RESEARCH ARTICLE

Tobacco Cessation Scenarios Among Healthcare Profession Students: A Multidisciplinary Study

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Abstract

Background: It is acknowledged that the most effective means to contain the tobacco epidemic is to involve healthcare providers across various disciplines. The present study was undertaken to gain a comprehensive insight into various factors that determine the efficacy of multidisciplinary approaches in tobacco control. **Methods:** A cross sectional study design using a structured, pretested and self-administered questionnaire was employed in the present study, conducted among medical and dental interns and final year nursing students. Respondent demographics, knowledge, attitude, behaviour, perceived effectiveness and barriers, and willingness to participate in tobacco cessation were assessed. **Results:** A total of 268 subjects participated, with mean knowledge, attitude, behaviour, perceived effectiveness and barrier scores of 69. 7%, 89.0%, 72.0%, 80.6% and 88.6% respectively. There were significant differences among the mean scores of the study domains across the 3 disciplines. The majority (92.91%) of the respondents were willing to participate in tobacco cessation activities, but only 14.2% had previously received relevant training. Regression analysis revealed that the significant predictors of behaviour scores were gender, course, attitude and perceived effectiveness; those for willingness to undertake tobacco cessation activities were course, attitude, behaviour and perceived barriers. **Conclusions:** The study highlighted the willingness but low previous training among the participants and also identified factors that determine t behaviour and willingness to undertake tobacco cessation activities. The study emphasizes the need for modification in the policies pertaining to curricula of medical, dental and nursing training programs.

Keywords: Smoking and tobacco use- training health professionals- workforce development

Introduction

The detrimental effects of tobacco are not only witnessed by various organ systems of the human body but also by the environment (Eriksen et al., 2015). Tobacco usage is associated with high morbidity, mortality and economic burden [World Health Organization (WHO), 2011]. It is reported that tobacco kills one individual every 6 seconds (WHO, 2008). Tobacco usage lead to the death of 100 million people across the globe in the 20th century and another billion people might lose their life in the 21st century if the current trend continues (Eriksen et al., 2015). The link between tobacco usage and poverty is well established (WHO Tobacco Free Initiative, 2004; WHO, 2008). Despite various measures, tobacco consumption is on the rise especially in middle and low socioeconomic countries (Eriksen et al., 2015). The effects of tobacco are more destructive in these countries owing to their large population, lack of resources and awareness, healthcare costs, lack of stringent tobacco related policies (WHO, 2008). Furthermore, manpower shortage is one of the major reasons for inability to contain the situation

effectively in these countries.

According to World Health Organisation report the only way to contain tobacco menace is to implement a comprehensive, uninterrupted, viable and adequately funded tobacco control strategies which focus on preventing uptake of tobacco habit; promotes cessation among users; prevention of passive smoking; and, regulation of tobacco products (WHO, 2005). It is noted that health care professionals play an important role in tobacco cessation of their patients (Bal et al., 1995; Saddichha et al., 2010; Gorin and Heck, 2004) by various methods ranging from brief advice and counselling to pharmacological interventions (Fiore et al., 2008).

WHO also recommended involvement of various streams of health professionals belonging to medical, dental, nursing, psychology, psychiatry, pharmacy and other health related professionals in order to combat tobacco epidemic (WHO, 2005). The team of multidisciplinary healthcare providers have an advantage that they interact with tobacco users at various levels of their treatment. The chances of quitting tobacco are higher when a person is persistently reinforced about tobacco

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hazards from all the healthcare providers' frequently (WHO, 2005). However, several studies have also reported lack of time as one of the major hindrance for tobacco cessation counselling among healthcare providers (Vogt et al., 2005; Panaitescu et al., 2014; Li et al., 2014).

Considering the magnitude of the current tobacco usage scenario there is a need to rope in the untapped potential of healthcare professional students who closely interact with patients during their training program. Healthcare professional students in the final years of training program are at advantage as they are in concluding years of their training program and have gained the necessary skills to manage patients. Hence they might play significant role in facilitating tobacco cessation among its users. Earlier research works by various authors such as Springer et al., (2008), Patelarou et al., (2011), Rajasundaram et al., (2011), Binnal et al., (2012) and Grassi et al., (2012) highlighted the importance of integrating healthcare professional students in tobacco cessation activities.

