Western Sydney Airport

Submission to
The Future of Australia's Aviation Sector:
Flying to Recovery
Issues Paper 2020

November 2020

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1 A Five-Year Plan for Aviation

Western Sydney Airport (WSA) welcomes the release of 'The Future of Australia's Aviation Sector: Flying to Recovery' Issues Paper 2020 (the Issues Paper).

The Issues Paper sets out a comprehensive overview of the current challenges and opportunities for Australian aviation, which provides useful context for consideration of future policy options as part of the Government's Five-Year Plan for the sector.

The last substantive review of Australia's aviation policy settings was undertaken in 2008-09, when the global financial crisis precipitated wide-ranging structural impacts on the sector. As the Issues Paper notes, the aviation industry operating environment has evolved considerably since that time. 2019 saw record levels of capacity operated and passengers carried in Australia, continuing a decade-long trend of sectoral expansion. This was driven by strong competition, productivity and infrastructure investment in the aviation sector, as well as broader economic factors such as large-scale projects in the mining and resources industries and unprecedented tourism growth.

COVID-19 has had severe impacts on aviation in Australia. The implementation of health-related measures such as international travel bans, state border closures and quarantine requirements as part of Australia's response to the pandemic have seen domestic traffic fall by 85 percent and international traffic by 98 percent in 2020 compared with 2019.[1]

This has triggered further structural change in the sector. The Qantas Group and Virgin Australia Group have reduced their respective networks, fleets and workforces, with Virgin Australia also going through a voluntary administration and sale process. The Government has put in place mechanisms to support minimum passenger connectivity and maintain freight supply chains. The crisis has also provided opportunities for smaller players Regional Express and Alliance Airlines to acquire additional aircraft and introduce new routes.

Against this backdrop, 2020-21 is a timely opportunity to review and refresh aviation policy settings to ensure they reflect the contemporary industry context and are fit-for-purpose.

Continuation of a pragmatic, risk-based approach that safeguards Australia's high aviation regulatory standards will be important in this regard. Policy and regulatory settings should also be durable and efficient, while providing sufficient flexibility to respond to disruptions and encourage innovation in a dynamic environment.

Frameworks based on these principles will support a viable, competitive and resilient aviation sector capable of making a significant and sustainable contribution to driving growth in trade, tourism and jobs in the Australian economy over the long term.

While the flight path out of COVID-19 will not be smooth, the development of a forward-looking policy framework for aviation will provide a measure of certainty for participants in an industry with long lead times for planning and capital investment.

[1] Bureau of Infrastructure, Transport and Regional Economics (BITRE), Statistical Report: International aviation activity August 2020; Domestic aviation activity August 2020

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2 Western Sydney International (Nancy-Bird Walton) Airport

The 2026 horizon for the Government's Five-Year Plan for aviation is highly relevant to WSA, as Western Sydney International (Nancy-Bird Walton) Airport (WSI) is expected to become operational by the end of that year.

The commencement of construction of WSI is noted in the Issues Paper as a key recent aviation Government policy initiative. WSI is a transformational infrastructure project that will generate economic activity, provide employment opportunities in the Western Sydney region, and meet Sydney's long-term aviation needs.

Western Sydney is home to two million people, making it Australia's third-largest economy.[2] The region is expanding rapidly, with its population forecast to increase by a further one million by the early 2030s, representing two-thirds of the total population growth predicted for greater Sydney over that period.[3]

In recognition of the importance of transport connections for productive economies, in 2014 the Australian Government designated Badgerys Creek as the site for the second airport in Sydney, and in 2017 announced it would invest up to $5.3 billion in equity to deliver the facility.

WSI will be a full service airport with 24-hour operational capability, catering for domestic and international passengers as well as freight. It will be developed in stages as demand grows, opening with a single runway and facilities to handle up to 10 million passengers (Stage 1), with a second runway to be added when required. By 2063, the Airport is expected to accommodate up to approximately 82 million passengers annually.

