

Electronically Monitored Home Confinement in Illinois

July 1988

In recent years, the criminal justice community has shown increased interest in alternative sentencing options. Criminal justice officials across the country are looking for ways to relieve prison and jail crowding while maintaining stringent crime control policies. Intermediate sanctions, those that are tougher than probation, but less harsh and less expensive than incarceration, are drawing particular attention.

Many of these intermediate sanctions have been conceived and used in recent years. One innovative program that has attracted much attention is electronically monitored home confinement. Not only has it captured the attention of the public and the media, it has gained acceptance as a viable criminal justice sanction from many officials across the country. As of February 1988, electronically monitored home confinement was being used in at least 32 states, including Illinois.1

What is electronically monitored home confinement? How is it used? How often it is used and by whom? This report is intended to answer these and other questions. It provides an in-depth look at electronically monitored home confinement, both in Illinois and the rest of the nation, and describes the basic types of monitoring systems in use in criminal justice programs today.

Electronic monitoring and home confinement are two distinct concepts. Electronic monitoring is simply the use of electronic technology to track the movements or whereabouts of a person or object. Home confinement, which is also commonly termed house arrest or home incarceration, is the legal confinement of an individual to his or her residence rather than a jail or prison cell. While the goal of home confinement is to restrict an offender's freedom, the degree of restriction imposed can vary. Typically, individuals placed in home confinement are allowed to leave their residences for employment, treatment, or other approved activities, but they must return for confinement during all other curfew hours. To ensure that curfews are observed, supervision officials typically make random residence checks on a periodic basis.

In the past few years, supervision officials have begun to use electronic technology to check whether an offender placed in home confinement is observing curfew. This new approach has been variously termed electronically monitored home confinement, electronically monitored house arrest, or simply electronic monitoring. Electronic monitoring devices, at least as they are currently being used with home confinement, indicate only whether the offender is in a specific location. They neither track the offenders' movements nor eavesdrop on conversations. In essence, they are used as a tool for more effective and efficient supervision of individuals placed in home confinement.

The History of Electronic Monitoring

Although the origins of electronic monitoring can be traced to military research in the early 1900s,2 electronically tracking criminal offenders was first suggested in the 1960s, when a prototype device was tested on parolees, mental patients, and research volunteers in Massachusetts.3 Despite interest in electronic monitoring, market conditions were never attractive enough to make the technology commercially available. This changed by the 1980s, however, when prison crowding created an unprecedented demand for confinement alternatives.4

One of the first uses of electronic monitoring in the criminal justice system occurred in Albuquerque, New Mexico, in 1983,5 when an electronic monitoring device was used to help enforce the curfew of a probation violator sentenced to home confinement. In December 1984, the first formal pilot project was implemented in Palm Beach County, Florida.6 Convicted misdemeanants—mostly drunken drivers-who otherwise would have been jailed and work releasees who had successfully completed a portion of their sentence were released to their homes under electronically monitored home confinement. In the first year of operation, 87 offenders participated in the program with only three causing serious problems: one escaped and two committed new offenses.7 Local officials called the program a success, and similar programs began to be implemented across the nation.

A National Summary

Since the early experiments in New Mexico and Florida, the use of electronic monitoring in the criminal justice system has grown rapidly. In an effort to track this development, the National Institute of Justice (NIJ) conducted a nationwide survey of programs that were using electronic monitoring on February 15, 1987.8 The results of the survey provide a national "snapshot" of the people being monitored at that time and of the electronic monitoring programs they were participating in.

On February 15, 1987, at least 53 programs in 21 states were using some form of electronically monitored home confinement. Of the 826 people being monitored, 90 percent were male (see Table 1). Although all ranged in age from 14 to 78, 56 percent were under 30. About 33 percent of the people being monitored had been charged with major traffic violations, particularly drunken driving, about 18 percent were charged with property offenses, and about 14 percent were charged with drug crimes. Less than 10 percent were charged with crimes against persons, including sex offenses. The vast majority of people being monitored were sentenced offenders (94 percent); only 7 percent were pretrial releasees. Between December 1984when the Palm Beach County, Florida,

Table 1: On February 15, 1987, 826 people were being monitored nationwide.

