MEWILL ROCKITA

Eagles Around the Globe Aim for Asteroid Belt.

NEW IN ENGINEERING

An out-of-this-world selfie — Students making history

AND IN AERONAUTICS

Switching gears — Student explores new depths



WHO WE ARE

Embry-Riddle Aeronautical University offers the world's premier collection of programs in aviation, aerospace, engineering, business, security and intelligence. Students immerse themselves in real-world research, pushing boundaries and reaching new career frontiers. By the time they graduate, they've interned at top flight companies, probed the farthest reaches of the solar system and helped unravel the deepest mysteries of the human body, all in preparation for future success.

Where will your future take you? Find out at our campuses in Florida, Arizona or online anywhere in the world.



Eagles Around the Globe Aim for Asteroid Belt

Embry-Riddle students from around the globe are collaborating across time zones and technology to orchestrate a human mission to Ceres, a dwarf planet representing the largest object in the main asteroid belt between the orbits of Mars and Jupiter.

Few college students can say they've contributed ideas to a real-world space mission. For those on Team ECHO, the opportunity to apply what they've learned spans far beyond a traditional classroom setting – and the sky.

Twenty-seven students from Embry-Riddle's Daytona Beach, Prescott, Worldwide and Singapore campuses make up ECHO (Exploration for Ceres Habitation Operations), a virtual engineering collaboration focused on space exploration. One of the few projects to involve all campuses, it gives students the chance to apply their knowledge and skills to NASA-sponsored missions through the Revolutionary Aerospace Systems Concepts – Academic Linkage (RASC-AL) competition.

"The most exciting part of working on this year's RASC-AL competition team has been the opportunity to work with students from different campuses on a real-world design problem," said Katherine O'Hara ('17, '21), Engineering major and sub-team leader from the Worldwide Campus.

With much of today's engineering being done remotely, this project provides students with an opportunity to collaborate with peers outside of their departments, colleges and geographic areas – skills that will benefit them as they prepare for their future careers.

Last year's students – Team MEAGLE (Martian Environmental and Geological Life Examination) – completed a campaign focused on an Earth-to-Mars launch and exploration under the direction of faculty leads Dr. Davide Conte, Claudia Ehringer Lucas and Dr. Ryan Kobrick.

This year, the new team has been tasked with creating another original engineering solution – a mission to Ceres. The nine-month project allows students to gain a real-world perspective of systems engineering, trajectory design and optimization, space systems and scientific instrumentation. NASA is highly interested in concepts to visit other planets in the solar system, and the team chose this mission because it proved the most challenging, says Software Engineering major and Prescott student team leader Amber Scarbrough ('21).

Scarbrough also said the project has already led to job interviews with industry giants like Honeywell Aerospace, Collins Aerospace, Raytheon Technologies and Lockheed Martin.

"As Eagles, we would not be attending Embry-Riddle if we weren't dedicated to being the best we can be," she said. "The school has a respectable reputation for producing some of the best engineers, pilots and science professionals."

What's next for these students? The team submitted its video and technical proposal in March and, if they advance to the finals, will be evaluated by a panel of NASA and other industry judges in June. With a previous Embry-Riddle team reaching the RASC-AL finals in 2017, Team ECHO hopes to do the same.

"For as long as I can remember, my dream has been to work for NASA," said Payce Hooker ('22), Engineering Physics major and student team leader at the Daytona Beach Campus. He's confident that participating in the NASA competition will help him stand out when applying.

BACHELOR'S PROGRAMS	11		
Aeronautical Science — Fixed Wing	FL A	AZ	W
Aeronautical Science — Rotary		<u> </u>	
Aeronautics	•	<u> </u>	7
Aerospace Engineering	A	<u> </u>	
Aerospace Physiology	A		
Aerospace and Occupational Safety	<u> </u>		
Air Traffic Management	A	<u> </u>	
Applied Biology		<u> </u>	
Astronomy and Astrophysics	<u> </u>	<u> </u>	
Aviation Business Administration	A	<u> </u>	4
Aviation Maintenance			4
Aviation Maintenance Science	A		
Business Administration	<u> </u>	<u> </u>	
Business Analytics			4
Civil Engineering	A		
Communication	A		4
Computational Mathematics	<u> </u>		
Computer Engineering	A	^	
Computer Science	<u> </u>		
Cyber Intelligence and Security		^	
Data Science		<u> </u>	
Electrical Engineering	A	^	
Emergency Services			4
Engineering			4
Engineering Physics	A		
Engineering Technology			4
Forensic Accounting and Fraud Examination		<u> </u>	
Forensic Biology		^	
Forensic Psychology		<u> </u>	
Global Business and Supply Chain Management		^	
Global Conflict Studies	A		
Global Security and Intelligence Studies		^	
Homeland Security	A		4
Human Factors Psychology	A	^	
Industrial / Organizational Psychology		A	
Interdisciplinary Studies	A		4
Leadership			4
Logistics and Supply Chain Management			4
Mechanical Engineering	A	A	
Meteorology	A	A	
Project Management			4
Safety Management			4
Simulation Science, Games and Animation		A	
Software Engineering	A	^	
Space Physics	A	A	
Spaceflight Operations	A		
Technical Management			1

