

DISCREPANCIES IN BELIEF, BEHAVIOR AND KNOWLEDGE TOWARDS TOBACCO CONSUMPTION

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Abstract

Aim and objective: Tobacco consumption is a leading cause of death, associated with significant health hazards and comprising millions of lives worldwide. India is the third-largest consumer of tobacco in the world; in spite of adequate control measures taken by the government to cease tobacco consumption. The objective of this review is to highlight the discrepancies in belief, behavior, and knowledge towards tobacco consumption in India. The study also aims to specify factors influencing trends of tobacco consumption and to associate the extent of their influence based on the user's perception concerning the quality of life. Study design: Review of the literature. Methods: Authors undertook a literature search in the electronic databases EMBASE, Medline, and Scopus with regard to associated disease burden and factors influencing tobacco consumption. Results: According to the review, sociodemographic, economic, personal, environmental, and healthy life indicators are the most influential variables affecting tobacco consumption. This highlights the need for revisiting the tobacco control laws in India, addressing the existing barriers to have significant impacts on the tobacco picture of the country. Although at state-levels, a certain extent of success has been achieved; in-tranquil, national-level non-prioritization of tobacco-control still exists. The possible reason might be a lack of awareness about health hazards owing to tobacco use. Conclusion: This dictates to improve health outcomes among individuals by including effective interventions. In all, its mandate to map the current issue of harm reduction framework through research, education, awareness, and implementation of policies for improved quality of life and health.

Keywords: Tobacco consumption; Harm reduction; socio-economics; Health hazards; Tobacco trends.

INTRODUCTION

Seemingly harmless, smokeless tobacco [SLT] is a devil in disguise that has posed itself as a global threat to human health [Lachenmeier et al. 2018; Mishra et al. 2012]. WHO estimated 657,000 cases of oral and pharyngeal cancer leading to 330,000 deaths merely due to its use [Hung et al. 2020]. Furthermore, the deep roots of its supply, its inexpensiveness and easy availability have made most of the human existence fall prey to it. Cases of adolescents as young as 11-year-old have been reported for tobacco use and addiction [WHO 2019; Mak et al. 2019]. Smokeless tobacco includes various kinds of products including loose leaves [gutkha], plug, twists, powders, dry and moist snuff [khaini], snus, dip and chewing tobacco, tobacco oil for electronic cigarettes. Khaini is popular and most frequently used in India [Bandyopadhyay et al. 2019]. The availability of different brands varies with location [Kaur et al. 2019]. All tobacco products, no matter how 'less harmful' they are claimed to be for human health, contain nitrosamines [Stanfill 2020]. These nitrosamines are formed by the conversion of nicotine, the discerned cause of addiction [Konstantinou et al. 2018; Brunnemann et al. 2017]. Not only the under-developed and developing countries, but the developed ones as well are playing against this globally prevalent addiction [McHenry et al. 2020]

The spectrum of smokeless tobacco products is available to a very large community, irrespective of the socio-economic background of that community. In fact, developed countries provide a longstanding, secure market for the sales of smokeless tobacco [Grand View Research 2019]. A large amount of data pertaining to the consumption of smokeless tobacco products points towards South-Asia, particularly India [Suliankatchi et al. 2019]. In India, 266.8 million people consume tobacco and over one million die due to tobacco-related diseases annually [GATS-2 2017; WHO 2018]. According to a nationally representative household survey, 63.8 % of 266.8 million people [199.4 million] are SLT users and the remaining were combined users of smoking and

smokeless tobacco. In India, the prevalence of SLT users was two times higher than those of smokers [GATS-2 2017]. Apart from India, other developed countries including the US also show strikingly high use of smokeless tobacco products [Severson et al. 2020].

The conjectures about smokeless tobacco being less harmful than the already available variants of tobacco including cigarettes, cigars, hookah are undoubtedly misleading. A large population of those who adapted to the newer version of age-old addiction to smokeless tobacco have paid the price [Abdulkar et al. 2019; Choudhari et al. 2019; Constance et al. 2019; Cornacchione et al. 2019; Uygur 2019]. FDA approves the sale of the 'non-combustible' forms of tobacco, mentioned in the previous segment, under a certain set of regulations [FDA 2014]. Even after complying with those regulations, the clutches of the dread called smokeless tobacco are deep and widespread [Choudhari et al. 2019; Constance et al. 2019]. Ergo, currently, the focal problem is lack of awareness and availability of help. The help needs to reach as far deep as these products have in society [Abdulkar et al. 2019; Cornacchione et al. 2019].

