In the Spring of 2020, students left campus for Spring Break in mid-March; the university subsequently moved to an all-online delivery of classes due to the coronavirus pandemic. The library remained open to faculty, staff, and students still on campus between March 16 – April 13, at which point the library closed completely to patrons and all staff worked from home. Service transactions and instruction delivery continued in the remote environment through the webchat service, over the phone, via email, and through video-conferencing platforms.

Questions answered

Library staff logged 698 service transactions, a 42% drop from the 1,213 transactions logged in the spring of 2019. 556 transactions (79%) occurred before students left campus on March 15, and 142 transactions (21%) occurred in the remainder of the semester. 54% of transactions were reference related, an increase of 17% over spring 2019.

Information Literacy Classes

Librarians taught 67 classes this semester, reaching an audience of 1,094 students, numbers which held steady with previous spring semesters. This is remarkable, considering librarians adapted to an all online course delivery by conducting 16 sessions synchronously or asynchronously – meaning 23% of sessions were able to be delivered in an all-online environment.
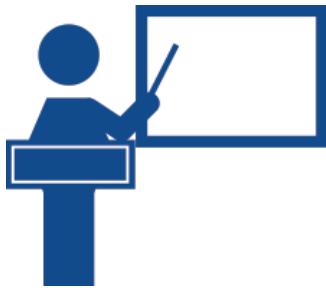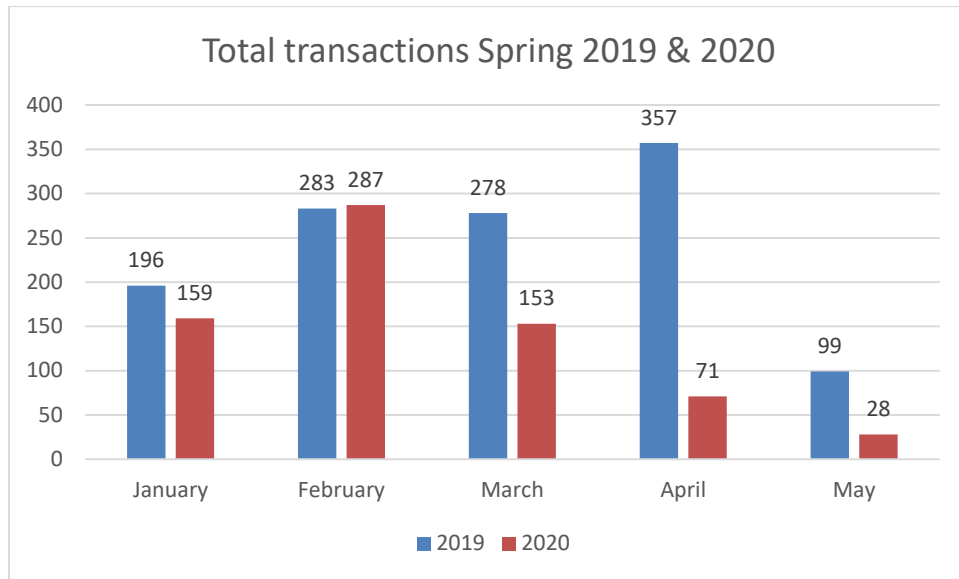
COVID-19 Adaptations

Although the library was physically closed to patrons for a significant portion of the semester, we adapted our services to be delivered virtually. We did not see a direct translation of the same number of transactions from in-person to virtual services, but in general we saw an increase of remote-medium transactions, and a shift in the distribution of transactions throughout the day and week.
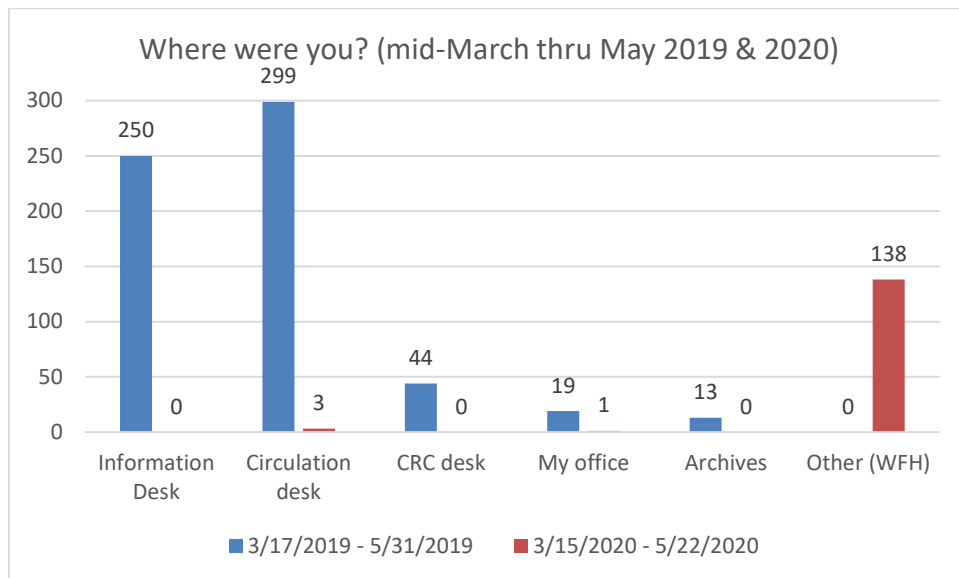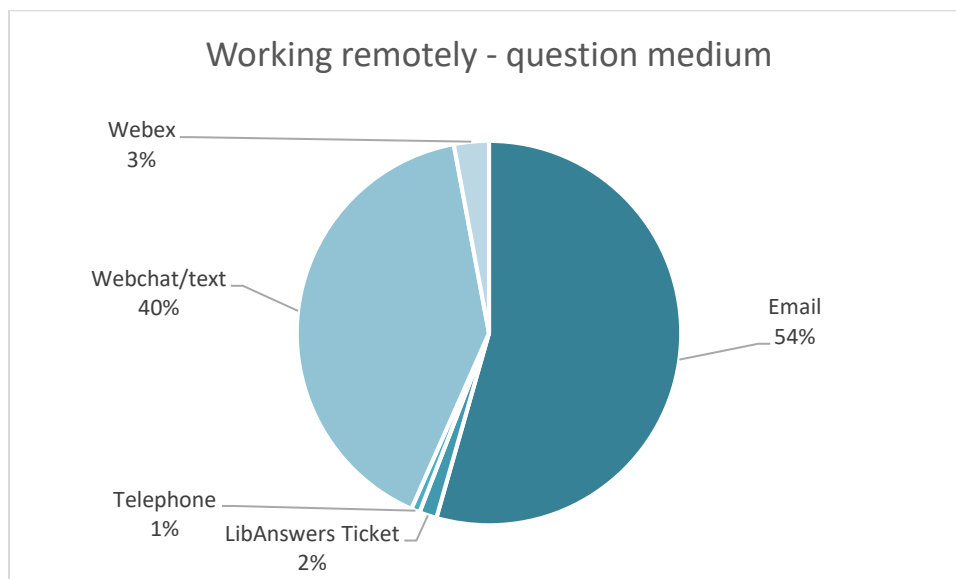
Total Service Transactions

With nearly all students leaving campus on March 15, all classes moving to remote delivery for the remainder of the spring semester, and the library being closed to all patrons in early April, library services moved to an effectively all-virtual service model for the final two months of the spring semester. We saw a precipitous 78% drop in service transactions between mid-March and May 15, 2020, conducting 138 transactions, compared to 625 transactions during the same period in 2019. While staff worked remotely, service transactions were conducted via email (54% of transactions), Webchat/text (40%), Webex videoconferencing software (3%), LibAnswers ticketing system (2%), and phone (1%).

