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30Apr22

Drone, Flying Taxi Grant Programs Advance in House Panel April 28, 2022 Lillianna Byington

A House committee advanced a pair of bipartisan bills that aim to better prepare the U.S. for more drones and futuristic aviation like flying taxis. The House Transportation and Infrastructure Committee approved legislation (<u>H.R. 5315</u>) by 54-4 on Thursday that would create an infrastructure inspection grant program to fund drones that could help find cracks in bridges. Lawmakers also backed a bill (<u>H.R. 6270</u>) in a 55-2 vote that would provide grants to develop advanced air mobility infrastructure—where flying taxis would be able to land, for example. NASA <u>said this week</u> that it was working on solutions to the question of where air taxi vehicles will take off and land.



A cargo drone takes off during a demonstration at the Air-One vertiport, developed by Urban-Air Port, for the vertical take-off and landing of flying taxis and autonomous delivery drones, in Coventry, U.K., on April 25, 2022.

While dozens of fledgling aerospace enterprises are racing to bring flying taxis to market, attracting billions

in investment, spending on so-called vertiports has lagged.

The committee-approved a <u>drone bill</u> that would provide \$100 million for a grant program to grow the use of small drones for infrastructure projects and \$100 million for training to use the technology. It has been touted by groups including the U.S. Chamber of Commerce, which sent <u>a letter</u> supporting the bill to lawmakers last month, and the National Association of State Aviation Officials. https://about.bgov.com/news/drone-flying-taxi-grant-programs-set-for-house-committee-vote/

Police in North Texas Use Drones to Save Lives: Deploying Drone Clear Miriam McNabb April 28, 2022 By Jim Magill



The <u>Dallas Police Department</u> Unmanned Aircraft Systems unit was the first to deploy the Drone Clear program, which utilizes technology developed by video and audio software developer <u>Cytta Corp</u>. Under the program, a single UAS or multiple drones can be flown into a



building in which there is a perceived threat, such as an armed suspect.

The drones act as sentries, sending video data to multiple actors, including remotely located incident commanders as well as officers on the scene. The data helps responders map out the structure, identifying potential threats before the decision is made to send officers into the building.

The Drone Clear protocol was developed using Cytta's propriety Incident Global Area Network (IGAN) technology, which allows real-time video streaming to be shared by multiple parties, who can also use the platform to communicate with one another.

The Dallas P.D. developed the Drone Clear protocol in partnership with the Special Response Team of the Homeland Security Investigations, the SWAT unit of the federal Department of Homeland Security. Last month Dallas police used the protocol to help capture a murder suspect who had hidden inside a house. https://dronelife.com/2022/04/28/police-in-north-texas-us-drones-to-save-lives-deploying-drone-clear/

AdvisorShares Launches Drone Technology ETF April 29, 2022 News



AdvisorShares, a leading sponsor of actively managed ETFs, announced that the <u>AdvisorShares Drone Technology ETF</u> (Ticker: UAV) begins trading today. UAV provides dedicated investment exposure to the emerging commercial drone economy and its transformative technology, which includes unmanned aerial

vehicles and autonomous vehicles (AVs).

UAV seeks long-term capital appreciation by investing in the U.S.-listed equities of domestic and global companies believed to have dominant market positions with unique opportunities for growth and expansion in the drone and AV ecosystems. This includes companies of any market cap across a variety of industries that are, directly or indirectly, developing, researching, using, or providing support services or supplies related to drones or AVs. Some areas of drone usage and AV development include goods delivery, emergency services, self-driving vehicles, electric vertical takeoff, and landing (eVTOL) aircraft, as well as military, agriculture, construction, energy, mining, and real estate applications. For more information on UAV, visit: advisorshares.com/etfs/uav <a href="https://uasweekly.com/2022/04/29/advisorshares-launches-drone-technology-etf/?utm_source=rss&utm_medium=rss&utm_campaign=advisorshares-launches-drone-technology-etf&utm_term=2022-04-29



Kea Aerospace Selects SKYTRAC BVLOS Command and Control High-Altitude UAV Platform April 29, 2022 News



SKYTRAC Systems Ltd. (SKYTRAC), a global leader in aerospace intelligent connectivity and satellite communications today announced that Kea Aerospace, a New Zealand based developer of solar-powered High Altitude and Long Endurance unmanned aerial vehicles, has selected SKYTRAC's Iridium Certus Satcom terminal to be installed onboard their UAV platform, Kea Atmos.

Kea Atmos is a solar-powered, remotely piloted fixed-wing aircraft designed and capable of continuous flight in the stratosphere to collect frequent high-resolution aerial images. After takeoff, Kea Atmos ascends to an altitude of 65,000 ft where it will operate for several months at a time.

