

INTRODUCTION

- A fad diet is a popular diet that is “too good to be true” and promises weight loss results. Promoted fad diets are often unattainable, not well-rounded or balanced, and do not support long-term weight loss success [1].
- In the present day many people spend much of their time on social media. Social media use is extremely popular, with an estimated 94% of Canadians having an account on at least one platform and around 42% of individuals using social media to seek food-related advice [2].
- Modern social media platforms allow unregulated misinformation to be shared at a rapid rate [3]. Fad diet misinformation is no exception to this. Therefore, it is important to continually consider how social media platforms can influence their users’ diet behaviours.

OBJECTIVE

- The purpose of this study is to investigate the consumption of nutrition information from social media by the University of Saskatchewan community and how it may relate to the level of nutrition education participants received in primary and secondary school.

MATERIALS & METHODS

- This study used a survey that consisted of seven demographic questions and five questions that investigated social media use, nutrition information, and fad diets. Multiple choice (single and multiple response) and slider scale answer formats were used.
- The online survey used was hosted on SurveyMonkey.
- Participants included in this study were current students, staff, faculty members, and post-doctoral fellows of the University of Saskatchewan.
- Participants were recruited through the University of Saskatchewan’s PAWS website via an advertisement that remained active from October 20th 2022 - November 2, 2022. They were also recruited by student researchers through social media, direct messaging, and email advertising during this time period.
- The survey results were analysed by generating descriptive statistics using Microsoft Excel.
- This study received ethics approval from the University of Saskatchewan Behavioural Research Ethics Board (BEH 291).

RESULTS

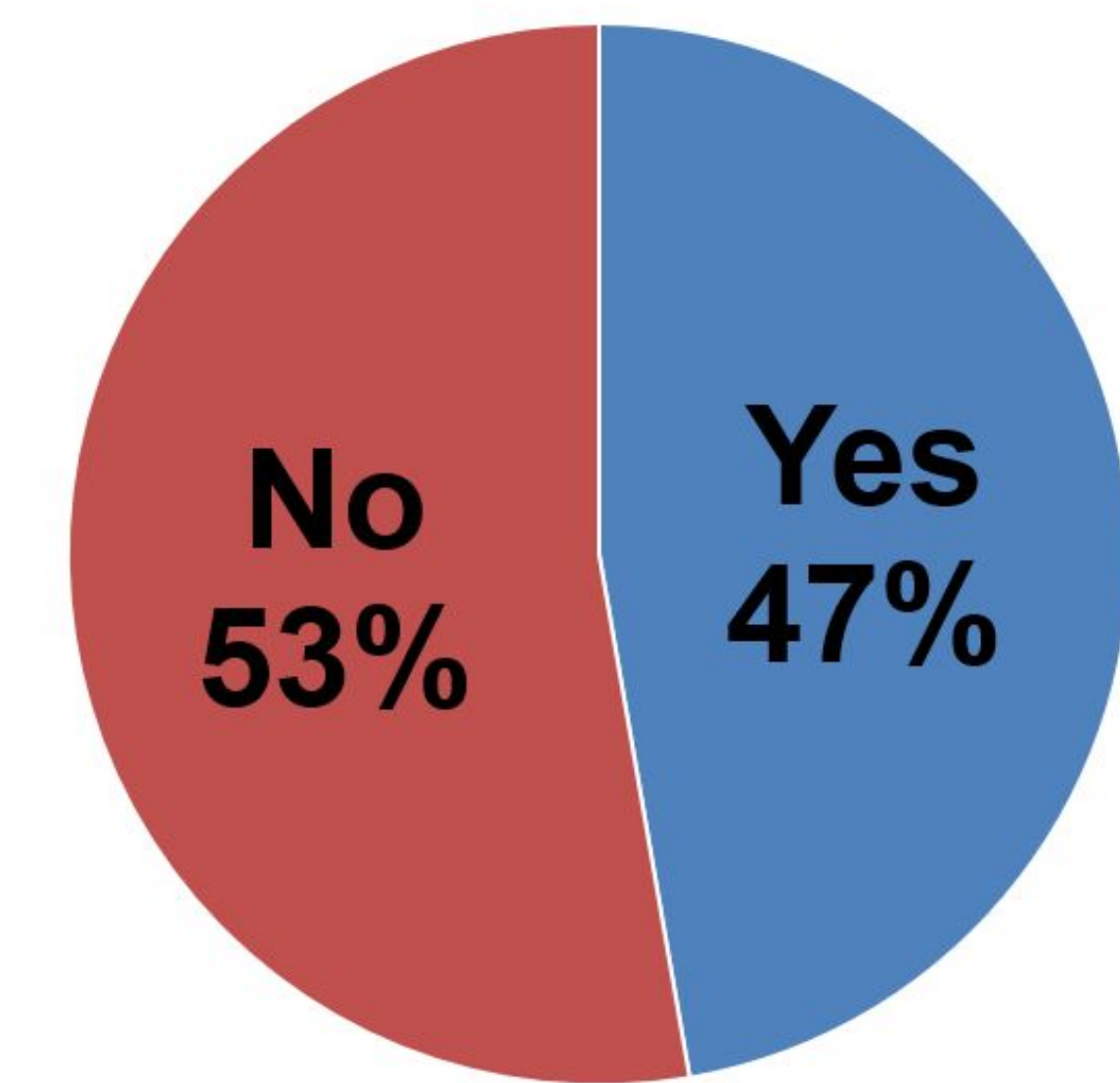
Data Cleaning:

- Of the n=204 participants who took the survey, n=176 participants gave consent and responded to the demographic questions. n=165 participants answered the demographic questions and one or more survey questions and were included in the study demographics.

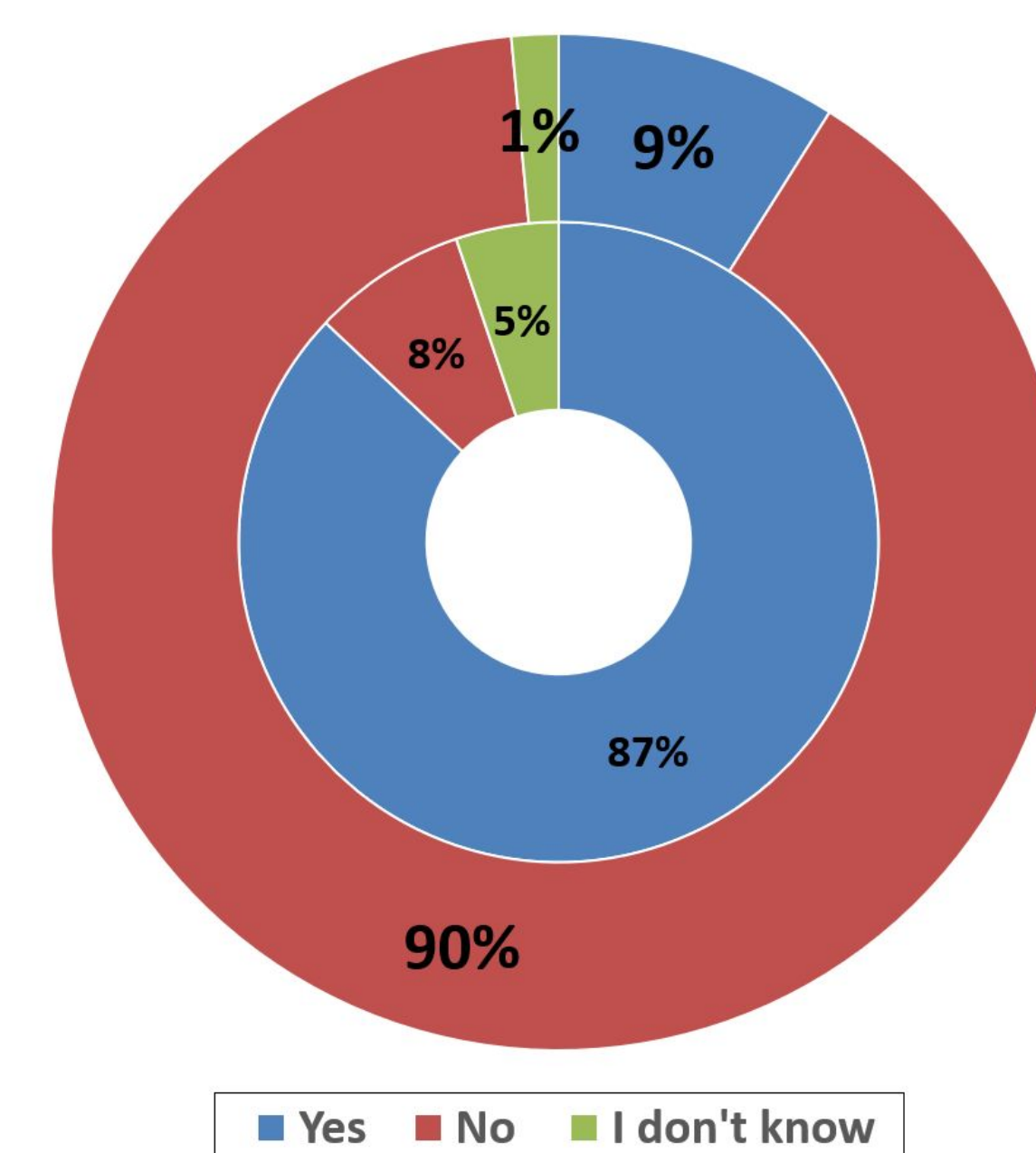
RESULTS

Demographic:	n (%)*
Gender Identity	
Man	34 (20.6%)
Woman	125 (75.8%)
Non-binary	2 (1.2%)
Trans Man	2 (1.2%)
Prefer not to disclose	2 (1.2%)
Age (years)	
17 - 22	81 (49.1%)
23-29	34 (20.6%)
≥ 30	50 (30.3%)
Position at U Sask	
Student	121 (73.3%)
Staff/Faculty member	44 (26.7%)
Agreement with statement: "I was well educated on nutrition in my primary and secondary education."	
Strongly disagree	14 (8.5%)
Disagree	56 (33.9%)
Neither agree nor disagree	32 (19.4%)
Agree	55 (33.3%)
Strongly agree	8 (4.8%)
Have you taken a basic nutrition course at the University level?	
No	118 (71.5%)
Yes, I have completed one of these courses (e.g., NUTR 120)	43 (26.1%)
Yes, I am currently registered in NUTR 120	4 (2.4%)
Member of a health science college	
Yes	57 (34.5%)
No	108 (65.5%)