WSA has entered into memoranda of understanding (MoUs) with the Qantas Group and Virgin Australia Group, which will see them provide insights into design and planning, as well as discussing future services using the Airport. In addition, 12 of Australia's major freight companies have entered into MoUs with WSA to work on design concepts for the precinct and commence discussions about potential operations to WSI.

As noted above, measures implemented in response to the COVID-19 pandemic have seen severe declines in air traffic in Australia, in line with trends in global markets. The International Air Transport Association (IATA) anticipates that lower levels of passenger demand will continue for several years, reflecting reduced corporate travel and consumer confidence, with domestic markets recovering more quickly than international markets.[4]

Australia's size, geographically-dispersed population and long distances between major urban centres mean that aviation will continue to play a pivotal role in connecting people and businesses, as well as facilitating tourism and the movement of goods within Australia. Similarly, key export sectors of the Australian economy such as inbound tourism, education and high-value agricultural goods are heavily dependent on international air links. In addition, around 30 percent of Australian residents were

[2] https://www.westernsydneyairport.gov.au/about/why-another-airport
[3] https://www.westernsydney.edu.au/rcegws/rcegws/About/about_greater_western_sydney
[4] https://www.iata.org/en/pressroom/pr/2020-07-28-02/

born in other countries[5] (with the figure almost 40 percent of those living in Western Sydney), many of whom travel regularly to visit family and friends overseas.

Against this background, WSA is confident that demand will have returned to previously expected levels by the time the Airport opens in late 2026. This is consistent with IATA forecasts that global passenger traffic will return to pre-COVID-19 levels in 2024.[6]

3 WSA comments on the Issues Paper

As an airport that is yet to become operational, Part A of the Issues Paper relating to the mechanisms the Government has put in place to support the aviation sector during the COVID-19 crisis is not directly relevant to WSA.

WSA has therefore limited its feedback to Part B of the Issues Paper, which is concerned with longer-term policy options. Comments relating to a number of these aspects are set out below in the sequence they appear in the Issues Paper.

WSA notes that the Issues Paper encourages stakeholders to include their submissions on the Regional Aviation Policy Paper released for consultation in March 2020 and paused in early April, as many of the issues canvassed remain relevant to the development of the Government's Five-Year Plan. Accordingly, WSA's submission on these issues prepared at that time is attached at Appendix A.

3.1 Demand management at Sydney Airport

Sydney Kingsford-Smith Airport (KSA) is Australia's principal aviation gateway, accounting for 40 percent of international passenger traffic, over 45 percent of international freight traffic, and the busiest domestic routes – to Melbourne and Brisbane respectively.[7]

Demand for aviation services in the Sydney region is forecast to double over the next 20 years.[8] KSA is not able to meet the future aviation requirements of Sydney alone, even if operational restrictions were removed.[9] For Australia to remain competitive, additional aviation capacity in the Sydney region is required well before KSA reaches capacity.[10] This national imperative, and the economic and social objectives it underpins, is the key driver for the development of WSI.

Long-term planning has preserved the site for WSI, which is twice the size of KSA, and this will enable flexible operations and progressive development of infrastructure to support Sydney's long-term aviation capacity needs.

It is in this context that WSI's planned opening in 2026 is highlighted in the Sydney Airport Demand Management Discussion Paper November 2020 (foreshadowed in the Issues Paper), as one of the factors that will be taken into account by that review.

[5] Australian Bureau of Statistics Migration, Australia 2018-2019, July 2020
[6] https://www.iata.org/en/pressroom/pr/2020-07-28-02/
[7] BITRE Statistical Report: International aviation activity December 2019
[8] https://www.westernsydneyairport.gov.au/about/why-another-airport
[9] ibid
[10] Federal Minister for Urban Infrastructure's Speech to the Aerotropolis Investor Forum, May 2018

As noted above, international and domestic aviation activity will be subdued over the next few years, with global passenger traffic forecast to return to pre-COVID-19 levels around 2024. This will have the effect of easing congestion at all Australian airports over this period. In light of the anticipated timeframe for the return of traffic to pre-COVID-19 levels, WSI's opening will be timely in relieving capacity pressures at KSA.