Objective

Deleterious hazards of tobacco consumption causing a risk to human lives cannot go unnoticed. Consequently, an urgent need to curb the devastating repercussions of tobacco use and addiction accentuates the need to review the recent trends in tobacco use, i.e., the pattern of gradual change that has been noticed globally and the challenges to counter the tobacco consumption effects. This review article aims to indicate the causes of tobacco use and perception associated with tobacco itself. The present review was undertaken to highlight tobacco use concerns on the quality of life by assessing the magnitude of this problem based on the impact of influential factors ascertaining the gaps in knowledge, and thus, appraising discrepancies in belief, behaviour, and knowledge towards tobacco consumption.

METHODOLOGY

Study design

Review of the literature.

Methods

Authors undertook/performed a literature search in the electronic databases EMBASE, Medline, and Scopus using the following search approach: (factors OR determinants) AND (tobacco disease burden OR Tobacco Health Hazards) AND (Smokeless Tobacco Products); with regard to associated disease burden and factors influencing tobacco consumption. Additionally, we look over reference lists of related articles, and searched our own archive for further potentially relevant publications, not identified through the electronic search. Subsequently, we extracted factors for influencing tobacco consumption which formed the scientific basis for identifying discrepancies belief, behaviour and knowledge.

RESULTS

Tobacco Associated Disease Burden

Tobacco consumption impacts the entire system of the body with malignant long-lasting disorders [Mehrotra et al. 2019; Azagba et al. 2020; Leas et al. 2020]. The relationship between the consumption of tobacco and disease has been extensively studied [Lachenmeier et al. 2018]. SLT is not a single product; it's a group of 30 carcinogens including tobacco-specific nitrosamines [TSNA], cadmium, chromium, nickel, arsenic, beryllium, benzo[a]pyrene, and other polycyclic aromatic hydrocarbons [PAHs]. Various hazardous chemicals are also present such as acetaldehyde, aromatic amines, ethylene oxide, formaldehyde, vinyl chloride, and toxic gases such as 1,3-butadiene, hydrogen cyanide and ammonia [Siddiqi et al. 2015; Konstantinou et al. 2018; Kaur et al. 2019; Stepanov and Hatsukarni 2020]. There is a significant association of tobacco consumption and the incidences of carcinoma of the oral cavity, oesophagus, larynx, lung, bladder, kidney, and, to a lesser extent, pancreas [ACS 2017; Niaz et al. 2017; WHO 2018; Gandhi et al. 2019; Mello et al. 2019; Nallapaneni et al. 2020]. The incidence of neoplasia is related to the type and quantity of tobacco used and duration of exposure. A delay of several decades is usually apparent between the first exposure to tobacco and the development of neoplasia. This has been well-documented in lung and laryngeal carcinomas [WHO-IARC 2007; Mishra et al. 2019]. There is evidence that betel nut chewing itself may be oncogenic, although this view has been challenged. In many countries where a high incidence of carcinoma of the mouth has been attributed to betel nut chewing, it has been observed that tobacco additives are usually present and as a rule, the latter have been incriminated as the causative agent [Li et al. 2019; Ko et al. 2020]. Reported data concludes that tobacco might enhance the carcinogenic effect of betel nut chewing [Public Health Law Center 2017; Islam et al. 2019]. As noted in the literature, people often smoked cigarettes in conjunction with betel nut chewing, which is a complex issue and reported that the prevalence of leukoplakia was significantly higher in such populations known as poly users [Lachenmeier et al. 2018; Chhabra et al. 2019; Mantey et al. 2019; Singh et al. 2020]. Globally, cancer of the mouth, pharynx and oesophagus due to SLT consumption led to 1,711,539 DALYs [Disability-adjusted life

years] lost and 62,283 deaths, while India alone accounting for 74 % of the global burden. For non-communicable diseases [NCDs], tobacco is an important risk factor and it is expected that in India by 2030, the burden of NCDs will rise from 40 to 75 % [Pednekar et al. 2016]. The oral cancer rate is highest in India and tobacco is responsible for 90 % of oral cancers [Rani et al. 2003; Sharma et al. 2019; ALA 2019; Mathews and Krishnan 2019; IDPH 2020].

