
CHAMPAIGN POLICE DEPARTMENT

POLICY and PROCEDURE

POLICY NUMBER: 41.20

SUBJECT: GUNSHOT DETECTION PROGRAM

EFFECTIVE DATE: 2/1/23

REVISED DATE:

REFERENCE ILEAP:

give responding Department staff the legal authority to enter private property.

REFERENCE CALEA:

INDEX AS:

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PURPOSE:

The purpose of this policy is to establish guidelines for the use of the Flock Raven Gunshot Detection Program (Raven) by the Champaign Police Department. Raven will increase the Department's ability to be quickly alerted of an incident involving shots fired, safely and strategically deploy into the area in and around the scene, more promptly locate victims, identify involved vehicles through Flock ALPR integration, locate and arrest possible suspects involved in illegal gunfire, and locate critical evidence before it is contaminated or lost.

DEFINITIONS:

Alert: An activation of the Raven sensors. All users who are logged into Flock will be notified that the Raven system has detected gunfire. Users can receive an alert via Flock's web application, SMS, and email. Alerts are over 90% accurate, with localized accuracy within a 90 square foot radius of the gunfire. The gunfire to alert time frame is approximately 30-60 seconds.

Coverage Area: A defined geographic location where Raven sensors can reliably triangulate gunfire incidents.

Raven: An auditory detection system that utilizes audio sensors placed in selected areas to identify the location of gunfire. Raven uses multiple collaborative acoustic sensors that activate when gunfire occurs. Raven sensors and software triangulate and pinpoint the approximate location of the gunfire. Flock triggers an alert in the web application (and through SMS and email, if applicable). This service can significantly decrease the elapsed time between the incidence of gunfire and the Department's response to that area.

POLICY:

It shall be the policy of the Champaign Police Department to utilize the Raven program to enhance the Department's ability to respond to and investigate violent crimes involving illegal gunfire. All users will receive training on the use and operation of the system. A Raven alert by itself does not

41.20.1 AUTHORIZED USE AND TRAINING

- A. Staff will use Raven only for law enforcement purposes and after receiving training on the technology. Law enforcement purposes include, but are not limited to, the response and investigation of shots fired calls, shooting into a structure, and other firearms-related calls.

41.20.2 RAVEN ACTIVATION RESPONSE

- A. When a gunshot is fired within the designated coverage area, sensors located in that area will detect the shot's approximate location. Raven is not able to determine the number of shots fired or the speed or direction of a moving shooter.
- B. The Raven alert will provide the following information to all users that are logged into the system:
 - 1. Shooter's approximate location.
 - 2. The exact time of the gunfire.
- C. Users that are logged into Flock on an MDC or computer will have the ability to access the following information about the incident:
 - 1. Approximate location of the gunfire, including GPS coordinates.
 - 2. Available audio file(s) of the gunfire incident.

41.20.3 METCAD RESPONSIBILITIES

- A. Set the dispatch location of the event at "the dot."
 - 1. While an address will be provided, officers should be reminded that this is the closest property address to the location of "the dot," which is the center of an approximately 90-square-foot radius representing the location of the gunfire.
- B. Provide information to officers on additional calls for service of the incident by citizens.
- C. Assign the appropriate number of officers based on the severity of the incident on ALL Raven alerts.
- D. Dispatch appropriate Emergency Medical Services (EMS) assistance as needed upon confirmation of a shooting incident.
- E. Enter all pertinent information associated with the event into the CAD system, including the Raven Alert disposition provided by officers:

1. A disposition of "Raven Founded" will be entered when evidence of gunfire was located.
2. A disposition of "Raven Unfounded" will be entered when no evidence of gunfire was located.

41.20.4 PATROL RESPONSIBILITIES

- A. Officers assigned to the Operations Division should log into their Flock account using their individually assigned username and password at the beginning of their shift and leave it running through the duration of the shift.
- B. If an officer receives a Raven alert before being dispatched, they may respond to the incident. The officer must advise METCAD that they are responding and provide the address of the incident. Only the first responding officer needs to advise dispatch of the address of the Raven alert.
- C. Officers shall make a safe and strategic approach while responding to the incident, being aware that an offender or multiple offenders may be on the scene or still in the area.
- D. Respond with at least two officers when possible.
- E. Request additional officers and EMS for assistance as needed.
- F. Supervisors will ensure officers are dispatched to all Raven alerts.
- G. Officers must be aware that the gunshot detection technology is extraordinarily accurate, and there is a high probability of active gunfire. Due to its serious nature, officer safety is paramount. The closest officer(s) will immediately respond to the area of all Raven alerts and attempt to determine if the event is an active shooter. Clues may include additional gunshots heard or notifications by METCAD.
 1. If there is an active shooter event, officers shall respond immediately to the location and eliminate the threat.
 2. When an active shooting event does not exist, officers should not respond directly to the scene until backup officers are nearby. This will be the preferred response anytime there is no known continuing threat to human life and injured person(s) or other circumstances where there is an immediate need for police intervention.
- H. After the initial active gunfire threat has subsided and the scene is secured, officers shall canvass the location identified by Raven for victims, evidence, and witnesses. The officers conducting the canvass shall exit their patrol vehicles to accomplish this task.
 1. The canvass area recommended by Flock is an approximately 90-square-foot radius from the alert location. Officers shall canvass an area that is approximately 90 square feet from the alert location and are strongly encouraged to go beyond that distance.