Unmanned Aircraft Systems

▲ Florida Camous ▲ Arizona Camous ▲ Worldwide/Online



FORENSIC BIOLOGY

Finding a Future in Forensics

Valuable internship experience and a hands-on curriculum helped this recent graduate secure a full-time job offer before graduation.

Forensic Biology major Veronica Rodriguez ('20) interned at the Yavapai County Medical Examiner's Office last summer. From performing autopsies to collecting fingerprints and toxicology reports, she gained practical experience that would later land her a career.

Rodriguez credits her success with Embry-Riddle's "amazing reputation" and supportive Biology and Chemistry Department. The opportunity to apply the knowledge from her courses during her internship reinforced what she's learned, she said.

In January, Rodriguez started as a Forensic Investigator at the District 7 Medical Examiner's Office in Daytona Beach, Florida.

"If it weren't for Embry-Riddle, I wouldn't have been able to obtain an internship that later landed me a job," she said. "I'm proud to call myself an Eagle." **UNMANNED SYSTEMS**

Leading the Way Forward

Unmanned Systems graduate Jamarius Reid ('21) has always wanted to lead and contribute in any way possible. So, when presented with the opportunity to become the first Worldwide SGA President, Reid took the chance and was elected by students around the world.

As a part of the first Worldwide SGA leadership team, he shared that this is a unique opportunity to establish a culture and the standard for future members

During his time as president, he aims to build the legislation necessary to empower Worldwide students. His goal is to facilitate inclusion within the entire worldwide community, including countries outside of the U.S.

"We are all put here to work together, thus we are all different but the same. It is our differences that make us unique and it's our uniqueness that draws us together. Together we can create anything we put our mind and effort towards."