- 90 percent were male
- 56 percent were under the age of 30
- 33 percent were charged with major traffic violations, 18 percent were charged with property offenses, 14 percent were charged with drug crimes, and less than 10percent were charged with crimes against persons
- 94 percent were sentenced offenders

Source: National Institute of Justice

pilot project began—and February 1987, at least 3,000 people were placed on monitoring equipment nationwide.

Electronic monitoring is being used at different stages in the criminal justice process. Electronically monitored home confinement has been used for pretrial releasees, probationers, parolees, and work releasees. NIJ reports that, of the programs operating in February 1987,9 about 51 percent were administered by state or local correctional agencies, such as probation agencies, parole boards, and departments of corrections. Other public agencies, such as police departments, sheriffs' offices, or courts, administered about 26 percent of the programs. The remainder, about 23 percent, were operated by private monitoring service providers working under contract with criminal justice agencies.

In 77 percent of the programs, the total number of offenders being monitored ranged from one to 20 individuals. Although 54 percent of the people participating in programs in February 1987 had been monitored for six weeks or less, 55 of the 826 people being monitored (7 percent) had been participating in their programs for longer than six months. According to a 1987 study by the Texas Criminal Justice Policy Council, the total length of time offenders are monitored generally ranges from one to four months. ¹⁰

About 60 percent of the programs defrayed equipment and operating costs by charging the offender a daily fee, usually less than \$10 per day. Most fees were established according to a sliding scale based on the offender's ability to pay.

Regardless of whether electronically monitored home confinement is used before or after trial, offender participation has always been voluntary—the offender may choose jail or prison instead-and offender selection has been based on rigorous eligibility criteria and screening. Because eligibility varies by program, a wide range of offenders-from misdemeanants to violent felons—have been placed on monitoring equipment. Most programs, however, tend to reject high-risk offenders, such as those with violent or sex offense convictions. Responsibility for screening participants also varies by program. Typically, the court, the electronic monitoring program staff, or some combination of both are responsible for screening.

A common misconception about electronic monitoring is that once a person has been placed on electronic monitoring equipment, the need for personal contact with supervision staff is eliminated. This is clearly not the case. Electronic monitoring technology serves to supplement, not eliminate, personal contact. For example, monitored individuals are usually required to meet periodically with supervision officials for counseling and discussions about program performance. In addition, supervision officials usually make random residence checks, as well as use the monitoring equipment, to enforce curfews. Curfew violations detected through electronic monitoring are always investigated and corroborated through personal contact as well. Rule violations can eventually lead to removal from the program and a return to jail or prison. It is not unusual, however, for a less severe sanction such as a warning to be imposed when appropriate.

Thus far, program completion rates have been high. Data from the NIJ survey¹¹ indicated that as of February 1987, about 90 percent of the people who had been placed on monitoring equipment have completed their programs satisfactorily—in other words, did not commit new offenses, escape, or violate curfew or other program rules.

Electronic Monitoring in Illinois

The Illinois Criminal Justice Information Authority has conducted on-site observations of four programs in the two Illinois counties that use electronically monitored home confinement. They are the Lake County Work Release Program, administered by the Lake County Sheriff's Office; the Lake County Pretrial Bond Supervision Program and the Lake County Intensive Probation Supervision Program, both administered by the Lake County Department of Court Services; and the Jackson County Probation Program, administered by the Jackson County Probation Department (see Table 2).

The Lake County Work Release Program

In 1972, the Lake County Sheriff's Office initiated the Lake County Work Release Program, in which local judges give short-term sentences of work release to offenders who are deemed not to be a risk to the community. The program provides a sentencing option that is less harsh than traditional incarceration but more structured than routine probation.

