

**Study Report from the University of Lethbridge campuses**

**Spring 2021**

University of  
**Lethbridge**



# **Academic Dishonesty and Remote Learning during the COVID-19 Pandemic**

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## ETHICS APPROVAL

Human Subject Research Ethical Review and approval was obtained from the University of Lethbridge Human Subject Research Committee (Protocol #2019-084).

# ACADEMIC DISHONESTY AND REMOTE LEARNING DURING THE COVID-19 PANDEMIC

## INTRODUCTION

Concerns about maintaining academic integrity within postsecondary institutions are hardly new. Literature has demonstrated that educators and administration have been apprehensive about rising rates of academic dishonesty for many decades (Bacon et al. 2019; Davis et al. 1992; MacLeod & Eaton 2020; McCabe & Trevino 1997; Yeo 2007). Much of the literature around academic dishonesty has explored the possible internal factors or student demographics that may influence the decision to be academically dishonest. Gender, age, cultural background, learning styles, motivations for education, and moral and personal characteristics have all been examined within the literature to understand their relationship to academic dishonesty. However, the rapidly developing environment of higher education has reframed how many educators are conceptualizing and addressing the concerns of academic dishonesty within their classrooms. New forms of technology, the broader inclusion of blended or remote learning models, increasingly overextended educators and shifting student attitudes towards academic dishonesty have all raised unique questions in the decades-old challenge of maintaining academic integrity within postsecondary institutions (Bacon et al. 2019; Chiang, Zhu & Yu 2022; Yu, Glanzer & Johnson 2021). While literature examining academic dishonesty in Canadian postsecondary institutions is severely limited compared to other Western institutions, this hardly means that our institutions are unaffected by it (Jurdi, Hage & Chow 2011; MacLeod & Eaton 2020). In an initial international survey of rates of contract cheating, Canada was found to be in the top 4 countries in which students were paying third parties for original work to claim as their own (Clarke & Lancaster 2006).

Concerns about increased rates of academic dishonesty continued to escalate during the sudden transition to a primarily remote learning model in March 2020 as a response to the COVID-19 pandemic, which many institutions, administration, educators, and students were grossly unprepared for. All levels of postsecondary education faced a period of dramatic upheaval while adjusting to this unfamiliar and unexpected model of education. While short term emergency transitions to different models of teaching have occurred in response to disturbances such as natural disasters or political unrest (Ayebi-Arthur 2017), this type of global shift in education delivery is unprecedented, and the long-term effects on higher education are yet to be fully understood. Like most institutions, the University of Lethbridge also underwent this emergency transition during the Spring 2020 semester. Educator concerns about the potential difficulty of maintaining academic integrity in online classrooms became central to many of the discussions around this transition, including the decision to abstain from the use of proctoring software at our institution.

In previous research conducted at the University of Lethbridge (hereafter referred to as the “Fall 2019 survey/focus groups”), we discovered that our students engaged far less in academically dishonesty behaviours compared to other Canadian postsecondary institutions, particularly with serious academic offences such as contract cheating (Awosoga et al. 2021a; Lancaster 2019). However, with the conversation

around academic integrity shifting to address the concerns evoked by the remote delivery model required by the COVID-19 pandemic, the research team was presented with a unique opportunity to revisit and expand upon some of the questions from our original study. Literature about academic conduct within online course delivery is lacking, particularly amongst Canadian postsecondary institutions; while the emergency transition to remote delivery models is not entirely comparable to courses designed entirely for online delivery, the research team had the chance to better examine other factors that influence a student's decision to be academically dishonest. Using the results from our first institutional self-study, we designed a second survey to learn more about the academic conduct of our students in the remote delivery model and how their educational experiences were impacted by the COVID-19 pandemic. We outline each question below.

## MAIN QUESTIONS

*Question 1: How often do students engage in other forms of academic dishonesty beyond contract cheating and self-plagiarism?*

In the Fall 2019 survey, we only questioned students about their engagement with three kinds of academically dishonest practices: contract cheating (turning in an assignment that someone else completed), paid contract cheating (turning in an assignment someone else was paid to complete), and self-plagiarism (reusing an assignment from a previous course). In our current survey, we added additional options for other academic offences to broaden our understanding of the types of academic dishonesty that occur on campus. We identified 12 forms of academic dishonesty from open-ended responses to a question on the Fall 2019 survey, such as failing to cite sources or copying another student's work.

*Question 2: Is there a relationship between student demographic attributes and engagement in academic dishonesty?*

One possibility for lower rates of academic dishonesty that we identified was a possible relationship between student attributes or histories (e.g., culture) and engagement in academic dishonesty. Much of the previous literature has examined the relationships between student characteristics (such as gender, age, learning style, etc.) and academic dishonesty. For example, correlation has been found between English proficiency and engagement in academic dishonesty; similar correlation has been found for junior undergraduates who have yet to learn the basics of academic writing or lack the skills to navigate often opaque academic integrity policies (Evans-Tokaryk 2014; Pecorari 2015). To address this, we incorporated items that allowed students to self-identify to a variety of demographic attributes that we had identified as possible attributes that affect engagement in academic dishonesty to determine any potential correlation.



*Question 3: How do students perceive the University of Lethbridge's academic culture?*

There is good evidence that the academic culture of an institution impacts students and their perception of academic dishonesty (Bertram Gallant & Drinan 2008; MacLeod & Eaton 2020; McCabe 1993). To gain insight into students' perception of academic culture at the university, we questioned students on a variety of factors that shaped their connection to campus. To further round out our understanding of student academic integrity, we also explored students' familiarity with online "tutorial sites" such as CHEGG and CourseHero prior to the change to remote learning. In the focus groups, students reflected on how the transition to online learning has affected their sense of community within the university population.

*Question 4: Is there a relationship between the remote learning environment, initiated in response to the COVID-19 pandemic, and engaging in academic dishonesty?*

To understand if the remote learning environment influenced engagement with academic dishonesty, we asked students if they believed the opportunity and pressure to engage in academic dishonesty had increased since the university transitioned to primarily remote delivery in March 2020. This was of particular interest due to the increase in reports of academic misconduct in the first few months of remote delivery. We also felt it was important to understand how lockdown impacted student quality of life; the combination of increased everyday demands, lower quality of life, and a perceived increase in course workloads could compel typically honest students to engage in academically dishonest behaviour. We framed many of our follow-up survey questions about the transition to remote learning and utilized student focus groups to discuss their experiences to explore these ideas further.

*Question 5: Are educators changing their approaches and/or responses to academic dishonesty as a result of the COVID-19 pandemic-initiated remote learning model?*

To further improve our comprehension of academic dishonesty on campus, educator questions were also framed around their experiences with academic dishonesty in the remote learning model.

Educators were initially asked to report rates of observed and/or reported incidents of academic dishonesty. Unlike the previous study, an attempt was made to explore the frequency of cheating by inquiring about the number of academic dishonesty incidents witnessed per semester. The frequency of reporting since the transition to remote delivery was also examined. These were both addressed in response to the increase in reported academic offences during the first semester of remote delivery. Educators were also provided with the same list of academic offences as students to provide further insight into what forms of academic dishonesty were repeatedly observed. We then explored if and how educators had modified their approaches to maintain academic integrity in the online learning model. Focus groups were also conducted with educators to further examine these ideas.

*Question 6: Do students and educators support the university's decision not to use online proctoring software?*

Shortly after the university transitioned to a remote learning model in March 2020, we wrote a set of faculty guidelines addressing several questions concerning the challenges of teaching in an online environment (see Appendix B). These guidelines were created to support faculty during the remote learning model as we moved from the emergency transition phase to longer term online learning. One result of our memo, along with input from university educators, was the university's decision not to purchase a university license for online proctoring software. This contrasted with the approach employed at many universities across Canada and the United States (Kimmons & Veletsianos 2021; Kujath et al. 2020). Given this decision, we also took the opportunity to ask students and educators if they agreed with this decision.

## University delivery during the Spring 2021 semester and official reports of academic misconduct

During the Spring 2021 semester in which our research took place, 8,153 students were enrolled at the University of Lethbridge, with 87.4% attending full-time, and 12.6% attending part-time. A total of 176 courses were offered face-to-face, and 968 offered online. Of the online courses, 134 were offered asynchronously, and 1,010 offered synchronously (Figure 1, Appendix C). These numbers were comparable to the enrollment numbers of the Fall 2020 semester.

## METHODS

### Survey

Participants were invited via university-wide emails from the end of February to the beginning of April in the Spring 2021 semester to participate in two university-wide surveys, one targeting students and the other educators. Using the online survey software Qualtrics, we included items investigating participant demographics and beliefs and perceptions regarding academic dishonesty at the University of Lethbridge. Respondents were then asked to describe their perception of academic dishonesty after the transition to remote learning due to the global COVID-19 pandemic. Students were asked to frame their answers within the university definitions of plagiarizing, cheating, and duplication, all of which we provided in the survey itself. Results were then compared to the Fall 2019 semester survey to determine how academic dishonesty had changed after the shift to remote learning.

## Students

The research team received 1,239 responses from the student survey. As outlined above, we were curious about the possible relationship between student attributes and academic dishonesty. To explore this, we had students report several personal characteristics. For demographics, students were asked to report their age, gender identity, year of postsecondary experience, and degree program.

Given the unexpectedly low rates of academic dishonesty in the Fall 2019 survey, we added additional questions to determine potential student factors that may have mitigated engagement in academic dishonesty. Questions that addressed individual traits included primary residence before attending university, the primary language spoken with family and friends, proficiency in speaking, reading, and writing English, and the highest level of education attained by their parent(s)/guardian(s). Students were then asked about their connection to the University of Lethbridge campus, including reasons for choosing to attend the university, satisfaction regarding their access and connection to faculty, and their membership in university-related groups. To understand how they perceived academic dishonesty amongst their peers, respondents were asked if they agreed that student academic honesty is important, and to estimate the percentage of students they believed were engaged in academic dishonesty on campus.

Students were asked if they had witnessed their peers engaging in or had engaged themselves in academically dishonest activities *without explicit permission to do so*. If they had witnessed or engaged, they were asked to report from the list of 12 activities to establish what types of academic dishonesty are most common on campus. Students were given a 13<sup>th</sup> option to report if they had not witnessed or engaged in any forms of academic dishonesty. This list was designed to capture more than just serious academic offences such as contract cheating and plagiarism by examining other activities that could potentially be academically dishonest depending on class context and instructor permission. To determine potential factors behind academic dishonesty, students were provided a list of 14 potential motivations derived from focus groups conducted before the transition to remote learning (Awosoga et al. 2021b; Awosoga et al. 2021c) and asked to select what they believed to be the top 3.

Students were also asked questions regarding changes in their quality of life, everyday demands, and course-related workloads to determine additional factors related to the COVID-19 pandemic that may have caused student academic dishonesty. Regarding their perception of rates of academic offences, students were asked if they believed the opportunity to commit academic offences had increased since the transition to remote learning, and if they felt pressured to participate themselves. Finally, students were asked if they agreed with the university's decision against the use of proctoring software during remote learning. We ensured students were familiar with the university's understanding of plagiarism, cheating, and duplication by providing the definitions stated in the 2020-2021 University of Lethbridge Academic Calendar (see Appendix A) at the beginning of the survey.

## Educators

112 educators responded to the faculty survey. Educators were asked to report

comparable demographic information as students. Educators were asked to provide their gender identity, their current teaching position at the university, their years of post-secondary teaching experience, and their teaching discipline.

Educators were also asked their beliefs on the importance of student academic honesty, their estimation of the percentage of academically dishonest students, and their perception of rates of academic dishonesty in the online model. Educators were provided with the same list of academic offences as students to report what types of offences they had witnessed since the transition to remote learning, and their rates of reporting these incidents. Additionally, educators were also asked if and how their approach to academic dishonesty had changed due to being primarily online, including communication to students about academic dishonesty, vigilance for offences, and reporting of incidents. Like the students, educators were also asked if they agreed with the university's decision regarding the adoption of proctoring software.

## Survey Open-ended Questions and Focus Groups

We conducted five focus groups in the summer of 2021 – three student groups, and two faculty. There were 12 participants across the 5 focus groups with roughly equal numbers of males and females in each group. In the student focus groups, there was a larger representation from differing faculties; students from the faculties of Health Sciences, the Dhillon School of Business, Education and Arts and Science all participated. However, faculty participants only came from the Faculty of Arts and Science, which is the largest faculty at the University with 18 departments. All meetings were conducted virtually over the university's Zoom platform for the safety of all participants due to the COVID-19 pandemic. All meetings were recorded and transcribed.

Student questions were oriented around their beliefs about online course delivery compared to in-person learning, including the impact of remote learning on their personal and academic lives. Another area of interest was student perceptions of academic dishonesty in the remote delivery model. Students were asked if they believed there were more opportunities to commit academic offences, if they agreed with definitions of academic dishonesty regarding online resources (i.e., search engines, class forums, Discord, etc.) and if there were types of assignments that made committing academic offences easier. Finally, they were provided the opportunity to give suggestions for preventing academic dishonesty for instructors and administrators based on their experiences.

Educators were asked to reflect on challenges to maintaining academic integrity since the transition to remote learning, the most common form of academic dishonesty they had witnessed, and if they believed rates of academic dishonesty had changed compared to in-person delivery. Questions focused on addressing academic offences were also asked, including if they had received training about academic integrity in online learning and how they had chosen to modify course delivery to protect against academic dishonesty. Educators were also asked how often they chose to report offences, and if this had changed during online delivery. Finally, educators reflected on their experiences during remote learning to provide suggestions to the administration

about combating academic dishonesty.

All transcripts were then coded in the NVIVO 12 qualitative analysis software. Preliminary coding of the participant responses used content analysis to sort different responses. All open-ended survey responses were also coded using content analysis in the NVIVO 12 qualitative analysis software. A comprehensive thematic analysis of the open-ended response codes was conducted, and the focus group codes for both students and educators were categorized to the different responses at the question level. All transcripts were coded separately and analyzed to identify the unique themes produced by each question for each group (i.e., students and educators).

## RESULTS

### Survey

Many of the demographics surveyed for both students and faculty were remarkably similar to our 2019 survey. The respondents were found to be a general representation of the student and faculty body. Most student respondents (62.4%) reported being from the 20-29 age group. The second largest age group students identified themselves from was the <19 (20.9%), with remaining respondents being from the 30-39 (11.5%), 40-49 (3.0%), 50-59 (1.50%), 60-69 (0.7%), and the 70+ (0.2%). Student respondents were also primarily female (57.4%), while 35.9% identified themselves as male, 3.3% identified as nonbinary, and 3.4% did not wish to disclose their gender identity. In terms of academic year, the largest group of students reported being in their 3<sup>rd</sup> year of their undergraduate degree (24.8%). However, respondents varied in this demographic more than gender and age, with 20.0% being in the first year of their undergraduate degree, 17.5% in their second year, 18.4% in their 4<sup>th</sup> year, and 10.1% in their fifth or higher. Only 9.2% of the respondents reported that they were graduate students. Like the Fall 2019 survey, the largest proportion of student participants were from the Faculty of Arts & Science (56.5%), while 17.8% of respondents were from the Dhillon School of Business. The remaining participants reported that they were from the Faculty of Education (9.7%), Fine Arts (7.8%), and Health Sciences (6.5%). 1.7% of student respondents identified themselves as completing either a combined degree, or outside of the listed faculties.

Like the 2019 survey, faculty were more evenly distributed in their gender identity, with 47.5% identifying as male and 44.6% identifying as female. 1.0% of faculty identified as non-binary, and 6.9% did not wish to disclose their gender identity. When asked about their current teaching position at the university, 30.0% reported that they were full-time academic assistant/instructors. 27.0% of faculty reported that they were currently associate professors, 17.0% were professors. The remaining faculty respondents reported their current teaching positions as sessional instructors (11.0%), assistant professors (9.0%), term appointments (5.0%), and emeritus (1.0%). Most of the faculty respondents (29.7%) reported having between 11-20 years of postsecondary teaching experience. 24.6% reported having between 21-30 years of experience, 21.8% had 5 or fewer years of experience, and 12.9% reported 6-10 years of experience. Only 10.1% of faculty had 31 or greater years of experience.

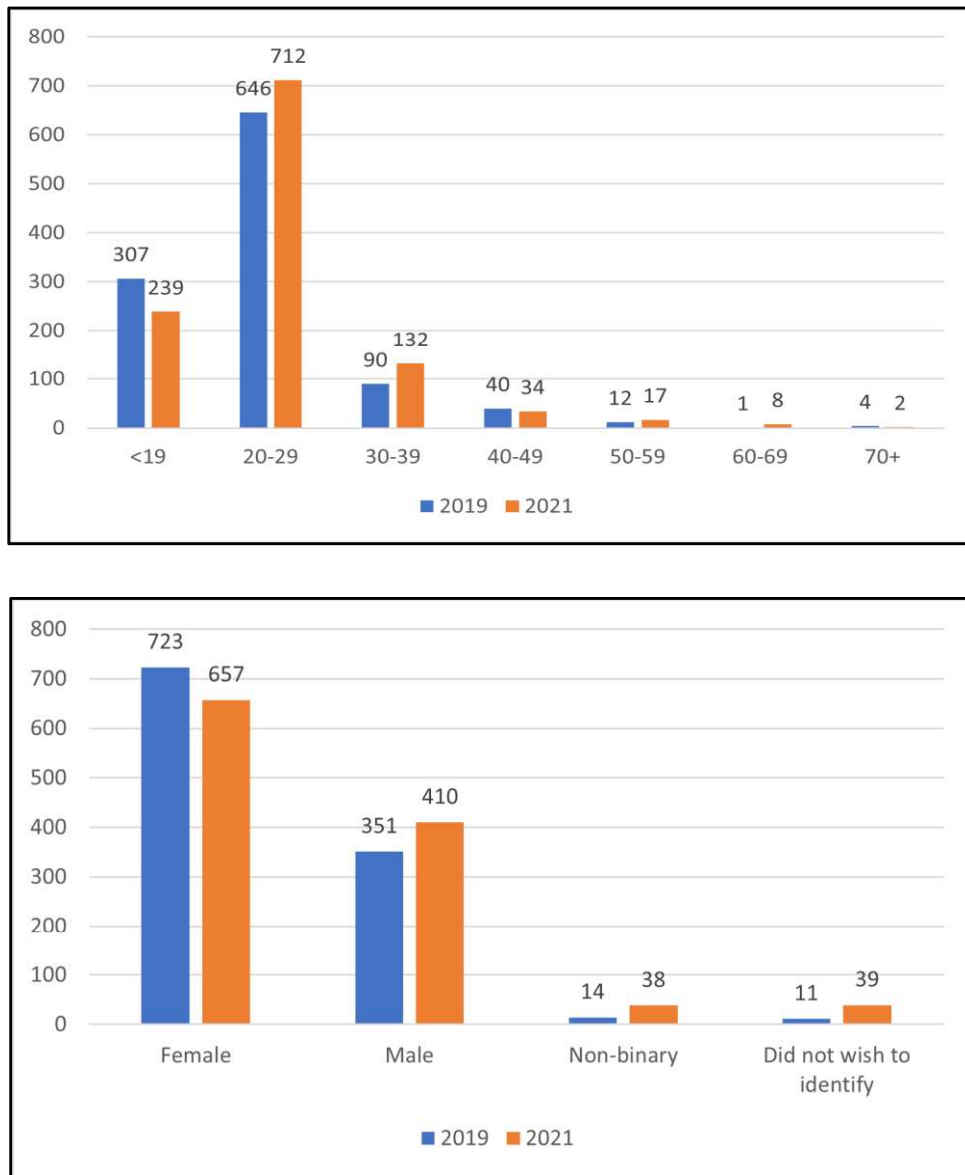


Figure 1. Age and Gender Identity of Student Respondents.

## Student Attributes

Most students (86.7%) reported Alberta as their primary residence before attending university, with just under half (41.7%) from the Lethbridge/Southern Alberta region. Almost 6% of respondents resided in other Canadian provinces, while international students accounted for only 5.4% of respondents (Figure 2). Most student participants (94.1%) reported that they spoke English with family and friends, and that they were proficient in speaking (87.6%), reading (87.8%), and writing (80.3%) English. When asked about parent/guardian education, half reported that their parent(s)/guardian(s) had received a bachelors-level degree or above, with 28%

reporting that at least one parent had earned a bachelor's degree, 6.8% a professional degree (e.g., law, medical), and 15% a graduate degree. Only 1.5% reported that their parent(s)/guardian(s) had not completed any secondary education (Figure 3).

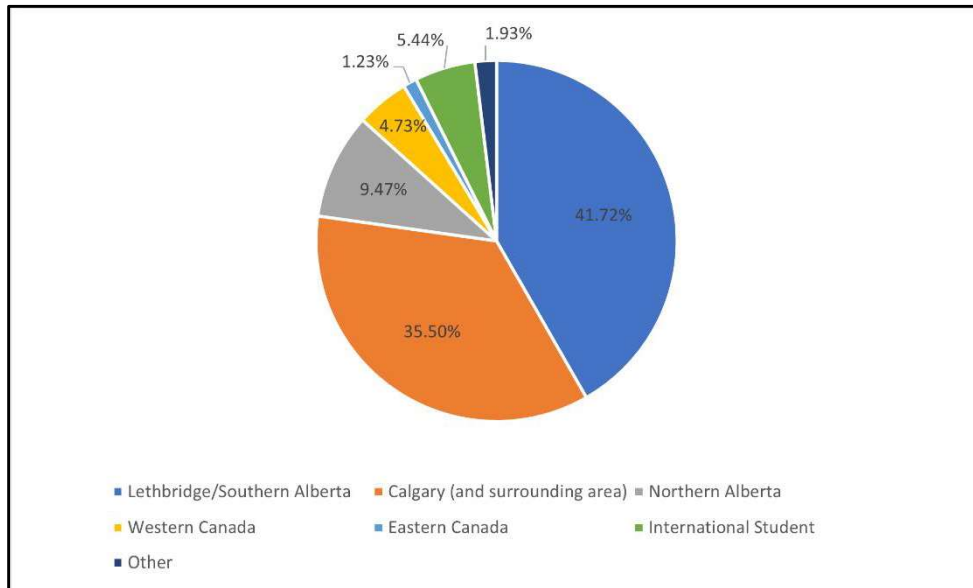


Figure 2. Student Residence Before Attending University.

