

TRANSFORMATION OF EMOTIONAL MINING IN THE HEALTH CARE SYSTEM: A Study

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Abstract

Development cannot happen in isolation whether it may be in micro or macro level. So there is a need for a strong tool to connect people instantly so that the knowledge transfer is never ending and instant. Media for development uses to convey messages on issues such as health care, poverty reduction, good governance, environmental protection and community development, socio-economic and cultural development. Today the world is becoming a small place to live in and share knowledge, ideas and passing over valuable culture to the next generation, all the above said things is possible through social networking and media. Every aspect in the society has positive and negative externalities so we need to see how these negative externalities can be balanced and surpassed through positive externalities to reach development in all dimensions.

I INTRODUCTION

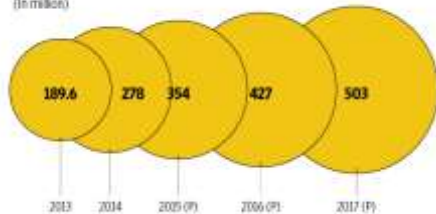
In recent years, the use of emotional mining in health care has skyrocketed. From Tweets to Facebook posts, health care authorities and practitioners are increasingly turning to emotional mining to promote awareness, encourage patient engagement, and increase the spread of accurate health messaging. And they're doing so while remaining fully compliant with regulators. According to the Pew Institute, the growing popularity of emotional mining in health care can be attributed to two key factors:

1. The widespread use of emotional mining tools
2. The growing desire for patients, particularly those afflicted by chronic illness, to connect with each other

Coupled with other online resources, emotional mining now largely impacts the way people interact with information—including health-related content. And while most patients continue to prefer face-to-face interaction with their health care providers, online health resources, including social, are now an extremely important supplementary tools in their health journey.

INTERNET USERS IN INDIA 2013-17 (P)

(In million)



Source: Janus Internet in India 2014, Industry Observations, IPW-PRCS IMAZ industry report 2014 and 2015

THE BENEFITS OF USING EMOTIONAL MINING IN HEALTH CARE

Emotional mining offers health care organizations and practitioners many benefits. In this section we'll look at three of the top situations where social can be especially helpful to the industry: during a crisis, to help build brand authority, and to raise awareness for a particular cause.

Benefit 1: Communicating during a crisis

During a public health crisis, emotional mining is proving particularly beneficial at helping to inform and protect thanks to the instantaneous and wide-reaching ability of the tool.

- Consider, as an example, the 2016 Zika outbreak. Originating in Central and South Americas and the Caribbean, the latest outbreak of the mosquito-transmitted virus quickly gained notoriety for its particularly devastating effects on babies in utero.
- Untreatable and highly-transmittable, Zika presented enormous challenges to health care providers desperate to minimize its spread.

Largely unknown to health care practitioners outside of the virus' epicenter, Zika posed several unique challenges to the industry, including:

- Building awareness and transmission prevention knowledge amongst frontline health care practitioners.
- Disseminating prevention information to civilians (including remote and rural dwellers) and at-risk travelers.
- Minimizing the spread of misinformation related to treatment, risk zones, and prevention.

To tackle these challenges, major health care authorities, such as the (CDC), turned to emotional mining. From the initial outbreak through to their ongoing response in the months that followed, the CDC used emotional mining to rapidly disseminate accurate health information to both the health care community and the public in general.

Initial outbreak: crisis communication

- Quickly after the outbreak in early 2016 the Center for Disease Control (CDC) began issuing public health notices about Zika on both their Twitter and Facebook feeds—providing information on its symptoms, transmission, localization, and prevention techniques.
- During this initial response phase, the focus of their efforts were two-fold: to minimize the spread of misinformation and to contain the spread of the virus itself. To the former, the CDC regularly hosted Twitter chats with Zika experts aimed at connecting the general public with accurate Zika facts related to its status, prevention and transmission. To minimize the spread of the virus, the CDC heavily posted updates advising against travel to Zika-affected areas.

