ISCOM
University of Maryland, Baltimore County

Survey Results Report, Faculty - Spring 2018

Survey Objectives: to assess the experience of undergraduate students within the UMBC Information Systems Department; determine employers/industries of interest for campus recruitment; investigate students interest in IS/BTA-related research; learn preferences for future communication with ISCOM.
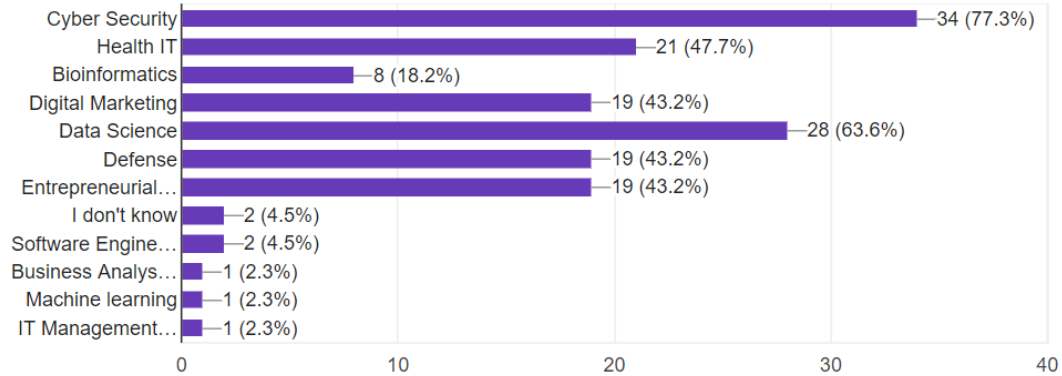
Summary Results Summary: After two days of analyzing and discussing the data, the Information Systems Council of Majors (ISCOM) Executive Board reached the conclusion that several themes were present:

- A heavy interest in the industries of **Cybersecurity** and **Data Science** (our top two kinds of employers) and a heavy interest in jobs paths like **Information Technology** and **Cybersecurity**.
- A **desire for hands-on experiences**, projects and hard skills related to career goals
- A need for **academic support** across mostly upper level IS-classes
- A high interest in **research** within the Information Systems discipline, contrasted with a **lack of knowledge** of undergraduate research's primary (and most attractive) attribute
- An equal interest in **in-person and online** communication of future academic, career, and research opportunities
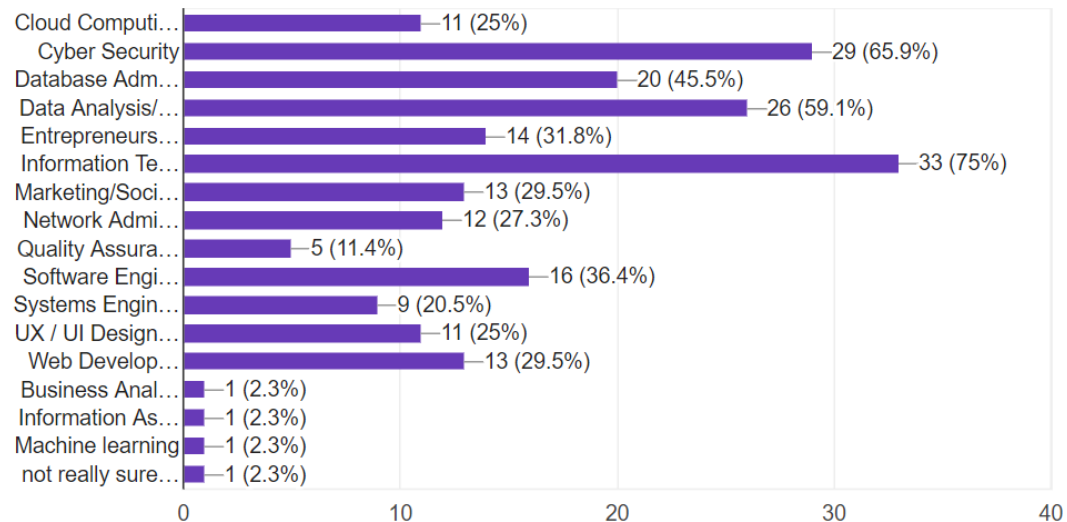
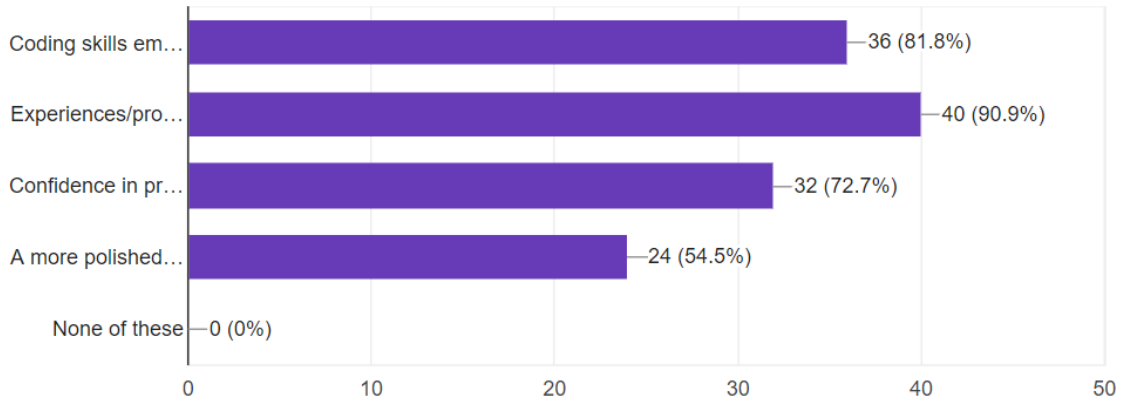## I'd like to see employers in the field of...

