

Frequently asked Questions- Bluetooth tracing

What changes are coming into effect on 10 December?

To further assist with COVID-19 contact tracing, on 10 December the NZ COVID Tracer app will be updated to include Bluetooth tracing. This will allow app users to receive an alert if they have been near another app user who tests positive for COVID-19.

What will happen to the NZ COVID Tracer app on that day?

NZ COVID Tracer will update automatically from 10 December for app users who have their phones set to automatic updates. The update will be rolled out over a few days to ensure the load on downloads is manageable.

App users can also manually update the app through the Apple App Store or the Google Play Store. Information on how to do a manual update can be found on the Ministry of Health website at <http://www.health.govt.nz/NZ-COVID-Tracer/QAAs>.

Once the update has been installed, all app users with compatible devices will be prompted to enable Bluetooth notifications. Bluetooth tracing is entirely optional.

What is Bluetooth tracing? How does it work?

Bluetooth tracing uses radio waves to enable wireless devices such as smartphones to securely connect and exchange data over short distances.

Bluetooth tracing can enhance existing contact tracing processes led by Public Health Units and the National Investigation and Tracing Centre, by quickly alerting people when they have been exposed to COVID-19.

Bluetooth tracing in the NZ COVID Tracer app will initially use the Apple/Google Exposure Notification Framework built into compatible iPhones and Android phones. This works by generating randomised 'keys' and exchanging them with other nearby smartphones (up to around 2 metres away), recording how 'loudly' each key was broadcast and for how long.

The keys don't contain any information about who you are or where you were, which means no personal or identifying information is exchanged. Only your phone knows which keys belong to you.

Your phone will keep each key that it has collected and then delete them after 14 days.

When another app user tests positive for COVID-19, they can choose to alert other app users who they have been nearby, by uploading the random keys their phone has broadcast since they became infectious. None of this data is shared with Apple or Google.

Your phone will check every few hours to see if there have been any uploads containing the keys that your phone has encountered. If your phone sees one of these keys, and the phone that had been broadcasting the key was close enough for long enough to present a risk of exposure, you will receive a Bluetooth alert.

The Bluetooth alert will let you know that you have been in 'close contact' with someone who has COVID-19. It will also provide advice on what you should do next to keep yourself and your whānau safe.

Your Bluetooth data and digital diary are stored securely on your phone. Only you have access to this information unless you choose to share it with contact tracers.

You can read more about how Bluetooth works by visiting the Ministry of Health website at <http://www.health.govt.nz/nz-covid-tracer-about-bt>.

What is the benefit of enabling Bluetooth tracing on the NZ COVID Tracer app?

Bluetooth has the potential to speed up contact tracing by enabling people to be more quickly alerted if they have been nearby someone who has tested positive for COVID-19.

There are currently around 2.38 million registered users of the NZ COVID Tracer app, of which approximately 90 percent will have phones that are compatible with Bluetooth tracing. This provides the critical mass of users needed for Bluetooth tracing to detect a significant proportion of 'close contacts' between individuals.

It is important to note that technologies like Bluetooth tracing are not intended to replace existing contact tracing processes, but can help make contact tracing go faster and provide a mechanism to alert people more quickly if they are potentially exposed to COVID-19.

Contact tracing in New Zealand is an intensive and robust process that involves personal one-to-one interviews followed up by a team of individuals to ensure that others who have been in close contact with someone who has COVID-19 are isolated and tested.

Is Bluetooth tracing limited to the NZ COVID Tracer app?

The Apple/Google Exposure Notification Framework also has the potential to be implemented in wearable devices such as cards or wristbands or other personal devices that have Bluetooth.

Will Bluetooth tracing detect all my close contacts?

No, Bluetooth tracing will only collect randomised 'keys' from other nearby app users who are also using NZ COVID Tracer with Bluetooth tracing enabled. Not everyone uses the app and some app users will not have Bluetooth tracing enabled.

Is Bluetooth tracing mandatory?

Bluetooth tracing is optional but recommended. Once the NZ COVID Tracer update is installed, and if the phone is compatible with Bluetooth tracing, the app user will be prompted to decide whether to opt in.

Along with QR code scanning, Bluetooth tracing is another tool in the toolkit to help keep us safe from the virus by enabling rapid and effective contact tracing. QR codes allow us to create a private record of the *places* we've been, while Bluetooth allows us to create an anonymised record of the *people* we've been near.

What if I don't want to update the app?

