NASA, AT&T To Research Air Traffic Management For UAVs.

Avionics Magazine (11/11) reported that NASA and AT&T have signed an agreement to research air traffic management for UAVs, and that NASA's Ikhana UAV "recently flew 19 missions to test and validate algorithms developed to provide advanced Detect-and-Avoid alerts" to "help determine standards for integration into the National Airspace System." NASA and AT&T have been working with other companies on UAV "flight path monitoring, flight planning, navigation, surveillance and tracking," focusing on the role of wireless networking.

Insitu In Talks With Indian Companies Regarding UAVs.

The Press Trust of India (11/11) reported that Insitu Pacific Senior Business Development Manager Brad Jeisman said that the company is "actively working" with India regarding the potential manufacture of UAV units for use by the Indian Navy. Jeisman said that the company, which is owned by Boeing, has been meeting with larger Indian firms about potential deals, but is "also interested in small to medium scale industries."

Virginia Tech MAAP Develops UAV Training Program For Journalists.

The Augusta (VA) Free Press (11/13) reports that the Virginia Tech Mid-Atlantic Aviation Partnership (MAAP) has created a training program for journalists on how to use UAVs to capture photos and videos safely, and in compliance with FAA regulations. The Free Press notes that the training program is currently "being used by Sinclair Broadcast Group Inc., one of the country's largest broadcasting companies."

Transportation Secretary Visits Zipline Facility, Talks Future Of UAVs.

Wired (11/13) reports that Transportation Secretary Anthony Foxx recently traveled to California to visit and tour Zipline's lab and testing site to view work on UAV delivery services. Zipline CEO Kelly Rinaudo guided Foxx through his tour, and commented on working under the FAA's new UAV rule. The article notes how Foxx "helped push the traditionally stodgy government this far" regarding the opening up of regulations, but Foxx also acknowledged that the "American airspace is the world's most complicated" and that "the FAA values safety above any commercial goal."

Ohio Airport Chosen To Fly UAVs Beyond Visual Line Of Sight.

The AP (11/13) reports that Ohio and the US Air Force plan to "jointly invest $5 million in research equipment" for the Springfield-Beckley Municipal Airport, to be used "with the FAA's air traffic control network...to enable a ground-based sense-and-avoid system" for flying UAVs beyond the line of visual sight. The Springfield-Beckley airport was chosen as a test site for the new technology due to its proximity to Wright-Patterson Air Force Base.

Avenger ER UAV Offers Increased Endurance, Payload Capacity.

Military Embedded Systems (11/14) reports on the first flight of the Avenger Extended Range (ER) UAV, which features an increased endurance from 15 hours to 20 hours over the legacy Avenger, and the ability to carry "over a ton of additional fuel." The Avenger ER also "features avionics based upon the Predator B/MQ-9 Reaper, is capable of flying at over 400 KTAS [knots true airspeed], and is equipped to carry such payloads as the all-weather Lynx multimode radar, the MS-177 electro-optical/infrared (EO/IR) sensor, and the 2,000-pound Joint Direct Attack Munition (JDAM)." The UAV has been certified by the FAA to operate in US air space.

UAV Industry Beginning To Shift Focus To Business Applications As Consumer Sales Decline.

Reuters (11/14) reports that the "fledgling drone industry is in the throes of change as weak consumer demand and falling prices drive startups to shift their focus to specialized business applications." Reuters attributes the industry's excitement about business applications to the FAA's new rule, which simplifies "licensing requirements, making it possible for small companies to certify themselves to operate commercial drones." The Business Journals (11/14) cites UAV company 3D Robotics as an example of a company that has shifted its focus to business applications. 3D Robotics "saw a disastrous drop in consumer interest and now has retooled to focus on [a] camera-equipped drone designed for construction companies."

Toronto Flight Takes Evasive Action To Avoid Suspected UAV.

The AP (11/14) reports that on Monday morning, a Porter Airlines Bombardier Q400 turboprop approaching Toronto's island airport at an elevation of about 9,000 feet "took evasive action" to avoid a suspected UAV. Two flight attendants who "sustained minor injuries" were taken to a hospital and released. The pilots initially assessed the object encountered to be a balloon, but "after debriefing, they believe it was possibly a drone."

