

Strategic Services Marketing
Prof. Kalpak Kulkarni

Department of Management Studies,
Indian Institute of Technology, Roorkee

Week – 05

Lecture - 24

Sentiment Analysis and Social Listening in Services

Hello everyone. After understanding the Role of customer Analytics and Predictive Analytics, Now let's move on to the next part wherein we are going to understand The applications of Sentiment Analysis and Social Listening in Services Marketing. What is sentiment analysis? Sentiment analysis involves using natural language processing, many people acronym it as NLP or text analysis and machine learning to identify and extract subjective information from sources such as social media, customer reviews, and customer feedback. Let's understand sentiment analysis through an informative video. Have a look at this particular video that shows us what exactly is sentiment analysis. Humans express their feelings on a regular basis.

These feelings are called emotions. Do computers understand emotions? Is it important to understand emotions? Scientists are using different techniques, including machine learning, to train machines on how to understand human emotions. This is called sentiment analysis. It is the field that tries to give machines and computer software the ability to understand the emotions of the user.

Let's take a look at one simple approach of performing sentiment analysis. In a computer's perspective, emotions are split into three categories, positive, neutral, and negative, with the corresponding scores of plus one, zero, and negative one, respectively. The keywords of each sentence will be categorized into one of the three categories, and then the summation of the final score will determine if the sentence is overall positive, neutral, or negative. Let's look at the sentence, the movie was great. The first step is to remove unnecessary words and identify the important ones, so the sentence will become movie great.

Each word will be classified into one of the three categories, depending on the trained data. This will most likely result with a positive for great and neutral for movie, ending up with the summation of zero and one. The final score is one. This means that the overall

sentiment of the sentence is positive. It's important for humans to understand the emotions of others because it will help them connect and communicate more effectively.

Achieving this with computers will improve the user experience and will also result in a better experience for humans dealing with machines. Sometimes it can be hard for humans to understand or identify emotions, so implementing sentiment analysis definitely has many challenges. Fortunately, using machine learning can make it easier. And the second part is social listening. It is the process of monitoring and analyzing social media channels, forums, and even other online platforms to gain insights into customer opinions, brand mentions, and industry trends.

To understand social listening with more clarity, let's have a look at this particular video that shows us how Hulu, another OTT platform, uses social listening to help determine the right shows for its service. Have a look at this video. I have been a net-based customer since 2011 I have brought the tool with me to at least three different companies and I use the platform for essentially everything. I think I'm of the opinion that I probably couldn't do my job without it anymore the primary use case for digging into shows that we don't currently have on Hulu in NetBase is to determine whether or not it looks like it would be a good fit with our subscriber base or if it looks like it would be an acquisition driver. I know who our audience is, so I can look in NetBase and I can see demographically do they match up. If they don't, do they look like a target audience that we have? And if the answer to either one of those questions is yes, then you know we'll start to dig a little bit deeper and make the case as to you know why we should have this show on Hulu.

Or if they don't, then why we shouldn't. NetBase is helpful with my job because it's pretty much the only way to aggregate all of the feedback that we're getting from social media. It's the easiest way to see what everybody is saying in an easily adjustable format. So there are a couple of features that stand out and give me deeper insight than some other tools. One of those would be the sentiment driver's word cloud.

I think that that's usually the place where I look first when I'm trying to explain a spike or dig into you know what's going on in any given time period. And the other one would be the trending widget because that does a similar thing on a shorter time range and it helps you very easily see what's different now from the previous period. It's probably, I would say, the industry leader in the social listening space. I have no problems with trusting what I see in the tool, whereas you know some of the other tools that I've tried, I'm not really sure if I'm getting the whole picture. And that's just not acceptable.

So, I hope you understood what is sentiment analysis and social listening. But why these are important? Sentiment analysis is important as it can offer you a more robust view in terms of customer feedback and it also helps you to go for competitor analysis as well. Whereas social listening helps us understand the brand perception among our customers

and Also, look out for the market trends. Coming to the customer feedback analysis. So, sentiment analysis helps in understanding how customers feel about a service.

It categorizes opinions as positive, negative or even neutral, providing valuable insights for service improvements. Whereas with respect to brand perception, social listening allows businesses to track brand mentions and sentiment across various platforms. This information aids in managing brand reputation and making data-driven decisions. With respect to competitor analysis, by analyzing sentiments around competitors, businesses can identify areas of strength and weakness, informing their own strategic decisions. And coming to market trends, social listening helps in identifying emerging trends, customer preferences and market sentiments, allowing businesses to adapt their services accordingly.