Ongoing response: building awareness amongst practitioners

- While not a new virus, Zika was largely unknown by many health care practitioners at the time of the 2016 epidemic. To increase understanding and prevention awareness, the CDC employed social to promote their Zika Training Resources to practitioners.
- Other physician targeted awareness tactics, such as regular twitter chats with Zika experts, also helped the CDC arm frontline health care providers with critical preventative information.
- Physicians, such as Texas-based OB/GYN Dr. Danielle Jones, have applauded emotional mining for its awareness-building role during the outbreak. As Jones notes, emotional mining helped to put Zika on her radar. As a result, she was able to decisively advise her pregnant patients against travel to Zika-active regions.

Twitter Ads info and privacy

Benefit 2: establish brand authority

The internet has dramatically changed how people seek their health information. While face-to-face consults with health professionals are still the first choice for patients, according to a study by the Pew Institute, patients now also actively engage with online health resources to guide their health decisions.

Further, they're using online resources to supplement physician advice with their own research and talk with peers about doctors, medications, and more. Within this trend, emotional mining factors as a major tool through which patients seek, converse about, and share their health findings.

For practitioners, the growing demand for trustworthy and accessible medical information presents an exciting opportunity to engage the new digitally empowered patient. Emotional mining, given its vast global adoption and high-degree of interaction, is one of the most powerful ways to engage within this new health care landscape.

Health care providers who want to elevate their brand authority amongst patients need to go where their patients are—on emotional mining. Several key attributes make emotional mining particularly useful to health care brands: listening and monitoring, engagement, and content dissemination.

Monitor evolving patient interests

Emotional mining can be especially useful to providers looking to understand their patients' concerns. By monitoring emotional mining, blogs, forums, review sites, and other digital sources, health care teams can better understand what patients want and need. Those insights can then be used to help create relevant content that speaks to the interests of a targeted patient segment.

Increase trust and credibility

For many patients, emotional mining is an environment in which they feel a great sense of belonging and trust. They view participants within that sphere as their peers and confidants, and commonly seek advice from within that realm. As such, many physicians today are utilizing social as a powerful way tap into these personal networks to make their messaging more credible and motivating.

Practitioners like Boston-based Dr. Kevin Pho actively engages in Twitter to connect with patients. With close to 150,000 followers, he also uses Twitter as a powerful platform to influence health practices with his original health content.

Twitter Ads info and privacy

For other providers, Twitter chats, LinkedIn forums, and Facebook posts can also be extremely effective ways to reach patients concerned about a particular health issue.

Benefit 3: raise awareness for campaigns and programs

On the campaign front, emotional mining can also help health care providers achieve unparalleled reach for a particular health cause or issue. As with brand awareness, these social campaigns succeed by going to where the patients are—encouraging participation within the very environment concerned patients are already active.

Hearing solution provider Phonak uses emotional mining to fight stigmas by encouraging people to share their stories on their community website, HearingLikeMe.com, and on platforms such as Facebook and Instagram using the hashtag #coolhearingaids.

The community built around the "Phonak hEARos" campaign inspired one woman to share a video of her little girl hearing for the first time. The video went viral on Facebook after it was picked up and shared by NowThis.

The challenges of using emotional mining in health care

Challenges, of course, continue to persist in the world of emotional mining in health care—with issues of compliance and security topping the list. With several simple precautions however, the challenges related to emotional mining for health care providers can easily be overcome.

Staying compliant

In the heavily regulated health care industry, remaining compliant to ethical requirements and protecting patient information is critical. For large organizations with multiple emotional mining users, establishing best practices for emotional mining use can help ensure the collective compliance of all users.

Guidelines towards acceptable and forbidden content, data handling, patient engagement and even tone are a few best practice examples organizations can implement to keep their team compliant.

Staying secure

Simple measures can successfully safeguard health care organization against security breaches. The use of emotional mining platforms, for example, are a great way to manage a

social strategy across multiple internal teams without the risk associated with disorganized efforts.