To remotely pilot their aircraft in the stratosphere, Kea Aerospace has selected SKYTRAC's UAV Data Link System (DLS-100) to enable BVLOS Command and Control capability. By utilizing the Iridium satellite network, the DLS-100 will provide Kea Atmos global Satcom connectivity with 99.9% uptime reliability regardless of weather conditions or the aircraft's distance from the Ground Control Station. <a href="https://uasweekly.com/2022/04/29/kea-aerospace-selects-skytrac-bvlos-command-and-control-capability-onboard-high-altitude-uav-platform-through-iridium-certus/?utm_source=rss&utm_medium=rss&utm_campaign=kea-aerospace-selects-skytrac-bvlos-command-and-control-capability-onboard-high-altitude-uav-platform-through-iridium-certus&utm_term=2022-04-29

Virginia Natural Gas incorporates aerial drones to inspect natural gas infrastructure April 29, 2022 News



Unmanned Aerial Vehicles (UAVs) will begin flights across Hampton Roads, as well as northern James and New Kent Counties for various operations such as inspections of critical infrastructure, right-of-way assessments, and the inspection of more than 5,500 miles of gas

pipeline. Virginia Natural Gas will be one of the first natural gas utilities in the state to use UAVs while simultaneously conducting a pilot program for its sister companies in Illinois, Georgia, and Tennessee that all fall under VNG's parent company, Southern Company Gas.



Virginia Natural Gas will employ self-dispatched Mavic 2 Pro drones that allows engineers, and asset protection and construction managers to have the opportunity to use UAVs as part of their daily work.

In the past, traditional methods for pipeline inspection have been slower, manually intensive, expensive, and sometimes cause safety concerns due to the surrounding natural environment. Drones equipped with a visual or infrared camera can now be used for navigating and patrolling a segment of pipeline, identifying, and capturing images or videos of areas of interest at predefined timings and returns. A team of three trained "pilots" will fly the drones for VNG. <a href="https://uasweekly.com/2022/04/29/virginia-natural-gas-incorporates-aerial-drones-to-inspect-natural-gas-infrastructure/?utm_source=rss&utm_medium=rss&utm_campaign=virginia-natural-gas-incorporates-aerial-drones-to-inspect-natural-gas-infrastructure&utm_term=2022-04-29

NIST Launches Prize Challenge to Improve Unmanned Aircraft in Indoor Search and Rescue April 27, 2022



BOULDER, Colo. — The U.S. Department of Commerce's National Institute of Standards and Technology (NIST) is launching a new prize competition series to advance the use of unmanned aircraft systems (UAS) by first responders for indoor search and rescue operations.

In the First Responder UAS Indoor Challenge, competitors will design, build, and fly a cost-effective, easily flyable drone to help search and rescue teams gain better situational awareness prior to entering a building. Competitors will tackle difficulties in operating UAS indoors where GPS is unavailable, lighting is limited, or structural integrity is compromised. The competition will be accepting entries beginning April 27, 2022, with multiple stages running through June 2023.

Up to \$685,000 will be awarded in prizes throughout three stages of the challenge. Prize recipients will be determined by a panel of judges, assisted by a team of subject matter experts through each stage of the competition.

The First Responder UAS Indoor Challenge is hosted by NIST and managed by Capital Consulting Corporation, in partnership with Kansas State University. https://www.nist.gov/news-events/news/2022/04/nist-launches-prize-challenge-improve-unmanned-aircraft-indoor-search-and



1May22

Drones Have Come of Age in Russia-Ukraine War Jack Detsch, *Foreign Policy's* Pentagon and national security reporter. APRIL 27, 2022



A Turkish-made Bayraktar TB-2 drone

Ukraine's eastern Donbas region is flat, open, and streaked with cloudy skies, terrain that Western officials believe has already limited Russia from carrying out the withering air and missile strikes that characterized the first two months of the war in Ukraine. And as the battlefield shifts east,

drones are becoming a dominant—if not *the* dominant—feature of the conflict, former U.S. officials and experts told *Foreign Policy*.

With persistent clouds likely to make flying Russian and Ukrainian fighter jets out of missile range more difficult, both sides are turning to a two-pronged drone strategy: using cheap, off-the-shelf drones to keep a watchful eye in the sky and to flag targets for artillery to take out tanks. Experts believe the U.S. provision of hundreds of kamikaze-like loitering drones that can hunt targets for hours before dropping down to detonate a deadly munition, complemented by a fleet of drones that can be bought off the internet as low-cost eyes in the sky, could give the Ukrainians a one-two punch from above.

