Police Aviation News

©Police Aviation Research

Issue 336

Anril 2024

DA-62 SAR SENSOR TRIALS

POLICIA NACIONAL 200





TOTAL MISSION SOLUTIONS

Equip your crew for mission success with the world's first and only family of Total Mission Solutions — the result of Trakka Systems' two decades of relentless focus on innovation and critical vision technologies. We design our versatile products to perform individually or collectively for seamless integration as a complete package. Enhance safety, improve situational awareness, and unify your vision with Trakka Total Mission Solutions.

trakkasystems.com/total-mission-solutions | +1 813 815 432



EDITORIAL

The Chief Officers of Police in the United Kingdom may well have changed their name (from the Association of Chief Police Officers (ACPO) to the National Police Chiefs Council (NPCC) in 2015, but it seems that the government of the day believes that they have not changed their modus operandi. Set up in 1948 as a not-for-profit organisation to develop policing practices, the name change was allegedly driven by practices that came across as all about personal gain for the members. Despite the change, they still come across as self-serving, narrow-minded bigots who are unable to control sizeable proportion of their own membership let alone look after the discipline and wellbeing of those they are supposed to serve – the rank and file of the police service and the British public.

Time after time they are hauled up in front of politicians for simply not doing their job. In the wider areas of policing, it is failing to treat all fairly regardless of race, creed or colour, too often their woke ideas result in extreme examples of bias and criminal activities are not put down in case someone complains. They still have not got a grip on ensuring only the best applicants to join the police get in. All too often the bad apples include the more extreme offenders in being rapists and murderers. Meanwhile the queue of complainants at their door grows longer by the day, meanwhile all too many of the rank-and-file officers head for the exit door to vote with their feet and leave the service.

Within the UK police aviation community this publication has highlighted time and again the successive poor representation afforded to air operations by the NPCC member assigned to be the Aviation Lead. It has been difficult to keep tabs on who is even assigned to the task let alone report upon their achievements. Even when a promising incumbent is successfully undertaking the task their plans and suggestions appear poorly supported by the rest of the NPCC - there is a clear exasperation limit for everyone and even those who might offer a glimmer of hope decide to retire to the golf clubhouse.

If the NPCC were doing their duty to the best of their ability the unseeing, unhearing problem within NPAS management would have been nipped in the bud long ago and this publication would not be spending its time speculating on what on earth they are up to now! The new rotary wing aircraft storyline is now three years old, and they have not even ordered the airframes – the last multi aircraft police helicopter order in the UK took just two years from decision to delivery. Fortunately, the NPCC were not directly involved in that.

I guess that the NPCC might have something of an ally in the recently sacked independent borders inspector, David Neal, he bluntly states that the Home Office is dysfunctional and in urgent need of reform. Neal said immigration failures went to the top of the department and if they are failing in one area perhaps, they are failing in others. The Home Office are equally found wanting in the super slow rolling out of the new radio system and have their part to play in aviation. Former Home Secretary and Prime Minister Teresa May was deemed by many to be rubbish in both roles, but we heard nothing from the ranks of either the Home Office or the NPCC in pushing that forward.

The government sacked Neal last month, saying he had leaked confidential information, after he told journalists of his concerns that the Border Force was failing to carry out several basic tasks. Dissention in the ranks is clearly not acceptable.

Bryn Elliott

COVER IMAGE: Diamond Aircraft and Trakka Systems recently collaborated on a successful demonstration of Trakka's new long-range TC-375 EO/IR imager, integrated onto a Diamond DA62 MPP aircraft. The week-long mission yielded exceptional results, showcasing the system's capabilities in Intelligence, Surveillance, and Reconnaissance (ISR) and Search and Rescue (SAR) applications.

Police Aviation News is published monthly by POLICE AVIATION RESEARCH,

7 Windmill Close, Honey Lane, Waltham Abbey, Essex EN9 3BQ UK. Contacts: **Cell**: +44 7778 296650 **Skype**: BrynElliott or +44 20 8144 1914 **E-mail**: editor@policeaviationnews.com and policeaviation@hotmail.com

Police Aviation Research Airborne Public Safety Association Member since 1994—Corporate Member since 2014

SPONSORS

Anodyne Electronics
Bell Textron
ECS
Teledyne FLIR Systems
L3 Harris/Wescam
Shotover
Smith-Myers
Trakka Systems

Airborne Public Safety Association PAvCon Europe

www.aem-corp.com www.bellflight.com www.enterprisecontrol.co.uk www.flir.com www.l3harris.com

www.shotover.com www.artemis.smithmyers.com www.trakkasystems.com

www.publicsafetyaviation.org www.pavconeurope.eu

LAW ENFORCEMENT

INTERNATIONAL: The PAvCon Europe conference and exhibition being held in Austria May 28-29 is shaping up well. Currently, and on course compared to previous years, the number of industry exhibitors is running at 36 and looks right for a final total of over 40.

Among the first footing attendees are Chora GmbH from Germany and French company Vitec, these are adding to the regular attendees including Adams Aviation, AD Helico, Airbus Helicopters, ESG Elektroniksystem, Shotover, Smith-Myers and Spectrolab. Both of the local aircraft manufacturers, Diamond and Schiebel will be present. The 'hidden' exhibitors include such as the European Helicopter Association (EHA) and Airborne Public Safety Association (APSA) each of whom will add flavour to the broader event.

The conference programme covers two full days – the Tuesday and the Wednesday – and includes police and industry presented items on subjects from flight safety to aerial firefighting, via technology presentations.

In addition to the PAvCon Europe programme the Airborne Sensor Operators Group (ASOG) a professional aircrew association will be holding classes immediately after the PAvCon Europe event. The venue suits thanks to Patrick Ryans existing connections with ABT but there is no direct financial or organisational link. ASOG will simply take over the conference facilities for training the day after the main event is concluded. This will suit some or all of the police and industry attendees and is similar to the arrangement that took place in 2022.

As with all PAvCon Europe events this is primarily an opportunity for industry and practitioners to meet up on equal terms to discuss practical challenges, safety and to learn about some of the newer technologies emerging in the marketplace. In the main the exhibitors promote aircraft parts and accessories suited to the role equipment and integration of service airframes of all types. The types of aircraft involved in this will include helicopters, fixed wing and drones. So far no one has proposed to attend to promote 'lighter than air' craft – but there is always time.





DENMARK

HOME GUARD: The first new DHC-6 Twin Otter aircraft for the Home Guard in Denmark has arrived in Austria for role equipping into the ISR role.

Airborne Technologies received a contract for two aircraft from Swiss company Zimex Aviation Ltd., they will replace two Britten-Norman BN-2 aircraft currently undertaking the law enforcement role in Denmark.

Last June it was announced that Zimex was partnering with Airborne Technologies to provide state-of-theart surveillance aircraft for the Danish Ministry of Defence after they were awarded the task last April by the Danish Ministry of Defence for an 8-year lease contract. The mission equipment comes from Airborne Technologies in Wiener Neustadt, Austria. [Marcus Gurtner ABT/Zimex]

MEXICO

TIJUANA: At the start of March, it was reported that the city had allocated 20 million pesos, about \$1.2M, to acquire a helicopter, its first in six years. The last one, a Hughes 369 was lost in a fatal accident in November 2017.

In the wake of several reports of drug lords going on killing sprees against Tijuana police officers US newspapers reported that the Mayor, Montserrat Caballero, had announced the plan to get the helicopter in service by October this year.

It is the latest development for law enforcement in Tijuana which has the most homicides of any city in Mexico with about double the number of the place that comes second – the border city of Ciudad Juárez. Tijuana, situated in the border state of Baja California and with a population of over 2.1 million, has for several years seen about 2,000 murders annually. By comparison, Houston, Texas, which has about the same population, saw 435 killings in 2022.

The mayor called the purchase a gift to the city's Security and Citizens Protection Department, the official name for the municipal police agency. Since the loss of the helicopter in 2017 the administrations have purchased drones and other, unspecified, aerial platforms to patrol from the air.

Editor: There is no indication yet as to what the helicopter type will be but YTech News based in Poland used this intriguing image to illustrate the story. It appears to be a Bell 407 with an Airbus Fenestron! That leaves the options wide open, I guess.



SPAIN

POLICIA NACIONAL: The police are 200 years old this year and to mark the event the Spanish airline lberia wanted to mark the celebration by naming one of its new airliners after the police.

The chosen aircraft in question is an Airbus A350 Next, registration EC-OFM which is named "Bicentenario Policia Nacional." The airliner joined Iberia's fleet last month and was soon transporting customers.

The celebration event, which took place in La Muñoza, was chaired by the president of Iberia, Fernando Candela, and the general director of the National Police, Francisco Pardo. A formation of agents from different units and several patrol cars and uniformed motorcycles escorting the airline's new Rolls-Royce Trent XWB powered A350 also took part.

Fernando Candela highlighted the close collaboration between this long-standing institution and Iberia in all the airports in our country. "National Police agents and Iberia workers are there together, every day, with the aim of assisting the trips of millions of people so that their experience is as pleasant and safe as possible."

These aircraft are also the quietest on the market and, in addition, between 30 and 35% more efficient in terms of fuel consumption and CO2 emissions, thanks to the latest generation materials with which they are built and the advanced design of their Rolls-Royce Trent XWB engines.



Parapex Media

Marketing, Social Media Management, Website Design, Press and PR dedicated to the Aviation Industry

www.ParapexMedia.com

UNITED KINGDOM

NATIONAL: In what may turn out to be its last budget statement for a while, the current government now in charge of the country for 14 years and considered by most as struggling to seek re-election, made announcements that appear to have sealed a move towards future police reliance on drone technology.

The Chancellor of the Exchequer, Jeremy Hunt, laid out plans to inject funding into the as yet unproven trials of the 'first responder' drones. Jeremy Hunt told MPs £230M would be set aside for police to spend on "time- and money-saving technology" such as the unmanned flying vehicles and video technology. The plan, Project Eagle X, was announced last year and Norfolk Police are due to start the trials.

According to the statement in Parliament, within the next five years police will use drones as first responders so they can get to crime scenes faster. Forces are set to trial the new technology, which would see the remote-controlled devices dispatched to gather information. The Chancellor also said that people who call to report a crime could first deal with an automated service.

Instead of using machines unpacked at the scene of an emergency, the "drone as first responder" model (DFR in US police jargon) will use multiple quadcopters stationed in launch boxes – commonly on top of buildings – and flown remotely by pilots from a central control room to wherever they are needed.

The result, according to proponents of the system, is that a drone can be at the site of a 999 call, relaying back to officers' in the control room live images of what has happened or is happening, in a fraction of the time it takes for a police vehicle to arrive.

According to the results of one unidentified trial in America, where DFR is said to already be increasingly widespread, a drone was able to reach its emergency destination in an average of just over three minutes – half the time it took for officers to arrive. In many cases, the craft was in situ within 60 to 120 seconds.

Superintendent Taryn Evans, who heads the NPCC's drone programme, said: "This technology allows policing to offer a more targeted and efficient use of resources and it is constantly evolving."

Neil Sexton, a former senior British Army aviator who is advising the NPCC on the drone system, said a key advantage of the technology is that it can relay information not only to control room staff but also to officers dispatched to a scene.

The precise scenarios for when a 999 drone might be deployed remain unclear, necessarily perhaps given the newness of the technology.

Editor: Smoke and mirrors prevail. It was unstated where and how this successful US trial is taking place, but a little research discloses that 2-3 of the 17,500 US police agencies are trialling the DFR role. The very fact that the drone was supposed to arrive within 2 minutes in any area the size of the USA can only suggest that it is all very localised.

There remain plenty of spaces/areas/regions left uncovered by first responder drones in the rest of the USA!

Police and fire departments in Fremont, California, have a DFR operation to get an eye on incidents more quickly. They can provide real-time video of an incident well before a squad car or fire truck can get to the scene, but the operation is fairly rustic – not quite the impression the British pundits were trying to put across.

Fremont is a city in Alameda County, California, with a population of 230,000 and lies under or near the manned air cover of several manned air support operations including the East Bay region of the San Francisco Bay Area. In the past Fremont supplied a TFO to crew the East Bay AS350. Lance A Brede, the current deputy chief at Fremont police since mid-2022 was a TFO with the helicopter unit so they have some 'full size' aerial experience.

The joint drone programme launched by the two emergency services sees a drone routinely dispatched from a rooftop near the centre of the city in response to emergency calls. The aim is to gather information before emergency responders reach the scene. That can help dispatch-



Nothing new under the sun?

This cartoon dates from 1930 when it was envisaged that police would sit on poles and watch over the terrain for aircraft and crime in their local area.

