Australian, State and Territory Governments

National Cabinet Memorandum

Title	COVID-19 Risk Analysis and Response Taskforce Report (Memorandum)
Sponsoring Department	COVID-19 Risk Analysis and Response Taskforce

Summary

Proposed Action

Note the third update from the COVID-19 Risk Analysis and Response Taskforce, which includes AHPPC's s 22(1)(a)(ii) advice and modelling on reopening, quarantine arrangements s 22(1)(a)(ii).

s 22(1)(a)(ii)

Note that the next Taskforce update will include: s 22(1)(a)(ii) options for scaling up and diversifying quarantine to allow for additional international arrivals. The Taskforce continues to draw on expert advice on priority issues.

Key reasons

s 22(1)(a)(ii)

The COVID-19 vaccine rollout is also progressing in many countries, but significant outbreaks, such as the current second wave in India and the fourth wave in Japan, are likely to continue. In addition, variants of concern are spreading rapidly around the world, and are now the dominant strains of the SARS-CoV-2 virus in many countries, and in arrivals in Australia's managed quarantine system. Given this, and the relaxation of most domestic restrictions, the risk environment relating to international travel to Australia is potentially as high as or higher than it was last year.

s 22(1)(a)(ii)

s 22(1)(a)(ii)

Third, the AHPPC advice examines several quarantine arrangements and the number of 'exposure days' they would give rise to per 1,000 travellers. For unvaccinated travellers, the exposure days are substantially higher under any of the arrangements considered. An important preliminary finding is that, for travellers who have received one or two doses of the AstraZeneca vaccine, a 7-day hotel quarantine arrangement has a lower number of exposure days than for unvaccinated travellers who complete 14 days in hotel quarantine. The AHPPC will provide further advice on what this means for risks of outbreaks, before any alternative quarantine arrangements can be recommended.

s 22(1)(a)(ii)

Quarantine-free travel between Australia and New Zealand has been successful, despite spatially constrained, brief pauses on travellers between the two countries. The ability for both countries to institute constrained pauses is a sign of the system working.

The Australian Government is considering which countries might be suitable next for travel bubbles, including Singapore, which is currently experiencing a COVID-19 outbreak. We anticipate that Singapore's robust public health systems and proactive public health measures will support the containment of this outbreak.

s 22(1)(a)(ii)

Reopening the international border, once vulnerable Australians are protected and it is otherwise safe to do so, will support Australia's long-term economic recovery. Re-opening should occur in stages and be risk-based and aligned with the health evidence. For example, individuals vaccinated in Australia being able to travel overseas, vaccinated visitors being welcomed, and potential changes to quarantine arrangements. Health advice and decisions by different levels of government will continue to be necessary, but the overall objective should be to open our borders as soon as safely possible taking into account risk tolerances that do not threaten the capacity of jurisdictions' health systems.

s 22(1)(a)(ii)

Key risks and sensitivities

There remain numerous factors on which greater certainty is required before being able to establish the pace and nature of reopening. They include: vaccine hesitancy, the severity and transmissibility of variants of concern, further evidence on vaccines' efficacy against transmission, arrivals from high-risk countries, the approach to arriving travellers who have not had 'approved' vaccines, the potential for further legal challenges against travel restrictions, operationalisation of the treatment of vaccinated inbound travellers, and the potential for loss of airlines connecting to Australia.

s 22(1)(a)(ii)

Coordination between the Commonwealth and states and territories will continue to be required to manage borders, quarantine capacity and health resources to increase arrival numbers while continuing to prioritise returning Australians. In addition, Australia might have to prepare for quarantine arrangements to continue in some form, for some travellers, well into 2022 or beyond.

1 Proposed Actions

I recommend the National Cabinet:

s 22(1)(a)(ii)

2. Note that the Taskforce will continue to advise on options to support gradual, risk-based increases to international travel, including exploring additional travel bubbles and increasing arrivals of skilled migrants and international students, while continuing to prioritise the return of Australians from overseas.

s 22(1)(a)(ii)

4. Note that the next Taskforce update will:

   (a) Focus on options for scaling up and diversifying quarantine (such as home quarantine for vaccinated Australians) with a greater attribution to risk, which will include further advice from the AHPPC on different quarantine periods or arrangements for vaccinated travellers to Australia and, depending on the progress of other work, may also reflect proposals for the return of international students and/or the Victorian proposal for a purpose-built quarantine facility,

   (b) Assess options for increased travel for individuals vaccinated in Australia, subject to AHPPC advice on alternative quarantine arrangements, and

   (c) Consider the implications of different quarantine arrangements covered in (a) on operational and funding roles and responsibilities of the Commonwealth, states and territories.

2 Detail of Proposal

Overview

2.1 The Taskforce provided advice on domestic reopening and responses to outbreaks at the 9 April 2021 meeting of National Cabinet. This update describes changes to the risk environment since then, and outlines prospects for safely increasing international travel.

2.2 The Taskforce's assessment of the changes in the risk environment is based on: the latest advice from AHPPC, data on the vaccine rollout, the new system to manage arrivals from high-risk countries, and evidence on the performance of our quarantine, tracing and testing systems. The health assessment of these changes is that, while the vaccine rollout is now progressing well, Australia should maintain most of its international border restrictions and existing quarantine arrangements until the vaccine rollout is more substantially complete, to prevent the risk of significant morbidity and mortality.

2.3 There are still good prospects for a gradual and risk-based expansion of international travel even while most border restrictions remain. This update outlines progress on: safe travel zones, country risk assessments, vaccination certification (including the potential for international travel by individuals vaccinated in Australia), and quarantine arrangements.

s 22(1)(a)(ii)

2.5 Key factors related to reopening international borders are at Attachment A4.

AHPPC advice on a vaccine coverage threshold for reopening

2.6 On 9 April, National Cabinet tasked AHPPC to provide advice and modelling in relation to:

2.6.1. the implications for quarantine arrangements and reopening Australia following the successful vaccine rollout to the most vulnerable Australians;

2.6.2. the public health thresholds that would allow for outbound travel, particularly for individuals vaccinated in Australia, including variations to quarantine arrangements on return; and

2.6.3. the current evidence on the efficacy of TGA-approved vaccines in reducing transmissibility and severity of COVID-19.

s 22(1)(a)(ii)

s 22(1)(a)(ii)

AHPPC advice on quarantine arrangements

2.14 The AHPPC also provided advice on quarantine arrangements for vaccinated and unvaccinated travellers. They considered 5 quarantine arrangements: hotel quarantine (for 7 or 14 days), home quarantine (for 7 or 14 days) or no quarantine.

2.15 The modelling estimated the number of 'exposure days' (that is, the days when an infectious individual is not in quarantine). Ultimately, however, the risk of outbreaks being seeded by travellers is determined by both exposure days and the intensity of infectiousness when individuals enter the community (i.e., not all exposure days are equal). This latter consideration will be addressed in future AHPPC modelling.

2.16 The modelling assumes 100 per cent compliance with hotel quarantine, falling to 70 per cent for home quarantine (based on feedback from states and territories). It also assumes a fixed infection rate of 1 per cent of unvaccinated arrivals. The infection rate for vaccinated arrivals is adjusted down according to the evidence of vaccine effectiveness against infection (for one or two doses of AstraZeneca). Finally, for simplicity, it is assumed that close and distant contacts of travellers and workers in the quarantine system are all unvaccinated and fully susceptible.

2.17 For unvaccinated travellers, any alternative quarantine arrangement substantially increases the number of exposure days under any scenario (the second safest alternative – 7 days in hotel quarantine – would still see the number of exposure days double).

2.18 By contrast, for vaccinated travellers, the 'exposure days' associated with a 7-day hotel quarantine duration are less than those for unvaccinated individuals spending 14 days in quarantine. This suggests that 7 day hotel quarantine for vaccinated travellers could be adopted without any increase in the risk of outbreaks, subject to AHPPC's further modelling on intensity of infectiousness.

2.19 The AHPPC will provide further advice to confirm this conclusion and operational impacts of any change in quarantine arrangements. In particular, it will provide further advice on the risk of outbreaks (rather than just exposure days) and on further alternative arrangements (for example, a different duration, or a mix of hotel and home quarantine). Finally, the AHPPC will consider the range of factors that are relevant for giving effect to possible changes in quarantine arrangements, including but not limited to: type and nature of the vaccine provided; the delivery of the vaccine; whether people are travelling in groups; and the suitability of the person's residence for home quarantine (such as living with others).

