



Introduction

- The Malaysian government implemented the Movement Control Order (MCO) to combat the COVID-19 pandemic, which led to the closure of schools, colleges, universities, and educational institutes nationwide.
- UMS enforced school closures to mitigate the COVID-19 pandemic in 2020.
- The sudden change in the learning mode had affected UMS students in both positive and negative ways.

Objectives

- To identify students' perceptions towards online learning.
- To identify the physical and mental health status of students during online learning.
- To identify students' preference towards physical and online learning.
- To compare the preference towards physical and online learning between high and low achievers.

Methods



Cross-sectional study



Oct 2022 - Jan 2023



FSMP, UMS



Non-probability convenient sampling

Inclusion criteria:

- Year 4 (BN19) & Year 2 (BN21) UMS Nutrition students

Exclusion criteria:

- Students who did not participate in online learning during the COVID-19 pandemic

Data collection process:

- Distribute the online self-administered questionnaire via WhatsApp

Statistical analysis:

- Descriptive analysis
- Fisher's exact test (statistical significance at $p < 0.05$)

Conclusion

In conclusion, the respondents have a neutral perception towards online learning, with a majority of them preferring physical learning. The proportion of high achievers that prefers physical learning is higher (38.7%). Though, based on the result of the study, there is no significant difference in the preference towards physical and online learning between high and low achievers.

Results & Discussion



Year 4 = 23 (74.2%)

Year 2 = 8 (25.8%)

Majority

Female = 27 (87.1%) 22 y/o = 17 (54.8%)
Malay = 11 (35.5%) Bumiputera = 11 (35.5%)

Fig 1: Sociodemographic Characteristics

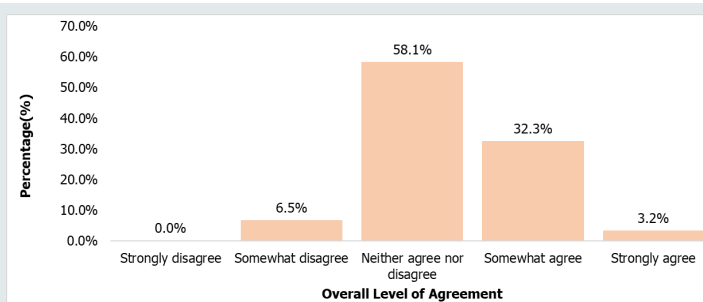


Fig 2: The students' perceptions towards online learning

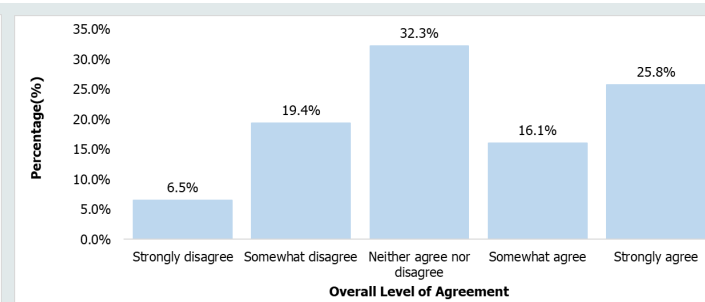


Fig 3: The physical & mental health status of students during online learning

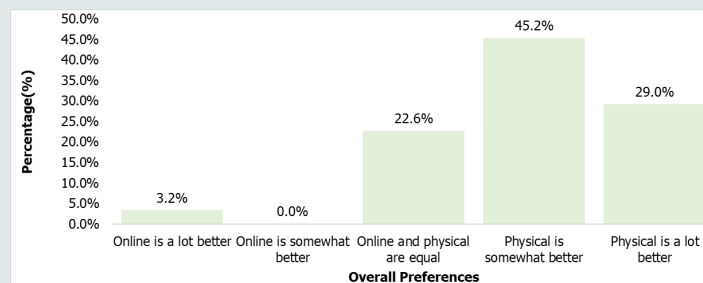


Fig 4: The students' preference towards physical and online learning

	Low achiever	High achiever	<i>p</i> -value (Fisher's Exact test)
Prefer online/neutral	5 (16.1%)	3 (9.7%)	0.685
Prefer physical	11 (35.5%)	12 (38.7%)	

Table 1: Comparison of preference towards physical and online learning between high and low achievers

- Blizak et al. reported that the students showed a negative perception towards online learning and favoured physical learning [1].
- Li et al. showed that anxiety is the most prominent mental issue with a prevalence of 66% among the students. Besides, the students also claimed that they have physical health problems such as eye strain and cervical stiffness as a result of online learning [2].
- Menon et al. mentioned that the undergraduate medical students in India indicated the online learning only provided moderate satisfaction and wished to pick up regular physical education sessions again, particularly for practicals and clinics [3].

Reference

- Blizak et al. *Journal of Chemical Education*. 2020. 97, 2466–2471.
- Li et al. *Sustainable Cities And Society*. 2022. 83, 103958.
- Menon et al. *Medical Journal Armed Forces India*. 2021. 77, S227–S233.