The difference is that the new scheme simply keeps the officers dry by replacing the constables with drones and cameras on poles [Flight]

ers better judge what resources need to be deployed but can also give those on the ground vital context when going into potentially dangerous situations.

The police and fire departments have been flying drones since 2017. The DJI drone piloted by trained police officers and firefighters.

The operation is certified by the Federal Aviation Administration to operate beyond line of sight, which means that the operator can simply type in an address and the drone will autonomously navigate to it using GPS. Once the drone is at the location, a human operator takes manual control using an adapted PlayStation 5 controller. But that is being simplistic.

This isn't the first DFR set-up in the United States—the police department in Chula Vista, CA, became the first to start routinely responding to calls in 2019.

Chula Vista is further south in California and located just 7 miles (11 km) from downtown San Diego and 7 miles (11 km) from the Mexican border. The 170 sworn officers in the city serve a population of around 250,000 spread over an area of 50 sq. miles.

The police department runs the drones 10 hours a day, seven days a week from four launch sites (one source states 5 sites). After years of regular use, it's not uncommon to see one of the 30 drones overhead. It has become routine.

Departments like Chula Vista claim their DFR will guarantee that UAVs arrive fast and can quickly ascertain the seriousness of a situation, preventing officers and first responders from making unnecessary trips and freeing them to react to more pressing public safety issues. In the first four months of



BVLOS/DFR drone usage in Elizabeth, New Jersey, in 2022, according to department stats, drones responded to 1,400 total calls, clearing 21% of them with an average response time of 90 seconds (versus four minutes from a patrol unit). Elizabeth is half the size of Chula Vista.



There is no indication that these US schemes are using specialist weather proof launching pads or stations to undertake the DFR system so that intrinsic part of the supposed weather resistant UK system is right back on the starting blocks. It may be perceived that there is a significant difference between a sunny rooftop in southern California and a claggy European winter.

The British trial is set for the county of Norfolk, not noted for tropical weather, and much larger area than Chula Vista the City of Norwich has similar demographics – an area of around 50 miles and a population of 200,000. In terms of the county crossing, it with a drone might take at least half an hour and require multiple units – the suggestion is that this is seen as an urban tool and not for the county. The plan is not that far removed from the service offered by multiple CCTVs that most UK city centres already have.

Fortunately, we are also told it is a project being overseen by the National Police Chiefs Council (NPCC), that alone explains the clouds of disinformation.

Check out the answer to my query on DFR to one of the US based experts later in this edition under "Unmanned". You will find it is similar to the above, but it also contains quite a few cautionary elements that he thinks are going to take years to resolve (even without that often-awkward UK weather). Caution though, the item contains quite a few aeronautical terms that may well be a culture shock to the UK UAS operators if they are enacted over here!!!!

NPAS said they would let me have information on the status of the fixed wing, in the meantime I noted that one of the four (G-POLW) returned to the air on the 29/2 (good job there was an extra day in February this year) and eventually started regular flights. The aircraft, POLW/UKP154 undertook what appears to have been an 86-minute test flight from East Midlands Airport. As far as the FlightRadar24 app has recorded this was its first flight since the beginning of 2024 and on the same basis it appears to be the only flight recorded by the NPAS fixed wing fleet for some 33 days.

A few days passed without further flights but, eventually, regular flying commenced. This was I believe due to an ongoing pilot shortage in fixed wing. The first few flights were relatively short, around 90 minutes and raised the question of whether the aircraft were being flown light and local to their base to reduce detrimental effects on the undercarriage. It is now clear that longer flights are being operated.

A second (POLX) returned to flight on March 10 and the comment from NPAS duly arrived.

On the fixed wing there were no technical explanations offered but simply setting out the already known chronology of the return to flight.

"Following necessary engineering work by our partners GAMA in February, our fixed wing fleet is once again operational from its new base at NPAS East Midlands Airport.

"The first aircraft to return to operations was G-POLW, which was fully serviceable from Wednesday 28 February 2024.

"A second aircraft, G-POLX, returned to full service on Monday 11 March 2024.

"Since 28 February 2024, the fleet has provided support to police operations in 14 different force areas."

So far, the other two have not shown their faces.... But one would always be in maintenance anyway.

Mystery continues to shroud the rotary wing replacement programme, but it may be worth repeating the statement:

"BlueLight Commercial, on behalf of NPAS, continues to run a procurement exercise to identify a potential supplier for the replacement of some of the NPAS helicopter fleet.

"The exercise is at a commercially sensitive stage and so we can't provide any further information at the moment but once we are able to, we will." [NPAS Lisa Fleming (Chart.CIPR) Communications Officer]

Meanwhile the UK MoD had five new Airbus Helicopter H135T3 Juno models that were purchased to replace the Aerospatiale Gazelle's in Northern Ireland. The Gazelle was recently withdrawn from service,



but the security situation was deemed to have improved so the H135s were no longer required to serve and remained in storage.

They have now been leased to the Royal Australian Air Force to support an existing fleet of EC135s. The ADF will lease them for five years, so they will no longer be an option for NPAS.

NPAS continue to advertise for additional fixed wing pilots. The current rate is £65,457 to £68,874 per annum, which is average for the Special Missions sector but in addition NPAS are offering a temporary Market Factor payment of £14,000 as an inducement. That payment is subject to annual review and kept in place by the pressure of 'no takers.' Just down the road there are a number of operators with similar needs. 2Excel Aviation, who are also in the Special Missions market serving SAR needs across the UK and Ireland is also looking to attract additional pilots.

Ed: It might be assumed that a sigh of relief would be let out by their hard-pressed colleagues in the helicopter fleet, but somehow, I think that is unlikely. As I revealed in last month's issue the actual contribution of the fixed wing to operational airtime has been dismally low. Will anyone notice their return?

NPAS still suffers from a failure to attract the pilots it needs and that is more evident in the fixed wing that elsewhere.

When the fixed wing was grounded nearly two months ago it was said that there were no undercarriage units available as spares – presumably because it was not seen by the manufacturers as a service item. The fact that all four police P68s were afflicted at one time would only exacerbate the situation. The lead time for new units to be manufactured was said to be three months but to their credit Vulcanair came up with spares. It will be interesting to see whether all four of the NPAS fixed wing return to service, or whether keeping two in the air will be sufficient for the time being.

UNITED STATES

NATIONAL: The tactical use of airborne thermal imaging can be one of the most powerful tools available to public safety. The Teledyne FLIR Vision Awards, presented annually during APSCON, strive to recognize state and local law enforcement agencies for their contributions to public safety through the use of tactical, airborne thermal imagery.

Each year, Teledyne FLIR asks law enforcement to submit their video footage shot during rescues, pursuits, apprehensions and surveillance operations. Entries should highlight the tactical use of EO/IR technology and the importance of the airborne imaging system in the successful completion of the mission.

The deadline to submit videos is May 17, 2024. Footage from each winning video will be shown as part of the Teledyne FLIR Vision Awards ceremony, August 1, 2024, during APSCON 2024 in Houston, TX. [Source: Teledyne FLIR]

ALASKA: The highest court in the State of Alaska ruled on March 8 that Alaska law enforcement officers must obtain a warrant before using aircraft to scope out the area around a person's home with binoculars or cameras with zoom lenses.

The Alaska Supreme Court ruling comes in a case that dates to 2012, when Alaska State Troopers received a tip from an informant that John William McKelvey III was growing marijuana on his property in a sparsely populated area north of Fairbanks.

According to the ruling, McKelvey's property was heavily wooded, with a driveway leading to a clearing where a house and greenhouse were located. Trees blocked the ground-level view of the buildings from outside the clearing, and a gate blocked cars from entering.

In the court's recounting of the case, two troopers, following up on the tip, flew past the property and used a camera with a high-power zoom lens to take photos that showed buckets containing "unidentifiable plants" inside the greenhouse. Based on the tip and flight observations, a search warrant for McKelvey's property was obtained. During the search, officers found items including marijuana plants, methamphetamine, scales, a rifle and cash.

In subsequent meetings in court houses McKelvey sought to have the evidence suppressed, lost his plea but more recently had that reversed. The latest decision has decided the search was unlawful. It is unreasonable for law enforcement officials to take to the skies and train high-powered optics on the private space right outside your home without a warrant.

CALIFORNIA: At the Heli-Expo in Anaheim, California late in February Bell Textron Inc., confirmed the deliveries of three SUBARU Bell 412EPX, two to San Bernardino County Sheriff's Department and one to San Diego County Sheriff's Department. Both operators serve parts of California.

San Diego County Sheriff's Department's aviation unit, Aerial Support to Regional Enforcement Agencies (ASTREA), completes nearly 6,000 public safety missions each year with its all-Bell fleet of emergency response helicopters, including four Bell 407GXis, three Bell 205s, and its newest addition of a SUBARU Bell 412EPX. ASTREA plans to use its SUBARU Bell 412EPX in conjunction with the California Department of Forestry and Fire Protection (CAL FIRE) firefighters to combat wildfires within the region.

As the lead aerial law enforcement agency for the largest county in the U.S. covering an area over 20,000 square miles, the San Bernardino County Sheriff's Department plans to utilise their two SUBARU Bell 412EPXs for critical law enforcement missions and emergency response assistance including wildfire management and search-and-rescue operations. Over 50 years ago, the San Bernardino County Sheriff's Aviation Unit began its operations with their two Bell 47Gs and have since expanded their fleet to 17 aircraft, which includes two Bell UH-1Hs, a Bell 212, and the most recent purchase of two SUBARU Bell 412EPXs.



CNC Technologies announced the completion of a law enforcement mission suite upgrade for Fontana PD's newest AS350-B2 AStar. Fontana also contracted CNC Technologies for recurring service, support and training for 3 years which will maintain uptime and proficiency of the sophisticated systems.

CNC Technologies equipped the aircraft with Shotover ARS750 augmented reality system, Troll downlink equipment (including Linkbox II and Mini II), and compatible downlink infrastructure with CNC.Live video streaming. With CNC.Live, Fontana PD is able to securely broadcast aircraft video imagery to ground based command staff with the added benefit of being compatible with neighbouring agencies including Ontario PD and LASD. Fontana PD's new AStar adds to their existing fleet of two Robinson R66 law enforcement aircraft.

CALIFORNIA: The Stanislaus County Sheriff's Office based in Modesto, California has approved the negotiation of a selling price of a surplus helicopter to the adjoining Merced County Sheriff's Office in Los Banos, CA. In late February the Stanislaus County Board of Supervisors approved the declaration of the 1972 Bell 206B2 JetRanger II N206BG c/n 861 as surplus equipment.

The Sheriff's Office aircraft fleet consists of three helicopters and two fixed wing. One of the helicopters, the Bell 206B2, was donated to the County by Gallo Wineries in 2002, with subsequent role equipment upgrades funded by the California Multi-Jurisdictional Methamphetamine Enforcement Team and Stanislas Drug Enforcement Agency.

In 2022, the Sheriff's Office replaced the Bell with a 2014 Bell 407GXP with 4,680 hours on it and now needs to dispose of the older asset. At the time of the acquisition of the new 407 the JetRanger was said to be less structurally sound and presenting many challenges due to its age. Although it has flown this year it stopped regular flying in the third quarter of 2023. The third helicopter is a Bell 206L LongRanger N206LW c/n 45182. That was damaged in 2016 but has now been repaired and returned to service.

The Merced Sheriff's Office has retained a certified third-party firm and has appraised the aircraft at \$533,500, before any maintenance or other recommended repairs to the aircraft were deducted. The Sheriff's Office has reviewed this appraisal and is recommending selling this aircraft as-is for a sales price of \$400,000. The helicopter has multiple deferred maintenance needs/repairs in the near future, including an overhaul of the engine. The value of these repairs exceeds \$150,000. Any needed repairs or upgrades would be done by the Merced County Sheriff's Office after the aircraft is transferred to their inventory. [Turlock Journal]

FLORIDA: Marion County Sheriff's Office Aviation Unit serving Ocala has added Outerlink's multicellular Air IP Air IP to their new 407 and integrated the Air IP broadband Wi-Fi network with their ShotOver video mapping while delivering HD video streaming to the County's Command Centre. Outerlink's multicellular Air IP is expanding with additional FAA STC approvals and expanding across law enforcement and corporate clients.

In addition to law enforcement, Fortune 100 and Fortune 500 companies are choosing Air IP for their aircraft. The key to Air IP's success is the ability to provide ample bandwidth for everyone onboard simultaneously. Users report consistent connectivity at over 140 mph and thousands of feet above the ground for up to ten devices.

