

## **HOW DOES SAR USE AIRFLARE SEARCH TECHNOLOGY?**

AirFlare Search Technology provides Search Teams multiple mechanisms to locate a Lost Adventurer,\* covering both on-grid and off-grid scenarios.

When an Adventurer installs the AirFlare app on their mobile phone they complete a user profile. If they become the subject of a search, the Search Team downloads the Adventurer's profile from the AirFlare Registry:

- 1. The Lost Adventurer is sent an email informing they are the subject of a search and asking them to immediately respond (via contact information specified by the Search Team).
- 2. The Lost Adventurer's phone is sent a notification. If the phone is within cellular service it will return its exact GPS coordinates, unless the Adventurer declines the notification within 20 seconds.
- 3. If the Lost Adventurer has opted into Location Caching: When the Adventurer becomes the subject of a search, the last known GPS coordinates within cellular service are available to the Search Team. (*Release Pending*).
- 4. An AirFlare Detector is configured to search specifically for the Lost Adventurer's phone in the field whether the phone is in or out of cell service. When a Detector comes within range of the subject phone (typically within a half mile), the Search Team is alerted that the subject is in the vicinity. The Detector can then be used as a homing device.
- 5. Once a connection is made, whether on or off grid, the Detector prompts the Lost Subject phone to send its GPS coordinates back to the Search Team.

\* If the Lost Adventurer is not an AirFlare subscriber, an AirFlare Detector is configured to search for a Wi-Fi address known to be, or suspected to be, stored on the subject's phone. (E.g. a home or work network, or the network of a frequented coffee shop). When the Detector comes within range of the subject phone (typically within a half mile), the Search Team is alerted that the subject is in the vicinity. The Detector can then be used as a homing device.

#### AIRFLARE FEATURES

### **AIRFLARE BEACON DETECTION:**

Enables a Search Team to configure AirFlare Search Technology to search for a specific phone belonging to a specific Lost Adventurer.

When an Adventurer downloads and subscribes to AirFlare, a unique AirFlare Beacon is installed on their phone. If that Adventurer becomes the subject of a search, a Search Team configures an AirFlare Detector to search for that Beacon. When the Detector comes within range of the subject phone, the Search Team is notified the subject is in the vicinity.

### **NON-AIRFLARE SUBSCRIBER DETECTION:**

Enables a Search Team to configure AirFlare Search Technology to search for a phone without an AirFlare Beacon installed (i.e. belonging to an Adventurer who is not an AirFlare subscriber).

A Search Team can configure an AirFlare Detector to search for the Lost Adventurer's phone via a Wi-Fi address known or suspected to be stored on the phone (for example, a home or work network, the network of a frequently visited coffee shop, etc.).



## **LOCATION MESSAGING:**

From within the AirFlare app, a Lost Adventurer can automatically pull their phone's GPS coordinates into a text message that can be sent to 911 or an emergency contact.

The Lost Adventurer phone must be within cellular service for the message to be sent.

#### **SOS STROBE:**

Uses a Lost Adventurer phone's flash light to signal "S-O-S."

The SOS Strobe can be used at night or in low light to signal towards lights, a passing aircraft or into an open space where people may be present.

#### **LOCATION RETURN:**

A Lost Adventurer phone's GPS coordinates are returned to a Search Team when they become the subject of a Search.

When a Search Team accesses the AirFlare profile of a Lost Adventurer, a notification is sent to the subject phone. If the phone is within cellular service and the Lost Adventurer does not respond to the notification within 20 seconds, the GPS coordinates of the subject phone are sent back to the Search Team. If the Lost Adventurer's phone is not in cellular service, the notification will be delivered once it returns online.

### **LOCATION CAPTURE:**

A Lost Adventurer phone's GPS coordinates are returned to a Search Team when a Detector comes within range.

When a Detector comes within range of a Lost Subject's phone with AirFlare installed, the Detector prompts the phone to return the phone's GPS coordinates. If the phone has recent coordinates, it will send those coordinates immediately. If not, the phone will obtain GPS coordinates and send as soon as available.

# **LOCATION CACHING:** (Release Pending)

An Adventurer can opt into automatically uploading their phone's GPS coordinates into the AirFlare Registry.

GPS Coordinate uploads occur every 3 minutes when the phone is in cellular service. GPS coordinates are cached for 30 days. Cached GPS coordinates are available to a Search Team when an Adventurer becomes the subject of a search (i.e. when the Lost Subject's AirFlare ID is downloaded from the Registry).

#### **LOCATION SHARING:** (Release Pending)

When an Adventurer opts into Location Caching, their phone's cached GPS coordinates are accessible to people to whom the Adventurer has granted access (e.g. friends, family or an emergency contact).

This information can be used to check most recent location of the Adventurer (e.g. at a ski resort) or to check progress on a trip (e.g. a backpacking trip).