

Minutes

GOVERNANCE AND ADMINISTRATION COMMITTEE

November 18, 2019

Committee Members: Mehul Sanghani (Chair), Dennis Treacy, Jeff Veatch

Other Board Members: Horacio Valeiras (Rector), C.T. Hill

Representatives to the Board: Tamarah Smith, Madelynn Todd

VPI&SU Faculty and Staff: Whit Babcock, Richard Blythe, Alexa Briebl, Lori Buchanan, Allen Campbell, Al Cooper, Kevin Foust, Ron Fricker, Deborah Fulton, Bryan Garey, Rob Glen, Debbie Greer, Kay Heidbreder, Travis Hundley, Sharon Kurek, Jamie Lau, Kim Linkous, Angie Littlejohn, Ken McCrery, Scott Midkiff, April Myers, Kim O'Rourke, Dwayne Pinkney, Tim Sands, Jon Clark Teglas, Tracy Vosburgh, Lisa Wilkes

VPI&SU Students: Chris Finch, Haley Jernigan, Isaac Poe

OPEN SESSION

1. **Welcome and Opening Remarks.** Mr. Mehul Sanghani, Chair of the Governance and Administration Committee, welcomed committee members, guests, and invited participants. He noted that three of today's agenda items address areas of enterprise risk for the university: IT security and operations, athletics, and leadership and governance.
2. **Consent Agenda.** The committee approved the items listed on the Consent Agenda.
 - a. Minutes of the August 26, 2019, Meeting.
 - b. Approval of Revised Charter for the Compliance, Audit, and Risk Committee
3. **InclusiveVT: Focus on the College of Architecture and Urban Studies.** Dean of the College of Architecture and Urban Studies (CAUS), Dr. Richard Blythe, updated the committee on the college's diversity and inclusion successes and initiatives.

Currently the college consists of 2,446 undergraduates, 329 graduate students, and 181 students working toward their PhDs. While these students represent a myriad of states and countries, 63 percent of this year's student population within

the college identify as Caucasian. Of the 189 college faculty members, 31 identify as an underrepresented minority and 75 as female. In 2017, CAUS began hosting a public exhibition each fall during *InclusiveVT Week*. The 2018 exhibit entitled “Micro-aggressions Stories @ VT,” included various narratives from the college faculty, staff, and students describing the personal daily impact felt due to microaggressions related to race, ethnicity, gender, age, mental health, and political affiliation. That same fall, the college collaborated with the Perspective Gallery in Squires Student Center on “Community Narratives: VT,” which featured portrait narratives in which each individual photographed shared what diversity means in their lives. The college also hosts a panel discussion each fall entitled “Intersections: Cross Disciplinary Conversation about Social Justice and the Built Environment,” that features faculty across colleges and involves topics related to inclusion and diversity, among others. Each year the panel focuses on a broad theme, such as 2017’s “Identity: Specifically, in Appalachia,” 2018’s “Privilege, and Environment Resiliency,” and most recently, “Aging and Place, and Migration.” Discussions are open to the public, as well as to the campus community, as are the exhibitions. Additionally, the college brings in scholars and professionals whose work relates to inclusion and diversity in honor of MLK week, Black History Month, and Women’s month, each spring, including past speaker, Ed Jackson, the executive architect for the MLK memorial. Students of the college also had the opportunity to collaborate with artist Willie Cole and the School of Visual Arts during Sustainability Week in 2018 on the Bottle Stacks installations. This fall, the college’s diversity committee began reviewing curriculums within its 10 disciplinary focuses to identify where integration of diversity and inclusion efforts into course content could strengthen further understandings and practices. The college is also currently in discussion of hiring an Associate Dean who will be responsible for inclusion and diversity matters. Future initiatives include efforts to enhance underrepresented and minority student engagement, increasing the number of alumni events that feature underrepresented and minority speakers, developing a communication strategy and implementation plan, and reviewing intentional hiring practices and committee compositions.

4. **IT Security** (enterprise risk). Dr. Scott Midkiff, Vice President for Information Technology and Chief Information Officer, provided the annual update on IT security.

Since the introduction of the personal computer, Virginia Tech’s Division of Information Technology has supported the “Bring Your Own Device” model with the belief that data is meant to be shared, but also properly secured. As a result, the university operates on a zero-trust network, in which all machines must be properly secured and monitored regardless of physical location. During the month of October 2019, the wireless network supported a daily average of 65,830 unique devices that generated roughly 66 terabytes of traffic per day, a statistic that does

not include the traffic generated by the 36,529 devices that operated on the wired network daily during the same time frame. The university is exposed to risk from both internal and external threats, from the loss of services to the loss of financial and personal data as well. Additionally, the division must also be concerned with compliance risks imposed by heightened regulations and requirements that often require significant resources to meet. In an effort to mitigate all types of risk, the division continuously monitors the network and provides security awareness training, while also utilizing the Center for Internet Security's 20 Critical Controls to ensure minimum security standards are met. In July 2016, the university began to utilize multifactor authentication methods in an effort to reduce the amount of cyber-attacks. Efforts have proved successful, as the number of attacks has significantly decreased since implementation, with only a few instances occurring within the past three years. However, it is important to note that multifactor authentication is not completely immune to phishing attacks, as threats evolve and change at the rate of changing technology. Along with multifactor authentication requirements, the division has also invested in Central Logging Services that allow for continuous monitoring of equipment and servers utilized across campus, ingesting 300 gigabytes of data per day and storing up to six months' worth at a time. In order to protect the university's research data, the division has implemented a Controlled Unclassified Information (CUI) framework that operates 110 security controls, as well as an Electronic Protected Health Information (ePHI) framework that operates 18 security controls and covers HIPAA requirements. The top three challenges for the division include the security of in-house and vendor software, cybersecurity awareness among users, and software updates and patching. In an effort to increase knowledge of risks and bring up the next generation of Information Technology Professionals, Virginia Tech's Division of IT also supports the Virginia Cyber Range. As such, the university partners with 21 community colleges and 13 universities in the Commonwealth, as well as with half of the state's public high schools, including all four located in Montgomery County where the Blacksburg Campus resides, in order to further educate students on cybersecurity. Over this past summer, the U.S. Cyber Range Initiative was announced and the university plans to begin engaging and supporting cyber security education outside of the Commonwealth in the near future.

- 5. Institutional Excellence Initiative: Transforming the Administrative Enterprise – Project and Timeline Identification.** Dr. Dwayne Pinkney, Senior Vice President and Chief Business Officer, updated the committee on the ongoing Initiative, which included the identification of specific projects.

With the initial assessment of the Senior Vice President's areas having been completed in August, focus has shifted to building effective and efficient organizational structures, before moving into the second phase of the project. Some institutional changes have already launched in lieu of observations made

within the first year of the project, but various teams across the university must still be engaged in conversations in order to confirm that items identified are actually the items that need to be addressed. Recently, the Senior VP hosted a retreat for the Senior Leadership Team to discuss future initiatives that may not necessarily have enterprise-wide impact, but will still affect their specific areas of responsibility. Each project will be assigned a project leader who will be responsible and accountable, and teams will also be assigned to facilitate the work of each portfolio. The prioritizing and planning of each project will center around the level of risk and anticipated impact, with those rated higher being the primary focus at this time. The recent re-organization to create the Safety and Security Team has allowed for a more integrated response and planning method in that realm, and it is anticipated that with the search for the new Vice President for Campus Planning, Infrastructure, and Facilities beginning soon, the same will be facilitated in that realm as well. Sibson Consulting was selected to assist in a more in-depth analysis of the university's financial model, as well as its information technology processes, in order to assist in the identification of effective and efficient practices, as well as potential areas of improvement. Vice President for Information Technology and Chief Information Officer, Scott Midkiff, along with Vice Provost for Academic Resource Management, Ken Smith, have been appointed to lead the University Data Governance Council Initiative in an effort to determine a more proactive and managed data governance approach that can be applied across the enterprise. Currently, the project has yielded a draft Charter for an Executive Data Governance Council, and next steps include the drafting and review of new or revised policies establishing the data governance framework, as well as the appointment of members and a set schedule for the Data Governance Council. With the expiration of the current power purchase agreement with AEP set to expire, an assessment of the Virginia Tech Electric Service (VTES) business model has been scheduled, as it has been identified by Deloitte as an excellent opportunity to implement efficient, cost-effective operating principles. In conducting the review, more informed decisions can be made regarding the long-term operating strategy and utility agreements that will make a significant and immediate impact on the enterprise. The President also recently appointed Dr. Pinkney as Chair of the Climate Action Committee, which is charged with the review and renewal of the university's current practices in regards to combatting climate change with the assistance of faculty experts. Additionally, Business Services is also evaluating the model for residential package delivery in favor of a more centralized student locker system that will further protect students and facilitate more convenient delivery practices. Next steps for the overarching initiative include continued framework communication and prioritization and identification of projects and project leaders, as well as working to build the in-house capacity to support current projects and anticipated improvement efforts. The committee will receive an update on the project, as well as a timeline of future work, at the June meeting.