Offenders in the Lake County Work Release Program are confined to a 40-bed work release center and have release privileges for employment, treatment, or other approved activities, or when they are participating in the electronic monitoring program. Typically, offenders participate in these activities during the day and are confined to the center during all other hours. Work releasees are charged a weekly fee of \$77 to defray the costs of the program. In addition, they must abide by certain work release rules such as abstention from drug or alcohol use. Violations of curfew or other work release rules-depending on severity-can eventually lead to removal from the program and resentencing.

The success of the work release program and the judges' willingness to use it

as a sentencing option encouraged officials to expand the program. In March 1986, program administrators began using electronically monitored home confinement in the work release program. The objective was to create additional bed space in the work release center by allowing selected releasees to serve a portion of their sentences while residing in their homes. Electronic monitoring equipment would then be used to assist program staff with offender supervision.

Before a work releasee is placed on electronically monitored home confinement, or the "anklet program" as supervision officials call it, the offender is thoroughly screened by program staff. Offenders must meet the following requirements to be eligible for electronically monitored home confinement:

- Residence in the work release center between 21 and 124 days
- Must have served approximately onehalf of the work-release sentence with no major rule violations
- Voluntary agreement to participate
- Reliable employment

- A community sponsor (for example, a spouse, a neighbor, or other member of the community)
- A stable home environment
- A home telephone
- No pending criminal cases
- Generally, no convictions for sex or drug crimes, DUI where grave personal injury occurred, or prior escape from confinement

Once placed on electronically monitored home confinement, work releasees must observe all curfews and work release program rules. These conditions are enforced through personal contact between the work releasee and supervision staff, as well as through the monitoring equipment. For example, work releasees placed in home confinement are still required to visit the work release center twice a week. Supervision officers also perform random home or employment visits on a weekly basis. Violations of curfew or other rules, regardless of how they are detected, can result in removal from electronically monitored home confinement and a return to the work release center.

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Table 2: Summary of programs in Illinois that use electronic monitoring

	Lake County Work Release Program	Lake County Pretrial Bond Supervision Program*	Lake County Intensive Probation Supervision Program*	Jackson County Probation Program
Administering agency	Lake County Sheriff's Office	Lake County Department of Court Services	Lake County Department of Court Services	Jackson County Probation Department
Date monitoring began	March 1986	March 1986	June 1987	February 1986
Type of system	Continuously signalling	Continuously signalling	Continuously signalling	Continuously signalling
Number of monitoring units	15	30	30	10
Type of individuals monitored	Work releasees	Pretrial releasees	Intensive probationers	Probationers, pretrial releasees
Number of people moni- tored from beginning of program to 7/1/88	74	230	3	55**

^{*} Programs share the same electronic monitoring equipment.

^{**} Approximate figure; includes 50 probationers and 5 pretrial releasees.

How Electronic Monitoring Systems Work

Currently, several different types of electronic monitoring systems are being used with home confinement. The National Institute of Justice reports that no fewer than 14 manufacturers are marketing systems nationwide. Although all the systems on the market are designed to verify that an offender is in a specified location at a given time, they vary in their options, operation, and cost. Systems can be purchased or leased. A system capable of monitoring up to 20 offenders can cost from about \$15,000 to more than \$100,000.

Electronic monitoring systems can be divided into two basic categories: continuously signalling, or "active," systems, and programmed contact, or "passive," systems. Both usually use telephone lines. Continuously signalling systems operate constantly, monitoring the arrival and departure of the offender at a particular location 24 hours a day. Programmed contact systems, on the other hand, contact the offender intermittently, verifying the offender's presence at a particular location only at certain times.

Continuously Signalling Systems

There are two primary types of continuously signalling systems, those that use telephone lines and those that use a radio-like transmitter and receiver. Continuously signalling systems that use a telephone are more complex and usually consist of three basic components: the transmitter, the receiver/dialer, and the host computer (see Figure 1). Together, the transmitter and receiver/dialer, called a monitoring unit, are capable of monitoring one person.