Although WHO recognised the importance of multidisciplinary approach towards tobacco control (WHO, 2005), the current literature lacks data pertaining to the comprehensive assessment of various factors determining the usefulness of multidisciplinary approach towards tobacco cessation. As a part of global tobacco surveillance system, US Centers for Disease Control and Prevention and Canadian Public Health Association initiated Global Health Professions Student Survey (GHPSS) to collect information about the tobacco usage among medical, dental, nursing and pharmacy students; and tobacco cessation related counselling practices among their patients (GTSS Collaborative Group, 2006). Since the studies conducted earlier had focused only on one or fewer factors, there is a definite need for studies focusing on comprehensive evaluation of factors influencing the multidisciplinary approach towards tobacco control. Hence, the present study was undertaken to gain comprehensive insight into the various factors that facilitate or hinder such an approach. The study results might help streamline the educational curriculum across all the health professions for better control of tobacco. Once identified the facilitators of tobacco cessation can be further improvised and implemented whereas barriers can be eradicated to control the tobacco epidemic.

Materials and Methods

The present study was conducted among the health care professional students who were in the last year of their professional training program in Mangalore city, Karnataka, India. The medical and dental interns and final year nursing students belonging to Kasturba Medical College, Mangalore; Manipal College of Dental Sciences (MCODS), Mangalore; and, Manipal College of Nursing, Mangalore respectively were included in the study. Clearance from the Institution Ethics Committee, MCODS, Mangalore and permission from the respective heads of the aforementioned Institutions were taken prior to conduction of the study. Informed consent was also obtained from the study subjects. A structured, pretested, self-administered questionnaire employed to assess various aspects of tobacco cessation among participants was developed by theory, research, observation and expert opinion (Binnal et al., 2012; Streiner et al., 2014).

The questionnaire comprised of 86 items divided into 5 major domains of knowledge, attitude, behaviour, perceived effectiveness and perceived barriers. Apart from these questions, participants were queried about their worksite related practices, willingness to undertake tobacco cessation activities, earlier training in tobacco cessation, methods used to facilitate tobacco cessation among patients, and their awareness pertaining to tobacco control policies [WHO Framework Convention on Tobacco Control (FCTC) and Cigarettes and Other Tobacco Products prohibition Act (COTPA)].

The knowledge domain focussed on effects of tobacco on oral and general health, second-hand smoking, addiction to nicotine, and tobacco cessation strategies. Attitude domain evaluated the study subjects perspective towards health professionals serving as role models; necessity of participating in tobacco cessation activities and training; importance of inquiring about tobacco related practices of patients and advising them to quit; increasing the price of tobacco products; forbidding advertisement of tobacco products, selling of tobacco products to children and adolescents, smoking in public places, hospitals, etc. Behaviour domain related questions enquired about whether the study participants ask patients about their tobacco habits; explain the impact of tobacco on general and oral health; advise patients to quit tobacco and not to smoke in public places and around children; assist and follow up the patients to help them quit tobacco. Perception of study subjects towards self-efficacy in undertaking tobacco cessation activities; recognising nicotine addiction and withdrawal symptoms; identifying precancers, cancers and other tobacco related diseases among their patients was analysed using perceived effectiveness domain. Perceived barrier domain reviewed study members perception towards various issues that might hinder tobacco cessation among patients.

Depending upon the appropriateness of the participants responses to the questionnaire, each question of the knowledge domain was scored as 0 or 1 based on its accuracy, whereas 5 point Likert scale for attitude and perceived effectiveness domain and 3 point Likert scale for behaviour and perceived barrier domain was used. Hence, the range of scores for various domains were: knowledge, 0-24; attitude, 1-80; behaviour, 1-42; perceived effectiveness, 1-25; and, perceived barrier, 1-39. Demographic information including age, gender, and place of residence was also collected from the participants.

The collected information collected was entered into the computer and analysis was performed using Statistical Package for Social Sciences (SPSS), version 16.0 (SPSS Inc, Chicago IL). Correlation analysis was used to assess the association of study domains among themselves and with respect to demographics. Regression analysis was employed to identify the factors that determine the behaviour of the study subjects towards tobacco cessation and their willingness to undertake tobacco cessation activities among their patients.

Results

A total of 268 subjects in the final year of their professional courses comprising of 116 (43.28%) medical interns, 100 (37.31%) dental interns and 52 (19.41%) final year nursing students participated in the study. Majority of the participants were females (n=136, 50.75%), aged ≥23 years (n=163, 60.82%) and residing at institutional hostel premises (n=163, 60.82%).