- 6. ACC Network Update, Basketball Alcohol Sales Guidelines, and new NCAA Legislation** (enterprise risk). Mr. Whit Babcock, Director of Athletics, and Ms. Angie Littlejohn, Senior Associate Athletics Director for Internal Operations, provided an update on the ACC Network following its official launch in August 2019, as well as presented the proposed guidelines for alcohol sales at home basketball games this upcoming season. Mr. Babcock also discussed the recent legislature decision in California to provide monetary compensation for student athletes.

Since its launch in August, the ACC Network has exceeded initial distribution expectations, having been picked up by six additional cable providers earlier than anticipated. Despite achieving both national and international exposure, Xfinity Comcast, a major distributor in the Blacksburg community that is currently utilized on campus, has yet to pick up the network. In response, a campaign encouraging fans to reach out to Xfinity has been initiated, in hopes that the company will revisit its contractual agreements ahead of schedule. The network broadcasts all live home events, each of which involves 60 to 80 students in some capacity. Virginia Tech is unique in that it operates with an all student broadcasting staff, aside from those mandated by the ACC. The students are also led by a team of former Hokies who once worked for the SEC, but have since returned home to their ACC roots. Students are recruited by word of mouth and advertised interest meetings, and there are no curriculum requirements in place as individuals from all areas of study are encouraged to participate. There is also a task rotation in place for each broadcast, so that students are able to learn all facets of a live broadcast and find their niche. Athletics also announced that they will join many of their ACC peers, as well as other schools within the BIG 10, by permitting alcohol sales at all major sporting events. Prior to this year, alcohol was only allowed in specialized areas of English Field, Hokie Village, and the club areas of Lane Stadium, but will now include Cassell, the softball park, Thompson Field, and the Rector Field House as well. While concerns have been raised as to how the decision to do so might negatively affect the university, data shows among peer institutions that the selling of alcohol on premise has actually lowered the amount of alcohol-related incidents at events. Additionally, Athletics has full support of the VTPD in place for each event and all servers have been trained to request IDs from every customer, as well as how to spot fake ones, in order to ensure that no underage drinking occurs on premise. On October 29, the NCAA released information regarding its decision to allow student-athletes the opportunity to benefit from the use of their name, image, and likeness. However, there will be very strict parameters but in place to ensure that said opportunities cannot be used for recruitment purposes, as well as to reduce the risk of college athletics becoming equivalent to pro-sports.

7. **Board Self-Assessment** (enterprise risk). Mr. Mehul Sanghani discussed the future Board Self-Assessment.

The committee reviewed the survey questions utilized in the most recent self-assessment and determined that any suggestions regarding said questions should be submitted to the Secretary to the Board, Kim O'Rourke, by December 1, 2019.

8. **Future Agenda Items and Closing Remarks.** Mr. Mehul Sanghani discussed future agenda items for the committee, which is moving to a biannual schedule. The committee will next meet in June 2020, at which time the results of the 2020 self-assessment should be available. The committee will also expect to hear more from Dr. Pinkney about the transformation initiative, from Mr. Garey about the ongoing improvements in Human Resources, and from Athletics on updates regarding new NCAA regulations, as well as Wi-fi in Lane Stadium. He then requested a motion for adjournment.

There being no further business, the meeting adjourned at 11:23 a.m.



BOV – Diversity

November 2019

College Update

Dean Richard Blythe



SCHOOL OF ARCHITECTURE + DESIGN

Architecture

Industrial Design

Landscape Architecture

Interior Design



MYERS-LAWSON SCHOOL OF CONSTRUCTION

Building Construction

Construction Engineering and Management



SCHOOL OF PUBLIC AND INTERNATIONAL AFFAIRS

Public Administration and Policy

Urban Affairs and Planning

Government and International Affairs



SCHOOL OF VISUAL ARTS

Graphic Design (VCD)

Creative Technologies

Studio Art

Art History

EXPLORE CAUS

Choosing a degree program can be tough. Check out these [undergraduate majors and minors](#) we offer through our college, and if you have questions and want to learn more, consider [scheduling a visit](#) or get a current student's perspective by [contacting one of our college ambassadors](#).

[BROWSE ACADEMIC PROGRAMS](#) >

FAST FACTS

2,398

students from 42 states and 35 countries







Entity	Faculty	Staff	Total f+s	Enrollment
CAUS	1	14	15	33
MLSoC	20	3	23	640
A+D	85	16	101	1126
SPIA	56	11	67	412
SOVA	36	3	39	235
	198	47	245	2446
Graduate students				329
PhD Students				181



Diversity Structure

- Inclusive VT Faculty Diversity Committee Representatives:
Associate Dean for Academic Affairs Professor Kathryn Albright,
Institute for Policy and Governance Director Professor Max
Stevenson
- Inclusive VT Committee reps: seven faculty and seven students
- CAUS Diversity committee: Chair Professor Kathryn Albright,
thirteen faculty and staff, organised eight diversity events across the
year



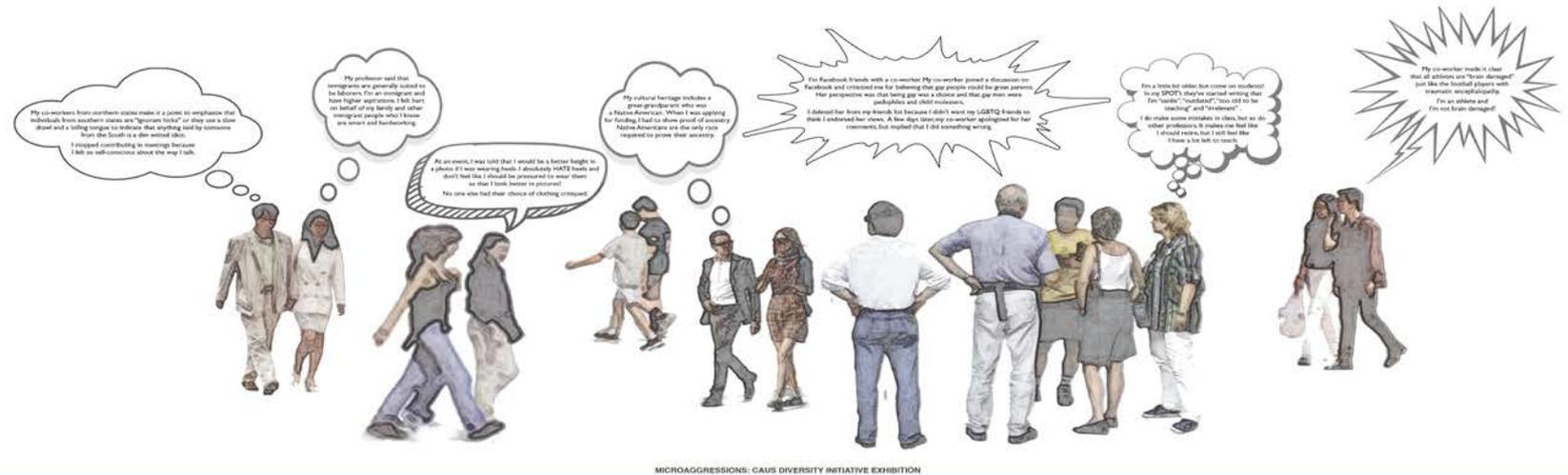
Diversity Initiatives

Micro Aggressions Exhibition

CAUS



MICROAGGRESSIONS: CAUS DIVERSITY INITIATIVE EXHIBITION



MICROAGGRESSIONS: CAUS DIVERSITY INITIATIVE EXHIBITION

CAUS

My cultural heritage includes a great-grandparent who was a Native American. When I was applying for funding, I had to show proof of ancestry. Native Americans are the only race required to prove their ancestry.