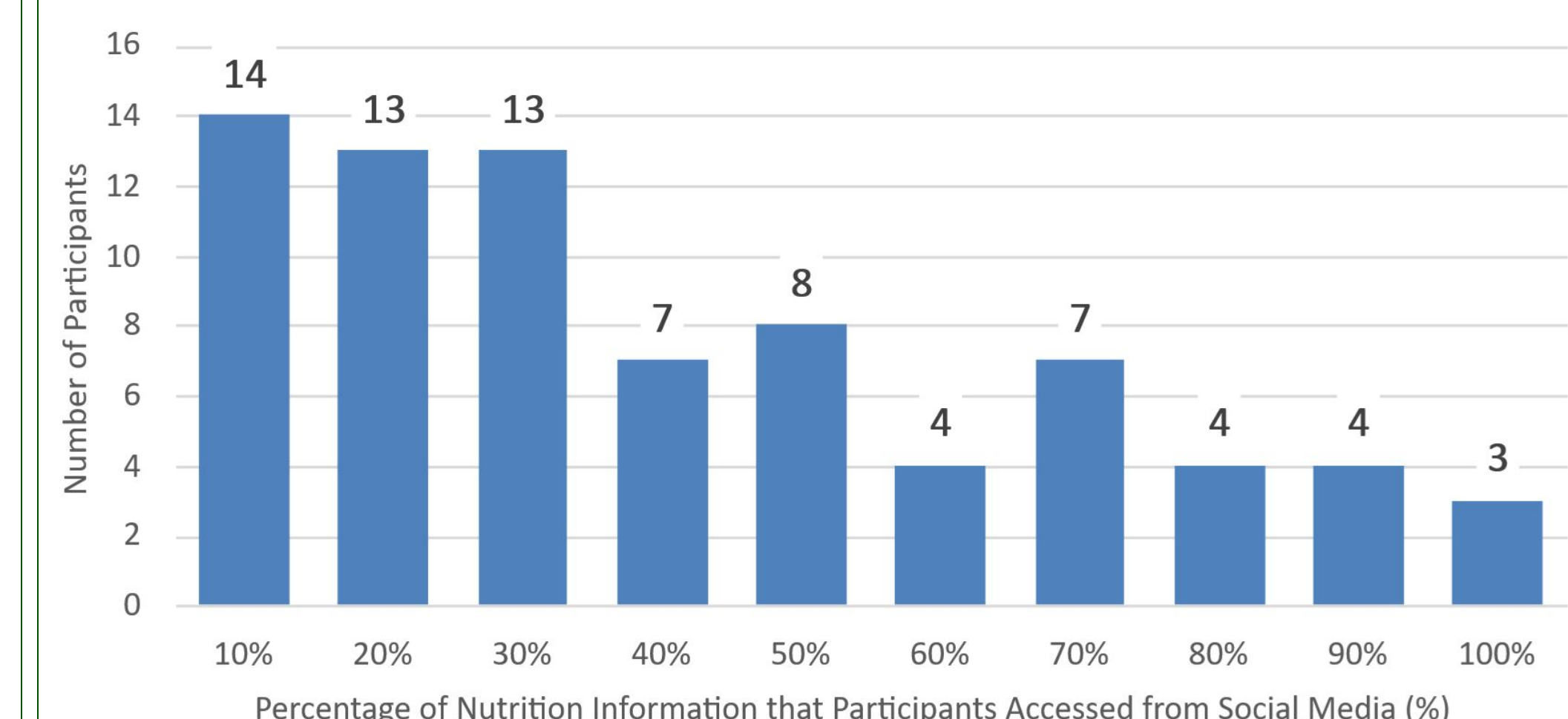
"In the last year, have you used social media to access nutritional information?"