3.1.1 Regional price cap and notification regime

Under the regulatory price cap and price notification regime, prices for aeronautical services and facilities are capped for airlines operating flights between KSA and regional New South Wales (NSW). This reflects a policy objective of successive Australian Governments of maintaining air access to Sydney for regional NSW communities.

The Productivity Commission's 2019 Inquiry Report into the Economic Regulation of Airports noted the relevance of these arrangements to airlines' future decision-making concerning the operation of regional routes at KSA and WSI:

> *"The regional ring fence, and the price cap and price notification regime, are among a range of factors that affect airlines' decisions to service a regional route. The opening of Western Sydney Airport in 2026 may also affect these decisions in the longer term. Western Sydney Airport could provide greater opportunities to increase regional air transport in New South Wales: directly by providing alternative air transport services to regional areas; and indirectly if it leads to airlines moving services to western Sydney, freeing up capacity at Sydney Airport. …. The Commission's next inquiry into airport regulation should consider the continued need for regional access arrangements at Sydney Airport in light of the development of Western Sydney Airport and any other future considerations."*[11]

As outlined in detail in Appendix A, WSI's opening will provide airlines with the opportunity to establish new services to regional NSW at attractive timings, including in the peak periods which are congested at KSA.

Currently, over 2.3 million people use air services between Sydney and regional NSW annually.[12] These passengers are travelling for a range of purposes including business, tourism, education, visiting friends and family, medical treatment and connections to domestic and international flights.

While some travellers to/from regional NSW require access to the Sydney CBD, this is not the case for everyone. Around 30 percent of Australia's top 100 businesses now have an office in Parramatta.[13] The NSW Government is continuing to relocate thousands of public sector jobs from the Sydney CBD to Western Sydney as part of its Decade of Decentralisation policy.[14] It is also undertaking substantial investment in health infrastructure in Western Sydney, including projects to redevelop and expand facilities at a number of hospitals.[15] In addition, for the two million people resident in

[11] *Ibid*, p239
[12] https://www.transport.nsw.gov.au/data-and-research/passenger-travel/aviation/nsw-intrastate-aviation-quarterly-passenger-statistics
[13] https://www.cityofparramatta.nsw.gov.au/economy
[14] https://www.property.nsw.gov.au/relocations-western-sydney
[15] NSW Government, Budget 2019-2020 Media Release, June 2019

Western Sydney, WSI will provide a more convenient option for accessing the regions than KSA.

3.2 Airspace management

Airspace design that enables the safe and efficient operation of aircraft during all phases of flight is a fundamental element of aviation policy settings.

Regulation that protects airspace around airports is a critical component of this framework. As well as ensuring the ongoing safety of flight, it guards against impeding the infrastructure's capacity to support future growth of aviation operations. Development on and around airport sites, such as WSI's planned business park and the Western Sydney Aerotropolis, can form a valuable part of the infrastructure's utility and its broader economic contribution.

Incompatible development, however, can create physical hazards such as intrusion into airspace, turbulence, windshear and wake effects, and visual distractions, for example from lighting or smoke. These impacts can compromise the safety, efficiency and scope for expansion of aircraft operations at airports, and lead to adverse environmental outcomes with respect to noise and carbon emissions. It should be noted that impacts on flight paths can occur as a consequence of developments that are located not only adjacent to, but also some distance from an airport.

A number of regulations relevant to the protection of airspace around airports are due to sunset in April 2024. WSA understands that a thorough review process is to be conducted ahead of the regulations being remade and looks forward to participating in the stakeholder consultation process.

The importance of protecting airspace around airports is recognised by the National Airports Safeguarding Framework (NASF). The NASF provides guidance on planning requirements for development that affect aviation operations, including building activity around airports that might penetrate operational airspace and/or impact navigational procedures for aircraft. The framework takes a coordinated approach that recognises the roles of all three levels of government in airport safeguarding. WSA supports the NASF and regular reviews of the guidelines to ensure their ongoing responsiveness to contemporary challenges.