General Atomics' UAV to Deliver Humanitarian Relief Supplies
Published: 15 Nov 2016

General Atomics Aeronautical Systems, Inc. (GA-ASI) has announced that it can provide a company-owned unmanned aircraft to support humanitarian relief efforts. "Angel One," an aircraft based on the jet-propelled Predator RPA system owned and operated by GA-ASI, is capable of delivering 8,500 pounds of Humanitarian Daily Ration packets (HDRs) for 3,400 people each day. This capability could ensure that urgently needed food and medical supplies reach those otherwise inaccessible, such as victims of war – as in Syria – or following natural disasters throughout the world.

Using a specially designed internal bay door release mechanism, which allows for two separate drops of aid per mission, the field is evenly distributed with HDRs, increasing the likelihood of civilians successfully retrieving needed aid, and ensuring greater delivery success over more traditional "pallet" aid drops. "Angel One" can fly up to three missions of three hours each per day for as long as humanitarian relief is required.
http://www.unmannedsystemstechnology.com/2016/11/general-atomics-offers-unmanned-aircraft-to-support-humanitarian-efforts/?utm_source=Unmanned+Systems+Technology+Newsletter&utm_campaign=bf95160fc6-Unmanned_Systems_Technology_eBrief&utm_medium=email&utm_term=0_6fc3c01e8d-bf95160fc6-111778317

16Nov16

FAA To Launch New Set Of UAV Regulations. The Hill (11/15) reports that the FAA "is preparing to launch a new set of drone regulations" that will "address situations in which unmanned aircraft systems fly over people who are not inside of cars or buildings." On Monday, the FAA sent the proposed rules to the Office of Management and Budget, "which must sign off on the rules before the agency's moves forward in the process."

SpectroDrone UAV Can Detect Explosives, Narcotics.

The Daily Mail (11/15) reports that Israeli company Laser Detect System has unveiled the SpectroDrone system, a UAV equipped "with laser beams of several wavelengths, a laser rangefinder, high-resolution camera, spectrometers and proprietary algorithms" for use in detection of "explosives, narcotics and other chemical compounds." SpectroDrone "pinpoints and analyzes threats from an operational radius of up to 1.8 miles and beams images back to its controllers in real-time." The system is designed for both military and civilian use.

AeroVironment Launches Quantix UAV System.

Aviation International News (11/15) reports that AeroVironment unveiled its new Quantix VTOL UAV and cloud-based Decision Support System (DSS) at the Drone World Expo in San Jose, California. The Quantix UAV is equipped with four rotors, a RGB color photographic camera, and "a multispectral sensor with normalized difference vegetation index" capabilities. The aircraft is designed for applications in the "agricultural, energy and transportation markets."

General Atomics Readies UAVs For Humanitarian Role.

CNN Money (11/15) reports that General Atomics said Monday "it is ready to deploy its custom Angel One for domestic or overseas humanitarian missions." The company "isn't building a fleet of new Angel One aircraft, but rather giving new life to a seven-year-old test aircraft." General Atomics "hasn't signed up any aid organizations yet, but it's hoping the aircraft can be used to assist groups like USAID or Médecins Sans Frontières."

Analysts Express Varying Outlooks On UAV Deliveries.

NBC News (11/15) reports on analysts' perspectives regarding the future of deliveries by UAVs. Gartner Research Analyst Gerald Van Hoy explained that recent news from Google and Wal-Mart about the advancement of their UAV projects has led him to believe UAV delivery will be available soon, but IDC Vice President of Retail Insights Leslie Hand said that she believes "the prospect of drone delivery is more hype than reality." The article reports that costs of operating and maintaining UAVs may be outweighed by the prospect that UAVs could "allow companies to deliver packages more quickly since they wouldn't be limited by routes and schedules of services like UPS and FedEx."

Increasing China's Food Supply – With Drones

China's rapidly growing UAV industry is eyeing a new sector: agriculture.

By Joshua Bateman
November 11, 2016

Although drones or unmanned aerial vehicles (UAVs) achieved prominence owing to their recreational and military uses, they hold other value. In particular, drones could help increase the food supply, a critical need as the world's population is estimated to reach 9.9 billion by the year 2050.

In Shenzhen at the China Commercial UAV Summit, agriculturalists, and UAV manufacturers discussed issues facing the industry in China today. Regarding the use of UAVs for agricultural purposes, Liu Libo from Shenzhen Drone Development Company said, "Although there have been advancements, we still see a gap between what is actually being used and the potential." With 1.36 billion people, protein consumption rising, scarce land, and the agricultural workforce declining, China needs to increase productivity. One option is using drones in farming, an industry still performed manually. Although the evolution will be gradual, Chinese farming is mechanizing. Wu Yiyuan from Shenzhen Hi-tech New Agricultural Technologies noted that "starting in 2012, the state government in China issued a policy to support more high tech agriculture including UAVs."
http://thediplomat.com/2016/11/increasing-chinas-food-supply-with-drones/

17Nov16

SpaceX Requests Approval For 4,425 Satellites.