2. If the canvass is completed during hours when there is little or no natural light and no evidence is recovered, the shift supervisor will be responsible for communicating this fact to the next shift's supervisor to ensure officers are sent to re-canvass the area when there is daylight.

- I. Complete the duties of a preliminary investigation as outlined in Policy 42.2, Criminal Investigations Operations.
- J. Notify METCAD of the disposition, providing either Raven Founded or Raven Unfounded. If an officer clears the call for service via their MDC, one of those dispositions shall be entered by the officer.

41.20.5 INVESTIGATIONS RESPONSIBILITIES

- A. All detectives will have access to Raven.
- B. Detectives shall provide the Champaign County State's Attorney's Office with any requested forensic reports or additional requested Raven information.
- C. If a detective is assigned to a case involving the use of Raven, they will do the following:
 1. Replay any audio recording associated with the incident to recreate the crime scene, including the potential timeline of rounds discharged and the potential number of offenders.
 2. Access and extract incident data within seven days of the incident.
 3. Acquire detailed reports from Flock within 30 days of the incident.
 4. Evaluate and present incident data in preparation for prosecution.

41.20.6 CRIME ANALYSIS RESPONSIBILITIES

- A. Access the information accumulated by the Raven acoustic sensors to identify:
 1. Potential gun violence-related trends.
 2. Crime patterns.
 3. Any specific locations which have a high amount of gunfire incidents.
- B. Disseminate the information to the shift lieutenants to implement an appropriate strategic response which may include, but is not limited to:
 1. Follow-up investigations.
 2. Patrol details.
 3. Assistance from specialized units or agencies.
- C. Generate and maintain a spreadsheet database that includes the following information:
 1. The number of founded and unfounded alerts.

2. Would the Department have been aware of the event if not for Raven?
3. Were suspects arrested/identified?
4. Was a victim(s) located and afforded prompt medical attention by emergency responders?
5. Was a witness(es) located?
6. Was a gun(s) recovered?
7. Were any casings recovered?

- a. Casings that hit to NIBIN.
 - b. The total number of connected crimes from NIBIN hits.
 - c. Suspects arrested / cases filed for prosecution from NIBIN hits.
 - d. Percent of NIBIN hits to incidents where casings were found.
8. Search warrants issued and arrests from subsequent investigations.

- D. Provide regular reports on gunfire activity that provide temporal activity (days of the week and hours of the day) and repeat gunfire activity locations.

41.20.7 REPORTING

- A. A police report will be completed on all Raven alerts that are deemed to be founded. All Raven related reports, at a minimum, shall include the following information:
 1. The timestamp and approximate location of the alert(s) provided by Raven shall be documented in the report.
 2. All suspect information, including identification if they were contacted or arrested.
 3. Documentation of any evidence located and/or recovered.
 4. The identity and location of any witnesses.
 5. Document the acquisition of the Raven audio file(s) and the evidence submission.
 6. On all shooting incidents where a Raven alert was received, Raven shall be listed as a reporting party in police reports utilizing the following information: Flock Safety, 1170 Howell Mill Road, NW Suite 210, Atlanta, Georgia 30318, 866-901-1781.

41.20.8 PROGRAM MANAGEMENT

- A. The Deputy Chief of Operations or their designee shall coordinate communication with Flock regarding Raven's performance and contractual obligations of the City of Champaign and the vendor.

- B. The Deputy Chief of Operations or their designee shall oversee Raven equipment implementation, management, and maintenance. Those responsibilities shall include the following:

1. Ensuring the technology is effectively utilized.
2. Data is accurately recorded and reported.
3. Coordinating with Flock to address any performance concerns.

41.20.9 DATA AND RECORDS RETENTION

- A. All retained data from Raven must be captured by downloading it through Flock's web application. Officers WILL NOT make any external recordings of the information that is available through Flock, including, but not limited to, audio files, digital screenshots, map features, or any reproductions of any of the information that is available on Flock's web application. Officers WILL NOT save, transmit or disseminate Raven information without written permission of the Deputy Chief of Operations or his designee. An exception to this prohibition is that Officers may request a copy of the Raven information for use in the investigation, analysis, or prosecution of a gunshot incident.
- B. Raven audio files are recorded in a Waveform (WAV) format. Raven audio files must be saved in the original WAV format. Raven audio files will be preserved and entered into evidence on a compact disc, DVD, thumb drive, or other approved Department digital media or server. Officers shall review the original WAV file recording within Raven. Upon archiving a copy of the WAV file to a storage device, the officer shall review the archived WAV file to verify that it transferred wholly and accurately before submitting it into evidence.
- C. Flock retains Raven gunshot detection audio files for a period of 30 days. Raven records five (5) seconds of audio per alert. If additional gunshots are detected, additional audio files are generated.
- D. Flock can provide additional information for an event upon request, including all related WAV files, a map of the event, GPS locations, and a Raven device list.

ISSUING AUTHORITY

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