AUSTRALIAN INSTITUTE OF CRIMINOLOGY



CAN SURVEILLANCE CAMERAS BE SUCCESSFUL IN PREVENTING CRIME AND CONTROLLING ANTI-SOCIAL BEHAVIOURS?

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Paper presented at
The Character, Impact and Prevention of Crime in Regional Australia Conference
convened by the Australian Institute of Criminology
and held in Townsville 2-3 August 2001

Originally surveillance cameras systems were installed to deter burglary, assault and car theft but their use has been extended to include combating 'anti social behaviour', such as littering, urinating in public, traffic violations, obstruction, and drunkenness (Davies 1998). CCTV systems are being used increasingly to police public morals and public order. A British Home Office promotional booklet, *CCTV: Looking Out For You* (Home Office, 1994), actually states that the technology can be a solution to such problems as vandalism, drug use, drunkenness, racial harassment, sexual harassment, loitering and disorderly behaviour (Davis 1999). Indeed, when a CCTV system is installed there seems to be an expectation from the public that all crime and anti-social behaviours in that place will be stopped dead in their tracks and if anything happens to us when out and about in public that event will be captured on camera and all this more cheaply than any other crime prevention strategies. After all

"A surveillance camera can operate 24 hours a day, seven days a week, 365 days a year without a toilet break, smoko, or lunch. It does not need a holiday, maternity leave and rarely goes sick" (French 1998). "But" we are cautioned "it doesn't actually **do** anything. It is the operators that produce the results required" (French 1998)

However It is unfortunate that though billions of dollars are being spent world wide on CCTV systems, there is actually little evidence as yet of the success of CCTV to combat or deter crime or its cost effectiveness in doing so. This lack of evidence doesn't mean that CCTV is not a success, it can be, but not necessarily in all situations. What it does mean is that most systems have not been properly evaluated and/or the reason or need for a particular CCTV system was not properly explored at the outset.

This paper will weigh up the pros and cons of surveillance camera systems, based primarily on published research and observations of CCTV installations in Great Britain and Australia, examining their role in crime prevention, and offer some guidance towards establishing a framework for a surveillance camera system that could be successful as one part of an overall crime prevention strategy.

Recently I received a phone call complaining that the surveillance cameras in the mall do not work, buy new ones.

A shop owner was upset that people were climbing onto the roof of his premises and vandalising it as well as committing anti-social offences. This had been happening over a period of 2 months. However the trader had not reported it to either the police or to the Council. Obviously the cameras did not work to capture events on his roof ... BECAUSE the cameras were aimed at the street, as most people would expect them to be. After discussion with the shop owner it was determined that the offences he talked of only happened on Saturday nights. As there was a camera that could be operated to take in a view of the roof of his premises, and time was fairly specific, there was no problem giving a direction to the security guards in the monitoring room to move the camera view once or twice an hour on a Saturday evening, to check out the roof of the premises concerned. A much cheaper option than buying new cameras.

This example serves to highlight the fact that cameras are only as intelligent as those operating them or, to put it another way, the intelligence provided to them. Unless a comprehensive audit is undertaken of where crimes and vandalism are actually occurring in an area proposed to have surveillance cameras installed, it is difficult to pre-determine where the cameras should look and to evaluate their effectiveness. Next must be considered whether the cameras need to be monitored "live" or if they can be monitored after the fact. And what protocols are going to be put in place to monitor such things as the behaviour of the watchers - i.e., who will watch the watchers to ensure they behave in socially appropriate ways and do not misuse these crime prevention tools? As you can see, a number of things have to be taken into consideration before installing cameras, which increase the real costs significantly.