Airspace protection arrangements were considered as part of the Australian Government's Aviation Safety Regulation Review conducted in 2014. While the Review Report noted the significant work undertaken through the NASF, it stated that:

> *"the Panel considers that the protection of airport flight paths and operations from the encroachment of on- and off-airport developments is becoming an urgent policy issue. There is an emerging risk to the long-term viability of Australia's existing aviation infrastructure. The issues are complex, crossing jurisdictions and levels of government, meaning that no single agency is able to deliver the required outcomes. However, as the agency responsible for on-airport planning issues at the 21 federally leased airports, and as the lead agency on aviation and airport issues, the Department [of Infrastructure and Regional Development] must take a policy leadership role to ensure that the future viability of airport*

infrastructure is not compromised by poor planning and land-use decisions".[16]

Accordingly, the then Department of Infrastructure and Regional Development led a review of the suite of arrangements governing airspace protection in conjunction with the Civil Aviation Safety Authority (CASA), Airservices Australia (Airservices) and the Department of Defence. This identified a number of gaps as well as duplication which created uncertainty, ambiguity, or lack of appropriate oversight.[17]

This work led to the development of three reform proposals released for public consultation in 2016-17. One of these proposals was 'Modernising Airspace Protection under the Airports Act 1996', the objective of which was to create a modern, nationally consistent and transparent airspace protection regime at Australia's major airports. Key outcomes of the regime would be:

- more appropriate criteria for the establishment of prescribed airspace;
- strengthening of the declaration process to ensure appropriate consultation and analysis;
- and streamlining the handling of applications for intrusions into prescribed airspace.[18]

The proposal is consistent with the NASF and relies on amendment of existing legislative, regulatory and administrative arrangements, rather than the development of new or additional regulation.

Progressing this policy option would provide an important regulatory foundation for the protection of airfield efficiency and flexibility for WSI, other major airports and the airlines that operate to them. More broadly, it would provide greater transparency and certainty to all stakeholders, including developers and communities.

Importantly, having appropriate and well-defined airspace protections in place will contribute to maximising the utility of the air traffic management (ATM) framework. WSA notes that Australia's new civil/military integrated ATM system is expected to be fully operational by 2026.

Australia's policy and regulatory arrangements for airspace protection and management will also need to be sufficiently flexible to adapt to the development and deployment of new technologies, including new aircraft types and technologies that enable more accurate aircraft navigation, as well as drones and electrical vertical take-off and landing vehicles (eVTOLs). This will ensure that the uptake of technology that is safe and capable of delivering benefits to aviation users and communities is not impeded by inappropriate or burdensome regulation.

3.3 Airline access to domestic and international routes

As the Issues Paper notes, Australia has one of the most open and competitive aviation markets in the world. This reflects a policy approach that recognises the benefits that flow to Australian consumers, exporters and the tourism industry from liberal access, provided high operational regulatory standards are maintained.

[16] Australian Government Aviation Safety Regulation Review Report, May 2014, p23
[17] Australian Government, Modernising Airspace Protection – Public Consultation Paper, December 2016, p3
[18] *Ibid*, p4

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3.3.1 Current international access arrangements

Where international market access is concerned, successive Australian Governments have pursued a policy of ongoing liberalisation of air services arrangements (ASAs) with bilateral partners.

Under these arrangements, capacity for passenger services at Sydney, Melbourne (Tullamarine), Brisbane and Perth airports is generally capped, although unrestricted access is available under a number of Australia's ASAs with key markets.

These four primary gateways are established airports that enjoy strong levels of demand for both business and leisure traffic, reflected in well-developed network connectivity across regional, domestic and international markets. In 2019, ninety-two percent of passengers travelling to/from Australia arrived at and/or departed from these four airports, with the three east coast gateways accounting for over 80 percent.[19]

The value of access to these airports provides Australia with important leverage in bilateral negotiations with foreign countries where Australian carriers are seeking enhanced capacity and/or traffic rights to expand their services with their own aircraft or through code sharing arrangements with other airlines.

Capacity for international passenger services to points in Australia other than the four primary gateways is unrestricted in many of Australia's ASAs. This reflects a policy approach that seeks to ensure that secondary gateways, eg Adelaide, Canberra, Cairns are not disadvantaged as a consequence of airlines having to make choices between serving a primary or a secondary gateway (or both) in cases when capacity entitlements are limited.

