

ORAL SPOT PLATES (OSPs) TO INDUCE A BEHAVIOURAL CHANGE IN TOBACCO USERS AND ITS UTILITY AS A PREVENTION TOOL IN THE COMMUNITY

Community Medicine

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ABSTRACT

As Dr Poonam Khetarpal Singh, The Regional Director WHO (South-East Asia Region) has rightly emphasized that there are four modifiable risk behaviors in South East Asia which once modified can decrease the overall prevalence of NCDs in this region, the most important among these is tobacco use. OSPs (Oral Spot Plates) used in the community as mass media campaigns for tobacco cessation activities are highly effective interventions in public health which can save lives. These, if implemented comprehensively at grass root levels could markedly decrease DALYs associated with oral cancer and pay rich dividends to the health of any country where tobacco consumption is high such as India. However, lack of surveillance and effectively 'catching' tobacco users and then to induce a behavior change in them and ultimately de-addict them in early stages of oral cancer is difficult but would pave way for a better and a healthier India. Unfortunately, as observed in this article, in spite having a plethora of smoking and smokeless tobacco (SLT) users in India; proactive screening of tobacco users remains a low priority in the Indian health scenario.

Oral Spot Plates (OSPs) are an effective screening and behavior tool available and is discussed in detail in this study. The total no of tobacco users enlisted in this pilot study was 25 of which 18 were males and 7 were females in this study. The mean age of the 60.72 years with a standard deviation of 3.535. The range of the age was 45 to 80 years. OSPs was able to induce a behavior change in 20% of the patients screened; although many of them were effectively educated about the hazards of smoking. Behavior change is a slow and a gradual process and requires repeated counselling. It is however important to note here that a combination of behavior change counseling and deaddiction is crucial for the primordial and primary prevention of oral cancer in India and especially in some states like Tripura, (where the overall prevalence of tobacco use has reached 64.5% of the population as per the GATS-2 report); tobacco use has reached epidemic proportions in India and much needs to be done at prevention of cancer developing because of tobacco use at an early stage.

KEYWORDS

Tobacco use; Oral Spot Plates (OSPs); Behavioral change; Deaddiction

INTRODUCTION

Tobacco use is the number one public problem in south East Asian countries as 90% of the world's smokeless tobacco users live in the South-East Asia Region and in some South East Asian countries States, the prevalence of smoking among males is above 60%. To address this huge problem, Dr Poonam Khetarpal Singh, The Regional Director WHO (South-East Asia Region) has underlined that there are four modifiable risk behaviours in South East Asia which once modified can decrease the overall prevalence of NCDs; the most important being tobacco use, besides unhealthy diet, insufficient physical activity and harmful use of alcohol. Tobacco use is responsible for one million deaths in South East Asia. There are 250 million smokers and an equal number of smokeless tobacco users giving a whopping figure of 500 million users using smokeless and smoked tobacco!! Keeping in view the rising trends of NCDs in South East Asia, Dr Singh has urged Member States to integrate NCDs into the national development agenda and to establish national multisectoral policies, strategies and action plans for the prevention and control of NCDs. (WHO, 2014)

The GATS 2 report (2016-2017) (Global Tobacco Adult Survey: Second round) showed that 28.6% of Indians above the age of 15 years were using tobacco products. If the population of India is taken as 130 crores and 100 crores are 15 yrs or older ; **then roughly 25 crores Indians are using both smokeless and smoked tobacco. (see below).** Among the states the highest prevalence was seen in Tripura (64.5%), followed by Mizoram (58.7%) and Manipur (55.1%). The least prevalence of tobacco use was seen in Kerala (12.7%) and in Punjab (13.4%). In Delhi, as per the GATS 2 report, the usage was (17.8%) and

in Haryana (23.6%).