Smokeless tobacco use can cause gum disease, tooth decay, tooth loss, and the formation of white or grey patches inside the mouth called leukoplakia that can lead to cancer [CDC 2014; Muthukrishnan and Warnakulasuriya 2018; ALA 2019]. Smokeless tobacco contains radioactive substances such as lead-210 and polonium-210, which cause lung damage resulting in lung cancer [McAdam et al. 2017; Li et al. 2019]. In SLT, nicotine is an addictive drug that gets easily absorbed through the lungs and is distributed through the bloodstream, crosses the blood-brain barrier and is associated with lasting cognitive, behavioural impairments including memory, attention, and learning [England et al. 2017; Ziedonis et al. 2017; Zarrindast and Khakpai 2019; Addicott et al. 2020]. SLT contains carbon monoxide which reduces the oxygen-carrying capacity by binding with haemoglobin in the blood [Savitz et al. 2006; Impella 2016]. In women, tobacco consumption causes an increased risk of infertility, premature birth, pregnancy complications, and low birth weight infants [Ernster 2010; Bandyopadhyay et al. 2019; Mishra et al. 2019; Roderick et al. 2019]. Disorders such as diabetes, osteoporosis, rheumatoid arthritis, age-related macular degeneration, and cataracts are also associated with tobacco [Chhabra et al. 2019; Roderick et al. 2019]. Tobacco use can also gravely impact reproductive health, the digestive process, vision, bone metabolism, dental hygiene, and also impair the immune system along with genetic damage [Bonnie et al. 2015]. Hormonal imbalance, oxidative stress, reactive gliosis, and dyspnoea are the aftermath of tobacco consumption [Chhabra et al. 2019].

Factors Influence Tobacco Consumption

Tobacco use is related to factors such as socio-economic status and socio-cultural influences. Prevalence studies of tobacco use in India have shown varied disparities between urban and rural areas, age, gender, education, and other socio-demographic variables. Employment, income, social-culture, taxation and marketing strategies are also among the influential factors towards consumption [Mishra et al. 2012; Abdulkader et al. 2019; Bandyopadhyay et al. 2019; Chhabra et al. 2019; Constance et al. 2019; Azagba et al. 2020].

Age, Gender, Residence, Income, Education, and Employment

It has been observed that early adulthood is a highly vulnerable age for the start of tobacco, and the consumption of tobacco significantly increases with increasing age up to 50 years [Bonnie et al. 2015; CDC 2019]. In addition, gender and urban-rural differences exist in the relationship between socio-economic and tobacco consumption behaviours. Consumption is high in males compared to females; however, the SLT use is more prevalent than smoking [WHO 2010; GATS-2 2017]. As per National Family Health Survey [NFHS], 2016–17, the use of any form of tobacco is higher in rural areas than in urban areas; the cigarette is more common in urban areas but in rural populations, SLT products [as khaini] are more popular [14]. Literacy, revenue, and employment oblige as exclusive parameters for tobacco use [Mishra et al. 2012; Kickbusch et al. 2013; Singh and Ladusingh 2014; GATS-2 2017; Abdulkader et al. 2019; Chhabra et al. 2019]. Tobacco use prevails more in less educated, labourers and lesser income individuals. Use is decreased in those who are better educated and belong to a good socio-economic status. Individuals with higher educational accomplishments were less likely to be linked with tobacco consumption behaviours [Rameshan et al. 2013; Sharma et al. 2017]. Global Adult Tobacco Survey [GATS 2017] showed a one-year increase in the early-initiation of tobacco consumption compared with GATS 2010. However, a seven years gap between NFHS-3 and NFHS-2 showed that the prevalence of tobacco consumption had increased; the greatest increase was between 15 and 24 years. The annual growth rate of tobacco consumption is 2 % to 3% [Mohan et al. 2018].

Data suggests that women's empowerment has mixed effects on tobacco use [Moonzwe et al. 2018]. Women's education is inversely associated with their tobacco use, while their age, employment and ability to make intra-household mobility decisions are positively associated with tobacco consumption. Women with primary and beyond primary education are 50 and 90 % less likely to consume tobacco compared to those with no education, respectively. Tobacco use among women increased dramatically with age from 10% in teen years to 40 % in their forties. A one-year increase in age increased the odds of tobacco use by 6 % [Ernster et al. 2000; Bhan et al. 2012; Basset et al. 2018; Ruhil 2018].