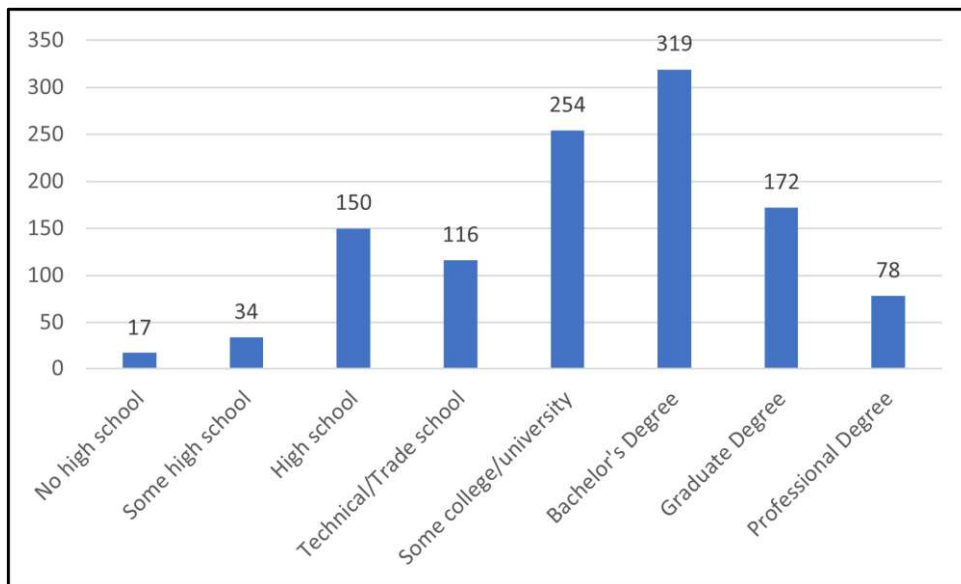


Figure 3. Highest Level of Education Attained by Parents/Guardians of Respondents.

### Student Perceptions of and Connection to the University of Lethbridge

Over two-thirds of student respondents (67.5%) reported that the University of Lethbridge was their first choice when applying to university, with more than half choosing the university because of its reputation (54.6%). Just under half reported that class size was also a contributing factor in their decision, with 43.5% agreeing that they

chose the university over others because of this (Figure 4).

Regarding the connection students felt with the University of Lethbridge, 72.3% reported that they were satisfied with the access to faculty they had at the University of Lethbridge. 54.5% agreed that they felt a sense of connection with their instructors/faculty, and 44.7% stated they felt a sense of belonging with the University of Lethbridge community. Only a minority of students reported that they were unsatisfied with their access to faculty (14.6%), did not feel a sense of connection to them (22.6), and lacked a sense of belonging with the University of Lethbridge community (22.7%). Despite most students reporting that they feel connected to the University of Lethbridge and its faculty, most students (68.0%) reported that this connection did not come from university-related groups (e.g. sports team, academic workgroup/lab, organizing body, sorority/fraternity, clubs, etc.), as only 32.0% of respondents stated that they were members of university-related groups.

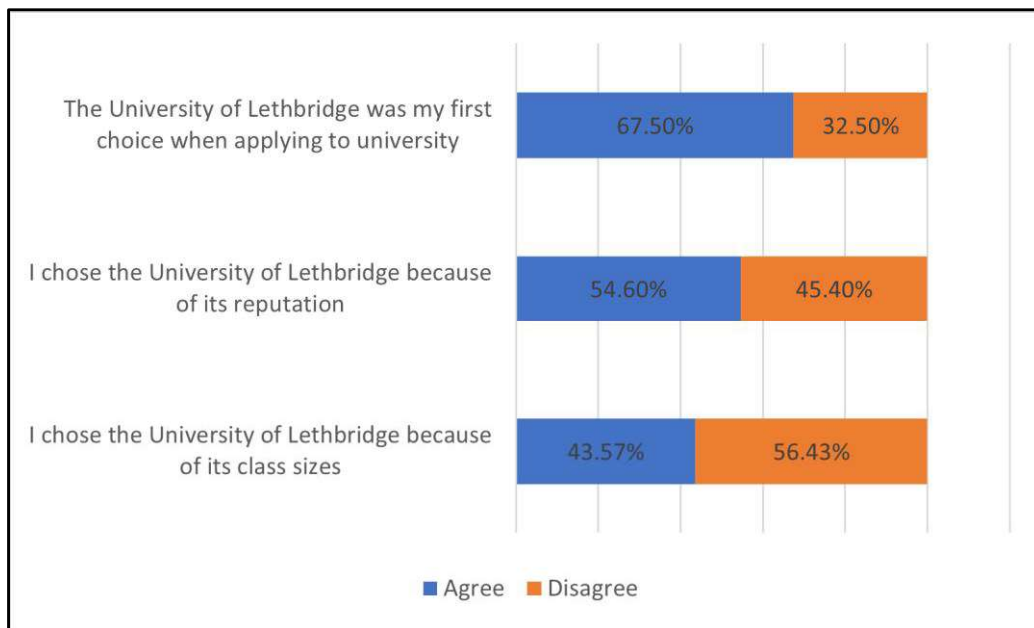


Figure 4. Student Decisions for Attending the University of Lethbridge.



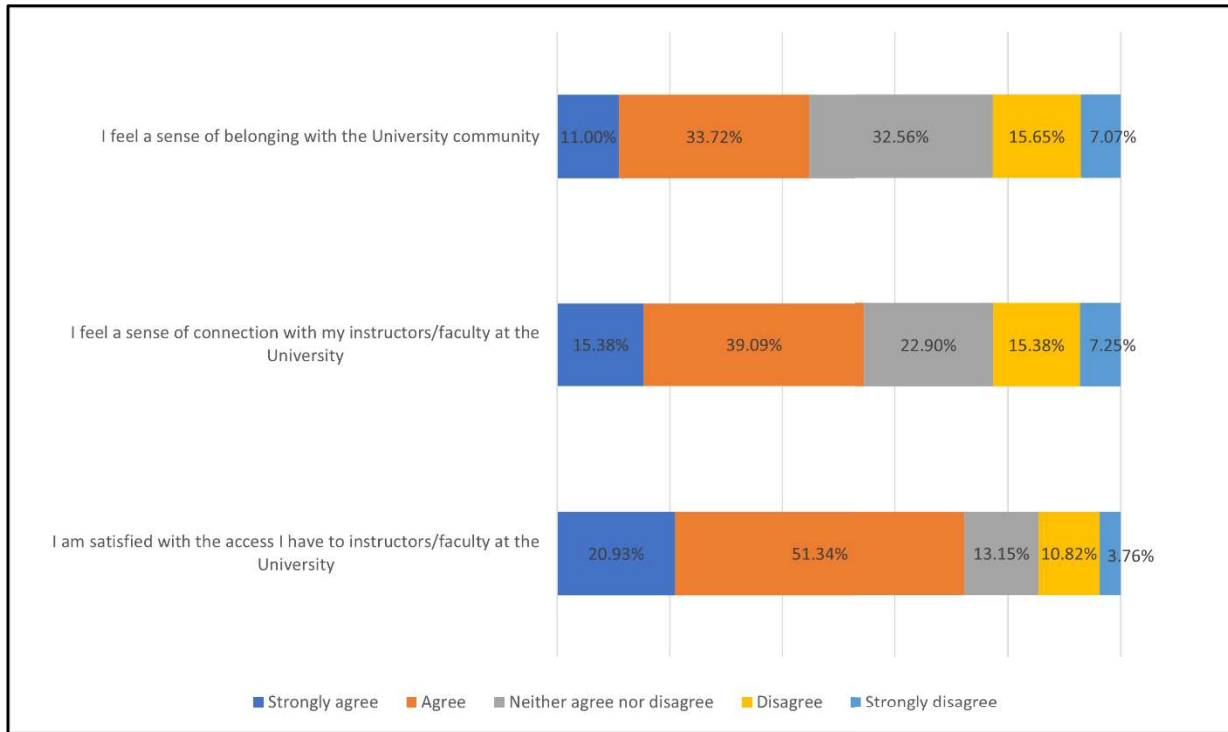


Figure 5. Student Connection to the University.

### Student Beliefs about, Perceptions of, and Engagement with Academic Dishonesty

We found that the student beliefs regarding academic honesty were mostly consistent with our findings in the Fall 2019 survey, in that most students (88.2%) agree that academic honesty amongst students is important. However, fluctuations did occur in each response. There was a slight decrease in students who strongly agreed (50.0%) with the statement, while students who agreed (38.2%) with the statement increased. Those that neither agreed nor disagreed (7.8%) or disagreed (2.7%) slightly increased from the Fall 2019 Survey, while the number of respondents that strongly disagreed (1.2%) decreased (Figure 6).

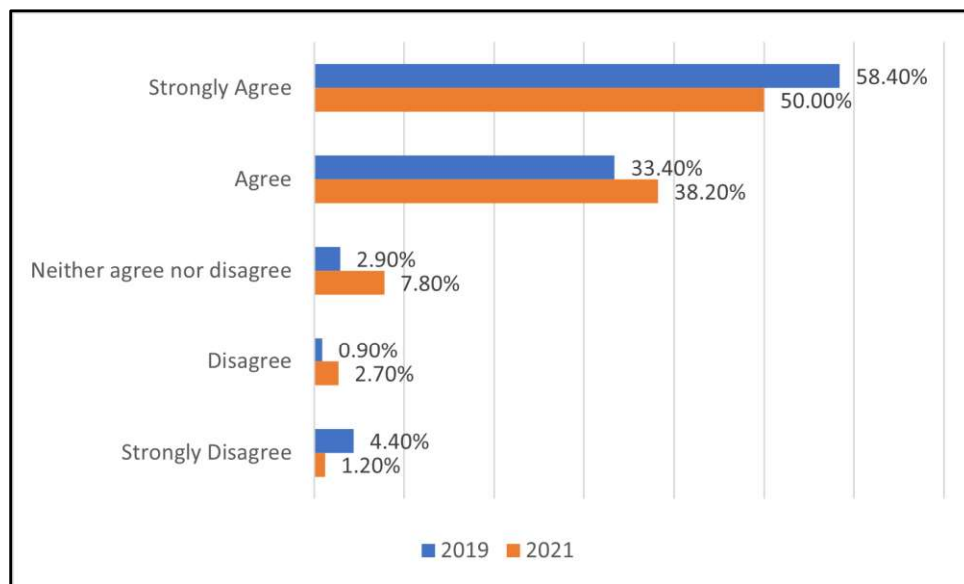


Figure 6. Student Beliefs about Academic Dishonesty.

When asked about rates of academically dishonest behaviour on campus, the largest proportion of students (23.4%) indicated that they believed between 10 and 20% of their peers are engaged in academically dishonest activities (Figure 7). The top three factors which students believed contributed to academic dishonesty were time management concerns (23.6%), grade motivation (18.8%), and the demands of a full course load (14.7%; Figure 8).

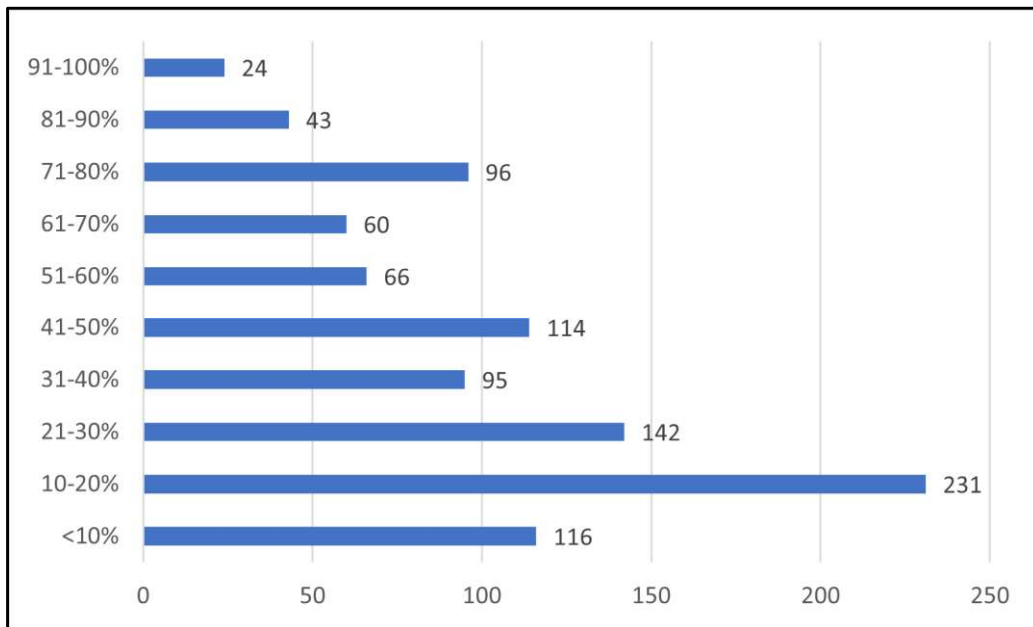


Figure 7. Student Beliefs about Rates of Peer Dishonesty

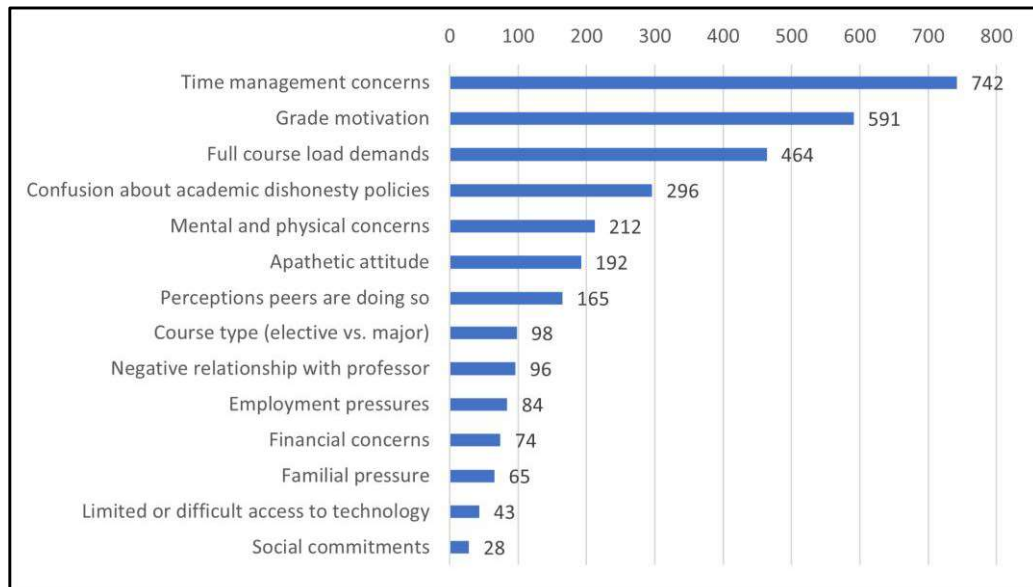


Figure 8. Student Beliefs about Motivations Behind Academic Dishonesty

## Impact of the COVID-19 Pandemic/Transition to Remote Learning on Students

When questioned about changes in their lives since the switch to remote learning, 69.7% of students reported that their quality of life had decreased, while only 14.2% reported an increase in their quality of life. 76.6% of students indicated that the demands placed on them in their everyday life had increased, and a substantial number of students (72.3%) reported that their course-related workload had also intensified since the change to remote learning (72.6%). Only 9.5% indicated that demands on their everyday life had decreased, and 5.5% of students reported that their course-related workload had been reduced by the shift to remote learning (Figure 9).

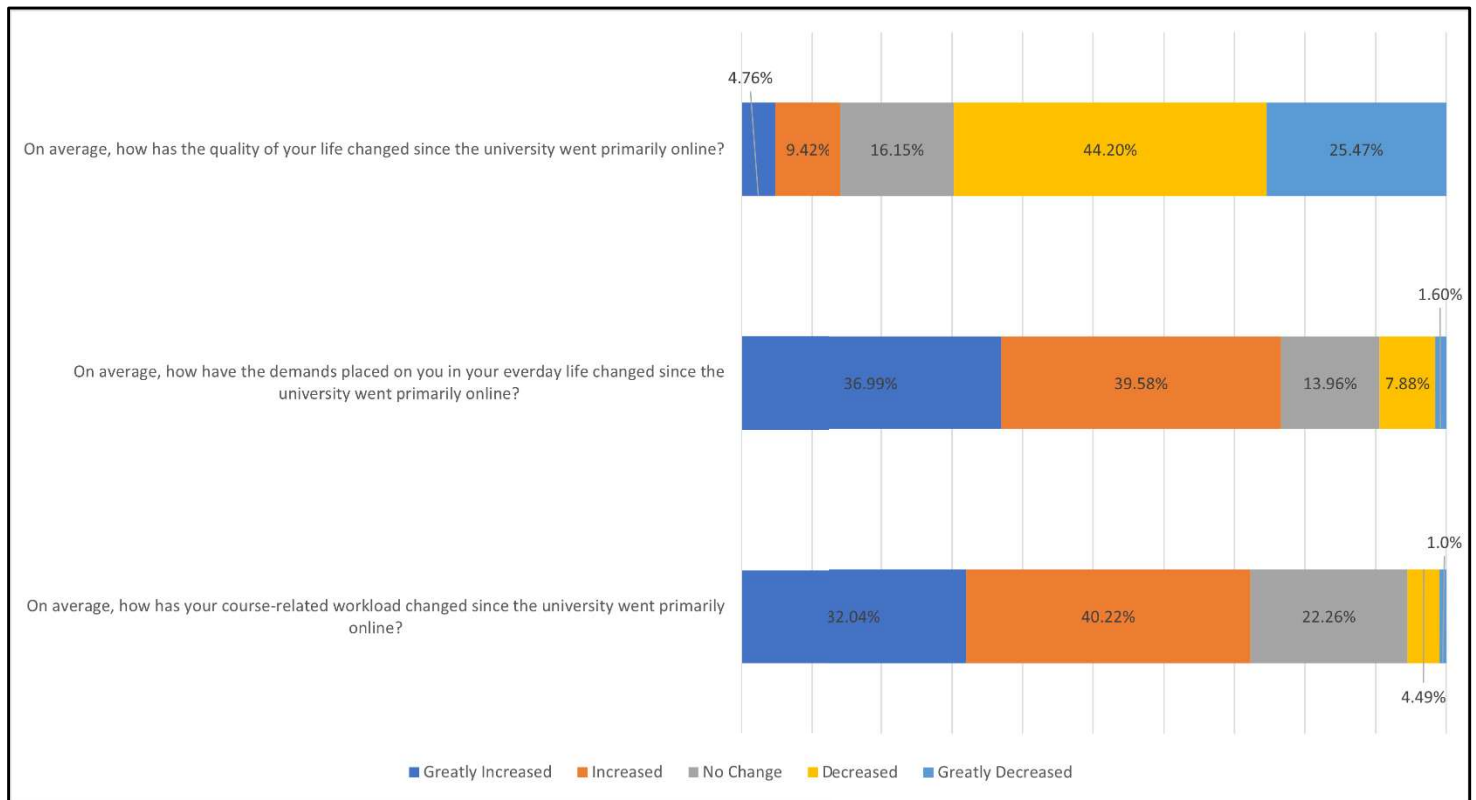


Figure 10. Student Life Changes since the Transition to Remote Learning.

Most respondents (83.8%) reported that they felt that the opportunity to engage in academic dishonesty increased when the university went primarily online in March of 2020, with only 16.2% reporting that they did not feel this was the case. 59.2% of students stated they did not feel increased pressure to engage in academic dishonesty, while 40.8% indicated that they did.

When asked if they engaged in any of the potentially academically dishonest activities listed, 37.9% of students reported that they had not. Of those who did choose an item from our list, the average respondent only selected 1 (range: 1-10). The top three types of academic dishonesty that students reported engaging in included looking through notes while competing online assessments (25.9%) using unapproved

resources (such as Wikipedia, Googling questions, etc.; 17.9%), and using a Discord channel for one or more of their courses (13.9%; though see open-ended responses below). Similar to the Fall 2019 survey, a very small percentage of students reported that they had reused assignments from a previous course (2.0%), turned in an assignment that they paid someone else to complete for them (0.4%), and/or turned in an assignment another student completed for them (0.2%).

33.1% of students answered affirmatively that they had personally witnessed another student engage in academic dishonesty since the shift to remote learning. 34.7% of students reported that they had witnessed 4 or more instances, 13.1% witnessed 3 instances, 20.1% witnessed 2 instances, and 32.1% witnessed 1 or less per semester. The top three academic offences witnessed were communicating with other students during an exam (13.2%), looking through notes while completing online exams (12.2%), and discussing assignment/exam content (11.9%; Figure 10).