Table 4.6: Percent distribution of adults aged 15 or above who are current tobacco users by tobacco use pattern, by states/UTs, GATS 2 India, 2016-17

States/UT	Current tobacco user	Smoked only	Smokeless only	Both smoked and smokeless	Non-user	Total
India	28.6	7.2	17.9	3.4	71.4	100
Jammu & Kashmir	23.7	19.4	2.9	1.4	76.3	100
Himachal Pradesh	16.1	13.0	1.9	1.2	83.9	100
Punjab	13.4	5.5	6.1	1.8	86.6	100
Chandigarh	13.7	7.6	4.3	1.8	86.3	100
Uttarakhand	26.5	14.2	8.4	3.9	73.5	100
Haryana	23.6	17.3	3.9	2.4	76.4	100
Delhi	17.8	8.9	6.5	2.3	82.2	100
Rajasthan	24.7	10.6	11.5	2.6	75.3	100
Uttar Pradesh	35.5	6.2	22.0	7.4	64.5	100
Chhattisgarh	39.1	3.1	33.7	2.4	60.9	100
Madhya Pradesh	34.2	6.1	24.0	4.1	65.8	100
West Bengal	33.5	13.5	16.9	3.2	66.5	100
Jharkhand	38.9	3.5	27.7	7.7	61.1	100
Odisha	45.6	2.8	38.6	4.3	54.4	100
Bihar	25.9	2.4	20.8	2.7	74.1	100
Sikkim	17.9	8.2	7.0	2.7	82.1	100
Arunachal Pradesh	45.5	6.2	22.9	16.5	54.5	100
Nagaland	43.3	4.3	30.1	8.9	56.7	100
Manipur	55.1	7.4	34.2	13.5	44.9	100
Mizoram	58.7	25.1	24.3	9.2	41.3	100
Tripura	64.5	16.0	36.8	11.7	35.5	100
Meghalaya	47.0	26.7	15.4	4.9	53.0	100
Assam	48.2	6.5	34.9	6.8	51.8	100
Gujarat	25.1	5.9	17.4	1.8	74.9	100
Maharashtra	26.6	2.2	22.8	1.6	73.4	100
Goa	9.7	3.2	5.5	1.0	90.3	100
Andhra Pradesh	20.0	12.8	5.7	1.4	80.0	100
Telangana	17.8	7.7	9.5	0.6	82.2	100
Karnataka	22.8	6.5	14.0	2.3	77.2	100
Kerala	12.7	7.3	3.4	2.0	87.3	100
Tamil Nadu	20.0	9.5	9.5	1.0	80.0	100
Puducherry	11.2	6.4	4.0	0.8	88.8	100

Source: INDIA 2016-2017 | Report: GLOBAL ADULT TOBACCO SURVEY**Second Round**

Further, tobacco deaths in India may exceed 1.5 million annually by 2020 if necessary steps are not taken to curb the menace of tobacco use urgently. After China, it has been estimated by the WHO that India would have second largest number of smokers in the world. Tobacco use is well entrenched in India in rural areas, certain occupations such as auto-rickshaw drivers, labour workers, urban slums. A study conducted among 75 auto-rickshaw drivers in a suburban area of Mumbai found that majority of the drivers were tobacco users (82.6%) and majority of them (69.3%) were using tobacco in the form of Gutkha. (Uzma Shaikh, et al 2019)

Rationale

Tobacco cessation activities are highly effective interventions in public health which can save lives. These, if implemented comprehensively at grass root levels could markedly decrease DALYs associated with oral cancer and pay rich dividends to the health of any country where tobacco consumption is high such as India. However, lack of surveillance and effectively 'catching' tobacco users, so as to induce a behavior change in them and ultimately de-addict them in early stages would pave way for a better and a healthier India. It is however important to note here, that a combination of behavior change and deaddiction is crucial for the primordial and primary prevention of oral cancer as in some states like Tripura, (where the prevalence of tobacco use has reached 64.5% of the overall population as per the GATS-2 report), it is very much needed on an emergency basis.

Methodology

A total of 25 patients who were seen during the period of March 2019 to July 2019 who were using (smokeless and smoked) tobacco. All these patients were shown the Oral Spot Plates as shown in Figure 1. After the patients had seen the oral spot plates, a post counselling session was done in patients who showed a positive behavioral change. Patients showing a behavioral change or willing to quit tobacco were admitted to the deaddiction program of this hospital which is currently ongoing. Further all the patients were assessed for the level of addiction by the Fagerstorm test. The results of this test would follow as this is a series of publication of the at this tertiary care hospital carried out by department of TB and Chest (Dr K L Bansal) in association with Dr Manoj Kr Dhingra (Department of Community Medicine) and as per the WHO tobacco cessation Program.

