Understanding And Approaches Of Dentists Toward Treating Patients Who Are On Antithrombotic Medications: A Cross-Sectional Survey.

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Abstract:

Background: The management of patients on oral antithrombotic medications (OAMs) poses challenges for dentists due to the risk of bleeding during dental procedures. Understanding dentists' knowledge, attitudes, and practices is crucial for optimizing patient care. This study aims to evaluate dentists' familiarity with antithrombotic medications, their approach to managing such patients, and the need for additional training in this area.

Methods: A cross-sectional survey was conducted using a structured questionnaire, collecting responses from dental professionals at various levels of training. The questionnaire included items on knowledge of OAMs, treatment approaches, preferred laboratory tests, and management of complications. Data were statistically analyzed using frequency distributions and chi-square tests.

Results: Most respondents were familiar with traditional OAMs such as warfarin and aspirin but had limited knowledge of newer agents. The majority consulted a physician before performing invasive dental procedures on patients taking OAMs. Dentists commonly used local hemostatic methods, such as pressure application and sutures, to control postoperative bleeding. Statistically significant differences were found between dentists' years of experience and their approach to discontinuing ASA before extractions (p = 0.001). Confidence levels varied, with many respondents expressing the need for further education.

Conclusion: The findings highlight a knowledge gap in the management of patients on antithrombotic medications. Continued education and the development of standardized guidelines are necessary to improve confidence and ensure safe dental care for these patients.

Keywords: Antithrombotic Medications, Oral Anticoagulants, Dental Management, Dentist Patient Safety, Cross-Sectional Survey.

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I. Introduction

Oral antithrombotic medications (OAMs) are widely used for preventing thromboembolic events in patients with conditions such as atrial fibrillation and deep vein thrombosis. While these medications reduce the risk of clot formation, they also increase the risk of excessive bleeding during surgical and dental procedures. Managing dental patients on OAMs requires a careful balance between minimizing bleeding risks and avoiding the unnecessary discontinuation of medication, which could lead to serious complications. However, studies have shown that dentists may have varying levels of awareness and confidence in treating such patients. OAMs fall into two main categories:1. Antiplatelet Agents:Aspirin (Acetylsalicylic Acid - ASA): Inhibits

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thromboxane A2, reducing platelet aggregation. Clopidogrel, Ticagrelor: Block the P2Y12 receptor, preventing platelet activation. 2. Anticoagulants: Vitamin K Antagonists (Warfarin): Inhibits clotting factors II, VII, IX, and X.Direct Oral Anticoagulants (DOACs): Apixaban, Rivaroxaban, and Dabigatran act on thrombin or factor Xa. Each of these medications poses unique challenges in dental management, requiring proper knowledge of their pharmacology and clinical implications.

The approach to managing OAM patients varies depending on the procedure type: Low-Risk Procedures (Scaling, Simple Extractions): Continue OAM therapy, use local hemostatic measures. Moderate-Risk Procedures (Multiple Extractions, Minor Surgery): Monitor INR (for warfarin users), consider tranexamic acid mouthwash. High-Risk Procedures (Major Oral Surgeries, Implants in Anticoagulated Patients): Require close coordination with the prescribing physician. Studies suggest that most dental procedures can be safely performed without discontinuing OAMs when appropriate hemostatic measures are used. Proper management of dental patients on oral antithrombotic medications is critical to ensuring patient safety while minimizing complications. Dentists should be familiar with the pharmacology of these medications, the risk profiles of dental procedures, and the available hemostatic strategies. Enhanced education, updated clinical guidelines, and interdisciplinary collaboration with physicians are essential to bridge existing knowledge gaps. Through these measures, dental professionals can deliver safe and effective care to patients on antithrombotic therapy without compromising their overall health. This study aims to assess the knowledge, attitudes, and clinical practices of dentists regarding patients on antithrombotic therapy. The findings will help identify gaps in education and areas where additional training or updated clinical guidelines may be needed.