Total transactions Spring 2019 & 2020

Month	2019	2020
January	196	159
February	283	287
March	278	153
April	357	71
May	99	28

Where were you? COVID-19 period (3/15/2020 – 5/22/2020) compared to same period in 2019

Where were you? (mid-March thru May 2019 & 2020)

Location	3/17/2019 - 5/31/2019	3/15/2020 - 5/22/2020
Information Desk	250	0
Circulation desk	299	3
CRC desk	44	0
My office	19	1
Archives	13	0
Other (WFH)	0	138

Working remotely – transaction medium

Working remotely - question medium

Webex
3%

Webchat/text
40%

Email
54%

Telephone
1%

LibAnswers Ticket
2%

Question medium, Spring 2019 & 2020

As was to be expected, the medium by which service transactions occurred changed after library operations moved to an all-virtual service model. In-person transactions were on track to be about even with transactions in the spring of 2019, and then dropped after students left campus in mid-March. Although we anticipated a jump in webchat transactions, doubling the staffing of the reference chat during the day, we did not see a significant increase in chat transactions. Instead, we saw chat transactions remain at a constant level from February through April, unlike the drop in March and then jump in April of 2019. Total chat transactions during the spring of 2020 actually decreased from spring 2019, from 120 to 102 chat transactions, or a drop of 15%. The remote medium where we saw the most increased traffic after the library moved to all virtual services was email. In both March and April of 2020, email service transactions doubled from 2019, from 13 to 25 and 19 to 42 transactions, respectively. Telephone transactions dropped off in similar manner as in-person transactions, possibly an effect of uneven implementation of forwarding reference, circulation, and office phones to staff's personal phones.
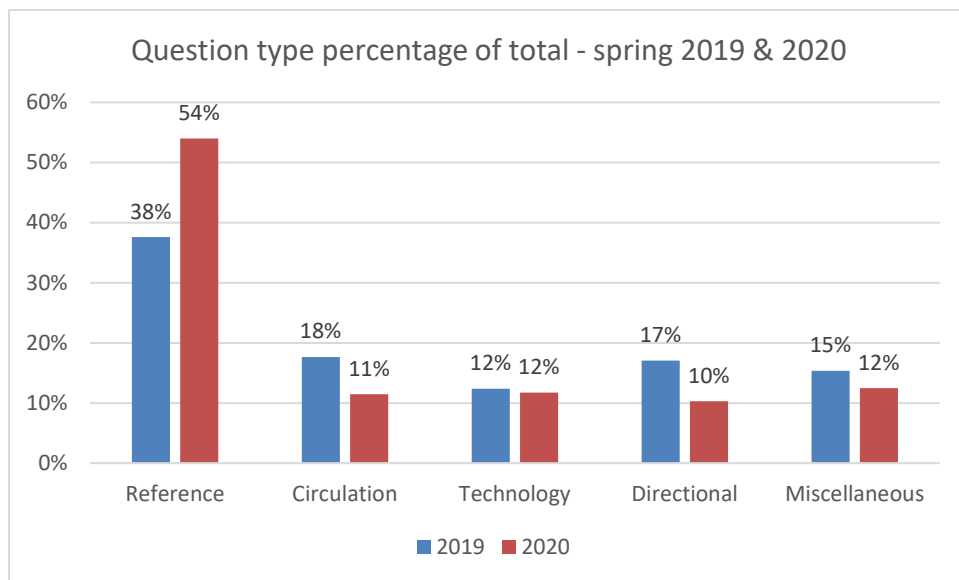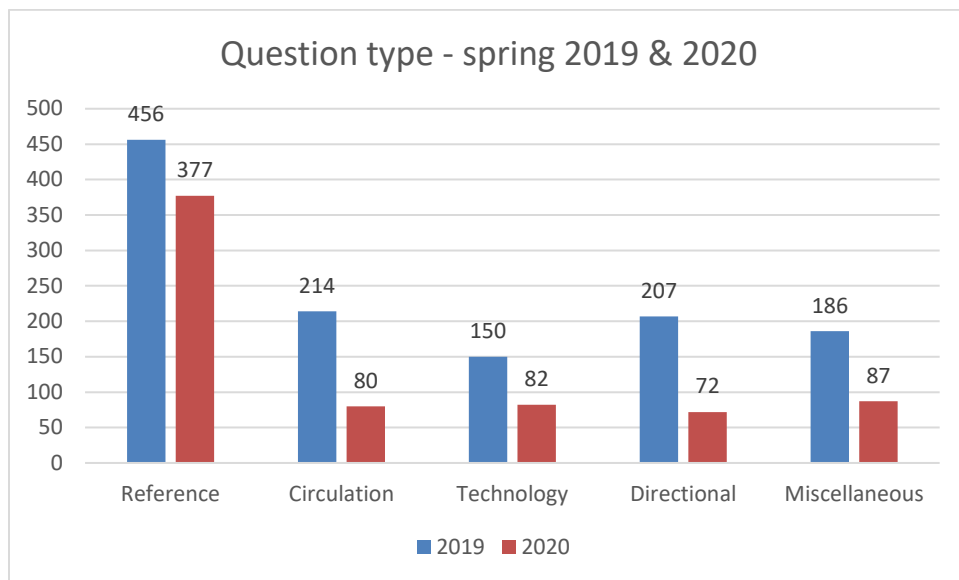

In-person transactions - SP '19 & '20

Chat transactions - SP '19 & '20

Email transactions - SP '19 & 20

Phone transactions - SP '19 & '20
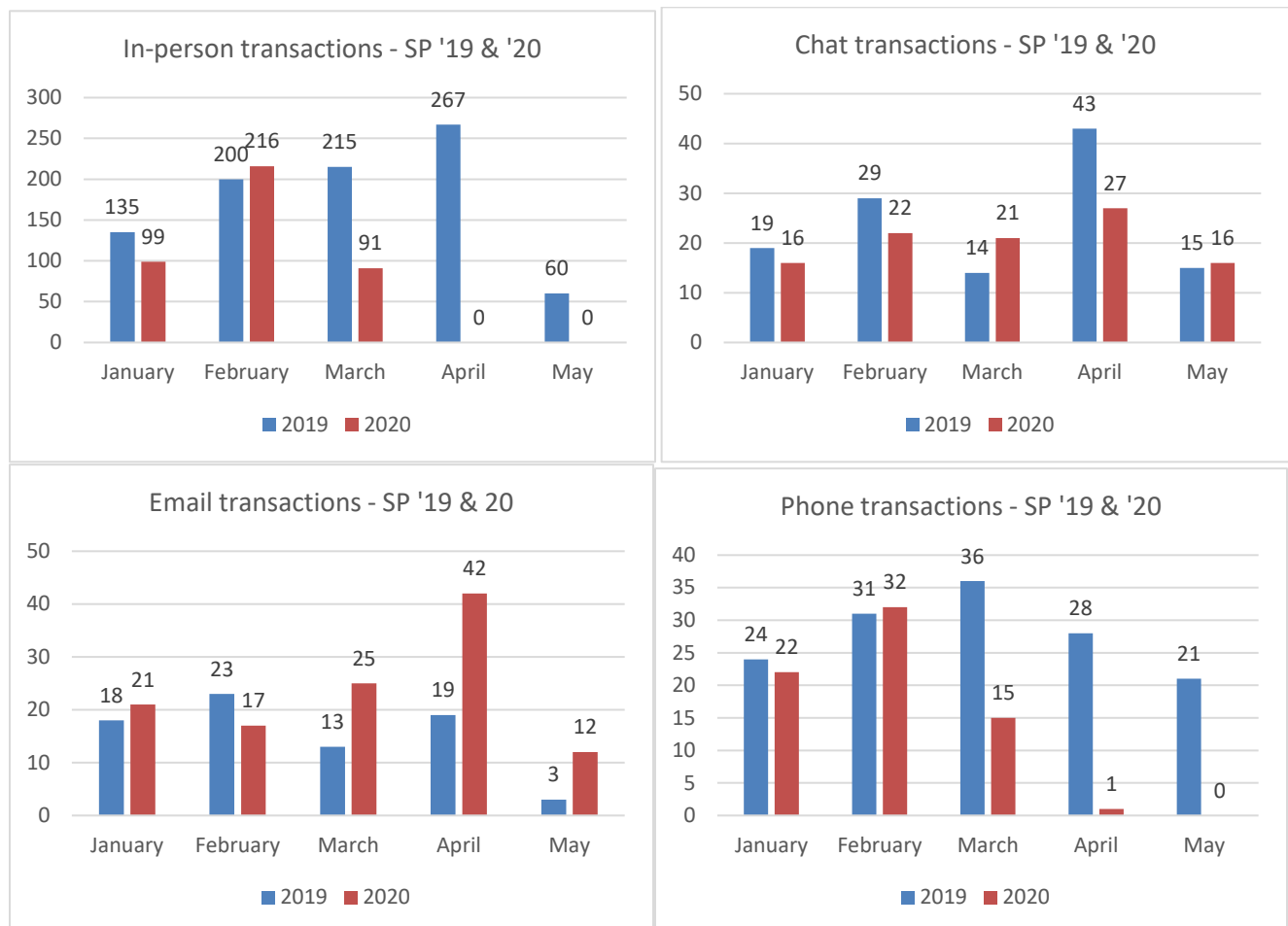
Question duration, Spring 2019 & 2020

It is very interesting to note that the only significant difference in question duration from spring 2019 – 2020 is the drop in transactions that were 5 minutes or less in duration. The shortest transactions dropped from 931 in spring 2019 to 412 in spring 2020, but longer-duration transactions remained steady between this year and last year. In fact, transactions lasting between 21 and 60 minutes increased, which is discussed further in the section below on research consultations.