Aims and Objectives

1. To screen patients using tobacco (Both smokeless and smoked) with oral spot plates designed by the authors and observe any change in the behavior pattern of these patients in a post counseling session
2. To initiate and sustain any positive behavior change observed through repeated counselling and by post communication methods such as community media campaigns and e mobile technology
3. To advise all patients admitted in this study to quit tobacco

OBSERVATIONS AND RESULTS

Oral spot plates were prepared and displayed in the Hospital in the OPD and at the main entrance of the Medical College building

Efficacy of Oral Spot Plates (OSPs) to induce a behaviour change and as a de-addiction tool in rural communities and in tertiary care hospitals in Panipat and Jhajjar, Haryana

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ORAL SPOT PLATES FOR SCREENING OF TOBACCO USERS AND FOR DEADDICTION

TOBACCO USE CAN CAUSE CANCER

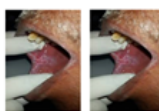


Fig 1: Photograph showing mixed red and white patch at the retro-commissural area on right side



Fig 2: Photograph showing white patch at the retro-commissural area on left side



Fig 3: Photograph showing mixed red and white patch at the retro-commissural area on left side



Fig 4: Photograph showing white patch at the retro-commissural area on right side



Fig 5: Photograph showing white patch at the retro-commissural area on right side



Fig 6: Photograph showing white patch at the retro-commissural area on right side



Fig 7: Photograph showing white patch at the retro-commissural area on right side



Fig 8: Photograph showing mixed red and white patch at the retro-commissural area on left side



Fig 9: Photograph showing white patch at the retro-commissural area on right side



Fig 10: Photograph showing white patch at the retro-commissural area on right side



Fig 11: Photograph showing white patch at the retro-commissural area on right side



Fig 12: Photograph showing white patch at the retro-commissural area on right side



Fig 13: Photograph showing white patch at the retro-commissural area on right side

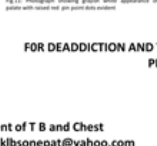


Fig 14: Photograph showing white patch at the retro-commissural area on right side



Fig 15: Photograph showing white patch at the retro-commissural area on right side

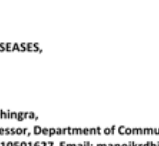


Fig 16: Photograph showing white patch at the retro-commissural area on right side



Fig 17: Photograph showing white patch at the retro-commissural area on right side

FOR DEADDICTION AND TREATMENT OF THE ABOVE DISEASES,
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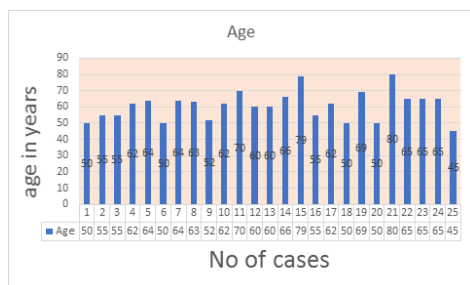
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Dr K L Bansal (Left) and Dr Manoj Kr Dhingra (right) and showing the OSPs to the patients and observing any behavioral change. Patients showing a positive behavioral change were admitted to the deaddiction programs. Rest of the patients were counselled again about the hazards of tobacco use



The total no of tobacco users enlisted in this study was 25 of which 18 were males and 7 were females in this study. The mean age of the 60.72 years with a standard deviation of 3.535. The range of the age was 45 to 80 years. OSPs was able to induce a behavior change in 20% of the patients screened; although many of them were effectively educated about the hazards of smoking. Behavior change is a slow and a gradual process and requires repeated counselling. Behavior change is a slow and a gradual process and requires repeated counselling. It is however important to note here that a combination of behavior change and deaddiction is crucial for the primordial and primary prevention of oral cancer.

DISCUSSION

Use of oral spot plates in behavioral therapy and the CATCH Strategy of WHO

In India, nearly 300 million people in India use some type of tobacco product, with about 60% of those using smokeless tobacco. Smokeless tobacco use has been associated with a number adverse health outcomes in India and across South Asia. (Salvi, et al, 2019). As per the goals of the Action plan for the prevention and control of NCDs in South-East Asia, 2013–2020; is to reduce and prevent morbidity, avoidable disability and premature mortality due to NCDs in the South-East Asia Region. One of the key targets of this plan is to have a reduction of 25% relative reduction in overall mortality from cardiovascular diseases, cancers, diabetes, or chronic respiratory diseases by 2025. For this a CATCH strategy has been developed by WHO. The main components of this strategy are discussed below and are shown in figure 1. (Source: WHO 2018)

The CATCH strategy as modified to suit the epidemic scenario of India would be to first:-mitigate the harmful use of tobacco in India and prevent cancer. (WHO 2018)

1. Customize and adopt the global best practices in smoking cessation

The first component of this strategy would be to adopt the best evidence based practices already successful in other countries to conquer tobacco use. One of these the is strategy m Tobacco Cessation plan and initiation of tobacco cessation quit line in India.