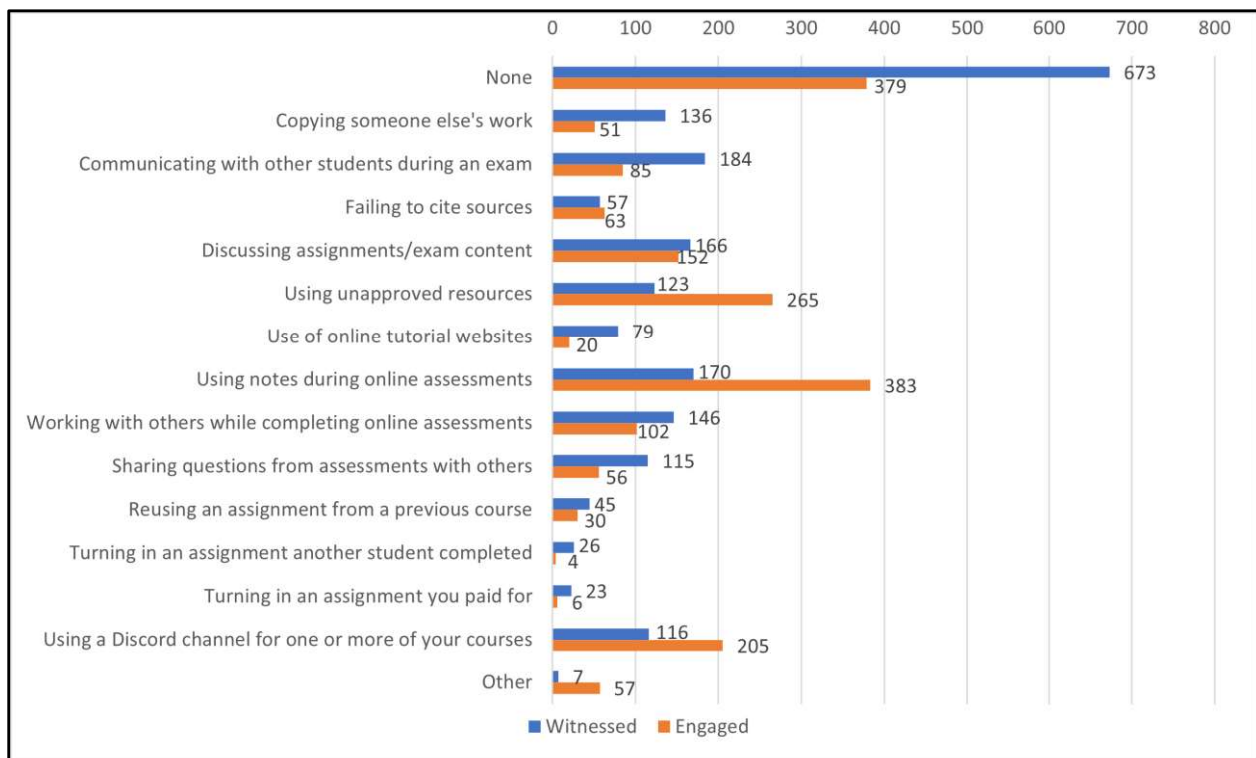


Figure 11. Types of Academic Offences Students Witnessed and/or Engaged In.

When asked about technological factors of academic dishonesty, over half of students (58.2%) reported that they were not familiar with online "tutorial services" (e.g., CHEGG, CourseHero) before the transition to remote learning. Despite respondents reporting that the opportunity to commit an academic offence had increased, most students (72.0%) agreed with the University of Lethbridge's decision not to use online proctoring software to enforce academic honesty, with 48.3% reporting that they strongly agreed, and 23.7% that they agreed. Only a small proportion of students (6.3%) disagreed with the decision, with 3.9% reporting that they disagreed, and 2.4% that they strongly disagreed. Those that were apathetic (neither agreed nor disagreed) numbered 21.7%.

## Impact of the COVID-19 Pandemic/Transition to Remote Learning on Educator Perceptions of and Engagement with Student Academic Dishonesty

Compared to the Fall 2019 survey, the number of educators reported that they disagreed with the statement that academic honesty among students is important dropped, accounting for only 0.9% of responses. 96% of educators agreed, with 89.1% strongly agreeing. Just three educators surveyed, representing 2.9% of educator participants, neither agreed nor disagreed with the statement. (Figure 11).

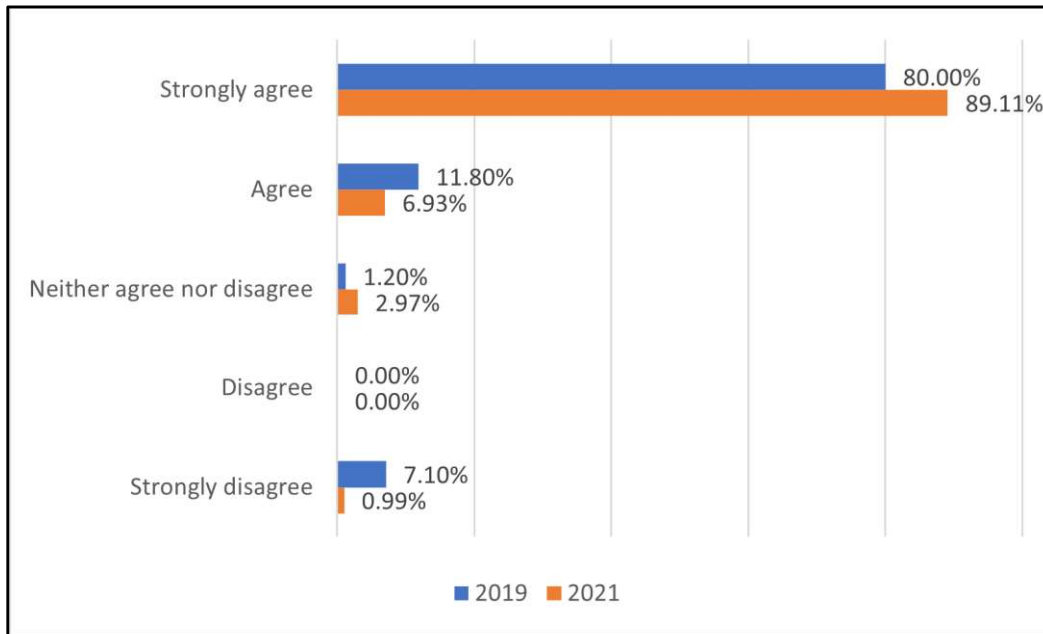


Figure 12. Educator Beliefs about Student Academic Honesty

71.3% of educators reported that they believe incidents of academic dishonesty are increasing since the shift to remote learning. Over half of educators (62.6%) surveyed reported that they witnessed some form of academic dishonesty, while 37.3% did not. Just over half of educators (53.1%) who had witnessed reported they had witnessed 4 or less in the semester (Figure 12). Copying someone else's work and failing to cite sources tied for the most common forms witnessed at 15.7% each. Using unapproved resources (Wikipedia, Googling questions, etc.) and communicating with others during an exam tied for the second most common form witnessed at 11.7%. The third most common form of academic dishonesty witnessed was working with a group or partner at 7.6%.

When asked to estimate what percentage of students they believe are engaging in academically dishonest activities, most educators (66.7%) estimated between 0 and 10% of students. 14.3% estimated between 11% and 20%, and 19.0% estimated that greater than 20% of students are participating in forms of academic dishonesty.

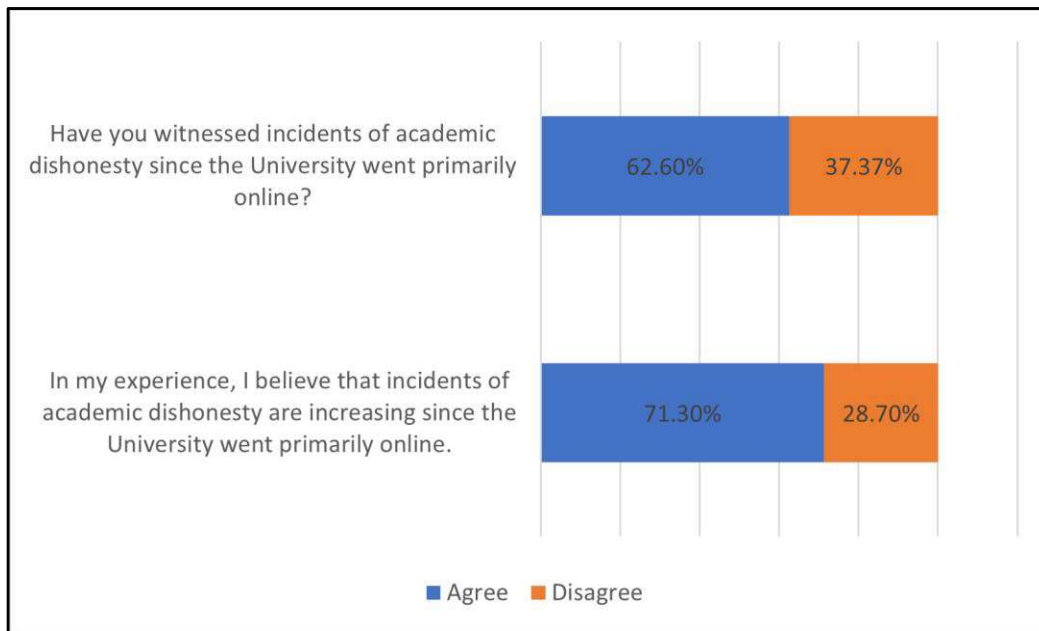


Figure 13. Educator Perception of Academic Dishonesty since the Transition to Remote Learning

### Impact of the COVID-19 Pandemic/Transition to Remote Learning on Educator Handling of Student Academic Dishonesty

Despite high rates of witnessing, only 27.1% of educators answered that they reported incidents of academic dishonesty since the university went primarily online. Of those who did report, the majority reported one (36.8%), two (15.8%), or three incidents (10.5%). The maximum number of incidents educators reported was 54, for which only one educator reported doing so, representing 5.2% of participants. The most common form educators reported were failing to cite sources and copying someone else's work (18.8%). Submitting assessment questions to online services (15.6%) accounted for the second most reported and communicating with other students during an exam (14.1%) was the third (Figure 13). Most educators surveyed reported that they handled the incident(s) they witnessed by discussing it with the student (49.0%). Just under a quarter of participants (24.7%) reported the incident(s) to the Dean, while 12.4% indicated that they had taken some sort of other action. 9.3% of educators reported the offence to the team/course leader, and 4.1% reported it to the chairperson.

22.2% of educators responded that they changed how they report incidents of academic dishonesty since the university went primarily online in March of 2020, meaning that 77.8% had not changed their reporting practices. For those that did change their reporting, 66.7% indicated that they report incidents less often, and 33.3% that they report them more often. The top three reasons that prevented educators from reporting were insufficient evidence (21.4%), unintentional offence on the students' part (16.7%), and a lack of time (8.3%). However, 17.9% of educators answered this question with "does not apply: I always report" (Figure 14).

Most educators (70.1%) indicated that they had not changed how they approach incidents of academic dishonesty since the transition to online learning, though 30.0% reported that they had. For those that changed their approach, 44.0% reported that they were more vigilant but less likely to report incidents, 40.0% that they are more vigilant

and more likely to report incidents, and 16.0% that they are less vigilant and less likely to report incidents.

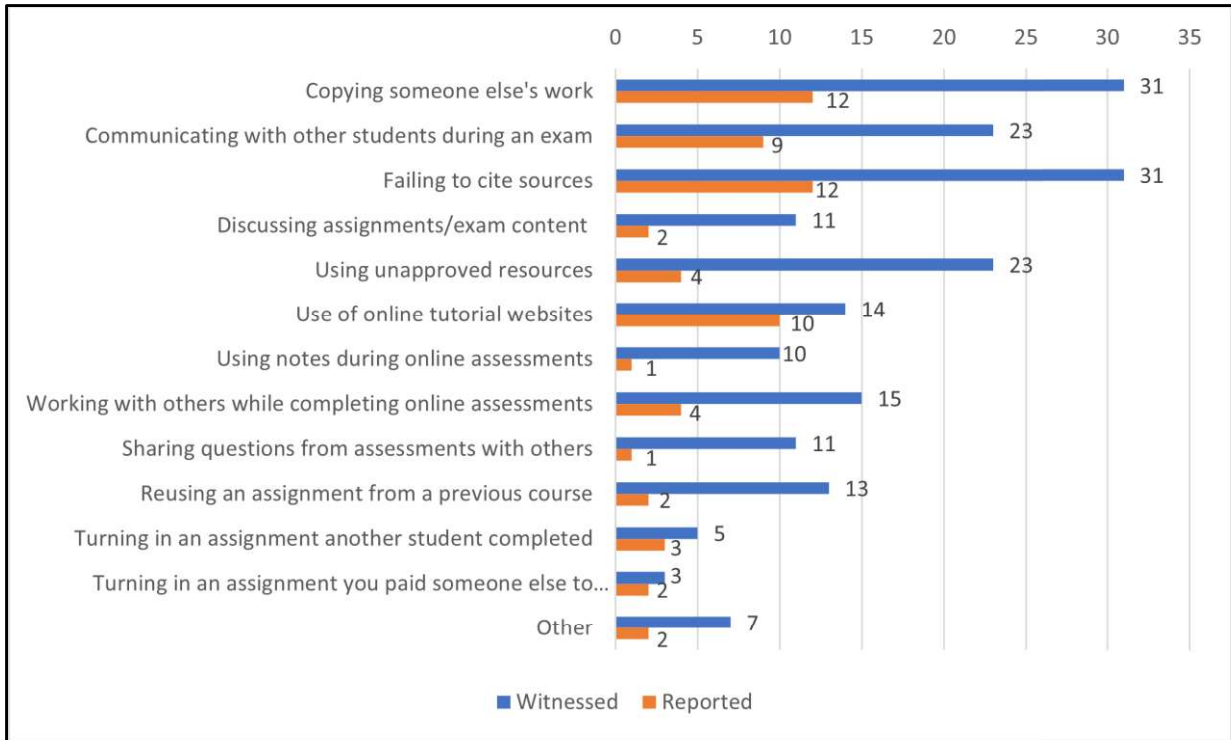


Figure 14. Types of Academic Offences Witnessed and Reported by Educators

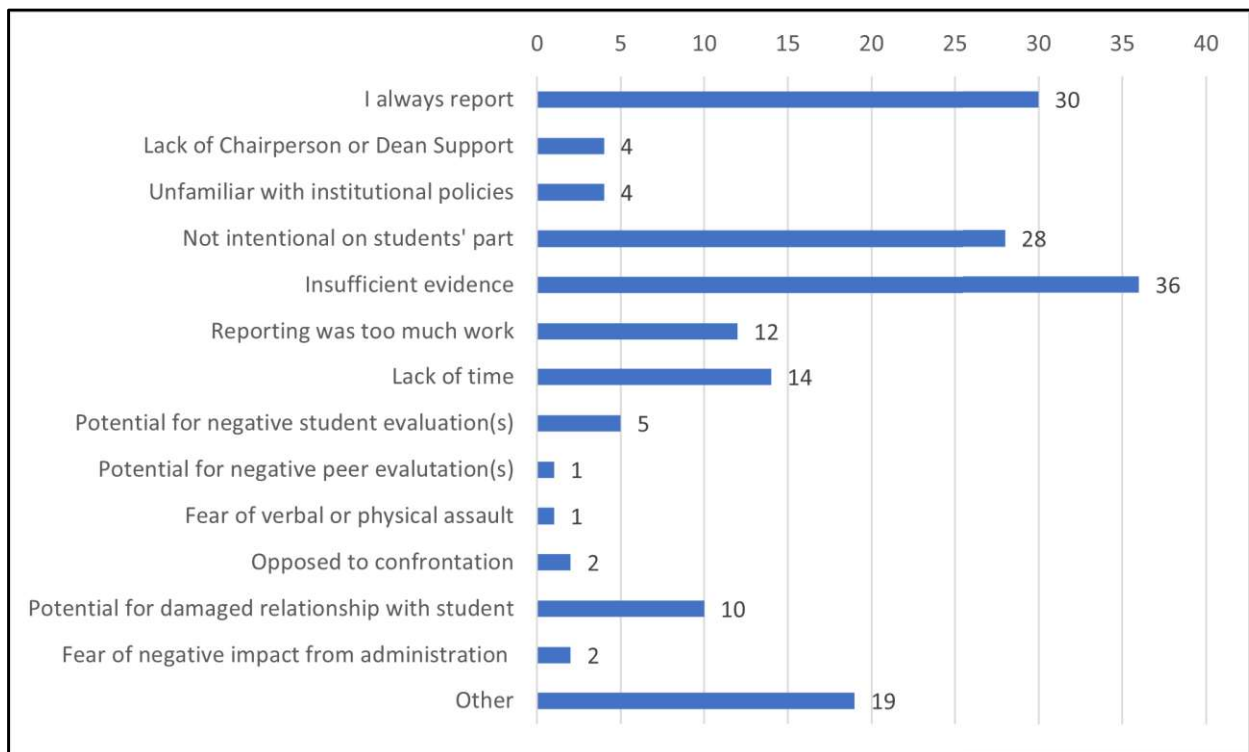


Figure 15. Why Educators did not Report Offences.

When asked about preventative measures, just over half of educators (55.3%) agreed that they had changed their communication about academic dishonesty to their students since the transition to remote learning. 28.7% disagreed, and 16.0% were indifferent. When asked how they had changed how they communicate what constitutes academic dishonesty, the top three ways reported were by adding additional information about academic integrity to class syllabi (31.4%), specifically teaching what constitutes as academic dishonest during class time (28.1%), and by discussing academic dishonesty concerns with students outside of class (13.7%; Figure 15).

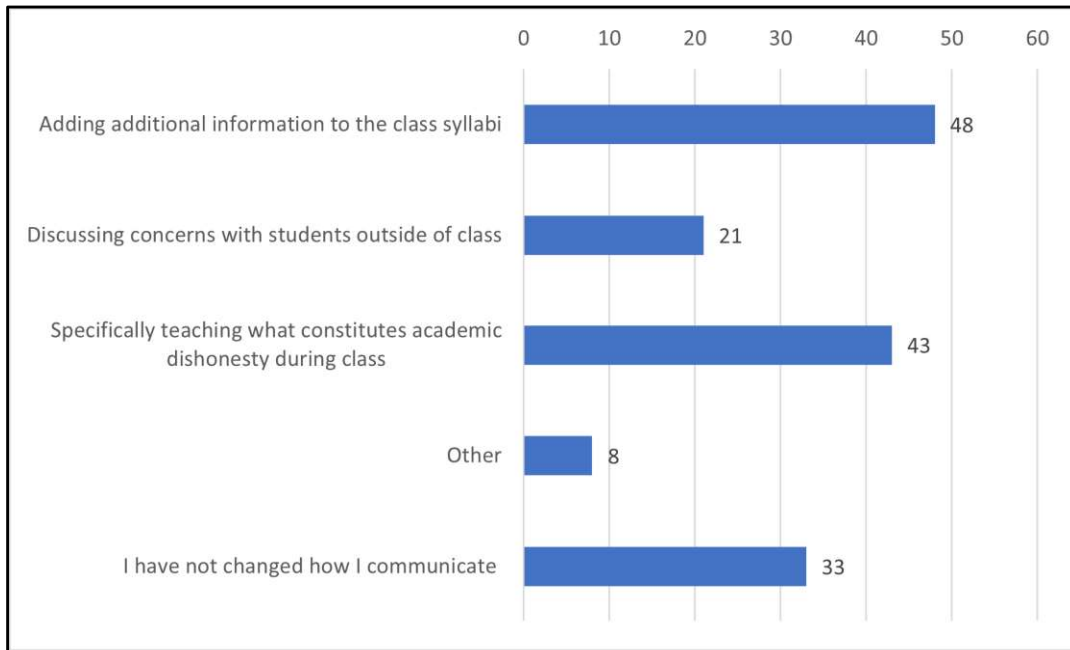


Figure 16. How Educators have Changed Communication about Academic Dishonesty

Finally, close to half of educator participants (47.3%) agreed with the university's decision not to use online proctoring software, and 34.4% said that they were indifferent to the decision. Just 18.3% disagreed with the decision (Figure 16).

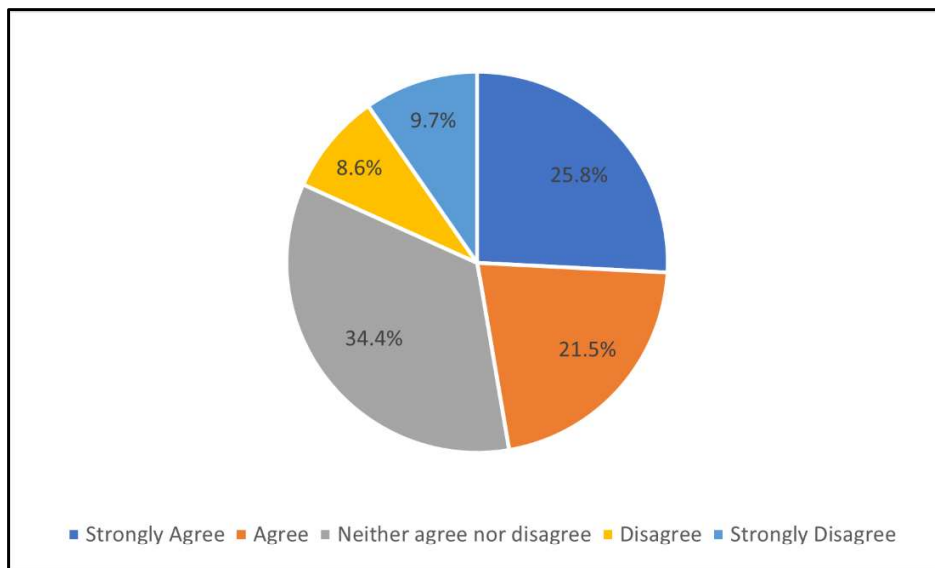


Figure 17. Educators Agreement with the University's Decision about Proctoring Software



## Student Survey Open-Ended Questions and Focus Groups

### Open-Ended Questions

Of the 1,239 student participants, 295 responded to the open-ended question at the end of the survey. We coded these responses using the NVIVO quantitative analysis software, and then thematically analyzed them for over-arching themes.