The provision of new drones could provide a respite for the Ukrainians. The United States is providing Switchblade drones and a close cousin, the Phoenix Ghost, which function as one-shot drones, hovering over the battlefield for hours before diving down to hit their targets. The Biden administration first provided the Phoenix Ghost as part of an \$800 million military aid package to Ukraine announced last week. https://foreignpolicy.com/2022/04/27/drones-russia-ukraine-war-donbas/

Burgum praising "innovative" use of drones in emergency storm response April 29, 2022 Ty Schonert



(North Dakota) -- North Dakota Governor Doug Burgum says Unmanned Aircraft systems (UAS) have played a critical role in locating downed power poles, assessing damage done to utility infrastructure, and helping crews prioritize efforts for recovery and repairs.



Burgum said, "We're leveraging the investment the state has made in UAS infrastructure to help workers identify damage and repair ground-based infrastructure. Utilizing our strength in aviation will help citizens and communities on the ground."

The drones are working with the North Dakota Association of Rural Electric Cooperatives and are supporting manned aircraft run by Montana-Dakota Utilities. Crews say the damage could take days or possibly weeks to fully restore, even with work being done around the clock. UAS providers say drones play a pivotal role in events like these in the state's recovery plans. https://www.am1100theflag.com/news/regional-news/47203-burgum-praising-innovative-use-of-drones-in-emergency-storm-response

2May22

DRONES AS WINDOW WASHERS? T-MOBILE IS BETTING ON IT April 27, 2022 Sally French



The use cases for drones seems to grow longer every day. There are delivery drones, inspection drones, search and rescue drones, elephant-herding drones and more. But telecommunications giant T-Mobile is betting that drones could do some dirty work — and dangerous work. T-Mobile announced last week that it was working with

Lucid Drone Technologies, which builds drones for commercial cleaning services — particularly window washing.

In the deal, T-Mobile for Business will serve as the company's exclusive fleet management provider for the company's growing number of industrial spraying drones. That means T-Mobile's network will power capabilities for real-time sharing of flight data, battery utilization information, hardware diagnostics, and delivery of firmware and software updates. Additionally, T-Mobile will give Lucid Drone Technologies the ability to view and manage the connectivity of their industrial spraying drones, providing operators with near real-time visibility via the T-Mobile Control Center.

And assuming that BVLOS drone rules continue to evolve, Lucid Drone Technologies has plans to use T-Mobile's 5G network to fly its own drones beyond line-of-sight. https://www.thedronegirl.com/2022/05/02/drones-window-washer-t-mobile-lucid/



Pentagon sends the first batch of highly-secret Phoenix Ghost drones to

Ukraine ROB CRILLY, SENIOR U.S. POLITICAL REPORTER FOR DAILYMAIL.COM 29 April 2022

More than a dozen flights will leave the continental U.S. in the next 24 hours carrying weapons destined for Ukrainian armed forces, including more howitzers and the first of the new Phoenix Ghost drones. A senior defense official told reporters that the new, secret drones will join 100 Switchblades - kamikaze drones that carry a warhead - that have already been delivered.



Very little is known about the new Phoenix Ghost drones other than that they operate in similar style to Switchblade killer drones, seen here, which crash into their targets

It comes as Russia on Thursday pounded targets across Ukraine, hitting high-rise apartments in **Kyiv**, just when the capital was beginning a return to normal.

Last week, President Joe Biden announced he was giving them a new weapon - previously classified Phoenix Ghost drones specially tailored for the conflict. Very little is known about the new Phoenix Ghost drones other than that they operate in similar style to Switchblade killer drones, seen here. https://www.dailymail.co.uk/news/article-10768231/Pentagon-sends-batch-highly-secret-Phoenix-Ghost-drones-Ukraine.html

United Airlines and Archer Create eVTOL Advisory Committee Jessica Reed | April 29, 2022



A joint advisory committee for electric vertical take-off and landing (eVTOL) aircraft was just formed between Archer Aviation and United Airlines. The committee will support Archer's eVTOL development process with recommendations related to maintenance and operational concepts. Both companies intend to facilitate large-scale adoption of aircraft for the future advanced

air mobility market by researching systems and features that can improve eVTOL operations. In the long-term, the focus for Archer in this collaboration is creating operational efficiencies with UAM fleet support that incorporates existing networks and logistics concepts.

United Airlines first entered into an agreement with the eVTOL developer in February 2021 to <u>purchase 200 of Archer's vehicles</u>, along with an additional, optional purchase of \$500 million. The new joint eVTOL advisory committee is chaired by Dave Dennison, Archer's Vice



President of Engineering, and Mauricio Angel, United's Managing Director for United Express TechOps Strategy and Operations. https://www.aviationtoday.com/2022/04/29/united-airlines-archer-evtol/

Falcon 9 busier than ever as Starship reviews delayed again Jeff Foust — May 1, 2022



A timelapse of a Falcon 9 launch of a set of Starlink satellites April 29 from Cape Canaveral, Florida, the company's sixth launch that month.