You can choose to stop the app from updating by disabling automatic updates on your phone. However, it is always recommended to run the latest version of the app, as each new version provides enhancements or fixes minor bugs.

In the latest version of the app, Bluetooth tracing is turned off by default. However, once the update has been installed the NZ COVID Tracer app will ask if you want to enable Bluetooth tracing. We recommend you do.

Whether or not you update to the latest version of the app or enable Bluetooth tracing, the app can still be used to scan QR codes and you will still receive location alerts if you have them enabled.

Will Bluetooth tracing use up my mobile data?

Bluetooth doesn't use any mobile data because it does not involve accessing the cellular network. Bluetooth is a form of wireless communication that enables phones and other devices to talk directly to each other.

However, while the Bluetooth function itself does not use any data, the NZ COVID Tracer app does use a very small amount of data when your phone checks for contact alerts, and when anonymised analytic information is sent to the Ministry for reporting purposes.

Will Bluetooth tracing drain my battery?

The app uses Bluetooth Low Energy (BLE), which is designed to use considerably less power than Classic Bluetooth. As a result, the impact on phone battery life will be minimal.

If an app user thinks their battery is draining faster than usual after enabling Bluetooth tracing, they can check this by looking at their phone's settings to see how much of the battery usage relates to each app installed on the phone.

If you think the app's battery usage is excessive, please contact the NZ COVID Tracer support team at help@covidtracer.min.health.nz or on 0800 800 606 so we can look into the problem. You will need the following information:

- Percentage of battery used
- The make and model of your phone
- Your phone's version of iOS or Android

Will NZ COVID Tracer / Bluetooth tracing cause my phone to overheat?

No, the NZ COVID Tracer support team has not received any reports of phones overheating due to use of the app.

Bluetooth tracing is not likely to cause any issues with overheating because it uses Bluetooth Low Energy (BLE), which is designed to use considerably less power than Classic Bluetooth.

However, please note that having a large number of active apps open at the same time could place excessive demands on your phone's hardware and cause it to overheat.

Why is Bluetooth tracing only being enabled now?

It's important that Bluetooth tracing is implemented effectively. After rolling out similar updates overseas, the Apple/Google Exposure Notification Framework is now a tried and tested system that we know will work effectively with the NZ COVID Tracer app.

Will Bluetooth tracing be active as soon as I get the new version of the app?

No, Bluetooth tracing is off by default, but once the update has been installed the NZ COVID Tracer app will ask if you want to enable it. We recommend you do.

Do you need NZ COVID Tracer if you have Bluetooth enabled on your phone?

Yes, Bluetooth tracing will only work if you have a compatible device with the NZ COVID Tracer app installed.

Does the NZ COVID Tracer app need to remain open for Bluetooth tracing to work?

No, the Bluetooth tracing function is part of the operating system of your phone, which means you don't need to keep the app open.

What do Bluetooth alerts look like?

Bluetooth alerts are displayed on the NZ COVID Tracer dashboard as a dark orange box containing the Bluetooth logo. The alert will state that you have been in close contact with someone who has tested positive for COVID-19. The Alert will tell you;

Alerts can be displayed on your dashboard for one or more reasons. They;

- might be based on exposure to one person, or it might be several people
- might be based on exposure from one day, or it might be across several days
- might be about people you know, or it might be people you don't know
- might be about people you were with, or it might be people who were simply nearby.



Will NZ COVID Tracer still send location alerts?

You will still receive a location alert through the NZ COVID tracer app if you scan the QR code for a location at around the same time that it was visited by a person who has tested positive for COVID-19.

Can I receive both a Bluetooth alert and a location alert for the same 'exposure event'?

You may receive both a Bluetooth alert and a location alert if you were nearby a person with COVID-19 who has been using Bluetooth tracing and if you also scanned the QR code at a location visited by that person.

The information and advice contained within a Bluetooth alert takes precedence over any location alert because the risk of exposure from being nearby someone who has COVID-19 is generally higher than the risk associated with visiting the same location.

Do all phones support Bluetooth tracing?

The Apple/Google Exposure Notification Framework (ENF) is built into the operating system of all phones running iOS 13.5+ or Android 6.0+. Android devices must also support Google Play Services and Bluetooth Low Energy in order to use Bluetooth tracing.

Phones with older operating systems cannot provide Bluetooth tracing because they do not have the ENF built in. However, the ENF is a protocol that can also be used in other devices such as cards or wristbands or other personal devices that have Bluetooth.

