HSL Employee Corona Tag

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The need

Social distancing has been proven as the most effective way to reduce the spread of Covid-19. Corporations around the world are faced with the need to maintain and monitor social distance in the workplace.
A single infected employee can shut down an entire facility.

HSL's Social Distance Monitoring Employee Badge is designed to monitor social distancing in the workplace and eliminate the need for a wide shutdown in case of infection.

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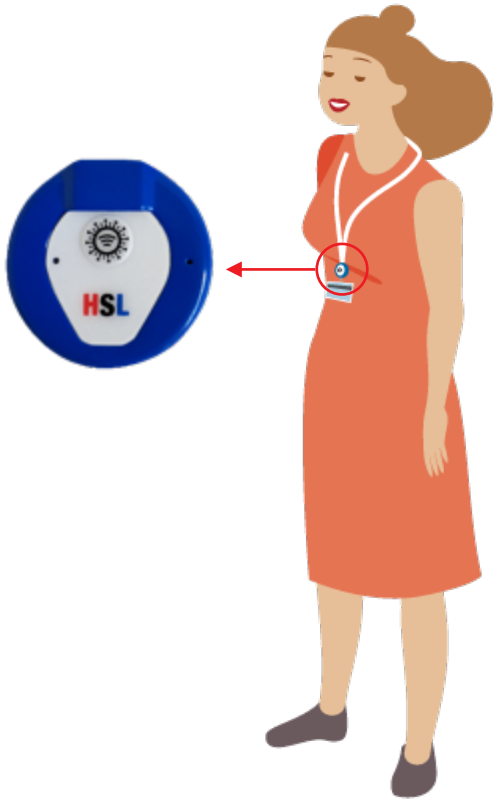
Protecting the employees' privacy

- HSL EMPLOYEE CORONA TAG implements a special scheme that provides the best protection for employees privacy.
- The tag Bluetooth radio is only used to measure the distance to other tags. It does not pair, receive or transmit data to any other device.
- The only time that data is being extracted is when an authorized administrator uses a special cable and software to extract events history from a confirmed sick employee tag.
- Tags only record other tag numbers, exposure time and distance. No location, names or other private data.
- Information is kept only for the last two weeks.



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Highlights

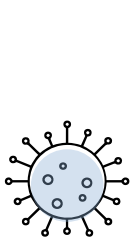
01 No employee training of any kind is required

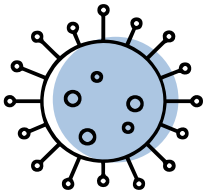
02 No central database of encounters is kept

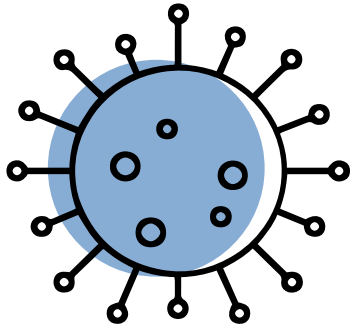
03 No charging is required for six months

04 No Special Infrastructure is required

05 No GPS or SIM card is ever in use







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How Does it Work?

Virtual sphere around each employee

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Method of Operation

1. Tag placed on each employee

2. Each time two employees meet:
   a. Employee 1 tag Bluetooth radio scans
   b. Employee 2 tag Bluetooth answers at known TX intensity

3. Both tags measure distance by calculating RSSI/TX power.

4. If distance < Dcrit for more than predefined time - event is recoded in both tags memory. Event record includes other tag number, time and minimum distance.

5. Information is kept in tag memory for 2 weeks.

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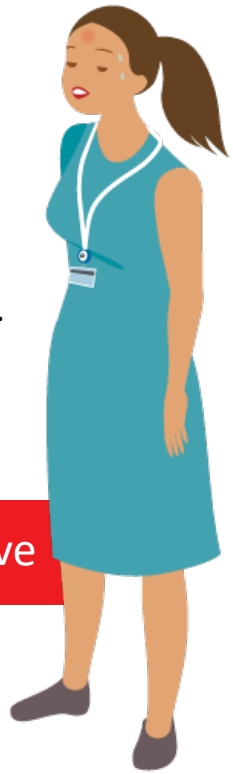
what happens when an employee is positive?

