# PREDICTORS OF SUBSEQUENT ENROLLMENT IN DISCONTINUATIONS

**RESEARCH BRIEF** 



## **Project Summary**

The purpose of the project was to conduct an exploratory analysis examining trends in discontinued students' subsequent enrollment by the timing of their discontinuation from JMU. We also explored the relationship between subsequent enrollment and student admit type, residency and primary college while at JMU. Students were more likely to enroll at another instruction after leaving JMU if they left after their first year at JMU, left as an underclassman, had on out-of-state residency and had higher cumulative GPAs upon leaving JMU. There were no significant differences in subsequent enrollment patterns between first-time students and transfer students.

#### **Purpose**

The purpose of this study was to explore trends in subsequent enrollment of undergraduate students who left JMU at some point during their career. Students admitted to JMU in Fall 2017, 2018, 2019, 2020 and 2021, and subsequently left JMU prior to graduating, were included in this analysis. We specifically explored the relationship between the timing of the students' discontinuation (i.e., after Year 1, Year 2 or Year 3) and subsequent enrollment outcomes. Students who left JMU for a period and then returned to JMU again as an undergraduate student were not included. The relevant list of students was submitted to the National Student Clearinghouse (NSC) as a subsequent enrollment query.

This report contains the following information:

- 1. Characteristics and timing of students who discontinued
- 2. Subsequent enrollment of stop-outs
- 3. Characteristics of institutions in which stop-outs subsequently enrolled
- 4. Information broken down by first year and transfer students

#### **Highlights**

- Timing of discontinuation appears to be an important factor in predicting if a student will enroll elsewhere. Students leaving after their second year were 50% less likely to enroll in another instruction after leaving JMU compared to those who left after their first year. Students leaving after their third year were 70% less likely to enroll in another institution compared to those leaving after their first year.
- Out of state students who left were 89% more likely than in-state students who
  discontinued to have enrolled in another institution after discontinuing from JMU.
  Most (71%) of out-of-state students who enroll elsewhere enroll in an institution in
  their home state.
- Cumulative GPA is a strong indicator of whether a student will enroll at another institution after discontinuing from JMU.

#### Limitations

There are other factors that impact student enrollment patterns after discontinuation that are not measured and could change the findings if the data were available.

#### Methods

A list of all undergraduate students who were admitted to JMU as a first-time student or transfer student in Fall 2017, 2018, 2019, 2020 or 2021 and who left JMU was submitted to the National Student Clearinghouse (NSC). The NSC provides information on institutional enrollment across the county. If the NSC query returned a record for one of the students on

the initial list of JMU discontinuations, they were assigned the outcome of "enrolled elsewhere." Descriptive statistics (frequencies and percents) were run to explore overall trends, and patterns by student characteristics. A binary logistic regression model was used to simultaneously examine the impact of multiple variables on subsequent enrollment outcome.

### **Detailed Findings**

#### Characteristics of Discontinued Students

There were 4,345 undergraduate students admitted in Fall 2017, 2018, 2019, 2020 and 2021 who discontinued and have not completed their degree as of January 2025. The following table breaks down these students' residency and primary college while at JMU.

Characteristic	N (%)
Residency	
In-State	3,245 (75%)
Out-of-State	1,100 (25%)
College	
CAL	604 (14%)
CHBS	1,139 (26%)
CISE	434 (10.0%)
СОВ	1,025 (24%)
COE	87 (2.0%)
CSM	366 (8.4%)
CVPA	220 (5.1%)
SPCE	84 (1.9%)
US	386 (8.9%)

Most students who discontinue are lost after Year 1 (58%, n = 2,503; note: Year 1 refers to the students' first year of enrollment, not student level). There were 1,302 (30%) students lost after Year 2 and 540 (12%) lost after Year 3.

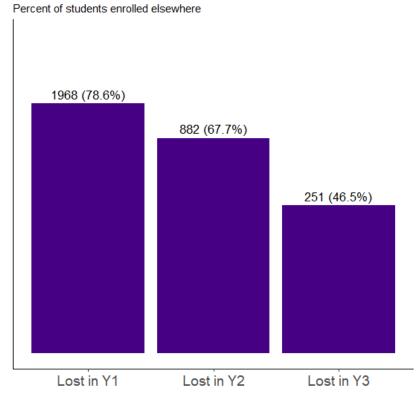
The following table shows the breakdown of attrition timing by students' admit term.