Question duration - spring 2019 & 2020

Duration	2019	2020
5 minutes or less	931	412
6 - 20 min	227	221
21 - 60 min	42	51
more than 1 hr	13	14
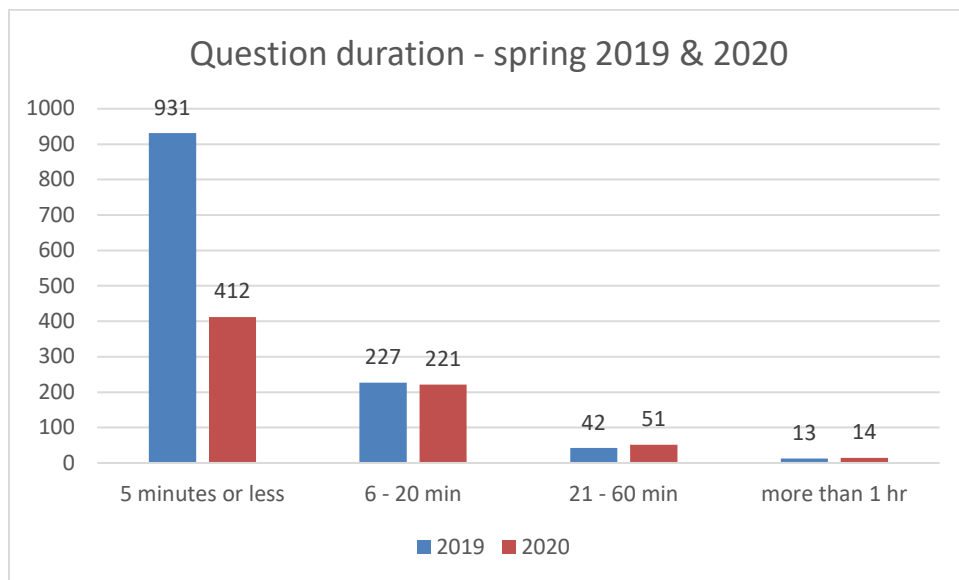
Question type, Spring 2019 & 2020

The change in distribution of question type tracks with the change in our delivery of services due to the shutdown. We saw significantly fewer (less than half as many) circulation, technology, directional, and miscellaneous category questions. We saw fewer reference questions overall in 2020 than in 2019 as well, but proportionally, reference questions took a much larger share of questions in 2020 (54%) than they did in 2019 (38%).


Question type - spring 2019 & 2020

Question type percentage of total - spring 2019 & 2020

Information desk transactions, Spring 2019 & 2020

Because our model of providing reference services changed radically in the middle of the semester, it raises the question, "Did we pick up the slack of the in-person reference desk with virtual reference services?" The answer is: somewhat, but not very significantly. If we look at the transactions that occurred at the information desk (which includes both in-person, phone, email, and chat transactions that happened at the info desk), we see that we were right about even with 2019 up until mid-March.

In order to find any changes in remote-media transactions between 2019 and 2020, I pulled the phone, email, and chat transactions for any librarian who works shifts at the Information Desk during normal operations. What we find is that in March, there were significantly more transactions that happened via a remote-medium between info desk staff and patrons. In April, there was also an increase from 2019 – 2020, but the number of remote-medium transactions by info desk staff in April 2020 (70 transactions) was less than half the number of all info desk transactions in April 2019 (157); so, we did not see a direct translation of the transactions that would have happened at the information desk in the same volume in a virtual-service environment.

Further analysis is need to determine whether this was an effect of students not perceiving the availability of virtual reference services in the same way as in-person services, a change in the type of questions being asked (no "where is the bathroom" questions), or simply a result of a shock to the entire academic system due to the sudden shift to remote learning.

Info desk trans. & remote media trans. SP '19 & '20
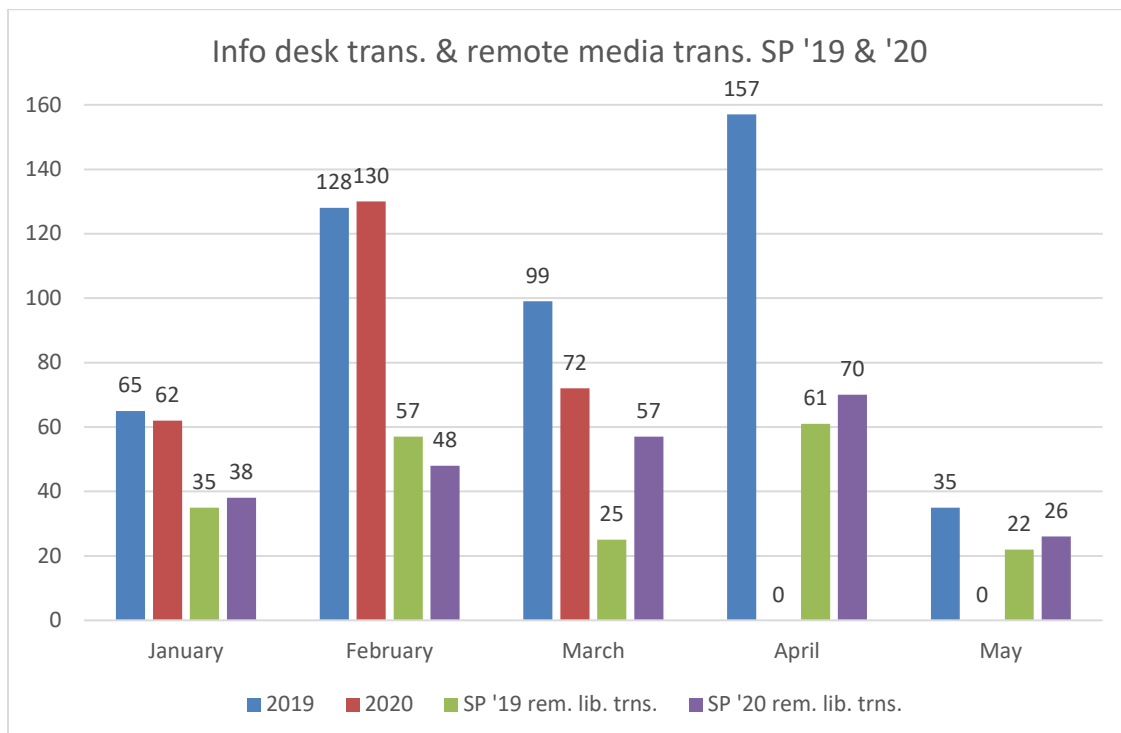
Research consultations

Remarkably, considering the shutdown of the library, research consultations remained steady throughout the semester, and continued a trend of increasing over previous years, as we saw in the Fall 2019 report. Currently, research consultations are still identified simply as being reference transactions lasting longer than 20 minutes, and options for refining how we capture this information to reflect this type of transaction more accurately is suggested.

Research consultations - spring 2019 & 2020
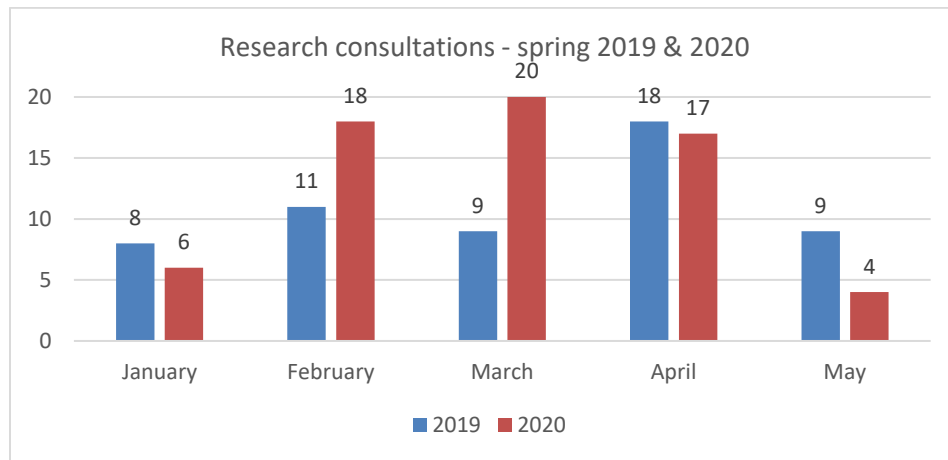
Reference question elements

The different elements of reference transactions changed significantly from the spring of 2019 – 2020, with some interesting differences. Nearly twice as many reference transactions involved help with citations; about half as many involved finding items in the library (to be expected with the closure of the building); there was a slight drop in the number of questions that involved finding materials online; the number of questions involving requesting library materials remained the same; archives increased significantly (due to a new category being included on the tracking form); and, "other" decreased slightly.

