Ph.D. funding under the contract SFRH/BD/19258/2004. J.M. is also thankful to the University of Aveiro for research support. Both are gratefully acknowledged.

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