WASHINGTON — SpaceX had its busiest month yet in April in terms of launches as the company emphasizes the value of a high flight rate.

A Falcon 9 lifted off from Cape Canaveral's Space Launch Complex 40 at 5:27 p.m. Eastern April 29 carrying a payload of 53 Starlink satellites. SpaceX confirmed a successful deployment of the satellites an hour after liftoff.

The rocket's first stage landed on a droneship in the Atlantic Ocean, completing its sixth flight. The booster was last used just three weeks earlier on the launch of a Crew Dragon on the Ax-1 private astronaut mission to the International Space Station, a 21-day turnaround that was the shortest between flights to date.

That launch was the sixth by SpaceX in April, the most by the company in any single calendar month. The company has performed four launches in a month several times and five in December 2021. SpaceX has conducted 17 Falcon 9 launches so far this year, keeping the company on pace to meet a goal of one launch a week this year. https://spacenews.com/falcon-9-busier-than-ever-as-starship-reviews-delayed-again/

Pyka Secures \$37M in Series A Funding to Accelerate Aircraft Deliveries and R&D Michael Wildes April 28, 2022



Pyka developed the world's first and only commercially certified autonomous electric airplane, the Pelican.

Pyka, an electric autonomous airplane manufacturer, has closed on a \$37 million Series A funding round that will allow the startup to fast track the production of its Pelican aircraft to committed buyers and beef up its



research and development.

This comes after an \$11 million seed round in 2019. This most recent round was led by Piva Capital—a venture firm in San Francisco that invests in companies that offer cross-industry technological solutions—and Prelude Ventures, whose mission is to support companies addressing climate change.

In a statement, Pyka CEO Michael Norcia said, "We are extremely pleased with this successful raise and the opportunities it affords Pyka to rapidly boost our manufacturing and begin executing on our more than \$320 million in MOUs and commercial agreements from customers."

Based in Oakland, California, Pyka developed the world's first and only commercially certified autonomous electric airplane, the Pelican. It's a fully autonomous, crop-spraying aircraft with LIDAR-enabled collision and terrain avoidance systems. The aircraft is powered by three electric motors and redundant batteries, and it can take off in as little as 450 feet and spray up to 130 acres an hour at a fifth of the operating costs of piloted

aircraft. https://www.flyingmag.com/pyka-secures-37m-in-series-a-funding-to-accelerate-aircraft-deliveries-and-rd/

A Once-in-a-Lifetime Experience at the NYSE: a New Way to Invest in the Drone Industry Miriam McNabb May 01, 2022



Friday, DRONELIFE had the opportunity to participate in a time-honored tradition at the New York Stock Exchange: the ringing of the opening bell. We were there to celebrate the launch of a new way to invest in the drone industry: the listing of <u>UAV</u>: an <u>AdvisorShares Drone Technology ETF</u>.

The UAV ETF offers "Dedicated Drone Exposure: Thematic investment in unmanned aerial vehicles and autonomous vehicles" for investors who want the opportunity to participate in the drone industry.

Venture capital investment in drone industry startups continues to break new records every year, and the numbers are getting bigger. As more drone ecosystem players go public – and more publicly traded companies participate in the drone industry – AdvisorShare's Drone Technology ETF provides a welcome way to invest in the drone industry. Check out the <u>details</u>



<u>here</u>, including the list of holdings. <u>https://dronelife.com/2022/05/01/a-once-in-a-lifetime-experience-at-the-nyse-celebrating-uav-a-new-way-to-invest-in-the-drone-industry/</u>

Drone tornado footage from Kansas shows unbelievable devastation Seth Weintraub - May. 1st 2022 6:47 am PT



Kansas, famous for its tornadoes since the Wizard of Oz, is no stranger to the devastation caused by the meteorological phenomena. But I don't think I've ever seen <u>drone</u> footage of a tornado quite like this before with large houses pulled right out of the ground and thrown hundreds of feet into the air

shown as clear and steady as a Hollywood film.

The footage comes to us via <u>Reed Timmer</u>, a Drone/Tornado chaser who describes himself as an extreme meteorologist who covers up-close footage of tornadoes, hurricanes/tropical cyclones, winter storms, and other phenomena of extreme nature.

Video updates on the science mission of the Dominator Team are also featured here, while intercepting tornadoes and hurricanes by tank-like armored vehicle and launching trackable meteorological sensors into their strongest winds. Live storm chasing video will also be posted during periods of active severe weather, hurricane landfalls, and even major winter storms, depending on the season. https://dronedj.com/2022/05/01/drone-tornado-footage-kansas/

Austro Control selects future UTM system integrating drones in Austrian airspace Bruce Crumley - May. 2nd 2022



Austria's air traffic control agency, Austro Control, is relying on its longtime tech partner Frequentis to prepare a new Unmanned Traffic Management (UTM) system that will fully integrate drone flights into the nation's broader airspace by early 2023.