The transmitter, which is about the size of a cigarette pack, is strapped in a tamper-proof fashion to the offender's ankle or wrist. Once the transmitter is strapped on, it can be removed only by stretching or cutting the straps in a manner that is easily detected by supervision officials. The transmitter emits a radio-like signal at regular intervals over a range of about 150 feet. The receiver/dialer, about the size of a shoebox, is located in the offender's home and connects to a standard power source and a telephone. It detects the transmitter's signal when it is in range. The receiver/dialer sends information to the host computer via the telephone, giving the times the receiver/dialer started and stopped receiving

the transmitter's signal. The receiver/ dialer also notifies the host computer whenever it is tampered with, moved, or unplugged. If the telephone line is disconnected, the unit stores any information that it has been prevented from calling in—including the fact that the telephone has been disconnected—until the line is reconnected.

When the offender is within range of the receiver/dialer, the transmitter's signal is received and the host computer "knows" the offender is present. Conversely, when the offender is beyond range, no signal is received and the host computer "knows" of the offender's absence.

The host computer, which is located in a central supervision office, accepts the information from the receiver/dialer over the telephone lines. The computer

compares the information to the offender's curfew schedule, which has been programmed into the computer, and alerts supervision officials to unauthorized absences.

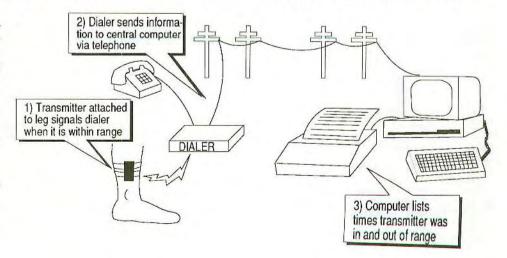
Simpler continuously signalling systems, which do not use a telephone, consist of only two basic components, a transmitter and a portable receiver. The transmitter, which is strapped to the offender's ankle, emits a radio signal which travels about one city block. The portable receiver, which is placed in the supervising officer's car, is tuned to receive the transmitter's signal. By driving past the offender's residence during time periods of required confinement, supervision officials can check on the offender's presence at random. The system is equally suitable for verifying that the offender is at work, a treatment center, or another required location.

Programmed Contact Systems

Although programmed contact systems also use a telephone, they differ from continuously signalling systems in that they verify the offender's presence at a particular location only at specific times. One type of programmed contact system consists of an encoder device, a verifier box, and a host computer. The encoder device. similar to a transmitter in size, is strapped to the offender's wrist. The verifier box is located in the offender's home, and, like the receiver/dialer in a continuously signalling system, it communicates via the telephone with the host computer. The host computer. located in a central supervision office, generates telephone calls to the offender's residence during curfew hours. The offender, unaware of the times the computer will place a call, is required to answer and confirm his or her identity and presence by inserting the encoder into the verifier box. If the phone is not answered or the encoder is not properly inserted into the verifier, the computer reports the infraction.

Several variations on this system are currently available. The main difference between them is in the way they confirm the offender's identity. For example, one system requires the offender to wear a wristwatch-like device that provides the offender with a number to punch into a touch-tone phone. Another requires the offender to carry a digital-readout paging device that provides a

Figure 1: Active, continuously signalling electronic monitoring system



number for the same purpose.

More advanced programmed contact systems use voice or visual verification. In voice systems, monitored individuals receive computer-generated telephone calls from a central supervision office. Upon answering, they are prompted to speak a preassigned phrase or series of numbers. One type of system then transmits the offender's voice to the host computer using telephone lines. The computer then compares the offender's voice pattern to a master voiceprint that was previously recorded by supervision officials and stored in the computer. Another system uses a device in the offender's home to compare the offender's voice to a prerecorded voiceprint. Only the results of the comparison are then transmitted over telephone lines to the host computer. By transmitting data over telephone lines, rather than the offender's actual voice, this type of voice verification system may intrude less on the offender's privacy. Programmed contact systems that use voice verification are often used in conjunction with continuously signalling systems.