With best of class platforms, organizations can quickly lock down their emotional mining accounts from a single secure dashboard. A single management platform can also prevent the release of non-compliant materials and provide audible records of patient conversations.

Using emotional mining in health care opens up opportunities

In just a few short years, the health care industry has had to respond to dramatic shifts in patient expectations precipitated by an increasingly digital world. Innovative health care providers are quickly adapting by creating highly engaging and helpful experiences for patients—while also remaining fully compliant. For any health organization wanting to remain competitive, embracing this new era of patient interaction is of the utmost importance.

With emotional mining, health care professionals can gain unprecedented opportunities to connect with patients and promote healthy living. Moving forward, health organizations are encouraged to provide the framework to keep their practitioners and employees compliant while actively engaging in this new world.

THE DANGERS OF EMOTIONAL MINING

- Generally, the popular media has been quick to pick up on stories of malfeasance and misjudgment in the medical world involving SM. Recent articles have featured such sensationalistic headlines as: “Medical students’ cadaver photos get scrutiny after images show up online”, “Nursing students expelled from university after posting pictures of themselves posing with a human placenta on Facebook”, “Fired for Facebook: ER personnel lost their jobs for online posts”, etc. Stories invoking the “dangers” of SM are particularly condemnatory of the misjudgments of errant health professionals; however, they also often implicate the privacy control problems that have dogged SM sites such as Facebook and proven especially hazardous to users from the health professions.
- In response to these concerns, professional organizations such as the American Medical Association (AMA) have published guidelines for the ethical use of emotional mining, emphasizing the need to maintain patient confidentiality, be cognizant of privacy settings, maintain appropriate patient-physician boundaries, provide accurate and truthful information, act with collegiality, avoid anonymity, declare conflicts of interest, and maintain separate personal and professional profiles.
- Accepting friendship requests from patients on sites like Facebook is generally not advised, although there have been compelling arguments in favor of the value of online communication with patients via SM. Overall, the tone and content of existing guidelines focuses disproportionately on the risks rather than the benefits of SM, and suggests an expectation of misuse rather than consideration of how technologies might be used in a positive manner.

STATISTICS OF DIGITAL MARKETING IN HEALTHCARE

1. Over 40% of consumers say that information found through emotional mining affects the way they deal with their health (Mediabistro)

The professionals in the healthcare industry have an obligation to create educational content that could be shared across emotional mining that will help consumers about health-related issues. Others’ opinions are often trusted but aren’t always accurate sources of insights especially when you are dealing with such a sensitive subject like health.

2. People in the age group of 18 to 24-year-olds are more than 2 times likely than 45 to 54-year-olds to discuss health-related things on emotional mining.

This stats show that 18-24-year-olds adopt emotional mining and new forms of communication easily which makes it important for healthcare professionals to join in on these conversations.

3. 90% of respondents, aged from 18-24 years said they would trust medical information shared people on their emotional mining networks (Search Engine Watch)

On emotional mining, a network of millennial is a group of people that is well trusted online which gives an opportunity to connect with them as healthcare professional in an authentic and new way.

4. 19% of owners of a smartphone have at least one health app on their phone. The most popular types are weight, diet, and exercise apps (Demi & Cooper Advertising and DC Interactive Group)

This figure points out to the need for your healthcare organization to look into possibly launching a health related app focused on your specialty. This shows that digital marketing strategy for healthcare should have a strong mobile focus no matter what their industry size is.

5. According to a recent study conducted by Mediabistro, 54% of patients are more comfortable with their providers seeking advice from online communities to better treat their problems.

This shows that a lot of people are comfortable in perceiving the Internet to be beneficial for the exchange of relevant information even about their health.

6. According to MedTechMedia, 31% of healthcare professionals use emotional mining for professional networking.

This shows the importance of emotional mining and other applications which helps in professional development for healthcare workers from networks such as LinkedIn, Twitter, and Facebook. This is undeniably an important factor of digital marketing for healthcare.