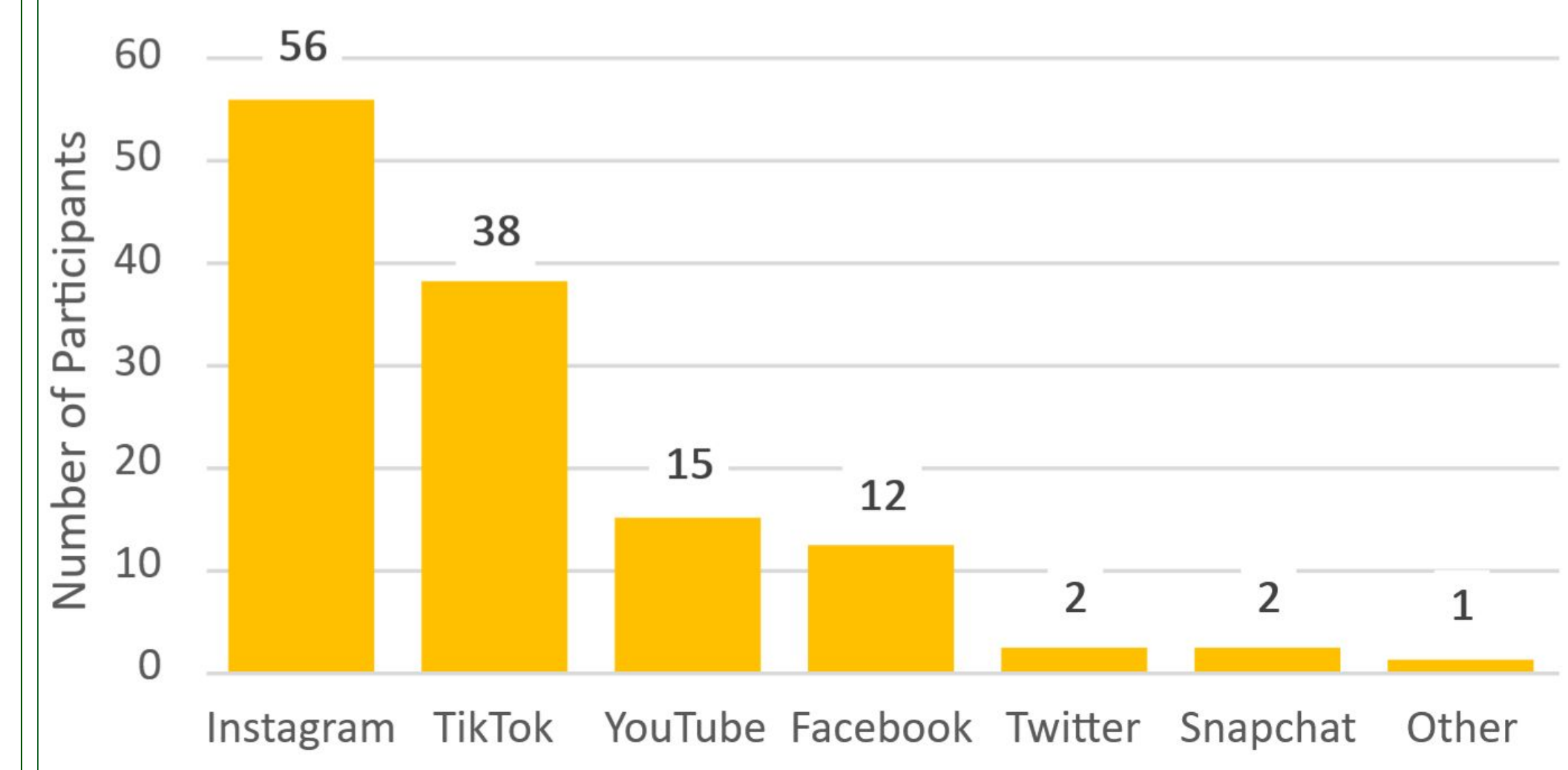
Participants that Saw Fad Diet Content on Social Media (inside) vs. Participants that Tried a Fad Diet They Saw on Social Media (outside):



"In the last year, what percentage of the nutritional information that you have accessed is from social media?"



Social Media Platforms* Participants Reported Seeing Fad Diet Information On Most Frequently