II. Materials And Method:

Study Design: This was a cross-sectional questionnaire-based study conducted among dental professionals. The survey assessed participants' knowledge of OAMs, their approach to patient management, and their confidence in handling dental procedures for these patients.

Participants: Dentists from various backgrounds, including general practitioners, specialists, and postgraduate trainees, were invited to participate. Inclusion criteria were active clinical practice and willingness to complete the survey.

Questionnaire Design: Preferences regarding medication discontinuation The questionnaire included multiple-choice and open-ended questions covering: Familiarity with common antithrombotic medications. Routine questioning of patients about OAM use. Training and education on managing such patients before treatment. Need for physician consultation before procedures. Choice of blood tests for monitoring anticoagulant therapy. Preferred antibiotics and analgesics. Management strategies for postoperative bleeding. To ensure reliability and validity, the questionnaire underwent a rigorous validation process: The questionnaire was reviewed by a panel of dental and medical experts specializing in oral surgery, pharmacology, and anticoagulant therapy. Feedback was incorporated to improve the clarity, relevance, and comprehensiveness of the questions. A small pilot study was conducted with a sample of practicing dentists to evaluate the questionnaire's usability and effectiveness. Adjustments were made based on feedback regarding question wording, answer options, and survey length. Each question was mapped to specific objectives to ensure alignment with the study's goals of assessing knowledge, attitudes, and clinical practices. A test-retest method was used with a subset of participants to assess the questionnaire's consistency over time. After data collection, statistical analyses (e.g., Cronbach's alpha) was performed to measure the internal consistency of related questions and ensure the reliability of the questionnaire which denoted 0.89 with good agreement.

Data Collection and Statistical Analysis:

The data collection for this study was conducted using an online platform to ensure accessibility and ease of participation. The platform allowed dentists to complete the questionnaire at their convenience, reducing potential barriers such as geographic location or time constraints.

A total of 125 dentists participated in the study, providing valuable insights into their knowledge, attitudes, and clinical practices regarding the management of patients on oral antithrombotic medications. Participants were recruited using professional dental associations, social media platforms, and email invitations sent to registered dental practitioners. Efforts were made to ensure a diverse group of respondents by reaching out to general dentists, specialists in oral surgery, and periodontists practicing in different clinical settings, such as private clinics, hospitals, and academicinstitutions. Responses were collected over a one-month period, during which participants accessed the questionnaire via a secure link. The online platform allowed for automated tracking of responses, ensuring data integrity and minimizing the risk of errors during data entry. To maximize participation, reminders were sent at regular intervals to those who had received the invitation but had not yet completed the questionnaire. Using SPSS Software version 23.0 IBM USA the analsysis was performed through

inferential statistics test Chi square to check for the association between the factors with p value kept as less than or equal to 0.05 as statistically significant difference.

III. Results

Demographics: A total of 125 dentists participated in the study. The distribution of respondents was as follows:37.6% were postgraduate (PG) students.

35.2% were CRRI (Compulsory Rotatory Residential Internship) students.27.2% were faculty members.

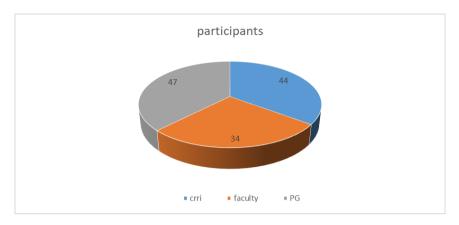


Table 1 Represents The Descriptive Statistics Based On The Questions Responded By The Study Population