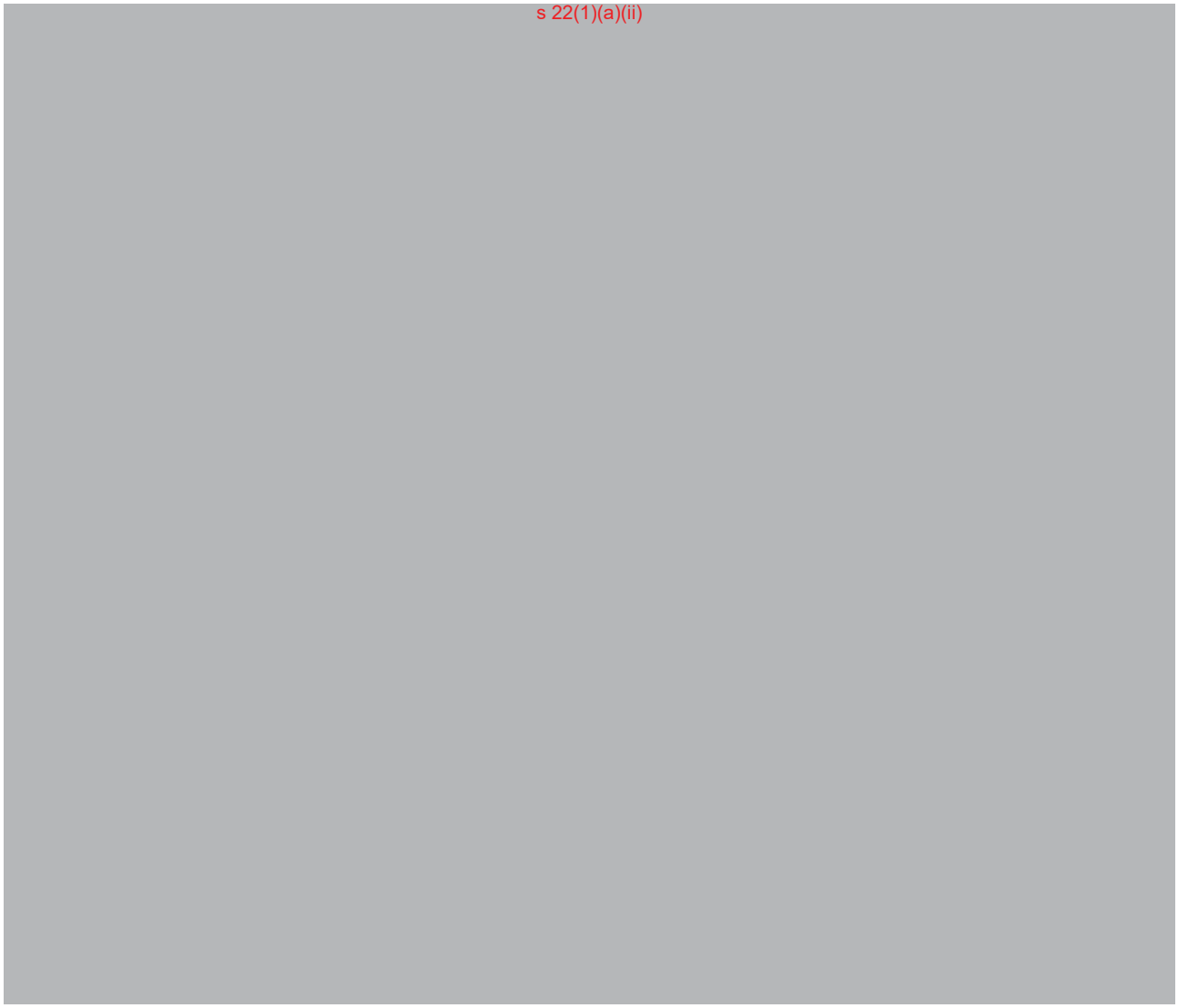
2.20 AHPPC advises that the scalability of any given quarantine pathway will differ depending on the requirements for oversight and invigilation. Consultation with all jurisdictions will be needed to determine how such considerations impact on the ability to increase the number of arrivals through one or other model of quarantine.

Further AHPPC modelling and advice

2.21 The AHPPC already has plans for further modelling and advice in relation to reopening and quarantine arrangements. In conjunction with this, the Taskforce proposes to explore 3 to 4 scenarios, based on specified end-result health system outcomes (for example, a maximum number of patients in ICU) to model the preceding conditions that may lead to such outcomes, given realistic levels of vaccine uptake. This 'working back' approach will allow for risk-based analysis of the trigger points in the epidemiology or health system utilisation where public health measures may be required.

2.22 The Taskforce will also work with the AHPPC to prioritise different pieces of advice, noting ongoing work in relation to reopening and quarantine arrangements (described above), as well as separate work on domestic vaccination certification.

s 22(1)(a)(ii)



Systems are in place to manage arrivals from high-risk countries

2.28 Though the COVID-19 vaccine rollout is progressing in many countries, there continue to be significant outbreaks internationally, such as the current second wave in India.

2.29 At its meeting on 30 April 2021, the National Cabinet noted a methodology to identify moderate- and high-risk countries, which would inform decision-making on international arrivals entering hotel quarantine. This methodology is based on two considerations:

2.29.1. The proportion of positive COVID-19 cases among international arrivals to Australia by jurisdiction (quarantine risk), and

2.29.2. The number of positive cases (nationally) from a country of acquisition within the preceding 28-day period (country risk).

2.30 Countries identified as medium-risk could trigger consideration of targeted adjustments, which may include tightened pre-departure testing or new testing regimes. If a country is determined to be high-risk these adjustments could be augmented by paused or reduced flight frequency, or redirection or further spacing of

flights. Any decisions to pause arrivals from countries identified as high-risk are based on an assessment of health advice from the CMO.

2.31 India was the first country to meet the threshold of a high-risk country. Based on the Commonwealth Health Department assessment of high-risk countries on 25 May, as at 1 June, India is considered moderate-risk.

2.31.1. New measures are in place for all direct flights from India, which require passengers to return both a negative COVID-19 Polymerase Chain Reaction (PCR) test (as required under the existing Biosecurity Act determination) and a negative Rapid Antigen test before boarding (as required by airlines).

2.31.1.1. As at 1 June, there are around 11,000 Australians in India registered with DFAT waiting to return to Australia. This represents almost one-third of all registered Australians, and includes around 1000 assessed as vulnerable.

2.31.1.2. Based on the assessment of high-risk countries by the Commonwealth Health Department on 25 May, 24 per cent of cases in quarantine over the previous 28 days were acquired in India. However, of the Facilitated Commercial Flights (FCFs) since the cessation of the travel pause and new screening measures put in place, only 0.9 per cent have tested positive as at 31 May 2021 (compared to 13.6 per cent previously).

2.32 COVID-19 outbreaks are likely to continue. Our forward schedule of FCFs is flexible enough to adapt to changing demand, including from some of the countries where large cohorts of Australians remain, such as in Southeast Asia. When demand increases, it will be imperative that jurisdictions agree to take passengers from higher risk locations, noting that additional health assurances may be necessary, as jurisdictions have agreed to do with additional flights from India.

Our quarantine, testing, and contact tracing systems are working effectively

2.33 Only a small number of incursions from quarantine into the community have occurred to date, but they remain the most significant risk for COVID-19 outbreaks occurring in Australia. Cases within the quarantine system should be expected.

2.33.1. Since the Taskforce's last update on 9 April and up to 26 May, there have been five system breaches associated with hotel quarantine, taking the total to 20. As at 31 May, 3400 active cases of COVID-19 infection have been identified in quarantine, with only 6.6 breaches per 100,000 travellers going through quarantine. However, the implementation of necessary responses to contain these breaches has had a significant economic and social impact on the affected communities.

s 22(1)(a)(ii)

International travel can gradually grow even while the border remains substantively closed

2.35 As noted above, risks to Australia of cases from international arrivals are high and are likely to remain so for some time. Accordingly, an expansion of quarantine capacity or risk-managed green-lane travel will be critical to enabling COVID-safe travel. Key potential avenues for gradually increasing international arrivals, as well as increased outbound travel, include:

2.35.1. Expansion of quarantine capacity;

2.35.2. Modified risk-based quarantine arrangements for travellers with vaccination certification, including earlier access to outbound travel for vaccinated Australians, subject to health advice;

2.35.3. Safe travel zones (quarantine-free or modified quarantine travel) for countries assessed as 'green' (low-risk), such as New Zealand; and

2.35.4. Alternative industry-funded quarantine arrangements for specific cohorts, such as seasonal workers and international students.