Programmed contact systems using visual verification contact monitored individuals with computer-generated telephone calls as well. Rather than answering with an ordinary telephone. however, the monitored individual uses a visual telephone provided as part of the monitoring program. With a built-in camera, the visual telephone takes a black-and-white snapshot of the person answering and transmits the image to the supervision office over standard telephone lines. The incoming image, the date and time are then recorded by the computer for supervision officials to view immediately or at a later time.

The National Institute of Justice has compiled a list of electronic monitoring equipment vendors. To obtain a copy, contact the Authority or the National Institute of Justice directly.

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The monitoring equipment used by the Lake County Work Release Program is a continuously signalling, or "active," system that uses a telephone (see facing page). A system with 15 monitoring units, for monitoring up to 15 offenders, was purchased for the program at a cost of about \$30,000. A single staff person is responsible for operating the system, reviewing the reports it generates, and investigating possible violations. Reports typically include information on when the person left and returned home. The reports also identify whether the home equipment is functioning. Although monitored offenders are not charged any extra fee, they must continue making the \$77 weekly payments required of all work releasees.

As of July 1, 1988, a total of 74 work releasees had been placed on electronically monitored home confinement in Lake County. The average time they spent on monitoring equipment was two months. Of the 71 offenders who have completed the program, 52 did so satisfactorily and 19 were removed for violating curfew or other program rules. Of those 19, 10 were drug- or alcohol-related violations.

The Lake County Pretrial Bond Supervision Program

In response to crowding in the Lake County Jail, the Lake County Department of Court Services initiated a Pretrial Bond Supervision Program in February 1986. Under this program, up to 45 selected court-remanded felons—persons charged with a felony for whom bond has been set—who cannot post bond are granted pretrial release under varying conditions and degrees of supervision. The program provides a pretrial option for those cases where release on recognizance is insufficient, but where release would be granted if bond were posted.

All court-remanded felons, except those denied bond outright as provided by law, are potentially eligible for the program. Using information contained in the defendant's bond report and the recommendations of pretrial service's staff, a bond court judge screens each individual case and decides whether or not release should be granted. Although the program is primarily for nonviolent offenders, accusation or prior commission of a violent offense does not automatically pre-

clude participation in the program. Release is denied automatically, however, for defendants with outstanding warrants for parole violations or with outstanding warrants from other jurisdictions.

If release is granted under the program, the court establishes various conditions the defendant must observe. They may be as lenient as requiring the releasee to report to a supervision officer on a periodic basis, or as stringent as partial or total home confinement. Although the court establishes the conditions of release, minimum program standards determine how often a releasee must contact his or her supervision officer.

Program staff then have the responsibility of supervising the releasee and ensuring that the conditions of release are observed. To ensure that optimum supervision is maintained, no more than 45 releasees participate in the program at any one time.

Electronically monitored home confinement has been used as a condition of release for certain individuals in the Pretrial Bond Supervision Program since March 1986. For the court, it widens the scope of available supervision options by expanding the degree of supervision that can be imposed on releasees. For program officials, it serves as a tool with which more intensive and effective offender supervision can be accomplished. Even when electronically monitored home confinement is imposed as a condition of pretrial release, face-to-face contact between the releasee and supervision officials is still maintained. Random residence or employment checks are conducted at least weekly, as are meetings between the releasee and supervision staff.

Like the Lake County Work Release Program, the Pretrial Bond Supervision Program uses a continually signaling electronic monitoring system. A system with 15 monitoring units was purchased for the program at a cost of about \$30,000. Since the original purchase, 15 additional monitoring units have been added at \$1,800 each. A single staff person is responsible for operating the system and reviewing the reports it generates. Curfew violations detected through electronic monitoring are investigated by the program's three bond supervision officers. Monitored releasees are not charged any fee.

As of July 1, 1988, 230 pretrial releasees had been placed on electronically monitored home confinement in Lake County. The average time spent on monitoring equipment has been three months. Of the 208 individuals who have completed the program, 182 did so satisfactorily. Twenty-six were removed for violating curfew or other program rules: of those, eight were arrested for new offenses, 10 failed to appear in court, and eight were removed from the program for technical violations of the program's rules.