QUESTIONS	OPTIONS	FREQUENCY	PERCENTAGE
QUESTIONS	CRRI	44	35.2
	Faculty	34	27.2
	PG	47	37.6
FAMILIAR ANTITHROMBOTIC	Acetyl salicylic Acid	21	16.8
MEDICATION	Apixaban Apixaban	12	10.4
MEDICATION	ASA	12	0.8
		31	24.8
	Clopidogrel	12	
	Enoxaparin		9.6
	Heparin	12	9.6
	Rivaroxaban	12	9.6
	Warfarin	23	18.4
HAVE YOU ASK PATIENT ROUTINELY ABOUT ANTITHROMBOTIC MEDICATION	No, I do not routinely ask about medications	14	11.2
	Occasionally, depending on the patient's history	48	38.4
	Only if the patient is undergoing a surgical procedure	12	9.6
	Only if the patient reports a medical condition	21	16.8
	Yes, always	30	24
HAVE YOU RECEIVED ANY SPECIAL TRAINING FOR MANAGING THESE	No, and I feel that I don't need additional training	14	11.2
PATIENTS PATIENTS	No, but I plan to seek training in the future	18	14.4
	No, I rely on my experience and knowledge gained from practice	14	11.2
	Yes, I have attended continuing education courses on this topic	45	36.
	Yes, I received formal training during my dental education	34	27.2
DENTAL TREATMENT PREFER TO STOP	Endodontic treatment	11	8.8
ANTITHROMBOTIC MEDICATIONS	Extractions (less than 3)	18	14.4
	Impacted tooth extractions	24	19.2
	Implant surgery	15	12
	Multiple extractions	40	32
	Subgingival curettage	17	13
	Acetyl Salicylic Acid	27	21.6

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	ASA	1	0.8
WHICH ANTITHROMBOTIC MEDICATION REQUIRE PHYSICIAN OPINION	Clopidogrel	46	36.8
	Enoxaparin	20	16
	Heparin	12	9.6
	Warfarin	19	15.2

Descriptive Statistics: Interpretation of Table 1

Table 1 presents a comprehensive analysis of responses from a study population regarding knowledge of antithrombotic medication

- 1. Familiarity with Antithrombotic Medications: Clopidogrel (24.8%) and Warfarin (18.4%) are the most recognized antithrombotic medications among respondents. Other commonly recognized medications include Acetyl Salicylic Acid (ASA) (16.8%) and Apixaban (10.4%). Enoxaparin, Heparin, and Rivaroxaban were familiar to a smaller portion of participants, with each drug being recognized by 9.6% to 12% of respondents.
- 2. Routine Inquiry About Antithrombotic Medications: The majority of participants (38.4%) occasionally ask patients about their antithrombotic medications, depending on the patient's history. 24% of dental professionals always ask patients about their medications, while 16.8% only inquire if the patient reports a medical condition. 11.2% of respondents do not routinely ask about medications, and 9.6% ask only when the patient is undergoing a surgical procedure.
- 3. Special Training in Managing Patients on Antithrombotic Medications:36% of respondents have attended continuing education courses on managing patients on antithrombotic medications.27.2% received formal training during their dental education, while 11.2% rely on their experience and practice without additional formal training.14.4% of dental professionals plan to seek training in the future, while another 11.2% feel they don't need additional training.
- 4. Dental Treatments and Stopping Antithrombotic Medications: Multiple extractions (32%) was the most common dental procedure where respondents prefer stopping antithrombotic medications. Other procedures include impacted tooth extractions (19.2%) and subgingival curettage (13%). Endodontic treatments (8.8%) and implant surgery (12%) were the least likely to prompt discontinuation of antithrombotic medications.
- 5. Medications Requiring Physician Opinion: Clopidogrel (36.8%) was the most frequently cited medication for which dental professionals believe a physician's opinion is necessary. Acetyl Salicylic Acid (ASA) (21.6%) also requires physician consultation, as well as Enoxaparin (16%). Warfarin (15.2%) and Heparin (9.6%) were also mentioned as medications that require physician input.

Table 2 Reprsents The Descriptive Statistics Based On The Questions Responded By The Study Population