The Los Angeles Times (11/16) reports that SpaceX has requested approval from the Federal Communications Commission for a constellation of 4,425 satellites, to be placed in low Earth orbit to "provide widespread broadband and communications coverage." In 2015, CEO Elon Musk estimated that the network would cost between $10 billion and $15 billion, and could provide "ubiquitous global service" across Earth. Must be some small sats in there somewhere…

Flirtey, Domino's New Zealand Partner To Provide "Pizza-By-Drone."

Inc. Magazine (11/16) reports that UAV company Flirtey and Domino's New Zealand are partnering to offer "pizza-by-drone" as a way to "continually test [UAV delivery] technology in real-world scenarios." Flirtey CEO Matthew Sweeny said, "We are moving closer and closer to widespread store-to-door drone delivery. ... To conduct these deliveries in an urban environment while delivering a hot, fresh pizza is a validation of our delivery system that assures Flirtey is prepared for mass market deliveries around the globe."

Disney Preparing To Debut UAV Light Show This Holiday Season.

The Tampa Bay (FL) Times (11/16) reports that Walt Disney World launched three hundred UAVs over a restricted area at Disney Springs on Wednesday in order to rehearse their first-ever UAV light show, to debut later this holiday season. The Orlando (FL) Sentinel (11/16) reports that Wednesday's rehearsal was "the first time a show-drone performance of this scale has been performed in the United States." The Sentinel adds that during the five-minute show, called "Starbright Holidays," the UAVs "twinkled in multiple colors and made holiday-inspired formations" while classic holiday songs played in the background.

FAA Tests Three UAV Tracking Systems Near Denver International Airport.

KCNC-TV Denver (11/16) reports that the FAA "is testing new technology that could detect unmanned aircraft, or drones, as the devices approach Denver International Airport." CNET News (11/16) reports that the "agency is coordinating with other government authorities and industry partners to run the tests, and will use the data gathered to recommend standards for drone-spotting going forward." KUSA-TV Denver (11/16) adds that testing is part of the agency's study on the issue, which it hopes to complete "by the end of 2017."

18Nov16

India's Rustom-II UAV Completes Maiden Test Flight.

IHS Jane's 360 (11/17) reports that India's indigenous Rustom-II MALE UAV "completed its maiden test flight at the aeronautical test range in Chitradurga, near Bangalore" on Wednesday. The Rustom-II was developed by "the

Aeronautical Development Establishment of India's Defence Research and Development Organisation (DRDO) and Bharat Electronics Limited," for use by Indian armed forces in ISR missions. The UAV has a payload capacity of 350 kg and an endurance of 24 hours, and is powered by Russian NPO Saturn 36T turboprop engines, while its "airframe, landing gear, digital flight control, avionic, and navigational systems" have been sourced in India.

Israel Investigating Gift Of UAV From Minister To Russian PM.

The Washington Post (11/17) reports that the US "is asking Israel for clarification" regarding a $50,000 UAV gifted by Israel Minister of Agriculture Uri Ariel to Russian Prime Minister Dmitry Medvedev that "could have contained American-made thermal and infrared cameras." Medvedev had been allowed to test fly one of the UAVs while visiting Israel's Agricultural Research Organization-Volcani Center, where they are used "to help improve farming methods," and had been given one of the aircraft after he "expressed awe for the device." Israel is investigating the gift, not only because sanctions against Russia prohibit the country from receiving advanced US technology, but because in Israeli "ministers are not permitted to give gifts worth more than a few hundred dollars," the "export of military equipment must be approved by the Defense Ministry," and because the UAV "apparently was purchased by Volcani independently of the government through an outside grant."

UAV Pilot Charged After Nearly Colliding With Police Helicopter.

The Philadelphia Inquirer (11/17) reports that a 20-year-old Drexel University student was charged Thursday "with risking a catastrophe and recklessly endangering another person" after allegedly flying a UAV as high as 1,500 feet, as it nearly collided with a police helicopter Wednesday evening. According to the Inquirer, Philadelphia Police Department Chief Inspector Joseph Sullivan said the FAA's guidelines for recreational use of a UAV "will be factored into any decision to file federal charges against" the student.