Outcome	<b>Fall 2017</b> N = 865	<b>Fall 2018</b> N = 837	<b>Fall 2019</b> N = 876	<b>Fall 2020</b> N = 844	<b>Fall 2021</b> N = 923
Lost in Y1	511 (59%)	521 (62%)	479 (55%)	430 (51%)	562 (61%)
Lost in Y2	266 (31%)	226 (27%)	270 (31%)	295 (35%)	245 (27%)
Lost in Y3	88 (10%)	90 (11%)	127 (14%)	119 (14%)	116 (13%)

#### **Overall Enrollment Outcomes**

Most undergraduates who discontinued from JMU enrolled elsewhere (n = 3,101, 71%). The graph below shows the percentage of students with subsequent enrollment based on the timing of their stop-out. A higher percentage of students who left in their first year enrolled elsewhere, compared to those who discontinued in their second or third year.





Of the students with subsequent enrollment records (n = 3,101), a majority enrolled in a 4-year (54%), In-State (61%; i.e., Virginia), Public (84%) institution. Of the 911 out-of-state students with subsequent enrollment, 638 (71%) enrolled at an institution in their home state.

Characteristic	N (%)
Туре	
2-Year	1,413 (46%)
4-Year	1,688 (54%)
Location	
In State	1,887 (61%)
Out of State	1,214 (39%)
Control	
Private	489 (16%)
Public	2,612 (84%)

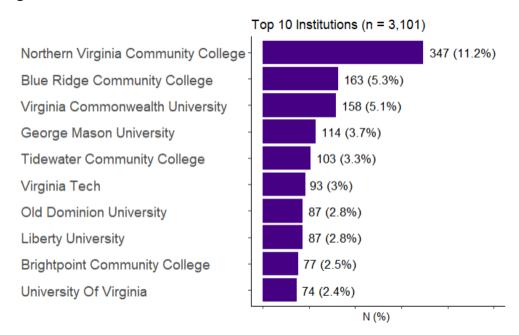
The following table breaks down the subsequent enrollment institution characteristic by the timing of students' stop-out.

	<b>Lost in Y1</b> N = 1,968	<b>Lost in Y2</b> N = 882	<b>Lost in Y3</b> N = 251
Туре			
2-Year	911 (46%)	400 (45%)	102 (41%)
4-Year	1,057 (54%)	482 (55%)	149 (59%)
Location			
In State	1,203 (61%)	544 (62%)	140 (56%)
Out of State	765 (39%)	338 (38%)	111 (44%)
Control			
Private	290 (15%)	143 (16%)	56 (22%)

	<b>Lost in Y1</b> N = 1,968	<b>Lost in Y2</b> N = 882	<b>Lost in Y3</b> N = 251	
Public	1,678 (85%)	739 (84%)	195 (78%)	

Overall, students show similar patterns of subsequent enrollment across different stop-out time points. Slightly higher percentages of students who discontinued after year 3 enrolled in 4-year, out-of-state, private institutions compared to those who left JMU earlier in their career.

The following figure displays the top 10 institutions for subsequent enrollment among the undergraduates studied.



#### **Outcomes in First Time Students**

There were 3,729 first-time undergraduate students admitted in Fall 2017, 2018, 2019, 2020 and 2021 who stopped out and did not complete their degree as of January 2025.

The following table breaks down these students' residency and primary college while at JMU.

Characteristic	N (%)
Residency	
In-State	2,674 (72%)
Out-of-State	1,055 (28%)

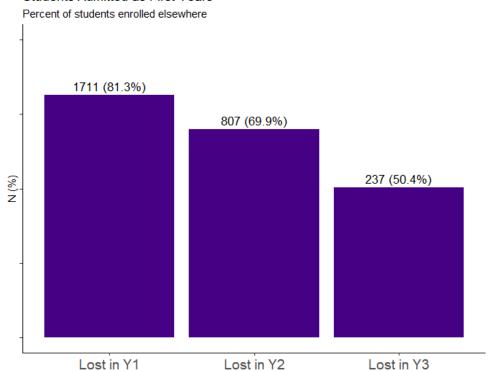
Characteristic	N (%)
College	
CAL	507 (14%)
CHBS	997 (27%)
CISE	390 (10%)
СОВ	869 (23%)
COE	77 (2.1%)
CSM	320 (8.6%)
CVPA	192 (5.1%)
SPCE	3 (<0.1%)
US	374 (10%)

A majority of students admitted as first years who discontinue are lost after Year 1 (56%, n = 2,105). There were 1,154 (31%) students lost after Year 2 and 470 (13%) lost after Year 3. The following table shows the breakdown of attrition timing by students' admit term.