The patented bonding technology keeps user data safe, constantly switching between towers and networks. Sterling Helicopter has completed the AW139 STC and developed a comprehensive kit with the installer in mind. The S76 series is expected to receive approval in Q2 2024, and the Bell 407 is close behind.

KANSAS: Kansas Highway Patrol has just taken delivery of their new Cessna 208B, outfitted with high altitude surveillance technology. This aircraft will be able to cover a massive radius and provide eyes on scene in short order.

The completion was undertaken by Hangar One Avionics, Inc. cooperating with CNC Technologies.

(image Mike Clingerman)



LOUISIANA: The State Police have chosen the Bell 407GXi to expand their public safety mission capabilities. With its upgraded avionics and custom cabin space, there are more than 1,500 Bell 407s operating throughout the world with over six million total fleet flight hours.

The Louisiana State Police's Air Support Unit provides aerial support to all local, state, and federal law enforcement agencies within the state upon request. The Air Support Unit plans to utilise their new Bell 407GXis to expand their public safety mission portfolio. In addition to their two new Bell 407GXis, the Air Support Unit also uses a Bell 407GXP, two Bell 430s, one Bell 206L-IV Long Ranger, [pictured right] and a Bell 206B-III Jet Ranger – all configured with Night Vision Goggles (NVG), Forward Looking Infrared (FLIR) cameras, and Trakka Beam and Night Sun searchlights. Cessna light singles are also used in the fleet.



The Bell 407GXi delivers impressive performance and fuel efficiency with the ability to cruise at 133 kts (246 km/h). Its Garmin G1000H™ NXi Flight Deck enhances situational awareness and reduces pilot workload by delivering easy-to-read information at a glance. [Bell]

MINNESOTA: The State Patrol has selected CNC Technologies to deliver a new Intelligence, Surveillance and Reconnaissance (ISR) suite for its new Cirrus SR22 Perception aircraft. The completion will be performed by AeroBrigham LLC in Decatur, TX, who has provided completion work on many other fixedwing aircraft and helicopters in partnership with CNC Technologies in recent years.

CNC is equipping the aircraft with a Wescam MX10 IR/EO camera, Shotover ARS750 augmented reality system moving map, Avalex (Mercury Systems) video recorder, Troll downlink equipment (including Linkbox II transmitter and Mini II directional antenna), Macro-Blue video monitors, Technisonic TDFM tactical radio, and a custom-designed rear seat Tactical Flight Officer (TFO) station. Additionally, CNC will provide their signature, 24/7/365 service, support and training. [CNC]

PENNSYLVANIA: The Pennsylvania State Police (PSP) Aircraft Section is teaming up with APSA to conduct a one-day Safety Stand-To in Wilkes-Barre/Scranton, Pennsylvania on May 15, 2024. The event will take place at the PSP Aviation Patrol Unit Hangar 2. Topics will include safety, CRM, PPE, laser strike protection, and a review of air operations from the Pennsylvania Emergency Management Agency (PEMA).

There is no charge to attend this excellent training, however, all attendees must be registered to participate. For complete information and to register check out the Public Safety Aviation website.

APSA conducts Safety Stand-To's on an on-request basis for members at their facility. To schedule a Safety Stand-To in your area, contact APSA Executive Director/CEO Dan Schwarzbach at +1 713-213-4749 and/or APSA Operations & Events Manager Benay Osborne at +1 301-631-2406.



TEXAS: Metro Aviation recently delivered an Airbus Helicopters H125 to the Texas Department of Public Safety equipped with GPMS International's Foresight MX. With Foresight MX's all-in-one solution, Texas DPS now benefits from predictive Health and Usage Monitoring System (HUMS), Engine Monitoring, Flight Data Monitoring (FDM), and integrated Rotor Track and Balance.

Metro Aviation provides industry-recognized maintenance and completion services for various market segments. With their extensive knowledge and experience operating, maintaining, and delivering Airbus helicopters, Metro Aviation has helped GPMS develop and improve Foresight MX for operators like Texas DPS. metroaviation.com.





HELI-EXPO 2024

Law enforcement airframes at this years event held in Anaheim, California.

Top left: 2008 Pomona Police MD369E/500E N108PP

Top right: Kern County Sheriff CA H125 N913KC Left: 1985 Hughes 369E/500E N66SD ownedby Enforcement Aviation Services in California may have been around for a while but it has recently been given a boost of a modern role equipment suits from

Bottom left: Drones increasingly play their part in the Heli-Expo and have led to the renaming of the event from next year

Bottom right: Ventura County Sheriff CA Subaru/Bell 412EPX N412VC

Mark Colborn



AIR AMBULANCE

AUSTRALIA

QUEENSLAND: Leonardo announced a further growth in presence of the AW139 intermediate twinengine helicopter in Australia at Heli-Expo 2024, with orders for three more aircraft by LifeFlight Australia. These add to two additional aircraft for LifeFlight's joint venture partner StarFlight, that had been ordered in late 2023. The helicopters will be used to carry out emergency medical service and search and rescue response missions in Queensland with deliveries expected in late 2024.

LifeFlight and StarFlight operate one of Australia's largest fleets with 11 AW139s performing air medical and emergency, rescue response missions, and law enforcement. The arrival of five new aircraft takes the total fleet size to 16.

Established in 1979, LifeFlight operates an advanced fleet of rotary and fixed-wing jet aircraft and employs highly trained medical teams and is a globally recognised training academy and Approved Maintenance Organisation. The AW139 on order will feature all the latest avionics technology, patient care and search and rescue capability. Reliability, quality and serviceability, technology, size, versatility, readiness and all-round advanced capabilities that the AW139s offer, make these aircraft ideal for EMS requirements in Australia.

CANADA

BRITISH COLUMBIA: Last spring, Babcock Canada was awarded a 10-year multi-million-dollar contract by Ascent Helicopters to support them in their contract for the provision of rotary-wing air ambulance services for British Columbia Emergency Health Services (BCEHS).



The company now has been approved by Transport Canada to expand its Approved Maintenance Organisation (AMO) certificate for the Leonardo AW169. This rating and accreditation will allow Babcock to perform the required modifications and maintenance to the AW169, ensuring they are always mission ready.

GERMANY

DRF: DRF Luftrettung and Airbus Helicopters have announced orders for up to ten H145 helicopters (seven firm orders, three options).

The ordered helicopters will also be covered by DRF's fleet-wide HCare Smart contract, which provides comprehensive parts-by-the-hour support.



Proven Platforms. Prioritizing Operational Readiness. Industry-leading Support.

As mission partners since 1948, our team focuses on priority one: aircraft readiness. Our platforms are proven and trusted by operators around the globe – and our support team is there 24/7/365.

Explore our public safety solutions at bell.co/publicsafety



DRF Luftrettung is one of the largest and most experienced air rescue organisations in Europe. The organisation and its subsidiaries operate more than 50 Airbus H135 and H145 helicopters at 40 bases throughout Germany, Austria, Liechtenstein and Switzerland for emergency rescue and intensive care transport operations. In addition to this, they are also deployed for special missions, including hoist operations and day and night operations.

UGANDA

Last month an appeal was published for a supplier of a medical helicopter to serve the region. The project is to meet a pledge by the president of Uganda to boost health facilities in the country.

The man behind the project is Dr Samuel Mugisha, an agent based in Mbale, Uganda, and in the past something of a man of the people in that five years ago he was sourcing a helicopter for the Wildlife Authority when he was acting as its Executive Director. No other details are known about the project.

UNITED KINGDOM

ESSEX: The new Leonardo AW169 helicopter G-EHAT of the Essex & Herts Air Ambulance service was delivered Gloucester / Staverton to SAS / Gama at around 3-30pm on March 13.



[image James Lloyds]

HEBRIDES: For the first time, the Corps of Royal Engineers, and the HELP (Helicopter Emergency Landing Pads) Appeal, the only helipad charity in the country, will be working together to build a much-needed emergency helipad on the community owned Isle of Gigha.

Gigha is located on the most southerly Hebridean Islands, three miles west of the Kintyre peninsula and around a three-hour drive from Glasgow followed by a 20-minute sailing on a ferry. Whilst there is a regu-

lar ferry service, Gigha is still a remote and rural community, and its inaccessibility can be problematic particularly during a medical emergency. By having a permanent, purpose-built helipad at Gigha Airfield, the Scottish Air Ambulance and larger coastguard helicopters can land and take off at any time on the island, transporting critically ill patients to the most appropriate major trauma centre or A&E hospital on the mainland

Jane Millar, from The Isle of Gigha Heritage Trust, approached the HELP Appeal for support. By a happy co-incidence the charity had also been contacted by 39 Engineer Regiment in Kinloss, Scotland, asking if there was a helipad project it could be involved with to gain exercise experience of building emergency platforms. 39 Engr Regiment are the MOD's high readiness air support Engineer force and the regiment strive to improve its understanding of helicopter infrastructure so it can react without delay to the needs of defence across the world.

In 2002, the Gigha islanders managed to purchase the island for £4M under the Community Right to Buy scheme. They now own it through the Isle of Gigha Heritage Trust, which has teamed up with the HELP Appeal and 39 Engineer Regiment to coordinate the project. Currently the island operates on a "landing strip" of grass, which is a highly unsuitable surface for its volunteer ambulance service when escorting patients to a helicopter. It can become waterlogged and muddy delaying their transfer to lifesaving treatment at a hospital on the mainland. Robert Bertram, the HELP Appeal's Chief Executive agreed to fund the cost of the project – £150,000 – and 39 Engineer Regiment in conjunction with local contractors, will build the helipad. It will be operational this month.

Once this project is completed the HELP Appeal and 39 Engineer Regiment are looking to work together on similar projects that will be mutually beneficial.



EVOLVING EO/IR TECHNOLOGY FOR ADVANCED MISSIONS

Supporting global airborne law enforcement agencies with 45 years of product evolution and flight-proven technologies.

Missions are longer, more complex and need to be executed faster. More is expected of you and your crew each and every time you fly. L3Harris' electro-optical and infrared systems are designed with the latest technologies to address changing mission requirements. Delivering robust performance and ease-of-use, WESCAM MX™ sensor systems enable operators to see more, operate easier and analyze live video intelligence with confidence. When minutes count, trust WESCAM MX systems to help you see first and act first.



UNITED STATES

FLORIDA: In Ocala the AdventHealth West Florida Division launched a new Airbus Helicopters H135P3H helicopter on March 4. The medical helicopter is to operate patient transfers within the Tampa Bay region, which includes Ocala and Marion County.

The twin-engine H135 will be stationed at Lakeland Linder International Airport and operated by a team of twelve trained medical professionals, including registered flight nurses and certified flight paramedics.

The aircraft will be operational 24/7, 365 days a year, with state-of-the-art instrumentation and safety features. AirStar 1 also will be on standby for community 911 responses, providing rapid medical assistance for trauma, stroke and cardiac alert patients across multiple counties. [Ocala Gazette]

OHIO: Mercy Health has added a new helicopter into its Life Flight Network fleet. This new helicopter N78LF is the first Leonardo AW119 Koala EMS helicopter – a lighter weight model that offers more options on landing sites to be closer to where EMS agencies are responding to emergencies.

When Mercy Health – Life Flight launched in 1979, it became the first emergency air medical service in the region, and among the first to be established in the United States. In the past two decades alone, Life Flight has accomplished more than 30,000 life-saving patient transports in the region.

The new air ambulance joins the Mercy Health – Life Flight Network fleet of three Leonardo 109Es, currently in service.

The AgustaWestland AW119 Koala EMS helicopter is equipped with latest Garmin cockpit flight display with full synthetic vision. Its medical interior is specifically designed using the newest superior weight saving material serving the needs of our highly trained critical care crews and our communities.

Mercy Health Life Flight Network has earned full accreditation from CAMTS (the Commission on Accreditation of Medical Transport Systems) signifying excellence in transportation systems. CAMTS standards include patient care, medical personnel education, medical equipment, and the safety of our pilots, maintenance staff, communication centres and management.

Mercy Health operates two air and on ground-transport Life Flight bases throughout northwest Ohio. The new helicopter will be housed in Wauseon at the Mercy Health Life Flight Network base located at the Fulton County Airport.

WEST VIRGINIA: HealthNet Aeromedical Services, headquartered in Charleston, West Virginia, will soon expand its all-Airbus fleet with the addition of four H135 helicopters. As one of the largest hospital-based air medical programmes in the USA, the helicopters will be used to serve adult, pediatric and neonatal patients across the state of West Virginia.