44 responses

Field	Count (Percentage)
Cyber Security	34 (77.3%)
Health IT	21 (47.7%)
Bioinformatics	8 (18.2%)
Digital Marketing	19 (43.2%)
Data Science	28 (63.6%)
Defense	19 (43.2%)
Entrepreneurial...	19 (43.2%)
I don't know	2 (4.5%)
Software Engine...	2 (4.5%)
Business Analys...	1 (2.3%)
Machine learning	1 (2.3%)
IT Management...	1 (2.3%)

The kind of job/career I'm looking for is in...

44 responses

Field	Count (Percentage)
Cloud Computi...	11 (25%)
Cyber Security	29 (65.9%)
Database Adm...	20 (45.5%)
Data Analysis/...	26 (59.1%)
Entrepreneurs...	14 (31.8%)
Information Te...	33 (75%)
Marketing/Soci...	13 (29.5%)
Network Admi...	12 (27.3%)
Quality Assura...	5 (11.4%)
Software Engi...	16 (36.4%)
Systems Engin...	9 (20.5%)
UX / UI Design...	11 (25%)
Web Develop...	13 (29.5%)
Business Anal...	1 (2.3%)
Information As...	1 (2.3%)
Machine learning	1 (2.3%)
not really sure...	1 (2.3%)

To get a job in that field, I feel I need more...

44 responses

Option	Value
Coding skills em…	36 (81.8%)
Experiences/pro…	40 (90.9%)
Confidence in pr…	32 (72.7%)
A more polished…	24 (54.5%)
None of these	0 (0%)

(x-axis: 0, 10, 20, 30, 40, 50)

I'm most interested in...

