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Oral Oncology

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Telescreening as an alternate modality for early detection of oral cancer

Dear Editor,

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The COVID-19 pandemic has rattled health-care systems, raising concerns about its subsequent impact on non-COVID disease conditions including oral cancers. Oral Cancer is a complex multistep process with its outcome being time sensitive and is likely to be affected by these disruptions. Hence, we would like to take this opportunity in stressing the importance of Tele-screening for early detection of oral cancer during these testing times of the pandemic.

Oral cancers are among the five most common cancers in India with tobacco usage, alcohol consumption, betel quid chewing, and human papillomavirus infection being the most common causes. Majority of the oral cancers are preventable, and also easily detectable as lesions are readily visible on routine screening; still most of the cases are diagnosed in its advanced stages with resulting poor prognosis [1]. Adding to these, the recent Covid-19 pandemic has also worsened this condition in terms of delayed diagnosis and treatment.

The global pandemic has greatly affected cancer awareness programmes and cancer care with Governments suspending screening programmes for oral cancer under its National Cancer Screening Programme [2]. Also a 54% decline in new patients' registration was observed in 2020 as compared to 2019 [3]. This will result in missed cancer diagnoses, delayed diagnoses, and subsequent burden on healthcare services and the probable overall impact on cancer mortality indicate the possibility of a serious public health problem in the next decade.

Social isolation during lockdown due to pandemic also have adversely affected physical and mental health [4,5]. This disruption of social interactions between individuals may induce psychological and neuroendocrine responses that could increase the incidence, morbidity and mortality of a great number of diseases including oral cancers. Also, chronic stress has been reported to promote carcinogenesis and metastasis. Apart from playing a role in the pathogenesis in oral cancers, chronic stress also has been demonstrated to reduce effectiveness of all forms of anticancer therapy including chemotherapy, radiotherapy and immunotherapy [6].

Overall, the pandemic has greatly affected all aspects of cancer care including screening, diagnosis, and treatment resulting in a sudden surge of patients presenting with more advanced disease. Although social distancing and restrictions on travel are necessary to limit COVID-19 spread, we need to find alternative new technologies to better adapt to these new normal to tackle the oral cancer burden. Patients should be educated about causes, appearance and advantage of early detection using social media, print media, via reliable websites; and encouraged to perform oral self-examination.

Diagnosis of non-communicable diseases like cancer should not be delayed as it directly affects quality of life and survival of cancer patients. However, telemedicine has been used with reasonable success to deal with this situation so far [3], but with the emergence of new variants of Corona virus uncertainty of this situation becoming normal is reduced. Therefore, to adapt to these circumstances other innovative advancements in telemedicine, such as tele-screening are required that may serve as an adjunct to identify dysplastic and malignant lesions at early stages. Although biopsy is gold standard for confirmatory diagnosis but use of such non-invasive methods may reduce number of biopsies required [7]. Mobile based tele-screening tools can be used which can make remote diagnosis of oral carcinomas possible, with minimally trained technicians and nonmedical personnel [8,9].

Health care providers, especially dentists can contribute to improve cancer care as they are well aware about causes and appearance of oral cancerous and precancerous conditions and most of them perform examination of oral mucosa during routine check-up. Training programmes as part of continuing dental education may improve their capability to diagnose and may enhance chances of early detection of oral carcinoma. Therefore, in the changing face of modern day requirements telescreening provides an alternative modality for early detection of oral cancers which may substantially decrease the cancer related morbidity and mortality.

Declaration of Competing Interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

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