This approach also applies to secondary airports in major catchment areas, eg Melbourne (Avalon) and Brisbane (Gold Coast and Toowoomba). This recognises that, notwithstanding the Government's policy of negotiating capacity ahead of demand, the likely practical outcome of applying passenger capacity entitlements across airports in reasonable proximity will be airlines expanding or initiating services at the most established facility.

3.3.2 WSI and international services

Initial demand when WSI opens in late 2026 is expected to be about five million users annually – equivalent to 75-80 percent of passenger numbers at Gold Coast Airport in 2019.[20] Stage 1 of WSI's development will be capable of serving around 10 million passengers in total, including up to two million international passengers. This level of demand is likely to be reached by the mid-2030s, and is comparable with passenger numbers and the domestic/international profile of traffic at Adelaide Airport in 2019.[21]

WSI's treatment under Australia's aviation access policy will have an important bearing on its ability to attract international services. While initial operations will be dominated by domestic and trans-Tasman services, international markets, which are larger and less mature, represent a key source of growth. This is reflected in the Airport Plan, which assumes an approximately even domestic/international split of traffic by

[19] BITRE Statistical Report: International aviation activity 2019
[20] Bureau of Infrastructure and Transport Research Economics, Airport Traffic Data 1985-2019
[21] ibid

2050.[22] Fostering these overseas markets and building early momentum in them will be vital to WSI's success.

In 2019, WSA participated in the annual World Routes Conference, which brings together aviation route development professionals to develop and plan network strategy on a global scale. The WSA delegation was able to meet with a large number of airlines and airports from around the world to provide information concerning WSI's planned capacity, operational features and catchment area.

Questions regarding WSI's status were a common thread in the discussions with airlines, which were familiar with the different policy treatments applied to accessing primary and secondary gateways under Australia's ASAs. Airlines expressed a desire for clarity for planning purposes at the earliest opportunity, emphasising that this will be key to informing their network decisions, not just in relation to Sydney, but Australia more broadly. This feedback was valuable and highlighted to WSA the importance of settling a policy approach on international access at WSI as soon as is practicable.

The importance of international passenger services to Australia's supply chains has been underlined by the COVID-19 pandemic. Although dedicated freighters have a key role to play in the transport of high-value, time-sensitive goods, the majority of air freight is carried in the belly space of passenger aircraft. In Stage 1, WSI will be able to process around 220,000 tonnes of air freight each year. This capability is set to scale up with demand, handling up to 1.8 million tonnes annually in the future.

As many passengers travelling on international services require connectivity to domestic and regional flights, WSI's treatment under the policy will also influence its success in developing these route networks.

3.3.3 Broader implications of open international access at WSI

Unrestricted access for international passenger services at WSI would allow airlines seeking to commence services to WSI to do so while maintaining existing flights to primary gateways. For example, for an airline permitted to fly up to 14 weekly services to/from primary gateways under the relevant ASA and which currently operates to both Melbourne (Tullamarine) and Brisbane, unlimited access at WSI would enable the airline to continue to serve the other two airports on a daily basis.

In this way, allowing unrestricted access at WSI while maintaining the status quo at primary gateways would not disadvantage those airports. It is also worth noting that most primary gateways would be expected to benefit from increased domestic traffic as a result of the establishment of new interstate links when WSI becomes operational.

While WSA recognises that liberalisation of access to most (if not all) Australian gateways may be a long-term objective for the Government, the timing and sequencing of any changes to the current policy position will have consequences for the economic benefits that WSI is able to deliver to Western Sydney in terms of employment, tourism and trade, particularly in its initial operational phase.

[22] Australian Government, The Western Sydney Airport Plan, December 2016, p24

Adoption by the Government of a policy of unrestricted access at WSI for international passenger services would represent a pro-competitive approach that:

- is consistent with the Government's investment in the development of WSI and the role WSI is expected to play in the future growth and competitiveness of the Australian aviation industry;
- recognises the enduring strength of KSA's position with respect to international traffic; and
- is in line with the treatment of other relevant Australian airports.