I'm Facebook friends with a co-worker. My co-worker joined a discussion on Facebook and criticized me for believing that gay people could be great parents. Her perspective was that being gay was a choice and that gay men were pedophiles and child molesters.

I deleted her from my friends list because I didn't want my LGBTQ friends to think I endorsed her views. A few days later, my co-worker apologized for her comments, but implied that I did something wrong.

a better height in
ly HATE heels and
to wear them
ures!
hing critiqued.





Diversity Initiatives

Community Narratives Exhibition



"In my lived experience, diversity is way more than an institutional buzzword that is often reduced to, I fear the importance of diversity early in my career, as I was the second African-American to graduate from the Landscape Architecture program at the University of Arkansas and I graduated in 2002. The program started in 1976. So for me, a kid from Memphis, Tennessee it was a challenge at times to cope with being the only minority in my cohort, to make it even more difficult I did not have anyone on the faculty who looked like me, who grew up in a similar place like me, or even had similar lived experiences like me. My undergraduate experience was pivotal in my decision to become a professor. It is important for me to be the person that I needed in undergrad, because that person did not exist for me. So for me, particularly with my ethos of engagement, diversity is essential to my teaching, scholarship and research. I feel like diversity provides all of us as a community to expand our world view and learn from our difference to make the world a better place."

C.L. Bohannon



"With my mom being West Indian and my dad being African American, I have had a firsthand experience of diversity and what it means. Growing up, I was able to experience both cultures and what they had to offer me—whether that was food, music, or dance. I would like to think that being able to experience that from an early age made me the open-minded and well-rounded person that I am today."

Arts Hill



"Raised in Southwest Virginia, in the 60's and 70's, diversity was something we saw on TV: social riots/demonstrations, or issues surrounding the war in Vietnam. It was never close-to-home. As a young teenager, coming to terms with being a gay man in rural Virginia, that took some getting used to - in my personality being diversity. I quickly realized that people's opinions of our differences, rather than our similarities, was a real part of my life. My diversity spectrum was established."

For me, in more recent years, diversity has come to mean more - a truly deeper definition of that spectrum - defined by one's background, emotional development. Me in faith, maturity, devotion, interests, patriotism, creative spirit, character, morality, commitment, and the list goes on and on - We each, in our own personal story, are diverse. If compared to one another - we are individuals, depending on the spectrum definition we use."

Gary Kinder



"The beautiful thing about growing up in a Panamanian family is that I have created an appreciation for cultures but mostly that I have learned to value things that are not of social norms. There came a point when it started to become hard to have conversations with others about my own experiences because they wouldn't understand and it was very different to them because I knew two cultures while others did not. I came to a realization that people are accidentally ignorant. Whether this be due to lack of travel, not knowing culturally different people, or whatever the reason may be; it made me sad. So, being diverse and having these experiences makes it so that I have certain knowledge that others do not. This allows me the opportunity to share my knowledge so that people are aware and so that they might learn from us just as much as I can from them. I think now is the time we should all start sharing our experiences."

Ariel Barrientos



"Diversity creates unknowns which intimidates people immensely. However, by embracing it, we can expand the scope of our experiences and live an adventurous life without regret. On the other hand, we can shun it, and thereby choose to live in a tiny bubble of existence with the whole world out there waiting for us to enjoy."

Yuki Tsujimoto



"It is the commitment to diversity that is most important. Because of the University's commitment to diversity I have been able to access all paths and buildings in my wheelchair. I know that adjustments would be made to accommodate me, allow my teaching and engagement in activities. I have seen this growth over my time with the school."

Ellen Braaten



"In my life experiences, without diversity I would not be the same personally, intellectually, or spiritually. Originally from Kansas City, MO and a proud Mexican family, passing time with people not like me provided the opportunities to learn about the beautiful and ugly parts of this world I never knew existed. In my time here, not only do I hope to grow more as a person, but I also hope to contribute to others' lives in the same way."

Ray Zuniga



"My parents are Spanish and Korean and I straddle these two cultures while still trying to figure out who am I.
[한] 사람,
[스페인] 사람.
Let us celebrate together. Let us find strength in one another. Let us find beauty in our similarities and differences. I am proud of both my heritage and my culture. I am /an/ embodiment of diversity."

Starla Couso



"Growing up in a multi-ethnic society in Malawi, Africa, and through my academic sojourns in the Far East, and now, here in the USA, I have come to understand that diversity exists encompassing all mankind. It presents itself all around us. To be sure, we all surround it. We cannot take away from this totality without taking away from the essence of humanity: variety, reason and emotion. This is what nature has intended for us."

Amos Kalua



"Diversity is about all of us! All there is. The differences that separate individuals from one another, what we can see and what we cannot. Diversity is one of the most important factors to enrich and beautify our society and one's experience in the journey of life. Thanks to the rich Diversity in my Country Colombia, I learned to love, accept, welcome and treat all my fellows, with the same respect and dignity; my personal journey has given me the great opportunity to meet beautiful and diverse people from all over the world. "No matter where I am, or how far I go, I will always embrace Colombia's big diversity, its culture and my roots with pride."

Ingrid Skendarian





"With my mom being West Indian and my dad being African American, I have had a first-hand experience of diversity and what it means. Growing up, I was able to experience both cultures and what they had to offer me—whether that was food, music, or dance. I would like to think that being able to experience that from an early age made me the open-minded and well-rounded person that I am today."

Aria Hill





Diversity Initiatives

Diversity Lecture Series

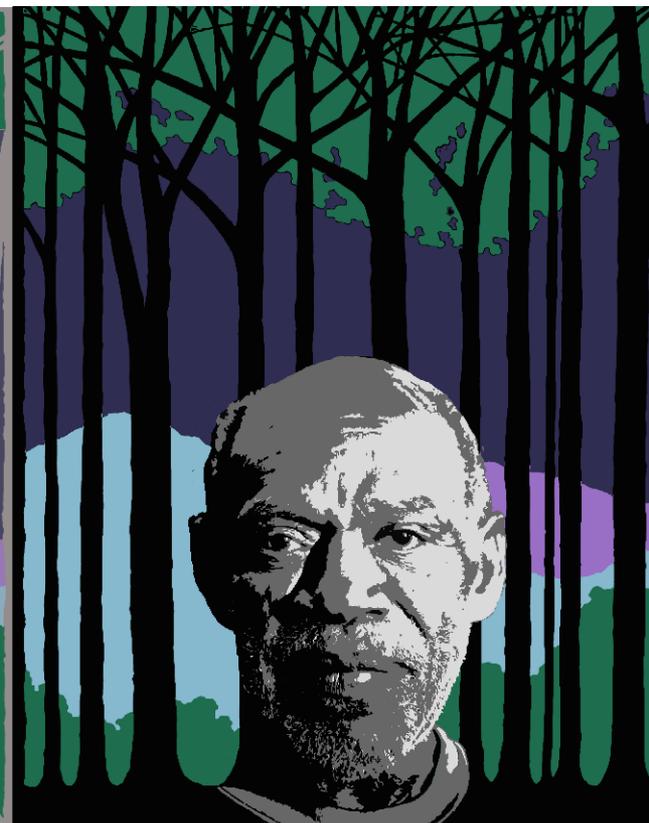


Faculty Panel
Emily Sattarwhite, Professor, Sociology
Ashley Shew, Professor, Science and
Technology in Society
Jim Bassett, Professor, Architecture
Panel Moderated by Sam Winn,
University Libraries Collection Archivist
Hosted by
CAUS Diversity Committee