National Level Tobacco cessation Quit-line in India

A national level tobacco quit plan has been developed in India and is being monitored by V P Chest Institute in Delhi. runs a national level telephone tobacco cessation line with telephone no (1800-11-2356). Once a phone call is registered with this center the caller is asked to quit using tobacco and asked to recall within 7 to 10 days. A 'tobacco quit plan' is sent to him by email. A counsellor follows up the caller and finds out whether he is able to quit tobacco as per the instructions given

in the quit plan.

2. Acquire resources:

The next important step for tobacco cessation program (TCP) is to acquire funds for the program. This would require to highlight TCP as a national public health priority. Here emphasis should be given to the huge public health benefits of SLT cessation; then fund resources could be mobilized resources through fundraising from local (Governmental or CSR in India) as well as international donors. The next step is to do capacity building.

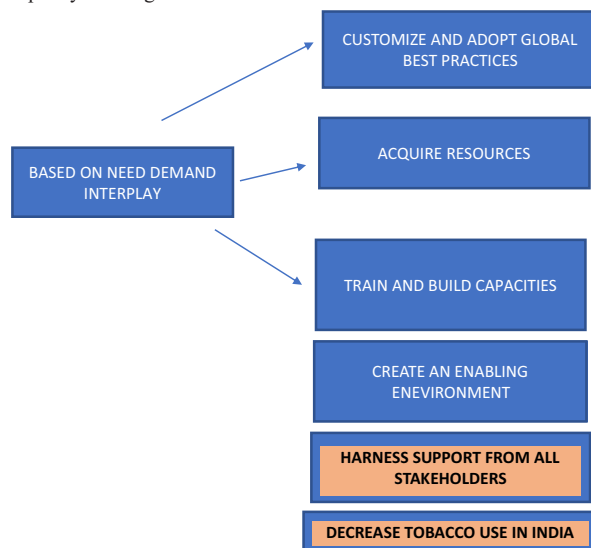


FIGURE 1 AND THE CATCH STRATEGY

3. Train and build capacities of professionals and workers:

One of the most important factors which is required for the success of any program is a trained workforce which for such a National Program (as Cancer control comes under the National Program NPCDCS: national Program for control of cancer, Diabetes, Cardiovascular Diseases and stroke) is quite poorly developed in India. An effective built staff can develop and implement dedicated guidelines for quitting SLT and further develop training modules on SLT cessation for different categories of tobacco users More importantly such modules and OSPs which have been discussed in this study should be included SLT cessation in the curricula of medical, dental and nursing colleges so as reach the underprivileged and disadvantages population.

These modules and training materials combined with app-based training modules for smartphone users can be extremely cost-effective for training health workers in primary care settings

4. Create an enabling environment:

Strong legislation and tax to decrease affordability of cigarettes and processed tobacco could result in a reduction in tobacco consumption. However, excessive taxation could be counter -productive as heavy smokers would continue to use tobacco and may actually pay more and save less for their families. However, countering aggressive marketing techniques, attractive packaging and countering media campaigns by Hollywood stars may be productive in the long run.

5. Harness support from all stakeholders: OSPs and Community Media campaigns

One of the most forceful interventions to counter tobacco use is by initiating community talks and community media campaigns. The Oral Spot Plates (OSPs) used in this study could be used very effectively in community groups in rural and urban areas. Another effective method is to display OSPs in Temples, Gurudwaras, Masjids and Churches with the consent and involvement of the religious heads

CONCLUSIONS

The various algorithms which are commonly used for tobacco cessation program include pharmacological interventions (bupropion, varenicline) and motivational cognitive-behavioral therapy

Behavior change strategy in District Vadadhora, Gujarat

Under the RNTCP, Program an intervention was designed for patients

having TB and concomitantly using tobacco. At the end of 6 months of ATT therapy, 67.5% patients were advised to quit tobacco. This study shows that advise strategies or behavior change strategies are a cost effective interventions to quit tobacco even in TB patients

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