QUESTIONS	OPTIONS	FREQUENCY	PERCENTAGE
WHICH BLOOD TEST	Bleeding and clotting time	40	32
REQUIRE ON PATIENT	Complete blood count	27	21.6
TAKING WARFARN	International Normalized Ratio	47	37.6
	None	11	8.8
CHOICE OF ANTIBIOTICS	Azithromycin	18	14.4
FOR PATIENT ON	Cephalosporin	41	32.8
WARFARIN	Clindamycin	27	21.6
	Metronidazole	21	16.8
	None of the above	6	4.8
	Penicillin	12	9.6
CHOICE OF ANALGESICS	NSAIDs	51	40.8
FOR PATIENT ON	Other	26	20.8
WARFARIN	Paracetamol	48	38.4
METHOD USED TO STOP	Application of a local	27	21.6
POSTOPERATIVE	Cauterization	18	14.4
HEMORRAGE ON HEEPARIN	Gelatine sponge	20	16
TAKING PATIENTS	Laser application	8	6.4
	Pressure	8	6.4
	Referral to other	8	6.4
	clinicians/hospitals		
	Suture	13	10.4
	Tranexamic acid	23	18.4
FIRST STEP ON EXCESSIVE	Administer clotting agents	34	2702
BLEEDING DURING	Apply pressure and monitor the	41	32.8
PROCEDURE FOR PATIENT	situation		
TAKING ANTITHROMBOTIC	Continue the procedure and	22	17.6
MEDICATIONS	address the bleeding afterward		
	Immediately contact the patient's	22	17.6
	prescribing physician		

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	Refer the patient to the	6	4.8
	emergency room		
CONFIDENT ON MANAGING	Continue the procedure and	27	21.6
PATIENT WITH ANTI	address the bleeding afterward		
THROMBOTIC	Immediately contact the patient's	35	28
MEDICATIONS	prescribing physician		
	Not confident at all	11	8.8
	Refer the patient to the	14	11.2
	emergency room		
	Slightly confident	38	30.4

Descriptive Statistics: Table 2 presents a comprehensive analysis of responses from a study population regarding attitude of antithrombotic medication

- 1. Blood Tests for Patients on Warfarin: International Normalized Ratio (INR) was the most frequently recommended blood test for patients on warfarin (37.6%).Bleeding and clotting time was also commonly cited by 32% of respondents, followed by a Complete Blood Count (CBC) (21.6%).A small number of participants (8.8%) believed no blood tests were necessary for warfarin patients.
- 2. Choice of Antibiotics for Patients on Warfarin: Cephalosporin was the most popular antibiotic choice for patients on warfarin (32.8%), likely due to its broad spectrum and relatively safe use in anticoagulated patients. Clindamycin (21.6%) and Azithromycin (14.4%) were also commonly chosen. Metronidazole was selected by 16.8% of participants, while a minority (9.6%) preferred Penicillin. Only 4.8% of respondents indicated that none of the listed antibiotics were suitable.
- 3. Choice of Analgesics for Patients on Warfarin: NSAIDs were the most frequently selected analgesics (40.8%), despite the potential bleeding risk they pose for patients on warfarin. Paracetamol was the second most chosen analgesic, with 38.4% of respondents selecting it due to its safer profile in anticoagulated patients. Other analgesics were chosen by 20.8% of participants.
- 4. Methods Used to Stop Postoperative Hemorrhage in Heparin-Taking Patients: The most commonly recommended method to control postoperative hemorrhage in patients on heparin was the application of a local agent (21.6%). Other popular methods included Tranexamic acid (18.4%) and the use of a gelatine sponge (16%). Cauterization (14.4%), suturing (10.4%), and pressure application (6.4%) were also considered effective, while laser application and referral to other clinicians were less commonly mentioned (6.4%).
- 5. First Step in Managing Excessive Bleeding During Procedures for Antithrombotic Patients: The most frequent first step in managing excessive bleeding during procedures was to apply pressure and monitor the situation (32.8%). A significant portion of respondents (17.6%) would continue the procedure and address the bleeding afterward, indicating a more proactive approach. Administering clotting agents was selected by 34% of respondents as an initial response, suggesting a preference for quick intervention. Contacting the patient's prescribing physician was the preferred action for 17.6%, while 4.8% would refer the patient to the emergency room.
- 6. Confidence in Managing Patients on Antithrombotic Medications: A majority of participants (30.4%) expressed slight confidence in managing patients on antithrombotic medications. 28% felt confident enough to immediately contact the patient's prescribing physician when needed. 21.6% were confident enough to continue the procedure and address bleeding afterward. 11.2% would refer patients to the emergency room, while 8.8% were not confident at all in managing these patients.