"HealthNet has been a valued partner of Airbus Helicopters, Inc. since 1986, and we look forward to supporting their mission as they elevate their fleet with the addition of four new H135s," said Bart Reijnen, President of Airbus Helicopters, Inc. and Head of the North America region. "These helicopters will be the first in their fleet equipped with Helionix avionics, allowing for increased mission flexibility and safety that benefits their employees and the communities they serve."

HealthNet has exclusively operated Airbus helicopters since the programme's inception nearly four decades ago, caring for more than 100,000 patients during that time. Their current fleet of eleven aircraft is comprised of H130, H135 and EC145 helicopters.

FIRE



BORDER PATROL: On December 19, 2022, the Ministry of Internal Affairs signed an agreement with Airbus Helicopters to purchase of three H145 helicopters. The next two aerial transport is planned to be delivered to Georgian side by June 2024.

The first new helicopter, GDP-10023, has been handed over by Airbus at their facility in Germany wearing its local test marks D-HBTA. The ceremony was attended by the deputy head of the border police, Giorgi Malania, and the Director of the Special Purpose Aviation Division of the Border Police, Ioseb Arjevanishvili.

The helicopter is fully equipped with firefighting and mountain rescue equipment compatible with the mountainous terrain of Georgia.

Pilots and flight technicians of the Special Purpose Aviation Division of the Border Police are currently undergoing theoretical and practical training at the Airbus Helicopters training academy in Germany.

The training course was due for completion on March 15, which will be followed by the transportation of the helicopter the 3,600km (2,236 miles) to Tbilisi, Georgia by the Georgian crew. The next two aircraft are planned to be delivered to Georgia by June 2024.

JAPAN

Mitsui Bussan Aerospace (MBA), the authorised distributor for the Leonardo AW139, AW169 and AW189 helicopter models in Japan, announced with Leonardo orders recently signed for a total of three AW139s, to meet the requirements of various upcoming opportunities in the country. These latest orders confirm the continuous success of the AW139 in Japan with over 70 units currently in operation.

The AW139 has proven extremely successful in Japan: today the AW139s in-service in Japan have logged in excess of 110,000 flight hours, performing several utility operations, as well as supporting several prefectures and city authorities. Nearly 160 helicopters of various types, including the AW139, are in service in Japan, used for a wide range of missions including law enforcement, emergency medical service, search and rescue, firefighting, disaster relief, VIP/corporate transport, electronic news gathering, and maritime utility.

Three AW139s (MoLIT Hokuriku, Ishikawa Prefecture Fire Fighting & Disaster Prevention and Saitama Prefecture Fire Fighting & Disaster Prevention) and one AW169 (Chiba City Fire Department) will be delivered for the public service market in 2024. Helicopters from the Leonardo's fleet in Japan were extensively used during search and rescue operations following the Noto earthquake in January this year.

Mitsui Bussan Aerospace Co., Ltd. is a trading company that specialises in aerospace, defence, and security systems. The company imports and sells helicopters, aircraft, space, defence, and security-related equipment, as well as providing related services. Its products include Leonardo's helicopters, defence machines, aircraft engines, space business and more. The company was founded in 1982 and is based in Tokyo, Japan.

UNITED STATES

Autonomous systems, and in particular unmanned vehicles, are taking on more complex tasks and missions whether they be in the air, on land or at sea. Sikorsky and Rain.aero are developing an autonomous Sikorsky Black Hawk helicopter designed to detect.



There are around 1,100 cameras pre-positioned on the ground, but the unmanned helicopter fills in the gaps in the system. They assist in early detection of fires and that allows fire agencies to respond more rapidly.

In 2019, three members of the team from Rain began working on a prototype of an autonomous drone system to detect wildfire ignition. The work evolved from outfitting military and commercial drones and the partnership with Sikorsky to put the system on the Black Hawk. Late last year a water drop demonstration was arranged for Sikorsky's headquarters in Stratford, Connecticut. Although it included the fill and drop elements of a Bambi bucket the system was primarily to demonstrate the early detection, dispatch, route planning, preflight take-off, flight, targeting, suppression and landing.

This is a link to a YouTube video of the flight. https://youtu.be/r5q6DJs5t7g [Washington Technology]

SEARCH & RESCUE

CANADA

IMP Aerospace & Defence, working with the Canadian Forces, selected Axnes' PNG wireless intercom system (WICS) for the CH-149 Cormorant search-and-rescue aircraft upgrade project. The CH-149 is the Canadian Forces designation for the AgustaWestland AW101. WICS, which includes BST50 base stations and MP50 dual-band handheld transceivers, enables uninterrupted communication between the onboard crew, ground personnel, and search-and-rescue (SAR) teams. According to Axnes, the system improves situational awareness and assists with making quick decisions during missions.

Markus Schmitz, managing director at Axnes, noted that the company "is committed to delivering reliable and innovative communication solutions that meet the unique needs of critical operations. We are proud to support IMP Aerospace & Defence and the Canadian Forces in their mission to protect and save lives."

The upgrade project involves the integration of Axnes' WICS into 13 CH-149s. WICS was selected in part because of its lightweight design and durability which are especially important for SAR operations.

Axnes is headquartered in Norway and has offices in the UK, Colorado, and Austria. The company is an approved supplier to OEMs such as Airbus, Leonardo, Sikorsky, and Bell.



Axnes at the recent Heli-Expo

MALAYSIA

MARITIME ENFORCEMENT: The Leonardo AW189 super medium helicopter's success grows stronger in Malaysia and Asia. The Malaysian Maritime Enforcement Agency (MMEA) has selected the type for its long-range search and rescue requirement. Four aircraft will be delivered under a contract signed with Galaxy Aerospace Malaysia Sdn Bhd between 2025 and 2026, adding to a fleet of three AW139s already in service and testifying the reliance of the operator on Leonardo's latest generation rotorcraft technology.

The Malaysian Maritime Enforcement Agency is a security agency established to enforce law and order for the preservation of peace, safety and security in the Malaysian Maritime Zone and to coordinate search and rescue operations in the Malaysian Maritime Search and Rescue Region. The AW189s will provide a major boost to safely and effectively extend the patrol and search reach over sea as well as persistence during the mission.

The AW189 combines superior payload and range with advanced technologies to successfully operate a wide range of missions such as Search and Rescue, energy industry support, passenger transport, Fire



Fighting and Law Enforcement. Unique features of the helicopter include the main transmission's capability to run without oil for 50 minutes and a built-in Auxiliary Power Unit. The AW189 is available with more than 200 certified kits and delivered with a comprehensive support and training service package tailored to meet specific customer requirements to maximize mission effectiveness and safety of operations. The type is also certified for an automatic data transmission system enabling the aircraft to transmit performance data to a ground station using satellite communication in flight, 4G cell connectivity, or Wi-Fi when on the ground. It offers a secure way to share an accurate picture of each flight so that Leonardo experts can assess data quickly, thus optimizing maintenance and support.

Over 140 AW189s have been ordered, and more than 90 delivered to operators worldwide to date. After 10 years since its certification, the AW189 remains the world's most successful super-medium category helicopter by market size, number of operators, countries and applications and has an established footprint in Malaysia and Asia for a wide scope of duties including SAR, disaster relief, firefighting, law enforcement and energy support.

An AW189 Full Flight Simulator is expected to be operational this year at Leonardo's Training Academy in Malaysia to meet regional crew training needs.



UNITED KINGDOM

CHANNEL FUNNEL: It has not been a good month for the British Government. They have once again been found to engage their mouth before using their brain. The British Prime Minister, Rishi Sunak, decided to laud his personal success in stopping the flow of small boats and migrants from France to England on the day that the weather improved and saw the flow restart with an embarassing vengeance.

Whoever is advising Rishi has not got their head around the solid fact that the actions by the government are not stopping the flow. It is the weather, and bad conditions only offer a temporary halt in the traffic – just long enough for the politicians to make statements that prove how inexperienced they are.

As Tony Cowan recounts below, the plans to halt the migrants really have gone awry and so far, no day has been a good day for stopping the flow!

VIVE LA FRANCE!

INTRODUCTION

In the latter months of 2018, a total of 299 migrants were known to have crossed the English Channel in small boats and the then Home Secretary (Minister for the Interior), Sir Sajid Javid declared a 'major incident'. However, rather than detaining those migrants who had entered the UK without permission, each paying organised criminal gangs (OSGs) thousands of pounds for a one-way ticket, they were welcomed and accommodated in hotels, with a food allowance and a mobile 'phone, to keep in touch whilst their claims for asylum were assessed. This has become known as the 'pull factor' and over the years, many of these migrants have simply disappeared to become part of the UK's 'black economy'. Moreover, at the end of 2023 over 100,000 asylum seekers, some of whom had arrived in small boats, were in a backlog waiting for the Home Office to make a decision on their applications.

Five years ago, small numbers of migrants began to arrive in the UK in very small boats, after crossing the English Channel from France.



Daily Mail

From 2018 the numbers have increased year on year. Now, over 5 years later, the British Prime Minister, The Rt Hon Rishi Sunak MP continues to reassure the public, together with the all-party Parliamentary Liaison Committee. This is despite the fact that some 20,000 migrants have crossed the Channel, to enter the UK illegally, following the introduction of the 'Illegal Migration Act' in July 2023. In the Prime Minister's words, "Anyone who arrives here illegally should not be able to stay...... and we will do everything that we can to remove them, either to their home country, if it is safe to do so, or to a safe alternative like Rwanda."

In 5 years, the UK Border Force, with vessels at sea, supported by patrol aircraft and drones in the air, hasn't stopped one illegal migrant from entering the UK.



Daily Mail

These are fine words from the Prime Minister. However, at the same time, the equally powerful all-party Home Affairs Committee, which also scrutinizes government performance, has described the department responsible for controlling the UK's borders, the Home Office, as dysfunctional, populated by civil servants who are incompetent! The former Independent Chief Inspector of Borders and Immigration, David Neal, a retired British Army Brigadier and a former Provost Marshal (Army) was sacked by the Home Secretary, James Cleverly in February 2024 after he had written several reports that are highly critical of UK border security! The truth is that the Border Force, part of the Home Office, hasn't stopped one migrant from entering the UK without permission. Very few have been detained and returned to their home country, or a third, safe country.

Inflatable boats that have been destroyed, together with broken outboard engines on the beach at Wimereux, south of Calais. In this joint Anglo-French operation, to 'stop the boats', the UK Home Office claims to have no knowledge of how many inflatable boats and outboard engines have been destroyed, on French beaches, by the French police.



AFF

It's the weather and the French police who have stopped the boats! Moreover, although the Home Office knows, in general terms, how many migrants have been turned back by the French police, according to the Home Secretary, 25,000 in 2023, it doesn't know how many boats have been destroyed on the beaches of northern France. This simply beggars' belief as this is a joint Anglo-French operation, funded by the UK government, with Border Force liaison officers in a joint coordination centre at Lille, in northern France, together with Border Force officers patrolling the French beaches, as observers, with French police officers.

Nevertheless, in August 2023, Charles Hymas, the Home Affairs Editor of the national newspaper, '*The Daily Telegraph*', reporting from northern France, wrote that in the first half of 2023 the French police had turned back 13,759 migrants and destroyed 511 boats. In the same period, up to the 15 August 2023, the UK Border Force intercepted 359 boats and landed 17,346 migrants.

Today the migrants, mostly young men, arrive in very large, purpose built, flimsy inflatable boats, built in China and Turkey. Boats described by the National Crime Agency as 'death traps. They can only be used in good weather with a calm sea and a light breeze. The weather factor has proved to be critical. When the weather is favourable, large numbers of migrants will cross the Channel in a relatively small number of boats, each carrying 50 migrants, or more.



AFF



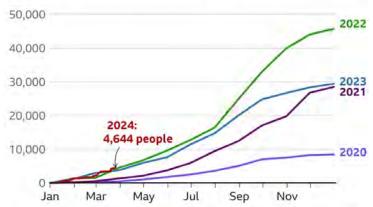
Meanwhile television footage from the beaches of France tends to confirm that the police face severe difficulties in challenging boat launches. There may be a few hundred police officers attempting to stop the launches, but they are spread over hundreds of miles and tend to only encounter boat launches in relatively small numbers. A handful of Gendarmes in a 4x4 is no match for 50 potentially desperate young men. A similar situation arose when the handful of crews on a RNLI Charity lifeboat picked up survivors of a drowning incident just off the French coast. They were impelled to take the survivors to an English port rather than a Place of Safety in France simply because the young survivors greatly outnumbered the rescuers.

A RECORD YEAR

In 2022, a record year, the number landed in the UK by the Border Force and the UK's lifeboat service, the RNLI, after being 'rescued' from the English Channel, was 45,774. This number was bloated by 12,658 economic migrants who arrived from Albania, some of whom have been returned, together with 9,088 asylum seekers from Afghanistan. Moreover, the number of migrants landed in the UK from small boats in 2023 (29,437) was greater than the number of migrants landed in the UK in 2021 (28,536).