The Lake County Intensive Probation Supervision Program

The success of electronically monitored home confinement with pretrial releasees in Lake County prompted local criminal justice officials to consider its use in the Lake County Intensive Probation Supervision (IPS) Program. IPS is a specialized probation program that provides intensive supervision and services to a limited caseload of high-risk, Class 1 through Class 4 felony offenders. In Lake County, offenders sentenced to IPS are often also required to serve a short jail term, typically three to six months in duration, prior to being released into the community.

The use of electronic monitoring in Lake County's IPS program was initially proposed by the Lake County Department of Court Services in March 1987. The objective was to place selected intensive probationers in electronically monitored home confinement rather than jail, not only to further relieve jail crowding but also to enable the probationer to remain employed. In June 1987, the chief judge of the 19th Circuit court issued an administrative order allowing intensive probationers to be sentenced to electronically monitored home confinement.

Offenders serving a period of electronically monitored home confinement as part of their IPS sentence are monitored with the same equipment as pretrial releasees. They are not charged any fee.

Intensive probationers, participate in a distinct program from pretrial releasees. Each offender's day-to-day supervision is the responsibility of his or her probation officer. Violating curfew or other rules while in home confinement is a probation violation and can lead to incarceration in the county jail and resentencing. IPS con-

tinues even after the home confinement portion of the sentence is completed. As of July 1, 1988, three intensive probationers had been placed in electronically monitored home confinement as part of their IPS programs. The average time they were monitored was three months. Two have completed the home confinement portion of their probations satisfactorily and the third is still serving the home confinement portion of the sentence.

The Jackson County Probation Program

In 1985, the Jackson County Probation Department and local criminal justice officials-in response to crowding in the Jackson County Jail—began discussing the potential use of electronically monitored home confinement as a condition of probation. At the time, the jail was contracting with a neighboring county for additional bed space. The objective was to provide the county's judges with a sentencing option short of incarceration but more structured than simple probation, thereby reducing the number of jail sentences imposed. In February 1986, electronically monitored home confinement was made available in Jackson County, and judges began to use it as a sentencing option.

Any offender eligible for probation who is brought before a municipal or circuit judge for sentencing is potentially eligible for electronically monitored home confinement. Prospective candidates are identified by the court on the basis of presentence reports by the probation department, and in some cases by the recommendations of defense attorneys. The court has complete discretion in determining which offenders are suitable for this option and which offenders are eventually sentenced to it. Typically, the prescribed sentence will allow the offender to work or participate in treatment activities during the day, but require confinement during evening and weekend hours. Offenders selected for this type of probation are always presented with the option of serving jail time or participating in the monitoring program. Both misdemeanants and felons have been sentenced to probation under the condition of electronically monitored home confinement in Jackson County.

All offenders sentenced in this manner are supervised by the Jackson County

Probation Department. Each offender is considered to be part of the probation department's regular caseload, and is assigned a probation officer who is responsible for daily supervision of the offender. Offenders sentenced to electronically monitored home confinement are treated as probationers requiring maximum supervision. They must meet with their probation officers, face to face, at least twice a month. In addition, the probation officer conducts monthly home visits to discuss the offender's performance in the program, troubleshoot problems, and generally ensure that the conditions of probation are observed. Rule violations are viewed as probation violations, and, depending on their severity, will eventually lead to removal from the program, a return to the county jail, and resentencing.

Like the Lake County programs, the Jackson County Probation Program uses a continuously signalling system. A system with 10 monitoring units was purchased for the program at a cost of about \$23,000. A single staff person is responsible for operating the system and reviewing the reports it generates. Curfew violations detected by the monitoring equipment are investigated by the offender's probation officer. Monitored offenders are not charged any fee.

As of July 1, 1988, approximately 50 offenders had been sentenced to probation under the condition of electronically monitored home confinement in Jackson County. Five pretrial releasees have been placed on monitoring equipment and supervised by the Jackson County Probation Department as well. The average time spent on monitoring equipment has been one to four months. Of the approximately 54 individuals who have completed the program, 45 did so satisfactorily and eight to 10 were removed for violating curfew or other rules.

