

International Journal of Applied Dental Sciences

ISSN Print: 2394-7489 ISSN Online: 2394-7497 IJADS 2023; 9(4): 313-317 © 2023 IJADS

www.oraljournal.com Received: 03-11-2023 Accepted: 05-12-2023

A Vinita Mary

MDS, PhD, Professor and Head, Department of Public Health Dentistry, Thai Moogambigai Dental College and Hospital, Chennai, Tamil Nadu, India

R Kesavan

MDS, PhD, Professor, Department of Public Health Dentistry, Thai Moogambigai Dental College and Hospital, Chennai, Tamil Nadu, India

Vaishnavi V

BDS, Lecturer, Department of Public Health Dentistry, Thai Moogambigai Dental College and Hospital, Chennai, Tamil Nadu, India

Jerosan PI

BDS, Junior Resident, Department of Public Health Dentistry, Thai Moogambigai Dental College and Hospital, Chennai, Tamil Nadu, India

Dharani G

BDS, Junior Resident, Department of Public Health Dentistry, Thai Moogambigai Dental College and Hospital, Chennai, Tamil Nadu, India

Snegha S

BDS, Junior Resident, Department of Public Health Dentistry, Thai Moogambigai Dental College and Hospital, Chennai, Tamil Nadu, India

Corresponding Author: A Vinita Mary MDS, PhD, Professor and Head, Department of Public Health Dentistry, Thai Moogambigai Dental College and Hospital, Chennai, Tamil Nadu, India

Impact of social media on dental treatment needs: A cross sectional pilot study

A Vinita Mary, R Kesavan, Vaishnavi V, Jerosan PI, Dharani G and Snegha S

DOI: https://doi.org/10.22271/oral.2023.v9.i4e.1887

Abstract

Background: The term 'social media' has evolved to encompass a broad spectrum of internet-based tools facilitating communication, information sharing, and engagement. As the social media landscape continues to expand, particularly in the field of dental education, it becomes crucial to examine its impact on treatment choices. This study aims to assess the influence of social media on dental treatment decisions and outcomes.

Methods: A cross-sectional study design was employed to evaluate the impact of social media on dental treatment needs. Data collection utilized a self-structured questionnaire, available in both English and Tamil languages, distributed via Google Forms on various social media platforms. The study spanned three months, resulting in 149 recorded responses. Descriptive statistics were used to analyze the data.

Results: Study participants constituted Urban areas 81(54.4%), peri-urban areas 39(26.2%), and rural areas 29(19.5%). Educationally, 90(60.4%) were graduates, and various occupations were represented, with professionals comprising 62(41.6%). A significant proportion 89(59.7%) did not base treatment choices on social media recommendations, and 93(62.4%) did not consider altering decisions based on social media information. Trust in dental professionals on social media was neutral for 55(36.9%), and 120(80.5%) did not make dental decisions solely based on social media recommendations. A notable 52(34.9%) emphasized the importance of dental professionals having an active social media presence.

Conclusion: The present study sheds light on the multifaceted relationship between social media and dental treatment decisions. The findings underscore the need for ongoing research and guidance in navigating the evolving landscape of social media in dental healthcare.

Keywords: Communication technology, patient decision-making, healthcare impact

Introduction

Over the past two decades, the field of communication has experienced a remarkable surge in advancements. The devices we use daily, including desktop and laptop computers, mobile phones, tablets, and the internet, have become easily accessible, opening up new avenues to access information and connect with a broader audience regardless of geographical location [1]. The term 'social media' has evolved significantly, encompassing internet-based tools that enable individuals to gather, communicate, share thoughts, opinions, information, images, and personalized messages. Users can freely express their ideas, engage in discussions on various topics, and gain knowledge [2]. While popular platforms like Facebook, Instagram, Twitter, WhatsApp, YouTube, and others are well-known, the social media landscape continues to expand with thousands of platforms serving diverse purposes in education, entertainment, business, and even politics, including dental education. Various healthcare forums, blogs, microblogs, Wikipedia, virtual reality and gaming environments contribute to the vast array of available platforms [3].