People crossing the English Channel in boats

Cumulative total people detected by year



Note: Data to December 2023 is monthly totals, more recent figures are daily totals. Some data from the latest week may be unavailable

Source: Home Office/Ministry of Defence, latest data 26 Mar

BBC

The Prime Minister, together with the current Home Secretary, James Cleverly were, at the beginning of 2024, pleased to inform the public that the number of migrants landed in the UK from small boats had, year on year, 2022 to 2023, come down by a third. However, in the first quarter of 2024 the numbers have, in fact, gone up! In the first 3 months of 2024, the number of migrants landed in the UK, by the Border Force and the RNLI was 4,644, almost a thousand more than the 3,770 who were landed in the previous year, in the first quarter of 2023. Also, more migrants were landed this year than were landed in the first quarter of 2022, which was 4,548. If the current trajectory is maintained then the number of migrants crossing the English Channel in small boats in 2024 may exceed the number for the same period in all previous years, including 2022.

The British Prime Minister, The Rt Hon Rishi Sunak MP was quick to point out that the number of migrants landed from small boats was a third fewer in 2023 than in 2022. However, in first quarter of 2024 more migrants have been landed in the UK than in any previous year, including 2022, a total now in excess of 5,000 in 3 months.



Home Office

AN OPERATION WITH ENORMOUS COSTS

The cost to the UK for hotel accommodation alone is estimated to be in the order of £8M per day. There is also the cost of a fleet of 5 Border Force rescue vessels based at Ramsgate in Kent, together with contracted patrol aircraft, a de Havilland Dash 8 and a Diamond DA62 based at Lydd, also in Kent. In addition, a Coastguard King Air, based at Humberside Airport, near Hull, is often used to patrol the Channel; Tekever AR5 and AR3 drones have been used too. The British government has paid France some £678M, since 2018, to improve security operations on the beaches of northern France. The enormous amounts paid to the organised criminal gangs (OCGs) by the migrants are also worthy of close scrutiny, as are the impacts on social services, health care and housing.



The Beechcraft King Air is one of several aircraft types, including drones, used to patrol the English Channel spot migrants attempting to enter the UK without permission.



HMCG/2ExCel

The current amount paid to cross the English Channel in an inflatable boat is believed to be around £3,000 (US\$3,800) per person. In just 3 days, 19-21 March, 838 migrants crossed the Channel in 18 boats at a cost of £2,514,000, to the migrants. A tidy profit, for the criminals, after paying for the flimsy boats each carrying up to 50 passengers, sometimes more. Do the maths, the 4,644. migrants who crossed the Channel in the first 3 months of 2024 paid almost £14M to the OCGs. In summary, the OCGs make a tidy profit whilst the British government, the taxpayers, incur enormous costs for an operation which is, frankly, out of control, an operation with no end in sight. There is absolutely no sign of the current government, in particular the Home Office, of honouring the Prime Minister's pledge, made in January 2023, to 'stop the boats! To date, at least 70 migrants have lost their lives in the English Channel, although the full number will never be known.

Very large, flimsy, unseaworthy inflatable boats, built in China and Turkey are used to transport large numbers of migrants, 50, or more in each boat, across the English Channel from France to England.



Home Office

THE FRONT LINE

It would be very easy to blame the French for this lack of security, for criminal gangs sending migrants across the English Channel with impunity, to be 'rescued' mid-Channel by the UK Border Force and the RNLI. This would wrong. With funding from the UK Government, most recently £47M over 3 years, 800 French police officers now patrol the beaches of northern France, some 90 miles between the Baie de Somme and Dunkirk. With, in addition, drones and helicopters patrolling the rivers and canals leading to the coast. This is to counter the new tactic, used by the OCGs, to launch their boats, those carrying migrants, further inland, to avoid the beaches patrolled by teams of police officers, as well as those beaches that are now monitored with surveillance cameras.

Many of the rivers and the canals leading to the Pas de Calais have been blockaded with lines of buoys and the area, inland from the coast, is patrolled with helicopters and drones.



AFP

This operation, by the French police is not without risk and it's not uncommon for small groups of police officers to destroy inflatable boats whilst, at the same time, facing down up to 50 angry migrants armed with sticks and stones, using tear gas to defend themselves. The French police will also use their own boats to force back those boats with migrants on board, before they reach deep water. The local Com-

missioner in charge of the French police, Mathilde Potel has reported, "We have more confrontations. More hostility. So, we are forced, in order not to become victims ourselves, to use tear gas." With the plan to deport illegal migrants to Rwanda mired in controversy, the promise to detain illegal migrants and quickly remove them to their own country, or send them to a third, safe country has, so far, proved to be an empty threat, more of an aspiration than a deterrent.

At great personal risk, French police officers will stop and destroy the inflatable boats used by migrants to cross the English Channel on what a former British Immigration Minister, The Rt Hon Robert Jenrick MP described as the 'goal line', the last line of defence before illegal migrants reach the UK.



AFP

Nevertheless, the French will need more support if more boats are be destroyed than can be delivered to northern France. On occasion, in good weather, the same weather that favours the OSGs, the French Police Aux Frontiere, the Border Police, will deploy a 'spotter plane', a Cessna 182, to patrol the coast at low level between the Baie de Somme and Dunkirk to detect and to deter those migrants intending to cross the Channel. The evidence indicates that when the 'spotter plane' is deployed there are far fewer crossings. When compared to a drone the manned aircraft has a number of distinct advantages, not least the fact the airborne observer has 'eyes in the sky', making decisions above an incident in real time. Together with the added advantages of speed, reach and flexibility. This is a tactic that is worthy of greater consideration.

On occasion the Police Aux Frontiere will deploy a 'spotter plane', a Cessna 182, to fly at low level between the Baie de Somme and Dunkirk to deter and to detect those migrants intending to cross the Channel in large inflatable boats.



Wikipedia Commons

CONCLUSION

In the last 2 days of March, during the Easter weekend, the Home Office reported that 791 migrants had crossed the Channel to be landed at Dover by the Border Force and the volunteer crews of the lifeboat service, the RNLI. The headline from GB News on Sunday, 31 March read, "People smugglers condemned as 'stupidly dangerous' as 9 migrant boats launched in treacherous weather." In total 791 migrants crossed the Channel in 16 boats in 2 days, 30 and 31 March. This brings the total number of migrants landed in the UK in the first quarter of 2024, January to March, to 5,435. This is 1,665 more than in the same period in 2023 (3,770) and 887 more than in 2022 (4,548).

Since 2018, 118,989 migrants have crossed the English Channel in small boats. In the same period there have been 4 Prime Ministers, 5 Home Secretaries and 2 Acts of Parliament each dealing with illegal migration, with a third Act, 'Safety of Rwanda (Asylum and Immigration) Act' pending. This year there will also be a General Election when, without any doubt, illegal migration will be an election issue. The British public may decide to vote for a change in government, frustrated by the current, Conservative government which has proved itself to be incapable of securing the nation's borders. In simple terms, incapable of stopping a rubber boat full of migrants from crossing the English Channel between France and Britain!

James A Cowan MBE

Note: The author, like many aviators, began flying as an air cadet and continued his flying career in the RAF where he flew two of the largest military aircraft, the C-130 Hercules and the BAE Nimrod, the 'Mighty Hunter', as well as the smaller training aircraft, the DHC1 Chipmunk, the Bulldog and the Grob Tutor. After retiring from the RAF, he continued to fly as a police pilot and as an air ambulance pilot, flying the ubiquitous BN Islander in the Northeast of England and in Scotland. He's written a number of articles about his experiences as airman and as an offshore sailor. Most recently, 'A better way to stop the boats', the use of light aircraft as 'spotter planes', to support the French police to detect and deter migrants from using small boats to cross the English Channel to enter the UK without permission, was published in the popular general aviation magazine, *PILOT*.



RNLI

On March 4, 2024, the Royal National Lifeboat Institution (RNLI) celebrated two centuries of saving lives at sea – thanks to volunteers giving their time to save others, all funded by public donations.

The RNLI has been saving lives at sea around the UK and Ireland for 200 years, since the charity was founded and in that time its volunteer lifeboat crews and lifeguards have saved an incredible 146,277 lives.

To mark the significant milestone a Service of Thanksgiving was held at Westminster Abbey in the presence of His Royal Highness The Duke of Kent as President of the RNLI and attended by representatives from every RNLI lifesaving community around the UK and Ireland.

Two centuries have seen vast developments in the lifeboats and kit used by the charity's lifesavers – from the early oar-powered vessels to today's technology-packed boats, which are now built in-house by the charity; and from the rudimentary cork lifejackets of the 1850s to the full protective kit each crew member is now issued with.

The RNLI's lifesaving reach and remit has also developed over the course of 200 years. Today, it operates 238 lifeboat stations around the UK and Ireland, including four on the River Thames, and has seasonal lifeguards on over 240 lifeguarded beaches around the UK. It designs and builds its own lifeboats and runs domestic and international water safety programmes.

While much has changed in 200 years, two things have remained the same – the charity's dependence on volunteers, who give their time and commitment to save others, and the voluntary contributions from the public which have funded the service for the past two centuries.

There is currently controversy over the role the RNLI plays in the English Channel. They have been seen to go beyond their strict criteria for lifesaving – some say because the Border Force have not been undertaking their own tasks efficiently. They are the UK government-funded agency with primary responsibility for maritime search and rescue (SAR) but they do not have any rescue vessels of its own. Unlike the RNLI vessels, Border Force boats were not designed for SAR activity, although they were the UK's "principal assets" for responding to vulnerable migrant boats. [Guardian]

INDUSTRY

Last month PAN reported on the latest developments in the hoped-for return of **Doncaster Sheffield Air-port** (DSA) also known as Robin Hood Airport after is closure by the Peel Group precipitated the departure of NPAS and 2Excel air operations to other airports. In recent days 2Excel has issued a statement on their position.

"Since Peel Group announced the closure of Doncaster-Sheffield Airport back in 2022, 2Excel has been continuously engaged with City of Doncaster Council to support the local authority's ambition to reopen the airport.

"Doncaster airport is a nationally significant, strategic asset that should never have been allowed to close. The loss of 2Excel's Main Operating Base has cost our Company millions of pounds in additional expenses from being forced to relocate our aircraft and engineering functions to a clutch of other airports. In better times 2Excel fleet on the flight lines at DSA ©2Excel

"We are greatly appreciative of the Council's tireless efforts to take on a lease for the DSA site and its determination to restore commercial air transport. While returning Doncaster's facilities to what we previously enjoyed may take many months, we are together exploring options that would enable unlicensed flights to and from the site, similar to how we operate at Lasham airfield, home of our sister company 2Excel Engineering, until such a time that Doncaster reopens to commercial traffic.

"We want to reiterate our support for City of Doncaster Council and the fantastic work they've completed so far, never losing sight of the end goal of reopening the airport by partnering with an established operator. Reopening would see 2Excel restart flight operations from Hangar 3, bringing back high-value, highly skilled and well-paid jobs to the local area and pave the way to increase our presence at the site to match our Company's ambitious growth plans."

In response to the expansion of the vertical lift industry with the boom in electric and hybrid-powered aircraft development, the Helicopter Association International (HAI) trade association has rebranded itself as **Vertical Aviation International** (VAI). The development is not really news, some type of rebranding was on the books last year, but the latest, and last, HAI Heli Expo opened with the announcement in the final days of February. From now on the Heli-Expo is to be rebranded as the VAI Verticon.

The American Helicopter Society, a different entity, rebranded itself as the Vertical Flight Society in 2018 and there appears to be a danger of confusion with HAI now moving into a similar space until the new identity is embedded in the consciousness of the audience.

Clearly the 'helicopter' is dead.

Whether it is necessary is a matter of debate. I guess under the new title the Verticon next year can dispense with helicopters and now quite correctly bring any old vertical lift aircraft into the hall. Who knows, it may be refreshing to see a Hawker Harrier or a Saturn 5 taking up the space! Define vertical lift?

In scenes drawn from the madhouse this is clearly something driven by marketing people intent on any old rebranding. Like the transfer from ALEA to APSA in 2018 we may well get used to it but personally – six years on – I think ALEA and correct myself to write APSA almost daily.



©Flight International

Heli-Expo—the show's 35th-anniversary edition and final under that branding—set a new record attendance, attracting 15,000 people to the Anaheim Convention Center in California.