7. As per Demi & Cooper Advertising and DC Interactive Group, 41% of people reported that emotional mining would affect their choice of a specific medical facility, hospital, or a doctor.

This statistic illustrates that emotional mining can drive both negative and positive word of mouth. This makes it an important channel for organizations and individual in the healthcare industry to focus on in order to attract as well as retain patients.

8. About 60% of the doctors say emotional mining improves the quality of care delivered to patients.

This shows that many doctors believe that the authenticity and transparency that emotional mining helps spur is actually improving the quality of care provided by them to the patients.

9. Google’s Think Insights has shown 119% year-over-year increase in YouTube traffic to hospital sites.

This shows that video marketing could work better than other forms of content to convert traffic and leads with more efficiency. The hospital facilities should look to create video content based on patient stories, interviews, and others.

- The world of emotional mining marketing has changed significantly over the past decade or so. These changes are driven by trends in patient behavior and preferences. Reaching out to the younger members of society means that healthcare marketers need to change their communication models and focus on what matters to the younger generation.

Here are the top eight emotional mining trends that are likely to have a significant impact on the healthcare market in 2018.

1. Video Content Will Surge Ahead

- Video content has grown exponentially in popularity over the last few years and will continue to grow in 2018, as well. The predictions vary. Cisco predicts 80 percent of online traffic will be driven by video content by 2019, whereas Mark Zuckerberg expects 90 percent of Facebook's content to be video-based by 2018. Nearly 80 percent of emotional mining users said they would rather watch a video than read plain text. In addition, the Facebook live video gets three times more views.
- Mobile video is highly likely to be the primary way your patients will prefer to consume healthcare content.
- Healthcare marketers should also consider that mobile has taken over as the fundamental way to access emotional mining. This is because video content elicits higher engagement rates. New formats such as live streaming are an effective way to engage target customers. In 2018, you may see a steady rise in high-quality video content. In fact, social video advertising grew more than 130 percent in 2017.
- An excellent way to utilize video is by creating and sharing short clips based on the demands and preferences of your target audience.

2. Increased Emphasis on User-Generated Content

- According to marketing surveys, nearly 66 percent of new patients trust online reviews posted by other patients, and an even higher percentage of potential patients believe recommendations from their family and friends. Social networks are presenting many exciting opportunities to use user-generated content into building healthy relationships with prospective and existing patients.
- Medical practices can leverage user-generated content on their emotional mining profiles to engage their followers.
- In 2018, you can expect to see more healthcare facilities integrating user-generated content into their emotional mining campaigns. Healthcare marketers must look forward to 2018 and start leveraging this trend if they wish to remain competitive.

3. Chabot's and Messaging Apps Will Improve Patient Service

- Patient experience is valuable. Patient experience is what it sounds like – making sure your patients have a good experience at your practice and with your employees. The concept of delivering superior patient

experience is steadily gaining momentum. More than 68 percent of marketers say they are focusing on improving customer experience.

- Chabot's can give medical practices the chance to interact quickly with their target audience in a way that feels personal. There are at least 100,000 active bots on Facebook Messenger every month, and almost 2 billion messages are exchanged between businesses and their target audiences each month.
- In 2018, medical practices will have to step out of their comfort zones and focus on chatbots and messaging apps in order to deliver excellent patient service. Healthcare marketers will invest more time and effort in interaction with patients via messaging apps and chatbots. A combination of chatbots and messaging apps can significantly enhance the quality of patient service.

4. Influencer Marketing Will Continue to Rise

- Emotional mining influencers have an incredible reach, usually with followings in thousands or millions. Healthcare marketers are shifting toward paying these influencers to promote their products and services.
- More than 90 percent of healthcare marketers who employ an influencer marketing strategy to connect with new patients and improve engagement with existing patients believe it is successful. In 2018, more healthcare facilities will embrace influencer marketing as a way to communicate with their target audiences.