Increasing quarantine capacity is critical to international reopening

2.36 Given the continued COVID-19 outbreaks globally, there is a potential that quarantine facilities could be required well into 2022 or beyond. Yet the stock of committed hotel quarantine capacity across Australia is declining. Accordingly, an expansion and diversification of quarantine capacity will be critical to enabling COVID-safe travel for some time to come.

2.36.1. There are some limiting factors for increasing quarantine capacity, including policing, ICU capacity and the public health workforce. An upscaling of quarantine must ensure broader public health and public safety can be maintained.

2.37 Alternatives to hotel quarantine arrangements are beginning to increase prospects for increasing arrivals. These alternatives include the following.

2.37.1. *Dedicated quarantine facilities:* The Centre for National Resilience, located at Howard Springs in Darwin, is designed to prioritise the return of Australians stranded overseas, particularly the most vulnerable. The facility can now accommodate up to 2,000 returning Australians per fortnight and is explicitly used to repatriate Australians registered with DFAT as wanting to return.

2.37.2. *Victorian proposal:* The Commonwealth and Victoria continue to work towards the establishment of a dedicated quarantine facility as proposed by Victoria. The objective is for a site that could be used for many purposes beyond COVID-19. While progress will be expedited as much as possible, extra capacity is unlikely to arise until early 2022 given planning and other lead times.

s 22(1)(a)(ii)

2.38 As described above, the AHPPC advice at Attachment A1 includes modelling of some alternative quarantine arrangements and it will provide further advice to the Taskforce.

Safe travel zones for low-risk 'green' countries

2.39 Building on the success of the trans-Tasman COVID-19 Safe Travel Zone with New Zealand, the Commonwealth will continue to assess whether additional countries meet the requirements for quarantine-free or modified quarantine travel.

2.40 The Prime Minister and Minister for Trade, Tourism and Investment have both recently publicly identified Singapore as a potential location for the next travel bubble; however, no timeframe can be confirmed. Commonwealth officials have been in discussions with Singapore about quarantine-free travel.

2.40.1. Currently, Singapore is experiencing a new COVID-19 outbreak and has reintroduced further domestic restrictions. The impact of variants and rising case numbers in Singapore will continue to be closely monitored. We anticipate that Singapore's robust public health systems and proactive public health measures will support the containment of this outbreak.

2.40.2. In October 2020, Singapore determined Australia to be low-risk and so opened its borders to travellers from Australia using the Air Travel Pass system. Under this system, Australians travelling to Singapore must undertake a PCR test on arrival and isolate until the result. Australia has not reciprocated this, but may be able to influence improvements to this system using our experiences with India.

2.41 A challenge to opening travel with nations that may otherwise be viewed as a 'stopover hub' includes isolating the passengers who are eligible for travel under a Safe Travel Zone agreement from those who are merely passing through. Separate flights for 'green' passengers will be essential, in addition to 'red' flights, and airports must be capable of separating these cohorts.

2.41.1. Further challenges include ensuring countries determined as low-risk are not perceived as a back-door entry into Australia, given the risks that increased transit passengers may create for the low-risk country.

2.42 In addition to Singapore, a number of other countries have requested travel bubbles with Australia, including several Pacific Island nations.

s 22(1)(a)(ii)

s 22(1)(a)(ii)

[redacted]

3 Risks and sensitivities

3.1 As described above, there remain numerous factors that will affect the pace and nature of reopening. They are summarised in Attachment A4 and include: vaccine hesitancy, the severity and transmissibility of variants of concern, vaccine efficacy against transmission, arrivals from high-risk countries, the approach to arriving passengers that have not had 'approved' vaccines, the outcome of legal challenges against travel restrictions, and the potential for loss of airlines connecting to Australia.

s 22(1)(a)(ii)

[redacted]

4 Impacts

4.1 Consistent, coordinated and proportionate responses to outbreaks of COVID-19, taking into account the changing risk profile, will increase certainty and confidence within the Australian community.

5 Consultation

5.1 Commonwealth agencies and the First Secretaries Group were consulted.

Attachments

A1: AHPPC advice on a vaccine coverage threshold for reopening

s 22(1)(a)(ii)

A3: Country Risk Assessments

A4: Managing Contingencies

Attachment 1

AHPPC advice to National Cabinet 04 June 2021

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Models of quarantine pathways

While strict border controls remain in place, there remains an imperative to increase the overall numbers of arrivals into Australia, including facilitation of high value cohorts. The quarantine system is a 'filter' for infections, but also a place where transmissions can occur. Vaccination represents an additional risk mitigation in the quarantine system. As before, vaccine assumptions about the risk of acquisition and onwards transmission are based on ATAGI estimates of effectiveness following one or two doses of the Astra Zeneca product.

We use an individual-based model to estimate the efficacy of alternative quarantine models - hotel quarantine, home quarantine or no quarantine - for unvaccinated and vaccinated arriving travellers. To simulate the effects of vaccination, we assume a constant proportion of 'exposed' arrivals. Here, we assume that without vaccination, 1% of arrivals are infected. In our vaccination scenarios, we assume that this group of 'exposed' arrivals has been vaccinated. When vaccinated, they have a reduced probability of arriving infected, and a reduced capacity to transmit the virus to close and distant contacts and workers in the quarantine system, all of whom are assumed to be unvaccinated and fully susceptible.

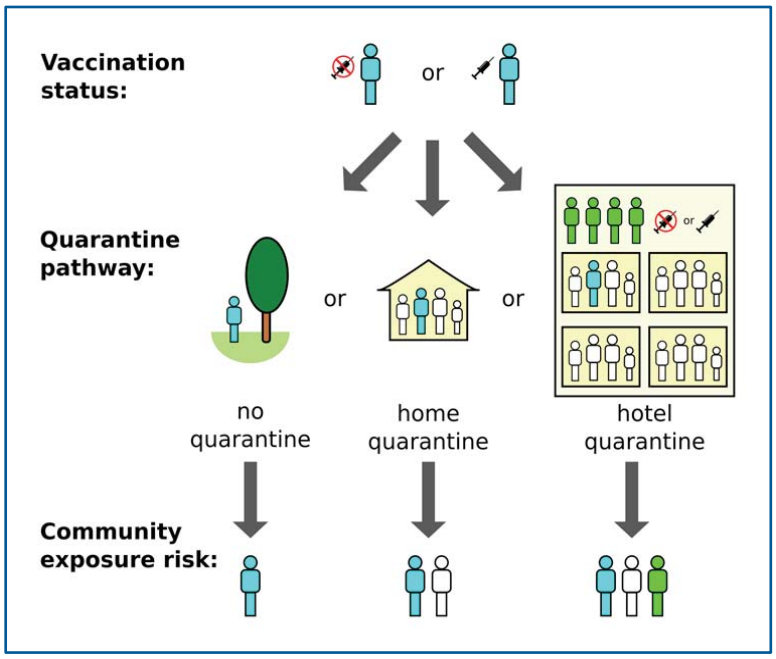
The proportion of travellers arriving infected is reduced by a factor equal to the vaccine efficacy for protection against infection. Those who do arrive infected have reduced contagiousness, so that the probability of infecting each susceptible contact is reduced by a factor equivalent to the vaccine efficacy against onward transmission. The values reported here for exposure days generated per traveller should therefore be viewed as conservative (high) estimates, because transmission within quarantine is not mitigated by vaccination of uninfected travellers.

We quantify efficacy in terms of 'exposure days': the number of days that an infectious person spends after discharge from quarantine, potentially seeding community transmission. We quantify the reduction in exposure days due to vaccination of arriving travellers. We further quantify the increase in exposure days arising from reductions in the duration of hotel or home quarantine, and reductions in compliance with home quarantine. Details of model implementation are provided in the appendix.

An 'exposure day' occurs when an infectious individual is not in quarantine. The stage of infection at which an individual is 'released' influences their viral load and infectiousness, hence the potential for onward transmission associated with exposure days may vary. In this report, we do not differentiate between exposure days produced by cases at different points in their infection. Translation of exposure days to the risk of seeding an outbreak requiring a public health response will be included in the next iteration of this work.