Visitors from 87 countries saw 63 (mainly rotary wing) aircraft on display, along with the latest technology, products, and services for the vertical aviation industry. The show featured 125 educational and training courses on topics ranging from aerial firefighting to automation, which were attended by nearly 4,200 participants.

Next year's conference and exhibition—to be held in Dallas from March 10 to 13—will be rebranded as VAI Verticon in line with the organization's name change.

Copyright Notice: The content of this publication includes items that are the copyright of others. Where the information is available the source of words and images will usually be indicated together with the source of additional information that seeks to enhance the original information.

Police Aviation News includes materials produced for it by Ian J Commin of Insight Design of North Burnham, Slough SL1 6DS. This includes the banner titles and the PAvCon logo. In addition from time to times images specifically altered by Insight Design and others but originally produced for McAlpine Helicopters [now Airbus Helicopters UK], Oxford, will appear with permission of the original owner. In some cases it may not be possible to indicate the source of this material directly associated with the images used, or such information may have been lost. Such images may be marked 'File' or 'PAR Collection'.

Leonardo and **Bristow Group Inc.** announced a framework agreement including firm orders for 10 AW189 super medium helicopters plus 10 options.

Bristow is currently operating 21 AW189 helicopters globally with another five due off the assembly line in 2024. The new framework agreement covers a fleet expansion plan for the 2025-2028 period. Bristow uses the AW189 in its Offshore Energy Services business line as well as in its Government Services business line supporting search and rescue operations in the U.K., the Netherlands, and beginning in 2025 in Ireland. The leading super medium AW189 delivers modern and safe long range, high endurance, and high capacity, similar to larger- and heavier-type helicopters, while allowing lower operating costs. In 2022, the companies signed a 10-year global service agreement for Bristow's offshore fleet, applying to their AW139 and AW189 fleet, in operation across the globe. This unique service agreement is intended to deliver more efficient overall logistics and savings to the operator, highlighting the value of Leonardo logistic service offerings, increasing performance across geographies.

Helitak Firefighting Equipment, an Australian-based aerial firefighting tank manufacturer, announced on February 22, 2024, that the company was expanding its operations in the United States. The company has recently secured the lease of a 20,000-foot property at Camarillo Airport in California, where it will expand its operations in the United States. The new 20,000-foot facility will mirror the production facilities of its Australian base in Lake Macdonald, Queensland, where the company currently produces its range of tanks that are exported around the world for customers utilizing one of the many proprietary external tanks for type one, two and three helicopter aerial firefighting operations. Expansion of the company facilities to in the United States will primarily focus on tanks for the recently FAA-certified FT-11K CH-47 tank, the FT4500 tank for the Sikorsky UH-60, and the soon-to-be-certified in the United States FT-1300 tank suitable for the Airbus H-125/AS-350.

The Helicopter Company (THC), Saudi Arabia's premier provider of commercial helicopter services and fully owned by the Public Investment Fund, has signed a historic framework agreement with Airbus at the HAI Heli-Expo.

The framework agreement will include up to 120 Airbus helicopters of various types set to be delivered over the next five to seven years. Part of the deal is a firm order for eight H125s along with 10 H145s that are converted options from an earlier contract, bringing THC's total firm Airbus helicopter fleet to 60, 25 of which are already in service today.



The new H125 helicopters will support the delivery of THC's range of services in areas including aerial work and tourism. The H145s will be used in a variety of roles including Emergency Medical Services (EMS) and corporate transport.

The relationship with THC started in 2020 with the first contract for 10 H125s. Since then, it has gone from strength to strength, moving beyond just helicopters.

Bell has signed an Agreement with Abu Dhabi Aviation to establish its role as an authorised **Bell Customer Service Facility** (CSF) and provide service for Bell 212, Bell 412 and the SUBARU Bell 412EPX commercial aircraft. This new agreement further demonstrates both organisations' dedication to providing exceptional customer support and showcasing Bell's aircraft to customers in the Middle East region. Abu Dhabi Aviation is the largest commercial helicopter operator in the Middle East, with 61 helicopters and four fixed wing aircraft and has accumulated more than 1 million flight hours on its Bell fleet. Bell shares more than 45 years of history providing world-class aircraft to the operator for medical evacuations (MEDEVAC), charter flights and offshore support.

Air Center Helicopters, Inc (ACHI) based in Burleson, Texas, has signed an Airbus HCare In-Service contract to support their fleet of 18 H225 helicopters for the next five years. ACHI uses the versatile H225 aircraft to carry out a wide range of missions across the globe, including but not limited to expeditionary airlift, personnel recovery, search and rescue, medevac/casevac, Department of Defense real world scenario training, ship-based services, and disaster relief.

The full-by-the-hour (FBH) programme provides 'tip to tail' replacement coverage of components and is paid at a fixed rate per flight hour. This results in decreased aircraft downtime and more stable maintenance expenses for ACHI. ACHI was previously supported by Airbus through HCare parts-by-the-hour contracts for 10 of its aircraft, as announced in 2019.

As the latest addition to the Super Puma family, the H225 is recognized for its high performance in challenging conditions as well as its outstanding range and payload capacity. The aircraft's state-of-the-art avionics and

N572AC

autopilot systems provide increased safety, while reducing pilot workload.

HCare is Airbus Helicopters' comprehensive services offer, providing superior customer service support in five domains: Material Management; Helicopter Maintenance, Repair and Overhaul (MRO) and upgrades; Technical Support; Training and Flight Operations and Connected Services. With this contract, ACHI's entire fleet of Airbus helicopters will benefit from the HCare In-Service Part availability contract.

Air Center Helicopters operates a mixed fleet of helicopters including the EC225LP, Airbus 332L1, AS350B3e AStar, Bell 206B3 and Bel 412EP and is the only commercial operator in the world to receive Commission on Accreditation of Medical Transport Systems (CAMTS) Special Operations/Expeditionary Accreditation certification. The CAMTS accreditation itself is considered as one of the most prestigious certifications a medical air transport company can achieve. In addition to their NREMT-P certification, all the medics maintain the following credentials: Basic Life Support, Advanced Cardiac Life Support, Prehospital Trauma Life Support, Pediatric Advanced Life Support, Tactical Combat Casualty Care, Blood Product Administration, and Ventilator Operations. These credentials allow our medical teams to provide Advanced Life Support and some Critical Care levels of treatment. All medics are required to take additional medical education through both in class, and on-line programs.

Bell Textron Inc., and **Leonardo S.p.A**., have signed a Memorandum of Understanding (MOU) to evaluate cooperation opportunities in the tiltrotor technology domain.

As global leaders in designing, manufacturing, and supporting rotorcraft for commercial and military applications, Bell and Leonardo share a multi-decade history of industrial cooperation on both traditional helicopters as well as tiltrotor technology collaboration.

The cooperative effort will begin in earnest with the NATO Next Generation Rotorcraft Capability (NGRC) Concept Study #5, where Leonardo will take the lead on a tiltrotor architecture proposal with Bell in support.

Bell Textron Inc. announced an order for four Bell 429 aircraft for parapublic operations in the Middle East. These aircraft will join the 90 Bell 429s supporting law enforcement, firefighting and parapublic missions globally and add to Bell's total fleet of 500 Bell 429s worldwide.

Airbus Helicopters and **Bristow Group** announced a framework contract for up to fifteen H135 helicopters (five firm orders, plus 10 options) during this year's HAI Heli-Expo. The delivery of the first helicopter is scheduled for October 2024.

Bristow Group Inc. is a leading global provider of innovative and sustainable vertical flight solutions. Bristow primarily provides aviation services to a broad base of offshore energy companies and government entities. Bristow's aviation services include personnel transportation, SAR, medevac, fixed-wing transportation, unmanned systems, and ad hoc helicopter services. Bristow already operates a fleet of 10 H135 family helicopters.

The light twin Airbus H135 incorporates the most advanced technologies available, including Airbus Helicopters' Helionix avionics suite, which, in addition to the 4-axis autopilot, offers an innovative cockpit layout to enhance situational awareness. Designed with three large electronic displays on the H135, the cockpit is night vision goggle compatible and includes a First Limit Indicator which highlights the appropriate engine instrument data for the pilot in one indicator.

To date, more than 1,500 helicopters of the H135 family have been delivered worldwide, clocking in more than 7 million flight hours.

In February 2024, Leonardo and **Metro Aviation**, a privately-owned HEMS (Helicopter Emergency Medical Service) operator and service provider in the US, have announced the signing of a Distributor Agreement for the AW09 next generation single engine helicopter.

Due to the current development, Metro will act as a Leonardo distributor for the type in the US and Canada for all civil market applications. The Distributor Agreement includes a commitment for 30 units that will translate into Preliminary Sales Contracts.

This latest deal builds on the collaboration started at Heli-Expo 2023 aimed at supporting the introduction and positioning of the AW09 in the USA and in doing so, benefitting from Metro Aviation's renowned experience and capabilities in the development of Aircraft Interior & STCs (supplemental type certificates), service and training.

CNC Technologies announced the installation of a full law enforcement mission suite for the new Maryland Department of Natural Resources (MD DNR) Airbus H125 helicopter.

This is the first new aircraft for the MD DNR and will provide an advanced level of aviation support for the entire state of Maryland.



Aircraft completion was conducted at Metro Aviation in Shreveport, LA, who provides aircraft completions for many law enforcement agencies across the United States and is a solid partner with CNC Technologies.

CNC Technologies equipped the aircraft with a Wescam MX10 IR/EO camera, Shotover ARS750 augmented reality system moving map, Shotover ION video recorder, Trakka TLX searchlight, Troll downlink equipment (including Linkbox II transmitter and Mini II directional antenna), and MacroBlue video monitors. Additionally, CNC will provide their signature, 24/7/365 service, support, and training.

In Thailand the Interior Minister Anutin Charnvirakul has said he would appeal a funding request rejection for two Kamov Ka32 helicopters for the ministry's **Department of Disaster Prevention and Mitigation** (DDPM). Mr Anutin, who also serves as deputy prime minister, said the DDPM needs two more Ka32s and the first purchase should come from the 2024 fiscal budget and the other in a later year. He added that these helicopters are even more important now the country has to deal with more wildfires and haze pollution than in the past. The DDPM currently has four Kamov Ka32 helicopters, which are not enough to fight wildfires and haze pollution and conduct rescue operations.

Equinor secures 15 new helicopters for passenger traffic on the Norwegian continental shelf (NCS) through contracts with helicopter manufacturers Bell and Leonardo. After an extensive process, Equinor has qualified new helicopter types for passenger transport on the NCS. Under these contracts, Equinor will receive ten new Bell 525 helicopters and five AW189 helicopters.

SKYCO International Financial Leasing Co, a public-sector enterprise owned by China's Guangdong province, has signed a deal with Airbus Helicopters. The company will take delivery of six H175s. The provincial government is expected to deploy the aircraft on a variety of SAR, EMS, and disaster relief operations.

In 2020, Apex Aviation decided to purchase a state-of-the-art multi-mission Tecnam P2012 Sentinel SMP to enhance the organisation's operational capabilities. Since then six were placed on order.

Upon joining the company's fleet in 2021, the first P2012 Sentinel SMP was deployed on multiple missions, including parachute jumping and aerial tours. To undertake Medevac operations Apex Aviation introduced a second P2012 SMP to the fleet last year. The next project is an aerial patrol version aimed at the Taiwan Coast Guard.

Apex flew 103 medical missions with the P2012, totaling 333 flight hours, bringing relief and assistance to various areas in Taiwan, and in many cases saving lives. Apex's MEDEVAC team consists of 8 pilots, 5 mechanics, for 4 Tecnam P2012s.



The Italian-made P2012 aircraft is capable of carrying nine passengers and two pilots. The introduction of the aircraft into the Apex fleet provides their customers with cost-effective and various configuration options, while always offering experiences that exceed passenger's expectation, such as air-conditioning, inseat power, widest legroom in its class and under-seat storage space.

Based in multiple international locations Vitec is a leader in advanced video encoding and streaming solutions, is an end-to-end video streaming solutions provider for broadcast, military and government, enterprise, sports and entertainment venues.

Vitec are looking at exhibiting at future editions of the PAvCon Europe event but this year they will, like many before them, walk the floor and assess the value to their market. This month they are in Singapore exhibiting at the Sands Expo demonstrating their military grade TOUGH portable HEVC & H.264 streaming encoders as well as the EZ TV ISR™ content management solution, designed for government and military applications.