AERONAUTICAL SCIENCE

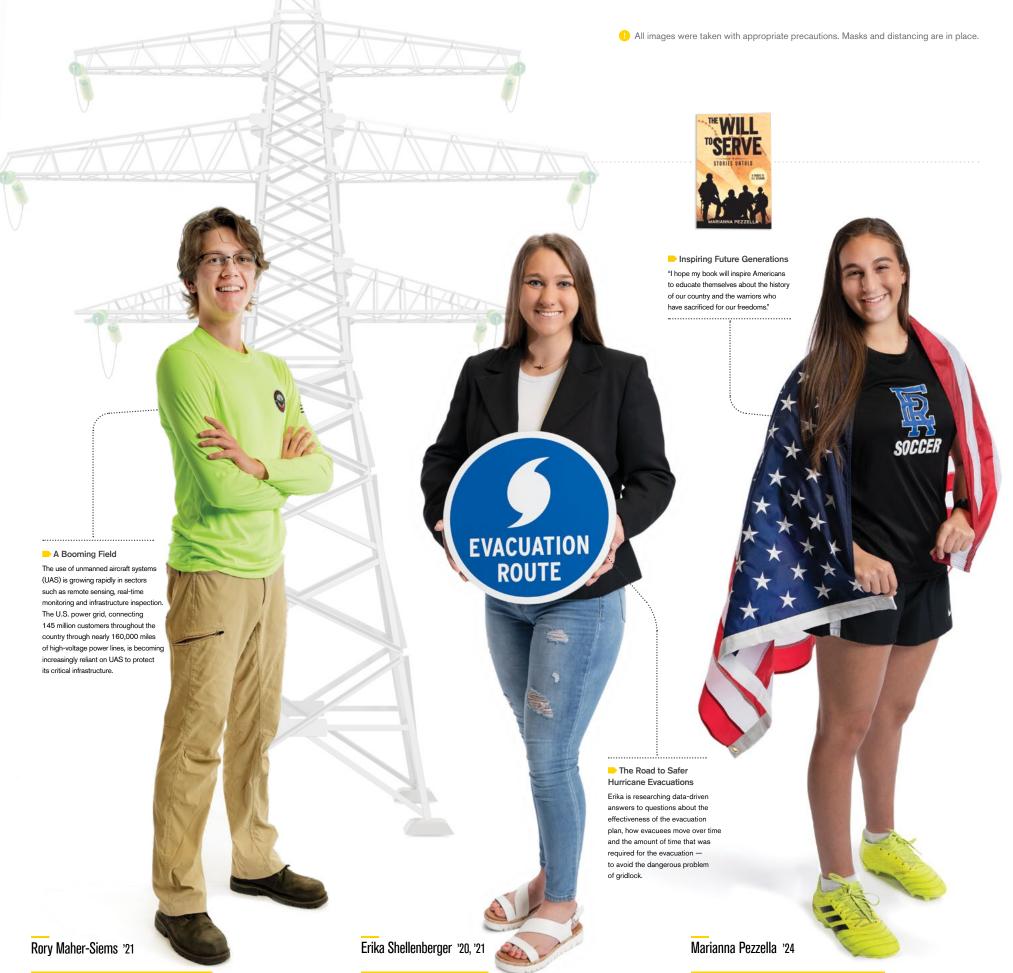
Golden Eagles Soaring High

Senior Aeronautical Science Fixed Wing student Richard Santi ('21) discovered Embry-Riddle as the perfect path to his career as a professional pilot in 2017.

"One of the coolest opportunities I have had at Embry-Riddle is to be a part of our national championship-winning Golden Eagles Flight Team," said Santi. "I joined the team my freshman year because I knew the team got a lot of great opportunities to fly outside of scheduled academic flight training, and I really wanted to challenge myself as a pilot."

Santi is currently working as a campus ambassador at the Admissions Office where he enjoys interacting with prospective students and families and talking about the exciting experiences ahead of them.

Santi says, "It has all been a blast and I have totally gotten to immerse myself in flying much more than I had thought I would be able to prior to coming to Embry-Riddle."



INTERDISCIPLINARY STUDIES

On the Open Road

Interdisciplinary Studies student Rory Maher-Siems ('21) wasn't the type of kid who grew up knowing exactly what career he wanted — but he knew it had to involve flight.

Maher-Siems personalized his major to explore various sides of the aviation industry, with a triple minor in Computer Science, Unmanned Aircraft Systems (UAS) and Geographic Information Systems.

He credits an internship at Phoenix Air Unmanned (PAU), an unmanned aircraft services company, with helping him become more certain of his industry choice.

The internship sent him across the United States, working with drones to inspect power lines in remote areas. When he wasn't on the road, he learned how to create and upload missions into aircraft, design mission planning and notify nearby airports of his team's activity.

"The most fun part was learning how my knowledge from my extracurricular clubs at Embry-Riddle have helped me. One of the aircraft that PAU flies, for example, has the same flight computer as the aircraft I fly in the UAS Technology club."

Hole-in-one Fellowship

CIVIL ENGINEERING

Erika Shellenberger ('20, '21), a graduate student on the Women's Golf team, is a recent recipient of the Dwight David Eisenhower Transportation Fellowship. This fellowship is awarded annually by the U.S. Department of Transportation's Federal Highway Administration to students pursuing degrees in transportation-related disciplines.

Shellenberger earned her B.S. in Civil Engineering in 2020 and is currently pursuing her master's degree through the accelerated program in Civil Engineering.

Shellenberger's thesis is the "Assessment of Evacuation Network Performance under Different Evacuation Scenarios" and will focus on disaster response and transportation planning for coastal and river valley communities.

"I am building a model of the Florida Keys in a transportation modeling software, VISSIM, and will run simulations of the residents evacuating when a hurricane is coming towards their community," Shellenberger explained. "Using this model, I will then test various evacuation techniques to provide recommendations on how to create a safer, quicker and more efficient evacuation for these people."

ASTRONOMY & ASTROPHYSICS

Storytelling that Serves

When she's not on the soccer field or in the lab, this student-athlete has a passion for helping our nation's heroes.

Combining her passions for writing and patriotism, Astronomy and Astrophysics student Marianna Pezzella ('24) published her first book, "The Will to Serve: Stories Untold."

