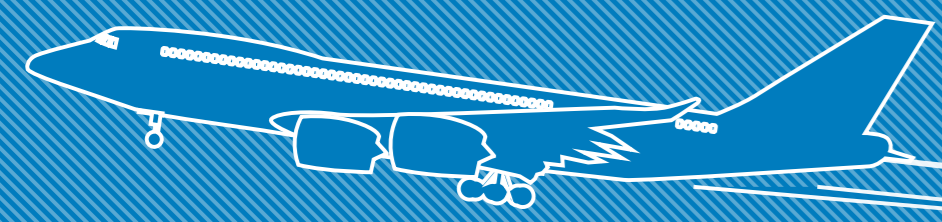


THE FUTURE AIRPORT

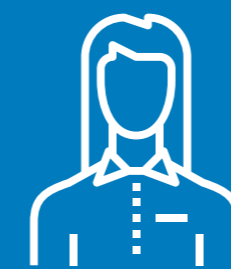


Efficiency is the name of the game in the airport industry, and terminals are streamlining every step of the passenger journey to make the customer experience seamless, eco-friendly and, ultimately, as stress-free as possible. From facial recognition software to terminal transport pods, here are some of the key features that could become mainstream in the airport of the future



CHECK-IN

Remote check-in is now commonplace across airports worldwide, with 71 per cent of global passengers having used mobile boarding passes at least once in 2016, according to IATA.



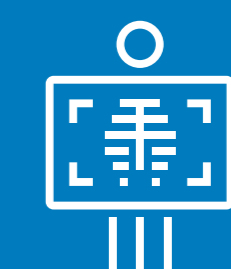
SELF-SERVICE LUGGAGE

Air New Zealand installed the first of its facial recognition-enabled self-service baggage units at Auckland Airport late last year, which feature embedded cameras to capture passengers' faces at the point of bag drop, enabling a smoother transition to the departure lounge



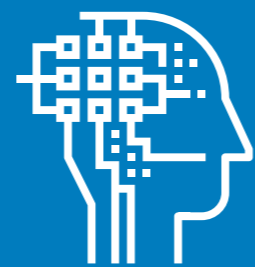
LUGGAGE DROP-OFF

Hong Kong's MTR subway system has a whole line dedicated to airport travellers, who can check their luggage in without leaving the city's central business district. Passengers can check in bags and get boarding passes at the station up to a day before their flight, removing the need for luggage storage and giving them extra time to tour the city



CT SCANS

High-definition, 3D computerised tomography (CT) scans could soon replace the standard X-ray scans currently used at most airports, both speeding up the security process and improving security and the detection of weapons and explosives



AIRPORT ROBOTS

Customer-facing robots have been around for years and are used for luggage transportation, cleaning and directing passengers to the correct gate. Glasgow Airport's all-singing, all-dancing, all-selfie-taking robot ambassador GLAdys, unveiled at Christmas, not only distracted passengers with renditions of their festive favourites, but was also able to collect customer feedback on airport services



WI-FI

Terminal-wide wi-fi is an expected feature of airports nowadays, with travellers turning to the internet to overcome the insurmountable boredom that comes with long waits and delayed flights. Free wi-fi, however, is a little harder to come by. WiFox, an app created by computer security engineer Anil Polat, includes a map of free internet and wi-fi passwords at airports around the world, including which lounges, bars and restaurants to visit, and is continually updated by travellers



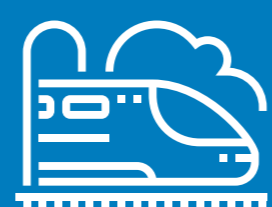
BIOMETRICS

The awkward exchange between irritable security staff and frantic flyers searching bumbags for passports may be a thing of the past with the creation of the single passenger token. Tokens, such as the Aruba Happy Flow, are set to revolutionise the airport customer journey and enable flyers' biometric data to be linked to their boarding passes and passports, removing the need to present documents at every check-in point



SPEEDY SECURITY

Tired of shoeless, beltless waits in security queues? Delta Airlines' "innovation lanes" have made the whole process a lot simpler, and speedier. Trialled last year at Hartsfield-Jackson Airport in Atlanta, the world's busiest airport, the lanes have five stations for travellers to deposit their bits and bobs onto a conveyor belt for scanning, moving five people simultaneously through the checkpoint, rather than the traditional single-file method. The system is proven to process 35 per cent more people per hour than single-file lines



ECO FRIENDLY

While not directly under the remit of airports, travel to and from terminals can be a large contributor to an airport's carbon emissions. Oslo Airport has the largest and free charging area for electric vehicles in Europe, while Heathrow is pushing for 45 per cent of all journeys to the airport to be taken by public transport by 2019



SLEEP PODS

Faced with flight cancellations or long delays? Dubai International Airport offers a dozen or so SnoozeCubes – mini sound-proofed hotel rooms installed within the terminal for a quick doze in privacy, each equipped with a bed, touchscreen TV and a shower. Too luxurious? The airport offers GoSleep sleeping pods, smaller private beds rentable by the hour



NOISE REDUCTION

Restricting the number of night flights and penalties for older, louder aircraft are obvious ways of reducing noise, but changes to the way planes approach the runway can also have dramatic effects on sound levels. Planes typically level off intermittently as they descend, but continuous descents in a straight path from 6,000 feet can lead to noticeable noise reduction and save up to 400kg of fuel, according to Heathrow



FUEL SAVING

While most aircraft use auxiliary power units (APUs) for cleaning and air conditioning when the engines are turned off, airports are beginning to install fixed ground power and pre-conditioned air systems. These power aircraft from the local grid or even solar power. Barcelona's El Prat Airport has saved 58,000 tonnes of CO₂ a year by making it mandatory to switch off APUs when planes are parked at the gate