For Vitec PAvCon will be mainly the police market and they ae already in that market. A German Police Helicopter Squadron decided to upgrade its video transmission system on its fleet of state-of-the-art Airbus EC135 helicopters. The helicopters' existing onboard video cameras had been connected to a rugged encoder for generating network video transport streams. These streams were then transported and encrypted by a team2applications MLX100 cell/satcom router over attached cell antennas and transmitted via a mobile network provider to a field-proven video management system. At times, the existing DVB-T

based video downlinks suffered from availability in rural landscapes and also involved the time-demanding installation of a ground-based receiving vehicle.

This situation had become increasingly unsatisfactory as the captured videos need to be used for situational awareness, patrolling information, and intelligence-gathering missions. The new system would need to be an airworthy-grade, certifiable solution and available off the shelf.

The bespoke solution features team 2MLX100/VRX211/NGR421 Routers, VITEC single channel HEVC/H.264 MGW Pico+ TOUGH Encoders or MGW Diamond TOUGH HEVC/H.264 quad-channel Encoders, and airworthy antennas designed by team 2. All units are housed in ruggedised enclosures, and all products are airworthy-grade, designed specifically to support mission-critical intelligence, surveillance, and reconnaissance (ISR) from both manned and unmanned airborne platforms operating in extreme conditions.

Through the Airbus EC135 Retrofit programme, the equipment was contained in a ruggedised roll-on-/roll-off rack, installed in the helicopters within 5 minutes, with seat-rail quick locks attached to the airframe, and easily connected to the helicopter's standard power outlet and the video-cameras to 3G-SDI video outlets.

The FAA has certified the **Bell Textron Inc.**, Basix-Pro Glass Retrofit Kit for Bell 412EP models. The new glass cockpit retrofit kit benefits include reduced pilot workload, increased precision and improved situational awareness.

The Bell BasiX-Pro Glass Cockpit Retrofit Kit uses the current Bell production displays from Astronautics and Garmin avionics by upgrading analogue instruments to a full glass cockpit featuring the latest technology and state of the art instrumentation that is common with current SUBARU Bell 412EPX and Bell 429 aircraft. Astronautics has a proven record of dependability with hundreds of fielded displays, achieving high reliability with more than one million flight hours. Garmin has become the aviation standard for COM, NAV, and GPS integrated solutions.

Bell is under contract to complete a fleet upgrade of several analogue Bell 412EPs. They will offer the BasiX-Pro retrofit kit through Aeronautical Accessories with retrofits being performed at Bell's global completion centres.

ACCIDENTS &INCIDENTS

28 February 2024 Sikorsky S-92 LN-OIJ SAR aircraft owned by Bristow, Norway, crashed into the ocean off the west coast of Norway, around nine nautical miles west of Bergen, while on a training mission. One female person died and five were injured. The six people on board were hoisted from the sea by rescue workers, but one was later declared dead in hospital. One of the five survivors had only light injuries while the other four suffered varying degrees of injury.

Energy group Equinor said the helicopter was a search and rescue aircraft normally serving platforms at the company's Oseberg oil and gas field in the North Sea. The largely intact wreck sank to 220 metres upside down and was recovered within days and taken to Haakonsvern naval base. [Bristow]

28 February 2024 Cessna 208 Caravan 1 PT-PBC operated by the Secretaria da Segurança Pública e Defesa Social Pará (Secretary of Public Security and Social Defence). The aircraft took off on an unspecified police mission from Maestro Wilson Fonseca aerodrome (SBSN), Santarém, PA, bound for Fazenda Tambaú aerodrome (SD8G), Alenquer, PA, with two crew members and six passengers on board. During landing, the aircraft lost control on the ground and left the runway.

28 February 2024 Eurocopter EC135 N911XM Air ambulance of Air Med Services LLC. Helicopter was sent to a small community hospital to transport a patient. An un-announced small construction project had occurred there. As the pilot was making its approach at approx. 20ft AGL, a piece of plastic wrapping became entangled on one of the four main rotor blades. The pilot felt the controls were not performing as normal and set the aircraft down on the helipad and shut the aircraft down. The mechanic could not identify any damage. In an abundance of caution, the aircraft was grounded until performance data could be downloaded and analysed which occurred the next morning. The hospitals air transports were ceased until an onsite visit could occur. The crew was grounded for the night. The next day, the oncoming crew retrieved a spare aircraft, and the base was returned to service. A test pilot flew the aircraft after the analysis showed no exceedances occurred. The aircraft was returned to service the next day.

4 March 2024 Piper CubCrafters Carbon Cub FX-3 N505UC of Utah County Sheriff's Office. Aircraft operating from Spanish Fork Municipal Airport/Woodhouse Field, Spanish Fork, Utah, USA. Landing after a surveillance mission the aircraft ground looped and suffered a gear collapse. The pilot and passenger

were not injured. [ASN]

- **5 March 2023 Leonardo AW139 M72-01** Malaysian Coast Guard (MMEA). The aircraft took off from Sultan Abdul Aziz Shah Airport, Subang, Selangor on a training mission and, around 10 minutes later, crashed in open water in the Strait of Malacca near Angsa Island for unknown reason. Remained floating upside-down support by floatation devices. Four people rescued by AS365N.
- **5 March 2024 Airbus AS350 N853MB** Air ambulance of *Banner Health's Med Evac*. As the helicopter was en-route to a hospital a bird strike into the right-hand front screen caused a medical helicopter to make an emergency landing in a field of stubble near Fort Morgan, around 80 miles NE of Denver, Colorado. Three flight staff, including two nurses and the pilot, were on board when the helicopter landed north of Fort Morgan in the area of I76, Highway 52 and County Road T. [Fox 31/CBS]
- **6 March 2024 Cessna 208B Grand Caravan PR-AAB** Policia Federal Brasil. Aircraft with three aboard took off from Belo Horizonte/Pampulha Carlos Drummond de Andrade Airport, MG, climbed to about 2,000 feet and fell from the sky. Crashed upright at the end of the runway. Burned and destroyed. Two of the occupants died. [Media/ASN]
- **8 March 2024 Airbus Helicopters UH-72A Lakota** Army National Guard, Joint Task Force North, Fort Bliss. Helicopter patrolling the USA Mexico border Rio Grande City, Starr County, Texas with three crew and Border Patrol agent crashed in open ground killing two crew and the agent. One soldier survived but remains in critical condition. Airframe hit ground upright but apparently at high sink rate and was destroyed. The three killed were: Chief Warrant Officer 2 Casey Frankoski, 28, and Chief Warrant Officer 2 John Grassia, 30, both with the New York National Guard; and Border Patrol Agent Chris Luna, 49.
- **16 March 2024 Leonardo AW139 I-COLK**, operated by Avincis on HEMS duties.. Operating from Borgosesia HEMS base in the Piemonte Region, northern Italy) was involved in a hard landing when performing a rescue at 4500 metre altitude in the Italian Alps just short of Regina Margherita hight alpine refuge (the highest mountain refuge in Europe) built on top of mount Rosa at 4,634 metres, one of the highest mountains in Europe and second only to Mount Bianco. There were four persons on board: the pilot, hoist operator, mountain rescue man and mountain operator with avalanche search dog; all four on board escaped the wreck uninjured despite severe damage.
- **21 March 2024 Beechcraft C90 King Air HK-4684** Air ambulance operated by Sky Ambulance in Colombia. The 1981 Beechcraft undertaking an ambulance flight from 90 King Air, performing an ambulance flight from Montería-Los Garzones Airport to Medellín-Enrique Olaya Herrera Airport, crashed under unknown circumstances near Yarumal, Antioquia. The two pilots, a medical doctor and a nurse died, and the aircraft was destroyed. The aircraft appeared to be undertakling a letdown under control. The aircraft came down heavily in a level attitude on slightly sloping grassland, the wings and fuselage being damaged and broken. No sign of life and a fire burning. As would be rescuers reached it, it exploded into flames and those inside could not be saved. [ASN]

SAFETY

Last month the UK AAIB issued a report on a previously unknown accident/incident to a UK police aircraft in August last year.

A Britten Norman BN-2T Islander G-BSWR. Police Service of Northern Ireland, operating on patrol by a pilot and two police officers on August 16. The pilot was flying VFR at approximately 1,500 ft when the aircraft and rudder pedals started shaking violently. He said he had been airborne approximately 1.5 hours and whilst yaw control was difficult, the aircraft was still controllable. The shaking continued irrespective of the force he applied to the rudder pedals, and it became worse when the speed was reduced. A rear-seat observer looked out of his 'bubble' window and estimated that the top of the vertical stabiliser was moving side-to-side approximately 30 to 40 cm. The pilot was unsure about the aircraft's structural integrity, so he declared an emergency and diverted to a known private airstrip about 5 nm away. The landing at the airstrip, Tandragee, County Armagh was uneventful, but the aircraft was described to be 'severely shaking'. Visual examination found that the rudder trim tab was not connected to its control rod (Figure 1). The two items are normally connected using a bolt, nut and split pin, but none of these components were recovered. The bearing in the control rod eye-end was reported to be free to rotate, and it was deemed to be acceptable for further flight. The aircraft made an uneventful landing after the rudder trim tab separated from its control rod. The missing bolt was not recovered so the investigation could not ascertain a definitive cause.

In the background of the AW139 accident in northern Italy on 16 March (on previous page) an on-line argument/disagreement started on social media (Facebook). The general principal is that there are issues with the AW139 helicopter operating at altitude that some are trying to suppress. It is being presented as something not far removed from the arguments being presented on the production and support arguments on the Boeing 737 series of airliners.

There are physical limits and in case of the IFR Offshore helicopter AW139 it is the tail rotor authority and there are calls for this helicopter to be banned from high altitude rescue operations at max OGE performance which is even not sufficient on a nice day.

At an early February meeting of the European Helicopter Association in Brussels Leonardo is said to have tried to stop an improvement in the regulation process which did not perfectly fit their product line of helicopters.

The issue highlighted is not restricted to the AW139 – there have been other reports about a similar problem being highlighted on such as the AW109. Other Agusta design related tail rotor issues have been raised in the past and often it is difficult to get a sensible discussion going without parties raising the threat of litigation. The background with Boeing is of course very similar.

The basic premise of the Facebook discussion was that pilots should freely discuss these issues – whether real or supposed - while they can.

UNMANNED

LETTTER FROM AMERICA - DFR IN THE USA

DFR is the new buzz word here in America. It is one of the main topics of conversations at Police Chief and Sheriff conferences all over the world. The concept was first started by Chula Vista, California, PD by Chief Roxann Kennedy in 2018 (most likely is the stats you are referring to below). The idea of sending out a drone as a first responder on 911 calls has worked out very well for them and showing pretty impressive statistics. They initiated a massive public relations campaign in the beginning to show the public how the program would work to gain their acceptance. Their program is very transparent, the citizens love it, and it has lowered crime stats.

Any agency wishing to employ the technology, must of course first obtain a Beyond Visual Line of Sight (BVLOS) waiver first, and Notice to Air Missions (NOTAMS) must be filed with the FAA. Most BVLOS waivers will allow operations out to about 2 to 3 miles. It will be a while before we see operations extended beyond this number. (The FAA has yet to release a BVLOS or Part 108 Notice of Proposed Rulemaking, the first step in the regulation process. Remote ID took five years to enact.) Once these departments meet the minimum requirement and get the proper approvals from the FAA, they can launch each drone to the location of a 911 call, as a first responder, to observe the scene and see if the offense is still taking place. If nothing is found or the perps have left the scene, officers can be cleared up to respond to other more important calls. Works great for shots fired calls, or fights in parking lots, or reports of suspicious actors lurking in the area.

Elizabeth City, New Jersey has started a program and is having great success with it so far. Even Dallas PD's Information Technology Unit is looking into starting a DFR program, even though the department has a full-time crew dedicated to sUAS missions and is training patrol officers how to use them.

There are 17,541 state and local police agencies, and over 34,000 paid fire and volunteer fire departments in the United States, and only about 435 of those have crewed aviation assets. sUAS gives all these agencies access to aerial views and observations that they have never had in the past, except at a very hefty price tag. It will be decades before we see the replacement of crewed aviation assets in public safety agencies (five years is a very generous assumption and a pipe dream IMO). To bandy a cliché, we must crawl before we can walk, and we must walk before we can run. Uncrewed aviation is nearly to the walk stage, but we still have to solve the airspace deconfliction issue first. The next logical step is DFR – everybody wants it – and they want it now!

Mark Colborn Dallas PD

Mark subsequently forwarded an article written by CBS in the USA about the operation in Chula Vista. According to the overview the article puts forward, while this programme is certainly important in the broad development of drone technology in serving the police it does not come across as earth moving.

The multiple drones are said to cover just three-square miles, the majority of the geographic area of Chula Vista. Norwich City is said to cover 15 square miles so a similar level of coverage may be assumed to require more than twenty drones – a number that is seemingly impractical.