Table 3 Reprsents The Association Between The Qualification

QUESTIONS	OPTIONS	CHI SQUARE	P VALUE
FAMILIAR	Acetyl salcilic Acid		0.583
ANTITHROMBOTIC	Apixaban	12.286	
MEDICATION	ASA		
	Clopidogrel		
	Enoxaparin		
	Heparin		
	Rivaroxaban		
	Warfarin		
HAVE YOU ASK	No, I do not routinely ask	6.036	0.812
PATIENT ROUTINELY	about medications		
ABOUT	Occasionally, depending on		
ANTITHROMBOTIC	the patient's history		
MEDICATION	Only if the patient is		
	undergoing a surgical		
	procedure		
	Only if the patient reports a		
	medical condition		
	Yes, always		

HAVE YOU RECEIVED ANY SPECIAL TRAINING FOR MANAGING THESE PATIENTS	No, and I feel that I don't need additional training No, but I plan to seek training in the future No, I rely on my experience and knowledge gained from practice	14.387	0.072
	Yes, I have attended continuing education courses on this topic		
	Yes, I received formal training during my dental education		
DENTAL TREATMENT	Endodontic treatment	11.000	0.351
PREFER TO STOP	Extractions (less than 3)	11.088	
ANTITHROMBOTIC	Impacted tooth extractions		
MEDICATIONS	Implant surgery		
	Multiple extractions		
	Subgingival curettage		
WHICH	Acetyl Salicylic Acid		0.467
ANTITHROMBOTIC	ASA	9.704	
MEDICATION REQUIRE	Clopidogrel		
PHYSICIAN OPINION	Enoxaparin		
	Heparin		
	Warfarin		

^{*}P value less than or equal to 0.05 is considered statistically significant difference

Table 3 highlights the associations between various survey questions related to knowledge of antithrombotic medication and their corresponding responses, with chi-square and significance values provided to indicate statistical relationships.

- 1. Familiarity with Antithrombotic Medications: The p-value is greater than 0.05, indicating no statistically significant difference in responses regarding familiarity with various antithrombotic medications. This suggests that respondents' familiarity with medications such as Acetyl Salicylic Acid, Apixaban, and Warfarin does not vary significantly.
- 2. Routine Inquiry about Antithrombotic Medication: The p-value of 0.812 is greater than 0.05, showing no statistically significant difference in responses to whether participants routinely ask patients about their antithrombotic medications. This indicates varied practices regarding when and how often dental professionals inquire about antithrombotic medication use.
- 3. Special Training for Managing Antithrombotic Patients: The p-value of 0.072 is greater than 0.05, suggesting no statistically significant difference in the responses about having received special training for managing patients on antithrombotic medications. While some respondents may feel confident with their current knowledge, others indicate interest in seeking future training.
- 4. Dental Treatment Preferences for Stopping Antithrombotic Medications: The p-value of 0.351 is greater than 0.05, which indicates no statistically significant difference in preferences for stopping antithrombotic medications before various dental procedures (e.g., endodontic treatment, extractions, and implant surgery). This suggests a general lack of consensus among respondents regarding when to stop medications.
- 5. Antithrombotic Medications Requiring Physician Opinion: The p-value of 0.467 is greater than 0.05, indicating no statistically significant difference in responses regarding which antithrombotic medications require consultation with a physician. The responses indicate a general awareness of when to consult with physicians, but no strong consensus across different medications.