Problems and Legal Issues

Although electronic monitoring programs across the country have often been successful, their development has not been without problems. Some users of elec-

tronic monitoring systems have experienced technical problems with their equipment. Such things as weather conditions, powerful radio wave broadcasts, and even cast-iron bathroom fixtures have at times interfered with the functioning of some monitoring devices. Although such problems have typically been resolved, new programs can encounter similar problems during their initial development.

Perhaps more important than technical problems are the various legal issues that have yet to be resolved. Because electronically monitored home confinement might be viewed as an intrusion into the home and a violation of the right to privacy, its constitutionality has been a concern. In their article assessing the legal issues associated with electronic monitoring, Rolando V, del Carmen and Joseph B. Vaughn, of the Criminal Justice Center of Sam Houston State University in Texas, conclude that electronically monitored home confinement can withstand a constitutional challenge. 12 First, participation in a monitoring program is voluntary and thus involves informed consent and a valid waiver of privacy rights. Second, if the participant is a convicted criminal, the right to privacy is already severely diminished. While many jurisdictions that have implemented electronic monitoring have been confident in such reasoning, the question of informed consent becomes somewhat ambiguous when coercion is considered. Whether or not the choice between incarceration and electronically monitored home confinement is truly voluntary and free of coercion is an issue that may need to be resolved in the future.

Another concern is that electronic monitoring may violate constitutional protection against unreasonable search and seizure. Most experts agree, however, that because the technology neither eavesdrops on conversations nor watches what an individual is doing in his or her home, it does not constitute a search or seizure within Fourth Amendment parameters.¹³

This report was writien by Authority research analyst Roger Przybylski and edited by Maureen Hickey.

Printed by authority of the state of Illinois 90-53/800. 2nd printing.

Finally, what would happen if the accuracy of a curfew violation detected by a monitoring device were legally challenged? This problem can be resolved by careful follow-up investigation of the violation. If curfew violations detected with electronic monitoring equipment are always investigated by supervision officials and corroborating evidence is obtained, legal challenges should be easier to meet.

Because electronically monitored home confinement is so new, relevant case law is limited. Legal assessments are extremely important at both the constitutional and local levels, and they will become even more pressing as use of the technology spreads. There may well be litigation on issues associated with electronically monitored home confinement in the future.

The Effectiveness and Future Potential of Electronic Monitoring

Despite the rapid development of electronic monitoring, research and evaluation of the programs are still in their early stages. It is simply too soon for a definitive statement regarding program effectiveness. Which program applications are working? Which offenders should the programs focus on? What is the optimum duration to confine offenders? These are questions that cannot yet be answered.

Is electronic monitoring relieving prison and jail crowding? Will it continue to gain acceptance as a viable criminal sanction? These questions are equally difficult to answer, but their complexity deserves attention. In responding to them, however, an important point should be underscored. Electronic monitoring is not a program in and of itself. It is a supervision tool that is used in conjunction with other community-based programs, and its impact in the criminal justice system will always be tied to these programs.

Although it is difficult to assess whether or not electronic monitoring is helping to relieve jail and prison crowding, Annesley Schmidt and Christina Curtis, in their 1987 article, argue that from a national perspective, it probably isn't. Too few offenders are currently being moni-

tored for there to be any significant effect on the total U.S. prison and jail population. At the local level, however, the impact may vary widely, they say.

"In a 1,000-man jail, the release of 20 monitored inmates would reduce the population by only 2 percent. In a smaller jail, more impact would be achieved by a system with a capacity for monitoring 20 inmates, the typical size of the initial purchase being made." ¹⁴

Whether or not electronic monitoring will continue to gain acceptance as a criminal sanction will depend most on costs versus benefits, both monetary and social. Although monetary costs vary according to the type and size of the system, average equipment acquisition costs, amortized over a two-year period, have been estimated to be between about \$1 and \$10 per monitoring unit per day.15 These figures are significantly lower than institutional operating costs, which studies suggest "may well range between \$15 and \$50 per inmate per day".16 Thus, there is little question that the direct cost of electronically monitoring offenders in the community is less costly than incarceration. However, the monetary cost benefit equation is much more complex than this.17 Consideration must also be given to indirect operating costs, as well as to the loss of funds for other agency needs.