Spending much of her childhood surrounded by military personnel, Pezzella found herself inspired by their stories and experiences. She composed a book of short stories and poems from personal interviews with veterans, proceeds of which will support heroes and their families.

Pezzella has continued writing and has a fictional novel in the works. Having always been intrigued by outer space, she hopes to start her career in research for NASA or SpaceX.

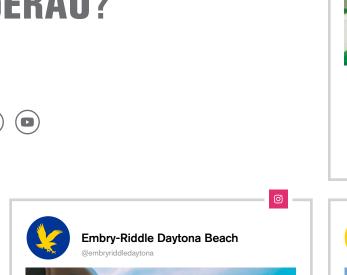
"Embry-Riddle has already helped me strive for my goals in so many ways – from exploring careers and creating resumes to connecting with guest speakers and more," she said.

NOW TRENDING ///

What's life like when you join the Embry-Riddle family? It's rewarding, challenging — and fun. Have a look for yourself.

Are you ready to #GoERAU?

Let's get social! | (f) (y) (⊚) (●)





Hanging out at the Union Today? Stop by and say

hello to the @eaglesflightteam! #EmbryRiddle

#ERAU #GoERAU

Student Engagement & Student Union









"I love all of the outdoor activities and the beautiful scenery here in the Prescott area." — Michela, #StudentVeteran and #AviationBusinessAdministration major * #GOERAU



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Switching **Gears**

Having worked in the aviation industry since she was 17, Worldwide student Kelcey Kocer ('18, '21) is charting a new path. She began her career as an engine mechanic in the U.S. Navy, and has since gained experience as a technician and inspector on several types of aircraft.

After completing her A.S. in Aeronautics, Kocer decided to change route and pursue her B.S. in Unmanned Systems Applications (BSUSA). Because her father works with unmanned systems, the BSUSA degree had always been in the back of her mind.

The growing potential of the industry was also a key factor in her decision. "Drones are pretty much the future," she commented

Since the BSUSA degree is relatively new, she finds there are many learning curves that keep the courses relevant. While unmanned systems is a young and evolving field, she said the program learns how to adapt to technology advances and changes in the industry. "This really gives you the foundation you need in order to decide which unmanned systems domain you want to pursue," she explained. "It is a very well-rounded degree program."

When it comes to taking online classes, Kocer enjoys the freedom and flexibility the virtual format provides. By choosing her own pace with the courses, she is able to balance the other parts of her life with being a student.

After graduating, she is interested in entering the unmanned maritime systems field. While other industries are trying to leave the planet, she says, "We don't even know what's in the majority of the ocean."

17,000⁺

NO.1 ONLINE BACHELOR'S ///



TERMS /// START TERMS PER YEAR FOR **ONLINE PROGRAMS**

ONLINE CLASSES ///

- Students complete assignments, join discussions, study and ask questions on their own schedule.
- Courses are divided into nine week-long modules.
- Classwork takes eight to 12 hours per week.
- Students manage their time and resources while earning their degree.
- Faculty members use technology and gamification to enhance your learning experience.
- Completing your degree online can save you money on tuition, fees, transportation and housing costs.

Connecting in a **Digital World**

For Zachary Fish ('21), the decision to become chair of the American Institute of Aeronautics and Astronautics (AIAA) student branch was an easy one.

"After learning about some of the activities that typical, in-person groups do as an AIAA student branch, I was motivated to make sure that our virtual campus could benefit from such a group," he said.

In-person AIAA activities include projects such as the Design/Build/Fly competition, where students can create their own aircraft.

Fortunately, AIAA has plenty of resources that extend beyond in-person activities, such as virtual conferences and lectures, a virtual aerospace career center and free membership to industry magazines.

Hitting the Ground Running



In November, Eagles from around the globe elected the first three leaders of the inaugural Worldwide **Campus Student Government** Association (SGA).

The students chose Jamarius Reid as President, Laura Molano as Vice President and Michael Lopez as Treasurer. These new leaders are already getting to work to

ensure that Worldwide students have the same strong voice as those at the residential campuses.

The trio is also planning to collaborate with SGA officers from the Daytona Beach, Prescott and Singapore campuses.

"We are looking forward to creating an environment for Worldwide students that encourages inclusivity, culture and unity," Vice President Molano said.

FLORIDA CAMPUS /// Our East Coast campus is only minutes from the beach and adjacent to an international airport and speedway.

and adjacent to an international airport and speedway.