We determined four themes from the student coded open-ended survey responses (Table 1). The first theme related to students expressing **changes in their quality of life**. Many responses discussed how the pandemic pushed people to mental extremes, which subsequently had a detrimental effect on their studies. Many students also expressed a desire to return to campus as soon as possible because they found the transition to remote learning difficult and struggled with structure and time-management at home. Students also reported an increasingly difficult workload since the transition to remote learning, which further contributed to a decrease in quality of life. Some students reported feeling as if the weekend was “just another weekday” where work needed to be completed to keep up with their classes. Students also discussed that anticipation of academic dishonesty from educators was a further detriment to their studies. However, other students expressed enjoyment at the online learning model; students who had other obligations outside of school, such as work or a family, stated that they enjoyed the flexibility of online learning.

The second theme corresponded to **students’ beliefs about motivations underlying academic dishonesty**. Respondents offered various possible reasons for committing academic dishonesty, including a lack of understanding of the content, a lack of respect for the professor and what they were teaching, and a desire to achieve higher grades. Many students cited the stress of the pandemic as a major factor, reflecting that many students were “overworked, have financial concerns, or other issues” that may push otherwise typically honest students to academically dishonest behaviour. Respondents also discussed the notion that some students will just cheat regardless of any anti-cheating measures put in place, and this is not something that can be changed by the university without adverse effects towards a generally academically honest student population. Additionally, students expressed frustration about their beliefs that their peers may be receiving higher grades due to academic dishonesty.

The third theme demonstrated **confusion about what counts as academic dishonesty in the remote learning model**. For example, Discord was commonly cited as a communication tool to create the connection to peers that would normally be developed in-person, and many students felt strongly that it should not be compared to online “tutorial sites” such as CourseHero. Other students expressed uncertainty about what constituted academic dishonesty, as rules seemed to vary between educators, and they were not always clearly communicated. For example, some instructors allowed the use of notes during online assessment while others did not. This created a “grey area” about academic dishonesty if actions were not explicitly prohibited by educators that students struggled to navigate as they adjusted to the remote learning model.

The final theme related to how **assessment has changed** due to the transition to remote learning. Many students discussed shifts in assessment taken by their

instructors, such as moving away from memorization-based testing to written assessment such as essays. Most students expressed a preference for this style of assessment, as it both discouraged academic dishonesty and encouraged critical thinking and engagement with course material. Many suggested that this style of assessment was better for long-term learning, as it supported professional development that would be useful outside of academia. Students expressed a strong desire for their education to mirror the types of resources they would be able to access in their personal and professional lives, and the opportunity to develop the skills to utilize them. Many students also reflected on the idea that the pandemic shed light on the idea that traditional assessments may not be the most successful ones to utilize for student learning.

### Focus Groups Subthemes

We thematically analyzed the responses to every question asked and identified subthemes for each question. For a list of the subthemes identified in each question and corresponding examples, please see Table 2 below.

We identified one main subthemes in student responses to question 1, which asked students if they preferred in-person or remote course delivery. The first subtheme related to *convenience and accessibility*. Some students stated that they enjoyed the convenience of not having to leave their houses to be physically present in class. However, some student participants preferred in-person delivery due to the hands-on experience and better communication practices, such as better comprehension of body language and tone of their professors, and the ability to discuss class material with their peers.

Question 2 dealt with changes in student workload during the transition to remote learning. Two subthemes were also identified in the responses. The first was changes in *structured time*. Students who had primarily relied on the structure created by in-person classes suddenly found themselves grappling with remote independent study time, forcing a change in *time management strategies*. Students reported methods such as blocking out certain hours of the week to study and review helped them cope with the changes. They also reported feeling like their workload generally increased at the start of the transition. Additionally, students reported a decrease in their *mental health* due to both the despair brought on by the global pandemic and the initial increase in independent work. The quick transition left students feeling emotionally isolated from their peers, and many reported feelings as if they had to struggle with feelings of depression or anxiety alone throughout the isolation period.

When asked about the use of non-permitted study tools in question 3, most student participants stated that they typically listened to what they thought were reasonable professor requests and followed the *professor's discretion*. For example, they all agreed that online "tutorial sites", which are often blatantly prohibited by instructors, should not be used under any circumstance. They also said that if a professor specifically disallowed *Discord*, they would not use it. However, many expressed confusions about explicit banning of Discord outside of closed assessments, specifically as they largely viewed it as a chat forum and socialization tool in isolation. Students reported that oftentimes chatting on Discord was the only way in which they

could get to know their peers.

Question 4 asked students if they thought that online learning led to an increase in the opportunity to engage in academic dishonesty. Most student participants felt as if the unregulated aspect of remote learning led to their peers accessing non-permitted resources during tests, which would help their grades while harming honest students. This led to some students feeling pressured to cheat because they perceived many of their peers to be doing so. A few student participants stated that they believe professors had altered their assessment methods to combat academic dishonesty to the best of their ability, such as modifying test questions.

Question 5 asked students if they felt there were certain classes or assignment types that made it easier to be academically dishonest in the remote learning model. Most participants reflected on different *assessment styles*, such as how “fact-based, multiple-choice tests” were the easiest to cheat on because the answers to those questions were easy to search for within the test’s time limit. For example, some students reported that some professor’s exam questions were readily available online via Google searches. In contrast, student participants said that tests which were modified to include higher level synthesis questions and critical thinking were harder to cheat on. Additionally, students stated that essays were difficult to cheat on because unless you were paying for someone else to complete them, you had to produce original work.

Question 6 had the participants provide suggestions to faculty and administration on possible ways to prevent academic dishonesty. Many discussed *modifying test material* and assignments, such as modifying exams to be open-book instead of holding traditional closed, memorization-based exams. They also stated that they would include more *group work assignments* in any online format because group work helped them to build a social connection with their peers during the isolation period. They theorized that this support from their peers would encourage more pro-social attitudes towards their schooling and encourage pro-social behavior.

Finally, when students were asked in question 7 about the most impactful point on the survey, the subtheme of *educational reform* encompassed all answers. Students primarily discussed changing the current testing system, which focuses heavily on memorization of facts, and instead argued that they should be asked to demonstrate their critical thinking skills in evaluations.

## Educator Survey Open-Ended Questions and Focus Groups

### Open-Ended Questions

Of the 112 educator participants, 39 responded to the open-ended survey question. Three main themes were determined from the responses (Table 3). The first theme was **class restructuring**. Class restructuring was largely discussed because of the sudden and abrupt shift to remote learning. Faculty members discussed proactive attempts to combat cheating by changing their assessment styles to include more open book or essay-based questions. While some expressed doubt in continuing this once in-person classes were reinstated, others reported this was an opportunity for reflection about the worth of traditional exam assessment.

The second theme was the **ability to monitor academic dishonesty**. Many reported that their workload had increased dramatically during the transition to remote learning, and this meant they could not always be actively monitoring for academic dishonesty. Some participants stated that they wish they had access to proctoring software to help them detect cheating. However, many of our participants also discussed the controversies surrounding proctoring software, such as the loss of student privacy. Several participants admitted to feeling hopeless to prevent academic dishonesty and believed it had increased substantially during the transition to online learning. Other educators, like the student respondents, discussed the idea that the pandemic had created an opportunity to rethink how they assessed their students' learning.

The final theme was **education about academic dishonesty**. Several faculty members indicated that they believed that many incidents are not intentional on the student's part, and that they should be taken as moments of education instead of punishment. Others also discussed changing how they communicate what constitutes as academic dishonesty to their students during the transition to the remote model, and the importance of proactive prevention. Many educators discussed the importance of continuing to discuss academic dishonesty with students, and how education is critical to preventing it in the future.

### Focus Group Subthemes

As with the student subthemes, we thematically analyzed the responses to every question asked during the focus group. For a list of the subthemes identified in each question and corresponding examples, please see Table 4 below.

Question 1 asked educators to identify challenges to maintaining academic integrity during remote learning. While a few educators discussed *modifying their course material*, most educators stated that their goal was to teach the students who wanted to learn instead of taking extra measures to keep students from cheating. Most educators who primarily use essay-based assessments reported that they felt no need to modify their material or their grading. As a result, many participants stated that they did not modify their course material.

Question 2 asked educators to report any training they received on addressing academic dishonesty in a remote learning model, either through campus or elsewhere. All educators reported an intense period of *change* during the emergency shift to online learning. Educators discussed that the first transitional semester (Spring 2020) was an important learning experience that informed their approach in the Fall 2020 semester. Many reported that the transition was overwhelming and required quick and adaptable approaches. Some faculty members reported watching virtual webinars on academic dishonesty to teach themselves ways to combat academic dishonesty in an online environment.

Question 3 asked participants if they believed academic dishonesty had increased during the switch to remote learning, and, if so, in what ways. Educators discussed the *changes in academic dishonesty* in the remote learning model in two ways. Those with test-based course material indicated that they believed there was an

increase in academic dishonesty, whereas courses which required essays and long form responses said incidences of plagiarism were equivalent to in-person learning. Some educators even stated that they felt there was a decrease in academic dishonesty during the transition to remote learning because they modified their questions to make cheating more difficult, either by increasing their complexity or by reducing the amount of time students were given to complete their assignment.

In question 4, educators were asked to list the most common form of academic dishonesty witnessed. Educators discussed four main *types of academic dishonesty*. Copying a friend's work was largely discussed amongst faculty who utilized tests and short answer assignments. In a similar vein, faculty reported students self-plagiarizing by re-using essays from other courses. They also reported that students would engage in contract cheating by posting questions to online "tutorial sites" like Quora or CourseHero.

In question 5, we asked educators how they modified their course material in response to the transition to remote learning. All participants reported increasing complexity through the incorporation of *higher-level questions* that required student knowledge from course content to answer. This was the case for educators from multiple disciplines, such as writing math, and physics.

Question 6 addressed faculty reporting of academic dishonesty. Most educators stated that they had similar rates of reporting during remote learning as they had before the transition. However, during the initial transition to online learning when they noticed greater infractions, some faculty reported that they would ignore some of the smaller infractions because they had no time to file formal reports. This led to a *slight decrease* in their reporting during remote delivery of courses.

When asked what advice the participants had for administration to help combat academic dishonesty in question 7, they reported that streamlining the reporting process would help them to better report every incident. This would help create a better network of accountability, allowing small incidents to be recorded to better catch repeat offenders. They also stated that they would enjoy greater *integrity instruction* for students when they first arrive at the university to proactively combat unintentional academic dishonesty due to lack of education.

## DISCUSSION

Our research aimed to capture more deeply how students and educators at the University of Lethbridge experienced academic dishonesty within the context of the remote teaching model employed during the global pandemic. Below, we discuss our findings within the framework of our seven research questions and aim to situate our findings within the broader literature available on academic dishonesty in Canada.

*Question 1: How often do students engage in other forms of academic dishonesty beyond contract cheating and self-plagiarism?*

While the University of Lethbridge did experience an increase in academic dishonesty during the transition to the remote learning model, the University's rates of

academic dishonesty are significantly lower compared to other Canadian postsecondary institutions. In line with our Fall 2019 findings, we found that despite increases in opportunity to do so, a very small percentage of students engaged in more serious academic offences, such as contract cheating (0.8%) or self-plagiarism (2%) in the remote learning model. While a substantial portion of students (approximately 66%) admitted to engaging in activities they were not explicitly permitted to, such as using unapproved resources like Wikipedia and Google during exams, less than 5% of students admitted to copying someone else's work. Subsequently, less than 1% admitted to submitting assessment questions to an online service. Around 7% of students admitted to more moderate offences, such as communicating with other students during an exam. The most common forms students engaged in, such as using personal or online resources during assessments, were very educator dependent. Many students reported intense confusion about what constituted as academic dishonesty, as the definition seemed to vary depending on the educator, and many students reported ambiguity in communication from some educators. This lack of clarification easily caused some activities, such as utilizing personal notes during an exam, to be acceptable in certain courses and academically dishonest in others. While students typically have a strong understanding of more serious academic offences, literature has shown that there is often confusion around academic misconduct outside of contract cheating and plagiarism (Yeo 2007; Barrett & Cox 2005; Hayes & Introna 2005). This confusion for students, further muddied by a rapid and unexpected transition to a remote learning model, could absolutely been seen as a contributing factor to the increase in academic dishonesty reported by both students and faculty at the University. This hypothesis is further supported by the steady decrease in reported academic offences seen at the University towards pre-COVID numbers. Despite the Spring 2022 semester being conducted almost entirely online due to the COVID-19 pandemic, the administrative lock-out of the University of Lethbridge faculty, and the ULFA (University of Lethbridge Faculty Association) strike, incidents of reported academic dishonesty at our institution have continued to return to pre-pandemic levels as classes have returned to primarily in-person delivery.

Further evidence for low rates of academically dishonest behaviour at the University can be seen in the contradiction between peer perception of cheating and faculty reports. Despite 24.4% of students believing that between 10-20% of their peers were engaging in academic dishonesty (which would equate to approximately 815-1630 students based on institutional enrollment), the 49 faculty respondents reported witnessing an average of 11 academic dishonesty offences themselves, and only 163 academic offences were reported to the institution in the Spring 2020 semester. This suggests that only a small percentage of our students are academically dishonest, and the disparity between faculty and student reports could in fact be the result of a small number of the same academically dishonest students being witnessed by a multitude of students in multiple classes, inflating the perception of how many of their peers are engaged in such behaviour.

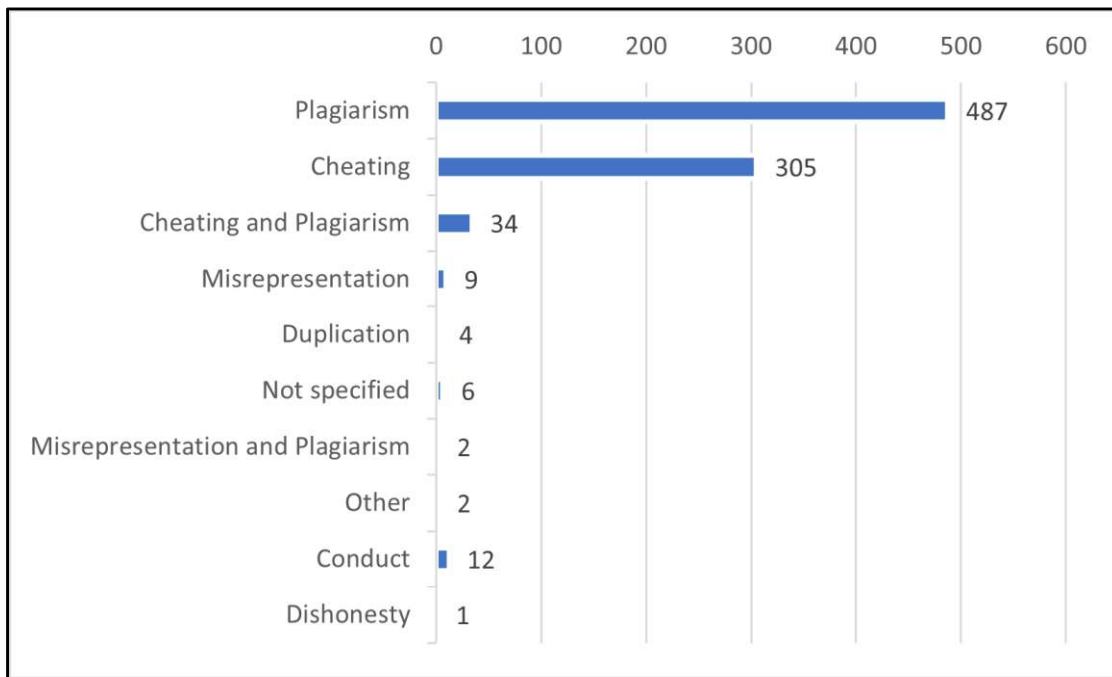


Figure 18. Frequency of Academic Offences Reported, Summer 2015-Spring 2023

Question 2: Is there a relationship between student attributes and their engagement in academic dishonesty?

We were also interested in whether there was a possible self-selection bias — that for some reason, students who chose to attend the University of Lethbridge were less likely to commit academic dishonesty. Research on university selection and its relationship to academic dishonesty is limited, but previous literature has demonstrated that students who have a stronger connection to their faculty and are integrated into institutions with a culture of academic integrity are less likely to engage in academic dishonesty (McCabe & Trevino 1997; Peterson 2019). Student satisfaction with their institutions has also been found to affect rates of academic dishonesty; students who are unhappy with their institutions are both more likely to be academically dishonest and justify their behaviour as mediation for their dissatisfaction (Jurdi, Hage & Chow 2011; Pulvers & Diekhoff 1999). The results for this possibility are mixed. Evidence supporting this possibility is that a large proportion of students reported that the University of Lethbridge was their first choice when applying to university. Just over half of students (54.6%) reported that they had chosen to attend the University of Lethbridge due to its reputation. However, other results do not seem statistically significant. The proportion of students with at least one parent/guardian that went to college is in line with other Canadian data (Stats Canada 2011), and students did not cite class size as an important factor in their decision to attend the University.

Additionally, most students reported that they came from southern Alberta, leaving the possibility that students from southern Alberta may be less likely to engage in academically dishonest practices. While our own institutional data may suggest support for this, we suspect that this may actually be the result of a predominantly Canadian student population who have most likely been socialized to the Albertan education system. It is possible that further quantitative analysis might find a correlation between

these responses and student's engagement with academic dishonesty, further illuminating whether there is a relationship between student perception of the university's academic culture and academically integrity at the University of Lethbridge.

*Question 3: How do students perceive the University of Lethbridge's academic culture?*

Our results regarding student beliefs towards academic honesty were similar to our Fall 2019 survey conducted before the pandemic, with 88.2% of student respondents agreeing that academic honesty is important. The biggest distinction between the two surveys was an increase in student indifference to the statement, with 7.8% of students neither agreeing nor disagreeing that academic honesty amongst students is important compared to the 2.9% of respondents in the 2019 survey. This change in student indifference could be the result of student dissatisfaction with the remote learning model and an overall poor quality of life during the height of the COVID-19 pandemic. This slight increase in student apathy about academic dishonesty could also be connected to the initial increase of academic dishonesty incidents. As previously discussed, students emphasized that poor mental health, increased courseload demands, and lower quality of life during the transition to remote learning contributed to feelings of isolation, lack of consequences or impact from their actions, and a focus on "just getting through the semester" rather than engaging with their coursework to the best of their ability. Increased uncertainty, new stressors due to the pandemic and elevated levels of mental health concerns have been found to be widespread amongst postsecondary students through the duration of the pandemic and remote learning, leading to poorer academic performance and higher student stress (Zhu et al. 2021; Sukhawathanakul et al. 2022).

Additionally, most students reported that they were satisfied with the access they had to instructors/faculty at the university, and over half agreed that they felt a sense of connection with the university community. However, the source of this connection to the campus is unclear, as just under half reported that they felt a sense of belonging, and even more reported that they were not a member of a university club or group. These findings support a hypothesis that we provided in the discussion of our report for our Fall 2019 survey (Awosoga et al., 2021b; Awosoga et al., 2021a) that the extremely low rates of academic dishonesty we found could be in part due to the university's academic culture, as there is a known relationship between the culture of an institution and rates of academic dishonesty (Morris & Carroll, 2015; Bertram Gallant & Drinan, 2008; McCabe, 1993; McCabe et al., 2012; MacLeod & Eaton, 2020). Furthermore, these findings provide evidence for a hypothesis that many of our students garner their sense of connection to the university campus from their educators and peers rather than extracurricular activities. Peer disapproval and refusal to engage in academic dishonesty and connection to educators have both been demonstrated to discourage academic dishonesty (Yeo 2007; Peterson 2019; Chiang, Zhu & Yu 2021; Bacon et al. 2020), while participation in extracurricular activities such as clubs or fraternities/sororities have actually been positively correlated with increased levels of academic dishonesty (McCabe & Trevino 1997).



*Question 4: Is there a relationship between the remote learning environment initiated in response to the SARS-CoV-2 pandemic and engaging in academic dishonesty?*

We asked specific questions to understand the possible relationship between the remote learning model and academic dishonesty.

Results on both surveys for rates of academic dishonesty (contract cheating and self-plagiarism) were very consistent, indicating that the remote learning model did not increase serious student academic dishonesty. However, the official offence data from the university demonstrates a possible contradiction. The number of incidents reported jumped by 120%, from 46 in the Fall 2019 semester to 163 in the Spring 2020 semester. However, the number of reports largely decreased during the period of remote instruction, by 75% in Fall 2020 (from 163 to 74), and again by almost another quarter percent (from 74 to 58) in Spring 2021, which is closer to pre-remote numbers. As of the writing of this report, numbers dropped further to 38 for the Spring 2023 semester, which is comparable to pre-remote reports.