Identity: Specifically in Appalachia

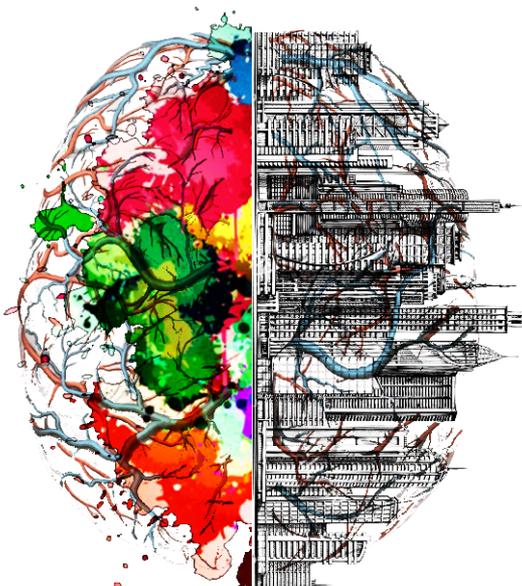
Intersections: Cross-Disciplinary
Conversations about Social Justice and
the Built Environment



Wednesday November 8th, 2017
4-5 p.m.
A+A Library
100 Cowgill Hall

JULIAN BONDER

MEMORY-WORKS
PUBLIC SPACES, MONUMENTS & MEMORIALS



SPONSORED BY: CAUS DIVERSITY COMMITTEE AND SCHOOL OF ARCHITECTURE + DESIGN

THURSDAY JANUARY 25, 2018
2 PM IN 100 HANCOCK HALL

HOSTED BY: SCOPE

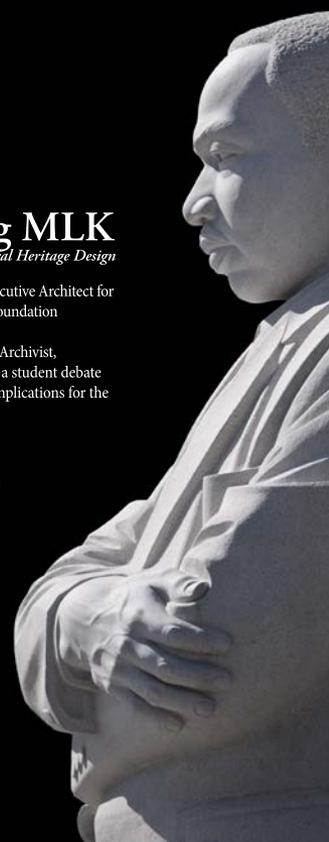
Memorializing MLK

Identity and Representation in Cultural Heritage Design

Opening remarks by Ed Jackson Jr., Executive Architect for the Martin Luther King, Jr. Memorial Foundation

Join moderator Sam Winn, Collections Archivist, University Libraries, Virginia Tech, for a student debate examining principles, practices, and implications for the design of cultural heritage sites.

Hosted by CAUS Diversity Committee
Art + Architecture Library, Cowgill 100
Friday, January 20, 2017 at 11 AM -12:30 PM



Clarissa Sligh

The Path to Transforming Hate: An Artist's Book



March 15, 2018
2 PM Hancock 100

Sponsored by CAUS Diversity Committee & Women and Minority Scholars and Artists Lecture Series & Elizabeth A "Betsey" Flanagan Women in Leadership and Philanthropy Endowed Lecture Fund



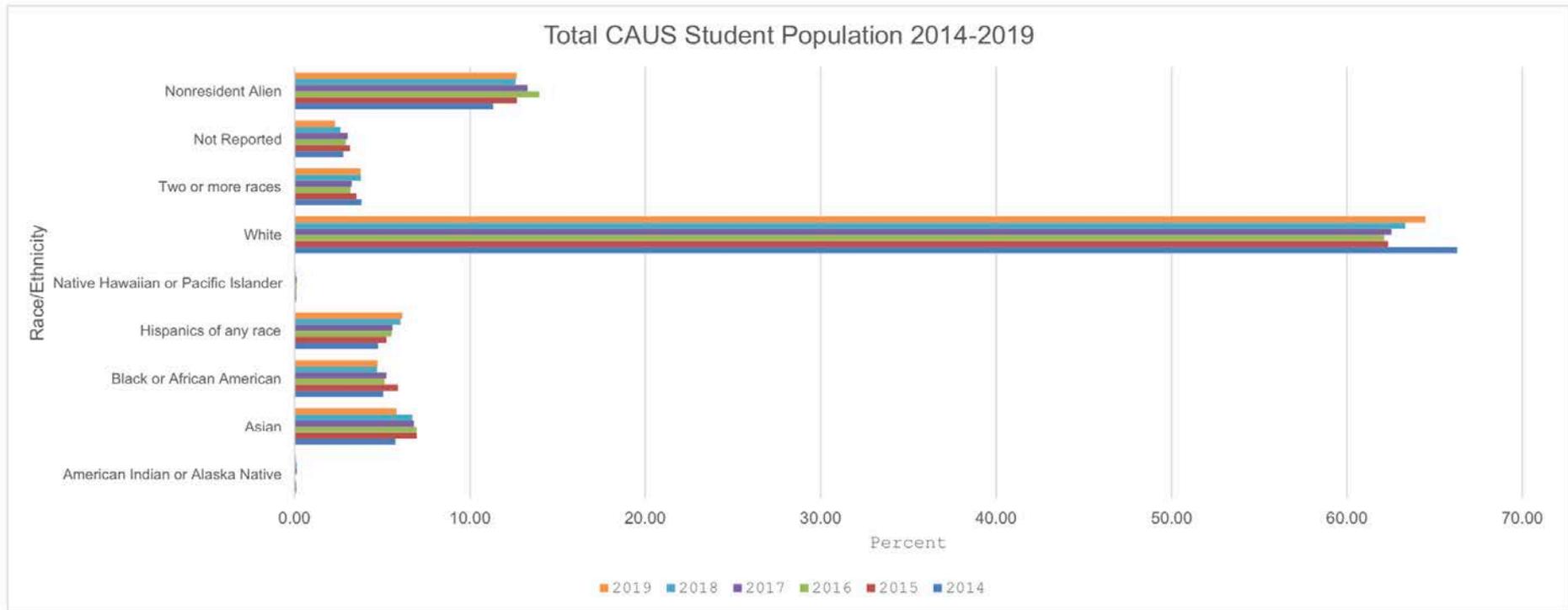
Diversity Initiatives

Diversity Events: Willie Cole community arts collaboration

CAUS

Attachment G







Faculty Diversity	
URM Tenure and Tenure Track	19/115
Female Tenure and Tenure Track	40/115
URM Adjunct Faculty	7/43
Female Adjunct Faculty	16/43
URM Non Tenured Instructional	5/31
Female Non Tenured Instructional	19/31
Total URM Faculty	31/189
Total Female Faculty	75/189



Future Diversity Initiative

- Enhance underrepresented and minority student engagement
- Better integrate Inclusive Pedagogy into curriculum
- Increase alumni events hosted at underrepresented and minority facilities, clubs, and museums featuring underrepresented and minority speakers
- Develop a communication strategy and implementation plan
- Review intentional hiring practices and committee composition



BOV - Diversity

Questions and Discussion with

Dean Richard Blythe

IT Security and Risk Update

BOV Governance & Administration
Committee

SCOTT F. MIDKIFF
VICE PRESIDENT FOR IT & CHIEF INFORMATION OFFICER
NOVEMBER 18, 2018



A UNIVERSITY'S NETWORK AND ITS COMPUTERS ARE SOMETHING LIKE AN ART MUSEUM



We must facilitate learning, collaboration, and access to knowledge and information, as appropriate. We have supported a “bring your own device” (BYOD) model since the beginning of personal computing and networks.

We invest in monitoring and quick response to threats to protect users, data, and systems.

We have long followed what is now called the “zero-trust network” model. Each computer should be appropriately secured.

We focus on protecting assets – typically data – regardless of where they physically reside. Some segments of the network need additional protection.