It will permit fast and full communication of data between air traffic controllers and drones and provide automated functionality in processing requests to access restricted airspace.

Frequentis, which specializes in building safety-critical communications and data platforms, won the project following a public tender.



<u>Austro Control says</u> the future UTM asset will facilitate the activity of air traffic officials and drone pilots alike. It has been conceived to allow flight clearances for drones to be handled with speed, safety, and efficiency objectives in mind. Future communication between drone pilots and Austro Control will be entirely digitized and automated.

The first stage of the rollout will enable the exchange of UAV flight plans and fast authorization of operation in restricted airspaces. In the second, drone identification and warnings of craft approaching restricted zones will become automatic, in accordance with European Union rules being phased in. https://dronedj.com/2022/05/02/austro-control-selects-future-utm-system-integrating-drones-in-austrian-airspace/

3May22

The DroneUp Delivery Model: Why Second Mover Advantage Has Put Them Out in Front Miriam McNabb May 02, 2022



Walmart's decision to outsource drone delivery by partnering with a drone services firm like DroneUp has put them ahead of Amazon, which started earlier but made the choice to build a program entirely in-house. "It shows huge self-awareness for a large company like Walmart to work with a smaller company that can deliver faster than large companies like Amazon," says DroneUp Chief Strategy Officer Carl Smit.

It showed forward thinking for DroneUp to decide to work with U.S. drone manufacturers to get their program up in the air. Getting technology at a lower price – without the sunk development costs that the manufacturers have to bear – is a major edge in a competitive industry. But perhaps more important is the flexibility that the approach offers in a rapidly evolving regulatory environment.

Tom Walker is DroneUp's Founder and CEO. "The regulations are changing quickly, and often, manufacturers just couldn't build a technology solution to a particular regulation," Walker says. "We've been able to review technology and see which manufacturers were emerging to fit the technology and the regulation needs as they stand today."

https://dronelife.com/2022/05/02/the-droneup-drone-delivery-model-why-second-mover-advantage-has-put-them-out-in-front/



World's Largest Deployment of Autonomous Drones at US Electric Utility Phoebe Grinter / 27 Apr 2022



Percepto will deploy autonomous drones to monitor Florida Power & Light (FPL)'s substations and power distribution grids across the state, the first electric utility to deploy Drone-In-a-Box (DIB) technology statewide.

The arrangement represents the largest commercial autonomous drone project in the world and is the first operation using drones within an urban setting for

infrastructure inspection.

Phase one of the project will see 13 drones-in-a-box introduced to the West Palm Beach area over the coming year. FPL's long-term plan is to introduce hundreds of Percepto drones to monitor the utility's distribution substations over approximately the next five years.



The drone-in-a-box solution was the first to pass Level 5 hurricane testing at a wind speed of up to 155 mph, making it ideal for minimizing incident response times and power outages in Florida.

The drones in operation across the state will be coordinated on a single platform through Percepto's Autonomous Inspection and Monitoring (AIM) solution. Drones can be operated

remotely to ensure they work together in sync, providing maximum coverage at the sites they monitor. <a href="https://www.unmannedsystemstechnology.com/2022/04/worlds-largest-deployment-of-autonomous-drones-at-us-electric-utility/?utm_source=UST+eBrief&utm_campaign=1e591bfc2f-ust-ebrief_2022-may-3&utm_medium=email&utm_term=0_6fc3c01e8d-1e591bfc2f-119747501&mc_cid=1e591bfc2f&mc_eid=0d642a9d48

DDC wins AUVSI Xcellence award in innovation May 2, 2022 News



Drone Delivery Canada Corp. has been named as a 1st place winner in the Innovation Category of the XCELLENCE Awards by the Association for Uncrewed Vehicles Systems International (AUVSI). DDC was



selected from a pool of accomplished applicants for their work in uncrewed systems technology.

The award acknowledges DDC's innovative project of integrating cargo drones into the controlled airspace at Edmonton International Airport (EIA). This project is the first of its kind, setting up a drone link between EIA and the industrial park in Leduc County, Alberta, as a first step towards creating a sophisticated drone logistics network aimed at connecting multiple airports across the country.