The Crohnbach's alpha and split half reliability values for the questionnaire employed in the present study for knowledge domain were 0.67 and 0.67; for attitude domain were 0.89 and 0.83; for behaviour domain were 0.85 and 0.86; for perceived effectiveness domain were 0.83 and 0.59; and for perceived barriers domain were 0.76 and 0.67 respectively (Binnal et al., 2012).

The mean knowledge, attitude, behaviour, perceived effectiveness and barrier scores among the study subjects were 69.67%, 89.03%, 72%, 80.64% and 88.62% respectively Table 1. Results of ANOVA indicated that there were statistically significant differences in knowledge, attitude and behavior scores between medical, dental and nursing participants. Posthoc analysis revealed that there were statistically significant differences in knowledge scores between medical and dental students; and dental and nursing students. It can also be observed that there were statistically significant differences in attitude scores between medical and dental students; and medical and nursing students. Results also showed that there were statistically significant differences in behavior

Table 1. Mean Knowledge, Attitude, Behavior, Perceived Effectiveness and Perceived Barrier Scores Among Study Subjects

Course	Knowledge			Attitude			Behavior			Perceived effectiveness			Perceived barriers		
	Mean	SD	%	Mean	SD	%	Mean	SD	%	Mean	SD	%	Mean	SD	%
Medical	16.43	2.598	68.46	69.28	7.691	86.6	31.75	5.42	75.595	20.37	2.796	81.48	34.47	4.756	88.39
Dental	17.56	2.528	73.17	72.12	6.594	90.15	28.73	5.17	68.41	19.83	2.854	79.32	35.03	3.794	89.82
Nursing	15.75	3.080	65.63	73.83	6.770	92.29	29.75	6.26	70.83	20.31	3.686	81.24	33.87	4.827	86.85
Total	16.72	2.752	69.67	71.22	7.323	89.03	30.24	5.65	72	20.16	3.008	80.64	34.56	4.439	88.62

Table 2. Inter-Group Analysis of Knowledge, Attitude, Behavior and Perceived Effectiveness and Barrier Scores Pertaining to Tobacco Cessation Among the Participants

Variable	Different streams	ANOVA	Medical	Dental	Nursing
Knowledge	Medical	p<0.001	-		
	Dental		1.12897*	-	
	Nursing		-.68103	-1.81000*	-
Attitude	Medical	p<0.001	-		
	Dental		2.84414*	-	
	Nursing		4.55106*	1.70692	-
Behavior	Medical	p<0.001	-		
	Dental		-3.02*	-	
	Nursing		-2.00	1.02	-
Perceived effectiveness	Medical	p=0.389	-		
	Dental		-0.54069	-	
	Nursing		-0.063	0.47769	-
Perceived barriers	Medical	p=0.267	-		
	Dental		0.55586	-	
	Nursing		-0.60875	-1.16462	-

*, significant at 5% level of significance

Table 3. Correlation Analysis of Knowledge, Attitude, Behavior, Perceived Effectiveness and Barriers, and Demographics Among Study Subjects

	Knowledge		Attitude		Behavior		Perceived effectiveness		Perceived barriers	
	r	p-value	r	p-value	r	p-value	r	p-value	r	p-value
Age	0.118	0.053*	-0.185	0.002**	-0.089	0.147	-0.102	0.095	-0.096	0.117
Gender	0.112	0.068	0.239	<0.001***	-0.198	0.001***	-0.036	0.562	-0.038	0.534
Residence	-0.03	0.62	0.244	<0.001***	-0.176	0.004**	-0.028	0.649	-0.29	0.637
Knowledge	-	-								
Attitude	0.356	<0.001***	-	-						
Behavior	0.029	0.639	0.111	0.069	-	-				
Perceived effectiveness	0.27	<0.001***	0.217	<0.001***	0.255	<0.001***	-	-		
Perceived barriers	0.165	0.007**	0.192	0.002**	0.181	0.003**	0.185	0.002**	-	-

*, significant at 5% level of significance; **, significant at 1% level of significance; ***, significant at 0.1% level of significance

Table 4. Regression Analysis to Identify the Determinants of Behavior and Willingness to Undertake Tobacco Cessation Activities Among the Study Subjects