A TYPICAL DAY ON THE VIRGINIA TECH NETWORK



Wireless: Wi-Fi

65,830 Unique Devices
66.16 Terabytes of Traffic



Wired: Ethernet

36,429 Unique Devices



External

9.2 Gigabits Per Second Rate In
2.0 Gigabits Per Second Rate Out

ENTERPRISE RISK MANAGEMENT



RISK OVERVIEW

The university faces significant risk exposure in the areas of IT security and operations from both internal and external threats. Continually evolving threats coupled with increasing regulatory and compliance requirements require significant resources and expertise to manage and mitigate.



RISK EXAMPLES

Cyber attacks leading to loss of services
 Cyber attacks leading to loss of high or medium risk data
 Accidental exposure of high or medium risk data
 Increased compliance and regulatory requirements and heightened regulatory scrutiny for data and IT systems
 Loss of institutional reputation and trust



MITIGATION EXAMPLES

Continuous network monitoring

IT security reviews; vulnerability scans; penetration testing; computer and network forensic services

Security awareness training

Computing enclaves to ensure compliance

Minimum security standards and use of the Center for Internet Security “20 Critical Controls”

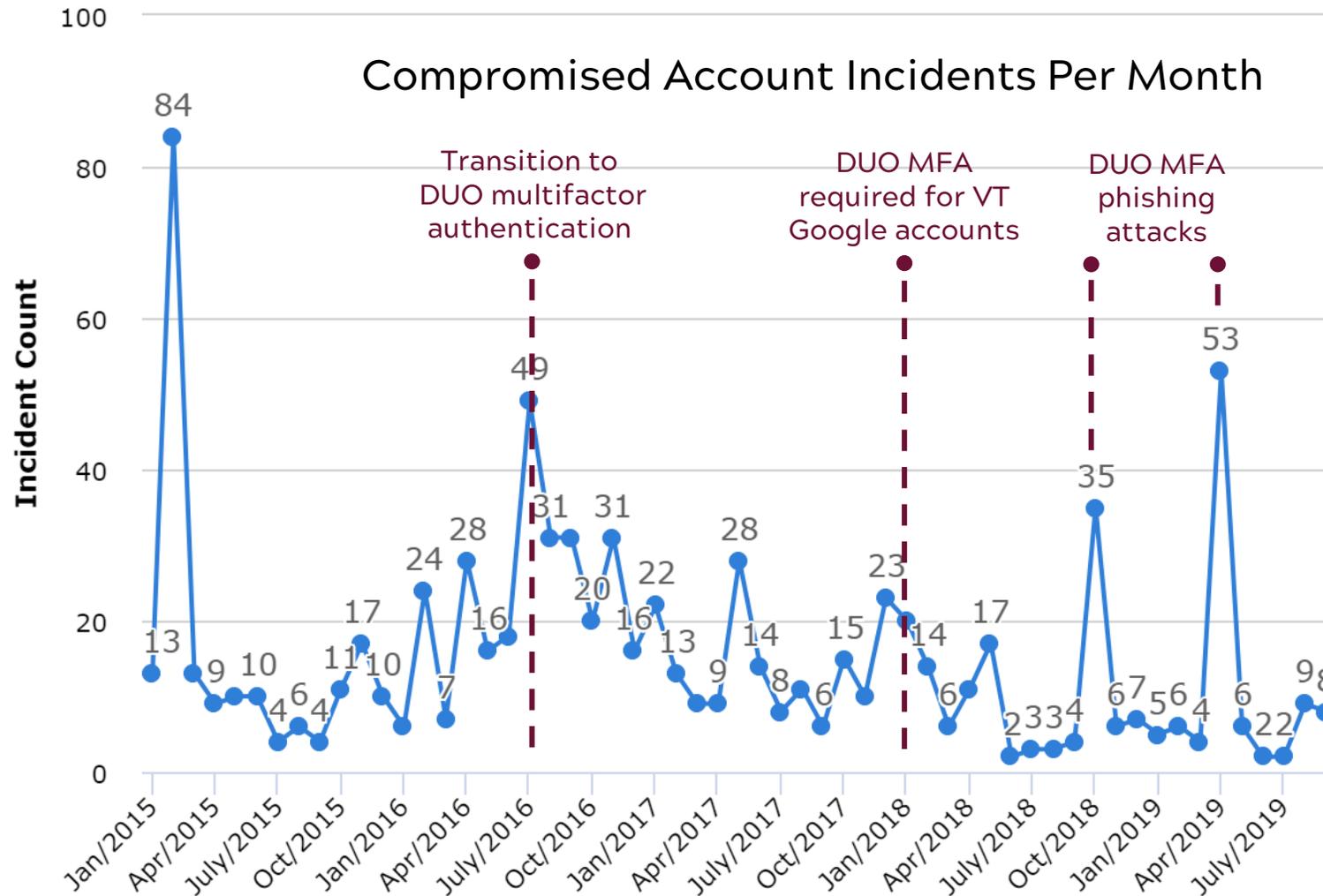
Multifactor authentication (MFA) and more

Central Logging Service (CLS)

Security aware and compliant cloud services

Distributed denial-of-service (DDOS) prevention

MULTIFACTOR AUTHENTICATION



COMPROMISED ACCOUNTS GIVE AN INDICATION OF THE LEVEL OF THREATS TO VIRGINIA TECH USERS

Wide deployment of multifactor authentication (MFA) has substantially reduced the number of compromised accounts.

But, MFA is not a panacea as evidenced by Duo phishing attack incidents in October 2018 and April 2019.

MONITORING AND CENTRAL LOGGING SERVICE



300 GB ingested per day



21.0 TB, 20 trillion documents searchable for one month

CENTRAL LOGGING SYSTEM COLLECTS NETWORK AND SYSTEM LOG DATA FROM MANY UNIVERSITY SOURCES

Augments continuous monitoring for threat identification and analysis

Enables real-time dashboards for security threats, and operational issues

Used for both enterprise IT and local IT systems

July 2018-June 2019

249,782 Alerts
Probes of known problems such as in Drupal and Wordpress servers



253 Tickets Opened
Potential compromises of servers at Virginia Tech



211 Malware Infections
42 false positives likely blocked at the server or other unsuccessful

SECURE RESEARCH ENVIRONMENTS



- Enables secure and compliant computing and data storage for University researchers
- Minimizes friction with on-premises storage and compute
- Reduces cost-of-entry using flexible centralized solutions

	CUI	ePHI
Framework	Controlled Unclassified Information (NIST 800-171)	Electronic Protected Health Information, including HIPAA
Number of security controls	110	18
Using shared IT infrastructure?	No, restricted	Yes, shared
Hardware	384 CPUs, 4 TB RAM, 217 TB Storage	252 CPUs, 8 TB RAM, 127 TB Storage

Continuing Efforts

Hybrid and cloud solutions
 Support for ePHI in current offerings such as Office 365 and Google Applications for Education

TOP-3 CHALLENGES



In-house and vendor software security

- Risk of data exposure
- Vendor questionnaires allow risk assessment (and multi-institutional collaboration)



User cybersecurity awareness

- Susceptibility to phishing attacks
- Weak device passwords
- Need to “see something, say something”



Software updates and patching to the latest versions

- Patching works – patching limited our damage from recent high-profile attacks (WannaCry, BlueKeep)
- But, we need more systematic and automated approaches
- New Unified Endpoint Management program is addressing gaps