The costs and considerations for installing a CCTV set up do not stop at purchase and installation of hardware, monitoring and maintenance of the cameras. Also to be considered are:

- Crime and safety audit before the installation
- Vandal proofing
- Independent audits of monitoring room staff and operations after the installation
- Evaluation
- Community consultation
- Training of staff in the monitoring room
- Signage
- Improvement to lighting (which can have a the additional beneficial effect of increasing feelings of safety).
- Publicity
- Protocols and grievance procedures

Upgrading (hard pressed Councils need to consider the predictions by some analysts such as Dr Peter Grabosky of the Australian Institute of Criminology who was quoted in the Courier Mail in May 2001, as stating that current CCTV may be obsolete by as soon as 2020! [Ludlow 2001])

One UK estimate puts the cost of a monitored CCTV system of 20 city centre cameras as the equivalent of employing 30 full time police officers yet "despite over inflated claims of supporters, with often variable results" (Dee 2000).

An evaluation of CCTV systems for the Scottish Office by Professor Jason Ditton of Sheffield University, noted that in Glasgow a 32 camera system was linked to 209 arrests in the first year, at a rate of one arrest per camera every 40 days - which is rated as disappointing by Ditton (Dee 2000 & Ditton 1999). The Glasgow CCTV system had been promoted as likely to lead to an increase in annual investment to the city of 43 million pounds, creating 1500 new jobs and attracting 225,000 extra visitors, but these gains did not materialise. This surprised the researchers as their previous research in Airdrie, where CCTV started in Scotland, and where they had found a significant fall in crime after the installation of the cameras (21%), led them to expect similar results in Glasgow. However, rather than reducing crime it increased and rather than reducing the fear of crime, there was in fact a slight increase in anxiety (Dee 2000).

Does CCTV Deter Crime?

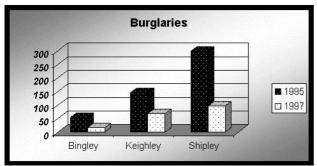
Evidence suggests that the benefits of CCTV surveillance fade after a period of time, and that displacement may occur, or there may be a shift to different sorts of crime which are less susceptible to CCTV surveillance. For these reasons, CCTV on its own can do little to address long term crime prevention. (Lawlink 2000). The evidence that the benefits of CCTV will fade after a period of time are backed up by a number of studies. "Innovative work creates uncertainty for a while for the offender, often fed by lashings of publicity that crime is going to be more difficult or risky for the offender. As uncertainty fades, new crime skills are developed and confidence that crimes can be committed successfully returns" (Tilley 1999 & and more discussion on the lifecycle of crime prevention initiatives can be obtained from Berry, G and Carter M 1992).

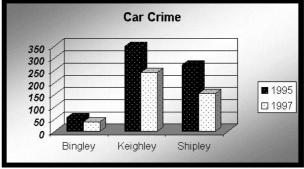
A survey of offenders asked that if they knew CCTV was present, would they have still offended? (see Horne 1998 p.323). 16% had offended even though they knew CCTV was present. 53% said there was no CCTV where they offended. 31% did not know if CCTV was present or not and did not much care. This relatively high figure "suggests that for a good number of offenders CCTV does not figure highly in any risk assessment undertaken prior to commission of the offence". (Horne 1998).

When the offenders were asked if they would still have committed their offences if they knew the CCTV had been operational 48.2% said no, 27.7% did not know and 24.1% said they would still have offended (and this rises to 40% for juvenile offenders) (Horne 1998), suggesting that some offences may be prevented whereas others will still occur. Research undertaken in Bradford, UK, adds to the case. Figures released by the police for car crime in the city's car parks show that the highest levels of car crime occur in those car parks covered by the council's CCTV systems. (KDIS Online 1999)

Crime figures from Airedale show that the CCTV systems in Bingley and Keighley, set up in 1996, also failed to deter crime. Although crime had been falling annually throughout the region during the years 1993-98 the drop in Bingley and Keighley was much less than in comparable areas without cameras.

Figures show that the drop between 1995, before cameras were installed, and 1997, when they'd been running a year, compared unfavourably with the same figures for Shipley, which didn't have cameras until later.