Dependent variables	Independent variables	β/OR	p-value	95% CI	
				Lower bound	Upper bound
Behavior	Age	-0.112	0.079	-0.819	0.045
	Sex	-0.183	0.006**	-3.538	-0.596
	Course	-0.157	0.016*	-2.132	-0.219
	Address	0.029	0.637	-1.054	1.719
	Knowledge	-0.062	0.34	-0.392	0.136
	Attitude	0.129	0.052*	-0.001	0.200
	Perceived effectiveness	0.202	0.001**	0.153	0.606
	Perceived barriers	0.112	0.063	-0.008	0.294
Willingness to undertake tobacco cessation activities among their patients	Age	1.240	0.198	0.893	1.722
	Sex (Male)	0.614	0.425	0.186	2.034
	Course (Nursing)	-	0.140	-	-
	Course (Medical)	0.442	0.262	0.106	1.840
	Course (Dental)	0.157	0.048*	0.025	0.981
	Address (Hostel)	0.775	0.641	0.266	2.260
	Knowledge Score	0.993	0.942	0.827	1.193
	Attitude Score	0.926	0.030*	0.864	0.993
	Behavior Score	1.109	0.039*	1.005	1.225
	Perceived effectiveness	0.971	0.731	0.819	1.151
	Perceived barriers	0.883	0.027*	0.791	0.986
	Constant	1.879	0.899		

*, significant at 5% level of significance; **, significant at 1% level of significance

scores between medical and dental students Table 2.

Correlation analysis of study domains with respect to demographics revealed statistically significant association of knowledge with age (r= 0.118, p=0.053); attitude with age (r= -0.185, p=0.002), gender (r=0.239, p<0.001) and residence (r=0.244, p<0.001); behaviour with gender (r= -0.198, p=0.001) and residence (r= -0.176, p=0.004). Correlation analysis also showed statistically significant association of knowledge with attitude (r=0.356, p<0.001), perceived

Table 5. Workplace Related Activities Among the Study Subjects

Workplace related activities		Courses			Total (%)
		Medical	Dental	Nursing	
Type of tobacco-free policy	No policy on smoking	11	40	24	75 (27.99)
	Smoking rooms available	23	0	2	25 (9.33)
	No smoking allowed at all	82	60	26	168 (62.69)
Tobacco free policy enforced	Always	51	63	25	139 (51.87)
	Sometimes	52	28	21	101 (37.69)
	Never	7	3	1	11 (4.1)
	Unaware	6	6	5	17 (6.34)
Prohibition of selling of tobacco in working premises	Always	71	83	22	176 (65.67)
	Sometimes	20	6	18	44 (16.42)
	Never	3	3	9	15 (5.6)
	Unaware	22	8	3	33 (12.31)
Prohibition of selling of tobacco near working premises	Always	57	20	16	93 (34.7)
	Sometimes	41	28	22	91 (33.96)
	Never	14	43	14	71 (26.49)
	Unaware	4	9	0	13 (4.85)
Environment at workplace influences to smoke	More	2	11	14	27 (10.07)
	Less	114	89	38	241 (89.93)
Total		116	100	52	268

Table 6. Perceived Barriers Among the Study Subjects

Perceived barriers		Courses			Total (%)
		Medical	Dental	Nursing	
Lack of awareness of patients	No	10	7	6	23 (8.58)
	Unsure	9	4	1	14 (5.22)
	Yes	97	89	45	231 (86.19)
Patients not being interested	No	1	2	2	5 (1.87)
	Unsure	8	4	0	12 (4.48)
	Yes	107	94	50	251 (93.67)
Lack of time	No	14	14	1	29 (10.82)
	Unsure	27	18	14	59 (22.02)
	Yes	75	68	37	180 (67.16)
Patients are not compliant	No	1	2	4	7 (2.61)
	Unsure	11	13	12	36 (2.61)
	Yes	104	85	36	225 (83.96)
Inadequate finances	No	17	13	5	35 (13.06)
	Unsure	31	23	12	66 (24.63)
	Yes	68	64	35	167 (62.31)
Lack of resources	No	21	13	8	42 (15.67)
	Unsure	18	10	7	35 (13.06)
	Yes	77	77	37	191 (71.27)
Lack of awareness among dentists	No	33	34	16	83 (30.97)
	Unsure	14	14	13	41 (15.30)
	Yes	69	52	23	144 (53.73)
Lack of referral centers	No	13	5	14	32 (11.94)
	Unsure	21	15	8	44 (16.42)
	Yes	82	80	30	192 (71.64)
Lack of training	No	7	6	9	22 (8.21)
	Unsure	15	10	6	31 (11.57)
	Yes	94	84	37	215 (80.22)
Withdrawal effects	No	6	2	3	11 (4.10)
	Unsure	16	7	13	36 (13.43)
	Yes	94	91	36	221 (82.46)
Fear of detecting cancer among patients	No	17	7	10	34 (12.69)
	Unsure	26	26	11	63 (23.51)
	Yes	73	67	31	171 (63.81)
Peer pressure	No	5	3	1	9 (3.36)
	Unsure	15	9	2	26 (9.70)
	Yes	96	88	49	233 (86.94)
Social pressure	No	5	8	3	16 (5.97)
	Unsure	14	12	4	30 (11.19)
	Yes	97	80	45	222 (82.84)
Total		116	100	52	268