"Congratulations DDC! We're proud of our partnership as the first airport in North America to stage drone-based cargo delivery trials from restricted airspace," said Myron Keehn, Vice President Air Service, Business Development, ESG and Government Relations, EIA

The AUVSI XCELLENCE Awards honor innovators with a demonstrated commitment to advancing autonomy, leading, and promoting safe adoption of uncrewed systems and developing programs that use these technologies to save lives and improve the human condition. <a href="https://uasweekly.com/2022/05/02/ddc-wins-auvsi-xcellence-award-in-innovation/?utm_source=rss&utm_medium=rss&utm_campaign=ddc-wins-auvsi-xcellence-award-in-innovation&utm_term=2022-05-03

Skyway and Zing Operate First Drone Delivery in Orlando, Florida May 3, 2022 News



Skyway and Zing Drone Delivery made Florida history with their latest partnership efforts. On Monday, April 25, 2022, at 3:30 pm EDT, both companies took flight for their first-ever product delivery to residents of Montverde, Florida. Recent construction on the Florida Turnpike and County Road 455 has extended the drive to the nearest

shopping options from 10 minutes to 45 on a good day. Frustrated by the commute, Montverde residents needed a faster way to receive goods on their side of the lake.

Jeff Clark, a Montverde local, took it upon himself to reach out to Zing after hearing of their drone delivery service in Florida. To help deliver items for Jeff and his family, Skyway also initiated low-altitude weather services alongside its navigation services to ensure safe delivery.

Zing and local food truck, Tacos El Carro, initiated services to bring Jeff Clark's wish to life on Monday. Jeff and his family placed an order for tacos and waited for it to be flown in by a drone just minutes later. "We made drone history today here in Orlando," said Skyway CEO and



founder, Clifford Cruz. https://uasweekly.com/2022/05/03/skyway-and-zing-operate-first-drone-delivery-in-orlando-florida&utm_term=2022-05-04

UPS, Swoop Aero partner to broaden medical drone deliveries in Malawi Bruce Crumley - May. 4th 2022



Melbourne-based <u>Swoop Aero said</u> it will be getting support from the UPS Foundation to scale drone deliveries of vaccines and other medical products across Malawi, and expand its reach to increasing numbers of remote communities. Joining in that effort will be global non-governmental organization

VillageReach, which works to promote extension of medical care to underserved populations around the world.

As the pandemic surged, Swoop Aero adapted operations to drone deliveries of COVID-19 vaccines across Africa. Earlier this year in Malawi, the company <u>started</u> <u>distributing Pfizer</u> COVID-19 jabs requiring ultra-cold supply chain conditions.

Expected scaling from the UPS, VillageReach, and Swoop Aero partnership should permit the bidirectional, on-demand drone deliveries of medical products to reach 3 million people in places Malawi's healthcare services can't often reach. https://dronedj.com/2022/05/04/ups-swoop-aero-partner-to-broaden-medical-drone-deliveries-in-malawi/#more-80272

5May22

Spright and Wonder Robotics Team on Drone Landing Logistics for Medical Delivery Miriam McNabb May 04, 2022 By Jim Magill



<u>Spright</u>, a drone-based medical delivery start-up, will use a system designed by Israel-based <u>Wonder Robotics</u> that enables unmanned electric vertical takeoff and landing (eVTOL) aircraft to safely land, either on a designated landing pad or an alternate emergency landing site, without operator involvement.

Under an agreement announced last month, Spright, Air Methods' new drone division, will incorporate Wonder Robotics' Wonderland system into its network, which is designed to fly



Wingcopter 198 eVTOL aircraft to deliver medical supplies and perform other drone-related services at locations across the United States.

Spright currently is testing proof-of-concept projects in multiple locations around the United States and hopes to launch daily drone missions serving healthcare locations in several states by the end of 2022.

In an interview, Spright President Joe Resnick said the Wonderland system would help his company achieve its goals of safely flying its aircraft autonomously for long distances and over people with assured safe landings.



As the eVTOL drone makes its vertical descent, the Wonderland system applies advanced 2D semantic algorithms and 3D geometric analysis of the designated landing site, to detect any obstacles or impediments, such as a person walking across the site, that could interfere with a safe landing. If it determines the original landing site to be unsafe for any reason, the software has

the capability of selecting an alternate site where the drone can safely land. https://dronelife.com/2022/05/04/spright-and-wonder-robotics-team-on-drone-landing-logistics-for-medical-delivery/

Lifeseeker Mini, Search and Rescue Drone Wins AUVSI Xcellence Award Miriam McNabb May 04, 2022 by DRONELIFE Staff Writer Ian M. Crosby



The Association for Uncrewed Vehicles Systems International (AUVSI) has named <u>CENTUM Research & Technology</u> as a 1st place winner in its XCELLENCE Awards under the Technology "Enabling Components & Peripherals" category. CENTUM Research & Technology was chosen among a pool of applicants with significant accomplishments in the uncrewed systems

technology field, with winners receiving public congratulations at the Technology Innovation XCELLENCE awards ceremony on April 27th as part of AUVSI's <u>XPONENTIAL</u> trade show and conference.

CENTUM creates airborne mission systems like the Lifeseeker Mini, an airborne system for Search and Rescue on UAVs that can locate missing people via their cell phones, even without network coverage, leading SAR teams to the missing person's exact location.