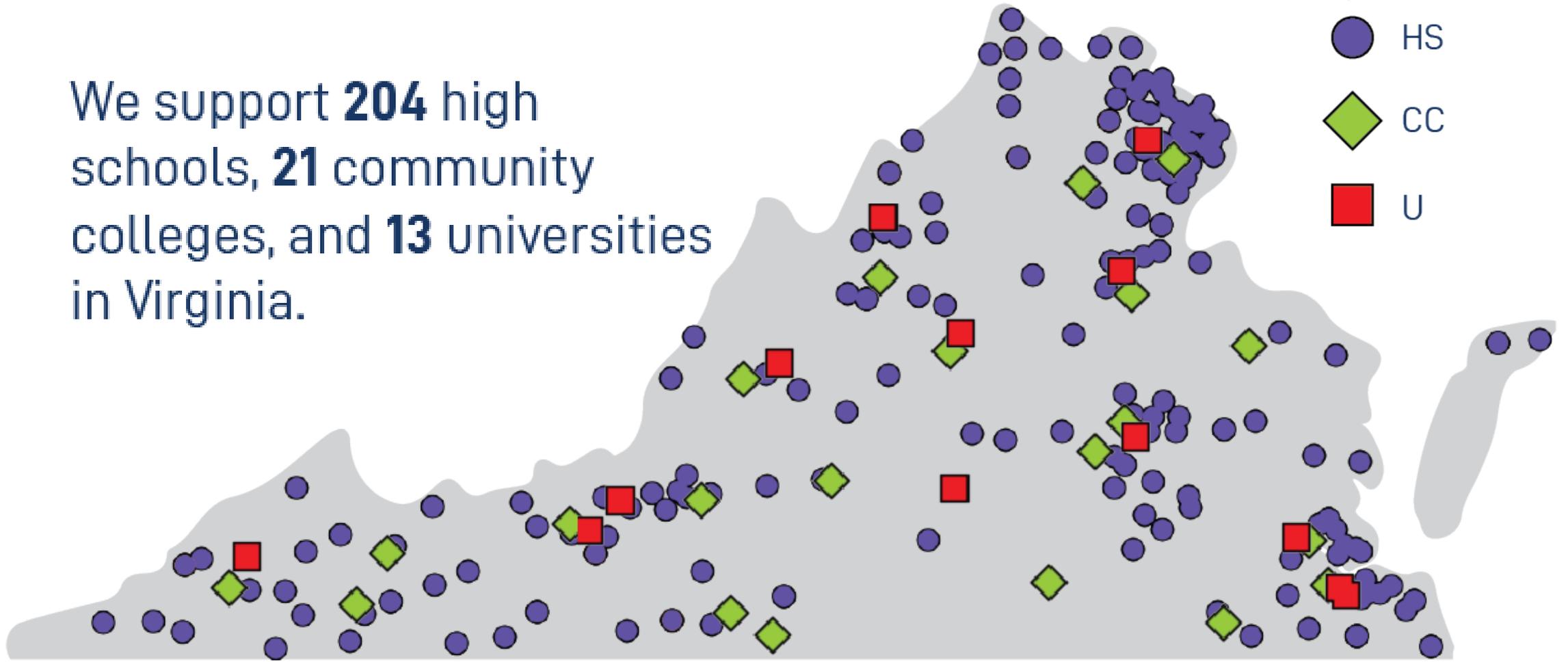
VIRGINIA CYBER RANGE



VIRGINIA
CYBER RANGE

- HS
- ◆ CC
- U

We support **204** high schools, **21** community colleges, and **13** universities in Virginia.



Each dot represents a different Virginia high school, community college, or university.

Institutional Excellence:

Administrative & Operations Transformation

BOARD OF VISITORS

NOVEMBER 18, 2019



Phase 1: *Achieve Organizational Alignment*

Phase 2: *Advance Institutional Excellence*

Phase 3: *Optimize Continuous Improvement*

Assess Our Current Operations and Organizations

Build Effective and Efficient Organizational Structures

Achieve Process and Systems Excellence

Enhance Programs, Services and Operating Models

Enrich Campus Resources: Physical, Financial, Human, Technology

Implement Continuous Evaluation and Improvement

- Assess organizational structures, culture, people, and processes
- Engage with executive, administrative and academic leaders
- Meet with and listen to faculty, staff and student leaders
- Attend town halls, employee appreciation events, and all-hands meetings
- Develop relationships with external agencies, and university partners
- Assess needs of major university initiatives

- Create more efficient operations through an effective organizational design
- Build organizational and role clarity
- Develop organizational structures around institutional needs not individuals
- Ensure that future organizations are nimble and adaptable to change
- Create sufficient capacity to provide best-in-class support services
- Develop a more satisfying and engaging work environment
- Ensure that organizational changes have minimal disruption to the organization

- Map and redesign existing processes across operations
- Build technology roadmaps
- Establish data and analytics program
- Develop new support service model to support Washington DC area, Roanoke, and Blacksburg
- Expand use of Robotic Processing Automation (RPA) tools and technologies

- Evaluate capital planning and capital project governance and operating model
- Conduct cost benefit analysis of VTES and fleet services operating models
- Implement systems to enable data driven space allocation decisions
- Evaluate opportunities to reimagine service delivery models, implement new operating frameworks, and modernize programs

- Create a procurement center of excellence
- Develop job architecture framework
- Develop investment roadmap including risks, success factors and decision points
- Redesign budget and financial model to be transparent
- Cultivate transformational recruitment and retention programs

- Evaluate efficiency and effectiveness of operations
- Reaffirm organizational structures are agile, nimble, and responsive
- Implement advanced systems and technology
- Expand business intelligence capabilities

**November 2019 Intercollegiate
Athletics Report to the
Governance & Administrative
Committee of the Board of
Visitors**



The ACC Network is a tremendous startup in every respect. The distribution has exceeded the original expectations for our first year, and we couldn't be more pleased with the talent, production and storytelling. - John Swafford, ACC Commissioner



As of June 2019
BOV Meeting

✓ **optimum.**
by altice

✓  **DIRECTV**

✓ **fios**✓
by verizon

✓ **Google Fiber**

✓ **hulu**

✓  **Vue**

Charter
Spectrum▶

You**Tube** TV

COX

Mediacom

xfinity

dish

NCEC

Misc. Others



As of Today

✓ **optimum.**
by altice

✓  **DIRECTV**

✓ **fios**^v
by verizon

✓ Google Fiber

✓ **hulu**

✓  **Vue**

✓ Charter
Spectrum▶

✓ You**Tube** TV

✓ **COX**

✓ **Mediacom**

✓ **dish**

✓ **NCEC**

xfinity

Misc. Others

ACC Network Student Staff in Action



New Era of the Fan Experience

- **English Field at Atlantic Union Bank Park**
- **Hokie Village**
- **Club Areas of Lane Stadium**
- **Cassell Coliseum**
- **Tech Softball Park**
- **Thompson Field**
- **Rector Field House**