A pro-competitive policy approach will provide the right foundation for WSI's success, while not hampering the long-term growth and viability of other major east coast airports. Given the long-term nature of international airline network planning, early determination of a position to provide certainty to both prospective users of WSI and other industry stakeholders is highly desirable.

3.4 Facilitating new and emerging technologies

3.4.1 Drones and eVTOL vehicles

Drones and eVTOL vehicles have a range of potential applications at airports that offer economic and social benefits. These include passenger transport, last mile freight deliveries, emergency response capability, apron and runway lighting inspections, perimeter checks and dispersal of wildlife hazards.

The planning of WSI has sought to anticipate the development of new technologies and their spatial requirements. The layout of the Airport's midfield could readily accommodate drone and eVTOL vehicle activity in the terminal precinct infrastructure, provided airspace integration and management, access, safety and security considerations are fully addressed.

The integration of drone and eVTOL operations with existing aviation users and systems will be critical to their successful uptake and realisation of the benefits they can generate. WSA notes the work that Airservices is undertaking with CASA and industry on the development of new approaches, standards and capabilities in relation to airspace design, traffic management and drone detection systems in order to support this outcome.

WSA has provided a separate submission to the Government's National Aviation Policy Issues Paper on Emerging Aviation Technologies, setting out a more detailed response in relation to these issues. WSA supports the core principles that will underpin the development of a National Aviation Emerging Technologies policy as described in that paper.

WSA will actively seek opportunities to enhance operations through incorporation of emerging aviation technologies, and looks forward to involvement in further consultations in the development of the policy framework and to collaborating with government and industry in testing of new technologies.

3.4.2 Satellite Based Augmentation System

Satellite Based Augmentation System (SBAS) technology monitors Global Positioning System (GPS) signals, calculates corrections and uploads the more accurate signals to a satellite for broadcast to users.

In March 2020, the Australian and New Zealand Governments announced an agreement to establish a shared SBAS network, following an 18-month trial and independent study of the economic benefits of the wide range of applications of an SBAS capability, including in agriculture, resources, construction and transport. The SBAS network will improve the accuracy of positioning from 5-10 metres to 10 centimetres.[23]

The benefits of SBAS for the aviation industry and its customers are extensive, including reduction of diversions, go-arounds, delays and cancellations in poor weather conditions and better navigational accuracy at rural and regional aerodromes. As well as improved safety, SBAS capability can enhance airfield efficiency and flexibility and environmental outcomes. In contrast to current aircraft guidance technology (Ground Based Augmentation System and Instrument Landing System), SBAS does not require installation of infrastructure at airports and is not sensitive to terrain and local obstacles.

In view of these significant benefits, WSA welcomed the timely implementation of SBAS systems in conjunction with Geoscience Australia and Airservices being noted as a key initiative in the Minister's Statement of Expectation for CASA for 2019-21.

3.5 Safe, secure and environmentally sustainable aviation

3.5.1 Safety and security

WSA has regular engagement with CASA and the Aviation and Maritime Security Division of the Department of Home Affairs (Home Affairs) to ensure that legislative requirements are incorporated into the planning and design of WSI.

3.5.2 WSA approach to environmental sustainability

The Australian Government is implementing national policies to reduce emissions and adapt to the impacts of climate change in the context of coordinated global action, most notably the agreement under the United Nations Framework Convention on Climate Change settled in Paris in December 2015.

The NSW Climate Change Policy Framework outlines a commitment to be carbon neutral by 2050. In 2019 the COAG Energy Council agreed a Trajectory for Low Energy Buildings, which foreshadows future changes to the National Construction Code (minimum construction regulations) which will require all new buildings to be net zero energy and carbon ready from 2028.