44 responses

Option	Value
Workshops on s…	38 (86.4%)
Info sessions on…	35 (79.5%)
Conferences/su…	22 (50%)
None of these	0 (0%)

(x-axis: 0, 10, 20, 30, 40)
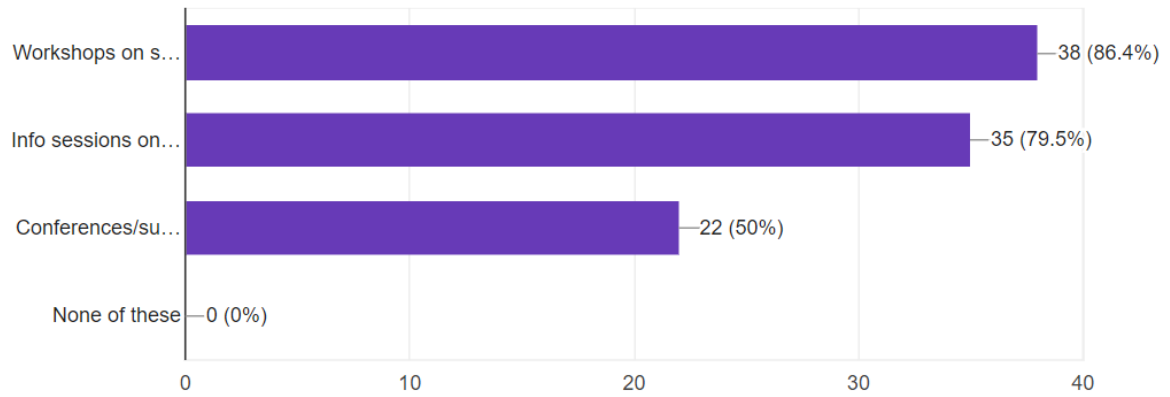
The best time(s) for me to attend a workshop/info session of interest is:

44 responses

Monday's during…	28 (63.6%)
Wednesday's du…	28 (63.6%)
Friday's during…	22 (50%)
I can't attend an…	4 (9.1%)
I can't attend an…	6 (13.6%)

(Horizontal axis: 0, 10, 20, 30)
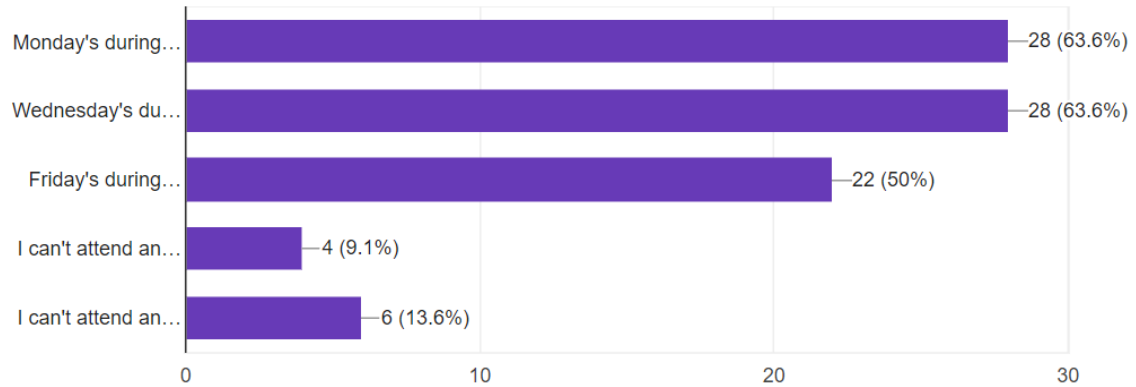
Academic

In general, how do you perform in your major-related classes?

44 responses

47.7%
9.1%
36.4%

- I fly through my classes (Mostly A's, some B's)
- Meh. My grades read like the alphabet (A few A's, mostly B's, a C or two)
- C's get degrees (C's on average, only some A's or B's)
- I prefer not to answer
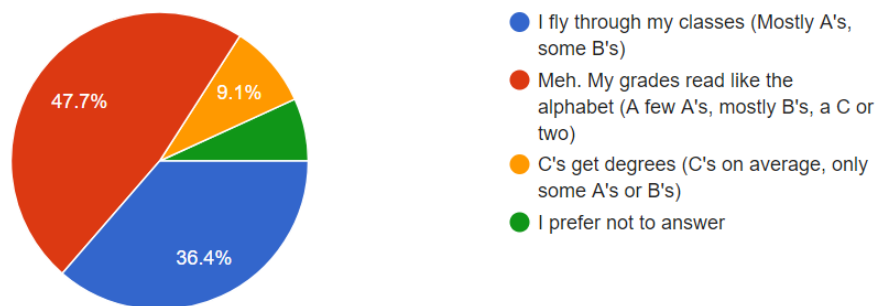
Would academic support (like student-formed study groups, one-on-one tutoring) be useful?