1

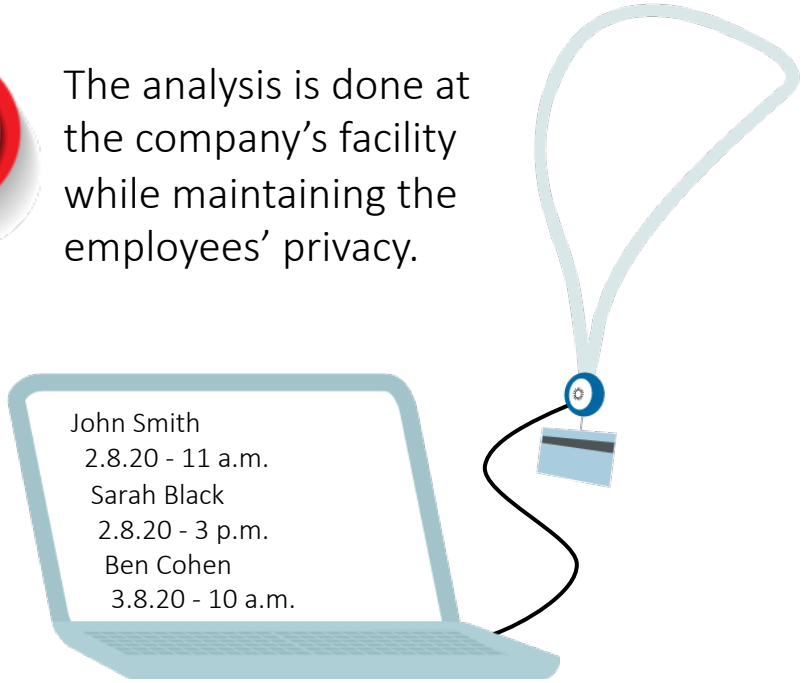
When an employee is diagnosed with covid-19 they are sent to quarantine and the tag is analyzed.



Covid-19 positive

2

The analysis is done at the company's facility while maintaining the employees' privacy.



3

Employees having a logged encounter with the diagnosed person are sent home for quarantine. The rest of the employees continue working in a safe and healthy environment.

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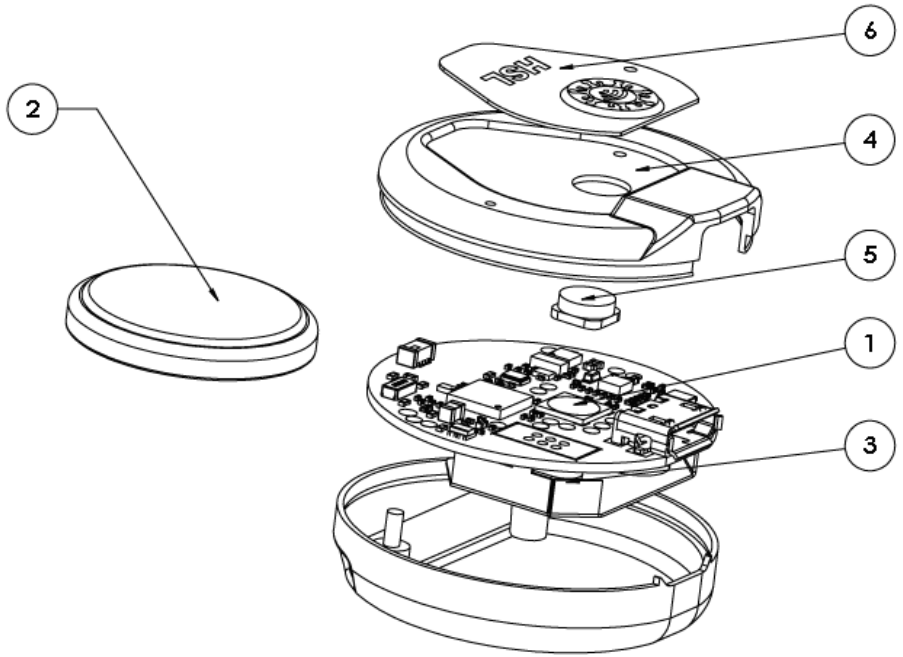
Tag can operate in crowded areas

3D accelerometer adjust reception based on the employee movements.