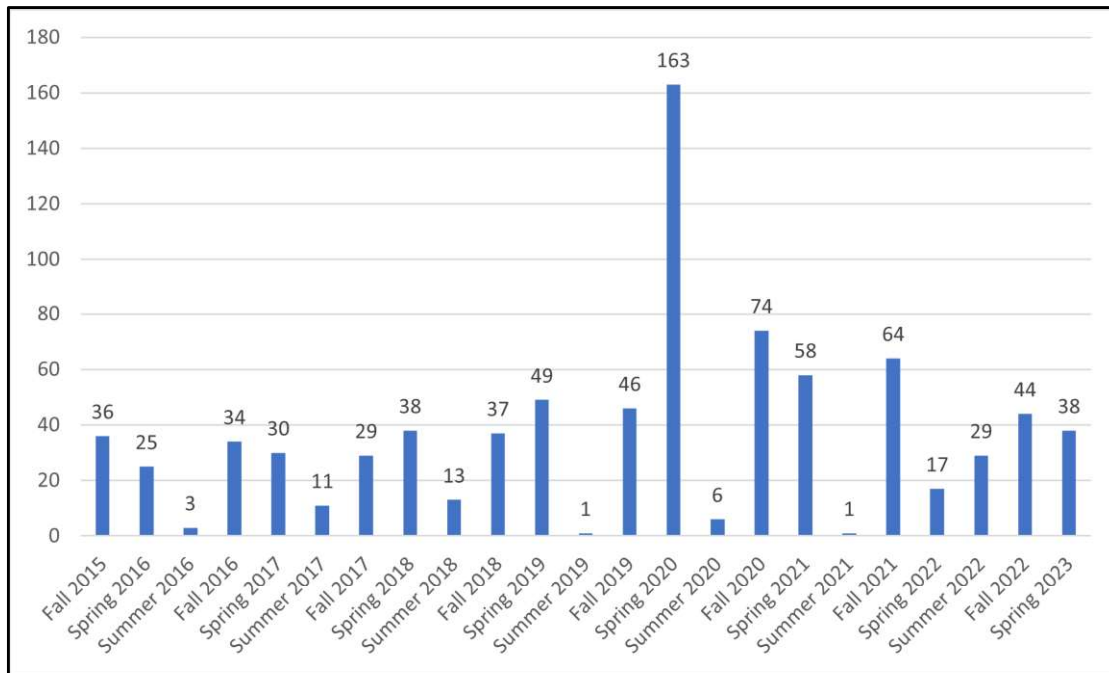


Figure 19. Number of Academic Offences per Semester

Despite an increase in reports, faculty stated that their reporting procedures had not dramatically changed. 82% of educators indicated that they had not changed how they report incidents since going remote, and for the 18% that did, they overwhelmingly reported incidents less often. Faculty instead demonstrated that they continued to prefer to handle incidents on a case-by-case basis, with more faculty indicating that they chose to discuss incidents with students compared to Fall 2019 (49.5% compared to 37.6% of faculty from the Fall 2019 survey), resulting in fewer reporting to the Dean or course leader.

This data indicates that during the first semester of remote learning, educators may have been more vigilant of academic dishonesty, struggled to transition their

courses from in-person learning to guard against non-proctored, completely online opportunities for academic dishonesty, or both. While it is true that faculty were provided an extremely short timeline to make the transition to remote learning, many of our faculty respondents discussed being extremely proactive in their approach to combatting academic dishonesty in the new learning model. This suggests that our faculty were key in preventing an even larger spike in offences than the University experienced. It is also possible that students were more likely to engage in academic dishonesty during their first remote term, which could be due to a multitude of reasons discussed throughout this report and became more comfortable with the new learning model the longer they experienced it. Both possibilities provide a potential explanation for the sharp increase in academic offences during the first semester of remote learning that has since steadily decreased.

In the focus groups, both student and educator participants spoke candidly about the turbulence they faced in transitioning to online learning. However, both groups did identify some key points which highlight effective teaching in an online environment. For example, both student and educator participants discussed how leaving room for “instructor silence” in synchronous, lecture-based courses significantly improved the educational experience for both faculty and students. Instructor silence was implemented by increasing group work and encouraging student discussion in using break-out rooms. Educators stated a myriad of benefits to using group work in the online format, including encouraging students’ attendance. Additionally, students stated that this method was more engaging and encouraged them to pay attention in class. Students who had group work in their online courses reported that it made them feel like they were a part of a “family” and seemed to help strengthen their connection to the university and their fellow classmates. Students who did not have a group work component in their course discussed missing the social aspect of it. This shift in faculty educational approach to directly encourage connection and engagement with their peers that students may not have fostered on their own in a traditional lecture course could be seen as another possible protective factor against academic dishonesty in the remote learning environment.

*Question 5: Are educators changing their approaches towards and responses to academic dishonesty as a result of the SARS-CoV-2 pandemic-initiated remote learning model?*

Educators largely indicated that they made changes to their teaching to accommodate the remote learning environment regarding academic dishonesty. 55.3% of faculty agreed that they had changed how they communicated what constituted as academic dishonesty to their students, such as adding information to their syllabi (31.8%) or providing information during or outside of class time (41.8%). These results, coupled with those in Question 5, indicate that most educators made significant efforts to deal with academic dishonesty themselves throughout their time teaching online by accommodating students under unprecedented circumstances. This has eventually led to reporting rates similar to before the pandemic began. This is especially apparent given that more educators indicated on the current survey that they believed academic dishonesty is increasing (71.2%) compared to Fall 2019 (34.2%) (Awosoga et al., 2021b; Awosoga et al., 2021a). While many educators reported that they were less

likely to report incidents of academic dishonesty, they did agree that they were more vigilant about monitoring for it. This suggests that while faculty had increased their efforts to monitor and address academic dishonesty, increased workloads and the stress of the pandemic may have interfered with the time required to formally report it. This is further supported by the increase in faculty who strongly agreed that student academic integrity is important (89.1%) compared to the Fall 2019 survey (80.0% of faculty), suggesting that faculty are increasingly committed to combatting academic dishonesty on our campus.

In the focus groups, it was clear that instructor proficiency with the Moodle software, Zoom, and general technology helped to not only detect cheating but improve the student experience. Professors who knew of homework-sharing websites discussed trying to remove their test questions from the sites or modifying their testable materials to include more high synthesis questions. Additionally, professors used Moodle as a tool to randomize questions to ensure that students could not copy each other's work. Students also reported that professors who were more tech-savvy made attending virtual lectures more enjoyable because they were better able to effectively display both their information, such as slides, and their faces. They stated that seeing a professor's face was more engaging than just hearing their voice. Faculty effort towards improving student engagement in online lectures has been demonstrated to protect against academic dishonesty (Peterson 2019; Chiang, Zhu, & Yu 2022). The community aspect of university was largely missed, and participants valued increased discussion time and group work across the pandemic to make up for this loss. Additionally, both educator and student participants stated they enjoyed the changes in their educational quality, which included less fact-based tests and more complex problems and assignments. Both students and educators expressed the desire to keep these changes to testing even when they return to school in person.

*Question 6: Has lockdown and the remote learning model altered the demands placed on students, their quality of life, and/or their course-load?*

This data revealed without question that the remote learning model, and the pandemic overall, significantly impacted the educational activities and home lives of students and educators. In terms of academic integrity, most students felt that the opportunity to engage in academic dishonesty had increased but were divided as to whether they felt increased pressure to engage in it. Our data also shows that students felt that their course-related workload increased, along with the demands placed on their everyday life, while their quality of life decreased. This sudden and unexpected increase in demands and drop in quality of life is more than likely a contributing factor to the somewhat higher rates of academic offences during the first semester of remote learning. However, it is important to note that despite such extenuating circumstances, the vast majority of our students resisted the opportunity to be academically dishonest.

In the focus groups, participants reported that the transition to online learning was long and arduous. Students discussed how unprecedented and unexpected stressors and demands from the pandemic dramatically affected both their academic performance and mental and physical health, while educators reflected on the difficulties of having to

rapidly adapt their teaching to an unfamiliar learning model. However, both student and educator participants stated that this transition taught them about their educational experiences and allowed them to see what parts of their education they truly valued.

*Question 7: Do students and educators agree with the university's decision not to use online proctoring software?*

While educators were conflicted on whether they agreed with the university's decision not to use online proctoring software, students were largely supportive. While some may view these results as indicating that students prefer not to be proctored so that they are free to engage in academically dishonest practices, there are several costs associated with online proctoring, such as privacy and ethical concerns, and it is unknown as to whether the benefits outweigh them (Nigam et al., 2021). The use of proctoring software also fundamentally shifts the relationship between educator and student, positioning educators as surveyors and students as offenders in need of monitoring (Logan 2021). Faculty were also aware of these concerns, and those who disagreed with the University's decision primarily cited feeling unprepared to monitor for academic dishonesty in an online environment as their reason. Given the majority student opinion was in favour of not using online proctoring, and the evidence that academic offences were trending downward as semesters of remote learning increased, it is our view that University of Lethbridge's choice not to use online proctoring software was the right one.

#### Academic Dishonesty in the Remote Learning Model

Many of the concerns around a potential rise of academic dishonesty in the remote learning model stemmed from a perceived increase in opportunity to engage in academic dishonesty with educators being unable to effectively monitor in an online environment, and increased access to technology for students that could be utilized in new or unknown ways to commit academic dishonesty. However, while both educators and students agree that they believe there is an increased opportunity to be academically dishonest in online learning environments, literature does not necessarily demonstrate that students are more academically dishonest in remote learning models compared to in-person learning (Peterson 2019; Chiang, Zhu, & Yu 2021). Chiang, Zhu & Yu reflect that "digital technologies are not causes of [academic dishonesty]; they are simply conduits" (2022, p. 909). Research on academic dishonesty in online learning environments, particularly in the Canadian context, is limited compared to in-person academic dishonesty, but many studies have found that despite increased opportunity, rates of academic dishonesty in online classrooms are consistent with in-person (Black, Greaser & Dawson 2008; Stuber-McEwen, Wiseley & Hoggart 2009). It is also incredibly important to note that the emergency transition to remote delivery model cannot be directly compared to courses intentionally designed to be delivered online. More research is desperately needed to understand the scope of academic dishonesty in online classrooms, particularly after the impact of COVID-19 on higher education.

## Student and Faculty Demographics

Previous literature has cited gender and age as potential risk factors for engaging in academic dishonesty, but these were not found to be statistically relevant on our campus in the Fall 2019 survey. To expand upon this, we added additional demographic questions to explore why our university has lower rates of academic dishonesty compared to other Canadian institutions. For students, we were interested in their location prior to attending the University, factors that influenced student decision to attend the University, and their connection to and satisfaction with both the University and its educators. These specific factors have not been adequately explored in previous literature, and we saw these as potential explanations for our low rates of academic dishonesty.

From these results, we determined that a vast majority of our students are Albertan, with just under half from either the Lethbridge or southern Albertan area. International students accounted for the smallest demographic of our students, while our remaining students were from across Canada. These results are significant due to previous literature that supports that cultural understandings of education impact a student's perception of academic dishonesty (Sowden 2005; Sutton & Taylor 2011; Hendy, Montargot & Papadimitriou 2021). Cultural variations in understandings of what constitutes as academic dishonesty are often not taken into consideration in the creation of institutional policies, which can lead to further confusion for international students who already face broader cultural transition and language barriers when entering the Western education. Because 88.7% of our students reported themselves as residing in Alberta before attending the University, and additional 6% of students resided elsewhere in Canada, we can assume that an overwhelming number of our students (94.7%) have been socialized to understand both the Western education system and its understandings of academic dishonesty prior to their postsecondary education. Furthermore, 94.1% of our students reported that the main language used with family and friends is English, further supporting that most of our students do not have to navigate these cultural and language variations in definitions of academic dishonesty. This provides a majority of our students with an automatic advantage in avoiding unintentional academic dishonesty due to cultural or language variations compared to other institutions. However, this does not make the University exempt from considering the accessibility of its institutional policies, which will be discussed below.

Furthermore, we found that two thirds of our students reported the University as their first choice for attending postsecondary, with just over half agreeing that they chose the University because of its reputation. Literature has demonstrated that postsecondary institutions, including both its students and faculty, can have a significant influence on a student's decision to be academically dishonest (MacLeod & Eaton 2020; Yeo 2007; Hendricks, Young-Jones & Foutch 2011). Institutions that maintain a strong culture of academic integrity are more likely to foster this same mentality in its students, and students who feel connected to their institutions are less likely to intentionally participate in academically dishonest behaviors, particularly if it is condoned by both their educators and their peers (Sutton & Taylor 2011).

For faculty members, a demographic that we consider to be potentially significant is that only a small percentage of our educators are sessional or term appointments

(16.0%). Most of our faculty respondents were in long-term positions, with 78.2% reporting that they had 6 or more years of teaching experience at the postsecondary level. Literature on faculty perceptions of academic dishonesty is considerably limited compared to student perception and motivations; however, literature has demonstrated that institutional policy and reporting procedures have a significant impact on how faculty respond to incidents of academic dishonesty (MacLeod & Eaton 2020; Coalter, Lim & Wanorie 2007). We can assume based on the demographic results of our surveys that most of the University educators are familiar with its policy and procedures regarding academic dishonesty and would also have more reason to be invested in maintaining a culture of academic integrity at our institution compared to those that rely heavily on the employment of sessional and short-term employment of educators. However, further research would need to be conducted on the significance of this factor.

## External Factors

Literature regarding academic dishonesty has also explored the external factors related to motivations behind academic dishonesty. Much of the literature agrees that a student's decision to be academically dishonest is often related to social factors, particularly the influence of their peers (Davis et al. 1992; Hendricks, Young-Jones & Foutch 2011; Hendy, Montargot & Papadimitriou 2021). Literature has demonstrated that students are even more likely to be influenced by their peers if they are unclear about institutional academic integrity policies; they instead use peer loyalty and perception or their own moral judgements to justify their decision to be academically dishonest (Yeo 2007; Sutton & Taylor 2011). Students' personal morality about academic dishonesty is also more likely to shift if they perceive their peers to be engaging in academically dishonest behaviours without detection or consequences or if they consider academic dishonesty a social norm within their institution. (Hendy, Montargot & Papadimitriou 2021; Bacon et al. 2019). We saw evidence of this from both the open-ended survey responses and the student focus group responses; as previously discussed, our students greatly overestimated the number of their peers that were being academically dishonest, and expressed concerns that their peers had an unfair advantage in receiving similar or higher grades while they had 'worked' to earn theirs, which led to feelings of increased pressure to be academically dishonest themselves in order to compete for equal or superior grades. This is another fact that could have contributed to the initial increase in academic dishonesty at the University.

In terms of external motivations, pressures to achieve high grades is universally cited in literature as one of the biggest motivations for academic dishonesty (Bacon et al. 2019; Davis et al. 1992; Jones 2011; Peterson 2019). As the cost of education continues to rise and employment opportunities increasingly require higher levels of education, students are under increasing pressure to succeed during their education. Literature has also demonstrated that time management concerns, further aggravated by high work and course loads, can increase this pressure, leading to extreme levels of student stress; this has been well-documented to be a widespread concern during the pandemic (Chiang, Zhu & Yu 2022; Sukhawathanakul et al. 2022; Zhu et al. 2021). This was also very apparent with our student population, with many students expressing

frustration and hopelessness around the remote learning model, isolation and unexpected mental health concerns due to the pandemic, and increased workloads and difficulty adjusting their time management skills accordingly. One student commented that "...with the extra pressures of the pandemic and general depression everyone is feeling I would be very surprised if students, who feel as though they are being neglected by the university while paying higher school fees, did not cheat quite often". These factors compounded together provide an explanation for the increase in rates of academic dishonesty within our institution during the height of the pandemic and the remote learning model. In the survey responses and focus groups, students reflected on the extreme pressure on obtaining grades, commenting that the focus of postsecondary education seems to be on "getting answers right rather than exploring interests, career choices, or even learning the material." Others reinforced that "there is too much emphasis on grades and not enough on learning. We are forced to memorize facts and have one chance to get it right". Students also pointed to increased tuition, perceived lack of effort from some educators, and their increased course loads during the transition to remote learning as justification for academic dishonesty, stating that "if I'm paying \$600+ for a course and building/maintenance fees at full price when I can't even access the university I will take full advantage of academic dishonesty. I'm not wasting money on a course to end up with a bad grade". Literature has demonstrated that some students will justify their academically dishonest behaviours as a way to compensate for perceived power imbalances or mistreatment by authoritative figures in the institution such as educators or administration (Hendy, Montargot & Papadimitriou 2021). Many students expressed frustration about a perceived deficit in their education since the transition to remote learning despite rising tuition, lack of access to campus and services, and difficulty connecting to their educators and peers. This provides another explanation for the initial increase in academic dishonesty; students who unwillingly had to endure the emergency transition to remote learning neutralized any potential feelings of personal moral failing for engaging in such behaviours because of their perceived injustice in this learning model.

Students also reflected that faculty concerns around academic dishonesty that was addressed through shortening test limits only increased the pressure students were experiencing and pushed them towards academic dishonesty rather than discouraging it. However, while this was the experience of some of our students at the University, others reported positive changes made by their educators to make assessment more appropriate to the remote learning model, including open-book exams, higher synthesis questions rather than relying on rote memorization, and essay or written assessments over multiple choice exams. Many students praised their educators for adapting accordingly, and also expressed their preference for this style of assessment that challenged them to engage more with their course material in order to succeed and better mirrored real career situations in which they would be able to consult secondary resources and colleagues. Many students expressed that the only thing traditional multiple choice exams measure "is your ability to take a test". Literature has demonstrated that multiple choice exams that rely solely on student memorization of information have been positively correlated with academic dishonesty (Davis et al. 1992; MacLeod & Eaton 2020); on the other hand, students who are engaged with their courses through the use of assessments that encourage higher synthesis and allow for

more student autonomy in their completion have demonstrated higher levels of intrinsic motivation in their learning that protects against academic dishonesty (Bacon et al. 2019; Chiang, Zhu & Yu 2022; Peterson 2019).

### Academic Integrity Policies and Understanding Academic Dishonesty

One of the most significant findings of this research was the extreme levels of student confusion around what constitutes as academic dishonesty, particularly in the remote learning environment. Many students expressed inconsistencies between faculty member policies and unclear communication about expectations to maintain academic integrity within their classrooms. Students reported that individual faculty policy also did not always reflect institutional definitions or policy, reflecting that “part of the issue with defining academic integrity and answering this survey is that there is no standard across the board and every instructor has different rules and guidelines”. Others expressed a desire for more education from faculty members and the institution about maintaining academic integrity, as “simply including the statement from the calendar on a course syllabus is not sufficient”.

The current literature on academic dishonesty has suggested that students are more likely to accidentally engage in academic dishonesty, particularly in areas such as plagiarism and collusion. While students can generally identify serious academic offences, such as contract cheating or intentional misrepresentation, they cannot always properly identify concerns such as improper citation, inappropriate paraphrasing, or sharing of resources with peers (Sutton & Taylor 2011). Research conducted on institutional policies has demonstrated that these policies are often unclear and difficult for students to interpret (Chiang, Zhu & Yu 2022; MacLeod & Eaton 2020). A study conducted by Shelley Yeo on first year university and science engineering students’ understanding of academic dishonesty determined that while students may have been able to provide an appropriate definition of plagiarism, they were often unable to utilize this definition to determine plagiarism in theoretical situations unless prompted by key words (2007). Even students who were able to provide strong definitions of plagiarism were found to resort to personal ethics and morality and loyalty or friendship with peers when asked to identify a behaviour as academically dishonest at the same rate as students who could not. Because of this, Yeo argued that more emphasis should be placed on educating students on the role of academic integrity in institutions rather than expecting them to uphold it based on simple definitions, as students often did not understand themselves as scholars, and therefore did not view academic integrity with the same importance as educators and administrators. Students with less education about academic dishonesty have also been found to have different understandings of knowledge sharing and ownership than educators and administrators due to consistent engagement with technology and the social media culture of sharing information (Peterson 2019), while institutional policies are often drafted with the assumption of academic dishonesty being the result of personal or moral failing of students (MacLeod & Eaton 2019). Institutional policies also fail to account for cultural variations in understandings of collective knowledge and its dissemination (Hendy, Montargot &



Papadimitriou 2021). Both the literature and student responses to our research demonstrates a clear need for more comprehensive education about academic dishonesty for our students and a more consistent approach to maintaining academic integrity from the institution as a whole to address incidents of unintentional academic dishonesty. As we saw with our own students, students have also expressed in other studies that they require better guidance on how to correctly uphold academic integrity rather than “repeatedly being told what was wrong” (Sutton & Taylor 2011, p. 838). Educator reflected in their focus groups sensitivity is crucial while handling academic dishonesty, as most of the incidents they observed were unintentional on the student’s part due to lack of proper education. This was a major contributing factor in their decision on whether to address the incident one-on-one with the offending student or formally report it.

Students are not the only ones who have been found to be disconnected from their institutional policies. While faculty agree that they are aware of their institutional policies, many do not regularly access them unless prompted by an observed incident of dishonesty (MacLeod & Eaton 2020). Furthermore, the biggest deterrents for reporting incidents to administration have been found to be long and arduous reporting procedures, inconsistent enforcement of policies, perceived lack of evidence, and disagreement with severity of punishment (Coalter, Lim & Wanorie 2007; MacLeod & Eaton 2020; Pincus & Schmelkin 2003). These factors were all reported by our faculty as reasons why they chose not to formally report observed incidents, and many chose instead to deal with incidents directly on a case-by-case basis. These findings suggest that faculty also require better education on academic integrity as it is understood at the University and more support during the reporting process to encourage faculty to formally report all observed incidents. Better rates of reporting ensure that the administration receives accurate reports of academic dishonesty on our campus to best understand how to address it.

## LIMITATIONS

As mentioned in our methods, the option “Using a Discord channel for one or more of their courses” was mistakenly not included in the forms of academic dishonesty that educators could indicate as witnessing students engage in or had reported. Given the contention surrounding the use of Discord during our research period, these data could have provided more insight.