So, what are the areas of application for using sentiment analysis and social listening? First, they are helpful in terms of product or service improvement. Secondly, customer experience enhancement. Third, for campaign effectiveness. And fourth, crisis management. With respect to product and service improvement, for example, an airline might use sentiment analysis on social media to identify recurring negative sentiments related to delay and use this information to improve its services.

Coming to customer experience enhancement, let's have an example of hotel chain that could analyze social media reviews to understand customer sentiments about various aspects of their stay leading to targeted improvements. With respect to campaign effectiveness, let's have an example of telecom company that might use sentiment analysis during and after a marketing campaign to measure customer reactions and fine tune future campaigns. With respect to crisis management, sentiment analysis can be crucial during a crisis, helping a service provider to quickly identify negative sentiments and respond proactively to mitigate reputational damage. So, what are the benefits of using this sentiment analysis and even social listening for that matter? There are three benefits. First, with respect to proactive decision making, then customer centric approach and then we have competitive advantage.

Proactive decision making, for example, these tools enables businesses to proactively address issues and capitalize on positive sentiments. Secondly, with respect to customer centric approach, sentiment analysis and social listening allows businesses or service providers to align services with customer expectations and preferences. And third, with respect to competitive advantage, adopting these tools provides a competitive edge by staying attuned to the market trends and customer sentiments. However, there are a lot of challenges in using sentiment analysis and social listening. First challenge deals with language nuances, understanding context and sarcasm can be challenging for automated sentiment analysis tools.

Second challenge is with respect to data overload, managing large volumes of data from various sources requires a robust sentiment analysis tools and strategies at place. So, let's have a look at some successful case studies, wherein these tools have been adopted by those companies. First case here is of Lexis Asia specific. So, they are trying to deliver the perfect customer experience using social listening tools. Have a look at this video that talk about this in much detail.

Lexus is a global manufacturer of Premium luxury Vehicles across the Globe customer experience is the sum of every emotional reaction that the consumer consumer gets every time they encounter Lexus at our showrooms at our service departments whether it's a magazine ad, a TV commercial any of our special events and even in our actual vehicle the spirit of Japanese hospitality and there's a word for that it's otanashi is deeply is deeply ingrained in our DNA that naturally drives us to treat each and every customer as we would against in our own home. We're striving to create amazing experiences for our customers by surprising and delighting them with simple moments that they don't expect. Good or bad experiences are what customers remember and what they talk about. Social has actually given consumers a louder voice. Social media can have a huge impact in minutes, even seconds.

However, by closely monitoring conversations in the social media channel using a listening solution such as Digimind Social, we're able to turn a potentially negative situation or what started as a negative situation into a more positive situation. We use Digimind to shape our social strategy as well as to measure our performance towards our goals. By helping us identify who's talking, what they're talking about and where they're talking, it actually helps us get to know our customers better. What I like about Digimind Social is the level of support and responsiveness that's exhibited by their whole support team. To them, it's less about what's in the contracts and more about how do we get our business needs met.

It's actually a great example or a case study in elevating a brand by concentrating and performing well in that area of the customer experience. Next business case is of Air France. Let's have a look at this particular video that talks about how Air France uses social listening to provide world-class customer experience. Air France is one of the world's biggest airlines. We have 56 million of customers worldwide, 1,000 fly today flying to 195 destinations.

I'm the social media project manager at Digital Marketing of Air France. The airline industry is really changing as we are subject to instability of the weather. There are many touch points with our customers. Air France is also a premium brand very attached to the excellence of Air France's with customers having high expectations to immediate response on the web or on social media. We needed a multi-channel tool in order to have a 360 view.

Air France gets an increasingly high volume of conversation and mention on social media, 350,000 mentioned a month plus 8,000 to 10,000 private message a day. We decide to invest on a social listening tool to leverage this conversation and customer voice more efficiently. I'm in charge of a social media analyst team. They are working seven days a week, 24 hours a day dedicated to social media listening on operational subjects. We need to be really reactive and understand what our client needs on the other side of the globe, especially when there is a storm and the clients are lost.

With the social media, you can really quickly understand this and adapt your communication towards the clients. From a digital marketing point of view, I personally love the way the topic will allow us to have instant insights on brand perception. Air France has been associated for years with technical innovation. We decided to reconnect to this idea this year and we managed to see the evolution of the share of voice related to topic like technology or startups. No other tool can offer you those insights in real time without accuracy.

We also use a lot of trail in order to analyze better who are talking about the subjects. We have different kind of influencers who are talking about us. We have more marketing influencers, we have what we call the *avéigique* influencer who are very fond of aviation. We have press media and we really need to distinguish those group of influencers to make sure that we adapt our communication but also our strategy towards them. I did not have to be very convincing as customer centricity is part of the DNA of Air France.