By assuming a fixed input case proportion to the system, this work allows direct comparison of the efficacy of each 'filter' pathway. In reality, overall risks of 'output' exposure days will also relate to the prevalence of infections in travellers and the rate at which they arrive. This figure will be determined by the distribution of arrivals by country of origin, the current prevalence of infection in those countries, and the likelihood that a traveller from any given country will have received an effective vaccine. These inputs will be derived from Country Risk Assessments being prepared by CDNA, and formal advice on determination of vaccine status.

Figure 6: Schematic of quarantine models considered. Each scenario computes the number of exposure days per incoming arrival. The result is a relative estimate of breach potential for each system, that can be multiplied by the expected number of travellers moving through the specified system.



Key findings for both one and two dose vaccine assumptions reported in Tables 5.1 and 5.2 are a marked reduction in the risk of exposure days for vaccinated compared with unvaccinated individuals passing through any pathway. These reductions are logically greater for two dose vaccine efficacy assumptions and are primarily driven by the reduction in risk of acquisition in the source country.

Pursuing a 'no quarantine' pathway for vaccinated individuals poses a much higher risk of incursions compared with the current standard, deemed unacceptable at the present time. Again, the magnitude of these risks logically relates to the number of vaccine doses that an individual has received.

The 'home quarantine' model presented here is an intermediate option that makes explicit the importance of compliance. Compliance as low as 70% drives risk within this system, and the fact that 30% of individuals are effectively pursuing 'no quarantine' is more influential than the duration for which compliant individuals stay home.

For the hotel quarantine pathway, the simulation results summarised in Tables 5.1 and 5.2 indicate that exposure days per arrival approximately double when quarantine duration is reduced to 7 days. While this increase may appear modest, Figure 7.1 demonstrates that the increase in exposure days for the 7-day scenario includes a substantially larger proportion of individuals contributing 5 or more infectious days following release from the system. This longer duration of infectiousness is more likely to include the peak infectious period, equating to a higher risk of community transmission per breach. Work is ongoing to quantify outbreak risk for individual breach events.

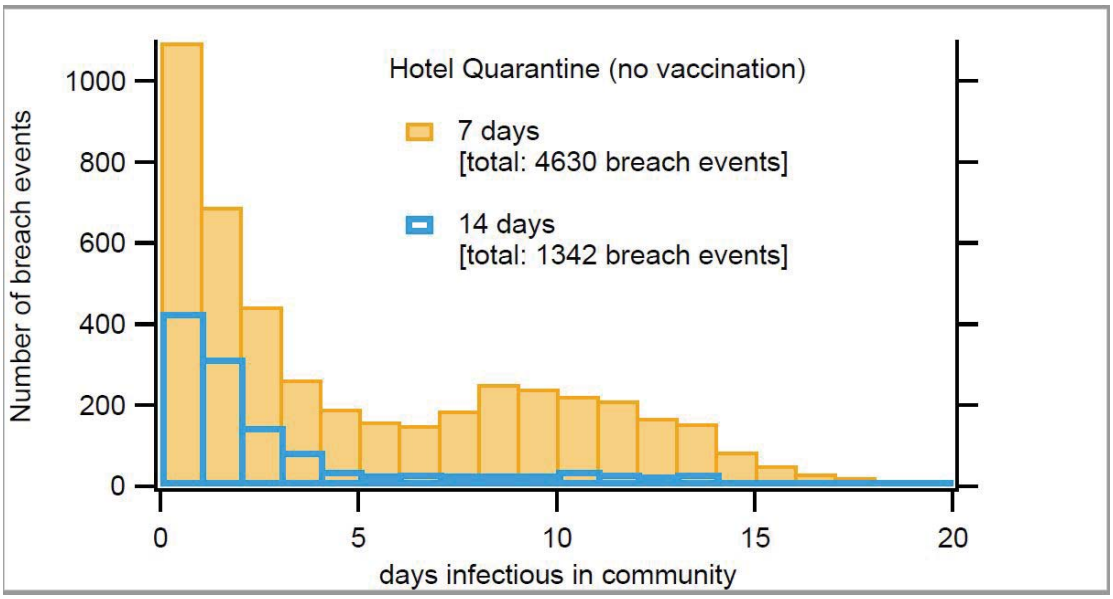
Table 5.1: Border risk assuming vaccine effectiveness against transmission of 81% (one dose of AZ). Exposure days are reported per 1000 arrivals and relative to a baseline scenario with 14-days of quarantine and no vaccination. 10 different quarantine scenarios are represented, varying the type of quarantine setting, the minimum duration of stay in that setting, and the vaccination status of infected arrivals.

scenario vaccine efficacy against infection: 64% vaccine efficacy against onward transmission: 47%			exposure days per 1000 travellers	exposure days per 1000 travellers relative to baseline
hotel quarantine (100% compliance)	14 days	unvaccinated	2.48	1.000
		vaccinated	0.72	0.290
	7 days	unvaccinated	5.14	2.077
		vaccinated	1.51	0.608
home quarantine (70% compliance)	14 days	unvaccinated	48.60	19.614
		vaccinated	15.16	6.119
	7 days	unvaccinated	52.36	21.132
		vaccinated	16.09	6.494
no quarantine	NA	unvaccinated	182.92	73.830
		vaccinated	55.82	22.531

Table 5.2: As for Table 5.1 but assuming vaccine effectiveness against transmission of 93% (two doses of AZ).

scenario vaccine efficacy against infection: 80% vaccine efficacy against onward transmission: 65%			exposure days per 1000 travellers	exposure days per 1000 travellers relative to baseline
hotel quarantine (100% compliance)	14 days	unvaccinated	2.48	1.000
		vaccinated	0.28	0.114
	7 days	unvaccinated	5.14	2.077
		vaccinated	0.83	0.334
home quarantine (70% compliance)	14 days	unvaccinated	48.60	19.614
		vaccinated	7.05	2.845
	7 days	unvaccinated	52.36	21.132
		vaccinated	7.99	3.227
no quarantine	NA	unvaccinated	182.92	73.830
		vaccinated	27.83	11.234

Figure 7.1: Distribution of exposure days for each simulated breach event for unvaccinated arrivals passing through the hotel quarantine model using 7 or 14-day quarantine durations. The probability of breach events producing larger numbers of exposure days is higher for 7-day quarantine duration.



Figures 7.2 and 7.3 demonstrate the distribution of exposure days produced by each breach event for vaccinated arrivals passing through hotel quarantine. Vaccination reduces the absolute number of breach events for the same throughput of travellers in proportion to assumed effectiveness but does not alter the distribution of exposure days among the breach events that occur.

Figure 7.2: As for Figure 7.1 but assuming vaccine effectiveness against transmission of 81% (one dose of AZ). The probability of breach events producing larger numbers of exposure days remains higher for 7-day quarantine duration but is markedly reduced compared with Figure 7.1.