"During AUVSI's 50th anniversary year, we are celebrating the accomplishments of the uncrewed systems industry within the last half-century, reflecting on lessons learned, and looking ahead to our vision for the future," said AUVSI President and CEO Brian Wynne.

The AUVSI XCELLENCE Awards recognizes leaders in the advancement of autonomy and uncrewed systems who have developed technologies with life-saving applications. https://dronelife.com/2022/05/04/lifeseeker-mini-search-and-rescue-drone-wins-auvsi-xcellence-award/

THESE 6 DRONE COMPANIES SCORED 2022 IF DESIGN AWARDS May 5, 2022 Sally French



The 2022 iF Design Awards saw about 11,000 entries — but few winners. But in a win for the drone industry, six drone companies made the cut.

The iF Design Award is an annual competition that recognizes exceptional products, which it deems worthy based on assessment by expert jurors who are looking for qualities including function, impact, form, and idea. The competition has been held in Germany since 1953.

The drone companies that scored awards this year were:

- Autel Robotics: Evo Lite drone, Evo Nano+ drone, and Autel Smart Controller
- Dasal Aerospace: X8 modular drone system
- DJI: DJI Mavic 3 drone, and DJI FPV drone
- **Rizse**: Rizse Dragunfly aircraft inspection drone
- Shenzhen Yishang Industrial Design Co: P-40 plant protection drone
- Sony: Airpeak S1 drone

Some standouts this year include Autel Robotics, which had among the biggest sweeps with three winning products. Autel said that its Evo Lite drone likely was a shoe-in thanks to its four-axis gimbal design, which enables users to shoot vertical videos (which are designed for easy editing and sharing on mobile devices). And images are high-quality too, thanks to its supersensitive 50 MP camera, equipped with a 1/1.28-inch (0.8-inch) CMOS sensor, offers pilots a higher level of image quality. https://www.thedronegirl.com/2022/05/05/these-6-drone-companies-scored-2022-if-design-awards/



AIRBUS LAYS FOUNDATIONS FOR URBAN AIR MOBILITY IN GERMANY JASON

PRITCHARD 4 MAY 2022



Airbus has created the Air Mobility Initiative (AMI), which will set up a series of research projects aimed at making Urban Air Mobility within and between cities in Germany a reality.

Supported by the Free State of Bavaria and the Federal Republic of Germany, the projects are centered around three main areas:

eVTOL aircraft, unmanned traffic management services and airport and city integration, including vertiports.

Work on the individual AMI projects began in January, with test flights of the demonstration project to be carried out in the region around Ingolstadt, Germany. The initiative is funded with €17 million from the Free State of Bavaria and €24 million from the Federal Government. Together with the industry's own funds, this results in a total activity of €86 million over a period of three years.

Other members of the AMI include the City of Inglostadt, Deutsche Bahn, Deutsche Flugsicherung, Diehl Aerospace, Dronig, Munich Airport, Red Cross and Telekom.

In a first step, the AMI partners will address the technological, infrastructural, legal, and social prerequisites for the future implementation of advanced air transport. Subsequently, the knowledge gained will be carried through a demonstration project under real conditions with eVTOL aircraft. Airbus is leading the vehicle stream together with Diehl Aerospace, University of Stuttgart, and other partners. https://evtolinsights.com/2022/05/airbus-lays-foundations-for-urban-air-mobility-in-germany-with-the-air-mobility-initiative/?mkt_tok=NzU2LUZXSiOwNjEAAAGENF1W0c4-tY9ctxlCfFvBOgSeLWhQAKQo1K8sufs2YhIOQ4NkwD09JCDIxOeLsJ4qCGs3W5kU_LQ6HWIk6XAhMzfOpyTwW2fhVUXDxgl6GM-1

NBAA APPLAUDS US HOUSE OF REPRESENTATIVES ON PASSING ADVANCED AIR MOBILITY JASON PRITCHARD 3 MAY 2022



The National Business Aviation Association (NBAA) has applauded the action taken in the US House of Representatives on two key pieces of aviation legislation.

The first – known as the Advanced Aviation Infrastructure Modernisation Act (AAIM Act) – focused on accelerating the



growth of advanced air mobility (AAM), which authorizes funding to build critical new infrastructure. The proposal, HR 6270, was first introduced last December by T&I Aviation Subcommittee Chairman Rick Larsen, Ranking Aviation Subcommittee Member Garret Graves and Representative Dina Titus.

The second bill establishes a National Center for the Advancement of Aviation, which will bring together stakeholders from across the military and private sectors, in part to provide STEM-focused resources to high school and collegiate curriculum developers.