If your phone is running iOS 11 or later then you can still use the NZ COVID Tracer app to scan the QR codes and add manual entries to your digital diary, and you will still receive location alerts if you have them enabled.

Can people with older phones still use NZ COVID Tracer to scan the QR codes and add manual entries to their digital diaries?

Yes, you can still use all other functions of the NZ COVID Tracer app if your phone has:

- iOS 11+ or
- Android 6.0+ (for devices that also support Google Play Services)

QR codes

Once Bluetooth is enabled does that mean we don't need to scan QR codes anymore?

It's important that we all continue scanning the QR codes wherever we see them, regardless of whether we also have Bluetooth tracing enabled.

QR codes allow us to create a private record of the *places* we've been, while Bluetooth tracing creates an anonymous record of the *people* we've been near. Both of these are valuable for contact tracing.

It's also important to note that not everyone uses the app and some app users will not have Bluetooth tracing enabled. Bluetooth tracing will only record your 'close contacts' with other app users who also have Bluetooth tracing enabled.

Do businesses and transport operators need to keep displaying their QR code posters?

Yes, businesses, services and public transport providers are required to display their QR Code posters at all alert levels.

Privacy

What about my privacy?

The NZ COVID Tracer app continues to protect the privacy of everyone who uses it and has been endorsed by the Privacy Commissioner.

The randomised 'keys' used in Bluetooth tracing don't contain any information about who you are or where you were, which means no personal or identifying information is exchanged between phones.

If you test positive for COVID-19, it is your choice whether to upload the keys your phone has broadcast. Any app users who receive the Bluetooth alert won't know who you are or where they were when then came into close contact with you.

Your digital diary of scanned QR codes and manual entries is saved securely on your own phone where only you can see it. It continues to be your choice whether or not you share your diary if a contact tracer gets in touch.

In addition, you choose exactly what personal information and contact details you want to register with the app. All information is optional.

To provide further assurance, the Ministry of Health has now released the source code for the app so New Zealanders can see for themselves how their information is managed. You can view the source code via GitHub.

- [The front-end code for the app](#)
- [Documentation for navigating the code](#)

If I use Bluetooth tracing will the Government, Apple or Google have access to my Bluetooth data?

No. The Ministry of Health's implementation of NZ COVID Tracer is decentralised, which means your Bluetooth data and digital diary are stored securely on your phone and are controlled by you.

If you test positive for COVID-19 and choose to send a Bluetooth notification, this does not involve transmitting any identifying information. The only information contained within the notification is a list of the 'keys' that your phone has broadcast when you were infectious.

NZ COVID Tracer has been endorsed by the Privacy Commissioner and the Ministry of Health has also released the source code so New Zealanders can see for themselves how their information is managed.

Will the Government, Apple or Google be able to track my movements if I use Bluetooth tracing?

No. Bluetooth tracing does not involve location tracking of any kind.

Bluetooth tracing works by generating randomised 'keys' and exchanging them with other nearby smartphones. The keys don't contain any information about who you are or where you were, which means no personal or identifying information is exchanged.

Your Bluetooth keys are stored securely on your phone, and only your phone knows which keys belong to you.

Contact tracing card

How does the proposed contact tracing card fit in with the app?

The Government is currently considering next steps for the proposed contact tracing card following the recent community trial in Ngongotahā in partnership with the Te Arawa COVID-19 Response Hub.

While no decisions have yet been made on any wider rollout of contact tracing cards, there is potential for the cards or other wearables to form part of a broader system of interoperable technologies. The contact tracing card or other wearables could, for example, allow New Zealanders who do not have compatible smartphones to participate in Bluetooth tracing.

The community trial has highlighted that an equity-focused partnership approach to any future rollout will be essential to increasing community trust and participation.

Contact tracing process

Will Bluetooth tracing replace the existing contact tracing process?

Contact tracing in New Zealand is an intensive and robust process that involves personal one-to-one interviews followed up by a team of individuals to ensure that others who have been in close contact with someone who has COVID-19 are isolated and tested.

Technologies like Bluetooth tracing are not intended to replace the existing processes, but help make contact tracing go faster and provide a mechanism to alert people more quickly if they are potentially exposed to COVID-19.

More information

Where can I find out more?

- Ministry of Health:
 - <http://www.health.govt.nz/nz-covid-tracer-about-bt>
 - help@covidtracer.min.health.nz
- Unite Against COVID-19 website: www.covid19.govt.nz/bluetooth-tracing
- Source code:
 - [The front-end code for the app](#)
 - [Documentation for navigating the code](#)