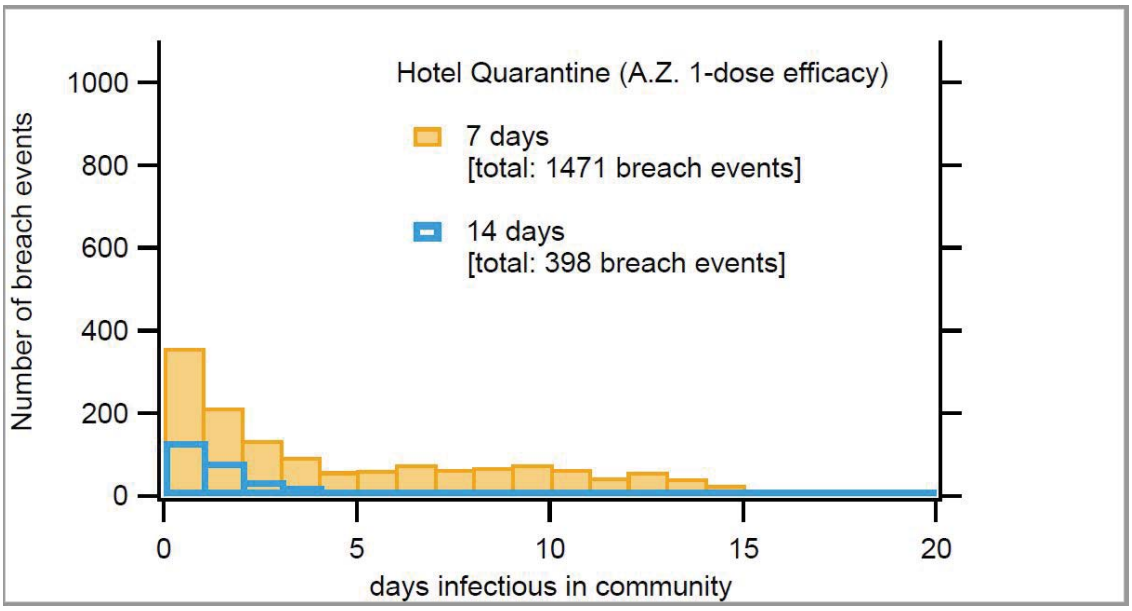
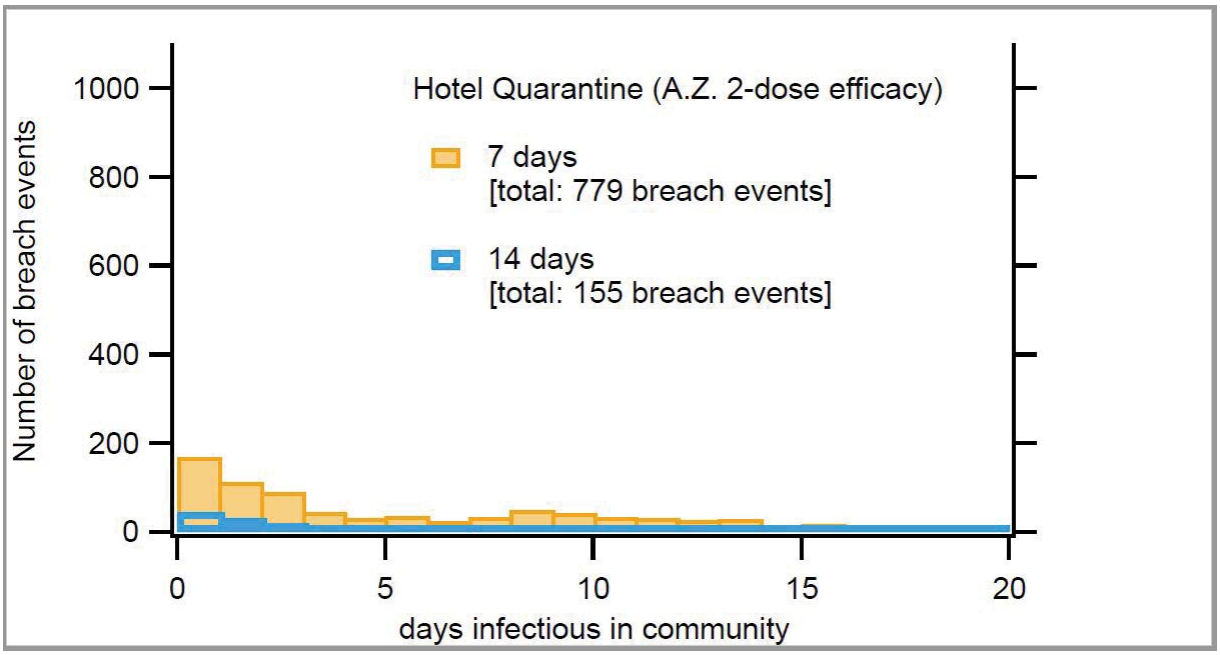


Figure 7.3: As for Figure 7.1 but assuming vaccine effectiveness against transmission of 93% (two doses of AZ). The probability of breach events producing larger numbers of exposure days remains higher for 7-day quarantine duration but is markedly reduced compared with Figure 7.1, and lower than Figure 7.2.



Community exposure days associated with a 7-day hotel quarantine duration for vaccinated individuals are less than those for unvaccinated individuals spending 14 days in this system. Work is ongoing to determine the risk of outbreaks being seeded by these different groups of individuals, as the stage of infection at which individuals are released determines the intensity of their infectiousness, in addition to the number of days infectious.

Further work will report on outbreak risk. We will also explore intermediate quarantine models, which might include split hotel/home quarantine or a duration of 10 days in either location, pending further advice from the Communicable Diseases Network of Australia over coming weeks.

It is worth noting that the UK roadmap out of lockdown sees an ongoing place for border restrictions and quarantine to reduce the likelihood of importation of variants of concern that might undermine the impact of the COVID-19 vaccine program. The ongoing requirement for and objectives of border measures in an era of established community transmission should be considered.

Ongoing work and next steps

Models of quarantine pathways

Results presented here report the likely exposure days arising from individuals released from the quarantine pathway through which they transit. The actual risks of seeding an outbreak arising from each pathway will be considered by passing these exposure day 'inputs' through a stochastic model. Outbreak risks will be reported as the likely number of events requiring a public health response at any given time, allowing benchmarking against public health response capacity. Exceedance of capacity has implications for loss of control leading to community transmission.

Additional quarantine pathways will be modelled following further advice from the Communicable Diseases Network of Australia. Future work will also evaluate the risks arising from group cohort quarantine models currently being envisaged, for example student cohorts. These more detailed scenarios will consider risk reductions achieved by vaccinating other travellers and workers in the system.

Absolute risks associated with each pathway will be determined by the true prevalence of infected arrivals through each system, which will be influenced by the distribution of arrivals, the prevalence of infection in their source countries, and the likelihood that they have received efficacious vaccines. We will liase with CDNA and other relevant committees to consider plausible scenarios that might be used to determine which quarantine pathways are appropriate for travellers representing different risks of importation.

The scalability of any given quarantine pathway will differ depending on the requirements for oversight and invigilation. Consultation with the jurisdictions will be needed to determine how such considerations impact on the ability to increase the number of arrivals through one or other model of quarantine.

Detailed health impacts modelling

Our findings indicate the likely need for some degree of ongoing public health and social measures to constrain epidemic growth, even at high levels of population vaccine uptake, as vaccine-derived immunity and behaviour interact to influence transmission potential.

The present work makes simplifying assumptions about population mixing. We are currently developing a model framework that includes a more detailed representation of mixing within and between age groups, that will allow consideration of the impacts of social measures on transmission potential.

In addition, the simulations in this report assume a fixed vaccine coverage at the time community transmission is established. Our more detailed dynamic model will more realistically represent ongoing vaccine rollout over time, on which epidemic growth will be superimposed.

Future work will focus more explicitly on hospitalisations and ICU admissions in relation to jurisdictional health sector capacity, as it is anticipated that smaller states may need to impose social measures more rapidly than larger ones, to ensure that case load is manageable within available resources.

Models of quarantine

Individual-based model of COVID-19:

For an infected individual, contagiousness initially increases until the end of their incubation period. It then decreases until recovery. Test sensitivity (the probability of returning a positive RT-PCR test) increases steeply just before symptom onset, then slowly decreases throughout the shedding period which can be several weeks long and extend beyond the period of infectiousness. We assume 33% of cases are completely asymptomatic. The relative infectiousness of each individual is sampled from a gamma distribution with dispersion parameter 0.25, in order to reproduce the observed over-dispersed secondary case distribution.

Scenarios: We investigate three different models of quarantine (listed below). For all scenarios, our simulations consist of a discrete-time stochastic agent-based model. Individuals enter the system in groups and are replaced with new arrivals upon discharge for a constant traveller population of 100 individuals. The throughput of the system is computed as the mean number of travellers discharged per week, and exposure hours per arrival is computed as the mean number of exposure hours generated per week, divided by the weekly throughput.

Hotel quarantine (14-day duration).

- Arriving travelers are placed into quarantine in close contact groups of four travellers (to simulate a typical family). For a 14-day quarantine stay, the throughput of the system is approximately 50 travelers per week.
- These groups have weaker contact with other groups and with workers in quarantine, who are assigned at a ratio of 1 worker to every 5 travellers. Workers also have contact with one another.
- All travellers are tested on days 3 and 12 of quarantine, with a 1 day turnaround time.
- If a positive test result is returned, a traveller is transferred to isolation for 10 days, or until 10 days have passed since the onset of symptoms. In addition, all close contacts have their quarantine extended by 14 days (this effectively resets the clock for these travellers, and they are tested again on days 3 and 12 of extended quarantine).
- If an infected traveller expresses symptoms they are transferred to isolation as though they had tested positive, and their contacts are put into extended quarantine as described above.
- If an infection is discovered in a close contact currently in extended quarantine, that traveller is isolated, but the extension clock is not reset for their close contacts. Once all members of a group have met the criteria for discharge from quarantine, the group is removed and replaced with a new group of arriving travellers.
- If any members of the discharged group are infected at discharge, their remaining time infectious is added to a running tally of exposure days.
- Workers are rostered either 5 or 3 days per week and are tested each day they attend the facility. If they test positive, they are removed and replaced with a new, susceptible worker.