Furthermore, we conducted no quantitative analyses here, and are limited in our understanding of our research questions by descriptive analyses.

## CONCLUSION AND RECOMMENDATIONS

Our results have yielded several significant conclusions about academic dishonesty at the University of Lethbridge. First, while there was absolutely an increase in incidents of academic dishonesty at the University during the first semester of remote learning, both educators and students have been able to navigate an incredibly challenging and stressful transition to maintain an overall culture of academic integrity.

After the conclusion of the Fall 2019 survey, we proposed that the University of Lethbridge does have a culture of academic integrity that contributes to lower levels of academic dishonesty compared to other Canadian postsecondary institutions (Awosoga et al., 2021b; Awosoga et al. 2021a); the results of this second survey further support this claim by demonstrating that our educators in particular are integral to this. The results suggest that the initial rise in academic dishonesty can be attributed to a rapid and unexpected switch in learning models during a period of incredible uncertainty as both educators and students learned by trial-and-error what could be translated successfully from face-to-face learning to remote. This incredibly challenging period in academia has also demonstrated that there are many contributing factors to a student's decision to engage in academically dishonest behaviour beyond poor morals or personal characteristics. Furthermore, while there was a sizable number of students that admitted to engaging in some form of potential academic dishonesty, many of these were minor offences that could be attributed to opaque academic integrity policies that were not clearly updated for the remote learning mode. The variation in educator approaches to remote learning, which was not always accompanied by explicit communication of changes in policies, further contributed to student confusion about what constituted as academically dishonest behaviour. Despite the rise in academic dishonesty, our rates of serious academic offences (i.e. contract cheating) remained incredibly low (2.%). This is particularly noteworthy because international rates of contract cheating have been found to be anywhere from 3.5% (Curtis & Clare 2017) to over 20%, with rates noted as continuously rising (Newton 2018). Research conducted at a Canadian community college during the COVID-19 pandemic found that almost 14% of students had engaged in contract cheating (Ferguson, Toye & Eaton 2023). As a result of this, we feel confident in concluding that while academic dishonesty is not as prevalent on our campus, steps should still be taken by the University to create a clear academic integrity policy that is accessible to all students and faculty.

Secondly, these results have also demonstrated how integral the educators at the University are to creating and maintaining the culture of academic integrity we have at our institution. Educators overwhelmingly have demonstrated that they are willing and capable to address incidents of academic dishonesty on an individual basis with their students. Educators have established their proactivity in combatting academic dishonesty on our campus by modifying course assessments, increasing their efforts to communicate with students about academic dishonesty, and using known incidents as educational opportunities rather than strict punishments. While we fully support faculty in taking a flexible, student-responsive approach to academic dishonesty, we also encourage faculty to report all known incidents. This data is not only integral to the University, but also a tool that could be utilized to further understand how academic dishonesty needs to be addressed in the context of our campus. Because of this, we recommend that the University develop a clear outline of the reporting procedure. Clear communication from the University could address faculty concerns about both the time and work involved in reporting, and the potential harm that could occur to students' academic records if they were to report an incident where they believe students to have been unintentionally academically dishonest.

Finally, these results have demonstrated that more education about academic dishonesty is needed at an institutional level – both for educators and students. As we

transition into a new era of blended and face-to-face delivery because of the COVID-19 pandemic, new concerns about maintaining academic integrity will continue to develop. As we saw in our own results, the appearance and adoption of new technology or teaching methods can lead to increased fears around the potential for academic dishonesty for educators, and increased opportunity for students to be academically dishonest, both intentionally and unintentionally. To avoid the possible creation of an environment of mistrust between educators and students where educators feel pressured to police their students and students are positioned as inherently at risk of academic misconduct by increased surveillance, we recommend that the University increase its efforts on education for both parties. We encourage the University to increase their efforts to educate incoming students about the different types of academic dishonesty, the process and consequences associated with it, and encourage students to uphold the culture of academic integrity the campus currently has. We especially encourage the University to consider the cultural variation in definitions of academic dishonesty and to recognize that academic integrity policies are often complex and inherently inaccessible to new students when considering how they approach such education. We also recommend that the University support educators in better communicating about academic dishonesty to their students and emphasize the importance and value of reporting academic dishonesty to the institution. Furthermore, the results strongly suggest that educators consider shifting their teaching to application-based assessment, avoid reusing old versions of assessment materials that can be distributed by students, and avoid using publisher test banks that are more readily available. We further encourage the University to provide education about the tools available to detect plagiarism, such as cheating-detection software such as Turnitin, and if they are appropriate for educators, including the potential consequences and risks to students should educators choose to employ them.

While these results have yielded significant information about academic dishonesty on our campus, further research is recommended to better develop our understanding. This is particularly critical as the landscape of academia continues to rapidly change through the further integration of technology into our teaching after the brief use of the remote learning model.

## RECCOMENDATIONS

- **Further approaches to addressing academic dishonesty on campus should reflect an understanding that academic dishonesty is an incredibly complex situation with multiple contributing factors outside of poor student morality**
- **Cultural variations in understandings of academic dishonesty should be considered when developing future policies addressing academic integrity**
- **Institutional policies are often opaque, inaccessible, and inefficient in properly educating students about academic dishonesty or supporting educators in the reporting process. Institutional policies should be reevaluated and revised as we shift into a new educational model post COVID-19.**
- **More education about academic integrity is required outside of statements in the syllabi, particularly for new postsecondary students. Administration and educators should be encouraged to provide more comprehensive education to students.**
- **Faculty also require better education about the University's institutional policies. They should also be provided better support during the reporting process to alleviate concerns about lack of time, limited evidence, or harming students during this process.**
- **While a flexible approach to student education about academic dishonesty is often beneficial, it can also lead to confusion about what constitutes as academic dishonesty if it consistently varies between faculty members. Faculty members should strive to be clear in their communication to their students about expectations around academic integrity in their classrooms.**
- **Faculty should understand maintaining academic integrity as critical to their role of educators, and an important to their commitment in educating students.**
- **Traditional assessments have been demonstrated to be positively correlated with higher rates of academic dishonesty. Students have also expressed dissatisfaction with these styles of assessments that emphasize achievement of grades over engagement with material and deeper learning. Educators should be considered to reevaluate their assessment methods to both protect against academic dishonesty and provide a more well-rounded educational experience for our students.**

## REFERENCES

- Awosoga, O., Nord, C., Varsanyi, S., Barley, R., & Meadows, J. (2021a). Student and faculty perceptions of, and experiences with, academic dishonesty at a medium-sized Canadian university. *International Journal for Educational Integrity*, in press.
- Awosoga, O., Meadows, J., Nord, C., Varsanyi, S. E., & Barley, R. (2021b). *Investigating academic dishonesty in post-secondary institutions in Canada: a case study of the University of Lethbridge before the COVID-19 pandemic*. Retrieved 2021-08-16 from <https://opus.ulethbridge.ca/bitstream/handle/10133/5864/Awosoga-investigating-academic.pdf?sequence=1&isAllowed=y>
- Awosoga, O., Varsanyi, S., Nord, C., Barley, R., & Meadows, J. (2021c). Motivators for student academic dishonesty at a medium sized university in Alberta, Canada: Faculty and student perspectives. *Canadian Perspectives on Academic Integrity*, 4(1), 91-109. <https://journalhosting.ucalgary.ca/index.php/ai/article/view/71475/54988>
- Ayebi-Arthur, K. (2017). E-learning, resilience and change in higher education: Helping a university cope after a natural disaster. *E-Learning and Digital Media*, 14(5). <https://doi.org/10.1177/2042753017751712>
- Bacon, A.M., McDaid, C., Williams, N., & Corr, P.J. (2019). What motivates academic dishonesty in students? A reinforcement sensitivity theory explanation. *British Journal of Educational Psychology*, 90(1), 152-166. <https://doi.org/10.1111/bjep.12269>
- Balash, D. G., Kim, D., Shaibekova, D., Fainchtein, R. A., Sherr, M., & Aviv, A. J. (2021). Examining the examiners: Students' privacy and security perceptions of online proctoring services. *arXiv preprint arXiv:2106.05917*. <https://arxiv.org/pdf/2106.05917>
- Barrett, R. & Cox, A.L. (2005). 'At least they're learning something': the hazy line between collaboration and collusion. *Assessment & Evaluation in Higher Education*, 30(2), 107-122. <https://doi.org/10.1080/0260293042000264226>
- Bertram Gallant, T., & Drinan, P. (2008). Toward a model of academic integrity institutionalization: Informing practice in postsecondary education. *Canadian Journal of Higher Education*, 38(2), 25-43. <https://eric.ed.gov/?id=EJ815066>
- Black, E.W., Greaser, J., & Dawson, K. (2008). Academic Dishonesty in Traditional and Online Classrooms: Does the "Media Equation" Hold True? *Journal of Asynchronous Learning Networks*, 12(3-4), 23-30.
- Brimble, M. (2016). Why Students Cheat: An Exploration of the Motivators of Student Academic Dishonesty in Higher Education. In *Handbook of Academic Integrity* (pp. 365-382). Springer Singapore. [https://doi.org/10.1007/978-981-287-098-8\\_58](https://doi.org/10.1007/978-981-287-098-8_58)
- Chiang, F., Zhu, D., & Yu, W. (2022). A systematic review of academic dishonesty in online learning environments. *Journal of Computer Assisted Learning*, 38(4), 907-928. <https://doi.org/10.1111/jcal.12656>
- Clarke, C. & Lancaster, T. (2006). "Eliminating the successor to plagiarism? Identifying the usage of contract cheating sites." Proceedings of the 2nd International Plagiarism Conference. Retrieved from:

- <https://www.researchgate.net/publication/228367576> Eliminating the successor to plagiarism Identifying the usage of contract cheating sites
- Coalter, T., Lim, C.L., Wanorie, T. (2007). Factors That Influence Faculty Actions: A Study on Faculty Responses to Academic Dishonesty. *International Journal for the Scholarship of Teaching and Learning*, 1(1), 1-21.
- Davis, S.F., Grover, C.A., Becker, A.H., & McGregor, L.N. (1992). Academic Dishonesty: Prevalence, Determinants, Techniques, and Punishments. *Teaching of Psychology*, 19(1), 16-20. [https://doi.org/10.1207/s15328023top1901\\_3](https://doi.org/10.1207/s15328023top1901_3).
- Eaton, S. E., Chibry, N., Toye, M. A., & Rossi, S. (2019). Interinstitutional perspectives on contract cheating: A qualitative narrative exploration from Canada. *International Journal for Educational Integrity*, 15(1), 1-17. <https://edintegrity.biomedcentral.com/articles/10.1007/s40979-019-0046-0>
- Evans-Tokaryk, T. (2014). Academic integrity, remix culture, globalization: A Canadian case study of student and faculty perceptions of plagiarism. *Across the disciplines*, 11(2), 1-40. <https://wac.colostate.edu/atd/articles/evans-tokaryk2014.cfm>
- Harris, L., Harrison, D., McNally, D., & Ford, C. (2019). Academic integrity in an online culture: Do McCabe's findings hold true for online, adult learners? *Journal of Academic Ethics*, 1-16. <https://doi.org/10.1007/s10805-019-09335-3>
- Harrison, D. (2020). Online Education and Authentic Assessment. Retrieved 2020-06-12 from <https://www.insidehighered.com/advice/2020/04/29/how-discourage-student-cheating-online-exams-opinion>
- Harwell, D. (2020). Cheating-detection companies made millions during the pandemic. Now students are fighting back. – *The Washington Post*. Retrieved 2021-09-23 from <https://www.washingtonpost.com/technology/2020/11/12/test-monitoring-student-revolt/>
- Hayes, N. & Introna, L.D. (2005). Cultural Values, Plagiarism, and Fairness: When Plagiarism Gets in the Way of Learning. *Ethics & Behavior*, 15(3), 213-231. [https://doi.org/10.1207/s15327019eb1503\\_2](https://doi.org/10.1207/s15327019eb1503_2)
- Hendricks, E., Young-Jones, A. & Foutch, J. (2011). To Cheat or not to cheat: Academic dishonesty in the college classroom. *LOGOS: A Journal of Undergraduate Research*, 4, 68-75.
- Hendy, N.T., Montargo, N., & Papadimitriou, A. (2021). Cultural Differences in Academic Dishonesty: A Social Learning Perspective. *Journal of Academic Ethics*, 19, 49-70.
- Jones, D.L.R. (2011). Academic Dishonesty: Are More Students Cheating? *Business and Professional Communication Quarterly*, 74(2), 141-150. <https://doi.org/10.1177/108056991140405>
- Jurdi, R., Hage, H.S., Chow, H.P.H. (2011). Academic Dishonesty in the Canadian Classroom: Behaviours of a Sample of University Students. *Canadian Journal of Higher Education*, 41(3), 1-35.
- Kimmons, R., & Veletsianos, G. *Proctoring software in higher ed: Prevalence and patterns*. Retrieved 2021-08-30 from <https://er.educause.edu/articles/2021/2/proctoring-software-in-higher-ed-prevalence-and-patterns>

- Kujath, A. S., Schafer, K. M., & Taylor, I. B. C. (2020). Novel cost-effective internal live online proctoring solution. *The Journal of Asian Finance, Economics and Business*, 7(8), 653-660. <https://doi.org/10.13106/jafeb.2020.vol7.no8.653>
- Lancaster, T. (2019). Social media enabled contract cheating. *Canadian Perspectives on Academic Integrity*, 2, 7-24. <https://dev.journalhosting.ucalgary.ca/index.php/ai/article/download/68053/53648>
- MacLeod, P. D., & Eaton, S. E. (2020). The paradox of faculty attitudes toward student violations of academic integrity. *Journal of Academic Ethics*, 1-16. <https://doi.org/10.1007/s10805-020-09363-4>
- McCabe, D. L. (1993). Faculty responses to academic dishonesty: The influence of student honor codes. *Research in Higher Education*, 34(5), 647-658. [https://idp.springer.com/authorize/casa?redirect\\_uri=https://link.springer.com/content/pdf/10.1007/BF00991924.pdf&casa\\_token=Bi0EDFb4yiwAAAAA:GPnWJIEd1OjBn\\_vd3gbdi0M8E2kuG6fH4KApNozpv2V059WnXtqs42NiMotsPMRFu5SVZ5\\_DC\\_U6ODkbK](https://idp.springer.com/authorize/casa?redirect_uri=https://link.springer.com/content/pdf/10.1007/BF00991924.pdf&casa_token=Bi0EDFb4yiwAAAAA:GPnWJIEd1OjBn_vd3gbdi0M8E2kuG6fH4KApNozpv2V059WnXtqs42NiMotsPMRFu5SVZ5_DC_U6ODkbK)
- McCabe, D.L. & Trevino, L.K. (1997). Individual and Contextual Influences on Academic Dishonesty: A Multicampus Investigation. *Research in Higher Education*, 38(3), 379-396.
- McCabe, D. L., Butterfield, K. D., & Treviño, L. K. (2012). *Cheating in College*. JHU Press. [https://play.google.com/store/books/details?id=DfBLxVlq5IAC&source=gbs\\_api](https://play.google.com/store/books/details?id=DfBLxVlq5IAC&source=gbs_api)
- McPherson, M., & Nunes, M. B. (2004). The role of tutors as a integral part of online learning support. *European Journal of Open, Distance and E-learning*, 7(1).
- Morris, E. J., & Carroll, J. (2015). Developing a Sustainable Holistic Institutional Approach: Dealing With Realities 'on the Ground' When Implementing an Academic Integrity Policy. In *Handbook of Academic Integrity* (pp. 1-11). Springer Singapore. [https://doi.org/10.1007/978-981-287-079-7\\_23-2](https://doi.org/10.1007/978-981-287-079-7_23-2)
- Nigam, A., Pasricha, R., Singh, T., & Churi, P. (2021). A systematic review on ai-based proctoring systems: Past, present and future. *Education and Information Technologies*, 1-25. <https://doi.org/10.1007/s10639-021-10597-x>
- Pecorari, D. (2015). Plagiarism, international students and the second-language writer. *Handbook of Academic Integrity*, 1-11. [https://doi.org/10.1007/978-981-287-079-7\\_69-2](https://doi.org/10.1007/978-981-287-079-7_69-2)
- Peled, Y., Eshet, Y., Barczyk, C., & Grinautski, K. (2019). Predictors of Academic Dishonesty among undergraduate students in online and face-to-face courses. *Computers & Education*, 131, 49-59.
- Peterson, J. (2019). An Analysis of Academic Dishonesty in Online Classes. *Mid-Western Educational Researcher*, 31(1), 24-36.
- Pincus, H.S. & Schmelkin, L.P. (2003). Faculty Perceptions of Academic Dishonesty. *The Journal of Higher Education*, 74(2), 196-209. DOI: 10.1080/00221546.2003.11777196
- Pulvers, K. & Diekhoff, G.M. (1999). The Relationship Between Academic Dishonesty and College Classroom Environment. *Research in Higher Education*, 40(4), 487-498. <https://www.jstor.org/stable/40196358>

- Singer, N. (2021). Dartmouth Medical School Drops Online Cheating Cases Against Students – *The New York Times*. Retrieved 2021-09-23 from <https://www.nytimes.com/2021/06/10/technology/dartmouth-cheating-charges.html>
- Singer, N., & Krolik, A. (2021). Online Cheating Charges Upend Dartmouth Medical School – *The New York Times*. Retrieved 2021-09-23 from <https://www.nytimes.com/2021/05/09/technology/dartmouth-geisel-medical-cheating.html>
- Sowden, C. (2005). Plagiarism and the culture of multilingual students in higher education abroad. *ELT Journal*, 59(3), 226-233. <https://doi.org/10.1093/elt/cci042>
- Stats Canada. (2011). *Proceedings of the Standing Senate Committee on Social Affairs, Science and Technology*. Retrieved Sep 22, 2021 from <https://sencanada.ca/en/Content/SEN/Committee/403/soci/18evb-e>
- Stuber-McEwen, D., Wisley, P., & Hoggatt, S. (2009). Point, click, and cheat: Frequency and type of academic dishonesty in the virtual classroom. *Online Journal of Distance Learning*, 12(3).
- Sukhawathanakul, P., Hadwin, A., Rostampour, R., Olivares, M.B., & Shostak, K. (2022). Studying Under Stress: The Effect of COVID-19 Psychological Distress on Academic Challenges and Performance of Post-Secondary Students. *Journal of College Student Retention: Research, Theory & Practice*. <https://doi.org/10.1177/15210251221104245>
- Sutton, A. & Taylor, D. (2011). Confusion about collusion: working together and academic integrity. *Assessment & Evaluation in Higher Education*, 36(7), 831-841. <https://doi.org/10.1080/02602938.2010.488797>
- Wiggins, G. P. (1993). *Assessing Student Performance*. Jossey-Bass.
- Yeo, S. (2007). First-year university science and engineering students' understanding of plagiarism. *Higher Education Research & Development*, 26(2), 199-216. <https://doi.org/10.1080/07294360701310813>
- Yu, H., Glanzer, P.L., & Johnson, B.R. (2021). Examining the relationship between student attitude and academic cheating. *Ethics & Behavior*, 31(7), 475-487. <https://doi.org/10.1080/10508422.2020.1817746>
- Zhu, J., Racine, N., Bailin Xie, E., Park, J., Watt, J., Eirich, R., Dobson, K., & Madigan, S. (2021). Post-secondary Student Mental Health During COVID-19: A Meta-Analysis. *Front Psychiatry*, 12. DOI: [10.3389/fpsy.2021.777251](https://doi.org/10.3389/fpsy.2021.777251)



## APPENDICES

### Appendix A: Student Survey and Focus Group Questions

#### A.1 Student Survey Questions

1. Approval statement and acknowledgement
2. Please identify your gender:
  - a. Male
  - b. Female
  - c. Non-binary
  - d. Do not wish to identify
3. Please identify your current age:
  - a. <19
  - b. 20-29
  - c. 30-39
  - d. 40-49
  - e. 50-59
  - f. 60-69
  - g. 70 or more
4. Please state your current year of post-secondary experience:
  - a. Undergraduate, 1st Year
  - b. Undergraduate, 2nd Year
  - c. Undergraduate, 3rd Year
  - d. Undergraduate, 4th Year
  - e. Undergraduate, 5th Year or more
  - f. Graduate Student
5. What program are you majoring in? (Multi-select)
  - a. Arts & Science - Humanities
  - b. Arts & Science - Sciences
  - c. Arts & Science - Social Sciences
  - d. Dhillon School of Business
  - e. Education
  - f. Fine Arts
  - g. Health Sciences
  - h. Other (please list)
6. Where did you primarily reside before attending the University of Lethbridge (select the closest city)?
  - a. Lethbridge/ Southern Alberta (south of Calgary)
  - b. Calgary (and surrounding area, up to Red Deer)
  - c. Northern Alberta (north of Red Deer)
  - d. Western Canada (British Columbia, Saskatchewan, Manitoba)
  - e. Eastern Canada (Quebec, Ontario, Maritimes)
  - f. I am international student from the United States
  - g. I am an international student not from the United States
  - h. Other (Please specify)

7. What language do you primarily speak with friends/family?
  - a. English
  - b. French
  - c. Other - Please specify.
8. How proficient are you with the English language? (slider question, 0 is not at all proficient, 5 is proficient)
  - a. Reading (0-5)
  - b. Writing (0-5)
  - c. Speaking (0-5)
9. What is the highest level of education that your parent(s) have completed?
  - a. No high school
  - b. Some high school
  - c. High school
  - d. Technical/Trade school
  - e. Some college/university
  - f. Bachelor's degree
  - g. Graduate Degree
  - h. Professional degree (law, medicine, dentistry, etc.)
10. Please indicate your level of agreement with the following statements:
11. The University of Lethbridge was my first choice when applying to University
  - a. True
  - b. False
12. I chose the University of Lethbridge because of its class sizes relative to other universities I was considering.
  - a. True
  - b. False
13. I chose the University of Lethbridge because of its reputation.
  - a. True
  - b. False
14. I am satisfied with the access I have to instructors/faculty at the University of Lethbridge.
  - a. Strongly Agree
  - b. Agree
  - c. Neither disagree nor agree
  - d. Disagree
  - e. Strongly Disagree
15. I feel a sense of connection with my instructors/faculty at the University of Lethbridge.
  - a. Strongly Agree
  - b. Agree
  - c. Neither disagree nor agree
  - d. Disagree
  - e. Strongly Disagree
16. I feel a sense of belonging with the University of Lethbridge community.
  - a. Strongly Agree
  - b. Agree

- c. Neither disagree nor agree
  - d. Disagree
  - e. Strongly Disagree
17. I am a member of a university-related group(s) (i.e., sports team, academic workgroup/lab group, organizing body, sorority/fraternity, clubs, etc.)
- a. True
  - b. False
18. Please consider the following when responding to the next questions.