Table 4 Reprsents The Association Between The Qualification

QUESTIONS	OPTIONS	CHI SQUARE	P VALUE
WHICH BLOOD TEST	Bleeding and clotting time	3.712	0.716
REQUIRE ON PATIENT	Complete blood count		
TAKING WARFARN	International Normalized		
	Ratio		
	None		
CHOICE OF	Azithromycin	12.139	0.276
ANTIBIOTICS FOR	Cephalosporin		
PATIENT ON WARFARIN	Clindamycin		
	Metronidazole		
	None of the above		
	Penicillin		
	NSAIDs	3.247	0.517
	Other		

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	Paracetamol		
CHOICE OF	Paracetamoi		
ANALGESICS FOR			
PATIENT ON WARFARIN		10.110	0.550
METHOD USED TO STOP	Application of a local	10.118	0.753
POSTOPERATIVE	Cauterization		
HEMORRAGE ON	Gelatine sponge		
HEEPARIN TAKING	Laser application		
PATIENTS	Pressure		
	Referral to other		
	clinicians/hospitals		
	Suture		
	Tranexamic acid		
FIRST STEP ON	Administer clotting agents	2.722	0.951
EXCESSIVE BLEEDING	Apply pressure and monitor		
DURING PROCEDURE	the situation		
FOR PATIENT TAKING	Continue the procedure and		
ANTITHROMBOTIC	address the bleeding		
MEDICATIONS	afterward		
	Immediately contact the		
	patient's prescribing		
	physician		
	Refer the patient to the		
	emergency room		
CONFIDENT ON	Continue the procedure and	4.139	0.941
MANAGING PATIENT	address the bleeding	4.139	0.541
WITH ANTI	address the bleeding afterward		
THROMBOTIC			
MEDICATIONS	Immediately contact the		
WIEDICATIONS	patient's prescribing		
	physician		
	Not confident at all		
	Refer the patient to the		
	emergency room		
	Slightly confident	idamad statistically signific	

*P value less than or equal to 0.05 is considered statistically significant difference

Table 4 highlights the associations between various survey questions related to attitude of antithrombotic medication and their corresponding responses, with chi-square and significance values provided to indicate statistical relationship

- 1. Blood Tests for Patients on Warfarin: The p-value of 0.716 is greater than 0.05, indicating no statistically significant difference in responses about which blood tests should be conducted for patients on warfarin. This suggests that there is no strong consensus on which test, such as bleeding and clotting time, International Normalized Ratio (INR), or complete blood count, is most necessary for these patients.
- 2. Choice of Antibiotics for Patients on Warfarin: The p-value of 0.276 is greater than 0.05, showing no statistically significant difference in the choice of antibiotics for patients on warfarin. This implies that there is variability in respondents' preferences for antibiotics such as Azithromycin, Cephalosporin, and Penicillin when managing patients on warfarin.
- 3. Choice of Analgesics for Patients on Warfarin: The p-value of 0.517 is greater than 0.05, indicating no statistically significant difference in the choice of analgesics for patients on warfarin. Respondents have different preferences regarding NSAIDs, paracetamol, or other alternatives, with no clear consensus.
- 4. Methods to Stop Postoperative Hemorrhage in Heparin-Taking Patients: The p-value of 0.753 is greater than 0.05, suggesting no statistically significant difference in the methods for stopping postoperative hemorrhage in patients taking heparin. Various methods, including application of local agents, cauterization, and use of tranexamic acid, are reported, but there is no strong agreement on the best approach.
- 5. First Step in Managing Excessive Bleeding During Procedure for Patients on Antithrombotic Medications: The p-value of 0.951 is greater than 0.05, indicating no statistically significant difference in responses regarding the first step in managing excessive bleeding during procedures for patients on antithrombotic medications. The varied responses reflect different approaches, such as applying pressure or administering clotting agents, but none appear to be universally preferred.
- 6. Confidence in Managing Patients on Antithrombotic Medications: The p-value of 0.941 is greater than 0.05, meaning no statistically significant difference in the level of confidence in managing patients on antithrombotic medications. Respondents show varying levels of confidence, ranging from not confident at all to slightly confident, with no significant variation between groups.

IV. Discussion

This study underscores the variability in knowledge, attitudes, and clinical practices among dentists managing patients on oral antithrombotic medications (OAMs). The findings reveal key trends, gaps, and areas requiring further education and support to align dental practitioners' practices with current clinical guidelines.