Marital Status, Parental Influence, and Poly-users

In India, marital status is an important factor. Data reveals that the women whose husbands consume tobacco are twice as likely to use it. The prevalence is higher among divorced and widowed women than those currently married [Mishra et al. 2015]. The husband also being the source for purchasing tobacco encourages women to consume it. Also, it is observed that the wives of poly-users are three times more poly-users than wives of non-users [Nair et al. 2015]. Many parents, especially mothers, send their children to purchase tobacco for them. This leads to exposure of children at a very young age resulting in early initiation and addiction on frequent use [Janakiram et al. 2019]. Secondly, the consumption by children or youth is found to be without the

consent of the guardian or parents. Thus, none can even identify or be aware that the adolescent is consuming harmful substances, i.e., not good for their health [CDC 2012]. Children who use SLT may also use cigarettes. The inaccurate perception and belief that SLT is safer than cigarettes lead parents into allowing its use by their children [Rudatsikira et al. 2010; Kopp et al. 2018]. Explicit cautions overwhelm inclined users in saving the health of non-users by consuming less indoors and sidestepping in proximity to adolescents.

Marketing Strategies

Tobacco companies' marketing strategies target youth over the age of 18 because under-age riders are able to engage, communicate with, and serve as role models for local youth [Weiger et al. 2017]. Tobacco companies distribute free cigarettes to youngsters and many of them are not able to understand anti-tobacco messages [Mantey et al. 2019]. Data suggested the probability of the same owing to unclear print or small print of warning on pouches [Kaur et al. 2017]. Some places where smoking is not allowed, tobacco companies market smokeless tobacco products as an alternative [Stepanov et al. 2017]. Even people planning to quit smoking have been perceived to shift towards consumption of SLT. Many tobacco products are available in the market in dissolvable form, as they contain sweeteners or flavouring agents and look like candy, but all these forms contain equal amounts of nicotine and other carcinogens, so no form of smokeless tobacco is safe [Kostygina et al. 2016; WHO 2018]. A report shows that prohibition on tobacco promotion can decrease tobacco use by approximately 10 %. GATS-2 reports stated that more than 50% of tobacco users believe in quitting after noticing a caution label on the tobacco package. So labelling needs to be focused with a clear and readable print of warning or caution [GATS-2 2017].

Perceived Health Benefits [Perception]

There is a belief amongst tobacco users that tobacco products contribute to various health benefits like improvement in digestion, being antiseptic and local anaesthetic [18, Murthy et al. 2018]. Further, it also aids in sound sleep and acts as a mouth freshener [Hossain et al. 2017]. Others also believe that pān with tobacco and betel nut cures the bile disease and sharpens the memory [Rashid et al. 2015]. These perceived benefits not only motivate the already-consuming user base, but also facilitate its use in groups of people who would not have consumed it otherwise. Under the influence of behavioural factors like nervousness and depression, individuals perceive tobacco as an ailment [Chandak et al. 2013; Farooqui et al. 2019]. The key to SLT's widespread patronage, though, lies in its consumption for perceived medicinal value, and its use in worship as an offering to God for one's well-being [Charlton 2004].

Pricing and Taxation

Tobacco price is another factor that influences users more. In comparison to cigarettes, tobacco content present in bidi is more and its price is less than one rupee as compared to normal cigarettes; similarly, SLT consumption is highest in India and that is because of cheap and affordable prices [Donovan et al. 2002; Richardson et al. 2014]. GATS-2 reports a rise in the outflow of expenses more than double for tobacco products in a decade with the possible reason for the decrease in tobacco consumption in the nation [GATS-2 2017]. Increase in taxes would be most effective for the decrease in tobacco use among young and poor individuals, as reported by many studies [Gupta et al. 2016; John 2019; Mehrotra et al. 2019; Nguyen and Nguyen et al. 2020].

Social and Cultural Factors [Belief]

Tobacco consumption has a strong association with an individual's socio-cultural characteristics [Gupta et al. 2016; Farooqui et al. 2019]. In certain communities, tobacco consumption is perceived as the societal tradition code and status in concord. As a consequence, fraternity hookah and other products are shared and offered among different members such as relatives and friends in ceremonies including marriage and during celebration of circumcision. This has been attributed to maintaining traditional aspects of ethnicity and keeping the cultural features intact, and some tobacco products hold considerable social and cultural values [Benowitz et al. 1998; Anand 2019]. In rural areas, people believe that the use of tobacco products like the pān is cool and the use of hookah as a connection with their older generation [Mukherjea et al. 2012]. This has also been implied in modernity to hookah bars and lounges in urban regions [Chhabra et al. 2019]. In fact, the pān has become so intrinsic to Indian society that it has become the custom to offer pān to the guests after dinner. The social stigma attached to tobacco use also influences the uptake of SLT [Rani et al. 2003; Rooban et al. 2013; Johnson et al. 2016; Prasad and Dhar 2017]. For example, the feminization of cigarettes is a recent phenomenon, and the increased prevalence of smoking among women is due to their desire for equality. The most obvious motive for SLT is social affability, in a way similar to westerners drinking coffee together [Rooney 1995]. Psychological and social development are also affected by drug abuse habits forming major reasons being provoked for tobacco consumption at an early age [Gupta et al. 2016].