It is in this context that a pathway to carbon neutrality is being developed for WSI, as measured by the Airport Carbon Accreditation Scheme, the global industry standard for active carbon management at airports.[24]

Intelligent design and energy optimisation will be the cornerstones of this approach, as detailed in WSA's Sustainability Plan. In the Airport's design phase (2020 to 2021),

[23] Geoscience Australia Media release, 3 March 2020
[24] https://www.airportcarbonaccreditation.org/

the focus is on optimising energy efficiency of facilities and the potential for renewable energy supply to maximise impact and value for money. During construction and the lead-up to the commencement of operations (2024 to 2026), this will shift to exploring off-site renewable energy supply and carbon offsets, and the use of electric ground support equipment and fleet vehicles.

Currently, the Airport Carbon Accreditation Scheme awards carbon neutral status when an airport can demonstrate that it has offset Scope 1 and 2 emissions.[25] It is anticipated that in the future the Scheme will require Scope 1, 2 and 3 emissions to be offset to achieve carbon neutrality. Scope 3 emissions are indirect greenhouse gas emissions (ie other than scope 1 and 2 emissions) that occur as a consequence of the activities of a facility, but from sources not owned or controlled by that facility's business, such as transporting passenger and staff to the airport.

Collaboration with Airport users and supply chains will be key to influencing outcomes in those areas outside WSI's operational control. To this end, WSA is actively developing partnerships with a broad spectrum of stakeholders including Sydney Metro, airlines, aircraft and aviation equipment manufacturers, the energy sector, governments and the community.

3.5.3 Hydrogen

Decarbonisation represents a major challenge for aviation and will rely on the development of a range of new technologies to power propulsion. Aircraft powered by electricity supplied by sources such as batteries and fuel cells offer the prospect of quieter, more efficient and sustainable flight.

Hydrogen has the potential to play a significant role as an alternative fuel for these aircraft in the future.[26] When used as a fuel, hydrogen's only by-product is water, and it can be produced carbon-free.[27]

The use of hydrogen as a fuel for road transport vehicles is more likely in the nearer term. [28] As noted above, WSI will have a significant air freight capability. With the majority of cargo expected to be trucked to/from the Airport, hydrogen offers potential to reduce WSI's Scope 3 emissions.

Against this background, WSA welcomes the Australian Government's National Hydrogen Strategy released in November 2019. The Strategy recognises that Australia is well positioned to become a large-scale exporter and global leader in the development of this technology, and identifies actions required to accelerate the commercialisation of hydrogen, reduce technical uncertainties and build up domestic supply chains and production capabilities.

[25] Scope 1 - Emissions released to the atmosphere as a direct result of activities at a facility, eg from a manufacturing process, fuel burning or production of electricity. Scope 2 - Emissions released to the atmosphere from the indirect consumption of an energy commodity, including the use of electricity produced by burning coal in another facility.
[26] Clean Sky 2 and Fuel Cells and Hydrogen Joint Undertaking, Hydrogen-powered aviation: A fact-based study, May 2020
[27] Ibid, p5
[28] BITRE, Hydrogen as a Transport Fuel, October 2019

3.5.4 Biofuels

Although significant advances in electrification technology for aviation have occurred in recent years, including the development of longer-life and lower-cost batteries and fuel cells, this technology is most likely to be suitable for regional and short-haul flying. For longer distance routes, liquid fuels with high energy density will continue to be necessary in the foreseeable future. Sustainable aviation fuels derived from biomass, such as trees, plants, waste and other organic matter provide a potential alternative to the use of liquid fossil fuels.

As the Issues Paper notes, industry is directing significant efforts towards fostering research and development of these biofuels. WSA is a member of the Sustainable Aviation Fuel Alliance of Australia and New Zealand (SAFAANZ), whose purpose is to create a collaborative environment to advance sustainable aviation fuel production, policy, education and marketing in Australia and New Zealand.

Achieving meaningful impacts with respect to carbon emissions through the use of biofuels will depend on their commercialisation to enable widespread uptake by the aviation industry. As SAFAANZ's submission to the development of the Australian Government's Bioenergy Roadmap notes, supportive policy settings will be critical in realising this outcome.[29] While incentives are in place in the relevant tax schemes to encourage the development of renewable fuels such as ethanol and biodiesel, this does not extend to the production of sustainable aviation fuels. Levelling the playing field with respect to excise treatment would ensure that investment in research and development of biofuels is not disadvantaged relative to other types of renewable fuels.