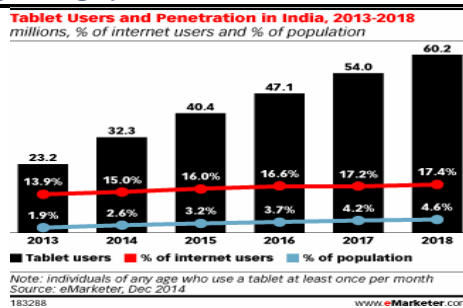
5. Instagram Stories Will Be More Popular

- With Instagram Stories, you can publish content that lives for 24 hours before disappearing. This is believed to be the perfect way to keep your followers engaged without over-sharing content to your Instagram profile. In addition, you can hashtag relevant keywords to help target users find your posts quickly and easily.
- Instagram Stories is perhaps the most significant change in the Instagram user interface, and the marketing opportunities that it provides are tremendous. Instagram Stories is also more lucrative from a marketing perspective because, unlike other emotional mining platforms, Instagram metrics are trackable. This means healthcare marketers trying to connect with their target audience on Instagram must take the time to get on board with Instagram Stories.
- Daily viewers of Instagram Stories have surpassed daily Snap Chat viewers within one year after launch, and the growth is not expected to slow down in 2018. It is likely that more than 50 percent of all Instagram users will be using Instagram Stories by the end of 2018.

6. Organic Reach Strategies Are Likely to Decline

- With an increasing number of businesses strengthening their presence on social networks, there was a need to invent measures to combat spam. This means marketers have to face a dramatic decline in organic reach. Due to less organic return, marketers have to be more selective about what and where to post.

- Healthcare marketers need to stop relying on short-term tactics that once worked. Facebook has already announced that organic reach will soon be zero.
- 2018 is likely to be the year when we will feel the pinch on the organic reach of our emotional mining content. While you must be creating and sharing the most genuine and relevant content, you need to understand that it is a pay-to-play world. With a lot of businesses increasingly disappearing from newsfeeds, ephemeral content is key to staying top-of-mind in 2018.



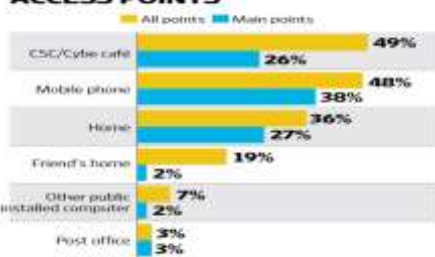
7. Ephemeral Content Will Rule Patient Engagement

- Ephemeral content is short-lived content that appears for just 24 hours and then disappears on its own. This type of content is gaining immense popularity among millennials and generation Z. Snapchat, Instagram and Facebook stories have led to the demand for ephemeral content. Because of the nature of content, the information is lost within hours, thus making your followers take fast action.
- Ephemeral content is a great way to preview upcoming projects and showcase behind-the-scenes content that is supposed to be short-lived. However, you will need an effective strategy in 2018 to engage your target audiences in the shortest possible time.

8. Live Streaming Will Expand

- The live-streaming market is growing at an alarming rate. While live streaming has been around for a while now, the way patients and healthcare brands are going to use them is likely to evolve. We are going to see a lot more of live streaming in 2018, and the brands that leverage it well will be rejoicing in the organic reach it will generate.
- Live streaming was a \$30 billion industry in 2016, and it is expected to more than double in size by 2021 to become a \$70 billion industry. One of the biggest reasons you should care about live streaming is due to its massive user base and rising popularity.

RURAL INDIA INTERNET ACCESS POINTS



- Live streaming is a nearly free way to drive lots of traffic to your emotional mining profile and tons of revenue for your medical practice.

- In 2018, more healthcare brands will harness the power of live streaming and will incorporate it into their healthcare content marketing strategy. Just like Facebook and Instagram, other social networks too will try to capitalize on the trend.

Conclusion

Providing for the healthcare needs of an older workforce will require new solutions to keep down the cost of accessing healthcare and to limit the lost productivity triggered by health issues. Recent research in the Journal of Occupational and Environmental Medicine even suggest that businesses with strong health and wellness programs perform better than those without.

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