Reference question elements - spring 2019 & 2020
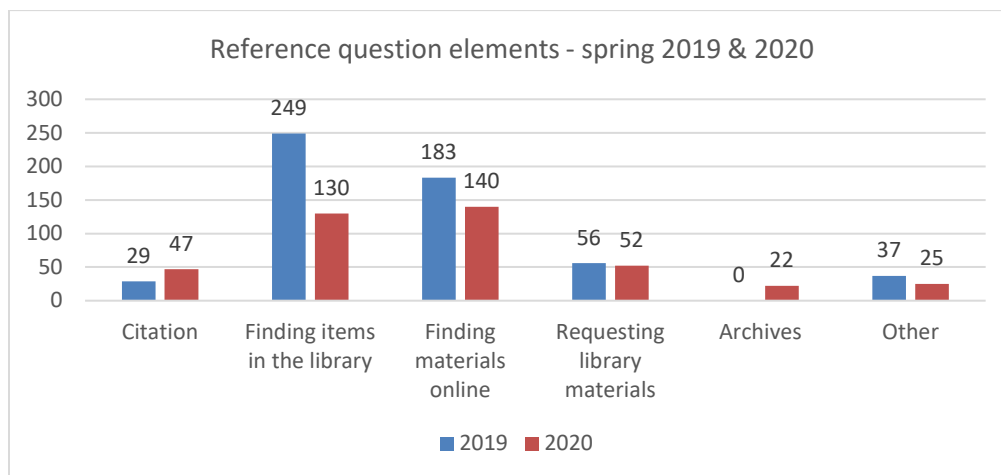
Reference question department area

Department area - spring 2019 & 2020

Legend: ■ 2019 ■ 2020
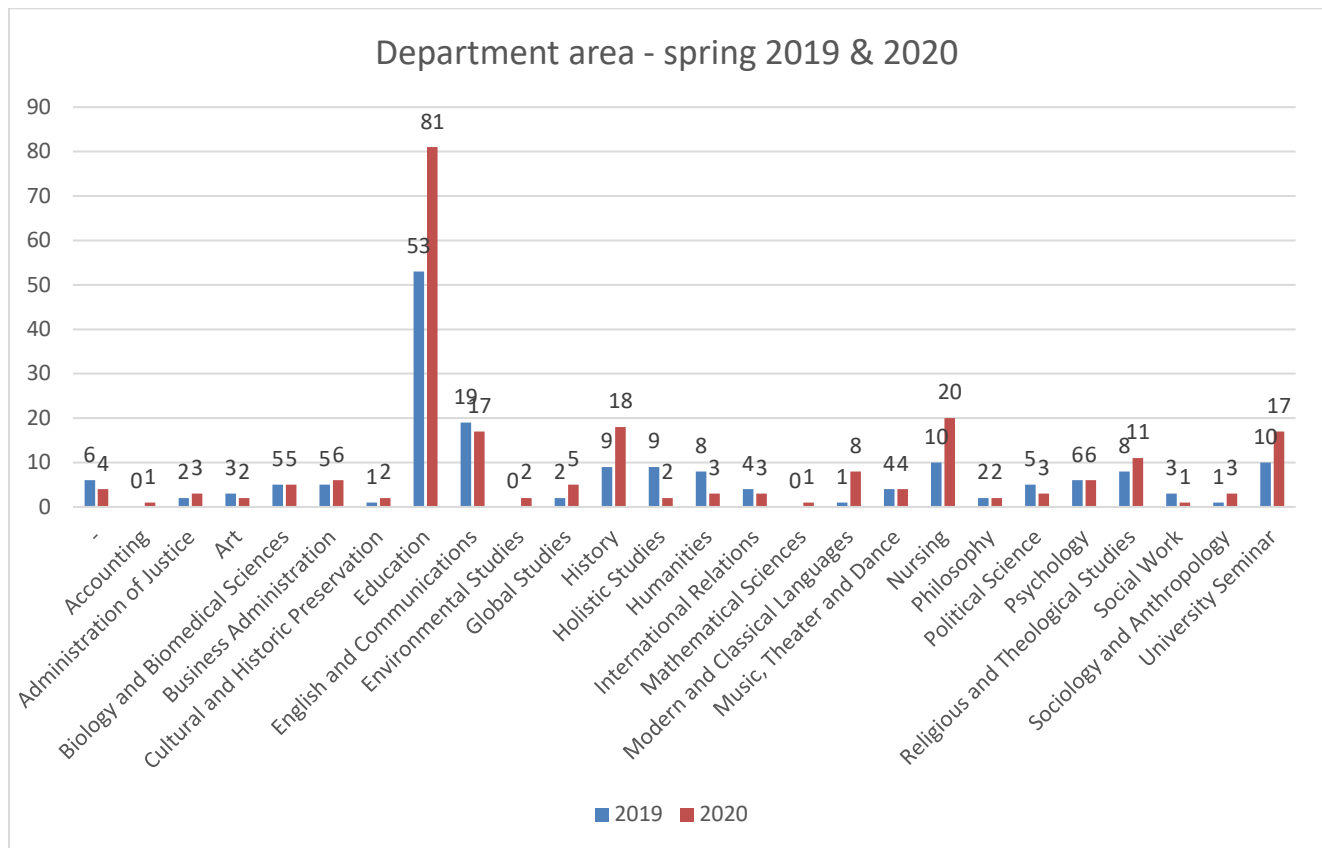
Patron Type During COVID-19 Shutdown 2020, compared to same period during Spring 2019

When we compare patron types during the shutdown March 15 – May 22, 2020 to the same period of the spring semester of 2019 (March 17 – May 31, 2019), we see that the library helped a significantly higher number of faculty. During the spring shut down period, nearly 25% of the transactions we had were with faculty, compared to the same period the year before, when it was just 7%. The "don't know" category was also a significantly smaller proportion of the transactions during the shutdown, suggesting we had a better idea of what kind of patrons we were helping.

Who Asked?

Null: 2.80 %
Other: 1.40 %
Don't Know: 9.09 %
HELIN student or faculty: 0.00 %
Circle of Scholar: 1.40 %
Local Visitor: 0.00 %
Prospective Student: 0.00 %
Continuing Education: 0.00 %
Alumnus/a: 1.40 %
Staff: 3.50 %
Faculty: 23.78 %
PhD student: 5.59 %
Graduate Student: 6.29 %
Undergraduate Student: 44.76 %

Who Asked?

Null: 1.42 %
Other: 2.69 %
Don't Know: 18.04 %
HELIN student or faculty: 0.16 %
Circle of Scholar: 0.47 %
Continuing Education: 0.00 %
Prospective Student: 1.90 %
Local Visitor: 4.91 %
Alumnus/a: 1.11 %
Staff: 3.64 %
Faculty: 6.96 %
PhD student: 3.96 %
Graduate Student: 5.70 %
Undergraduate Student: 49.05 %
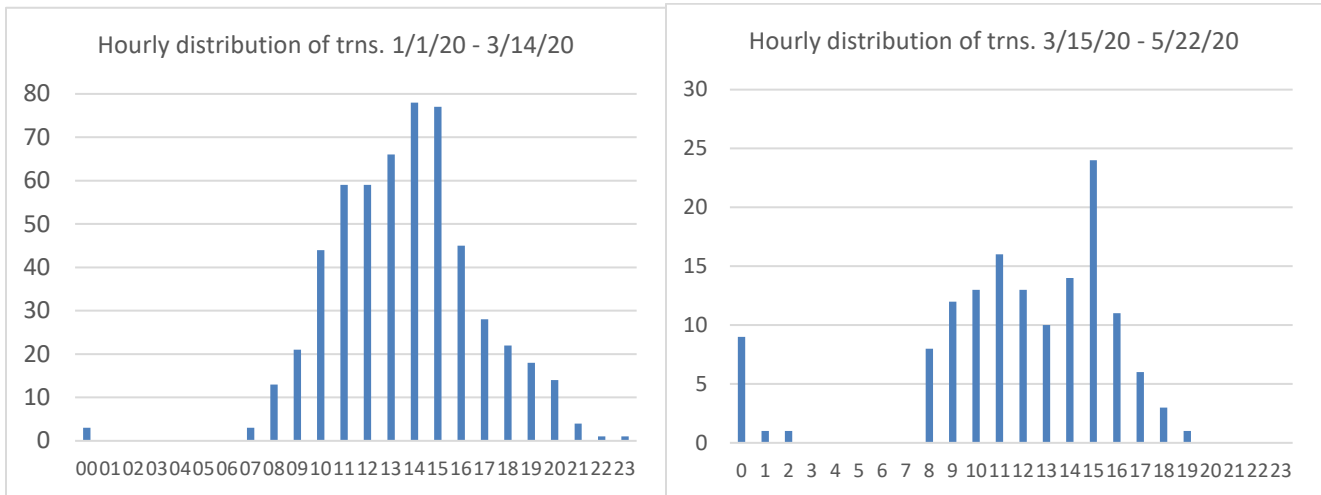
Hourly distributions Pre- COVID-19 shut down to Post- COVID-19