As the use of these platforms increases, it becomes crucial to ensure the responsible and effective use of these tools for the betterment of patient health outcomes. Social media can play a pivotal role in patient education, professional networking, improved care, and enhanced treatment outcomes. These technologies also facilitate the extension of healthcare services to remote areas through virtual associations. However, healthcare professionals must prioritize patient-centered care in their utilization of these tools [4].

In today's world, virtually every individual has web access, irrespective of age, gender, education, or economic status, a study was conducted to assess the impact of social media on dental treatment choices. Recognizing the potential risks associated with misleading information, many healthcare institutions and organizations have issued guidelines to mitigate these risks ^[5]. Social media has the potential to reach diverse audiences, including those seeking oral health management. Collaborating with these individuals ensures their health and contributes to maintaining proper oral health. Monitoring the quality and reliability of information is essential, with an emphasis on maintaining user confidentiality and privacy ^[6]. The present study aims to evaluate the impact of social media on dental treatment choices.

Materials and Methods

This research employed a cross-sectional study design and data was collected using a self-structured questionnaire comprising 16 questions regarding impact on social media on dental treatment needs. The study was approved by the ethics committee board of Dr. MGR Educational and Research Institute, Chennai, India.

Demographic details were recorded using, Modified Kuppuswamy scale and were made available in both English and Tamil languages. This was distributed as Google Forms through various social media platforms, including WhatsApp and Instagram for a period of three months at the end of which 149 responses were recorded and considered for this study.

Descriptive statistics, including frequency and percentage, were calculated for the variables related to the impact of social media on dental treatment needs using Statistical Software: IBM SPSS Statistics for Windows, Version 23.0, was utilized for data analysis.

Results

Demographic Information

In our study involving 149 participants who are general public, demographic data revealed a distribution where 80 respondents (53.7%) identified as female, while 69(46.3%) identified as male. Regarding residential areas, 39 individuals (26.2%) hailed from peri-urban areas, 29(19.5%) from rural areas, and the majority, 81(54.4%), resided in urban settings. Education-wise, a significant portion of the participants,

90(60.4%) were graduates, representing diverse educational backgrounds. In terms of occupation, professionals comprised 62 individuals (41.6%), with an additional 26(17.4%) occupying senior managerial roles, reflecting the diverse occupational profiles within the study cohort.

Social Media and Dental Treatment

It was found that a considerable proportion of individuals, specifically 75 individuals (50.3%), occasionally encountered dental information on social media. Notably, the study unveiled those, 63 participants (42.3%) expressed a moderate level of trust in dental information sourced from social media, while 52 individuals (34.9%) remained neutral or undecided on the matter. Furthermore, a substantial 81 respondents (45.6%) maintained a neutral stance regarding social media's impact on dental awareness.

When it came to making dental treatment choices, a majority of 89 individuals (59.7%) indicated that their decisions were not influenced by recommendations on social media, and an even larger proportion, 93 participants (62.4%), stated that they did not contemplate altering their treatment choices based on information from social media platforms.

Social Media Usage Patterns

Examining the frequency of seeking dental information on social media, it was observed that a significant portion of 43(28.9%) individuals, never engaged in such pursuits. In terms of primary platforms for dental information, 53(35.6%) turned to YouTube, while 46(30.9%) favored Instagram. Notably, a substantial majority of 112 respondents (74.5%) did not actively follow dental professionals on social media, highlighting a prevalent lack of social contact with such experts in the digital realm.

Trust and Decision-making

Regarding trust in dental professionals disseminating information on social media, a notable 55 individuals (36.9%) expressed neutrality on the matter. The study also revealed that a significant majority, specifically 100(80.5%), did not exclusively base their dental decisions on recommendations obtained from social media. Additionally, among the total participants, 54(34.9%) acknowledged the importance of dental professionals maintaining an active presence on social media, underscoring a recognition of the significance of such engagement in the field.