The article highlights issues of where to store the drone footage and how long for – an increasing problem in Britain

but a real paranoia in the USA with their worries about being overlooked.

There appears to be a disconnect on just how the scheme has helped in terms of solving crime. Numbers supplied to CBS covering the total number of drone flights from January 2022 through to February 13, 2024, show that the department dispatched drones a total of 8,883 times over the period, 11 flights a day.

In the numbers it seems there were responses to homicides (2 calls), prostitution (2 calls), weapons at schools (1), and arson (42 calls). The majority, 66%, of drone flights were initiated to assist officers on calls.

Of these just 21 resulted in an "arrest or citation" but it clearly depends on what outcomes are expected from the British version of the system. The US data shows that Chula Vista Police the vast majority of flights, or 17% of the total number of calls, were to check out general disturbance calls. The next highest category, 11%, were flights where the police would not even detail the reason to the media, but they may have told 'official' sources.

What may hold them back on telling anyone is the threat of litigation, it appears very high and may represent something of a black hole of information as far as understanding how well the scheme is doing.

There is a costly and long-running court case filed by a local newspaper waiting on the steps of the California Supreme Court since 2021. It relates to a request for drone footage to see how police were using the drone technology. Chula Vista Police denied the request as they think it is exempt from handing over as a Public Record. The newspaper sees the recorded air-to ground footage of homes and gardens as a threat in that it was not obtained with the backing of a warrant. That is a long standing and very US argument that so far affects few other nations.

SkyDrop founder Matthew Sweeney announced on LinkedIn that the company is closing down. Unfortunately, the Federal Aviation Administration regulations to enable commercial drone delivery at scale continue to take much longer than anticipated.

Last July, SkyDrop completed the first store-to-door drone delivery approved by the Civil Aviation Authority in New Zealand history, successfully delivering Domino's and FedEx packages. On this same day, Sky-Drop ran out of money and furloughed the team. The board spent the next six months to strike deals that would allow them to move forward in establishing a viable business.

In late February SkyDrop filed Chapter 7 bankruptcy.

MOVE ALONG THERE

TWO BE OR NOT TO BEE!

On March 12, 2024, A swarm of honeybees forced a California Highway Patrol helicopter to remain grounded in Atascadero California. The AS350 N983HP featured in a KTLA5/YouTube video taken over by swarming bees The crew waited for a beekeeper to appear and remove the swarm before setting off on patrol.

STOP ME AND RIDE

As ever nuggets of disinformation continue to excite the newspapers – particularly during periods of no real news.

Despite the impending threat of Vlad Putin and others to blow the whole world up any time soon the newspapers grab onto stories about how the near future will be enhanced by numerous flying electric taxis and drones filling the sky by 2028. That of course is just four years away and about the time the British police have taken to decide to maybe, perhaps, order a new conventional helicopter that might arrive in service in two years' time. And that is proven technology not some pie in the sky project!

Many of us see this whole scenario as improbable still (especially in the time scale proposed) and have no expectation of calling an electric vertical taxi to take us across town any more often than we take a ground taxi now to cross the road (the exception being the USA where it is confirmed that it is some sort of an offence to cross the road using your feet).

AND ON THE GROUND

And on the technology front it seems that the march of the Electric Vehicle (EV) is inexorable. Slow progress in the transition to electric vehicles in the USA supposedly received a new boost last month when the Biden administration announced it has finalised the strongest-ever pollution standards for cars and light trucks for model years 2027 through 2032. The new Environmental Protection Agency standard would require car manufacturers to increase sales of electric vehicles while cutting carbon emissions from gasoline-powered vehicles. As someone who has seen the less than impressive roll out of the EV in the tiny islands of the British Isles – they are challenged on range and recharge facilities - I really fail to see how they can ever work in the vastness of north America.

THE WAGES OF SIN

The Police Federation of England and Wales has announced that more than one in five police officers are planning on quitting the police service, with 78% highlighting poor government treatment as the influencing factor.

Findings from the Police Federation of England and Wales' Pay and Morale Survey, published last month, revealed low morale is increasingly impacting staff retention.

Workload remains problematic, with levels unsustainable to the point of officers being unable to take the breaks they are due and 86% do not feel that there are enough officers to meet demand.

Money, or the lack of it, plays its part, with 18% reporting they never have enough money to cover their essentials.

The survey also found rates of physical and verbal abuse from the public are high and officers are not getting the equipment and support they need. The Federation report then goes on to highlight injuries on duty and the lack of doubling up on patrols.

Ed: Historically we never had an excess of public money, were often verbally abused by our customers and seem to endlessly get injured in small ways that we were expected to brush off as part of the job. Fifty years ago, it was a disciplinary offence to 'double up' when crewing or patrolling so there is little positive support for such arguments in the ranks of the long retired. They understand that times have changed and evidentially now two voices are better believed than one, but they rarely had that luxury in their time. As I see it, that is why we were effectively burned out by the age of 50, many even before that.

Now though the present government expects more from police whilst paying less for significantly longer service. It has always been a job for the young and extending service was chronic bad management by the Government, The Home Office and police representatives. If the latter had really understood the nature of police work while scrabbling over each other's backs in grasping ever more rank status, awards and money they might have been able to hold back the negative effects foisted on them by governments of all shades and beliefs. Nothing like a Knighthood and a couple of medals to accompany you to the grave.

On the aviation front a lack of funding for new equipment – whilst waving an effective red rag in the face of hard-pressed British police in sending money to bolster the resources available to the police in France - is totally unfair if not simply criminal. All that money granted to France is way more than is required to completely change the UK police air fleet and fully support the needs of the only important people in this country – the patrol officers and the public.

PEOPLE

OBITUARY: Brian Allinson (1945-2024) died in early March; he was 79 years old. Brian was a key figure in setting up the Filton, Bristol based Western Counties Air Support Unit (and its forebears) and was well known for his general opposition to the National Police Air Service (NPAS) when it came along and swallowed up the existing unit and all the others around.

Fortunately, I do not need to recount his full life history as he published his autobiography, *A Long and Winding Beat* a few years ago. It started out as just a record for his family but became available to a wider audience recounting a life and the police service and aviation from the 1960s.

Early and regular promotion saw him rising through the ranks until he later retired as a Superintendent in 1998. The development of Police Air support became a passion, eventually leading to a second career as an International Police Air support advisor He went on work as a consultant with Eurocopter Helicopters in Oxford and regularly went on information tours to foreign parts selling police aviation practice across the world – including the Peoples Republic of China. That was in the days when British police aviation was looked on in awe and people like him were well respected. His main task though was to visit each and every air support unit in the UK to spread the word and to take feedback – and even complaints – back to his masters in Oxford.



An interest in local politics saw him elected as a local Councillor in 2001. He had the honour of Chairing South Gloucestershire Council in 2019 and was able to celebrate over 50 years in Public Service.

The post-retirement career came crashing down to earth when a senior police officer took exception to Brian's transparent disquiet on how NPAS was progressing. In 2011 Brian had been briefing his local Member of Parliament on police aviation – a task linked to his political status, not one where he was broadcasting his views far and wide. The NPCC police aviation lead on the new NPAS project, Chief Constable Alex Marshall, had come into possession of his briefing notes to the politician and was raging. Marshall took his rage to Oxford and 'discussed' the situation with the management of Eurocopter. Brian was

seen to be in a vulnerable position and the complaint resulted in his services being dispensed with. As far as I am aware his important role was never replaced. He was one of the first, but not the last, victims of a new era in police aviation.

Whether a senior police officer should have that option to demand such action from Oxford in the first place is a moot point. There seems to be an arrogant assumption in high places that what they think over rules all other thought or considered opinion. With what we now know, it might be seen by some as a consistent line of action by many members of the NPCC in the face opinions, a view subsequently endorsed by many and confirmed by developments.

Quotes from recent e-mails and posted last month on Rotorheads:

The sad loss of a good person with more integrity than many around him.

Rest in Peace Tigerfish, it was a pleasure to have known you and your passion in Police Aviation before things took a turn.

The loss of a very knowledgeable voice within aviation. RIP

Brian Allinson's funeral service will be held at 1:15pm on Wednesday 10th April 2024 at Westerleigh Crematorium, Waterside Chapel, BS37 8QP. All welcome to join the family afterwards at the Kendleshire Golf Club, BS36 2UY. Family flowers only, but donations may be made in Brian's memory to the Great Western Air Ambulance Charity

EVENTS

About to be launched is a new Emergency Services Show set for the UK market in June. The venue will be ExCel in Londons Docklands.



Registration for the world's leading and most international aerospace and defence event, Farnborough International Airshow 2024, is now open.

Taking place 22-26 July 2024, the trailblazing event will see global aerospace and defence leaders return to Hampshire, United Kingdom, for five days of unrivalled opportunities to discover the latest pioneering technology and engineering, announce historic partnerships, and collaboratively work towards the cumulative sustainable aerospace vision.

Following the resounding success of the 2022 event, which welcomed more than 74,000 professionals from 102 countries, including more than 250 official government and civil delegations, and racked up billions in global media reach, this year's airshow will demonstrate the future of the industry and represent the apex of aviation.

Global leaders, including Airbus, Boeing, Rolls-Royce, RTX, GKN and GE Aviation, will be exhibiting their latest aircraft, innovations and technology at the event.

Features of the five-day airshow will include the Space Zone showcasing the newest technology and launch operators in the market, Business Connections Exchange programme matching buyers and investors with vetted suppliers, and the networking Business Lounge sponsored by Lockheed Martin. In addition, the final day will open its doors to the Pioneers of Tomorrow, a dedicated STEM-focused day open to the public to inspire and engage the next generation of aerospace, space, defence and technology leaders. With a focus on expanding its digital experience, as well as physical, of the world-renowned show,

Farnborough International is developing its live streaming capabilities to be launched for the 2024 instalment.

Purchasing passes:

Farnborough International Airshow passes start from £52.50 + VAT per day.

To register and purchase your pass or for more information, visit the Farnborough International Airshow website, www.farnboroughairshow.com

2-4 April 2024. APSA Safety Seminars are offered free of charge as a benefit of membership to all active association members (a fee applies for non-members) and cover a wide range of topics through informative training classes as well as roundtable discussions.

APSA's first Safety Seminar of 2024 will take place in Gainesville, FL, April 2-4. .

3-5 April 2024 Milipol Asia-Pacific Sands Expo and Convention Centre, Singapore. www.milipol.com e-mail sales@milipol.com

11 April 2024 RAeS Lecture. A brief history of Short Brothers Uncrewed Aerial Systems by Paddy Mallon FRAeS, Chief Technologist - European Space and Defence, Spirit AeroSystems A free lecture from 18:30 - 19:30 at No.4 Hamilton Place, London, W1J 7BQ. UK

This lecture covers the uncrewed part of the Shorts Belfast story which begins in the post Second World War period of Guided Weapons Design. Once weapons were designed, there came the need to demonstrate their capability against flying targets for Weapons Proving. The lecture looks at Shorts guided weapons from these early days, progresses through to the uncrewed Canberra aircraft used for weapons trials and goes into detail on SkySpy; a ducted fan uncrewed surveillance system developed in the early 1970s. The lecture then looks at Skeet; the small target aircraft used for proving of the Blowpipe, Javelin and HVM weapons, and Stiletto; a supersonic target dropped from a Canberra for proving ship-based air defence missiles. Finally, a short summary of the Mosquito aircraft is provided.

Paddy is currently Chief Technologist - European Space and Defence for Spirit AeroSystems (aka Short Brothers plc), responsible for Hypersonics, Uncrewed Systems and Effects. Paddy was awarded the position of Senior Technical Fellow for Spirit Aerosystems Inc. in 2024 and appointed Distinctive Capability Lead for Performance Architectures, responsible for strategic planning for Spirits future activities.

Paddy is a Fellow of the RAeS, a panel member on the RAeS Weapon Systems and Technology Panel, and a member of the UK MoD Hypersonics Expert Panel

15 May 2024 APSA is pleased to partner with the Pennsylvania State Police (PSP) Aircraft Section to conduct a 1-day Safety Stand-To in Wilkes-Barre/Scranton, PA on Wednesday, May 15, 2024. The event will take place at the PSP Aviation Patrol Unit Hangar 2.

There is no charge to attend this excellent training, however, all attendees must be registered to participate. Register here.

More information coming soon!



NORTH WEALD AIRFIELD MUSEUM

Ad Astra House, Hurricane Way, North Weald, Epping, Essex CM16 6AA

WWW.NWAMUSEUM.CO.UK OPEN APRIL TO NOVEMBER