During the first part of the semester, before students left campus on March 15th, the distribution of transactions throughout the day saw a steady rise and peak mid-day, around 2 pm. After the shut-down of the library, we saw the distribution of transactions shift to more during the morning, a lull around one, and then a peak again around 3 pm.

Hourly distribution of trns. 1/1/20 - 3/14/20

Hourly distribution of trns. 3/15/20 - 5/22/20

Daily transaction distributions Pre- COVID-19 shut down to Post- COVID-19

Before and after the shutdown the distribution of transactions throughout the week shifted as well. Before students left campus, transactions peaked on Wednesdays and Thursdays during the week, with significantly more transactions occurring on Sundays as well. After the shutdown, transactions peaked on Mondays then gradually decreased through until Sunday, with a small uptick in transactions occurring on Thursdays.

Daily distribution of trns. 1/1/20 - 3/14/20

Daily distributions of trns. 3/15/20 - 5/22/20

11
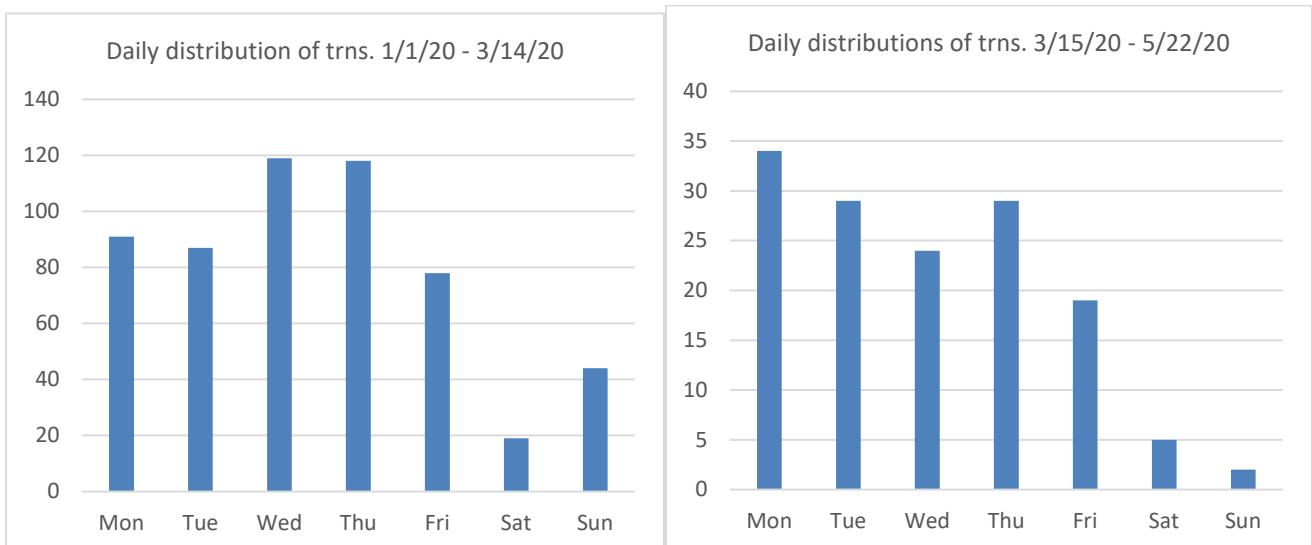
Instruction Sessions, Spring 2015 – 2020

Possibly the most successful transition of library services to an all virtual environment was our adaptation of information literacy instruction sessions to synchronous and asynchronous delivery. In the spring of 2020, we provided an equivalent level of instruction sessions (67 sessions) to previous spring semesters for the past five years. In fact, we even saw an uptick in the number of attendants to instruction sessions 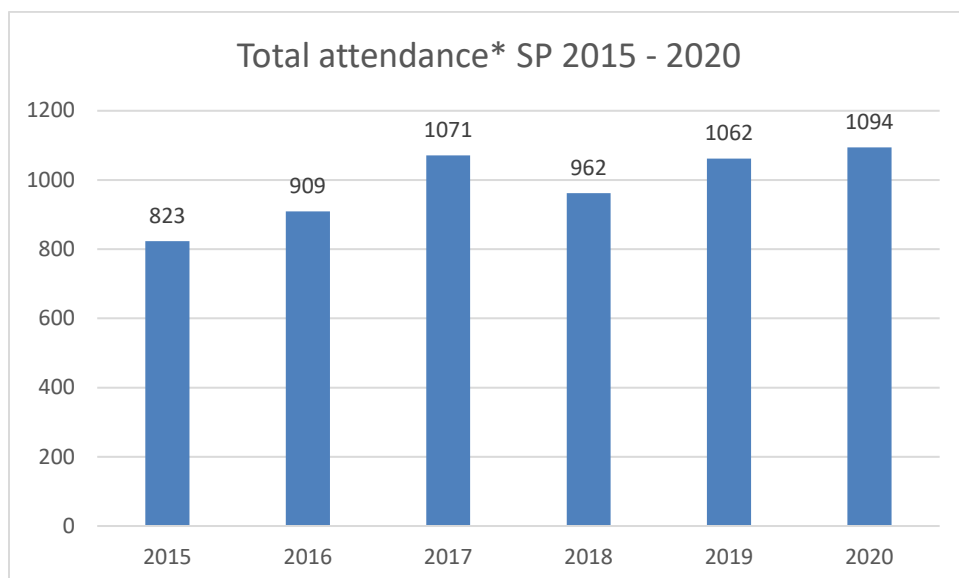up to 1,094 students in 2020 from 1,062 in 2019. The way we track the number of students who receive instruction does double-count some students, since there are some students who attend multiple instruction sessions in a semester, either as part of different courses they are enrolled in or instruction sessions that are conducted with the same course in a series throughout the semester.

Number of Sessions SP 2015 - 2020

Year	Number of Sessions
2015	53
2016	66
2017	68
2018	70
2019	69
2020	67
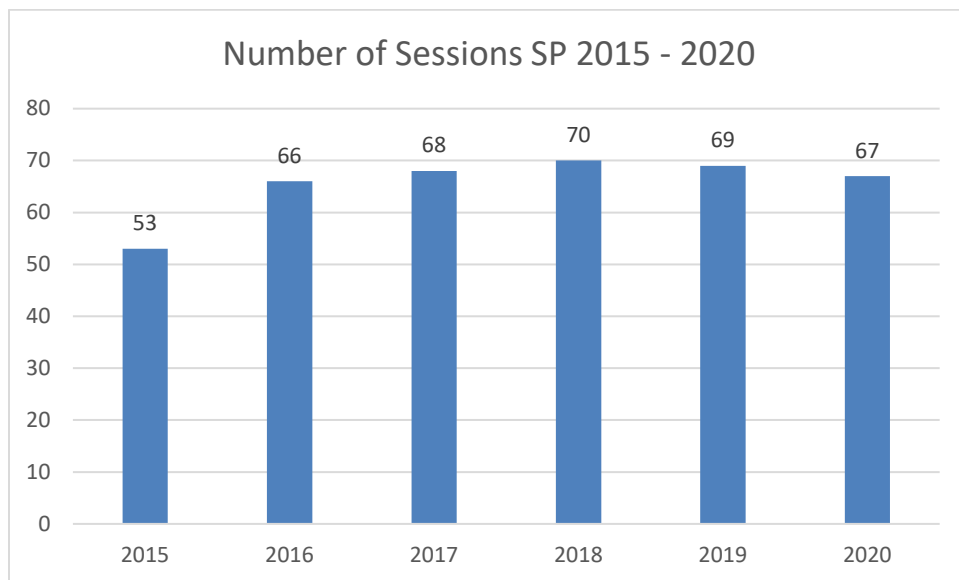
Instruction attendance 2015 – 2020