Variable	Category	Frequency	Percent
Gender	Female	80	53.7
	Male	69	46.3
Residential Area	Peri-Urban	39	26.2
	Rural	29	19.5
	Urban	81	54.4
Education of the Head of the Family	Graduate	90	60.4
	High School Certificate	10	6.7
	Illiterate	4	2.7
	Intermediate or Diploma	12	8.1
	Middle School Certificate	6	4.0
	Primary School Certificate	2	1.3
	Profession or Honors	25	16.8
Occupation of the Head of the Family	Clerks	3	2.0
	Craft & Related Trade Workers	4	2.7
	Elementary Occupation	13	8.7
	Legislators, Senior Officers & Managers	26	17.4
	Plant & Machine Operators and Assemblers	4	2.7
	Professionals	62	41.6

Skilled Agricultural & Fishery Workers	4	2.7
Skilled Workers and Shop & Market Sales Workers	12	8.1
Technicians & Associate Professionals	9	6.0
Unemployed	12	8.1

Table 2: Impact of social media on dental treatment needs

Question	Response	Frequency	Percent
Have you ever come across dental treatment information or	No	45	30.2
recommendations on social media platforms?	Yes, frequently	29	19.5
	Yes, occasionally	75	50.3
	Completely distrust	6	4.0
To what extent do you trust the dental treatment information shared	Completely trust	19	12.8
on social media platforms?	Neutral/Undecided	52	34.9
on social media platforms.	Somewhat distrust	9	6.0
	Somewhat trust	63	42.3
	Agree	49	32.9
	Disagree	16	10.7
Do you feel that social media has influenced your awareness and	Neutral	68	45.6
knowledge about different dental treatment options?	Strongly agree	12	8.1
	Strongly disagree	4	2.7
	I'm not sure	17	11.4
	No, I have not made any treatment choices	17	11.7
Have you ever made a dental treatment choice based on	based on social media recommendations	89	59.7
Have you ever made a dental treatment choice based on			
information or recommendations you received through social	Yes, I have made a treatment choice based	17	11.4
media?	solely on social media recommendations		
	Yes, social media influenced my decision,	26	17.4
	but I considered other factors as well		
Have you ever considered changing your dental treatment choices	Maybe	34	22.8
based on information you found on social media?	No	93	62.4
based on information you found on social inedia:	Yes	22	14.8
	Neutral/No influence	55	36.9
	Not at all influential	23	15.4
How would you rate the influence of social media on your dental	Somewhat influential	51	34.2
treatment decision-making process?	Somewhat uninfluential	8	5.4
	Very influential	12	8.1
	N/A(I have not made any dental treatment	12	0.1
		58	38.9
Have you ever changed your dental treatment preference based on	decisions based on social media)		12.0
information or recommendations you found on social media?	No, I maintained my initial preference	64	43.0
	Yes, I changed my preference	27	18.1
	Daily	40	26.8
How often do you was social modio platforms to sock information	Never	43	28.9
How often do you use social media platforms to seek information	Once a week	7	4.7
or advice about dental treatment options?	Rarely	55	36.9
	Several times a week	4	2.7
	Chrome	1	0.7
	Encyclopedia	1	0.7
-			
-	Facebook	10	6.7
-	Google	7	4.7
	Google search	1	0.7
Which social media platforms do you primarily use to gather dental	Instagram	46	30.9
treatment information?	Jio	1	0.7
	No	8	5.4
	TV	1	0.7
	Twitter	1	0.7
	WhatsApp	19	12.8
	YouTube	53	35.6
	1001000	33	33.0
Do you follow dental professionals or dental clinics on social	No	111	715
, and a second protection of a second chimes on social		111	74.5
media platforms?			
	Yes	38	25.5
	Yes N/A(I have not made any dental treatment		26.2
media platforms? Have you ever consulted with dental professionals through social	Yes N/A(I have not made any dental treatment decisions based on social media) No, I have not consulted with dental	38 39	26.2
media platforms?	Yes N/A(I have not made any dental treatment decisions based on social media) No, I have not consulted with dental professionals	38	
media platforms? Have you ever consulted with dental professionals through social	Yes N/A(I have not made any dental treatment decisions based on social media) No, I have not consulted with dental professionals Yes, I have consulted with dental	38 39 93	26.2 62.4
media platforms? Have you ever consulted with dental professionals through social	Yes N/A(I have not made any dental treatment decisions based on social media) No, I have not consulted with dental professionals	38 39	26.2
Have you ever consulted with dental professionals through social media platforms to discuss your dental treatment choices? Have you ever shared your personal dental treatment experiences	Yes N/A(I have not made any dental treatment decisions based on social media) No, I have not consulted with dental professionals Yes, I have consulted with dental	38 39 93	26.2 62.4
Have you ever consulted with dental professionals through social media platforms to discuss your dental treatment choices? Have you ever shared your personal dental treatment experiences	Yes N/A(I have not made any dental treatment decisions based on social media) No, I have not consulted with dental professionals Yes, I have consulted with dental professionals No	38 39 93 17 130	26.2 62.4 11.4 87.2
media platforms? Have you ever consulted with dental professionals through social media platforms to discuss your dental treatment choices?	Yes N/A(I have not made any dental treatment decisions based on social media) No, I have not consulted with dental professionals Yes, I have consulted with dental professionals	38 39 93 17	26.2 62.4 11.4