In just few minutes, 93 users have been trained working on 137 requests on a daily basis. Not only the digital team have access, the customer voice is important across departments. So we involve the customer experience departments, press departments, operational control center and stations of course. Having a dedicated account manager from Linkfurence is a real key to success. A powerful tool is only half of the story.

AI can be powerful but an algorithm just do what it's been designed to. Human analysts understand the context, have the whole picture in mind. You cannot replace analyst by a robot. I think the key for using social media listening is not to take social media listening for granted as it is right now. Social media listening is evolving every day and it's evolving with our clients so we need to follow the way our clients are using social media and for that you need first a good tool and then good analysts.

Moving on to the next case or example is Airbnb. So Airbnb is a global online marketplace for lodging and travel experiences. Recognize the significance of customer feedback in shaping it's services. So to enhance customer relations and address potential issues promptly, Airbnb employed sentiment analysis and social listening strategies. So what were the objectives they put for? First gain insight into guest experiences and sentiments that the first objective.

Second objective is to monitor discussions about Airbnb across various social media platforms and third and last leverage feedback for continuous service improvement. So how did they implemented this? So first they use sentiment analysis on reviews, customer reviews. So Airbnb implemented sentiment analysis tools to analyze guest reviews on it's platform. The tools categorize sentiments based on aspects such as accommodation quality, cleanliness and host hospitality. They also use social listening across channels.

Social listening tools were utilized to monitor conversations on platforms like Twitter, Now X, what we say, Facebook and travel forums. Airbnb tracked mentions of its brand, properties and associated hashtags to measure public sentiments. Then comes integration of these tools with customer support. Sentiment analysis insights were integrated into Airbnb's customer support system. Customer support teams received automated alerts for negative sentiments allowing them to address concerns in real time.

So what are the outcomes of these utilization of these tools for Airbnb? So the first outcome is in terms of proactive issue resolution. Sentiment analysis help Airbnb identify common pain points mentioned in reviews such as cleanliness issues or even communication gaps. The platform took proactive measures to address these concerns including providing additional training for hosts and implementing stricter quality standards. Second outcome was with respect to enhanced host-guest communication. So social listening allowed Airbnb to monitor discussions around host-guest interactions.

Positive stories and exceptional host behavior were highlighted, contributing to a positive community narrative. Third outcome was in the form of crisis management. Airbnb used social listening to address crisis and controversies related to its platform promptly. Transparent communication and swift responses helped manage the brand's reputation during challenging times. Another outcome was with respect to customized user experience.

Insights from sentiment analysis guided Airbnb in customizing user experiences. Feature enhancements, personalized recommendations, and tailored promotions were implemented based on user preferences expressed in reviews and across social media. So Airbnb's utilization of sentiment analysis and social listening showcases the importance of actively listening to both positive and negative sentiments. By incorporating feedback into it's operations, Airbnb not only improved the user experience but also fostered a sense of community and transparency within it's platform. So what are the tools generally are available in the market for doing this kind of sentiment analysis and social listening? So there are numerous tools that are into sentiment analysis, for example, IBM Watson, Google Cloud, NLP API, and sentiment analysis features on social media platforms.

Whereas with respect to social listening tools, there are proprietary softwares or providers for example, brand watch, root suit, and mention. These are the examples of tools that

business can use to monitor and analyze social media discussions. Let's have some more details on few of these tools. So first here is a brand watch. Brand watch is a comprehensive social listening tool that helps businesses monitor brand mentions, track industry trends, and analyze customer sentiments across various social media platforms.

Another set of tools is coming from Hootsuite. Hootsuite allows businesses to monitor social media conversations and engage with their audience and measure the impact of social media campaigns as well. Another proprietary tool is Talkwalker. Talkwalker is a social media analytics and listening tool that provides real-time monitoring of brand mentions, sentiment analysis, and competitive benchmarking as well. Then comes SEMrush, a very popular within digital marketers and other technosavvy people. While primarily known for SEO and digital marketing, SEMrush also offers social media toolkit features, including social listening.

It helps businesses track brand mentions, analyze sentiment, and monitor social media performance as well. And then we have IBM Watson. IBM Watson offers natural language understanding, a powerful tool for sentiment analysis. It leverages machine learning and NLP to analyze text data and identify sentiments. So mentioning these tools is not to promote them, but actually to help you guys to understand what are the different tools available in the market to run these kind of sentiment analysis and social listening projects.

So in this session, we try to explore and understand the application of sentiment analysis and social listening with respect to services as well. Thank you.