Outcome	<b>Fall 2017</b> N = 723	<b>Fall 2018</b> N = 741	<b>Fall 2019</b> N = 758	<b>Fall 2020</b> N = 726	<b>Fall 2021</b> N = 781
Lost in Y1	415 (57%)	459 (62%)	409 (54%)	355 (49%)	467 (60%)
Lost in Y2	232 (32%)	206 (28%)	238 (31%)	266 (37%)	212 (27%)
Lost in Y3	76 (11%)	76 (10%)	111 (15%)	105 (14%)	102 (13%)

Most students admitted as first-time students who discontinued from JMU enrolled elsewhere (n = 2,755,74%). The earlier students left JMU, the more likely they were to enroll somewhere else. The graph below shows the percentage of students with subsequent enrollment based on the timing of their stop-out.

## Enrollment Outcome by Timing of Discontinuation for Students Admitted as First Years



Of the students with subsequent enrollment records (n = 2,755), a majority enrolled in a 4-year (53%), In-State (60%; i.e., Virginia), Public (85%) institution. Of the 876 out-of-state students with subsequent enrollment, 616 (71%) enrolled at an institution in their home state.

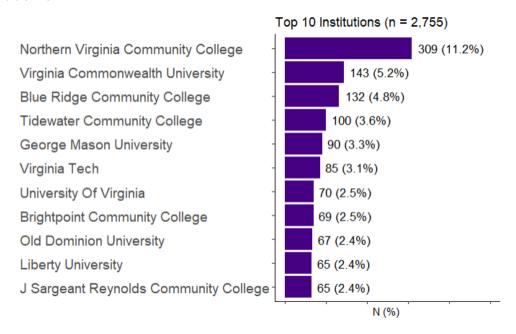
Characteristic		N (%)
Туре		
2-Year	1,289 (47%)	
4-Year	1,466 (53%)	
Location		
In State	1,645 (60%)	
Out of State	1,110 (40%)	
Control		
Private	400 (15%)	
Public	2,355 (85%)	

The following table breaks down the subsequent enrollment institution characteristic by the timing of students' stop-out.

	<b>Lost in Y1</b> N = 1,711	<b>Lost in Y2</b> N = 807	<b>Lost in Y3</b> N = 237
Туре			
2-Year	824 (48%)	370 (46%)	95 (40%)
4-Year	887 (52%)	437 (54%)	142 (60%)
Location			
In State	1,029 (60%)	486 (60%)	130 (55%)
Out of State	682 (40%)	321 (40%)	107 (45%)
Control			
Private	222 (13%)	124 (15%)	54 (23%)
Public	1,489 (87%)	683 (85%)	183 (77%)

Overall, students show similar patterns of subsequent enrollment across different stop-out time points. Slightly higher percentages of students who discontinued after year 3 enrolled in 4-year, out-of-state, private institutions compared to those who left JMU earlier in their career.

The following figure displays the top 10 institutions for subsequent enrollment among first time students.



#### Outcomes in Transfer Students

There were 614 undergraduate students admitted in Fall 2017, 2018, 2019, 2020 and 2021 who stopped out and did not complete their degree as of January 2025.

The following table breaks down these students' residency and primary college while at JMU.

Characteristic	N (%)
Residency	
In-State	570 (93%)
Out-of-State	44 (7.2%)
College	
CAL	97 (16%)
CHBS	140 (23%)
CISE	44 (7.2%)
СОВ	156 (25%)

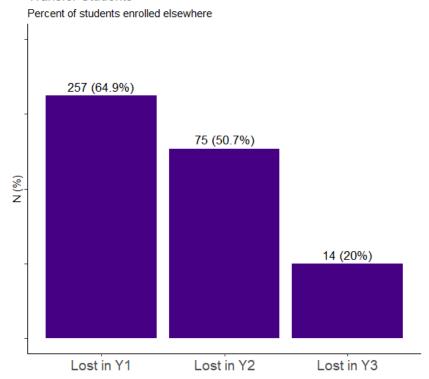
Characteristic	N (%)
COE	10 (1.6%)
CSM	46 (7.5%)
CVPA	28 (4.6%)
SPCE	81 (13%)
US	12 (2.0%)

A majority of students admitted as transfer who stop out are lost after Year 1 (64%, n = 396; note: Year 1 refers to the students' first year of enrollment, not student level). There were 148 (24%) students lost after Year 2 and 70 (11%) lost after Year 3. The following table shows the breakdown of attrition timing by students' admit term.