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STUDENT FACTS ///

6,400

- ▶ 50 states / 107 countries represented
- ► 16% International students

ATHLETIC TEAMS ///

WOMEN'S

MEN'S

► Golf

▶ Lacrosse

► Rowing

► Soccer

► Tennis

► Track & Field

▶ Basketball

Cross Country

- Basketball
 - ► Baseball
- ► Cross Country
- ► Golf
- Lacrosse
- ► Rowing
- Soccer
- Softball
- ► Tennis
- Track & Field
- Volleyball
- COED

Cheerleading

CLUBS & ORGS ///

200+ student clubs ranging from Mars Society to Musicians Club; and from Eagles FM-WIKD 102.5 to Microgravity Club; as well as Club, Intramural & Recreational Sports.

HIGHLIGHT III SURF CLUB

Beach Break

Even with unpredictable moments, there is never a bad time to catch a wave with Embry-Riddle's Surf Club at the Daytona Beach Campus. "We have tried to make the club fun for both people who can shred and beginners," President and Aerospace & Occupational Safety major Tim Offerdahl ('21) said.

Social Media Coordinator Christen Bailey ('20) explains that throughout 2020, team members still shared their personal surf videos, tips and experiences virtually.

Embry-Riddle's surf club has been traced all the way back to the 1980s and continuously grows each year.

My favorite memory from the surf club is when we were able to rent out and surf the Typhoon Lagoon wave pool in Disney World in the spring of 2019.

CHRISTEN BAILEY '20 **Aviation Business Administration**

Astronomical Selfie

Embry-Riddle's "EagleCam" team — a group of engineering students and professors — is designing a CubeSat, a camera that will capture the first-ever selfie of the Nova-C Lunar Lander touching down on the

Just before the spacecraft reaches the surface, the CubeSat will deploy and freefall to the moon to take images of the extraterrestrial landing.

Every student involved in the project will get to connect with industry veterans and gain life-changing work experience.

"Students are at the center of this historic mission," said Jana Alaslani ('22), an Aerospace **Engineering student. "We're getting** invaluable hands-on experience and taking on lead roles in a ground-breaking project."



Surf's Up!

The subsonic wind tunnel on Embry-Riddle's Daytona Beach Campus was recently made available to undergraduate researchers.

Aerospace Engineering students Noah Ingwersen ('19), Patricio Garzon ('20), Andrew Ankeny ('21) and David Paolicelli ('22) took full advantage of this opportunity and created the mission to design and test the perfect surfboard fin.

"Working on surfboard fin design has given us the chance to gain more wind tunnel testing exposure than most," Garzon stated.

It is that sort of hands-on experience, they say, that will help kick-start their careers after graduation.

Driving Drone Research

From delivering packages to aerial taxi services, opportunities to incorporate unmanned aircraft systems (UAS), or drones, are almost limitless. Thanks to Federal Aviation Administration (FAA) funding, students at the Daytona Beach Campus will get one-of-a-kind research experience in further studying this emerging technology.

Two undergraduate students will join five graduate students in facilitating the safe integration of drones in the national airspace - research made possible by about \$515,000 in FAA grants received by the university. The work will involve researchers in multiple colleges across the university.

The grants will be directed toward the integration of drones in a wide range of uses within urban areas. This funding will help Embry-Riddle researchers identify and track UAS standards development across both domestic and international organizations and map those developments onto the FAA's UAS Integration Research Plan. Selected students will play an integral role in planning research, designing experiments and analyzing and reporting results.

Involved in FAA-sponsored drone research for more than 15 years, Embry-Riddle recently co-founded the agency's Alliance for System Safety of UAS through Research Excellence (ASSURE). The university has conducted extensive additional research on human injury from a small UAS strike, safety risk assessment, data collection and aviation data analytics, said Richard Stansbury, associate professor of Computer Engineering and Computer Science and program coordinator for the M.S. in Unmanned and Autonomous Systems Engineering degree.





ARIZONA CAMPUS Located in the mountains, between Phoenix and the Grand Canyon, our western campus offers natural beauty and outdoor adventures.

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prescott.erau.edu



Worth Investigating

This project aims to use cutting-edge 3D scanning and

fly-through, allowing future students to view and possibly

drone-acquired photogrammetry to produce images that can be combined into a 3D computer model and

interact with a digital duplication of the crash.

For Forensic Accounting and Fraud Examination (FAFE) major Julia Boardman ('22), one of the biggest factors in choosing a school was the ability to take courses that related directly to her field.