3.6 Federally-leased airports

As a Federally-leased airport, WSI is governed by the *Airports Act 1996* and associated regulations. Amendments have been made to several legislative instruments in recent years to extend their application to activities undertaken at WSI in both the construction and operational phases.

However, two aspects of on-airport activities at WSI are not yet covered by the existing regulations, namely liquor licensing and landside vehicle parking.

DITRDC regulates the sale and supply of liquor at leased Federal airports within NSW through the *Airports (Control of On-Airport Activities) Regulations 1997*. This currently applies to KSA, Bankstown and Camden. DITRDC also regulates landside vehicle parking at Brisbane, Gold Coast, Hobart, Launceston, Melbourne, Perth, Sydney, and Townsville airports through these regulations, with individual airports administering the parking scheme, and monies collected being remitted to DITRDC.

WSA notes that regulation of liquor licensing and vehicle parking is generally undertaken by State and local governments. Administrative arrangements such authorities have in place covering these activities are likely to be efficient by virtue of scale and/or offer the benefit of local knowledge.

The *Airports (Control of On-Airport Activities) Regulations 1997* are due to sunset in April 2024. WSA understands that these regulations will be considered as part of a

[29] Submission to Bioenergy Roadmap, June 2020, p27

thematic review of instruments in advance of that date to determine whether they should be remade.

In the event that the existing regulatory arrangements for liquor licensing continue beyond April 2024, WSA would seek their application to be extended to WSI on terms appropriate to the Airport's operations.

Where landside vehicle parking is concerned, WSA will work within the applicable prevailing framework, whether that be a remade regulation that applies to WSI, or seeking to make appropriate arrangements with Liverpool City Council.

3.7 Other issues

The Issues Paper invites comments on any other areas of aviation-related policy. Given that approximately 95 percent of travellers to/from Australia arrive and depart by air[30], fit-for-purpose border facilitation frameworks are integral to the productivity of the aviation industry.

In 2019, the Department of Home Affairs was in the process of finalising its 'Traveller Strategy – Beyond 2020' in consultation with industry. The Traveller Strategy acknowledged the significant forecast growth in traveller movements, the associated pressure on infrastructure, the fluid and unpredictable nature of the security environment, the duplication in current systems that require provision of the same information at multiple touchpoints in the traveller pathway, and the opportunities that technological advancements and innovation create for border facilitation.

In this context, the Traveller Strategy outlined:

> *"the need to leverage emerging technologies to support a new business model that is information driven and supported by a biometrically enabled traveller pathway to engage, verify and assess travellers as early as possible… [and in doing so enable] industry to enhance the traveller experience through a low-touch, low-infrastructure and personalised journey."* [31]

As part of this work, Home Affairs established a Future Traveller Strategy Working Group with industry representatives to explore operating models that improve both efficiency and the traveller experience, without introducing heightened risk into the travel network. The Working Group, on which WSA is represented, would also co-design and prioritise efforts in relation to the development of options, including any legislative and/or policy changes that are required.

COVID-19 has caused extensive disruption to the movement of people and goods globally and has wide-ranging implications for border facilitation. In particular, it has elevated considerations around biosecurity in the traveller and trade pathways and the pivotal role of technology in future operating models. In that sense, the pandemic has underlined both the importance of the work noted above and the need to accelerate it.

Against this background, WSA welcomes the Government's October 2020 announcement regarding the digitisation of incoming passenger declarations and

[30] Department of Home Affairs, Annual Report 2018-19, p17
[31] Department of Home Affairs, Traveller Strategy – Beyond 2020, Industry Consultation Draft, January 2019

development of a simple visa product as initial use cases of the development of a whole-of government permissions capability.[32]

WSA recognises that modernisation of border services delivery involves a range of complex considerations and requires substantial investment. However, building on this work will be critical in ensuring that the return of air travel to Australia offers a facilitation experience that meets the expectations of travellers and supports future growth in aviation and the visitor economy.

[32] https://minister.homeaffairs.gov.au/alantudge/Pages/preparing-australia-for-reopening-to-the-world.aspx