Knowledge Gaps and Familiarity with OAMs

A significant observation is the disparity in familiarity between traditional antithrombotic agents, such as warfarin and aspirin, and newer direct oral anticoagulants (DOACs), such as apixaban, rivaroxaban, and dabigatran. While warfarin and aspirin are well-known, consistent with their long-standing use in clinical practice, the reduced familiarity with DOACs reflects findings from previous research, such as the study by Elad et al. (2016), which noted limited awareness of DOACs among dental professionals. This gap may stem from the rapid adoption of DOACs in medical practice over the last decade, outpacing updates in dental curricula and continuing education programs.

Physician Consultation and Decision-Making

The high percentage of dentists consulting with physicians before performing extractions highlights a lack of confidence in independently managing patients on OAMs. This hesitancy, while reflecting an appropriately cautious approach, also underscores uncertainty about current guidelines. Studies, such as those by Jeske et al. (2012), emphasize that in most cases, dental procedures can be performed safely without discontinuing OAMs, provided appropriate hemostatic measures are employed.

The statistically significant relationship (p = 0.001) between years of experience and the decision to discontinue aspirin (ASA) before extractions suggests that experienced practitioners are more confident adhering to guidelines that recommend the continuation of low-dose ASA for minor procedures. This finding aligns with studies by Wahl (2014), which found that procedural bleeding risks are often overestimated by less experienced practitioners, leading to unnecessary discontinuation of antiplatelet therapy.

Monitoring and Postoperative Bleeding Management

The preference for INR testing among dentists treating warfarin patients aligns with standard clinical protocols for assessing anticoagulation levels. However, the request for outdated or unnecessary tests, such as bleeding time and clotting time, by some respondents reflects a gap in understanding the appropriate monitoring strategies. This finding mirrors conclusions from a review by Perry et al. (2015), which highlighted misconceptions about coagulation tests in dental care.

Postoperative bleeding management is another critical area of concern. While most dentists relied on local hemostatic measures such as suturing, pressure application, and tranexamic acid mouthwash, a worrying number preferred to refer patients with bleeding complications to emergency departments rather than attempting chairside management. This approach may indicate a lack of training or confidence in handling such situations, further emphasizing the need for skill enhancement programs.

Confidence and Training Needs

The variation in confidence levels among dentists treating OAM patients highlights an overarching need for updated educational initiatives. Many respondents expressed hesitancy in managing such patients, reflecting findings from previous studies, such as van Diermen et al. (2013), which reported that dental practitioners often feel inadequately prepared to treat anticoagulated patients due to insufficient training during undergraduate and postgraduate education.

Strengths of the Study:

Comprehensive Scope: The study addressed various aspects of OAM management, including knowledge, clinical practices, decision-making, and postoperative care, providing a well-rounded understanding of current practices.

Diverse Participant Sample: By including dentists with varying levels of experience and practice settings, the study captured a broad range of perspectives.

Quantitative Analysis: The use of statistical tools such as chi-square tests provided robust insights into relationships between variables, adding depth to the findings.

Timely Focus: The study addresses an emerging clinical issue, given the increasing use of DOACs in the general population.

Limitations of the Study: Self-Reported Data: The reliance on self-reported responses may introduce bias, as participants may overstate their knowledge or adherence to guidelines. **Limited Sample Size**: The sample of 125 dentists, while meaningful, may not be fully representative of the broader dental community. **Geographic**

Constraints: If the participants were drawn from a specific region, the findings may not be generalizable to other areas with different healthcare systems and training frameworks.

V. Conclusion

The study highlights notable gaps in knowledge and confidence among dentists in managing patients on antithrombotic medications. While there is strong awareness of traditional agents such as aspirin and warfarin, there is limited understanding of newer oral anticoagulants like apixaban and rivaroxaban. Significant variation in clinical decision-making, especially regarding the discontinuation of aspirin before procedures, underscores the need for standardized guidelines and continuous education. Enhancing training on antithrombotic management is crucial to ensure that dentists can provide safe and effective care while minimizing both bleeding risks and the potential complications of inappropriate medication discontinuation.

Conflicts of Interest: NILL

Funding: Nill

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