An additional concern is the use of electronically monitored home confinement with offenders who would not otherwise be incarcerated—a practice commonly known as "net widening." When net widening occurs, there are no monetary cost savings. In fact, the costs of electronically monitoring an offender in the community may be higher than other forms of community supervision, such as routine probation or parole.

Social costs and benefits are as important as monetary costs and benefits. When offenders are allowed to remain in the community, they can keep their jobs, support their families, and pay fines, restitution and taxes. Electronically monitored home confinement may offer such benefits while offsetting the social costs that many associate with community-based supervision: that it is too "soft" a response to crime or poses an increased risk to the community. Because it imposes a high degree of supervision and deprives

offenders of their freedom, electronic monitoring may provide both public safety and some degree of punishment.

As more research is done, criminal justice officials, the public, and legislators will learn more about the utility and effectiveness of electronic monitoring. Before a thorough assessment of electronic monitoring can be made, however, program evaluations, in-depth cost analyses, and recidivism studies must be undertaken. While some research can be accomplished by individual programs at the local level, state and national research initiatives—as well as support—will be necessary. Regardless of the findings that may emerge rom research, local acceptance of elecronic monitoring will probably always be subject to the values of the community and ts governing officials. Although electronic monitoring is by no means a panacea for contemporary criminal justice problems, it may evolve into an important tool in our repertoire of crime control strategies.

Notes

¹States with electronically monitored home confinement programs were identified by the National Institute of Justice using preliminary data from their February 1988, nationwide survey of programs that use electronic monitoring.

²C. M. Friel, J. B. Vaughn, and R. del Carmen. *Electronic Monitoring and Correctional Policy: The Technology and Its Application.* Washington, D.C., National Institute of Justice, 1987.

³R. K. Switzgebel. "Electronic Alternatives to Imprisonment." *Lex et Scientia*, 1968, 5(3):99-104.

⁴C. M. Friel and J. B. Vaughn. "A Consumer's Guide to the Electronic Surveillance of Probationers." *Federal Probation*, September, 1986.

⁵C. M. Friel et al.,1987; J. Petersilia. Expanding Sentencing Options for Criminal Sentencing. Santa Monica, Ca., The RAND Corp., 1987; A. Schmidt. National Institute of Justice Discussion Paper: The Use of Electronic Monitoring by Criminal Justice Agencies. Washington, D.C., NIJ, 1987.

⁶C. M. Friel *et al.*, 1987; Petersilia, 1987; Schmidt, 1987.

⁷Palm Beach County Sheriff's Office.

⁸For a discussion of the survey and its findings, see Schmidt, 1987. In an effort to keep up to date on the development of electronic monitoring, the National Institute of Justice conducted a second nation-wide survey of programs using electronic monitoring in the spring of 1988. However, data collected during the second survey have yet to be made available. For further information on the 1988 survey, contact the National Institute of Justice directly.

9Schmidt, 1987.

¹⁰Based on a study of 10 programs that use electronic monitoring. See J. Vaughn, "Planning for Change: The Use of Electronic Monitoring as a Correctional Alternative" in B. McCarthy (ed.), *Intermediate Punishments: Intensive Supervision, Home Confinement and Electronic Surveillance*. Monsey, N.Y., Criminal Justice Press, 1987.

11Schmidt, 1987.

¹²R. V. del Carmen and J. B. Vaughn, "Legal Issues in the Use of Electronic Surveillance in Probation." *Federal Probation*, June 1986.

13 del Carmen and Vaughn, 1986.

¹⁴A. Schmidt and C. Curtis. "Electronic Monitors" in B. McCarthey (ed.), 1987.

15 Vaughn, 1987; Friel et al., 1987.

16 Vaughn, 1987.

17Friel et al., 1987.



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