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## A health promotion survey conducted in a university setting during the COVID-19 pandemic to increase awareness for Vitamin D supplementation

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During the pandemic, there was concern that vulnerable individuals with low vitamin D status, particularly those from certain ethnic groups with co-morbidities were at increased risk of severity of COVID-19 complications<sup>(1)</sup>. Vitamin D insufficiency had previously been recognised as a concern by SACN (2016)<sup>(2)</sup> which led to the recommendation of daily supplementation of Vitamin D (10 mcg) for the whole population during the winter months and for the whole year for vulnerable populations. This was based primarily on the evidence to maintain musculoskeletal health, however vitamin D supplementation has also been shown to prevent and improve recovery from acute respiratory infection<sup>(3)</sup>. A rapid review by NICE (2020)<sup>(4)</sup> re-emphasised the advice for Vitamin D supplementation, particularly because of the reduced exposure to sunlight during lockdown restrictions. The aim of this study was to raise awareness of the need of Vitamin D supplementation for the population during the COVID-19 pandemic.

We launched an online health promotion survey during February - April 2021 on vitamin D supplementation targeting the diverse student and staff community at London Metropolitan University. The online survey questionnaire consisted of 30 questions which explored current knowledge, perceptions and perceived barriers to Vitamin D supplementation. This was followed with a two-minute educational animated video, using bright colours, concise language and an amicable presentation on the benefits of Vitamin D supplementation. The survey was advertised through the staff and student university website.

Seventy-nine participants have completed the survey (staff n = 14, student n = 65). Sixty six percent of participants reported taking a vitamin D supplement, either because they thought they were deficient in vitamin D (56%) or were advised by a healthcare professional (44%). Of the 34% that did not supplement, the most common reasons cited were not needing a supplement or were not aware it was an option without deficiency. The uptake of supplementation and knowledge was higher in the university population than reported in the literature (around 50%)<sup>(5)</sup> and this could be related to educational level and knowledge accrued on the science and nutrition-related courses. Some participants (41%) attributed their uptake of vitamin D supplementation to a proposed link between vitamin D and COVID-19 risk. However, there was a cautious approach, one observer commenting that 'immune health is complex'.

The consequent feedback survey was completed by 30 participants and in total 24% had confirmed that they had made behavioural changes following the viewing of the educational video, which included initiating vitamin D supplementation, improving dietary intake and making lifestyle behavioural changes. These preliminary findings suggest that educational videos could potentially be a good medium for health education within the university setting.

### Acknowledgments

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### References

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