State Variation in SLT Consumption/Tobacco Cultivating Regions

The prevalence of both smoking and chewing tobacco/pān-masala varies significantly among different states in India [Rani et al. 2003; Singh and Ladusingh 2014; Mohan et al. 2018]. Some regional patterns were observed for chewing tobacco/pān-masala. Chewing tobacco was relatively more common in the central, eastern, western and north-eastern states compared to those in the northern and southern states. However, in the northern states, where chewing is relatively less common, smoking of tobacco is relatively higher with the exception of Punjab where tobacco prevalence is one of the lowest as the majority of its population [58 %] practice the Sikh religion, which prohibits tobacco consumption [Singh and Ladusingh 2014].

There is widespread use of smokeless tobacco products in the states of Tripura, Manipur, Odisha, Assam, Arunachal Pradesh, Nagaland, Chhattisgarh, Jharkhand, Uttar Pradesh, Karnataka, Gujarat, Bihar, and Maharashtra. Conversely, smoking is more common among Indian adults in the states of Meghalaya, Jammu and Kashmir, Haryana, Uttarakhand, Himachal Pradesh, and Andhra Pradesh [Chhabra et al. 2019]. India is the third-largest tobacco-producing country in the world [Economic Times 2019; TBI 2019]. Owing to easy accessibility in tobacco-cultivating states, consumption too is high [Mishra et al. 2012; Shah et al. 2018].

In the nation, tobacco use is pervasive in lower strata individuals' despite the colossal struggles intended to counter its use possibly due to the dearth of awareness, improper execution of cessation policies, and the lofty exercise of tobacco use as a part of the traditional beliefs in definite communal crowds. However, the most important challenge is that the tobacco industry fetches higher monetary gains for the nation, and tobacco control processes can undesirably affect the realm's economy by creating vast unemployment. Therefore, tobacco assistance is often sustained for the nation's economy in favour of tobacco control. Consequently, in rural areas manifold approaches for intervention are a prerequisite due to the high consumption of tobacco.

Challenges and Opportunities

To fight the battle against tobacco, India has taken many initiatives and tobacco control policies have been implemented at both the national and international levels. Approximately, 70% of tobacco users want to quit but only 3-5 % are successful in doing this [GATS-2 2017]. To help people in quitting tobacco, WHO has established 18 Tobacco Cessation Centers [TCC] in India in collaboration with the Government of India, but still the country is facing the rising burden of diseases for which tobacco is a major risk factor. WHO revealed that in India cessation strategies support less than 4% and counselling less than 9%; this shows that there is a lack of cessation and counselling support offered to SLT consumers [Venkatesh and Sinha 2012]. Tobacco products' advertisement and brand extension by the tobacco industry is prohibited under Cigarettes and Other Tobacco Products Act [COTPA]. The 2009 cable television act never came into force and tobacco industries continue to advertise a lot in mass media. There is a need for the Ministry of Health and Family Welfare to take up this matter seriously with the Ministry of Information and Broadcasting to enforce this act [Hitsman 2017]. Effective tobacco control is dependent on balanced implementation of demand and supply reduction strategies by the government and inter-sectoral coordination involving stakeholder departments and ministries [Kaur et al. 2017].