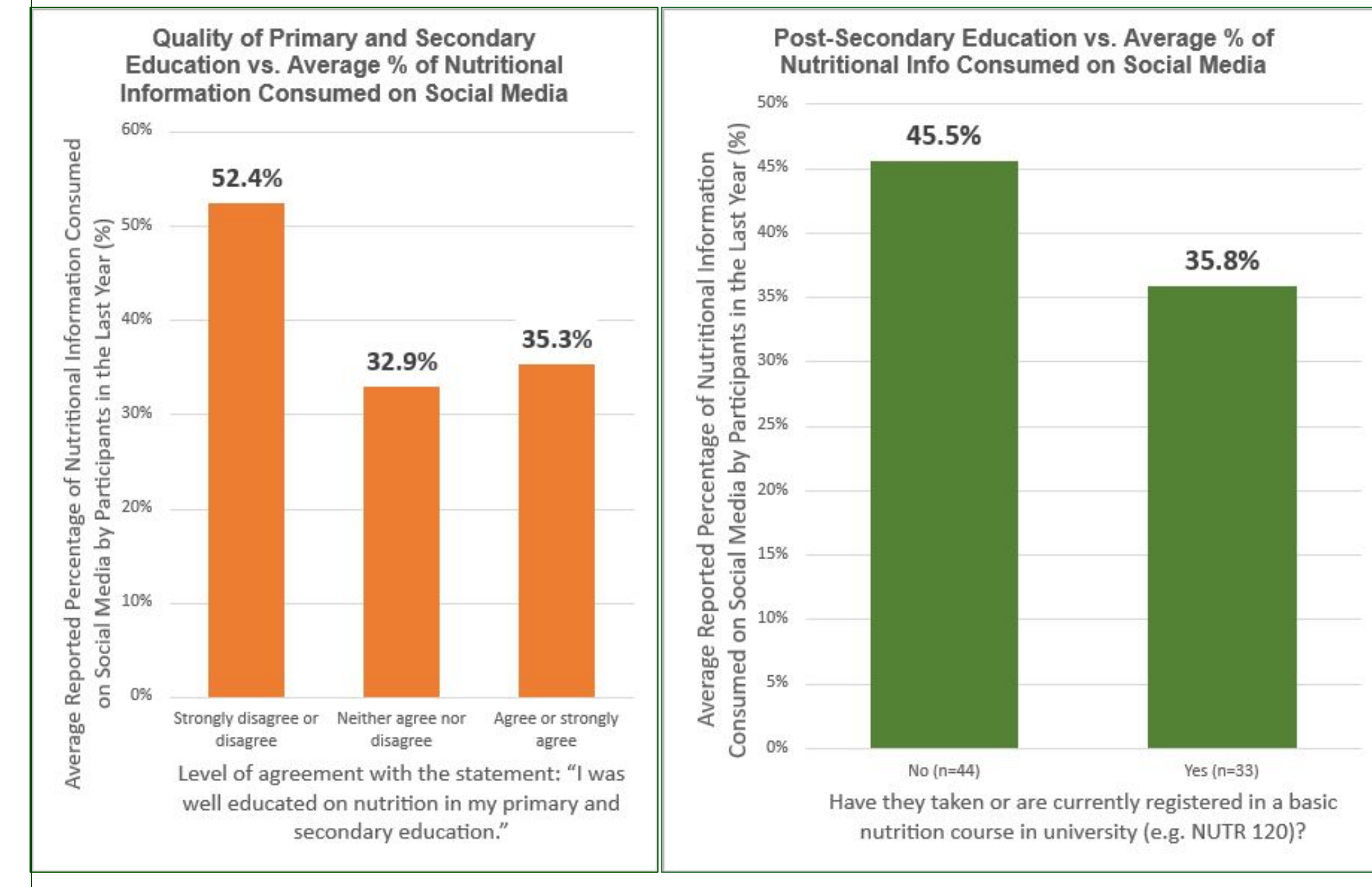
*participants could choose up to two options