Alcohol Sales Around the **ACC**

**SELLS BEER AND WINE
IN STADIUM**

**ALCOHOL SOLD IN
PREMIUM AREAS**



**ALCOHOL CAN BE BROUGHT
INTO PREMIUM AREAS**



* SELECT DESIGNATED AREAS, NOT ALL VENUES
 ** ALL OTHER VENUES EXCEPT LANE STADIUM

*** LANE STADIUM

Alcohol Sales Around the **BIG**

**SELLS BEER AND WINE
IN STADIUM**



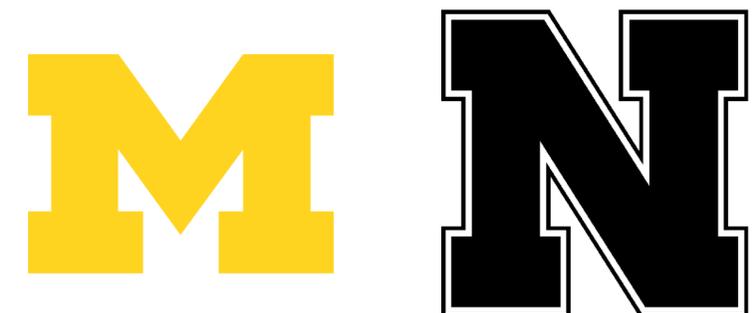
**ALCOHOL SOLD IN
PREMIUM AREAS**



**ALCOHOL CAN BE BROUGHT
INTO PREMIUM AREAS**



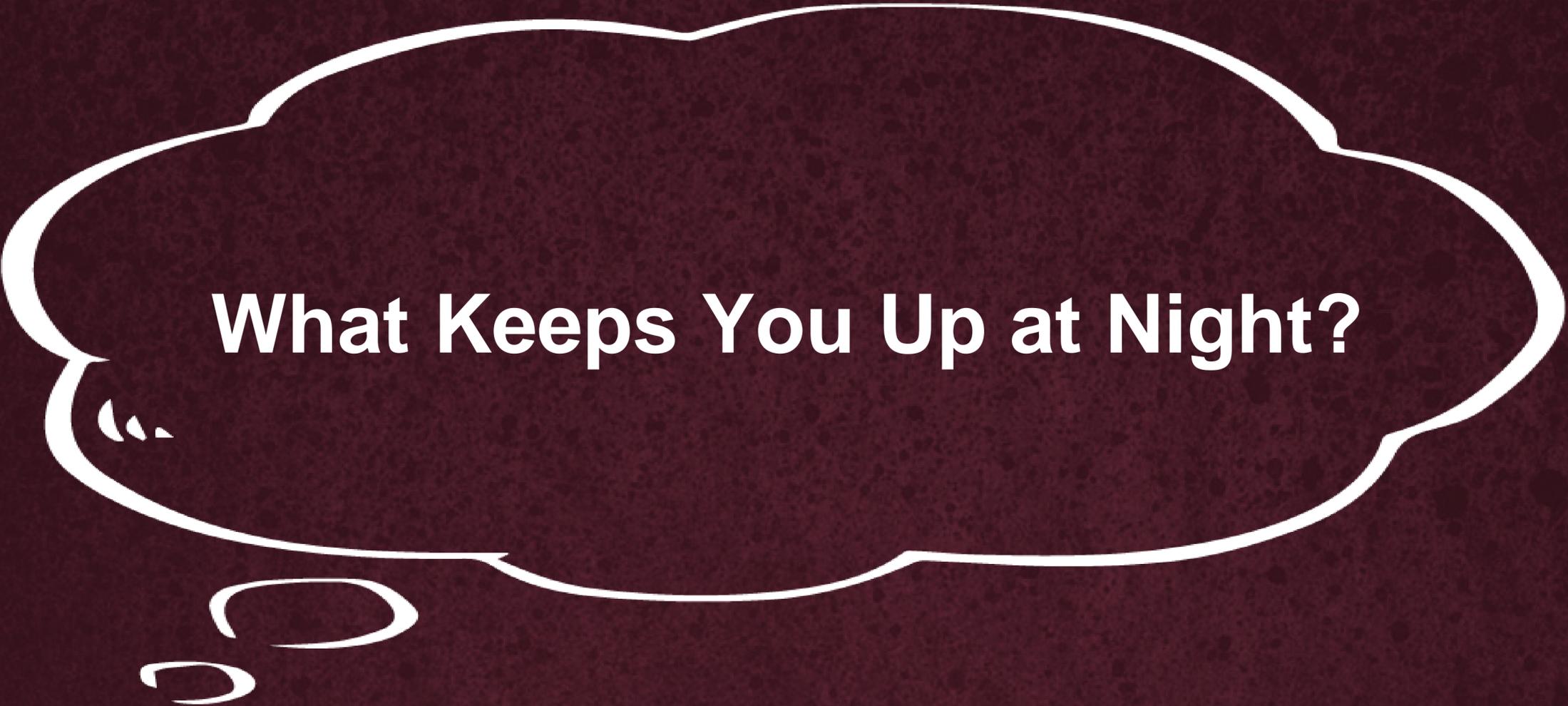
NOT AT THIS TIME



BIG10 Schools	Year Before Alcohol Service	First Year of Alcohol Service	Difference
Alcohol Citations	65	4	-61
Ejections	85	25	-60
Alcohol Arrests	14	22	+8
BIG12 Schools	Year Before Alcohol Service	First Year of Alcohol Service	Difference
Law Enforcement Calls	553	519	-34
Cases	195	114	-81
Arrests	117	79	-38
Charges	155	122	-33

2018 Data provided by TEAM COALITION

Dynamic Landscape of College Athletics



What Keeps You Up at Night?

TAKE AWAYS:

- **ACC Network – Call Comcast**
- **A New Fan Experience at Virginia Tech**
- **Dynamic Landscape of College Athletics**

NCAA Article Links Related to Name, Image, and Likeness Opportunities

<https://www.ncaa.org/questions-and-answers-name-image-and-likeness>

<http://www.ncaa.org/about/resources/media-center/news/board-governors-starts-process-enhance-name-image-and-likeness-opportunities>

Board of Governors starts process to enhance name, image and likeness opportunities

Each NCAA division directed to immediately consider modernization of bylaws and policies

October 29, 2019 1:08pm

In the Association's continuing efforts to support college athletes, the NCAA's top governing board voted unanimously to permit students participating in athletics the opportunity to benefit from the use of their name, image and likeness in a manner consistent with the collegiate model.

The Board of Governors' action directs each of the NCAA's three divisions to immediately consider updates to relevant bylaws and policies for the 21st century, said Michael V. Drake, chair of the board and president of The Ohio State University.

"We must embrace change to provide the best possible experience for college athletes," Drake said. "Additional flexibility in this area can and must continue to support college sports as a part of higher education. This modernization for the future is a natural extension of the numerous steps NCAA members have taken in recent years to improve support for student-athletes, including full cost of attendance and guaranteed scholarships."

Specifically, the board said modernization should occur within the following principles and guidelines:

- Assure student-athletes are treated similarly to non-athlete students unless a compelling reason exists to differentiate.
- Maintain the priorities of education and the collegiate experience to provide opportunities for student-athlete success.
- Ensure rules are transparent, focused and enforceable and facilitate fair and balanced competition.

- Make clear the distinction between collegiate and professional opportunities.
- Make clear that compensation for athletics performance or participation is impermissible.
- Reaffirm that student-athletes are students first and not employees of the university.
- Enhance principles of diversity, inclusion and gender equity.
- Protect the recruiting environment and prohibit inducements to select, remain at, or transfer to a specific institution.

The board's action was based on comprehensive recommendations from the NCAA Board of Governors Federal and State Legislation Working Group, which includes presidents, commissioners, athletics directors, administrators and student-athletes. The group gathered input over the past several months from numerous stakeholders, including current and former student-athletes, coaches, presidents, faculty and commissioners across all three divisions. The board also directed continued and productive engagement with legislators.

The working group will continue to gather feedback through April on how best to respond to the state and federal legislative environment and to refine its recommendations on the principles and regulatory framework. The board asked each division to create any new rules beginning immediately, but no later than January 2021.

“As a national governing body, the NCAA is uniquely positioned to modify its rules to ensure fairness and a level playing field for student-athletes,” NCAA President Mark Emmert said. “The board's action today creates a path to enhance opportunities for student-athletes while ensuring they compete against students and not professionals.”

Media Contact

Stacey
Osburn
NCAA Director of Public and Media Relations

Questions and Answers on Name, Image and Likeness

Updated October 29, 2019

Why didn't the NCAA take immediate action on name, image and likeness rules?

The Board of Governors took a very important step forward at its meeting Oct. 29 by modernizing NCAA policy. It further directed all 1,100 members to create a structure for future name, image and likeness opportunities for student-athletes that is consistent with the college environment in each NCAA division.

Now that the NCAA Board of Governors Federal and State Legislation Working Group has provided its report to the board, what happens next?

Member schools in each division will continue to examine the issue, provide feedback to the working group and prepare for future rules changes. The working group is expected to provide updated recommendations to the Board of Governors in April.

Why was a working group formed to review this issue?

As a voluntary member-led organization with 1,100 schools in three divisions, the NCAA develops rules that create fairness and a level playing field for campuses in all 50 states, plus Canada and Puerto Rico. To represent the diversity of the NCAA membership, the working group comprised presidents, athletics directors, commissioners, faculty and student-athletes from all three divisions.

Why didn't the NCAA address this issue before now?

NCAA members continually strive to improve the student-athlete experience, including paying thorough attention to the changing environment of the student body and within higher education. After improving academic support, providing cost of attendance, guaranteeing scholarships and strengthening health and safety, among many changes,

the NCAA membership determined that exploring this issue was an important step to support student-athletes within the context of higher education. NCAA leadership also determined that the membership must come together to respond to federal and state legislative proposals that would be harmful to a national, uniform college athletics model.

Was the Olympic model considered and, if it was rejected, why?