Both bills were reviewed and approved by the House Transportation and Infrastructure Committee, a key step in the congressional legislative process. Both will now move to the House floor for deliberation.

Companies involved included the Vertical Flight Society, National Air Transportation Association, General Aviation Manufacturers Association and the Community Air Mobility Initiative. https://evtolinsights.com/2022/05/nbaa-applauds-us-house-of-representatives-on-passing-a-bill-to-accelerate-advanced-air-mobility/

EVE URBAN AIR MOBILITY: A WINNING STOCK OR A DISAPPOINTING DUD? CHRIS STONOR 5 MAY 2022



Next week another eVTOL company goes to market treading the recent path of Joby Aviation, Archer, Lilium and Vertical Aerospace. The stock market flotation will be carried out via a SPAC (Special Purpose Acquisition Company), this time with Zanite Acquisition Corp. It is likely the price will open at around \$10 a share like previous eVTOL SPAC mergers.

With its glossy new ticker symbols EVEX and EVEXW, the company is an off shoot of Brazilian aerospace manufacturer, Embraer, the third largest commercial aircraft manufacturer behind Boeing and Airbus.

As a result of the merger, Eve receives up to \$542 million of proceeds, which consists of \$237 million from Zanite's cash held in trust and \$305 million of private investment in public equity, led by Embraer, Zanite's sponsor, Azorra Aviation, BAE Systems Bradesco BBI, Falko Regional Aircraft, Republic Airways, Rolls-Royce and SkyWest. The business combination will leave Eve with a pro-forma equity value of \$2.9 billion at \$10 per share.



While impressive on paper, all the previous listed eVTOL companies have had a torrid time in recent months. Caught up in the tech sell-off and coupled with uncertainties surrounding the world economy, then exacerbated by the Russian war with Ukraine, many flying taxi investors feel battered and bruised with prices falling, in some cases, by well over 50 percent since their float price. Logic suggests EVEX may suffer a similar fate... or will it? https://evtolinsights.com/2022/05/eve-urban-air-mobility-a-winning-stock-or-a-disappointing-dud/

Belgian drone UTM company Unifly gets \$10 million from Japanese investors Bruce Crumley - May. 5th 2022



UNIFFBelgian uncrewed traffic management (UTM) tech company Unifly has received a significant boost to its drone navigation development capabilities with a \$10.5 million capital infusion from two Japanese

investors, including one co-financed by the government.

The new funding will be used by the Antwerp-based Unifly to both extend its geographical area of operation and client list and produce tailor-made UTM systems to safely integrate drone flights into broader airspaces. Its new financial inflow follows earlier fund raising in 2015, shortly after the company's launch, and a second jolt in 2019, bringing its total thus far to nearly \$35 million.

One of the new investors joining the Unifly team is Japan Overseas Infrastructure Investment Corporation for Transport & Urban Development (JOIN), a fund financed by the government and business partners to support Japanese companies developing infrastructure solutions domestically and abroad.

The other is Japan's Terra Drone, a leading global producer of drone hardware and software, which also received JOIN <u>funding during its Series B</u> round earlier this year.

That backing will help fuel the startup's efforts to broaden its current activities in Belgium, Denmark, Germany, Austria, and Canada. Current customers include NAV Canada and the port of Antwerp's drone UTM operation. https://dronedj.com/2022/05/belgian-drone-utm-companyunifly-gets-10-million-from-japanese-investors/#more-80294



6May22

VERIZON'S SKYWARD UNEXPECTEDLY SHUTS DOWN May 5, 2022 Sally French



In news that was unexpected even to most Skyward employees, the drone company acquired by Verizon is shutting down.

Skyward is an Oregon-based company that provides a drone software platform designed

to support operational control for drone programs including the InFlight mobile app, LAANC access to controlled airspace, and Mapping & Modeling powered by Pix4D. The company was <u>acquired by telecommunications giant Verizon</u> in 2017. Outside of its software, it also offers a range of services including drone training, consulting, and connectivity.

But all of that is set to come to an end this summer. The company sent out an email to customers announcing the end of its services for drone pilots. Customers will have support for their flight operations through June 30, 2022.

The news gives Skyward's existing customers only about two months to find an alternative platform to manage their drone flights. That said, DroneDeploy founder Michael Winn, whose company is generally seen as a Skyward competitor, was quick to sympathize — and also capitalize on the news:

"We are sad to hear that http://Skyward.io is closing its doors. There are so many amazing drone programs growing strongly across every sector and we will do everything we can, as the leader in the industry, to make sure that every drone program remains strong. If your drone program is affected, feel free to reach out to me directly. We will be able to honor most cancelled Skyward contracts and work with you to ensure the growth of your Enterprise drone program." Michael Winn @mikewinn May 5, 2022

https://www.thedronegirl.com/2022/05/06/skyward-shutdown/

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