Airports invest massively in new technologies to boost ATM safety and efficiency levels

Airport Show 2026 to showcase best-in-class ATM technology next May

DUBAI, UNITED ARAB EMIRATES, February 20, 2026 /EINPresswire.com/ -- 9th ATC Forum set to bring big-time experts
ATCs are increasingly handling complex flight patterns
Ibrahim Ahli: "We provide unparalleled professional services in a cost-effective manner."
149 million aircraft movements globally by 2043
The Middle East is among the fastest-growing air travel corridors

Ibrahim Ahli, Chief Executive Officer at dans

Airports in the Middle East, Africa and South Asia (MEASA) are spending millions of dollars to tectonically transform the Air Traffic Management (ATM) and Air Traffic Control (ATC) as these domains are coming under heavy beneficial impact of the new technologies like Artificial Intelligence (AI), Machine Learning (ML) and Big Data.

> " We provide unparalleled professional services in a cost-effective manner"
> *Ibrahim Ahli, Chief Executive Officer at dans*

Aiming to enhance safety, efficiency, and performance levels, airport operations digitalization is progressing rapidly to handle the increasing number of global passengers, which is expected to reach an all-time high of 5.2 billion in 2026 and 17.7 billion by 2043, the year when the total number of aircraft movements is projected to reach 149 million. In 2026, passenger traffic in the Middle East region alone is expected to exceed 240 million.

The high-density air traffic levels have been prompting the airports in these three regions to massively invest in the integration of AI technologies and Big Data solutions into their ATM

systems to continuously analyse the air traffic patterns, aircraft spacing, and airspace safety, among other tasks. The Middle East region, home to 110 airports and one of the world's fastest-growing air travel corridors, has been proactively modernizing its ATM/ATC infrastructure through acquiring advanced digital solutions to be at the cutting-edge of the highly competitive business.

Air Traffic Control Tower

A wide range of cutting-edge ATM/ATC solutions for the Air Navigation Services Providers (ANSPs) and airport operators will be showcased at the 25th edition of the Airport Show at the Dubai World Trade Centre (DWTC) from May 12 to 14, 2026. More than 150 exhibitors from over 30 countries are set to participate in the landmark show, which is set to attract more than 7,000 visitors from over 30 countries during its three-day run, in addition to 120 hosted buyers.

To be held under the patronage of His Highness Sheikh Ahmed bin Saeed Al Maktoum, President of Dubai Civil Aviation Authority, Chairman of Dubai Airports, Chairman and Chief Executive of Emirates Airline and Group, the leading airport industry's B2B platform will have co-located conferences - Global Airport Leaders' Forum (GALF), Airport Security Middle East, Air Traffic Control (ATC) Forum, and Women in Aviation (WIA) Middle East Conference. This year's ATC Forum will be the 9th successive edition.

Ibrahim Ahli, Chief Executive Officer at dans, remarked: "The rapid evolution of the aviation landscape—driven by fleet modernization, airport expansion, and the surge in global connectivity—places unprecedented demand on Air Navigation Service Providers (ANSPs). To navigate the complexities of limited runway capacity and airspace congestion, we at Dubai Air Navigation Services (dans) are revolutionizing our Air Traffic Management capabilities. By synchronizing our strategic roadmap with the aggressive growth of Dubai's aviation sector, we leverage state-of-the-art technology to deliver a service that is not only proficient and cost-effective but truly unrivalled."

dans has inked an agreement for cutting-edge research aimed at reducing holding patterns for all flights arriving at DXB,and ensuring a safer and more efficient airspace management. In partnership with Emirates Aviation University (EAU), it is conducting research for advancing AI applications within ATM and developing innovative AI-driven concepts and prototypes.

It has been working on upgrading Communication, Navigation, Surveillance (CNS) systems, implementing advanced runway capacity concepts like Dependent Diagonals, and scaling up capacities to handle traffic at the Al Maktoum International Airport, which is undergoing a US$35

billion expansion to handle 260 million passengers by the mid-2030s.

May Ismail, Event Manager at RX Middle East, organizers of the Airport Show, remarked: "New technologies are being utilized in the ATM domain to enhance safety, efficiency, and capacity. Their AI and Big Data integration will improve the safety and reliability, and transform the ATM into an intelligent, adaptive, smarter, and safer system. The Airport Show-2026 will showcase the best of ATM/ATC offerings from across the world, for the Middle East and other nearby regions to benefit."

Exhibiting and supporting the airport industry's leading B2B platform will be Dubai Air Navigation Services (dans), the Air Navigation Services Provider (ANSP) at the UAE's four airports, including DXB, the world's busiest airport for international passengers since 2014, and the operator of the world's largest 360-degree tower simulator.

The digital transformation is helping airports to reduce flight delays, enable smoother travel, and improve the passenger experience.   Supported by robust cloud architecture and underpinned by strong cybersecurity measures, AI has been transforming the ATC, particularly in the realms of predictive maintenance and resource allocation. The AI/ML is also playing a fundamental role in driving the development of the new ATM/UTM space.

The AI systems are also helping optimize flight paths in real-time, adjusting routes to avoid congestion, reduce delays, and ensure more efficient airspace usage. The global ATM market size is projected to reach US$10.96 billion in 2026 and US$21.24 billion by 2034. Global air traffic is expected to reach 9.7 billion passengers annually by 2030, placing enormous pressure on ATM infrastructure. The global commercial aviation fleet will consist of 36,000+ aircraft by 2033, according to an Oliver Wyman analysis, up from 22,000+ now.

By the mid-2030s, ICAO predicts that over 200,000 flights will take off and land daily all over the world. By 2040, global RPK is projected to reach 14.8 trillion in the IATA baseline scenario, equivalent to 178 percent of 2019 volume. By 2043, 149 million aircraft movements are expected. A study has found that AI predictive models have reduced air traffic delays by 18 percent in the European airspace. In the US, AI-based decision support tools have improved controller response times by 22 percent, contributing to enhanced safety margins. ICAO noted that AI predictive analytics have decreased unexpected system failures by 25 percent, enhancing operational continuity.

---Ends---
Photo Captions:
Ibrahim Ahli, CEO, dans
Modern technologies support air traffic management

About RX:
RX is a global leader in events and exhibitions, leveraging industry expertise, data, and

technology to build businesses for individuals, communities, and organisations. With a presence in 25 countries across 42 industry sectors, RX hosts approximately 350 events annually. RX is committed to creating an inclusive work environment for all our people. RX empowers businesses to thrive by leveraging data-driven insights and digital solutions. RX is part of RELX, a global provider of information-based analytics and decision tools for professional and business customers. For more information, visit www.rxglobal.com

About RELX:

RELX is a global provider of information-based analytics and decision tools for professional and business customers. RELX serves customers in more than 180 countries and has offices in about 40 countries. It employs more than 36,000 people over 40% of whom are in North America. The shares of RELX PLC, the parent company, are traded on the London, Amsterdam and New York stock exchanges using the following ticker symbols: London: REL; Amsterdam: REN; New York: RELX.

*Note: Current market capitalization can be found at http://www.relx.com/investors

Ditas Pascual

Nadd Al Shiba PR & Event Management

email us here

Visit us on social media:

LinkedIn

Instagram

Facebook

X