The working group reviewed extensive feedback and challenges and opportunities related to name, image and likeness benefits. It reviewed the Olympic model, which provides specific opportunities for athletes to secure endorsements and to accept money for athletic performance, in order to pay for training and coaching and to further their athletic careers. Although many Olympians are or were NCAA student-athletes, many other Olympians have chosen to professionalize and to compete as professionals. The recommendation from the working group, and the direction from the Board of Governors, is for NCAA members to consider future name, image and likeness opportunities for student-athletes consistent with the values of college sports within higher education. Elements of the Olympic model that are consistent with the college environment may be incorporated.

Why doesn't the working group report mention specific name, image and likeness elements, such as autographs or jerseys?

More discussion and examination by all three NCAA divisions is needed before deciding on specific approaches to future name, image and likeness opportunities for student-athletes.

The working group says more feedback is needed. Didn't it already collect feedback?

The working group collected extensive input over several months. But with three divisions, 1,100 member campuses and nearly 500,000 student-athletes, the issues are complex and challenging. Continued dialogue is necessary to determine the proper scope and implementation methods to include in additional recommendations.

Are the three NCAA divisions going to develop separate approaches (versus one NCAA approach for all student-athletes)?

There are many examples now where each NCAA division has differences in rules, including areas such as recruiting, financial aid, and playing and practice seasons. As a fundamental framework of the Association, member schools choose the division in which they compete and agree to follow the rules within that division. All three divisions will implement change consistent with the principles within the NCAA constitution and articulated by the Board of Governors. The working group provided overarching principles and framework that define Association-wide policy within this space.

How does the uniqueness of the college sports recruiting environment affect this issue?

Recruiting is one of the key principles that sets apart the college student model of sports from professional sports. Changes to name, image and likeness rules for student-athletes should support the integrity of the recruiting environment and not result in any undue influence on a student's choice of where to attend college.

Why does the NCAA oppose newly enacted California Senate Bill 206 and other potential state or federal legislation on name, image and likeness of college athletes?

It is critical that college sports are regulated at a national level. This ensures the uniformity of rules and a level playing field for student-athletes. The California law and other proposed measures ultimately would lead to pay for play and turn college athletes into employees. This directly contradicts the mission of college sports within higher education — that student-athletes are students first and choose to play a sport they love against other students while earning a degree.

The NCAA said newly enacted California SB 206 may be unconstitutional. Is the NCAA challenging it in court?

The action taken by California likely is unconstitutional, and the actions proposed by other states make clear the harmful impact of disparate sets of state laws. The NCAA is closely monitoring the approaches taken by state governments and the U.S. Congress and is considering all potential next steps.

Questions for 2019 AGB Survey for Virginia Tech

Section 1: Mission and Strategy

The board . . .

- 1.4 Ensures the institution operates under a strategic plan that defines the institution's strengths, challenges, and priorities.
- 1.8 Is actively involved in shaping and supporting institutional strategy and direction.
- 1.2 uses the mission and defined priorities to guide the board's decisions.
- 1.6 Is well informed about the current issues facing higher education and their impact on the institution, e.g., debt, value of college degree, technology.
- 1.7 Seeks out and considers diverse and competing points of view when discussing critical issues.
- 1.9 Uses relevant data to monitor progress on the strategic plan.
- 1.10 Oversees the development and implementation of campus-wide strategies to foster a culture of inclusion.

Section 2: Leadership and Shared Governance

The board . . .

- 2.1 Works with the chief executive and appropriate constituent groups to gain support for institutional goals.
- 2.2 Has policies and practices of shared governance that delineate the responsibilities of the board, chief executive, administration, and faculty.
- 2.3 Is well informed of the viewpoints of faculty and staff (and students, when appropriate) on major institutional issues.
- 2.4 Relies on dashboards, metrics, and other meaningful data to inform decisions.
- 2.11 Approves mutually agreed upon performance goals for the chief executive.
- 2.9 Annually reviews the performance of the chief executive and periodically conducts a comprehensive assessment.
- 2.12 Has a plan or policy that addresses an unanticipated or planned departure or absence of the current chief executive.

Section 3: Institutional Sustainability

The board . . .

- 3.1 Reviews the budget to ensure it reflects the institution's priorities
- 3.3 Evaluates the sustainability of the institution's current financial model
- NEW Holds the administration accountable for safeguarding the university's assets and ensuring that resources are utilized efficiently and effectively.
- 3.9 Holds the administration accountable for enterprise risk management
- 3.10 Ensures the administration involves the board on high-profile issues that present significant risk to the institution.
- NEW Exercises appropriate oversight of the intercollegiate athletics program

Section 4: Quality of Educational Experience

The board . . .

- 4.1 Monitors educational quality, using trend and comparative data for student learning outcomes, retention and graduation rates, and the value of degrees/certificates.
- 4.3 Ensures that the institution maintains high-quality faculty and staff.
- 4.4 Ensures policies and practices are in place to protect academic freedom and institutional autonomy.

- 4.5 Reviews the institution's accreditation reports including responses to identified concerns or deficiencies.
- 4.6 Ensures the institution offers a balanced, high-quality experience to students in both academics and campus life.
- 4.7 Is well informed about signature programs and breadth of offerings.
- 4.8 Monitors non-college-based or co-curricular activities, such as the Corps of Cadets, athletics, residential communities, fraternity and sorority life, etc.
- 4.9 Ensures the institution plays a positive social and economic role in the communities it serves.

Section 5: Board Performance

The board . . .

- 5.5 Effectively participates in coordinating the work of the board and shaping meeting agendas.
- 5.7 Has the right committees and uses them well.
- 5.8 Receives reports from committees that are succinct, frame productive discussion, and facilitate decision-making.
- 5.9 Adheres to a comprehensive Code of Ethics and addresses violations appropriately.
- 5.10 Focuses on board-level work and avoids micro-management of administrative responsibilities.

Section 6: Board Culture

The board . . .

- 6.1 Promotes trust among board members through a culture based on openness and respect.
- 6.2 Incorporates practices that foster inclusion at the board level.
- 6.5 Conducts itself in ways that inspire confidence and trust of its constituents.
- 6.7 Understands and respects who may speak on behalf of the board or the institution.
- 6.8 Speaks with one voice and stands united behind controversial decisions.
- 6.9 Respects confidentiality of board and committee materials and discussions.

Section 7: Satisfaction

How satisfied are you that:

- 7.1 My time, energy, and expertise are put to good use.
- 7.2 The board focuses its time on issues of greatest consequence to the institution.
- 7.3 The board acts in good faith with appropriate diligence, care, and skill (duty of care)
- 7.4 The board retains its independence from external and internal stakeholders and acts in the best interests of the institution (duty of loyalty)
- 7.5 The board takes reasonable care to ensure the institution is legally and ethically compliant with its mission, the law, and all institutional policies (duty of obedience)

Section 8: Setting Priorities

How important do you think it is for the board to?

- 8.1 Focus more of the board's attention on issues of strategic importance to the institution.
- 8.2 Assess whether the information and data the board receives are adequate, timely, comprehensive, and complete (i.e., representative of all perspectives/aspects).
- 8.5 Increase its knowledge of the institution's financial health and sustainability.
- 8.9 Improve its meeting practices
- 8.10 Improve the structure and function of committees
- 8.11 Increase its understanding of board roles and responsibilities and scope of authority.
- 8.13 Contribute financially to the institution.

Section 9: Open-ended Questions

9.2 What is the board's most significant accomplishment over the last two years?

9.1 What change or action would most improve the board's performance?

NEW - What are the three most important challenges facing the institution over the next several years?

1. _____
2. _____
3. _____

Policies and Practices (To be answered by the Board Secretary)

Please respond to the following:

P.1 Did the full board formally approve the institution's strategic plan?

P.4 Did the full board formally approve the institution's annual budget?

P.6 Did the board, or a committee of the board, meet with the auditors (internal and external) without staff present?

P.7 Has there been a comprehensive review of the chief executive's performance within the past five years?

P.8 Did the assessment of the chief executive provide for input from the full board?

P.9 Does the board periodically review executive compensation at comparable institutions?