Total attendance* SP 2015 - 2020

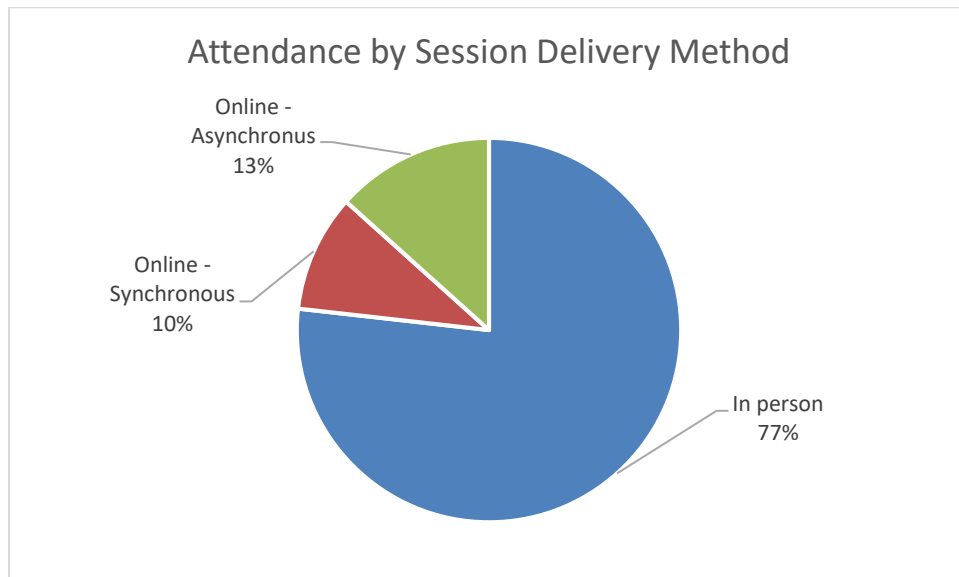| Year	Total attendance
2015	823
2016	909
2017	1071
2018	962
2019	1062
2020	1094

12

Instruction academic department 2019 – 2020

Spring 2020, similar to the previous year, saw a high level of instruction to Education and University Seminar courses, at 24 sessions and 19 sessions in 2020, respectively. All other departments had fewer than 5 instruction sessions.

Department area of sessions SP 2019 & 2020
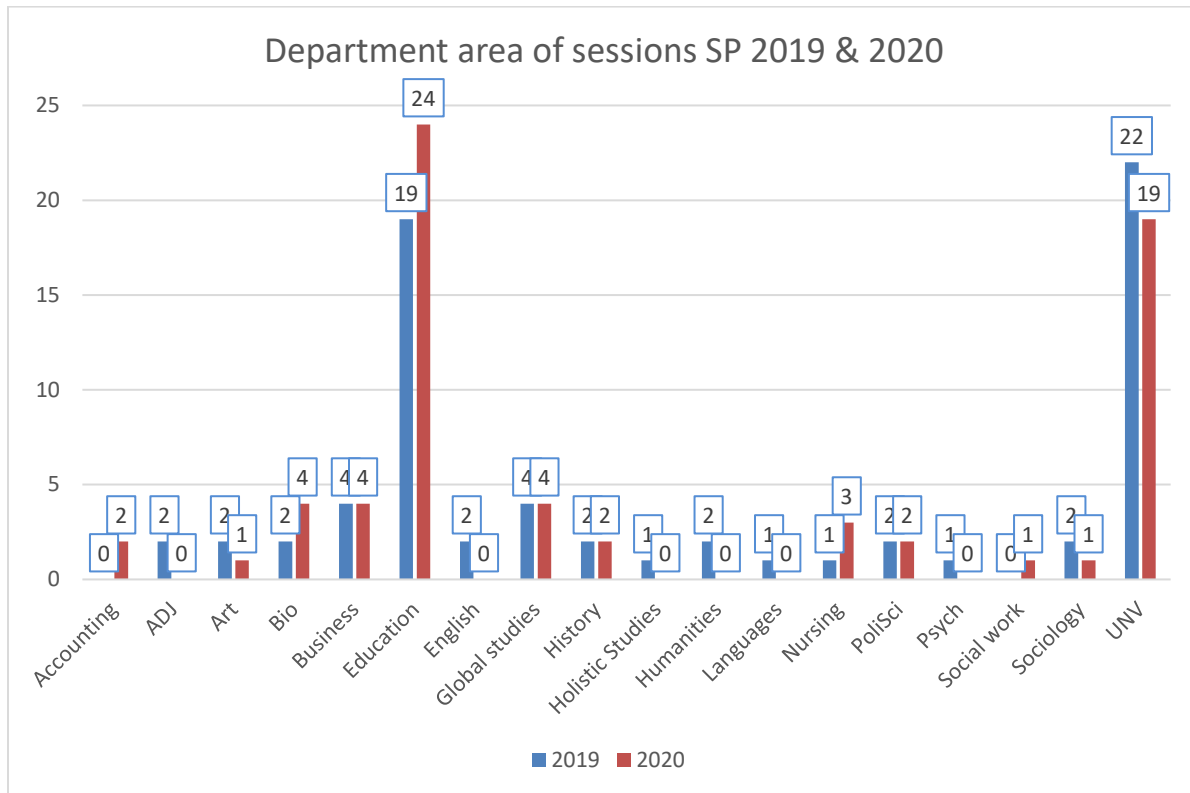
Remote instruction – synchronous/asynchronous 2020

As the university moved to an all-remote delivery of courses, instruction sessions were adapted to the virtual environment, either as synchronous sessions – instruction delivered through a videoconferencing software such as Webex – or asynchronous, which involved students watching recorded videos and completing activities and worksheets. Overall during the spring 2020 semester, 13% of instruction sessions were delivered asynchronously and 11% were delivered synchronously. An equivalent number of students attended the virtual sessions, with 108 students attending synchronous online instructions sessions and 140 students participating in asynchronous online instruction sessions.

Session Delivery Method

Online - Asynchronus 13%
Online - Synchronous 11%
In person 76%

Attendance by Session Delivery Method

Online - Asynchronus 13%
Online - Synchronous 10%
In person 77%
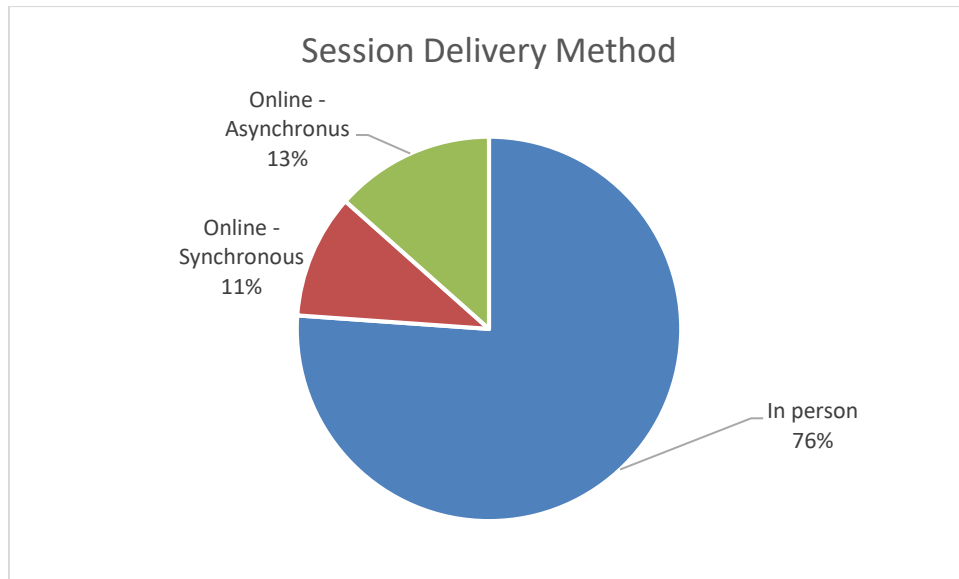
Student classification

