

COVID-19 AND HEARING PROBLEMS AMONG THE STUDENTS

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Aim: to determine if COVID-19 infection affects the auditory system and causes hearing problems among students.

Materials and Methods. Questionnaire based cross-sectional study during 14–28.04.2021. 11 questions and a hearing test sent to 450 students randomly. The questionnaire contained basic demographic questions, study details, COVID-19 anamnesis, hearing test online link.

Results. 201 students participated, 15 were excluded. There were students in Ukraine, Lebanon, France, Canada, India, Bahrain, USA, Netherlands, Romania, Italy.

Among the participants previously infected by COVID-19 (46), 18 (39.13 %) showed hearing problems: mild (17.4 %), moderate (19.6 %), severe (2.8 %) issues. Among the participants that were never infected (140), 23 (16.4 %) showed hearing problems: mild (10.7 %), moderate (5.7 %), none severe issues.

Most of the previously infected participants were infected from more than 2 months ago (40) and 17 (42.5 %) of them showed hearing problems. This may show that hearing loss may be a long term effect of COVID-19 infection. The value of student's t-test between the control group and the previously infected was calculated and it was 2.89, ($p < 0.05$) which shows that the difference between the 2 groups was statistically significant.

Conclusion. There was a significant difference found between percentage of participants previously infected by COVID-19 affected by hearing loss and percentage of the control group affected by hearing loss, showing that COVID-19 may cause damage to the hearing system. The effect of COVID-19 on hearing should be further investigated.