Since Embry-Riddle is one of few schools in the U.S. to offer an undergraduate FAFE program on campus, the decision to become an Eagle was easy.

"I am very much looking forward to taking classes involving forensic accounting, crime and investigative tactics," Boardman said. "I have known since I was a little kid that I wanted to be some sort of criminal investigator, and this program seems very interesting and exciting."

For These Students it is Rocket Science

Aerospace and Mechanical Engineering students Anthony Bernard ('21), Ben Black ('23), Mac Boyle ('23), Zoe Brand ('23) and Charles Flaherty ('23) are working to build, test and launch Altair, a flight vehicle powered by kerosene and liquid oxygen - real rocket fuel that has been used in lunar missions.

The group follows in the footsteps of Tiber Designs, a team of seniors that successfully fired the campus' first liquid rocket engine Janus inside Testcell 3, a brand new test facility, as part of their capstone project in 2019.

"This project has shown me that what I learn in the classroom can be taken and applied directly to a complex engineering problem, like running a rocket engine," Flaherty said. "Seeing every part come together like a massive Lego kit was exciting."

STUDENT FACTS ///

3,000

- 50 states / 43 countries represented
- 7% International students

ATHLETIC TEAMS ///

WOMEN'S

MEN'S

- Basketball
- Baseball
- Cross Country ► Golf
- Basketball Cross Country
- Outdoor Track
- ► Golf
- Soccer
- Outdoor Track
- Softball Volleyball
- ► Soccer Wrestling

CLUBS & ORGS ///

190+ student clubs ranging from the Mountain Biking Club to Society of Women Engineers; and from the Blue Eagles Skydiving Team to the Brotherhood of Steel; as well as a variety of Intramural and Recreational sports.

HIGHLIGHT /// SGA

Leading with Compassion

The Compassion Initiative, a new project introduced by the Student Government Association (SGA) at the Prescott Campus, finished its first active semester last fall.

SGA Vice President Timothy Casnellie ('21) leads the new initiative, which aims to encourage diversity and inclusivity by bringing students together with compassion to share their unique perspectives and experiences.

Ideas already voiced at open meetings include a diversity fund for campus groups, guest speakers, focus groups and awareness months based around cultural topics.

It's the optimal goal that people can look at each other with different viewpoints and different perspectives and have compassion for one another.

TIMOTHY CASNELLIE '21 **Global Security & Intelligence Studies**



Florida Campus Worldwide / Online Campus 1 Aerospace Boulevard | Daytona Beach, FL 32114

Arizona Campus 3700 Willow Creek Road | Prescott, AZ 86301

NEXT STEPS III

HOW TO APPLY

Submit the following:

- Application: erau.edu/apply
- Official high school and/or college transcript or GED scores.
- ACT and/or SAT scores (recommended).
- \$50 nonrefundable application fee.

Please note: Additional documents may be required of specific audiences.

 We evaluate applications on a continuous basis. Once all documents have been received, we will notify you of your admission status.

Based on the quality of our programs and the exciting and growing industries we serve, Embry-Riddle degrees are in high demand. Some of our programs may have limited capacity and we encourage you to check the website or contact one of our admissions counselors for updates.

SCHOLARSHIPS

Every student applying for admission is automatically considered for scholarships.

- Are based off of student's grade point average and test scores, if submitted.
- Do not have to be repaid.
- Are sometimes need-based and require a FAFSA be submitted.

FINANCIAL AID

96% of Embry-Riddle freshmen receive some form of financial aid through scholarships, grants and loans.

To apply for need-based financial aid:

- Fill out the Free Application for Federal Student Aid (FAFSA) at fafsa.ed.gov. It is available October 1 of the year before you intend to start college.
- Include Embry-Riddle's federal school code on the FAFSA: 001479.

The FAFSA is the first step in receiving additional aid. Notification of your complete financial aid package will arrive after you submit your FAFSA form. Federal and state financial aid programs are available to U.S. citizens or permanent residents who qualify.

COME VISIT

A visit to our residential campuses in Daytona Beach, Fla. and Prescott, Ariz. lasts about three hours and includes:

- Walking tour of campus.
- Meet with admissions staff and get answers to your admissions questions.

Register online where you can customize your visit experience and view schedule of available tour times. You may also request to sit in on a class or to meet with a professor, a financial aid advisor or an ROTC representative.

CONTACT US

Schedule your visit and learn more about Embry-Riddle.

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