In regard to **plagiarizing**, the 2020-2021 University academic calendar states:

No student shall represent the words, ideas, images, or data of another person as his or her own.

In regard to **cheating**, the 2020-2021 University academic calendar states:

In the course of an examination, no student shall obtain or attempt to obtain information from another student or other unauthorized source, or give or attempt to give information to another student, or knowingly possess, use or attempt to use any unauthorized material.

No student shall represent or attempt to represent oneself as another or have or attempt to have oneself represented by another in the taking of an examination, preparation of a paper or other evaluated activity

In regard to **duplication**, the 2020-2021 University academic calendar states:

No student shall submit in any course or program of study, without both the knowledge and approval of the person or persons to whom it is submitted, all or a substantial portion of any academic assignment for which credit has previously been obtained or which has been or is being submitted in another course or program of study in the University or elsewhere.

19. On average what percentage of students do you believe are engaging in academically dishonest activities?
- a. Open answer question
20. Please indicate your level of agreement with the following statement: I believe that academic honesty among students is important.
- a. Strongly Agree
  - b. Agree
  - c. Neither disagree nor agree
  - d. Disagree
  - e. Strongly Disagree
21. Pick your top 3: Which of the following do you believe contributes to whether or not students engage in academic dishonesty?
- a. Time management concerns (juggling assignments, multiple close due dates)
  - b. The demands of a full course load
  - c. Familial pressure

- d. Social commitments
  - e. Financial concerns
  - f. Employment pressures
  - g. Apathetic attitude
  - h. Grade motivation
  - i. Negative relationship with professor
  - j. Mental and physical health concerns
  - k. Not understanding what counts as academically dishonest
  - l. Limited or difficult access to technology (webcam, microphone, wifi/internet connectivity issues)
  - m. Perception that my peers are doing so
  - n. Course type (elective versus major)
22. Please indicate your level of agreement with the following statements:
23. I feel that the **opportunity** to engage in academic dishonesty has increased since the University went primarily online in March of 2020.
- a. True
  - b. False
24. I have felt more **pressure** to engage in academic dishonesty since the University went primarily online in March of 2020.
- a. True
  - b. False
25. I agree with the University of Lethbridge's decision to not use online proctoring software.
- a. Strongly Agree
  - b. Agree
  - c. Neither disagree nor agree
  - d. Disagree
  - e. Strongly Disagree
26. On average, how has your workload changed since the University went primarily online in March of 2020?
- a. Greatly Increased
  - b. Increased
  - c. No change
  - d. Decreased
  - e. Greatly Decreased
27. On average, how has your quality of life changed since the University went primarily online in March of 2020?
- a. Greatly Increased
  - b. Increased
  - c. No change
  - d. Decreased
  - e. Greatly Decreased
28. Were you familiar with online "tutorial services" (such as CHEGG, Course Hero, etc.) before the university went online in March of 2020?
- a. Yes
  - b. No

29. Select all that apply: Which of the following have **you** engaged in, without explicit permission to do so?
- Copying someone else's work (exam answers, lab report, other assignments)
  - Communicating with other students during an exam (texting, online chat, etc.)
  - Failing to cite sources (e.g., copying and pasting responses without attribution)
  - Discussing assignment/exam content with students who haven't completed the assignment/exam yet
  - Using unapproved resources (Wikipedia, Googling questions, etc.)
  - Submitting assessment questions to online services like CHEGG or Course Hero for assistance
  - Looking through notes while completing online assessments
  - Working with a group or partner while completing online assessments
  - Sharing questions from assessments with a group or partners
  - Reusing an assignment from a previous course
  - Turning in an assignment another student completed for you
  - Turning in an assignment that you paid someone else to complete for you (This does not include someone being paid to edit the paper for things like APA formatting, etc.)
  - Using a Discord channel for one or more of your course(s)
  - Other (please specify)
30. Have you **personally witnessed** others engaging in academically dishonest activities since the University went primarily online in March of 2020?
- Yes
  - No
31. Display this question if yes to 30: On average, how frequently did you **personally witness** an incident of academic dishonesty?
- <1 per semester
  - 1 per semester
  - 2 per semester
  - 3 per semester
  - 4+ per semester
32. Display this question if yes to 30: What kinds of academic dishonesty did you **personally witness** others engaging in (check all that apply)?
- Copying someone else's work (exam answers, lab report, other assignments)
  - Communicating with other students during an exam (texting, online chat, etc.)
  - Failing to cite sources (e.g., copying and pasting responses without attribution)
  - Discussing assignment/exam content with students who haven't completed the assignment/exam yet
  - Using unapproved resources (Wikipedia, Googling questions, etc.)

- f. Submitting assessment questions to online services like CHEGG or Course Hero for assistance
  - g. Looking through notes while completing online assessments
  - h. Working with a group or partner while completing online assessments
  - i. Sharing questions from assessments with a group or partners
  - j. Reusing an assignment from a previous course
  - k. Turning in an assignment another student completed for you
  - l. Turning in an assignment that you paid someone else to complete for you (This does not include someone being paid to edit the paper for things like APA formatting, etc.)
  - m. Using a Discord channel for one or more of your course(s)
  - n. Other (please specify)
33. If you have any other comments that you would like to make about academic dishonesty on campus, please feel free to do so here. Please do not identify any specific individuals.
34. Upon the completion of this survey, you will be have the opportunity to indicate your interest in participating in a follow-up focus group. Participation in a focus-group is completely voluntary.

### A.2 Student Focus Group Questions

1. Do you prefer the remote delivery method of instruction, or do you prefer an in-person method of instruction? Why or why not?
2. How has the transition to a primarily online method of instruction affected your workload and subsequent time management?
3. Do you consider using online resources such as search engines, class note forums, and discord as cheating, even when the professor does not permit their use? Why or why not?
4. Has the opportunity to engage in academic dishonesty increased since the transition to online learning?
5. Do you think there are certain classes or assignment types that are easier to cheat on in an online learning environment?
6. If you were a professor or school administrator, what would you do to combat student cheating in an online learning environment?
7. What was the most important thing said here today? Is there something we missed?

### A.3 Student Survey Responses

Survey Items	N	%
<b>Demographics</b>		
<b>Gender</b>		
Female	723	65.8%
Male	351	31.9%
Non-binary	14	1.3%
Do not wish to identify	11	1.0%
<b>Age</b>		
< 19	307	28.0%
20-29	646	58.7%
30-39	90	8.2%

40-49	40	3.6%
50-59	12	1.1%
60-69	1	0.1%
70+	4	0.4%
<b>Year of Study</b>		22.3%
Undergraduate, 1st year	245	22.3%
Undergraduate, 2nd year	180	16.4%
Undergraduate, 3rd year	225	20.5%
Undergraduate, 4th year	219	19.9%
Undergraduate, 5th year or greater	230	20.9%
Graduate Student	0	0%
<b>Discipline Enrolled In</b>		
Arts & Science - Humanities	84	7.6%
Arts & Science - Sciences	383	34.8%
Arts & Science - Social Sciences	150	13.6%
Dhillon School of Business	171	15.5%
Education	83	7.5%
Fine Arts	91	8.2%
Health Sciences	104	9.4%
Other	34	3.1%
<b>Primary Residence Before University</b>		
Calgary (and surrounding area, up to Red Deer)	405	35.5%
Eastern Canada (Quebec, Ontario, Maritimes)	14	1.2%
I am an international student not from the United States	56	4.9%
I am an international student from the United States	6	0.5%
Lethbridge / Southern Alberta (south of Calgary)	476	41.7%
Northern Alberta (north of Red Deer)	108	9.5%
Western Canada (British Columbia, Saskatchewan, Manitoba)	54	4.8%
Other	22	1.9%
<b>What language do you primarily speak with</b>		
English	1070	94.1%
French	9	0.8%
Other	58	5.1%
<b>How proficient are you with the English language? - Reading</b>		
1 (not proficient)	1	0.1%
2	0	0.0%
3	28	2.5%
4	108	9.6%
5 (proficient)	992	87.9%
<b>How proficient are you with the English language? -</b>		
1 (not proficient)	1	0.1%
2	6	0.5%

3	56	5.0%
4	159	14.1%
5 (proficient)	904	80.3%
<b>How proficient are you with the English language? - Speaking</b>		
1 (not proficient)	1	0.1%
2	2	0.2%
3	26	2.3%
4	111	9.9%
5 (proficient)	986	87.6%
<b>What is the highest level of education attained amongst your parent(s)/guardian(s)?</b>		
No high school	17	1.5%
Some high school	34	3.0%
High school	150	13.2%
Technical/Trade school	116	10.2%
Some college/university	254	22.3%
Bachelor's degree	319	28.0%
Professional degree (law, medicine, dentistry, etc.)	78	6.9%
Graduate Degree	172	15.1%

***Survey Questions***

**The University of Lethbridge was my first choice when applying to university**

True	756	67.5%
False	364	32.5%

**I chose the University of Lethbridge because of its class sizes relative to other universities I was**

True	488	43.6%
False	632	56.4%

**I chose the University of Lethbridge because of its reputation.**

True	611	54.6%
False	508	45.4%

**I am satisfied with the access I have to instructors/faculty at the University of Lethbridge.**

Strongly agree	234	21.0%
Agree	574	51.3%
Neither agree nor disagree	147	13.2%
Disagree	121	10.8%
Strongly disagree	42	3.8%

**I feel a sense of connection with my instructors/faculty at the University of Lethbridge.**

Strongly agree	172	15.4%
Agree	437	39.1%
Neither agree nor disagree	256	22.9%



Disagree	172	15.4%
Strongly disagree	81	7.3%
<b>I feel a sense of belonging with the University of Lethbridge community.</b>		
Strongly agree	123	11.0%
Agree	377	33.7%
Neither agree nor disagree	364	32.6%
Disagree	175	15.6%
Strongly disagree	79	7.1%
<b>I am a member of a university-related group(s) (i.e., sports team, academic workgroup/lab group, organizing body, sorority/fraternity, clubs, etc.)</b>		
True	359	32.1%
False	761	68.0%
<b>Based on the above definitions, on average what percentage of students do you believe are engaging in academically dishonest activities (enter a number</b>		
<10%	116	11.8%
10-20%	231	23.4%
21-30%	142	14.4%
31-40%	95	9.6%
41-50%	114	11.6%
51-60%	66	6.7%
61-70%	60	6.1%
71-80%	96	9.7%
81-90%	43	4.4%
91-100%	24	2.4%
<b>I believe that academic honesty among students is important.</b>		
Strongly agree	541	50.1%
Agree	413	38.2%
Neither agree nor disagree	84	7.8%
Disagree	29	2.7%
Strongly disagree	13	1.2%
<b>Pick your top 3: Which of the following do you believe contributes to whether or not students engage in academic dishonesty?</b>		
Apathetic attitude	192	6.1%
Course type (elective versus major)	98	3.1%
Employment pressures	84	2.7%
Familial pressure	65	2.1%
Financial concerns	74	2.4%
Grade motivation	591	18.8%
Limited or difficult access to technology (webcam, microphone, WiFi/internet connectivity issues)	43	1.4%

Mental and physical health concerns	212	6.7%
Negative relationship with professor	96	3.1%
Not understanding what counts as academically	296	9.4%
Perception that my peers are doing so	165	5.2%
Social commitments	28	0.9%
The demands of a full course load	464	14.7%
Time management concerns (juggling assignments, multiple close due dates)	742	23.6%
<b>I feel that the opportunity to engage in academic dishonesty has increased since the University went primarily online in March of 2020.</b>		
True	877	83.6%
False	172	16.4%
<b>I feel that the pressure to engage in academic dishonesty has increased since the university went primarily online in March of 2020.</b>		
True	428	40.8%
False	621	59.2%
<b>I agree with the University of Lethbridge's decision to not use online proctoring software.</b>		
Strongly agree	506	48.1%
Agree	249	23.6%
Neither agree nor disagree	230	21.8%
Disagree	42	4.0%
Strongly disagree	25	2.4%
<b>On average, how has your course-related workload changed since the university went primarily online in March of 2020?</b>		
Greatly Increased	321	32.0%
Increased	403	40.2%
No change	223	22.3%
Decreased	45	4.5%
Greatly Decreased	10	1.0%
<b>On average, how have the demands placed on you in your everyday life changed since the university went primarily online in March of 2020?</b>		
Greatly Increased	371	37.0%
Increased	397	39.6%
No change	140	14.0%
Decreased	79	7.9%
Greatly Decreased	16	1.6%
<b>On average, how has your quality of life changed since the university went primarily online in March of 2020?</b>		
Greatly Increased	48	4.8%
Increased	95	9.4%

No change	163	16.2%
Decreased	446	44.2%
Greatly Decreased	257	25.5%
<b>Were you familiar with online “tutorial services” (such as CHEGG, Course Hero, etc.) before the university went primarily online in March of 2020</b>		
Yes	421	41.7%
No	587	58.2%
<b>Select all that apply: Which of the following have you engaged in, without explicit permission to do so?</b>		
None	379	20.4%
Communicating with other students during an exam	85	4.6%
Copying someone else’s work	51	2.7%
Discussing assignment/exam content	152	8.2%
Failing to cite sources	63	3.4%
Looking through notes while completing online assessments	383	20.6%
Reusing an assignment from a previous course	30	1.6%
Sharing questions from assessments with a group or partners	56	3.0%
Submitting assessment questions to online services	20	1.1%
Turning in an assignment that you paid someone else to complete for you	6	0.3%
Using a Discord channel for one or more of your courses	205	11.0%
Using unapproved resources (Wikipedia Googling questions etc.)	265	14.3%
Working with a group or partner while completing online assessments	102	5.5%
Turning in an assignment another student completed for you	4	0.2%
Other	57	3.1%
<b>Have you personally witnessed others engaging in academically dishonest activities since the University went primarily online in March of 2020?</b>		
Yes	326	32.7%
No	671	67.3%
<b>On average, how frequently did you personally witness an incident of academic dishonesty?</b>		
<1 per semester	40	13.0%
1 per semester	58	18.8%
2 per semester	61	19.8%
3 per semester	40	13.0%
4+ per semester	109	35.4%

**What kinds of academic dishonesty did you personally witness others engaging in (check all that apply)?**

None	673	32.6%
Communicating with other students during an exam	184	8.9%
Copying someone else's work	136	6.6%
Discussing assignment/exam content	166	8.0%
Failing to cite sources	57	2.8%
Looking through notes while completing online	170	8.2%
Reusing an assignment from a previous course	45	2.2%
Sharing questions from assessments with a group or	115	5.6%
Submitting assessment questions to online services	79	3.8%
Turning in an assignment that you paid someone else to	23	1.1%
Using a Discord channel for one or more of your courses	116	5.6%
Using unapproved resources Wikipedia Googling	123	6.0%
Working with a group or partner while completing online	146	7.1%
Turning in an assignment another student completed for	26	1.3%
Other	7	0.3%

**Appendix B: Faculty Note, June 12, 2020**

*Answers compiled and developed by Christina Nord and Stephanie Varsanyi*

**1. What are the challenges with academic dishonesty in an online environment?**

Many of the opportunities for academic dishonesty within an online environment are not unique from those in face-to-face environments. Plagiarism, certain forms of cheating, fabrication (citing non-existent sources or inventing data/information), and facilitation (assisting others to commit academic dishonesty) are just as plentiful in online settings. Some instances, like facilitation, are even more common in an online setting, because students may share their answers with their friends online. Although, simply put, online learning can never replicate the face-to-face learning environment. Because of this, many of the traditional tools used to combat academic dishonesty in face-to-face settings do not neatly apply to online environments. Furthermore, the ways in which faculty members can develop personal connections with students, or between students and the material, look very different in online settings, and fostering such connections can be critical in reducing motivations to cheat.

Often, unique opportunities for academic dishonesty within an online environment are the result of attempts to replicate face-to-face learning and examination into an online environment. For example, the use of prohibited outside materials during an exam or in-class essays can be easily monitored in person, so instructors can easily deploy exams that examine a student's ability to recall facts and figures. However, in an online setting, such monitoring cannot take place during remote delivery of materials. While there are attempts to develop strategies, such as strictly timed exams, or software that allow instructors to remotely proctor exams, these strategies are receiving more and

more criticism in light of the current pandemic. Students who were unprepared to transition to a fully online classroom setting, or otherwise had no choice but to do so, may not have the resources, such as stable internet connections, or ready access to technology required to faithfully participate in such exams.

Additionally, many of these current strategies can be particularly troubling for student wellbeing in a pandemic. Students may be dealing with one or many of a myriad of difficulties that have arisen in an age of pandemic (e.g., being sick themselves, having to fill a caregiving roles for others, dealing with a reduction in income or financial aid, coping with the general stress that comes from having to constantly socially distance from others, trying to etch out work spaces in shared living arrangements, etc.) and completing strictly-timed exams only adds to the pressure. Additionally, there are growing privacy concerns in relation to remote proctoring programs, which often record video and/or monitor keystrokes of students while they take their exam. It has been difficult to determine how companies are using this information and whether these companies are protecting such information.

## **2. What can faculty do to reduce academic dishonesty in an online environment?**

Since online learning cannot replicate face-to-face learning, transitioning to an online setting can present new opportunities for innovative course delivery that removes many of the opportunities for academic dishonesty which result from attempts to translate face-to-face learning into an online environment. Many instructors have found that rephrasing assignments and exams to focus on applying, distilling, and engaging with material rather than recalling material reduces the most common methods of academic dishonesty. Others have found that specifically telling students what cheating looks like for each assignment right before it is distributed can reduce the less explicit instances of academic dishonesty. Oftentimes students have to contend with vastly differing expectations across their courses, such that what is considered academic dishonesty for one course is completely acceptable in another. When students clearly know what resources are available to them for their assignments and exams they are more likely to seek these resources rather than commit academic dishonestly by using another. Furthermore, walking students through how they should respond to their peers when pressured to cheat can reduce the facilitation of peer-based academic dishonesty.

A good portion of the advice to reduce academic dishonestly in an online setting is the same as advice to reduce academic dishonesty in a face-to-face setting. Making sure your students know how and they can reach you to get help can also reduce their temptation to seek less-than desirable alternatives. Furthermore, providing specific goals, requirements, and due dates for each assignment can also help build a culture of academic honesty.

Finally, it is critical to know that any apprehension and distress resulting from the belief that students commit academic dishonesty more often in online settings is contrary to research<sup>1</sup> that has found no such relationship (though it may be easier to identify the means with which students do cheat in online

settings). This concern, according to Douglas Harrison, vice president and dean of the School of Cybersecurity and Information Technology at the University of Maryland Global Campus, “risks stigmatizing all students as cheaters, shifts the pedagogical focus away from developmental teaching and learning and toward a fixation on punitive measures, and wastes an opportunity for a more reflective approach to online assignment and assessment design.” Harrison stresses, “no assessment is uncheatable... the most pedagogically meaningful response to issues of academic integrity in online assessments begins with a few basic principles and concepts.”

These principles are twofold. The first is to realize that all online education is remote learning, but not all remote learning is online education. Proper online education has an intentional educational architecture that has been specifically designed for virtual teaching, learning, and examination. Online education also includes tools Harrison describes as “strategically deployed for engagement and outcomes, as well as wraparound services that provide support throughout the online student life cycle.” The second is to realize that transitioning an in-person class to a fully optimized online learning environment can take a significant amount of time. However, the primary goal, according to Harrison, should be to provide students with “meaningful engagement with faculty members and peers in the move to remote teaching.”

### **3. What advice would you give to faculty members to combat academic dishonesty in their online courses?**

One of the best strategies to reduce academic *dishonesty* is to build a culture of academic *honesty*. This can be achieved by explaining the importance of the course material, describing your goals as an instructor, and allowing students to describe their goals for their participation in the course. This honesty-focused strategy can help foster a connection between yourself and students, allowing you to serve as a mediator between them and the material.

However, building connections between yourself, students, and the course material can present unique challenges in an online setting. Fortunately, online settings can present many opportunities to develop relationships between yourself and students. When everyone is online, it is easy to use surveys, polls, and questions to engage students. These tools can also be used as frequent low-stakes assessment, and do not need to be deployed synchronously. Such frequent assessment can also allow you to monitor their progress, which then allows you to modify course material to meet student needs, reducing the motivation to cheat when material seems unreachable. Beyond using discussion boards for general inquiry and superficial discussion, they can also be used to present problems to students where students can brainstorm solutions and practice skills that you may want to probe in marked assignments and exams. Discussion boards can also be spaces where students can reflect on what they have learned. Finally, discussion boards can be incorporated into coursework by encouraging students to respond to previous responses, allowing them practice engaging both with the material and their peers. Faculty should also ensure that they open the means of communication to students and make it clear that they

are open to receiving emails, messages, and are willing to engage in other forms of communication, such as video chats, as alternatives to meeting face-to-face.