44 responses

- Yes
- I don't know / I haven't tried
- No

47.7%

47.7%
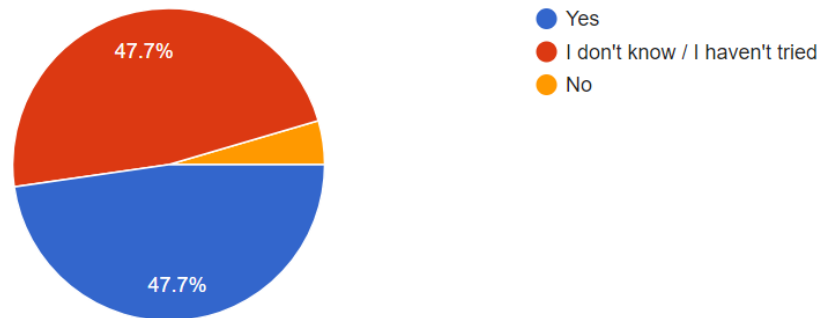
Regardless of your answer above, which one of the following academic support options would you *actually* attend, if offered?

44 responses

- A weekly / bi-weekly study group organized around times that work for me
- One-on-one tutoring with a student that aced my difficult class
- Professor-led study sessions outside of class

25%

31.8%

43.2%
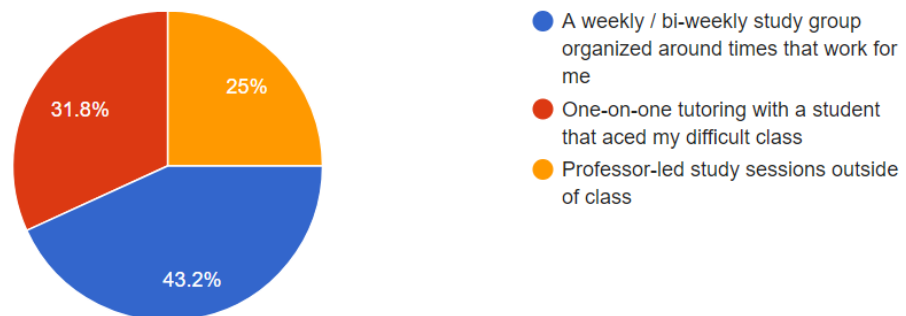
Have you considered doing research in the field of IS/BTA?

44 responses

- Yes and I currently am pursuing a research opportunity
- Yes, but I haven't heard of any opportunities
- No and I haven't heard of any opportunities
- No and I am not interested in pursuing a research opportunity
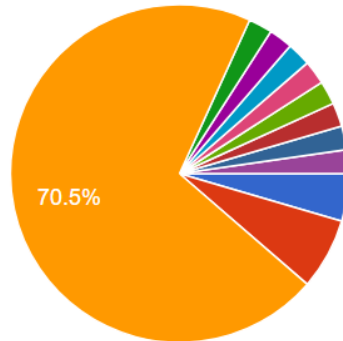
25%

11.4%

11.4%

52.3%

Why?

