Psychological correlates of COVID-19-related fear among medical students

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Psychological Correlates of COVID-19-Related Fear among Medical Students

- Background
  - According to the WHO, the COVID-19 pandemic may have negative impacts on mental health, including those caused by COVID-19-associated fear (FCV).
  - A study conducted by the authors in March 2020 found that FCV was observed in 44.4% of medical students and was associated with sleep disorders and headaches.
- Aim
  - To assess the impact of FCV on the psychological state of medical students.
- Methods
  - In August 2020, FCV was assessed using the Fear of COVID-19 Scale (FCV-19s) with a 16.5 cut-off point among 1–6-year medical students.
  - The level of depression, anxiety and stress was assessed using the DASS-21.
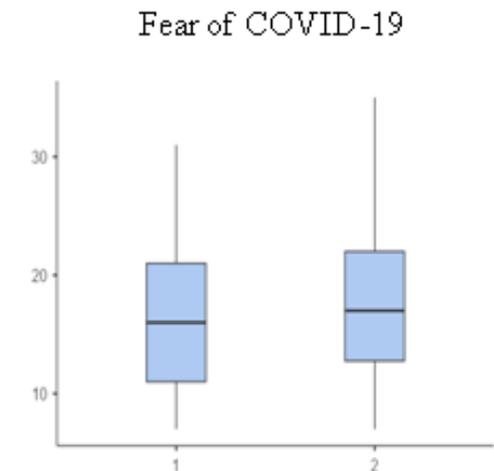
COVID-19-Related Fear, Anxiety, Stress, and Depression

- Overall, 437 students participated in the study: 331 (75.7%) **F** and 106 (24.3%) **M**.
- FCV observed in **49.4%** of students: among **M in 30.2%, F – 55.6%** (**1.8 x** more often).
- Female students had more pronounced level of both the emotional (11.19±3.98 vs. 9.18±4.02) and physiological (6.28±2.85 vs. 5.15±2.87) components of fear (p ≤0.001).
- There was no significant difference in FCV depending on the year of study.
- FCV positively correlated with the level of anxiety (r = 0.361), stress (r = 0.292) and depression (r = 0.255), p <0.01.
- The degree of correlation of FCV with anxiety, stress, and depression was also higher in females compared to males:

Gender	Anxiety	Stress	Depression
Males	0.379	0.308	0.271
Females	0.552	0.405	0.381

FCV Predictors and Related Behaviors

- A more pronounced level of fear was noted among students living with people at high risk (senile age, with comorbid conditions; 17.50±6.99 vs. 15.91±5.92, p <0.05).
- The diagnosis of COVID-19 in students and their relatives was not associated with FCV.
- The level of FCV among students who volunteered or worked in hospitals was the same as who did not.
- Emotional response to FCV was a predictor of
  - social distancing (β = 0.121, p <0.05),
  - emotional support (β = 0.126, p <0.05),
  - physical support (β = 0.145, p <0.05),
  - educational support (β = 0.176, p <0.001).
- The physiological response to fear was a predictor of
  - physical support (β = 0.116, p <0.05).

Fear of COVID-19

Lliving with people at high risk

Conclusion

- FCV observed in half of the respondents, 1.8 times more often in females.
- FCV positively correlated with anxiety, stress and depression.
- Moreover, FCV positively associated with amotivation to study ($p < 0.05$).

- FCV was a predictor of preventive and altruistic behavior among medical students during the COVID-19 pandemic.