**AIAA**

**Villanova University Branch:** AIAA members saw much success last year and will continue to compete in national competitions and work on projects that enhance our member’s knowledge of aerospace concepts and, in some cases, provide a hands-on learning experience. Members of a joint university (Villanova, Drexel, Rutgers) team worked on the NASA RASC-AL design competition, making it one of 16 national finalists! [https://www1.villanova.edu/villanova/media/pressreleases/2021/0408.html](https://www1.villanova.edu/villanova/media/pressreleases/2021/0408.html) The team presented to NASA at a virtual forum and finished top 4 in their category. The group, alongside new freshmen talent, is competing again this year with a new mission concept. In addition, branch members worked on building a high-altitude balloon in collaboration with the Cubic Satellite club. The balloon reached an impressive 105,000 ft and took pictures of the Villanova campus and the edge of space. The branch would also like to congratulate the MechE Senior Capstone team, who made it through to the final round of AIAA’s Design, Build, Fly competition. A new team will be competing again this year, and we wish them the best of luck!

Another event that saw success was the AIAA Careers in Space Panel, where aerospace industry alumni from Blue Origin, Lockheed Martin, NASA, Boeing, and other companies spoke about their experiences to a virtual crowd of 120+ attendees. Finally, AIAA members began a rocketry team last year, which launched a level 1 high-powered rocket to an altitude of 2,350ft. They hope to reach new heights this year by competing in the Spaceport America Cup with Rutgers University.
In the last few weeks of September and first few weeks of October, the American Society of Civil Engineers (ASCE) has successfully increased its membership by utilizing the involvement fair and promoting the organization in civil engineering freshman and sophomore classes. ASCE plans to host a variety of events in the next few weeks including a general body meeting for all of its members to attend and become more involved in the club. In addition, ASCE is working with a few companies to host virtual and in-person events that offer both intellectual/industry information as well as networking opportunities for Villanova students to utilize. Some of the companies include but are not limited to, Bohler, Turner Construction, and ARCO Design/Build Industrial. ASCE has been using a weekly email to effectively communicate with its members and convey upcoming events and ways to get involved in the organization. ASCE also distributes memos concerning external scholarship applications and information for its members to utilize including the 2021 WTS Philadelphia Scholarship which was advertised in the weekly email for the past several weeks.

Villanova ASCE Has been thrilled to be back on campus for Fall 2021 and is looking forward to the upcoming events of the semester. For more updates and information: follow ASCE on Instagram @villanovaasce, join our VUGroups page or email us at asce.villanova@gmail.com.
ASME

ASME is excited to announce a big event they will be hosting this semester. The event is a Jack-O-Lantern competition where entries are 3D printed designs by students. Entries are submitted in person on Wednesday October 27th from 5-6 PM on the CEER Patio (or CEER 001 if it is too cold/rainy). While the contestants are scored, there will be free candy and insomnia cookies.

Prizes will be available for the first and second place winners. The first place winner will win air pods, and the second place winner will receive a $25 gift card. The winners will be determined based on how the design looks, the weight to volume ratio (lower ratio is better), and based on the design's ability to hold a two pound weight.
Amateur Radio Club

As everyone gradually settles into the fall semester, the Villanova University Amateur Radio Club (VUARC) continues to provide its members opportunities at using the radios. In fact, for this first week after the fall break, members are able to participate in a radio contesting event directed at contacting schools that host their own amateur radio clubs. While radio garble remains ever the main problem, the club will continue to press on to keep making contacts, and welcome anyone to try out their radios at any time they wish.
CubeSat

CubeSat club is continuing to build a new CubeSatSim. We have soldered three of the main boards, tested the solar panels, and assembled the 3D printed frame. We plan to finish soldering and testing in November. We also analyzed data from last semester's balloon launch to see how we could improve our balloon for this semester. We hope to launch a payload with either a GoPro camera or a pollution sensor.
ESC

ESC is excited to welcome new members this semester. The interviewed candidates have been admitted and general body meetings are scheduled to start again. ESC also has been working to host events with engineering students, faculty, and alumni. ESC looks forward to participating in Fall Fest and other university-wide events too.
IEEE

IEEE is hosting two different workshops over the next three weeks. We will be hosting the Spooktacular pumpkin soldering event on Wednesday, October 27th, from 5 pm to 7 pm, and sign-ups are out now! Check your emails and solder your very own blinking Jack O’Lantern! On Wednesday, November 10th, from 5 pm to 7 pm, IEEE will be hosting a Solidworks workshop to teach students the fundamental tools to sketch and bring parts and mechanical assemblies to life. This workshop will also feature an overview of 3D printing using the printers in the MDL. Come visit the IEEE tent at Tent or Treating on Saturday, October 30th, from 5 pm to 7:30 pm! Looking forward, IEEE will be hosting another soldering workshop where you can solder and keep an oscilloscope. Keep an eye out for social events and some new workshops like PCB design, web-scraping in Python and JavaScript, and much, much more. If you are interested in getting involved, please sign up through VUGroups, follow @villanovaieee on Instagram, and email ieee@villanova.edu with any questions you may have. IEEE wishes you all the best of luck with the rest of the semester!
ITE

ITE is the Institute of Transportation Engineers and is an international association of transportation professionals responsible for meeting mobility and safety needs. The Villanova branch of ITE focuses on speaker events from professionals, transportation-related field trips, and community networking with fellow engineers. ITE plans on planning and hosting more events this semester for engineers passionate about transportation. If you are interested in joining or in having an officer position, please contact: nkwak1@villanova.edu.
NovaCANE