- Each day that an infectious worker is not detected is added to the running tally of exposure days.

Home quarantine (14-day duration):

- Arriving travelers quarantine in close contact groups in a home context, thus removing the risk of transmission to other arriving travellers or quarantine workers.
- Testing is conducted on the same schedule as hotel quarantine (days 3 and 12).
- We assume partial (70%) compliance with home quarantine; that is, 30% of travellers are assigned as non-compliant. If a non-compliant traveller is infected, their whole infectious period is added to the running tally of exposure days. In the current implementation of the model, non-compliant travellers are never tested, do not self-report with symptom onset, and do not go into extended quarantine if cases are detected in primary contacts. This implementation may be revised in future versions pending advice.

No quarantine:

- This scenario is modelled as home quarantine with 0% compliance; that is, all infectious travellers have their entire infectious period added to the running tally of exposure days.

To estimate the reduction in exposure risk associated with vaccinated travellers, we investigated the following two conditions within the above scenarios:

- **Unvaccinated:** arrivals are not vaccinated, a proportion of 0.01 (1%) of incoming arrivals are infected.
- **Vaccinated:** all 'exposed' arrivals are vaccinated, and only $0.01(1 - E_i)$ arrive infected, where E_i is the level of protection provided by one or two doses of vaccine against initial infection.

To estimate the exposure risk associated with reducing quarantine duration for arriving travellers, we investigated the following hotel and home quarantine durations:

- 14 days, with testing on day 3 and 12
- 7 days with testing on day 2 and 5 (close contacts of cases are still put into 14-day extension)
- 0 days (the "no quarantine" scenario is equivalent to a 0-day quarantine duration)

Attachment A3: Country Risk Assessments

The Country Risk Assessment (CRA) considers a country's COVID-19 incidence and its capacity and capability to detect, manage and respond to the pandemic. Risk rating outcomes are stratified into 3 levels: low (green), medium (amber) or high (red).

CRAs are drafted by the Commonwealth Department of Health with input from the Department of Foreign Affairs and Trade. They are technically reviewed by the Communicable Diseases Network Australia's (CDNA) Jurisdictional Executive Group (senior public health officials from states and territories) for the validation of the assessment and risk rating outcome prior to submission to the Chief Medical Officer for approval. Once approved, the assessments are shared with the AHPPC.

To date, there are 11 approved assessments, and a further 14 in progress. Some have been paused, such as Singapore's and the reassessment of Fiji to monitor current outbreaks. New Zealand is the only country to date that has been assessed as green or low-risk.

The CRA process is a point-in-time assessment. Assessed countries are monitored for an improvement or deterioration in their COVID-19 situation to ensure opportunities for any identifying a low-risk country is maximised.

Many countries without reported cases of COVID-19 in the community, especially in the Pacific, have limited health system and contact tracing capacity, thereby presenting a risk that COVID-19 may remain undetected in the community before it can be quickly contained. The consequence of this is the likelihood that COVID-19 could be imported into Australia from such countries if appropriate mitigations are not in place (such as 14 day quarantine).

CRAs will be key to informing 'green zone' decisions, but there are other factors in determining green zones (such as policy and legislative amendment, operational arrangements, diplomatic negotiations) to be considered.

A4: Managing contingencies

Table 1 explores several factors and contingencies that could have implications for Australia's ability to reopen domestically and internationally.

Table 1: Key factors

Contingency	Possible implications for reopening
s 22(1)(a)(ii)	
High-risk countries	Consistent with National Cabinet's decision on 22 April 2021 to place additional restrictions on Australians returning from high-risk countries, we may need to remain selective regarding which countries people are allowed to enter Australia from and impose more stringent requirements where appropriate (especially for quarantine).
s 22(1)(a)(ii)	

The process for reopening Australia's international borders should be gradual and risk-based. New strains are more likely to arise in high-risk countries where there are larger uncontrolled outbreaks and vaccination is less progressed. Given the downside contingency risk from new strains, it is prudent to prepare for the possibility that quarantine will continue to be required for high-risk arrivals into the foreseeable future.

In considering when to allow outbound travel for vaccinated Australian citizens, options for quarantine for returning vaccinated Australians may also need to be considered, depending on emerging evidence regarding the efficacy of vaccinations in reducing transmission. The AHPPC is undertaking further work on this and will provide advice to FSG on possible options.

Airport infrastructure is also a constraining factor. With dynamic scheduling and multiple services in a full-scale international airport environment, it is difficult to see low, medium, and high-risk cohorts operating through a single airport: keeping a more pure 'green lane' low-risk arrival setting operating separated from a high-risk 'red lane' arrival is more manageable with multiple transit last ports of call to Australia.

Diversification of quarantine settings, particularly as risk appetites change, will be the quickest way to expand international arrivals and allow 'economic cohorts' to return at scale. In addition to alternative quarantine models, this could include additional green lane travel arrangements for those that are low-risk, at home quarantine with monitoring for those who have a residence (and who may have had vaccination in the absence of a robust international vaccination certification system), industry-led quarantine, shorter quarantine periods where regarded 'safe', and no quarantine where there is confidence in an individual's vaccination status.

Some restrictions and systems applying to the international border may need to remain in place even when the vaccine rollout is complete, should a large proportion of the community remain unvaccinated or vaccines not provide sufficient protection against variants of concern. These restrictions would likely include purpose-built quarantine, high-risk country identification, and rapid antigen tests for arrivals, amongst others.

National Cabinet Paper

Title	Flow of International Passengers
Sponsoring Minister/s	PRIME MINISTER

Summary

Summary

The Commonwealth, States and Territories agree to nationally consistent actions to manage the flow of international passengers into Australian airports in the public interest.

Key reasons

Australian citizens and permanent residents were strongly encouraged to return to Australia in March 2020 due to the COVID-19 pandemic. As of 5 July, over 357,000 Australian citizens and permanent residents have returned to Australia since 13 March.

As of 8 July, 15,373 Australian residents overseas have registered an interest through the Australian consular systems to return to Australia. Indicative national quarantine capacity has been as high as approximately 13,000 rooms (~12,000 people), with hotel contracts, outbreak control, hotel sanitisation, and human resources reducing numbers to approximately 8,000 people.

Our four largest passenger arrival States - New South Wales (NSW), Victoria (VIC), Queensland (QLD), Western Australia (WA) - have advised that they have limited quarantine capacity to take on further international passenger arrivals in the immediate term, with VIC no longer receiving international arrivals in order to reset its COVID-19 management.

s 47B(a)

States, Territories and the Commonwealth will need to work cooperatively together to accommodate international passenger arrivals across all jurisdictions, including providing regular and transparent data on available quarantine capacity, to ensure passenger caps imposed on airlines and airports are in the public interest. Managing the flow is preferable to a hard-close of the international air border.

Key risks and sensitivities

Air traffic capacity and quarantine capability are inextricably linked in a global pandemic.

Dis-incentivising return travel to Australia through explicit financial mechanisms may create more angst amongst genuine residents wishing to return, than the cap approach.

Establishing and extending caps on passenger arrivals effectively delays the return of some Australians, possibly for weeks and months. Long delays will increase the financial and emotional strain on these citizens and permanent residents, and while it will stem pressure on quarantine capacity in all jurisdictions, this pressure may rise again in coming months. Caps also have a financial impact the aviation industry.

Sustained passenger caps may also lead to the cancellation of some services which may have an adverse impact on inbound and outbound international air freight capacity. Getting a robust handle on quantitative capacity data is essential.