effectiveness (r=0.27, p<0.001) and perceived barriers (r=0.165, p=0.007); attitude with knowledge (r=0.356, p<0.001), perceived effectiveness (r=0.217, p<0.001) and perceived barriers (r=0.192, p=0.002); behaviour with perceived effectiveness (r=0.255, p<0.001) and barriers (r=0.181, p=0.003); perceived effectiveness with knowledge ((r=0.27, p<0.001), attitude (r=0.217, p<0.001), behaviour (r=0.255, p<0.001) and perceived barriers (r=0.185, p=0.002); and, perceived barriers with knowledge (r=0.165, p=0.007), attitude (r=0.192, p=0.002), behaviour (r=0.181, p=0.003) and perceived effectiveness (r=0.185, p=0.002) Table 3.

The issues related to study subject's willingness to participate, previous training and familiarity with tobacco controlling laws with respect to demographics were also enquired. Majority of the study subjects were

willing to participate in tobacco cessation activities (92.91%); had not undergone any training in tobacco cessation (85.82%); and although 63.06% were familiar with COTPA (Cigarettes and Other Tobacco Products Act), 54.1% were not familiar with WHO FCTC (World Health Organisation – Framework Convention on Tobacco Control).

Regression analysis was employed to identify the determinants of behaviour and willingness to undertake tobacco cessation activities among the study subjects. Multiple linear regression analysis indicated that gender (p=0.006, β= -0.183), course (p=0.016, β=-0.157), attitude (p=0.052, β=0.129) and perceived effectiveness (p=0.001, β=0.202) were the significant predictors of behaviour scores among the respondents. Binary logistic regression analysis revealed that course (p=0.048, OR=0.157), attitude (p=0.030, OR=0.926), behavior (p=0.039, OR=1.109) and perceived barriers (p=0.027, OR=0.883) emerged as significant predictors of willingness to undertake tobacco cessation activities among their patients Table 4.

Workplace related activities among study subjects are presented in Table 5. Majority of the study subjects reported that no smoking was allowed at all on the premises (n=168, 62.69%), whereas 9.33% (n=25) reported that smoking rooms existed while 27.99% (n=75) noted that no smoking related policy existed in the premises. Majority of the study subjects reported that tobacco free policy was always enforced in the premises (n=139, 51.87%); selling of tobacco in the working premises was always prohibited (n=176, 65.67%); and, that environment at workplace was less conducive to smoke (n=241, 89.93%). However, only 34.7% (n=93) subjects reported that selling of tobacco near the working premises was prohibited.

The types of interventions used by the study subjects to help their patients in quitting tobacco were also enquired. Most of the study subjects did not or only sometimes used traditional remedies (n=164, 61.19%), self-help materials (n=145, 54.1%) and medication (n=144, 53.73%). However, majority (n=209, 77.99%) of the participants counselled their patients to quit habit.

The factors that were perceived to hinder the tobacco cessation activities were assessed in the perceived barrier domain. Patients not being interested (n=251, 93.67%), peer pressure (n=233, 86.94%), lack of awareness among patients (n=231, 86.19%) were reported to be major barriers for tobacco cessation by the study participants Table 6.

Discussion

In order to control the ever growing menace of tobacco, it is essential to prevent its initiation as well as facilitate its cessation among its users (WHO, 2005). The present study was an attempt at integrating healthcare professional students in the multidisciplinary approach towards tobacco cessation activities.

The mean attitude (89.03%) and perceived effectiveness (80.64%) scores were favourable among the study participants. Similar findings were reported by

Yang et al., (2015) pertaining to knowledge and attitude; and, Saade et al., (2008) and Barbouni et al., (2012) about attitude among their study participants. However, study participants had lower mean knowledge (69.67%) and behaviour (72%) scores. The observations of the present study could be attributed to the underrepresentation of the importance of tobacco related diseases and its cessation among the undergraduate curriculum of the study subjects. Majority of the study participants perceived various issues that hinder tobacco cessation as barriers with a mean perceived barrier score of 88.62%. The results also emphasized the significant differences among the mean scores of the study domains across the 3 disciplines which is consistent with earlier reports by Sinha et al., (2010) and Barbouni et al., (2012). This might be the result of discrepancy in the curriculum, teaching methodology, teachers across the courses under study. Further studies are required to shed more light on to this variation.