44 responses
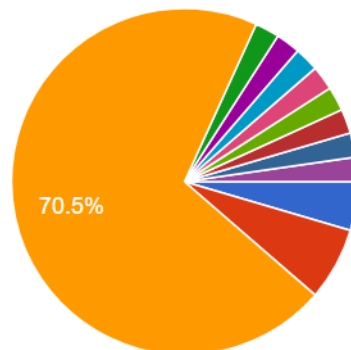
- It's boring / uninteresting
- I don't think it's what employers are…
- I do find it interesting
- I just started considering doing rese…
- I am currently working on a researc…
- While I am new to this (recent chan…
- I want to make money
- Trying to find an opportunity

70.5%
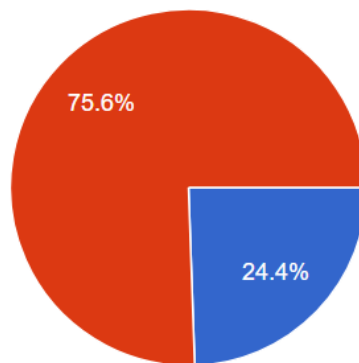
△ 1/2 ▼

Why?

44 responses

Legend:
- Not sure what to look into for research (just started IS major).
- Time consuming
- No time between work, school, and trying to have a social life.

70.5%

Did you know that URCAD (UMBC's own research summit) gives students $1,000 grants to perform research of their interest?

45 responses

Legend:
- Yes
- No

75.6%

24.4%

What's a frustrating, unsatisfying, or disappointing thing about being an IS/BTA Major?

45 responses

1. lack of direction
2. Alot of information about the major/opportunities is unknown by most students
3. My programming skills since I am from a non technical background.
4. Competition for internships and jobs
5. Coding, most upper level classes are only offer at night
6. Not enough people that are readily available to help such as my advisor
7. As an IS major with little experience in coding, I find it difficult to keep up with the classes and my peers.
8. Broad major, needs more options for specific concentration of certain fields.
9. Lack of freedom to choose which classes to take
10. The class gating. Being a transfer sucks.
11. I haven't been upset with the major yet
12. Coding
13. Not enough reach in opportunities
14. IS department trying to force me down one career path when I want something else.
15. All the ECON courses we need to take
16. I am an IS major because I screwed up, and am ineligible to be a CS major.
17. Lack of support in certain classes
18. Lots of experiences are often required for the internships I look at
19. Haven't really used coding experience
20. vast competition, I always feel unqualified
21. Everyone seems to know a whole lot more and seem more tech and information savvy . I feel like im always playing catch up
22. I haven't had any of such experience yet.

23. I feel at times there are limitations on research and tasks which lead to boredom.
24. Not enough programming
25. They don't give you a better understanding of what jobs might be good for you.
26. Failed in class or courses
27. So many introverts and people who are way more into it and "geeky" than I am... hard to connect w/ fellow IS majors
28. N/A
29. Not sure yet, just started major.
30. Often times there are problems that arise that may take a long time to find an answer to, which can frustrate me when I really just want to get it solved.
31. Not sure how I'll do in the workplace
32. Stinks that many major classes are only offered at night
33. I feel like there should be more information about the different IS tracks and certificates available for us. There should also be more information about graduate school
34. I dont know yet. Still learning.
35. Coding/Accounting
36. Programming since I'm not particularly good at it.
37. Nothing
38. I do not think IS offers enough security classes in the basis of cyber security
39. I just changed my major so its a little hard
40. Work load
41. BTA no real mandatory coding class
42. First semester in IS, so can't say anything other than wish there was a little more CS involved
43. Don't know
44. The professors are very great in their field but unnecessarily harder than the classes have to be. If classes more oriented in providing more experiences/ preparing us for the professional world.
45. I wouldn't know but I assume that coding is the greatest struggle

If you were Chair of the IS department, how would you improve the IS/BTA experience?

45 responses

1. help students figure out what they want to do in the field

2. - more tutoring opportunities for students
   -workshops to prepare students for the work field (improve coding skills, mock interviews that are tech related, talk about how to get involved in research on/off campus)

3. More opportunities will be given to students who are interested in research and more exposure to jobs like CS program has.

4. Look for more outside companies to set up events with

5. Engage with the student body and figure out what they need

6. I would have more information sessions and or 1 on 1s with students with various degrees of progress towards their degree to discuss which pathways are helpful. Also not enough real world skills are taught. Conceptual skills are great but after Students graduate, they need to find a job asap to pay off student loans and support themselves.