Although the distribution of the classification of students in attendance at instruction sessions remained relatively steady from spring 2019 to spring 2020, it is notable that none of the instruction sessions during the spring 2020 sessions were geared towards graduate, PhD, or faculty audiences.
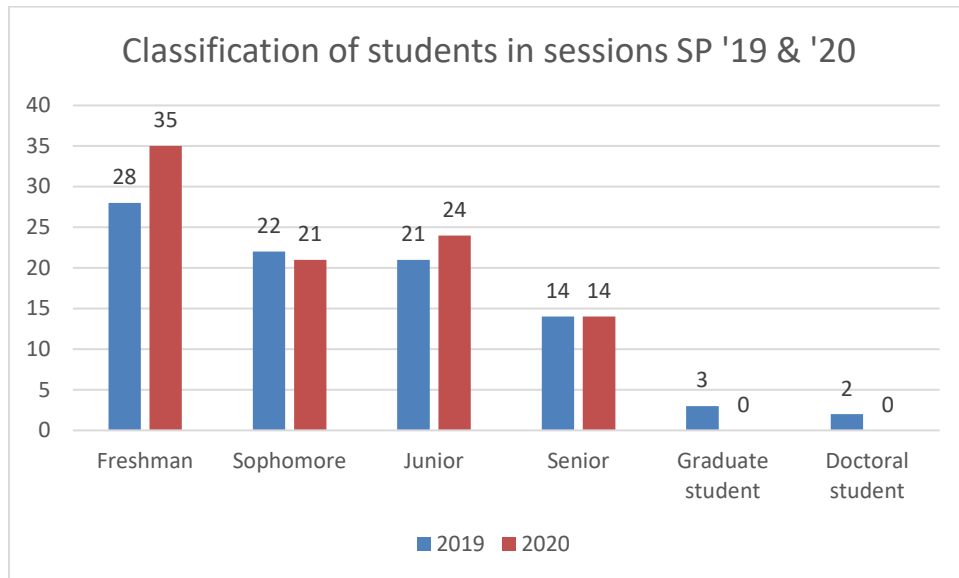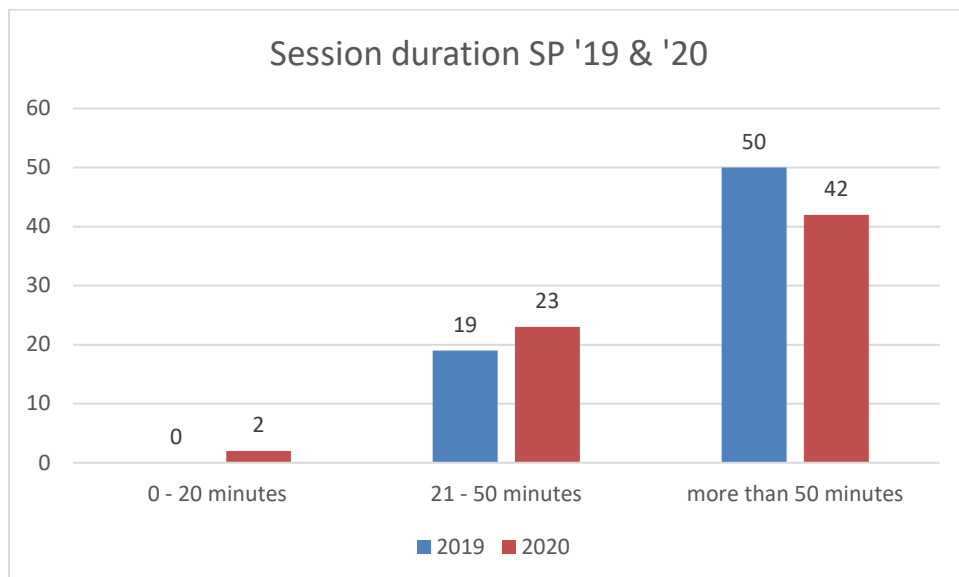
Classification of students in sessions SP '19 & '20

	Freshman	Sophomore	Junior	Senior	Graduate student	Doctoral student
2019	28	22	21	14	3	2
2020	35	21	24	14	0	0

Session Duration

Session duration SP '19 & '20

	0 - 20 minutes	21 - 50 minutes	more than 50 minutes
2019	0	19	50
2020	2	23	42

Information literacy frames

Information literacy frames - SP '19 & '20
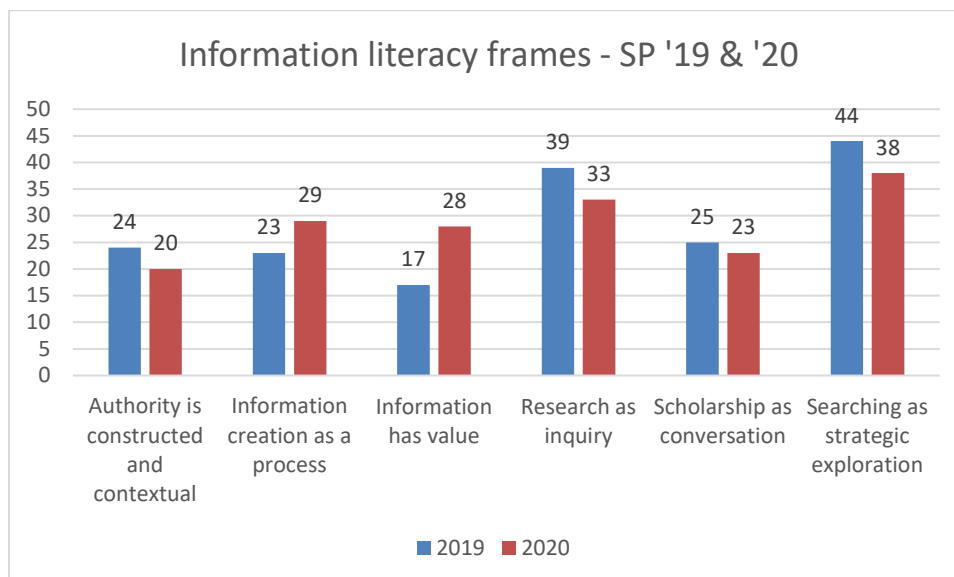
Instruction Sessions by Department

Date/Time	Type of Instruction	Course Code	Faculty Name	Atten-dance	Department	Librarian Instructor	Campus Location	Instruct-ion time	Audience
2/12/2020 13:00	Class Instruction	ACC405	Kennedy	14	Accounting	Dawn	Professor Classroom	21-50 min	Juniors; Senior
5/4/2020 13:00	Class Instruction	ACC405	Kennedy	15	Accounting	Dawn	Library classroom	21-50 min	Senior
3/5/2020 19:30	Class Instruction	ART 446	Jolicoeur	10	Art	Nicole	CRC lab	more than 50	Senior
1/29/2020 18:00	Class Instruction	BIO 471	Symington, Steve and Reid, Anne	33	Biology and Biomedical Sciences	Lisa R.	Professor Classroom	more than 50	Senior - BIO capstone
2/4/2020 14:30	Class Instruction	BIO 220	Curesky, Kimberly	13	Biology and Biomedical Sciences	Lisa R.	Professor Classroom	more than 50	Sophomores
2/5/2020 15:00	Class Instruction	BIO 220	Curesky, Kimberly	6	Biology and Biomedical Sciences	Lisa K	Professor Classroom	more than 50	Sophomores
2/19/2020 8:00	Class Instruction	BIO 255	Chace	27	Biology and Biomedical Sciences	Lisa R.	Professor Classroom	21-50 min	Freshmen; Sophomores; Juniors; Senior
1/30/2020 8:00	Class Instruction	MGT350	Abgrab	22	Business Studies and Economics	Dawn	Professor Classroom	more than 50	Sophomores; Juniors
1/30/2020 9:30	Class Instruction	MGT350	Abgrab	22	Business Studies and Economics	Dawn	Professor Classroom	more than 50	Sophomores; Juniors
2/11/2020 11:00	Class Instruction	MGT120	Burns	20	Business Studies and Economics	Dawn	Professor Classroom	more than 50	Freshmen; Sophomores; Juniors