Bingley & Keighley: Source - student evaluation; 1995 from 1.1.95 to 31.12.95; 1997 from 1.4.97 to 31.3.98 Shipley: Source - Shipley Police Community Forum minutes 15/5/97 & 16/2/98; 1995 from 1.4.95 to 31.3.96; 1997 from 1.1.97 to 31.12.98.

Thus some local councils in Britain are beginning to question whether CCTV really is the be all and end all in crime prevention (Dee 2000 and Baldrey & Painter 1998). "In 1992 Exeter Council overturned a plan to construct a camera system, opting instead to use the money to pay for six extra police. In 1993 Birmingham City Council suspended an application for a city-wide network of cameras because of concerns about how the images would be stored and used. In the absence of privacy protection, the council felt that the project should not go ahead (Davis S 1998).

Some of the debate around CCTV centres around the premise that the more cameras there are the more they push crime into other, less prosperous areas leading to a crime ghetto effect. Surveillance cameras do not, on their own, prevent crime. They may deter types of crime in their vicinity, but basically the crimes just go elsewhere (are displaced). A CCTV system was eventually installed in Birmingham, a city with a low resident population but a large and complex city centre with a number of obstacles to good surveillance. "In the three years after installation (of the low density CCTV system), robbery and theft increased by one and a half times inside the covered area, and by three times outside it. There was no evidence to show any other effect on crimes targeted by

CCTV and reductions in vehicle-related crime were more probably as a result of a pedestrianisation scheme" (Horne 1998). Also, though a lower proportion of people had been victimised where there was good CCTV coverage (a drop of 11% for all offences, and 9% for the most serious), in the surrounding areas victimisation had increased (up 5% overall, and 2% for the most serious).

Some local governments in America have also voted against installing CCTV, Oakland City Council doing so twice (ACLU News 1999). The Oakland City Council's Public Safety Committee voted against such a project because they do not believe there is sufficient data to prove that video surveillance cuts crime "Yet video technology has advanced remarkably to the point that today's systems will allow watchers to zoom in form over a 100 yards away to read and record the print on political flyers being distributed on public sidewalks", (ACLU News 1999). The Mayor of Oakland City Council, in stating his opposition to CCTV, said "Installing a few or a few dozen surveillance cameras will not make us safe. It should also not be forgotten that the intrusive powers of the state are growing with each passing decade". (ACLU News 1999).

Goals of CCTV

I do not mean to imply that surveillance cameras cannot be effective. They can be, but as just one tool among others. Also the type of system required needs to achieve stated outcomes established beforehand.

The goals of a surveillance camera system could be stated thus:

- To reduce crime:
- To reduce the fear of crime;
- To improve public safety;
- To improve property security;
- To create a safe and vibrant place for the leisure and pleasure of the people of, and visitors to, the public space;
- To ensure that persons such as the elderly, the disabled, women and indigenous peoples, can use the public space safely.

With these goals in mind, I offer the example of Castle Hill in Townsville, an isolated spot subjected to vandalism. People in 4-wheel drives hooking their vehicles up to the infrastructure and wrenching them out of their sitings. No matter how Parks Services bolted, cemented, chained, the infrastructure, the vandals managed to destroy them. With half funding from State Government's Security Improvement Project, four, black and white cameras have been positioned on an electricity pole providing a 180 degree view of the car park area, capturing number plates of vehicles as they arrive on the top of the hill. Images are beamed by microwave link directly to a computer situated at Parks Services and stored. Images are archived monthly. No one monitors the cameras "live", but a Parks Services officer visits the top of the hill daily as part of his regular duties, and if vandalism has occurred it is a simple matter of checking the computer, transferring the images to disc and providing that disc to the police.