RESULTS

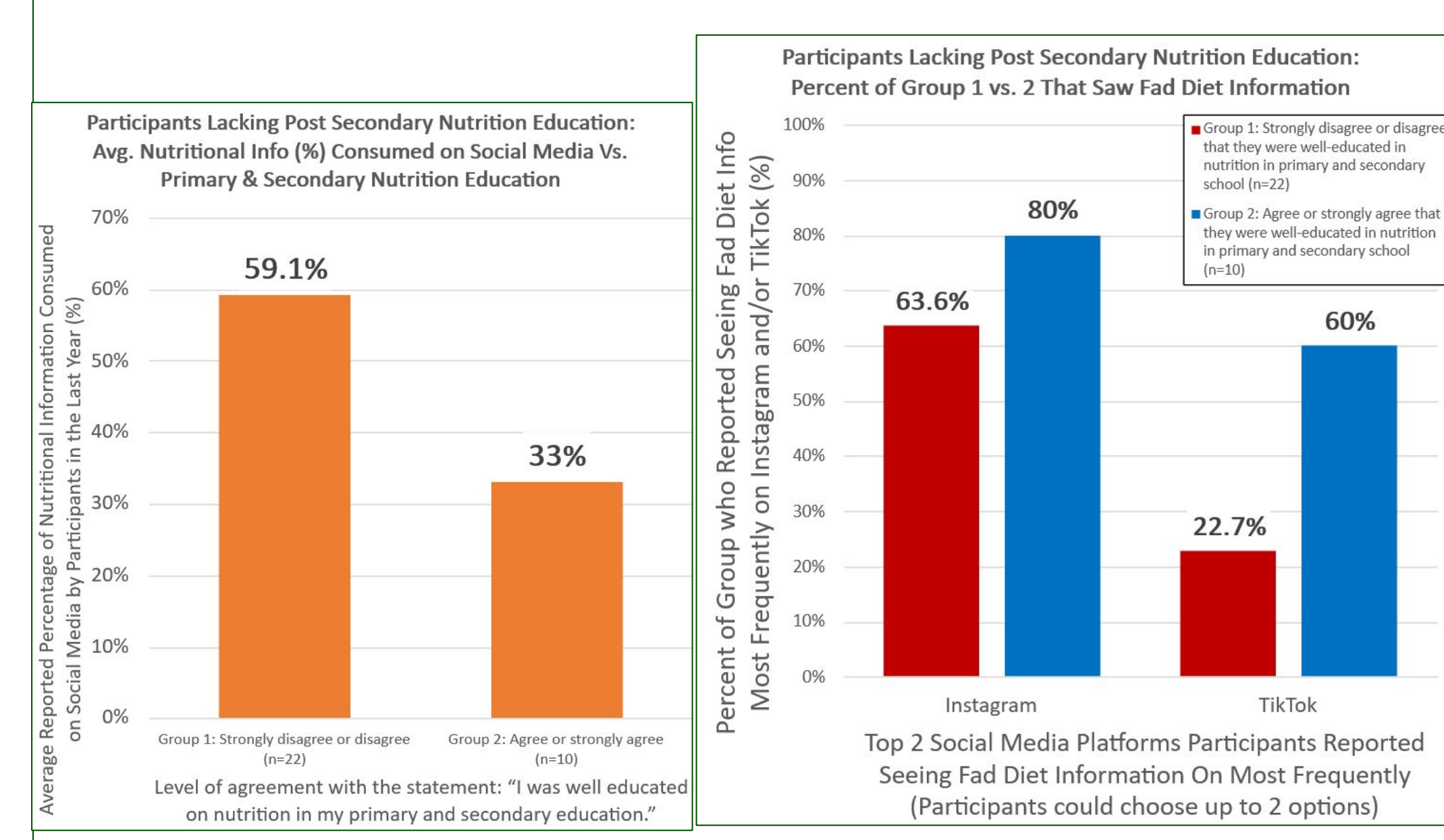
Comparison 1: Average Percentage of Nutrition Information Taken from Social Media vs. Membership or Non-membership in a Health Science College

- Participants who were not members of a health science college accessed on average 45.3% of their nutrition information from social media. Participants who were members of a health science college accessed on average 37.0% of their nutrition information from social media.