The jeopardy of tobacco consumption can be controlled and moderated using different policies that dictate the dogmatic backbone and community-based collective obligation. Probable and doable trials can help in formulation of rigorous anti-tobacco standards, prohibition on tobacco smoking in all public places, time-series monitoring for the execution of tobacco control strategies, and reparation of employment loss due to tobacco-control policies by offering employment opportunities to workers in other labor-intensive services. The existing perception among individuals in rural areas is that smokeless tobacco is less harmful than smoking, and that tobacco use can help in getting rid of fretfulness, body aches, and inflammation. Such perceptions should be eradicated using digital platforms and awareness campaigns. Some adults tried this for the first time to understand why their parents used tobacco regularly, which later became a habit and there was a 50 % chance for developing an experiment into addiction. Usually, these precepts affect high-risk target populations. Directed tactics must be established for eradicating the tobacco problem; counselling sessions must be organized, especially in rural areas to chiefly make women conscious of the ill-effects of tobacco use on their reproductive health and as the lead family influencer to benefit in decreasing the number of entities jeopardized to second-hand tobacco. Rigid monitoring of tobacco control norms through time series evaluation should be encouraged. Pupils in schools and colleges must be cautioned about the health risks associated with tobacco use and encourage campus to be established as a tobacco-free zone. These measures might be able to aid in reducing the ill-effects of tobacco use in society [Hatsukami and Parascandola 2014; Chandra et al. 2018; Mehrotra and Sinha 2018; Ranabhat et al. 2019].

CONCLUSION

The present paper attempts to ascertain the changes in the trend of tobacco consumption. Descriptions of national patterns and trends are informative in providing insight into the shifting patterns and the potential interventions towards tobacco consumption. There are some grounds for optimism given the prospects for

control of associated disease burdens. Primary intervention should, however, focus on the reduction of the main cause, namely, tobacco consumption.

In India, it is estimated that almost a million people initiate consuming tobacco every day [Shimkhada and Peabody 2003]. From data available, it is clear that SLT use increases with age and is much more prevalent among uneducated people and individuals residing in remote parts of India [GATS-2 2017; Chhabra et al. 2019]. This is possibly due to a lack of awareness among individuals from low socio-economic strata of the society who do not have access to the digital platform, ads and limited execution of the cessation policy. Behavioural aspects of tobacco use in young people have been clearly explained in terms of the effects of peer pressure, social desirability, social contradiction about tobacco use, being a depiction of freedom and negative family experience about the same, acting as a protective factor against it. Many people do not believe the anti-tobacco messages or its harmful effects; the warnings on mass media and tobacco packets turn out to be non-impactful on them [Arora et al. 2019]. Undue tobacco use has severe health consequences, leading to ailments such as cancer of the oral cavity, lungs, colo-rectum, and associated organs, as well as tuberculosis, diabetes leading to poor life quality and augmenting the number of deaths. The Second Global Audit Tobacco survey has further highlighted very low cessation and an increase in tobacco consumption. In India, this result can be attributed to tobacco falling in the low priority segment in the Government's public health agenda. This has been largely due to the resistance faced from the pro-tobacco lobby/industry. However, as the focus of the global health community has now shifted to the tobacco menace, the Government of India has to make revisions in the policy to toughen its stand on tobacco control pan-India. Thus, to increase the digits of cessation, emphasis should be on the wakefulness of individuals through anti-tobacco promotions. The literature review demonstrates that the level of the illicit trade declined even after the increase of taxes imposed on tobacco products in other countries [94]. Tobacco taxes are critical in reducing tobacco consumption, thereby improving public health [Nargis et al. 2019]. Thus, the Government of India should recognize the tobacco tax policy as the most cost-effective tobacco control measure, and establish a clear roadmap of progressive tobacco excise tax increases, so that total tax levied on tobacco accounts for at least 75 % of the retail price as suggested by the WHO to reduce the prevalence of tobacco use in the country. Also, the findings from different researchers notify policymakers that in countries experiencing rapid economic growth, significant tax increases are needed to counteract the effect of income growth, in order for the tax increases to be effective in reducing tobacco use.

A strong political determination will only be able to bring such a change. Also, there is a prerequisite to project and implement innovative policies for increasing awareness to the menace of tobacco use among the economically subordinate segments of the society and the rural areas of the realm. The teenage and fledgling adult individuals who are susceptible tumbling targets to peer-burden ought also to be directed towards anti-tobacco agendas. This might be accomplished by organizing awareness camps, the spectacle of ads, counselling sessions, and educational activities in schools and colleges under the leadership of national and international brand ambassadors whose very presence may aid in restraining tobacco use at a primary phase. The government must initiate pervasive and effective enactment of the anti-tobacco policies among numerous segments of individuals, which might have a major impact on increasing tobacco cessation rates and reduce disease burden among the population.

This review provides the baseline in trends, particularly in the Indian population, and could be useful for researchers [to collect evidence as a proof by testing, develop alternatives and reduced risk products], policymakers, and utmost to the general public, providing data for various aspects of tobacco consumption and its hazards. The government should set up policy advocacy for the provision of private sectors as a center of excellence for mapping the current issues underlying the harm reduction framework.

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