Tag Internal Structure

- Printed Circuit Board Assembly
- Coin battery
- Battery holder
- Top plastic part
- Push-button
- Plastic overlay
- Bottom plastic part



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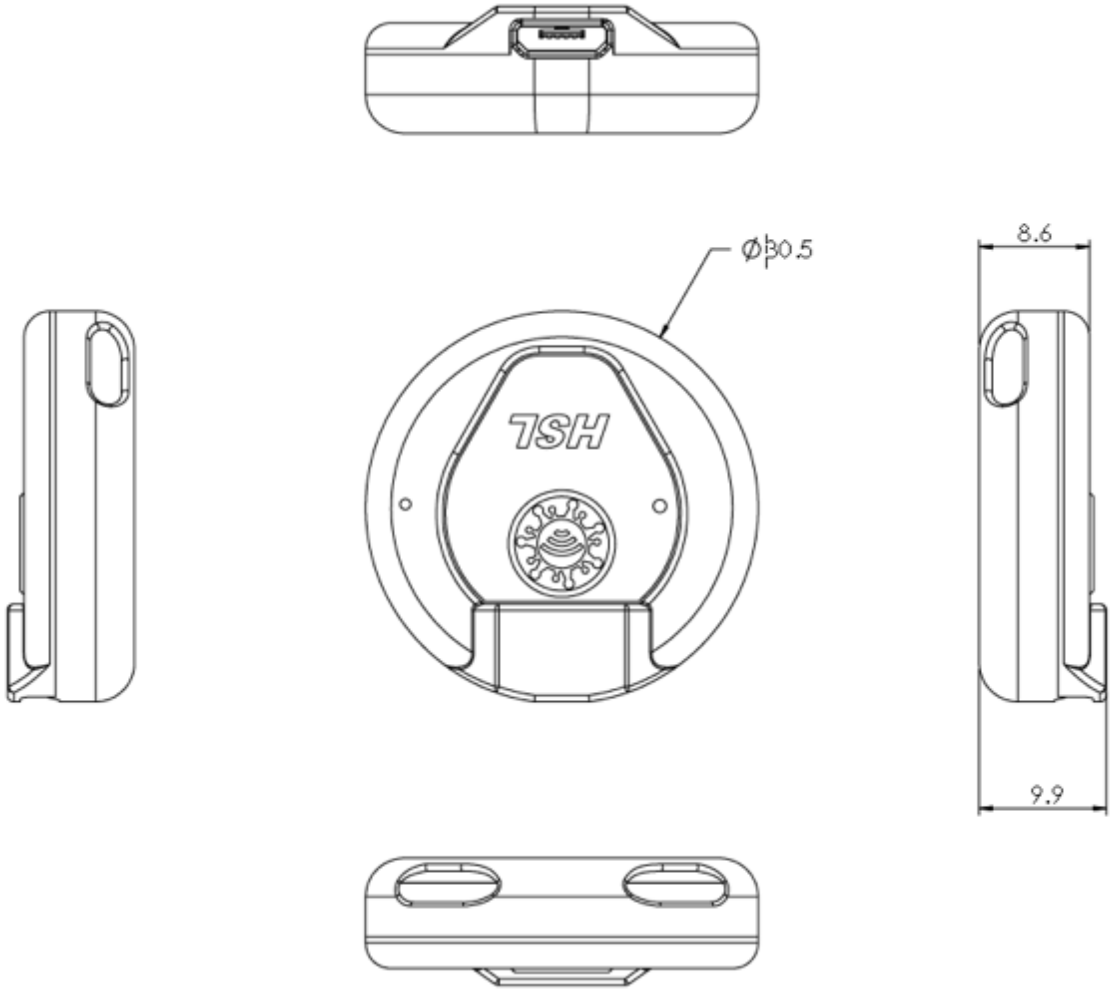
Tag Mechanical Drawings



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No User Training

No configuration or action is needed from the moment you give the tag to the employee

1. Clip the tag to the employee ID badge / roller
2. Normal operation LED indication (short green light each 5 seconds)
3. Battery low indication – slow and then fast red LED blinking

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Summery

- HSL's Corona tag is the only solution in the world that does not require any user intervention or training.
- This is the only product in the world that does not require charging for 6 months.
- HSL's Corona tag is putting employees' privacy and health at the highest priority. No central database of events is kept.
- Low cost, easy to deploy and no special infrastructure required.