	Never	76	51.0
	Rarely	54	36.2
	Weekly	4	2.7
	Neutral	55	36.9
II	Somewhat likely	37	24.8
How likely are you to trust dental treatment information shared by dental professionals on social media?	Somewhat unlikely	14	9.4
dentai professionais on sociai media?	Very likely	28	18.8
	Very unlikely	15	10.1
Have you ever made a dental treatment decision solely based on	No	120	80.5
recommendations or testimonials you found on social media?	Yes	29	19.5
	Important	52	34.9
How important is it for dental professionals or clinics to have an	Neutral	45	30.2
active presence on social media platforms when considering dental	Not important	10	6.7
treatment options?	Not sure/undecided	15	10.1
	Very important	27	18.1

Discussion

Demographic Characteristics

The demographic information gathered in this study provides a snapshot of the surveyed population. The gender distribution reflects a balanced representation, with 80(53.7%) female and 69(46.3%) male respondents. Urban areas constituted the majority 81(54.4%), with 39(26.2%) from peri-urban and 29(19.5%) from rural areas. A well-educated demographic was observed, with 90(60.4%) being graduates respectively. This demographic diversity is essential for understanding the varied perspectives on the influence of social media in dental treatment choices.

Social Media Engagement

In the present study, 53(35.6%) opted YouTube as the primary platform for seeking dental information, in contrast to the study by Omar Alkadhi *et al.* [11] wherein out of 442 participants, a minority of 12(3.64%) seek YouTube as their primary. In a study by Henry *et al.* [8], out of 212 participants, 573(37%) of adults use social media for dental and healthcare information.

Impact on Treatment Decisions

The present study found a lower percentage 26(17.4%) influenced by information obtained from social media. This was in contrast to a study by Freire *et al.* ^[9] where a higher percentage 433(86.4%) reported on decision changes. This variance could be attributed to factors such as content credibility, individual preferences, or the nature of dental issues discussed.

Trust in Dental Professionals on Social Media

In the present study, trust levels were lower, with 63(42.3%) expressing moderate trust. In contrast, a study by Henna Mir *et al.* [10] reported findings of high trust level 381(56%) with regards to information regarding dentists or dental clinics from social media. This discrepancy may highlight the need for dental professionals to establish and maintain credibility on social media platforms to enhance trust among users seeking dental information.

Importance of Social Media Presence

In the present study, 52(34.9%) of respondents deemed it important for dental professionals to maintain an active presence on social media. This aligns with a study by Omar Alkadhi *et al.* [11] conducted in Riyadh city where the importance of an active social media presence for dental professionals was opted by majority, 123(27.8%) participants considering it crucial. This reinforces the notion that an engaging digital presence is valued by individuals when

considering dental treatment options.