Proposed Actions

I recommend the National Cabinet:

1. Agree a national approach for the management of incoming international passengers, based on jurisdictional quarantine capability and number of incoming passengers, be introduced between 12 July and 8 August 2020 and potentially beyond. The approach is based on:
    (a) Timely and accurate quarantine capacity data and capability data and information
    (b) Charges for quarantine arrangements
    (c) Passenger cap arrangements for airports where quarantine capacity is exhausted
    (d) Passenger cap arrangements for airports where quarantine capacity exists

2. Agree Australian citizens and Australian permanent residents continue to be the passenger cohorts that are prioritised for returning to Australia.

3. Note all jurisdictions have the ability to charge for hotel quarantine. Jurisdictions are developing their own framework for cost reimbursement for quarantine of other jurisdictions' residents.

4. Agree to the AHPPC's Advice of 10 July 2020 on 'Nationwide Review of Hotel Quarantining Arrangements'.

5. Note the following passenger caps proposed to be put in place at Sydney, Melbourne, Brisbane and Perth airports with caps also to be agreed between the Commonwealth and the relevant States and Territories for Adelaide, s 47B(a) and Darwin airports

    (a) Melbourne – continued suspension of inbound passenger arrivals until further notice
    (b) Sydney – continued cap of 450 arrivals per day (with a cap of 50 passengers per flight with some flexibility) until at least 8 August 2020
    (c) Brisbane – introduce a cap of 500 arrivals per week (with a cap of 30 passengers per flight with some flexibility) until at least 8 August 2020
    (d) Perth – introduce a cap of 75 arrivals per day (with a cap of 50 passengers per flight with some flexibility) until at least 8 August 2020.

6. Agree any incoming passenger cap requests must seek to maximise use of existing quarantine capacity and be based on accurate and transparent capacity and capability data and information.

7. Agree passenger cap decisions will be taken in the public and national interest and subject to the latest health advice from AHPPC.

8. Agree that jurisdictions review these arrangements and national quarantine capacity before the end of July 2020, with the outcomes of the review to be considered by National Cabinet.

9. Note the ongoing movement of critical international airfreight must continue during this period and border closures will only be considered as a last resort.

1 Detail of Proposal

Flow-on impacts have put significant stress on the national quarantine system

1.1 As of 8 July, 15,373 Australian residents overseas have registered an interest through Australian consular systems to return to Australia due to the COVID-19 pandemic. Between 13 March and 5 July, over 357,000 Australian citizens and permanent residents have returned to Australia.

1.2 It is expected that not all of those with an interest in returning will be able to return to Australia in the immediate term; in many cases they have dual residency and have not lived in Australia for a long time, but desire to use their residency because of COVID-19. However, there are some genuine cases amongst this number particularly in locations where international flights direct to Australia have been difficult and they do not have financial flexibility. Department of Foreign Affairs and Trade (DFAT) is providing assistance to known, genuine cases.

1.3 In addition, there will be many Australians at cities with major air traffic hubs who have no difficulty in purchasing a ticket if they need to and will not have sought consular assistance and cannot be captured in the passenger projections.

1.4 There are several key reasons why we have needed to allow some international flights to continue to operate to Australia:

- to allow Australians returning on emergency and approved compassionate grounds, including the Pacific humanitarian corridor and diplomatic arrivals,
- to enable freight to be carried in these aircraft,
- to enable foreign citizens to repatriate home, and
- to avoid exacerbating the backlog of Australians trying to return from overseas.

1.5 Having reduced the backlog of Australians overseas, the Commonwealth has used its powers under the *Air Navigation Regulations 2016* (ANR's) to ensure no international passengers can arrive into VIC between 1 July 2020 and 14 July 2020 inclusive, to assist VIC to 'reset' its COVID-19 outbreak.

1.6 The actions taken apply to incoming passenger flights only. They do not apply to international airfreight services entering VIC, ensuring the ongoing movement of critical airfreight during this period. Outbound international flights are also permitted, ensuring foreign nationals are able to be repatriated to their home countries.

1.7 The decision to suspend international passenger arrivals into Melbourne for at least two weeks is expected to displace between 4,000-5,000 passengers. Airlines have rebooked some passengers on flights arriving into other cities.

1.8 This is having a cascading effect on quarantine capability across other jurisdictions, particularly in NSW, noting that NSW resources were already under pressure from being the major destination for returning Australians.

1.9 In response to an urgent request from NSW, the Commonwealth has introduced a cap on incoming passenger arrivals into Sydney (450 per day) with some flexibility on individual flight passenger numbers. The WA Government has also requested caps on

passenger arrivals into Perth and it is understood other States and Territories support caps being brought into their jurisdictions.

1.10 QLD introduced fees for quarantine in government arranged accommodation from 1 July 2020 and the NT introduced fees for quarantine in government arranged accommodation from 3 April 2020. WA and NSW have flagged that a charge may be put in place. A uniform approach to charging for quarantine may create a more 'level playing field' in terms of citizens arriving in different Australian cities.

Quarantine pressures likely to continue for some time

1.11 The 'back-log' in the number of passengers seeking to return home is expected to sustain pressure on the quarantine capacity in all jurisdictions over the coming months. It is critical that Commonwealth, States and Territories work together to support and facilitate the distribution of international passengers across all jurisdictions.

1.12 Sydney and Melbourne have taken the majority of passengers, with NSW taking on 4,074 passengers between 1 July and 8 July 2020 with implications for quarantine and health systems in those states.

1.13 Collectively, the four largest jurisdictions have no or limited ability to take on further passengers in the immediate term, effectively delaying the return of some Australians until we have sufficient national quarantine capacity to accept them.

1.14 Some States and Territories had already offered assistance to take on additional flights although as pressure through the system has mounted offers of support have declined. Airports with lower throughout are also less financially attractive to airlines, due to the costs of establishing appropriate facilities/resources for short periods. A highly collaborative approach will be necessary to effectively manage this period.

Options for stemming international passenger arrivals is needed

1.15 Transparent and regular data on quarantine capacity will be essential in supporting decision-making to match with transparent and regular data on air traffic capacity. Both are needed to manage the potential influx of new COVID-19 carriers, and to manage the impacts of the pandemic on our aviation market.

1.16 A nationally consistent and transparent approach is now required. The following actions are needed to manage the flow of passengers to Australia without reverting to a hard border closure:

a) Timely and accurate quarantine capacity data and capability data and information is urgently needed to ensure responsibilities are not being diverted to airline industry.

b) s 47B(a)

c) Capping the number of arrivals through passenger caps. Passenger caps can be introduced under the Air Navigation Act, must pass the public interest test, and airlines must have procedural fairness when imposing any caps. This includes providing 48 hours' notice to allow for any passengers in transit.

Quarantine Data

1.17 Given the mandatory 14-day quarantine that has been introduced for new arrivals to Australia, quarantine facilities are needed to ensure new arrivals that may be non-symptomatic carriers of COVID-19 are separated from the general public.

1.18 Available data indicates that over the past three months the national quarantine capacity has been as high as approximately 13,000 rooms. Current occupancy is approaching 12,000 people. Requested capacity over the next 14 days seeks a cap of 8,275 people overall (not including NT) given broader resource impacts including the outbreak in VIC.

State	Maximum Quarantine Capacity (rooms) (based on 3 month historic data)	Current Quarantine Occupancy as at 2359 AEST, 08JUL20 (People)	Requested Quarantine Capacity (people) – over 14 days
NSW	5,888	5,812	5,000
Vic.	3,887	1,374	0
SA	667	530	800-900
WA	960	1,553	1,000
QLD	1,400	2,286	1,100
NT	400	29	TBC
ACT	275	0	275
TOTAL	**13,477**	**11,584**	**8,275**

1.19 Based on advice from States and Territories as at 8 July 2020, there is no quarantine capacity at Melbourne and insufficient capacity at Sydney, Brisbane and Perth to meet passenger demand over the next month. We will need to take ongoing action to manage passenger arrivals to these airports. The data needs to be increasingly specific and timely to support managing the flow through of the passenger caps.

1.20 Quarantine resourcing requires a mix of hotel accommodation, police escorting, logistical support and testing services. States are reporting that these resources are stretched but are yet to consistently share this data. This issue has been canvassed separately in AHHPC paper on hotel quarantining facilities. The AHPPC agreed to regularly assess quarantine arrangements through new metrics, which will be evaluated fortnightly in Pandemic Health Intelligence Plan Reports (from report no.5 onwards – 24 July). The new metrics will assess:

- the capacity of jurisdictions to host international travellers in hotel quarantine;
- the capacity of jurisdictions to manage the number of international travellers in quarantine;
- compliance of those in quarantine with testing;
- the level of transmission of COVID-19 from hotel quarantine to the community; and

- the level of transmission of COVID-19 from those exempt from hotel quarantine (i.e. in home quarantine).