This was an easy project to evaluate - before, vandalism, after, no vandalism. Castle Hill is a small area, with only one access and exit point for vehicular traffic. The type of camera system installed and the way it is monitored suits the location. Since the cameras have been in situ (10 months), no vandalism whatsoever has occurred on the hill. Because of its isolation it was not a place that warranted regular police patrols. In this case, the camera system has proved eminently suitable and cost effective. The cameras cost \$32,000 to install and with minimal monitoring and maintenance

costs, covered by Townsville City Council. The amount of vandalism and costs to rectify are estimated at around +\$50,000 (the cost of repairing the viewing telescope alone was \$8,000 each time). But add to that the unquantifiable cost benefit of the feeling of safety for those who use the hill daily for recreation and for tourists.

However, The Castle Hill type of camera project would not be effective in a City Mall, or, for example, Townsville's esplanade, "The Strand", where you have large numbers of people daily and nightly accessing very popular public spaces with a lot of access and escape points along their lengths. There a system that is monitored 24 hours becomes necessary. Unfortunately offenders may commit crimes even if there is good surveillance, providing other factors are favourable. In a busy environment offenders become 'less visible' and may adopt a bold approach in the belief that they will not be conspicuous to the casual observer (Horne 1998). Oxford Circus underground station provides an example of this. It is difficult to observe offenders at all times and there are numerous escape routes, such that CCTV has had little effect in reducing theft or assault. Thus "CCTV has been found to be not very useful in large, complex and crowded environments when dealing with shoplifting and pick-pocketing" Horne (1998).

The British experience shows that rather than willy nilly putting up surveillance cameras in a knee jerk reaction to crime and because they are politically popular, it is important to properly determine what the cameras are expected to do. They are not actually that good at catching crime. But if properly publicised, can be good at deterring crime in their immediate vicinity and addressing the fear of crime. However the crime may just continue (or increase) but elsewhere. A report in the Courier Mail in February this year about the Ipswich City Council's plan to use the planning scheme to make existing and future urban developments prevent crime opportunities, stated, "some police investigations have been hampered by criminals who exploit camera black-spots when committing violent and illegal acts" (Keim 2001).

Legal Considerations

Senator Vanstone (2000) in a press release in July 2000 about the use of surveillance cameras at docks to prevent the importation of illicit drugs, points out, "I want to stress that cameras by themselves are not a magic solution and in many cases provide only indications of possible illegal activity. Images on tape are generally effective as evidence only if used in conjunction with other intelligence or detective work". Indeed, "the use of CCTV images as evidence for court cases is open to question despite security industry assertions that such images are straightforward portrayals of 'truth' and a number of wrongful convictions are said to have been obtained through the use of such evidence " (Dee 2000). Courts in the USA states of Hawaii and Indiana have ruled inadmissible videotape evidence obtained without a warrant (ACLU News 1999).

At present there is no privacy legislation in place offering adequate and proper protection from CCTV and thus there is little real protection from the exploitation and misuse of surveillance material. (Dee 2000 & Davies 1997). Evidence of such misuse can be taken from the experience of Bradford, UK, where the local council has had to make its CCTV footage freely available to the public. Ostensibly to be used by members of the public to clear their own names should the need arise, actual footage has been used by a British comedian in his Channel 4 TV show in January 2001. In addition the comedian has set up a competition for the "most creative short film" obtained by the public from CCTV cameras using the new *British Data Protection Act* which became law in March 2000 (KDIS Online 2001).

Auditing and Evaluation

A crime audit of the area to be surveilled as well as an audit of users and why they access an area should be carried out before CCTV is even considered. After the installation, auditing should cover the actions of the operators in the monitoring station (Lawlink 2000), and some of the examples which follow under the paragraph heading, "CCTV enforces morality and is a medium for prejudice and discrimination", underline the importance of such auditing.