Frequency of Social Media Use for Dental Information

Our study revealed that 75 participants (50.3%) occasionally encountered dental information on social media, aligning with the findings of the Rayan H. Bahabri *et al.* study ^[12]. Their research reported that 100 out of 238 respondents (42%) frequently utilized social media platforms for dental information. This parallel observation suggests a consistent trend in the prevalence of social media as a source for dental-related content, despite variations in the frequency of engagement among individuals.

Conclusion

The present study findings highlight the dynamic interplay between social media and dental treatment choices, implying the potential of social media educating, informing, and influencing patient decisions regarding dental care. Dental professionals and clinics should recognize the role of social media as a tool for patient engagement and take steps to provide credible and informative content on these platforms. Further research and ongoing monitoring of social media's influence in the dental field are essential to adapt and respond to changing patient behaviors and expectations in the digital age.

References

- 1. Reimagining the Role of Technology in Education; c2017. [Last Accessed on 2022 Nov 02], Available from: https://tech.ed.gov/files/2017/01/NETP17.pdf.
- 2. Ventola CL. Social media and health care professionals: Benefits, risks, and best practices. PT. 2014;39:491-520.
- 3. Lemaster M, Bobadilla H. Social media can aid clinical efforts by helping patients comply with treatment regimens. Dimens Dent Hyg. 2015;13:66-9.
- 4. Moorhead SA, Hazlett DE, Harrison L, Carroll JK, Irwin A, Hoving C. A new dimension of health care: Systematic review of the uses, benefits, and limitations of social media for health communication. J Med Internet Res. 2013;15:e85.
- 5. Smith A, Anderson M. Social Media Use in 2018: A majority of Americans use Facebook and YouTube, but young adults are especially heavy users of Snapchat and Instagram; c2018.
- Moorhead SA, Hazlett DE, Harrison L, Carroll JK, Irwin A, Hoving C. A new dimension of health care: Systematic review of the uses, benefits, and limitations of social media for health communication. J Med Internet Res. 2013;15:e85. DOI: 10.2196/jmir.1933.
- 7. Kurian N, Varghese IA, Cherian JM, Varghese VS, Sabu

- AM, Sharma P, *et al.* Influence of social media platforms in dental education and clinical practice: A cross-sectional survey among dental trainees and professionals. J Dent Educ. 2022;86(8):1036-1042. EPUB 2022 Mar 7. PMID: 35257384. DOI: 10.1002/jdd.12914.
- 8. Henry RK, Molnar A, Henry JC. A survey of US dental practices' use of social media. J Contemp Dent Pract. 2012;132:137-141.
- 9. Freire Y, Sánchez MG, Suárez A, *et al.* Influence of the use of social media on patients changing dental practice: a web-based questionnaire study. BMC Oral Health 23, 365, 2023. https://doi.org/10.1186/s12903-023-03078-9
- 10. The Impact of Using Social Media on Dental Treatment: An Online Survey https://doi.org/10.26440/IHRJ/0311.02319
- Influence of Social Media on the Patients for Choosing the Dental Clinic: A cross-sectional survey. Journal of Clinical and Diagnostic Research, 2020 Jan, 14(1). DOI: 10.7860/JCDR/2020/43457.13466
- 12. Rayan Bahabri H, Aliyaa Zaidan B. The impact of social media on dental practice promotion and professionalism amongst general dental practitioners and specialists in KSA, Journal of Taibah University Medical Sciences. 2021;16(3):456-460. ISSN: 1658-3612, https://doi.org/10.1016/j.jtumed.2020.12.017

How to Cite This Article

Mary AV, Kesavan R, Vaishnavi V, Jerosan PI, Dharani G, Snegha S. Impact of social media on dental treatment needs: A cross sectional pilot study. International Journal of Applied Dental Sciences. 2023;9(4):313-317.

Creative Commons (CC) License

This is an open-access journal, and articles are distributed under the terms of the Creative Commons Attribution-Non Commercial-Share Alike 4.0 International (CC BY-NC-SA 4.0) License, which allows others to remix, tweak, and build upon the work non-commercially, as long as appropriate credit is given and the new creations are licensed under the identical terms.