Date	Type	Course	Professor	#	Department	Librarian	Location	Duration	Class Level
2/13/2020 8:00	Class Instruction	MGT280	Burns	28	Business Studies and Economics	Dawn	Professor Classroom	21-50 min	Sophomores; Juniors
1/23/2020 14:15	Class Instruction	SCD 323	Pelkowski	11	Education	Alicia	CRC lab	more than 50	Juniors
1/29/2020 13:00	Class Instruction	EDC 243	Small	21	Education	Alicia	CRC lab	more than 50	Sophomores
1/31/2020 8:00	Class Instruction	EDC/SCD 220	McAuliffe	5	Education	Alicia	CRC lab	more than 50	Freshmen; Sophomores; Juniors
2/3/2020 9:00	Class Instruction	EDC 320	Renzulli	12	Education	Alicia	CRC lab	more than 50	Juniors
2/11/2020 16:00	Class Instruction	SCD 432	Phelps and Murphy	3	Education	Alicia	CRC lab	more than 50	Senior
2/19/2020 16:00	Class Instruction	EDC 432	Booth	3	Education	Alicia	CRC lab	more than 50	Senior
2/25/2020 8:45	Class Drop-in	EDC 120	Martin	19	Education	Alicia	Professor Classroom	0-20 minutes	Freshmen
2/25/2020 16:00	Class Instruction	SCD 432	Murphy & Phelps	3	Education	Alicia	CRC lab	more than 50	Senior
3/3/2020 8:00	Class Instruction	EDC 120	Martin	18	Education	Alicia	CRC lab	more than 50	Freshmen
3/3/2020 14:15	Class Instruction	ELC 314	O'Day	9	Education	Alicia	Professor Classroom	more than 50	Juniors
3/3/2020 15:45	Class Instruction	ELC 490	O'Day	8	Education	Alicia	Professor Classroom	more than 50	Senior
3/4/2020 9:00	Class Instruction	EDC 320	Renzulli	11	Education	Alicia	CRC lab	more than 50	Juniors
3/5/2020 15:00	Class Instruction	SCD 323	Pelkowski	11	Education	Alicia	Professor Classroom	21-50 min	Juniors
3/11/2020 13:00	Class Instruction	EDC 243	Small	19	Education	Alicia	CRC lab	more than 50	Sophomores
3/27/2020 13:00	Class Instruction	EDC 243	Small	21	Education	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Sophomores
3/31/2020 14:30	Class Instruction	SCD 323	Pelkowski	11	Education	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Juniors
4/2/2020 8:00	Other - APA Workshop	EDC 120	Martin	18	Education	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Freshmen
4/6/2020 13:00	Class Instruction	EDC 243	Small	21	Education	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Sophomores
4/7/2020 15:30	Class Instruction	SCD 299	Martin	8	Education	Alicia	Other; Online - COVID-19 Synchronous	more than 50	Sophomores
4/8/2020 0:00	Other - APA Workshop 2	EDC 120	Martin	18	Education	Alicia	Other; Online - COVID-19	more than 50	Freshmen

4/15/2020 11:00	Class Instruction	EDC 206	O'Day	23	Education	Alicia	Other; Online - COVID-19	21-50 min	Sophomores
4/20/2020 11:00	Class Instruction	ELC 100	Moore	7	Education	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Freshmen
4/22/2020 11:00	Class Instruction	ELC 100	Moore	7	Education	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Freshmen
4/23/2020 17:00	Other - APA Workshop	EDC 120	Martin	1	Education	Alicia	Other; Online - COVID-19 Synchronous	21-50 min	Freshmen
2/3/2020 11:00	Class Instruction ; Tech Workshop	GLO 100	Raymond	23	Global Studies	Gretchen; Nicole	Professor Classroom	more than 50	Freshmen; Sophomores ; Juniors; Senior
2/10/2020 11:00	Class Instruction ; Tech Workshop	GLO-100	Raymond	23	Global Studies	Nicole	Professor Classroom	more than 50	Freshmen; Sophomores ; Juniors; Senior
2/18/2020 11:00	Class Instruction	GLO 100	Raymond	20	Global Studies	Gretchen	Computer Labs	more than 50	Freshmen
3/4/2020 11:30	Class Drop-in	GLO 100	Raymond	20	Global Studies	Nicole	Professor Classroom	0-20 minutes	Freshmen; Sophomores ; Juniors; Senior
2/19/2020 11:00	Class Instruction	HIS 390	Leeman	9	History	Alicia	CRC lab	more than 50	Juniors
3/31/2020 14:15	Class Instruction	HIS 299	Neary	22	History	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Freshmen; Sophomores ; Juniors; Senior
2/6/2020 15:00	Class Instruction - research workshops	NUR 346	Lyons; McCarthy	14	Nursing	Lisa R.	CRC lab	more than 50	Juniors
2/13/2020 3:00	Class Instruction - research workshops	NUR 346	Lyons, Mary Lou and McCarthy, Michelle	18	Nursing	Lisa R.	CRC lab	more than 50	Juniors
2/20/2020 15:00	Class Instruction - research workshops	NUR 346	Lyons, Mary Lou and McCarthy, Michelle	25	Nursing	Lisa R.	CRC lab	more than 50	Juniors
1/23/2020 9:30	Class Instruction	POL 372	Bradizza	16	Political Science	Gretchen	Computer Labs	more than 50	Juniors
1/27/2020 8:00	Class Instruction	POL 240	Raymond	10	Political Science	Gretchen	Professor Classroom	21-50 min	Sophomores
3/4/2020 12:00	Class Instruction	SWK 330	Pizzanello	8	Social Work	Nicole	Professor Classroom	21-50 min	Sophomores ; Juniors
2/20/2020 12:30	Class Instruction	SOA 249	McCauley	27	Sociology and Anthropology	Nicole	Professor Classroom	more than 50	Freshmen; Sophomores ; Juniors; Senior

2/4/2020 8:00	Class Instruction	UNV102 -P2	Edelstein	20	University Seminar	Dawn	Professor Classroom	21-50 min	Freshmen
2/6/2020 9:30	Class Instruction	UNV102 -16	Condella	20	University Seminar	Alicia; Dawn	Professor Classroom	more than 50	Freshmen
2/10/2020 10:00	Class Instruction	UNV 102-10	Bailey	19	University Seminar	Gretchen	Professor Classroom	21-50 min	Freshmen
2/10/2020 11:00	Class Instruction	UNV 102-11	Bailey	17	University Seminar	Gretchen	Professor Classroom	21-50 min	Freshmen
2/10/2020 12:00	Class Instruction	UNV 102-23	Bailey	19	University Seminar	Gretchen	Professor Classroom	21-50 min	Freshmen
2/12/2020 10:00	Class Instruction	UNV 102-10	Bailey	17	University Seminar	Gretchen	Professor Classroom	21-50 min	Freshmen
2/12/2020 11:00	Class Instruction	UNV 102-11	Bailey	19	University Seminar	Gretchen	Professor Classroom	21-50 min	Freshmen
2/12/2020 12:00	Class Instruction	UNV 102-23	Bailey	17	University Seminar	Gretchen	Professor Classroom	21-50 min	Freshmen
3/2/2020 10:00	Class Instruction	UNV 101	McAuliffe	21	University Seminar	Alicia	CRC lab	21-50 min	Freshmen
3/3/2020 9:30	Class Instruction	UNV102	Condella	20	University Seminar	Dawn	Professor Classroom	more than 50	Freshmen
3/5/2020 15:30	Class Instruction	UNV 102	Julie L'Europa	16	University Seminar	Lisa R.	Professor Classroom	21-50 min	Freshmen
3/6/2020 10:00	Class Instruction	UNV 101	McAuliffe	18	University Seminar	Alicia	CRC lab	21-50 min	Freshmen
3/9/2020 10:00	Class Instruction	UNV 102	McAuliffe	21	University Seminar	Alicia	CRC lab	21-50 min	Freshmen
3/9/2020 14:09	Class Instruction	UNV102	Trainor	16	University Seminar	Ingrid	Computer Labs	more than 50	Freshmen
3/11/2020 10:00	Class Instruction	UNV 102	McAuliffe	19	University Seminar	Alicia	CRC lab	21-50 min	Freshmen
4/2/2020 13:00	Class Instruction	UNV- 102	Colbert Cairns	18	University Seminar	Gretchen	Other; working remotely - COVID-19	21-50 min	Freshmen
4/21/2020 12:30	Class Instruction	UNV 102	Jameson Chace	21	University Seminar	Lisa R.	Other; WebEx	more than 50	Freshmen
4/30/2020 9:30	Class Instruction	UNV 102	Gomaa	21	University Seminar	Alicia	Other; Online - COVID-19 Asynchronous	more than 50	Freshmen
5/1/2020 11:00	Class Instruction	UNV 102	Symington	22	University Seminar	Lisa R.	Other; WebEx	21-50 min	Freshmen

Report written by Hilary Gunnels, 5/23/2020