COVID & Digital Surveillance: Australia's COVIDSafe app, unsafe QR Codes & unknown Status Certs

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'Balancing Privacy and Public Health in Digital Contact Tracing in the APAC Regions'

3 forms of COVID data surveillance

- 1. Proximity tracking
 - Typically via Bluetooth
 - Tracks proximity to another person (phone), not location
- 2. Attendance tracking
 - Typically via QR Codes
 - Tracks attendance & time at required venues
 - Sporadic (not continuous) location tracking
- 3. COVID status certification
 - Can be electronic (app) and/or by paper
 - Records (i) vaccination history and/or (ii) COVID test history
 - Aka immunity (vaccine) passports (certificates)

Centralised or distributed?

The data collected by each of the 3 forms of surveillance may be *either*:

- 1. Distributed on user devices
 - Apple/Google Bluetooth proximity app
 - QR Codes at venues that only update 'digital diaries'
 - COVID status data that is static until user chooses to update (also, paper copies)
- 2. Stored centrally
 - Australia's COVIDSafe Bluetooth proximity app
 - All Australian State/Territory QR Code systems
 - COVID status apps that always update from central database

Australian context (1): No rights, no challenges

No fundamental privacy rights

- 1. No relevant constitutional protections
 - Probably no rights as citizen to exit /enter Australia
- 2. No international agreements of significance
 - ICCPR not actionable in Australian courts
- 3. No relevant common law rights (eg right of privacy)
- No court challenges possible
- Can NGOs prevent COVID surveillance abuses?
 - No legal ways to prevent **centralised** govt. strategies
 - Only Australian legal protections = politics of legislation
 - Strategy of many NGOs is 'improve the legislation'
 - First need to get *legislation, not regulations*

Australian context (2): Little COVID, suppression policy

- All State/Territory governments pursue suppression
 - Applies to both imported & locally acquired infections
- Australia's success in COVID19 suppression
 - Fatality rate = 35/million; total deaths = 910 (07/06/21)
 - Infections: new = +5; active = 142; serious = 1 (07/06/21)
 - Suppression achieved before proximity app (May 2020) or QR Codes (Nov. 2020); + intermittent outbreaks since
 - Vaccinations = 250K (2%) (full) & 5.2M (20%) (partial) / 25.5M adults (07/06/21) - very low vaccination rate
- Suppression strategies require (i) widespread vaccination; (ii) effective surveillance of contacts; (iii) aggressive contact tracing; (iv) quarantine

Australian context (2): Extent of surveillance / tracing

COVIDSafe app

- Peaked at 30% take-up, now stalled
- After 1 year, detected 16 proximity events in NSW; NIL in other States
- Result: NO EFFECT; failure of technology and trust
- BUT COVIDSafe Act is a model for legislation

• QR Codes

- Since Jan 2021, govt apps compulsory in all States & Territories
- Centralised data collection
- Vast range of required venue types (expands & contracts – States vary)
- At least 120M check-ins per month Australia-wide
- Enforcement against venues tightening (A\$10K fines); numbers will rise
- Largest peacetime surveillance exercise in Australia?

Argument: Legislative protections based on common principles needed

Australia's COVIDSafe app



Australian QR Codes for attendance check-ins



COVID status certificates (imagined)



Unlikely principles in Australia

- 1. No compulsion (voluntary)
- COVIDSafe app & Act
 - Voluntary downloading of app & uploading 'registration data' to NCSDS (central data store)
 - Voluntary uploading of COVID app data to NCSDS, for tracing, if tested positive for coronavirus

• QR Code tracking

- Compulsory State-run QR apps
- Lists of venues requiring check-in changes with risk

• COVID status cert.

 Likely: Compulsory for nominated occupations; incentives by airlines; international exit/entry requirements; State borders?

2. No central database

- COVIDSafe app & Act
 - Cth govt. centralised data store (NCSDS) for COVIDSafe data

• QR Code tracking

- All States require govt. apps & centralised database
- Any permitted exceptions (eg hospital apps) must link via API
- COVID status cert.
 - Unknown, but probably centralised database
 - Either Cth database based on immunization register;
 - Or State apps/database based on Govt Service app.
- Decentralised systems unlikely

Common principles to keep all centralized systems more safe

- 1. Put controls within the country's data privacy law
- 2. Minimum data collection
- 3. Authorised uses of COVID data defined & minimal
- 4. Anti-coercion provisions
- 5. Prevent 'surveillance creep' (as far as possible)
- 6. Ongoing deletion program once purpose complete
 + Deletion on request wherever possible
- 7. 'Sunset clause' for whole system, transparently based on medical advice
- 8. Supervision & periodic reports by independent DPA

Principle 1: Put controls within the jurisdiction's data privacy law

- Reasons:
 - Greater uniformity
 - Easier to utilise existing protections

COVIDSafe app & Act

- Part VIIIA of the Privacy Act 1988
- Includes all protections above (with some flaws)
- Strongest privacy protections for any Australian personal data

- QR Code tracking
 - Compulsory State-run QR apps
 - No special legislation, regs under health laws
 - State data privacy laws apply but do not assist

- None yet in Aust.
- Australia may need uniform federal & State laws

Principle 2: Minimum data collection, for minimal purposes

- Purpose:
 - Best protection against centralization is constant data minimisation

COVIDSafe app & Act

- Email, phone & name
- Aliases allowed
- Any other collection of data by app forbidden