A comprehensive picture of ongoing quarantine capacity is key

1.21 The national approach would provide immediate relief to all jurisdictions experiencing pressure on their quarantine system and certainty to airlines and Australians seeking to manage their operations and travel plans effectively.

1.22 However, accurate and timely data on quarantine capacity in managing passenger flows and the ability to adjust passenger caps is required.

1.23 Importantly the passenger caps included will not meet expected passenger demand and is likely to increase the backlog of returning Australians. States and Territories must act collectively to increase their quarantine capacity if we are to clear this backlog of returning Australians over time.

1.24 Ms Jane Halton AO PSM, following the AHPPC advice of 10 July 2020 on 'Nationwide Review of Hotel Quarantining Arrangements' will lead a review into these arrangements and national quarantine capacity before the end of July 2020, with the outcomes of the review to be considered by National Cabinet. This would be to examine ongoing States and Territory quarantine capacity and take account of any feedback on how the framework has been rolled out, in particular whether there is a better way to maximise capacity utilisation.

Charging for Quarantine

1.25 QLD introduced fees for quarantine in government arranged accommodation from 1 July 2020 and the NT introduced fees for quarantining in government arranged accommodation from 3 April 2020. WA and NSW have flagged that a charge may be put in place. A uniform approach to charging for quarantine may create a more 'level playing field' in terms of citizens arriving in different Australian cities.

1.26 Given the intersection with state resources, this must be implemented by states and territories, not the Commonwealth.

s 47B(a)

A national approach to managing international passenger arrivals is needed

1.28 Initial responses to managing passenger flows have been based on having to react to two urgent State requests, with very little notice provided to airlines and has increased confusion and disruption for passengers. The need to act quickly was due to urgent quarantine capacity limitations and hence were strong on public interest grounds.

1.29 The COVID-19 outbreak in Melbourne has put a strain on both the Victorian and New South Wales quarantine systems. To assist Victoria to get its pandemic outbreak under control, a cap of zero passengers has been introduced for Melbourne Airport for the next two weeks till 15 July. A cap of 450 passengers a day is in place at Sydney Airport until 18 July.

1.30 The Commonwealth has a range of relevant regulatory powers, the most accessible of which are the Air Navigation Regulations/Rules (ANRs). These powers include being able to cancel flights, refuse flights or cap passenger numbers on flights. These powers do not extend to being able to redirect flights to specific airports - that remains a commercial decision for airlines.

1.31 Introducing or extending passenger caps under the ANRs is the most flexible and effective way to regulate passenger arrivals into each airport. They can be used for all scenarios, are scalable, can ensure equitable treatment across airlines and are responsive to changes in the environment. A national picture would provide immediate relief to all jurisdictions experiencing pressure on their quarantine system and certainty to airlines and Australians seeking to manage their operations and travel plans effectively.

1.32 However, accurate and timely date on quarantine capacity in managing passenger flows and the ability to adjust passenger caps is required.

1.33 The Commonwealth, through the Department of Infrastructure, Transport, Regional Development and Communications and the Australian Border Force, have developed a plan for how the caps could be enacted to maximise utilisation of quarantine capacity. Jurisdictions have proposed the following caps:

- Melbourne – continued suspension of inbound passenger arrivals until further notice
- Sydney – continued cap of 450 arrivals per day (with a cap of 50 passengers per flight with some flexibility) till at least 8 August 2020
- Brisbane – introduce a cap of 500 arrivals per week (with a cap of 30 passengers per flight with some flexibility) until at least 8 August 2020
- Perth – introduce a cap of 75 arrivals per day (with a cap of 50 passengers per flight with some flexibility) until at least 8 August 2020

1.34 The proposed passenger caps would be set at a level that provides some flexibility to allow limited exemptions to exceed the cap and/or airlines to operate a limited number of additional services.

1.35 For some airports, including Adelaide, Canberra and Darwin, while there is an opportunity for additional flights to be accommodated, these airports may also need to consider passenger caps, subject to their quarantine capacity. DITRDC and ABF will offer airlines the opportunity, on a first-come, first served basis to apply for additional services to these airports (if available), subject to their quarantine capacity.

The approach needs to be communicated early and clearly

1.36 Once any associated passenger caps, are settled, the Commonwealth will provide at least 48 hours' notice to airlines to minimise any disruption. Airlines are already on notice that decisions on this issue could occur in the immediate term, this means the 48 hours' notice can be met as much as possible.

1.37 If insufficient notice is provided, we increase the risk of passengers arriving with no ability to quarantine or alternatively having already boarded connecting flights and being stranded in transit countries with limited accommodation and visa options.

1.38 Effective communication will be critical. If increasing numbers of citizens and permanent residents are unable to return home quickly, Governments can expect to face increasing criticism for such decisions. We will need to ensure consistency of messaging – that these measures are needed to maintain the integrity of the quarantine system across all jurisdictions, and that our health experts have identified that the most effective intervention in managing the spread of COVID-19 from overseas is quarantine.

The Commonwealth will seek to help ease passenger demand

1.39 The Commonwealth, through the Department of Foreign Affairs and Trade and its overseas posts, have been encouraging Australians to promptly return home by commercial means if they wish to do so. In many cases, posts have worked with foreign governments and airlines to facilitate repatriation of Australians on scheduled international airline commercial services.

1.40 We will advise our overseas posts about current changes, and will provide them with guidance to respond to requests from the airlines on landing capacity constraints. We have good control over government-facilitated and commercial charter flights and will aim to further reduce their operations. DFAT has also been working actively to inform Australians seeking to return home about the new arrival management cap arrangements, noting citizens and permanent residents need to contact their airlines and may not be able to return home as promptly as they had wished until quarantine capacity stabilises.

1.41 The proposed framework should also make provision for the need for emergency and ad hoc evacuations for Australians from overseas destinations which could include the use of international airports outside the four largest capital cities.

1.42 As part of Australia's pandemic response to contain the spread of COVID-19, there continues to be a ban in place on outbound overseas travel from Australia. This ban is administered by the Department of Home Affairs. Residents cannot leave Australia unless they seek an exemption from Home Affairs.

2 Risks and sensitivities

Citizens will be delayed from returning to Australia

1.1 If increasing numbers of citizens and permanent residents are unable to return home quickly, we can expect to face increasing criticism from them for such decisions. The Department of Foreign Affairs and Trade has observed a noticeable spike in Australians seeking consular assistance as a result of the Melbourne and Sydney passenger caps, which are claimed to be causing emotional and financial strain.

1.2 Commonwealth, States and Territories will need to act to clearly articulate the rationale for slowing incoming passenger arrivals and temper expectations about when many Australians will be able to return home.

Airlines may not fly under proposed passenger caps with flow-on impact on loss of international air freight capacity

1.3 With incoming passenger numbers capped, particularly if there is also low outbound numbers, airline services may be cancelled. We have already observed a few examples of this with the passenger cap at Sydney.

1.4 Although there are many freight-only services operating, passenger services are still carrying a significant amount of inbound and outbound freight. With 177 passenger services expected to be operated to Sydney alone between 15 and 30 July, the loss of some of these services would impact on the international air freight task.

1.5 This serves to further underscore the importance of seeking to enable the airlines to operate sufficient capacity to improve the commercial viability of their services.

A decision to cap passenger numbers could be subject to legal challenge

1.6 Decisions made under the *Air Navigation Regulations 2016* are reviewable in the Administrative Appeals Tribunal and an airline may seek to challenge a decision to cap passenger numbers on its flight. It is crucial that any decision is underpinned by evidence of the capacity constraints and the potential health risk. Any cap would also need to be applied equitably across all airlines seeking to arrive in a particular airport. The proposed approach achieves this outcome.

s 47B(a)

Domestic border impacts

1.9 Passengers intending to reside in Melbourne but rebooked on flights elsewhere may face additional challenges and onward travel costs from domestic border restrictions, particularly if restrictions are tightened further.

2 Impacts

2.1 Passengers will be impacted by any decision by an airline to divert to another airport, including potential financial impact for quarantining and/or the cost of a domestic connection to their intended place of residence.

2.2 If Australians are delayed from returning to Australia this can be expected to have financial and social impacts on affected passengers.