The present study results emphasised the complex interactions among the study domains and with respect to the demographics. Further it is noted that gender, course, attitude and perceived effectiveness emerged as the significant predictors of behaviour of the respondents pertaining to tobacco cessation. In order to succeed, these complex interactions need to be contemplated while formulating multidisciplinary approach strategies. Similar comprehensive studies are summoned to confirm these findings.

Majority (92.91%) of the present study subjects were willing to participate in tobacco cessation activities. However, only 14.18% had received formal training in tobacco cessation which is consistent with the reports of Sinha et al., (2008), Saade et al., (2008), Barbouni et al., (2012) and Yang et al., (2015) wherein majority of the study participants thought that they should be trained in tobacco cessation, while very few had received any training previously. The professional course, attitude, behaviour and perceived barriers were the significant predictors of willingness to undertake tobacco cessation activities among the study participants. Familiarity with the existing tobacco control policies was also assessed in the present study. It is of concern that only 45.9% were familiar with WHO FCTC and 63.06% were familiar with COTPA. Healthcare professionals form an integral part of the healthcare system of the society and arming them with adequate knowledge, skill and competency is of utmost importance if one needs to control major threats such as tobacco. It is imperative to inculcate curriculum modifications to equip health professional students to undertake tobacco control activities independently. This might be achieved by revising the existing curriculum in favour of tobacco cessation and incorporating a mandatory course specific to tobacco issues at regular intervals across all the disciplines of health education.

The number of present study subjects who reported existence of tobacco free policy in their worksite premises was 72.01% which is in conformity with the findings of Sinha et al (2008) and contrary to the reports of Barbouni et al., (2012). Majority (89.55%) of the present study subjects claimed that smoke free policy was always or sometime enforced which is in contrast with the findings

of Barbouni et al., (2012). There is need to enhance awareness pertaining to hazards of second hand smoking and achieve adequate implementation of the policies pertaining to the smoking ban in and around the healthcare institutions.

Majority of the study subjects counselled the patients whereas only few advised medication, self-help materials or traditional remedies to help quitting tobacco. Ministry of Health and Family Welfare, Government of India, initiated 19 tobacco cessation clinics across the country to facilitate tobacco cessation (Thankappan, 2014). However, they have number of limitations which escalate the role of health professionals in controlling tobacco that might be undermined due to inadequate training of the health professionals. Hence, there is an urgent need to inculcate specific training protocols to facilitate meaningful involvement of health professionals in tobacco control.

The present study also analysed the factors that might act as barriers in employing multidisciplinary approach towards tobacco cessation. The major barriers perceived by the study participants included lack of interest among patients (93.67%), peer pressure (86.94%) and lack of awareness among patients (86.19%). It is imperative to address these barriers in order to conquer the tobacco menace.

The present study must be interpreted considering its limitations. The present study is a questionnaire based study which is prone to acquiescence, faking and social desirability biases. The 3 institutions included in the study might not embody all the institutions in India. Hence, studies involving multiple institutions and with larger sample size are warranted. Furthermore, tobacco habit among the health care professionals themselves might bear effect on tobacco cessation practices of their patients.

In conclusions, the study highlights the prospects of meaningful involvement of medical, dental and nursing healthcare professional students as part of multidisciplinary approach towards tobacco cessation. The study emphasised the participant's positive attitude and higher willingness to undertake tobacco cessation activities among their patients, which is if channelized appropriately might target tobacco control in a more systematic and fruitful manner. However, the results also underlined the lack of training and inadequate knowledge among the study subjects. The study identified number of factors that determine the behaviour, willingness of the study participants to undertake tobacco cessation activities among their patients, which need to be considered while implementing multidisciplinary approach. The study reiterated the need of revision in the policies pertaining to curriculum of the medical, dental and nursing training programs. Also, in order to reap the benefits of multidisciplinary approach in tobacco control, there is need to attain homogeneity in the curriculum of the various streams of health education. The complex interrelations of various factors that might facilitate or hinder tobacco control cannot be overlooked while formulating the tobacco control strategies. The need of the hour is multi-institutional and multi-national studies that comprehensively assess the numerous factors that influence multidisciplinary approach, so as to develop meaningful tobacco control strategies.

Declaration of Conflicting Interests
The Authors declare that there is no conflict of interest.

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