7. Helping students better understand the skills each major provides and what kind of jobs go along with those majors.

8. Improve the IT building and add more resources (or make resources more known) for students for certain fields

9. Reduce requirements and increase IS electives so people can specialize in there interests. Or give different concentrations like the certificates except in the major.

10. I'm not sure honestly.

11. Have the IS classes in a conference type of room

12. More introduction to coding classes

13. Expose opportunities to fellow IS students

14. More career advice so IS majors know all there options (especially useful for new IS majors coming from CS)

15. I would emphasize the different ranges of fields that IS covers in order to encourage people to join the major and make it more diverse

16. Not really sure, because not only have I just change majors, I am a first semester transfer student. I guess I would try to focus on making sure every student finds their passion within the major, and if they cannot, try to push them in the direction of something they care about and are skilled with.

17. Make an IS tutoring center

18.	More internship opportunities, freshmen friendly experiences able to get students into the door for resume experiences
19.	Involve coding in earlier IS/BTA classes
20.	receive and respond to feedback from those in the major
21.	Don't know
22.	I would work on providing more skill classes or sessions that would benefit student in work life and be prepared for real life challenges.
23.	I would allow students to able to go any direction they choose in their field instead of creating limiting concentrations.
24.	More programming
25.	Have more tutors available for IS classes.
26.	I don't know
27.	Monthly, catered lunches for IS students where they can socialize and hang out
28.	N/A
29.	I wouldn't know, just started the major.
30.	Offer opportunities for students to experience what it is like to work in the IS/BTA field.
31.	Not sure
32.	More professors with professional work experience in the subject they are teaching
33.	Give more information about grad schools and different IS tracks to students.
34.	Help kids with coding. Coding workshops, study groups, and such
35.	Give more students opportunities to work collaboratively.
36.	I haven't been an IS major long enough to recommend any alterations to the program.
37.	Not much
38.	Not sure for now
39.	more info sessions and seminar and internship options
40.	Study groups.
41.	Have an internship requirement. Give the BTA majors a more useful coding class. I'm not sure if a Visual Basic class is mandatory or an elective.
42.	N/A
43.	Don't Know
44.	I will lower requirements of classes and allow students more opportunities/ experience to the professional world.

45. Again I am not sure though trying to better explain the cohesion of IS and BTA may be one step

What social media platform do you use most frequently for finding UMBC events?

44 responses

- ● Facebook
- ● Instagram
- ● myUMBC

77.3%

11.4%

11.4%
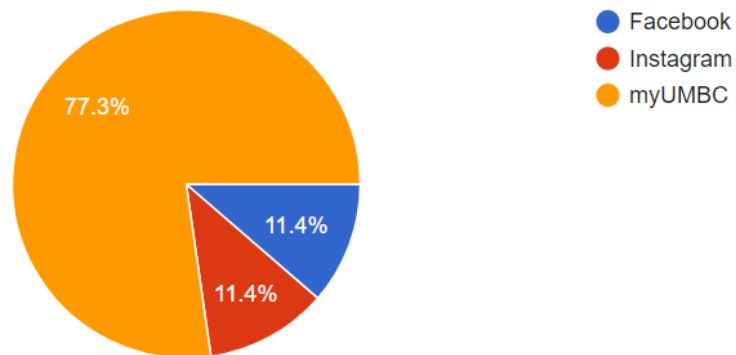
What other ways would you like to hear about worthwhile internships, interesting career panels, and events to get your bang for your buck as an IS/BTA Major?

44 responses

Label	Value
Brief, in-class pr…	32 (72.7%)
A bi-weekly new…	32 (72.7%)
The bulletin boa…	15 (34.1%)
Brief, in-class pr…	1 (2.3%)
email	1 (2.3%)
Send out all of t…	1 (2.3%)
by email	1 (2.3%)
via myUMBC	1 (2.3%)
myumbc email	1 (2.3%)
e-mail/social me…	1 (2.3%)
Email	1 (2.3%)

0   10   20   30   40