Comparison 2: Education, Percentage of Nutrition Information Taken from Social Media, and the Top 2 Social Media Platforms where Fad Diet Information was Seen Most Frequently



Participants Lacking Post-Secondary Nutrition Education:



Comparison 3: Percentage of Nutrition Information Taken from Social Media: Students vs. Faculty/Staff

- On average, students accessed 40.5% of their nutrition information from social media and faculty/staff accessed 45.0% of their nutrition information from social media.

DISCUSSION & CONCLUSION

- Despite the presence of nutrition education programs in schools across Canada, the implementation of these programs has been met with barriers [4]. This suggests that students may not be receiving enough effective nutrition education in school before they enter secondary education.
- Comparison 1:
 - Members of a health science college accessed less nutrition information from social media than participants who were not members of a health science college.
 - Members of a health science college may receive more education on how to assess the reliability of health information.
 - To improve health and media literacy, researchers suggest cultivating critical thinking to help individuals evaluate information credibility [3].
- Comparison 2:
 - Group 1: Felt like they had not been well educated on nutrition in primary and secondary school and had not taken a basic nutrition course in university.
 - Group 2: Felt like they had been well educated on nutrition in primary and secondary school and also did not take a basic nutrition course in university.
 - Group 1 accessed more nutrition information from social media than group 2.
 - Nutrition education programs in elementary and high schools may be important for creating good information seeking habits.
 - Group 1 selected Instagram and TikTok as places that they see fad diet information less often than Group 2. Group 2 may be better at recognizing fad diet information, thus indicate seeing it more often.
 - Instagram was chosen as the platform fad diet information was seen on most often by both groups of participants, regardless of how well-educated they felt they were on nutrition in primary and secondary school. Similarly, another study found that 79% of participants reported using Instagram for viewing dietary-related social media content [4].
- **This study investigated the prevalence of seeing fad diet information on social media in the UofS community. When it comes to accessing nutrition information on social media and recognizing fad diet information, education may be a crucial factor to consider.**
- Limitations:
 - Skip questions caused a small sample size of 77 participants for many of the analyses.
 - Students vs. faculty/staff regarding nutrition information accessed on social media.
- Suggestions for future research:
 - Effects of primary, secondary and post-secondary education on judgement of validity of nutrition information viewed social media.
 - Students vs. faculty regarding nutrition information accessed on social media.

REFERENCES

- [1] UnlockFood.ca. (2020, October 6). Get the facts on fad diets. <https://www.unlockfood.ca/en/Articles/Weight-and-Health/Get-the-Facts-on-Fad-Diets.aspx>
- [2] Gruzd, A., Jacobson, J., Mai, P., & Dubois, E. (2018). The state of social media in Canada 2017. *Ryerson University Social Media Lab*. <https://doi.org/10.5683/SP/AL.8Z6R>
- [3] Wang, Y., McKee, M., Torbica, A., & Stuckler, D. (2019). Systematic literature review on the spread of health-related misinformation on social media. *Social science & medicine*, 240, 1-12. <https://doi.org/10.1016/j.socscimed.2019.112552>
- [4] Lee, H. R. (2021). *The Impact of Dietary-Related Social Media Content on College Students* (Order No. 28719153). Available from ProQuest Dissertations & Theses Global. (2605612207). <http://cyber.usask.ca/login?url=https://www.proquest.com/dissertations-theses/impact-dietary-related-social-media-content-on-college-students/2605612207/se-2>
- [5] Vine, M.M., Harrington, D.W., Butler, A., Patte, K., Godin, K. & Leatherdale, S.T. (2017). Compliance with school nutrition policies in Ontario and Alberta: An assessment of secondary school vending machine data from the COMPASS study. *Canadian Journal of Public Health*, 108(1), 43-48. <https://doi.org/10.17269/cjph.108.5701>
- [6] Young, J. L., Meimaris, S. A., Petryk, J., & Voykin, J. (2022, November 17). Fad diets in the University of Saskatchewan community. <https://doi.org/10.17805/OSF.IO/BE9SX>
Included: data dictionary, research and survey questions, introduction and methods.