Zerobase: Community Contact Tracing Technology
FOR IMMEDIATE DISSEMINATION TO GOVERNMENT AND COMMUNITY OFFICIALS

Zerobase is a smart, anonymous tracing technology that identifies and notifies individuals in our communities who have been exposed to COVID-19, even before they exhibit symptoms. Zerobase is simple, free, and ready to use. Email info@zerobase.io to get set up in seconds.

Tracing Saves Lives

Tracing is the identification of likely disease-spreading interaction between individuals. It is a crucial part of modern pandemic response. If an individual is exposed to COVID-19, tracing allows us to identify any number of others who were in the same place, such as a grocery store, pharmacy, place of worship, or doctor's office, at the same time as the infected person. Public health officials can then notify those people to stay home temporarily and/or get tested themselves, thus slowing the spread of the virus.

Historically, tracing has been done manually and painstakingly, with local public health officials contacting each individual that may have been exposed by calling down a list. The present emergency is too widespread and fast-moving to permit such a manual process. Zerobase is a *virtual contact tracing technology* that will be able to scale in minutes to a whole country.

To contain COVID-19, communities must engage in *both* effective tracing and testing measures. However, while testing is currently limited and we await the mass manufacture of test kits, we can best prepare by using a tracing system in our communities *as soon as possible*. Tracing maximizes the value of every single test by leveraging that test not only to treat an individual, but to identify the hundreds of untested members of a community who are at risk of infection based on their proximity to an infected individual.

How Does Zerobase Work?

We have developed a simple and effective tracing solution that is ready to be used in any community. Here's how it works:

1. Paper printouts with unique Zerobase QR codes are posted at the entrances of high-risk touchpoints like grocery stores, restaurants, pharmacies, doctor's offices, and places of worship.
2. People entering a participating location scan the code (for nearly all people, this is as simple as pointing their phone's camera at the sign - it takes just a few seconds, and no app installation is required). Here is an example code that you can scan right now:

3. Zerobase's tracing technology anonymously analyzes community networks of interaction to identify people who visited the same place at roughly the same time.
4. If an individual is exposed to or contracts COVID-19, public health officials can use Zerobase to direct anyone who has been in their presence to self-quarantine and/or get tested.

The best time to deploy Zerobase in your community was last week. The second best time is now. Please contact us at info@zerobase.io.

Q & A about Zerobase for Local Governments and Community Officials

Bottom line: Why should governments and communities use Zerobase?
- Zerobase enables local communities to establish their first line of defense against outbreaks in a way that is private, easy to use, and helps mitigate the manual issues involved in contact tracing and individualized testing.
- Testing and tracing will effectively contain a pandemic. If a community has sufficient testing resources, the need to trace is somewhat reduced. However, if a community does not have sufficient testing resources, manual contact tracing becomes extremely difficult. Zerobase automates and distributes contact tracing across a community in a way that is private, fast, and easy to use. Virtual contact tracing allows public health officials to allocate their time and resources more efficiently, elevating a community's ability to contain the virus.
- When a person is exposed to the novel coronavirus the race begins: Zerobase is able to trace the locations the patient visited and those that were there at the same time. Zerobase provides public health officials with an easy way to recreate those interactions instantaneously in a private way that enables action with conviction, for example recommending that someone self-quarantine or be registered for a COVID-19 test.

What is Zerobase?
Zerobase is a tool used by state and local health officials to pinpoint individuals who are the most likely to next contract COVID-19. Zerobase uses anonymized predictive technology to help protect communities before an outbreak occurs, which enables officials to best allocate their resources, eliminates guesswork, and reduces illness and fear.

How much does it cost?
Zerobase is being offered without charge. It has been organized as a nonprofit effort and labor has been donated.

Who is building Zerobase?
Zerobase was created by an international team of volunteer technologists, medical professionals, and activists concerned about the spread of coronavirus in their fellow communities. Using local data, their system traces the likely path of travel of the virus, identifying the next prospective patients before illness can spread further.

How does it work?
Local governments request that businesses, places of worship, and other gathering spaces in their communities post a special QR code at the entrance or another prominent, highly trafficked spot. Individuals visiting those locations scan the QR code on their way in and their visit to the location is anonymously analyzed to ascertain likely patterns of spread in that community. At no point does an individual's check-in get tracked alongside their identity.

The data creates invisible networks of interaction among people. If someone tests positive, the program can inform local health authorities of the next likely people to contract and spread illness. If an individual chooses to voluntarily and securely share their phone number, Zerobase or a public health officer can inform them if they have been exposed and recommend that they self-quarantine. The more data that is collected and aggregated, the more accurate Zerobase's predictive properties. Over time, communities deploying Zerobase help sister communities to be even better prepared for viral spread.

Q & A about Zerobase for Local Governments and Community Officials

What are the main advantages of using Zerobase in a community?

1. **Privacy First.** We provide an effective tracing solution for local governments and communities without compromising individual privacy or reducing trust.
2. **Easy to Use.** Anyone with a smartphone can use Zerobase by simply opening their camera. New users are enrolled immediately without any signup process.
3. **Wide Coverage**. Zerobase's coverage is worldwide, supporting Edge (low speed cellular), 3G, 4G, or Wifi. We also offer limited no-internet solutions as well. Anyone in the world can immediately use it, no matter where they are.
4. **Free**. Our infrastructure is free to use. From New York City to Nairobi, anyone can use Zerobase to begin keeping themselves and their community safe.

What information is collected by Zerobase?
An individual's identity is never deduced by the system, and any personal information shared voluntarily is stored securely. Zerobase has ensured it has sufficient security and privacy and abides by relevant local, state, and federal laws.

How is Zerobase unique? Can't large companies do this at scale with their location history?
Other approaches can indeed geo-tag your movements 24/7. But there are tradeoffs to those approaches:

1. Location data is extremely imprecise, often off by over 300 feet. Zerobase not only pinpoints the exact locations of community touchpoints, it is designed to focus on the specific spaces where the virus is most likely to spread.
2. While location history for their enrolled users, they are missing data for individuals who are not users of their platform. Zerobase is unique in that 100% of users are immediately enrolled via a simple scan at all participating locations.
3. Big data vs. Overwhelming data. GPS solutions log locations for the 99.99% of the day that an infected individual spends not transmitting the virus. Zerobase hones in on the critical moments in public spaces that the infection may be spread, making more accurate and focused determinations.

Fundamentally, location tracking is both ineffective and unnecessary. Putting privacy first is critical to establishing trust and community buy-in. HIPAA, GDPR and other data protection safeguarding regulatory hurdles have also become salient. In some countries, there has been significant resistance to adopting more socially intrusive automated tracking and tracing methods.

Community buy-in and worthiness of trust have been key design criteria since inception. Zerobase offers public health authorities a capability for (and accounting of) individualized post-exposure instructions at scale without the prerequisite of knowing the personal identity of the individual being notified!

We believe in "Big Data without Big Brother".

What resources does Zerobase require of businesses, organizations, and healthcare providers?
A computer and a printer are all that is required for businesses, public locations, and healthcare providers to activate Zerobase. Individual community members only need a cell phone.

How to contact Zerobase:
You can always contact us at info@zerobase.io.