NovaCANE club is working to get in-person trips started by early to mid November. We will be partnering with CCATE and Saint Colman John Neumann School this semester to lead engineering and STEM focused activities for the middle school aged student programs at the two schools. We are also excited to be including a group of female first grade students in our trips to SCJN as part of our goal of expanding the inclusivity of the STEM field and educating the next generations about the power of engineering. We also hope to begin the process of creating our NovaCANE website this month to provide free access to STEM activities and educational materials to middle and elementary schools in the local Philadelphia area.
We have just received the frame for VU13, our new car that will compete this May. We also completed everyone drives day, our annual day where all team members get to drive the car to experience the fruits of their hard work. From that, we selected drivers who showed promising results and will be having them compete against each other this weekend to decide who our drivers for the competition will be.
NSBE

NovaNSBE held a basketball tournament with NABA for Inclusion Week on September 28th. Coupled in with insomnia cookies and good music, the event was a fun time as both of our clubs got to teach about it's missions and show off their basketball skills. On October 2nd, NSBE participated in the annual Villanova Day of Service. We traveled to St. Raymond of Penafort church in Philadelphia where we helped out with some gardening work (see photo)! Special thank you to St. Raymond's for having us. Last Tuesday, October 19th, NSBE started our new “Study Sessions” where all STEM students can come and get help with their homework and meet other STEM students on campus. If you are interested in attending, study sessions will be held every Tuesday from 6-8 pm in Tolentine Hall, Room 305.
The new executive board met up and is now in the process of planning for future events that are coming later in the fall and spring semesters. We plan to have an info table/session to create an email list to keep people up to date with NSPE. If you want to know more information about our events and/or about NSPE, please contact Diego Adames at dadames@villanova.edu.
Omega Chi Epsilon

Omega Chi Epsilon (OXE) is the Chemical Engineering Honors Society, which is a club for all Chemical Engineers with a GPA of 3.5 or higher. The first event for OXE is the induction ceremony for new members of OXE (either sophomores who got a 3.5 freshman year or upperclassmen who increased their GPA). This ceremony just rewards them for their academic success. The main events for OXE are study sessions for each grade for tests and projects in the main Chemical Engineering courses. These study sessions are open to all Chemical Engineers and members of OXE must go to 2 or more of their grade's study sessions to remain in OXE. This society focuses on promoting academic success and helping students do as well as possible in their courses.
Alongside continuing our weekly tutoring sessions, CEER PEERS participated in day of service and hosted our first social event, making smores on south campus, and had great turnout. In the next month, the CEER PEERS will be hosting an ice cream social to provide registration advising, as well as an event to help first years apply for the match program as well as summer internships. We are always happy to see new faces in the CEER PEER lounge (CEER 101) so come by and say hello!
Pi Tau Sigma

Villanova's Pi Tau Sigma is an organization of mechanical engineering upperclassmen that tutor younger mechanical engineering students. We tutor a wide variety of courses ranging from Statics to Dynamics and Heat Transfer. Our members are dedicated to helping fellow mechanical engineers succeed. Within the first half of the fall semester our members have tutored ten students. Help spread the word about our organization! If you're looking for tutoring email us at: VUpitausigma@gmail.com.
SASE

This month we have been busy. First, we welcomed three new Executive Board members, two Freshman Representatives, and an Outreach Chair. Then, we participated in St. Thomas Day of Service where we helped at the SSJ Residence at St. Hugh of Cluny. Also, we just had our second general body meeting where we painted pumpkins and helped underclassmen with class scheduling for next semester. Finally, before the National Conference in November, we are going to host a Professional Resume Review session with a Career Center Representative to get advice on applying for jobs and internships.
The Society of Hispanic Professional Engineers continues to be an advocate for equity and advocacy in the professional world. As a minority organization we have been a bridge for our members to progress in the professional careers, as students and as members of a community. Through our resources such as our advisor Dr. Stephen Jones and our alumni network, we facilitate our members' wants and needs for: resume building, networking, internship and job searching, and additionally a community of like minded peers to grow and be around. SHPE has planned to send six of its members to the National Convention in Orlando Florida in November 2021. This event presents a great opportunity for the participating members to find an internship or job, along with networking with other professionals and companies. There will be a lot to learn and bring back to the rest of the SHPE members who did not attend, as they hope to attend in the future.
Since the last issue, the Society of Women Engineers has hosted our first General Body Meeting with a great turnout and, selected our new Professional Development Committee Chair through an open application process. All three committees have been filled with members meeting regularly to plan events. Coffee chats with upperclassmen are taking place this week, and have received great feedback. Recent grad-alumn from the class of 2020 have reached out hoping to recruit current SWE members to apply for R&D co-op and internship positions at their employer. SWE also participated in the St. Thomas of Villanova Day of Service at the Holy Trinity School, cleaning the play yard, creating new play areas, and refreshing gardens. SWE Members also had the opportunity to participate in Diversity and Inclusion Week by attending the co-hosted event between SASE and SWE. Students could come to enjoy dinner, games, and music as they got to know one another a little better and form friendships. SWE Members also could be found studying hard together in a SWE reserved study room. We look forward to another month full of great events, and we will see you there.
Tau Beta Pi

Tau Beta Pi (TBP) has been gearing up recently to have an exciting and active year ahead. Though the TBP National Convention was postponed this fall, our officers were able to attend virtual Collegiate Interactive Chapter Exchange sessions where they brainstormed campus event ideas with other chapter representatives across the nation to make for an engaging semester. They look forward to implementing many of these ideas & more with the approximately 60 new initiates that will soon be joining the society come November 10th! We wish everyone a Happy Fall Semester & hope to see you at some events soon!