Additionally, according to Harrison, students are less likely to cheat when they are “invited to demonstrate learning in ways that are most authentic to them.” Authentic assessment, defined by Grant Wiggins in *Assessing Student Performance*, is “engaging and worthy problems or questions of importance, in which students must use knowledge to fashion performances effectively and creatively. The tasks are either replicas of or analogous to the kinds of problems faced by adult citizens and consumers or professionals in the field.” Harrison provides an example:

“[A] faculty member seeking to replace a multiple-choice exam on nutrition, digestion and metabolism could introduce more authentic assessment by giving students the option of tracking their own dietary intake and metabolic indicators. They could then evaluate the results or analyze food service menus and create an integrative map of the outcomes and impacts on diet and health.

Even when traditional exams represent the most appropriate assessment tool, there are ways to enrich authenticity. Consider replacing six multiple-choice or true-and-false questions with two short-answer items. Or simply ask students to record a brief spoken-word explanation of their answers to two questions and return the recordings after the exam.

Of course, under the current circumstances, there will be realistic limits to how much anyone can use the move online to introduce more authentic assessment. That’s OK. No matter the approach to online teaching and assessment, the most important thing we are teaching, learning and assessing right now may be the criticality of adaptability and resilience that come from a commitment to lifelong learning.”

#### **4. What advice in general would you have for faculty members who are teaching online?**

Much of the advice about moving courses online is practical and straightforward. Keeping presentations simple, with clear learning outcomes explained, can help students engage with material while also be facing the complicated distractions of an online environment. Faculty should also be flexible and open to new approaches. For example, in order to avoid differing problems that arise with distance learning, faculty should be sure to use university detection software whenever possible, including things like Turn It In, even if they have previously avoided using it. This software can help faculty to detect cheating and plagiarism right away, before they even get familiar with a student’s overall performance.

Using the online environment to your advantage, through integrating existing online resources into your course, can also increase engagement. Online delivery also has the capability to allow students to be flexible with their time, which can help students accommodate their busy schedules. However, we would encourage professors to have weekly or daily goals for students to help them learn to plan accordingly, as the transition to online learning may also be a new experience for students. Likewise, it is also important to identify students who are struggling early on, so that they can access resources they need to keep up with the course. Some reports have suggested circumventing this issue by utilizing teaching assistants or tutors and having them available for students to reach out to, as some students may feel as if they are asking “silly” questions or taking up too much of a professors time by sending them formal e-mails for every concern. Furthermore, it is important that students needing accommodations are given such, to ensure that all students can excel in the course.

**References:**

Brimble, M. (2016). Why Students Cheat: An Exploration of the Motivators of Student Academic Dishonesty in Higher Education. In *Handbook of Academic Integrity* (pp. 365-382). Springer Singapore.  
[https://doi.org/10.1007/978-981-287-098-8\\_58](https://doi.org/10.1007/978-981-287-098-8_58)

Harris, L., Harrison, D., McNally, D., & Ford, C. (2019). Academic integrity in an online culture: Do McCabe’s findings hold true for online, adult learners? *Journal of Academic Ethics*, 1-16. <https://doi.org/10.1007/s10805-019-09335-3>

Harrison, D. (2020). Online Education and Authentic Assessment. Retrieved 2020-06-12 from <https://www.insidehighered.com/advice/2020/04/29/how-discourage-student-cheating-online-exams-opinion>

McPherson, M., & Nunes, M. B. (2004). The role of tutors as a integral part of online learning support. *European Journal of Open, Distance and E-learning*, 7(1).

Peled, Y., Eshet, Y., Barczyk, C., & Grinautski, K. (2019). Predictors of Academic Dishonesty among undergraduate students in online and face-to-face courses. *Computers & Education*, 131, 49-59.

Wiggins, G. P. (1993). *Assessing Student Performance*. Jossey-Bass.

**To access a presentation by Douglas Harrison best practices and techniques for conducting assessments securely in an online environment:**  
<https://www.academicintegrity.org/webinar/webinar-going-remote-with-integrity-2-0-technological-tips-techniques/>



**Appendix C: Student enrollment Spring 2021**

<b>Attendance</b>	<b>N</b>	<b>%</b>
Full-time	7,124	87.4
Part-time	1,029	12.6
<b>Overall Total</b>	<b>8,153</b>	<b>100.0</b>

**C.1 Attendance****C.2 Delivery Type : Face-to-Face and Online**

<b>Delivery Type</b>	<b>Course Type</b>	<b>N</b>	<b>%</b>
<b>Face-to-Face</b>	Activity	39	22.2%
	Lab	44	25.0%
	Lecture	10	5.7%
	Studio	82	46.6%
	Tutorial	1	0.6%
	<b>Total</b>	<b>176</b>	<b>100.0%</b>
<b>Online</b>	Online Lab	130	13.4%
	Online Lecture	713	73.7%
	Online Studio	60	6.2%
	Online Tutorial	65	6.7%
	<b>Total</b>	<b>968</b>	<b>100.0%</b>
<b>Overall Total</b>		<b>1144</b>	
<b>Delivery Type</b>	<b>Course Type</b>	<b>N</b>	<b>%</b>
<b>Asynchronous</b>	Activity	6	4.5%
	Lab	8	6.0%
	Lecture	1	0.7%
	Online Lab	12	9.0%
	Online Lecture	91	67.9%
	Online Studio	1	0.7%

	Online Tutorial	1	0.7%
	Studio	14	10.4%
	<b>Total</b>	<b>134</b>	<b>100.0%</b>
<b>Synchronous</b>	Activity	33	3.3%
	Lab	36	3.6%
	Lecture	9	0.9%
	Online Lab	118	11.7%
	Online Lecture	622	61.6%
	Online Studio	59	5.8%
	Online Tutorial	64	6.3%
	Studio	68	6.7%
	Tutorial	1	0.1%
	<b>Total</b>	<b>1010</b>	<b>100.0%</b>
	<b>Overall Total</b>		<b>1144</b>

## Appendix D: Educator survey and focus group questions

### D.1 Educator Survey Questions

1. Approval
2. Please identify your gender:
  - a. Male
  - b. Female
  - c. Non-Binary
  - d. Other
3. What is your current teaching position with the University of Lethbridge:
  - a. Sessional Instructor
  - b. Term Appointment
  - c. Full-time Academic Assistant/Instructor
  - d. Assistant Professor
  - e. Associate Professor
  - f. Professor
  - g. Emeritus
4. Please state your current years of post-secondary teaching experience:
  - a. 5 or fewer
  - b. 6-10
  - c. 11-20

- d. 21-30
  - e. 31 or greater
5. What discipline(s) do you currently teach in?
- a. Arts & Science - Humanities Arts & Science - Sciences
  - b. Arts & Science - Social Sciences Dhillon School of Business Education
  - c. Fine Arts
  - d. Health Sciences
  - e. Other (please list)
6. Please indicate your level of agreement with the following statement: I believe that student academic honesty is important.
- a. Strongly Disagree
  - b. Disagree
  - c. Neither disagree nor agree
  - d. Agree
  - e. Strongly Agree
7. Have you witnessed incidents of academic dishonesty since the University went primarily online in March of 2020?
- a. Yes
  - b. No
8. Display this question if yes to 7: On average, how many incidents of academic dishonesty per semester have you **witnessed** since the university went primarily online in March of 2020?
- a. Written answer question
9. Display this question if yes to 7: Check all that apply: What kinds of academic dishonesty did you **witness** students engaging in?
- a. Copying someone else's work (exam answers, lab report, other assignments)
  - b. Communicating with other students during an exam (texting, online chat, etc.)
  - c. Failing to cite sources (e.g., copying and pasting responses without attribution)
  - d. Discussing assignment/exam content with students who hadn't completed the assignment/exam yet
  - e. Using unapproved resources (Wikipedia, Googling questions, etc.)
  - f. Submitting assessment questions to online services like CHEGG or Course Hero for assistance
  - g. Looking through notes while completing online assessments
  - h. Working with a group or partner while completing online assessments
  - i. Sharing questions from assessments with a group or partners
  - j. Reusing an assignment from a previous course
  - k. Turning in an assignment another student completed for them
  - l. Turning in an assignment that they paid someone else to complete for them
  - m. Other (please specify)
10. Have you reported incidents of academic dishonesty since the University went primarily online in March of 2020?

- a. Yes
  - b. No
11. Display this question if yes to 10: On average, how many incidents of academic dishonesty per semester have you **reported** since the university went primarily online in March of 2020?
- a. Written answer question
12. Display this question if yes to 10: Check all that apply: What kinds of academic dishonesty did you **report**?
- a. Copying someone else's work (exam answers, lab report, other assignments)
  - b. Communicating with other students during an exam (texting, online chat, etc.)
  - c. Failing to cite sources (e.g., copying and pasting responses without attribution)
  - d. Discussing assignment/exam content with students who hadn't completed the assignment/exam yet
  - e. Using unapproved resources (Wikipedia, Googling questions, etc.)
  - f. Submitting assessment questions to online services like CHEGG or Course Hero for assistance
  - g. Looking through notes while completing online assessments
  - h. Working with a group or partner while completing online assessments
  - i. Sharing questions from assessments with a group or partners
  - j. Reusing an assignment from a previous course
  - k. Turning in an assignment another student completed for them
  - l. Turning in an assignment that they paid someone else to complete for them
  - m. Other (please specify)
13. Display this question if yes to 10: Select all that apply: How did you handle the incident(s) of academic dishonesty you witnessed?
- a. Discussed with student
  - b. Reported to the Dean
  - c. Reported to the Chairperson
  - d. Reported to the Team Leader or Course Leader
  - e. Other (please list)
14. Please indicate whether you agree with the following statement: I have changed how I approach reporting incidents of academic dishonesty since the University went primarily online in March of 2020.
- a. Yes
  - b. No
15. Display this question if yes to 14: How have you changed your reporting practices
- a. I am more likely to report an incident
  - b. I am less likely to report an incident
16. If you have witnessed incidents of academic dishonesty since we went primarily online in March of 2020 but did not chose to report, what are some of the reasons why you chose not to (choose your top 3)?

- a. Does not apply: I always report
  - b. Lack of Chairperson or Dean Support
  - c. Unfamiliar with the academic misconduct institutional policies
  - d. Not intentional on the students' part
  - e. Insufficient evidence
  - f. Reporting the incident was too much work
  - g. Lack of time
  - h. Potential for negative student evaluation(s)
  - i. Potential for negative peer evaluations(s)
  - j. Fear of verbal or physical assault
  - k. Opposed to confrontation
  - l. Potential for damaged relationships between the faculty and the student(s)
  - m. Potential for damaged relationships between the faculty member and their colleague(s)
  - n. Fear of negative impact from the administration personnel
  - o. Didn't want to damage your reputation
  - p. Fear of losing your job
  - q. Other (please list)
17. Please indicate your level of agreement with the following statements: I have changed how I communicate what constitutes academic dishonesty to my students since the University went primarily online in March of 2020.
- a. Strongly Agree
  - b. Agree
  - c. Neither disagree nor agree
  - d. Disagree
  - e. Strongly Disagree
18. Since the transition to online learning, I have changed how I communicate what constitutes academic dishonesty to my students by (check all that apply):
- a. I have not changed how I communicate what constitutes academic dishonesty to students
  - b. Adding additional information about academic integrity to class syllabi
  - c. Staying after class to discuss concerns with students
  - d. Specifically teaching what constitutes academic dishonesty during class time
  - e. Discussing academic dishonesty concerns with students outside of class
  - f. Other- please list
19. What percentage of your students do you believe have engaged in academically dishonest activities since the university went online in March of 2020?
- a. Open answer response
20. In my experience, I believe that incidents of academic dishonesty are increasing since the University went primarily online in March of 2020.
- a. Yes

- b. No
21. Display if answer to 20 is yes: Please list examples of the forms you have seen increasing.
  22. Please indicate whether or not you agree with the following statement: Since the University went primarily online in March of 2020, I have changed how I approach incidents of academic dishonesty.
    - a. Yes
    - b. No
  23. Display if yes to 22: How have you changed how you approach incidents of academic dishonesty?
    - a. I am more vigilant and more likely to report incidents
    - b. I am more vigilant but less likely to report incidents
    - c. I am less vigilant but more likely to report incidents
    - d. I am less vigilant and less likely to report incidents
  24. Please indicate whether or not you agree with the following statement: I agree with the University of Lethbridge's decision to not use proctoring software
    - a. Strongly Agree
    - b. Agree
    - c. Neither disagree nor agree
    - d. Disagree
    - e. Strongly Disagree
  25. If you have any other comments that you would like to make about academic dishonesty on campus, please feel free to do so here. Please do not identify any specific individuals.
  26. Upon the completion of this survey, you will have the opportunity to indicate your interest in participating in a follow-up focus group. Participation in a focus-group is completely voluntary.

## **D.2 Educator Focus Group Questions**

1. What were some of the challenges regarding the maintenance of academic integrity that you faced when transitioning your courses to remote delivery?
2. Did you receive any training on campus or elsewhere that was designed to prepare you to address academic integrity-related issues in an online learning environment? Did it help?
3. Do you think that academic dishonesty increased or decreased since the transition to online learning? If so, in what ways?
4. Since the transition to online learning, what is the most common form of academic dishonesty you've seen? Is it different from when you taught primarily in person?
5. Since the transition to online learning, how have you modified your course material to prevent academic dishonesty?
6. Since the transition to a remote delivery are you more or less likely to report incidents, you witness? Why?
7. What advice do you have for administration on how to combat academic dishonesty in the online learning environment?

**D.3 Educator Survey Responses**

Survey Items	<i>N</i>	Percentage
<i>Demographics</i>		
<b>Gender</b>		
Female	45	44.6%
Male	48	47.5%
Non-binary	1	0.9%
Do not wish to identify	7	6.9%
<b>Current Teaching Position</b>		
Term Appointment	5	5.0%
Sessional Instructor	11	11.0%
Full-time Academic Assistant/Instructor	30	30.0%
Assistant Professor	9	9.0%
Associate Professor	27	27.0%
Professor	17	17.0%
Emeritus	1	1.0%
<b>Years of Teaching Experience</b>		
5 or fewer	22	21.8%
6-10	13	12.9%
11-20	30	29.7%
21-30	25	24.8%
31 or greater	11	10.9%
<b>Discipline Teaching In</b>		
Arts & Science - Humanities	19	18.1%
Arts & Science - Sciences	37	35.2%
Arts & Science - Social Sciences	11	10.5%
Dhillon School of Business	10	9.5%
Education	7	6.7%
Fine Arts	6	5.7%
Health Sciences	10	9.5%
Other	5	4.8%
<b>Survey Questions</b>		
<b>I believe that academic honesty among students is important.</b>		
Strongly agree	90	89.1%
Agree	7	6.9%
Neither agree nor disagree	3	3.0%
Disagree	0	0.0%
Strongly disagree	1	1.0%
<b>Have you witnessed incidents of academic dishonesty since the university went primarily online in March of 2020?</b>		
Yes	62	62.6%
No	37	37.4%

**On average, how many incidents of academic dishonesty per semester have you witnessed since the university went primarily online in March of 2020?**

1 incident	6	12.2%
2 incidents	10	20.4%
3 incidents	7	14.3%
4 incidents	3	6.1%
5 incidents	2	4.1%
6 incidents	2	4.1%
8 incidents	2	4.1%
10 incidents	8	16.3%
14 incidents	1	2.0%
20 incidents	2	4.1%
28 incidents	1	2.0%
30 incidents	3	6.1%
58 incidents	1	2.0%
100 incidents	1	2.0%

**Check all that apply: What kinds of academic dishonesty did you witness students engaging in?**

Communicating with other students during an exam	23	11.7%
Copying someone else's work	31	15.7%
Discussing assignment/exam content	11	5.6%
Failing to cite sources	29	16.7%
Looking through notes while completing online assessments	10	5.1%
Reusing an assignment from a previous course	13	6.6%
Sharing questions from assessments with a group or partners	11	5.6%
Submitting assessment questions to online services	14	7.1%
Turning in an assignment that they paid someone else to complete for them	3	1.5%
Using unapproved resources Wikipedia Googling questions etc.	23	11.7%
Working with a group or partner while completing online assessments	15	7.6%
Turning in an assignment another student completed for them	5	2.5%
Other	7	3.6%

**Have you reported incidents of academic dishonesty since the university went primarily online in March of 2020?**

Yes	26	27.1%
-----	----	-------



No 70 72.9%

**On average, how many incidents of academic dishonesty per semester have you reported since the university went primarily online in March of 2020?**

1 per semester	7	36.8%
2 per semester	3	15.8%
3 per semester	2	10.5%
4 per semester	1	5.3%
5 per semester	2	10.5%
6 per semester	1	5.3%
15 per semester	1	5.3%
20 per semester	1	5.3%
54 per semester	1	5.3%

**Check all that apply: What kinds of academic dishonesty did you report? - Selected Choice**

Communicating with other students during an exam	9	14.1%
Copying someone else's work	12	18.8%
Discussing assignment/exam content	2	3.1%
Failing to cite sources	12	18.8%
Looking through notes while completing online assessments	1	1.6%
Reusing an assignment from a previous course	2	3.1%
Sharing questions from assessments with a group or partners	1	1.6%
Submitting assessment questions to online services	10	15.6%
Turning in an assignment that they paid someone else to complete for them	2	3.1%
Using unapproved resources Wikipedia Googling questions etc.	4	6.3%
Working with a group or partner while completing online assessments	4	6.3%
Turning in an assignment another student completed for them	3	4.7%
Other	2	3.1%

**Select all that apply: How did you handle the incident(s) of academic dishonesty you witnessed? - Selected Choice**

Discussed with student	48	49.5%
Reported to the Team/Course Leader	9	9.3%
Reported to the Chairperson	4	4.1%
Reported to the Dean	24	24.7%

Other	12	12.4%
<b>I have changed how I report incidents of academic dishonesty since the university went primarily online in March of 2020.</b>		
Yes	22	22.2%
No	77	77.8%
<b>How have you changed your reporting practices since the university went primarily online in March of 2020?</b>		
I report incidents less often	7	33.3%
I report incidents more often	14	66.7%
<b>If you have witnessed incidents of academic dishonesty since we went primarily online in March of 2020 but did not chose to report, what are some of the reasons why you chose not to? (Choose your top 3)</b>		
Fear of verbal or physical assault	1	0.6%
Potential for negative peer evaluations	1	0.6%
Opposed to confrontation	2	1.2%
Unfamiliar with the academic misconduct institutional policies	4	2.4%
Fear of negative impact from the administration personnel	2	1.2%
Lack of Chairperson or Dean Support	4	2.4%
Potential for negative student evaluations	5	3.0%
Potential for damaged relationships between the faculty and the students	10	6.0%
Reporting the incident was too much work	12	7.1%
Lack of time	14	8.3%
Not intentional on the students' part	28	16.7%
Does not apply: I always report	30	17.9%
Insufficient evidence	36	21.4%
Potential for damaged relationships between faculty and colleagues	0	0%
Didn't want to damage your reputation	0	0%
Fear of losing your job	0	0%
Other	19	11.3%
<b>I have changed how I communicate what constitutes academic dishonesty to my students since the university went primarily online in March of 2020.</b>		
Strongly agree	19	20.2%
Agree	33	35.1%

Neither agree nor disagree	15	16.0%
Disagree	16	17.0%
Strongly disagree	11	11.7%

**Check all that apply: I have changed how I communicate what constitutes academic dishonesty to my students since the university went primarily online in March of 2020 by...**

Discussing academic dishonesty concerns with students outside of class	21	13.7%
Specifically teaching what constitutes academic dishonesty during class time	43	28.1%
Adding additional information about academic integrity to class syllabi	48	31.4%
I have not changed how I communicate what constitutes academic dishonesty to students	33	21.6%
Other	8	5.2%

**What percentage of your students do you believe have engaged in academically dishonest activities since the university went online in March of 2020?**

0	13	15.5%
1	4	4.8%
2	3	3.6%
3	2	2.4%
4	2	2.4%
5	18	21.4%
6	1	1.2%
7	1	1.2%
10	12	14.3%
15	9	10.7%
20	3	3.6%
25	5	6.0%
30	2	2.4%
40	4	4.8%
53	1	1.2%
54	1	1.2%
70	1	1.2%
75	1	1.2%
80	1	1.2%

**In my experience, I believe that incidents of academic dishonesty are increasing since the university went primarily online in March of 2020.**

Yes	67	71.3%
No	27	28.7%

**Since the university went primarily online in March of 2020, I have changed how I approach incidents of academic dishonesty.**

Yes	33	34.4%
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No	63	65.6%
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**How have you changed how you approach incidents of academic dishonesty?**

I am more vigilant and more likely to report incidents	12	40.0%
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I am more vigilant but less likely to report incidents	13	43.3%
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I am less vigilant but more likely to report incidents	0	0.0%
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I am less vigilant and less likely to report incidents	5	16.7%
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**I agree with the University of Lethbridge's decision not to use online proctoring software**

Strongly agree	24	25.8%
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Agree	20	21.5%
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Neither agree nor disagree	32	34.4%
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Disagree	8	8.6%
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Strongly disagree	9	9.7%
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