Outcome	<b>Fall 2017</b> N = 142	<b>Fall 2018</b> N = 96	<b>Fall 2019</b> N = 118	<b>Fall 2020</b> N = 117	<b>Fall 2021</b> N = 141
Lost in Y1	96 (68%)	62 (65%)	70 (59%)	74 (63%)	94 (67%)
Lost in Y2	34 (24%)	20 (21%)	32 (27%)	29 (25%)	33 (23%)
Lost in Y3	12 (8.5%)	14 (15%)	16 (14%)	14 (12%)	14 (9.9%)

Most students admitted as first years who discontinued from JMU enrolled elsewhere (n = 346, 56%). The earlier students left JMU, the more likely they were to enroll somewhere else. The graph below shows the percentage of students with subsequent enrollment based on the timing of their stop-out.

# Enrollment Outcome by Timing of Discontinuation for Transfer Students



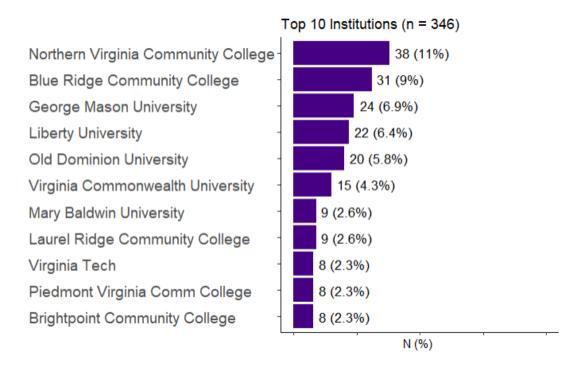
Of the students with subsequent enrollment records (n = 346), a majority enrolled in a 4-year (64%), In-State (70%; i.e., Virginia), Public (74%) institution. Of the 35 out-of-state students with subsequent enrollment, 22 (67%) enrolled at an institution in their home state.

Characteristic	N (%)	
Туре		
2-Year	124 (36%)	
4-Year	222 (64%)	
Location		
In State	242 (70%)	
Out of State	104 (30%)	
Control		
Private	89 (26%)	
Public	257 (74%)	

The following table breaks down the subsequent enrollment institution characteristic by the timing of students' stop-out.

	<b>Lost in Y1</b> N = 257	<b>Lost in Y2</b> N = 75	<b>Lost in Y3</b> N = 14
Туре			
2-Year	87 (34%)	30 (40%)	7 (50%)
4-Year	170 (66%)	45 (60%)	7 (50%)
Location			
In State	174 (68%)	58 (77%)	10 (71%)
Out of State	83 (32%)	17 (23%)	4 (29%)
Control			
Private	68 (26%)	19 (25%)	2 (14%)
Public	189 (74%)	56 (75%)	12 (86%)

The following figure displays the top 10 institutions for subsequent enrollment among the students admitted as transfers studied.



#### Predictors of Subsequent Enrollment

To simultaneously explore the effects of multiple variables on subsequent enrollment outcomes, a binary logistic regression was run including the following variables:

- Timing of discontinuation
- Admit type
- Primary college at JMU
- Academic level during last term at JMU
- Total credits completed
- Cumulative GPA
- Demographics (gender, race, residency)

The model explained 19.1% of the variance in the outcome variable. Students who discontinued in their second (OR = 0.50, 95% CI, 0.42, 0.58) or third (OR = 0.20, 95% CI, 0.16, 0.24) were significantly less likely to enroll elsewhere compared to students who discontinued in their first year at JMU. Similarly, students who were at the Junior (OR = 0.35, 95% CI, 0.19, 0.65) or Senior (OR = 0.11, 95% CI, 0.03, 0.36) level in their last term before discontinuation were significantly less likely to enroll elsewhere compared to students who discontinued as Freshmen. Out of state students were significantly more likely to have enrolled elsewhere after discontinuing from JMU compared to in-state students (OR = 1.89, 95% CI, 1.57, 2.28). Finally, cumulative GPA was positively associated with subsequent enrollment (OR = 1.41, 95% CI, 1.30, 1.53); students with higher GPAs were more likely to have enrolled elsewhere after discontinuing from JMU.