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Who are we?

HSL is an Israel based cyber security company operating in Europe and the US. Among its customer are many of the world's leading defense and security organization.

HSL is used to develop innovative products in a short timeframe to meet the dynamic requirements of its customers.

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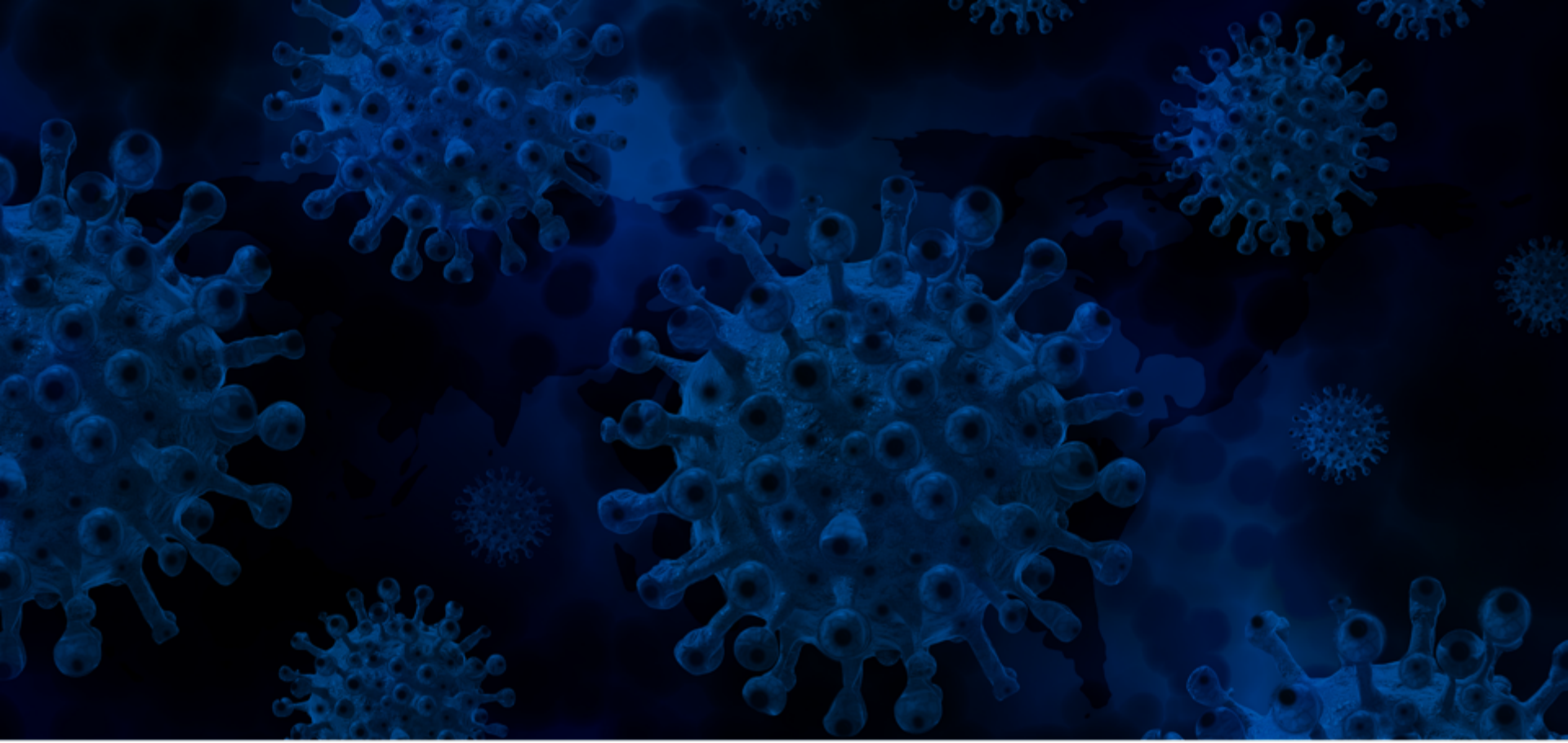

Thank you

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