QR Code tracking

- App registration collects name & phone
- Use of QR Code collects venue name, time & duration (if logout used)
- Other Qs (eg 'red zones') may be permitted.
- Associates can be added

- None yet in Aust.
- Legislation should strictly limit data collected

Principle 3: Authorised uses of COVID data defined & minimal

• COVIDSafe app & Act

- All uses of COVID app data are illegal (5 years or AU\$63K), unless explicitly permitted (s94D)
- Permitted uses are limited to: Contact tracing by State health Depts; NCSDS essential administration; breach investigations
 - No consent exemption
 - No Police/ASIO exemptions

QR Code tracking

- State health regs may promise 'tracing only'
- But State privacy laws allow wider disclosures
- No controls over addition of new venue categories
- Venues are often sensitive

- None yet in Aust.
- Status info is highly personal, easily misinterpreted
- Uses should be strictly limited by legislation

Principle 4: Anti-coercion provisions

• COVIDSafe app & Act

- Reasons: (i) prevent coercion to use app; (ii) prevent unauthorised uses
- Offence to require another person to download the app, or have it in operation, or consent to upload data to the NCSDC (s94H(2))
- Further offences where adverse conditions apply if app is not installed (s94H(1))
- Criminal penalties: 5 years gaol, or AU\$63K fines
- Addition: Individual enforcement provisions: offences are also civil breaches of Privacy Act, can result in damages

• QR Code tracking

- State health regs may promise 'tracing only' But State privacy laws allow wider disclosures
- Other govt uses must be prohibited (eg Singapore allow Police uses despite 'tracing only')
- COVID status cert.
- None yet in Aust.
- Uses of certificates should be strictly defined by legislation
- Offences similar to COVIDSafe Act are need to prevent other demands/requests to see certificates, and resulting acts

Principle 5: Prevent 'surveillance creep' (as far as possible)

- Problem: Any surveillance creep will destroy trust needed for voluntary participation
- COVIDSafe app & Act
- Police/spooks wanted exceptions; Govt. refused
- Part VIIIA overrides other existing laws
 - Effect of all existing Australian laws inconsistent with Part VIIIA are cancelled (s. 94ZD)
 - Includes mere permissive demands for data
 - Future Acts (not regs) must expressly refer to Part VIIIA or specific sections, to over-ride.

- QR Code tracking
 - State health regs may promise 'tracing only'; Singapore promised this, then reneged, allowing criminal investigations
 - State privacy laws allow wider disclosures; needs to be closed
 - No controls over addition of new types of uses by legislation
- COVID status cert.
 - None yet in Aust.
 - Future expansion of legitimate uses should be limited as in Part VIIIA

Principle 6: Ongoing deletion program once purpose complete

- Problem: History suggests surveillance is rarely undone
- COVIDSafe app & Act
 - Logs automatically deleted from phones in 21 days
 - NCSDS is centralised collection, but extent of collection is limited
 - For most users, only their registration data is on NCSDS, and can be deleted on request ;
- Only tiny % of users will ever upload contact event logs
 - but logs of their contacts may be uploaded by others;
 - All uploaded contact logs remain on NCSDS for life of system; No expiry, and no deletion on request (criticised)

- QR Code tracking
 - Vast quantities of attendances uploaded – often very sensitive
 - Most State regs require deletion after 28 days, but this is not in legislation
 - Privacy laws do not set a time limit, only 'when use is complete'

- None yet in Aust.
- Epidemiological value means that anonymization after use may be the best achievable
- Desirable: Anonymisation once no longer valid as a current status indicator
- Desirable: No longer visible on individual status centificate

Principle 7: 'Sunset clause' for whole system, transparently based

- Problem: History suggests surveillance is rarely undone
- COVIDSafe app & Act
- Minister for health must report on 'operation & effectiveness' of app & NCSDS w/in 6 months (ie by mid-Nov), tabled in Parlt w/in 15 days (s94ZA)
- 'Sunset cl': Minister for Health can determine (s94Y) that app is no longer required/effective
 - Minister must first receive advice from Chief Medical Officer, or committee of CMOs
- Termination decision is too political
- Once decided, NCSDS administrator 'must delete all COVID app data', stop making app available, and advise users to delete app. (s94P).

- QR Code tracking
 - No legislative sunset clause
 - Desirable: Legislative sunset clause – same transparent medical advice
 - QR database to close
 - All data to be destroyed
- COVID status cert.
 - None yet in Aust.
 - Desirable: Legislative sunset clause – same transparent medical advice
 - Certificate system to close
 - Anonymised data retained

Principle 8: Supervision and public periodic reports by DPA

- Problem:
 - External independent supervision is necessary

COVIDSafe app & Act

 Privacy Comm (PC) must report w/in 6 months on exercise of Comm's functions and powers (s94ZB)

QR Code tracking

• No requirements for State PCs to report

- None yet in Aust.
- Must be placed under active supervision by relevant PCs

Result of Australian comparison

Voluntary **COVIDSafe app** has Australia's strongest privacy protections, but is now largely ignored



Compulsory state-run **QR Codes** have little legislated privacy regulation, but are here indefinitely



COVID status certification is inevitable & dangerous, & needs prior legislation



Conclusions

- For countries like Australia (few rights; some surveillance compulsory; centralised data stores) to *limit* damage of COVID surveillance is realism
- 2. Essentially *same* legislative controls are needed to mediate all 3 types of COVID surveillance
- **3.** 8 principles outlined would do most of the work needed to make centralised systems much safer
- 4. Ultimate protections come from (i) politics of surveillance; and (ii) public willingness to comply