Evaluation should take into account possible other factors happening behind the scenes. It is unfortunate that "frequently the before and after period is not mentioned, or is very short, or else crimes are lumped together to hide changes in the rates of different crime" (Horne 1998 p.318). Some other methodological shortcomings are precised below:

"The evaluations have not been carried out by independent researchers; It is recorded crime that is being measured, not necessarily the true rate of crime; No control areas are identified to measure what happens in non-CCTV areas, and where this does occur it is usually measured against the combined crime rates for England and Wales over a different time span; The nature of the attendant publicity is never mentioned; Percentage falls do not show the number of crimes involved, so a 25% fall could merely from 4 to 3; Sometimes data is expressed incorrectly. (Horne 1998 p.318)

and

CCTV is often introduced as part of a package of crime prevention measures which makes it difficult to evaluate which particular bit of the package is delivering successful crime prevention in particular areas (Tilley 1999)

Here is an example of a flawed evaluation resulting in unreliable findings (Tilley 1999). A report, on a CCTV system installed at a British railway station, is only 2 pages long and the section giving results is one paragraph which states in the closing sentence:

"...The cameras have so far resisted early attempts at vandalism, recording clear images of the perpetrators. No crimes have been reported at the station since the installation".

"Sadly" states Professor Tilley of University of Nottingham Trent's Crime and Social Research Unit, this report is "completely authentic, and is just a fairly extreme version of what is found very often in regard to CCTV evaluation...The references to attempted vandalism to the cameras do not square well with those to absence of crime at the station since installation" (Tilley 1999).

Other Responses

It has been argued that other responses and strategies may work equally well if not better and prove more cost effective than CCTV. One of these strategies is CPTED - Crime Prevention Through Environmental Design. As an example, would it not be preferable to install anti-skate devices onto infrastructure in a park and place a skatepark close by, rather than constantly observe through the lenses of a camera that people on skateboards are being a nuisance to other park users?

Youth congregating in a park, laughing and shrieking loudly - and just doing what youth do - can make other park users uncomfortable and fear for their safety, yet the youth are doing nothing wrong. Would it not be more cost effective to install signage reminding everyone to respect other users of the park, and encourage projects that enhance the image of youth in our society, promoting youth inclusion in public space, creating positive images of youth and respect for youth as valuable and wanted members of our community? May sound simplistic but it can be, and has been effective.

One example is the way aerosol art in Townsville is gaining in stature and those that create that art are becoming more and more valued such that they are now actively promoting legal art and assisting with deterring graffiti vandalism. Indeed they are now finding employment from local businesses who are keen to decorate their premises in such a way as to deter graffiti vandalism and aerosol art is the preferred way to achieve this. Some of these aerosol artists had been perpetrators of graffiti vandalism.

Other arguments are that instead of spending large sums on surveillance cameras and people to monitor them, instead employ more project workers and outreach workers to deal with the specific problems, particularly if it is indeed more anti-social behaviours being exhibited in a public space rather than crime. Better funded services and the employment of project and outreach workers to assist the homeless, disaffected, substance abusers etc would form a beneficial part of an overall strategy. A good example of this type of strategy is the Maloolaba Street Angels outreach project (Sunshine Coast Street Angels Association Inc 1998).

CCTV as Part of an Overall Strategy

There is a need to tailor other crime prevention measures to enhance the whole package - there isn't much point watching a group of people drinking themselves to death every night, and offering violence and aggression to passersby, if there aren't the services and programs provided to assist these people. People affected by alcohol or drugs will not be deterred from being in a camera monitored space.

Even with CCTV, the public generally feel happier and safer if they have an authority figure, such as the police they can actually see on the beat and to whom they can talk with face to face when they need to. In relation to Townsville's Strand, the public often call on the Surf Life Savers and Council's security guards to assist them or to report misdemeanours and anti-social acts they have observed/become distressed by. Recently the Police have tasked a regular, bicycle patrol along The Strand, a very popular move. The cameras, in combination with the Police and the development of a Strand Protocol promoting tolerance, respect and inclusion for all, will allow The Strand to remain an attractive and public location for a range of activities and users. The cameras can (and have) been used to back up the police or security guards, who when approaching a "situation" can radio in to the communications room and ask the camera operator to train a particular camera onto the scene and record the occurrence.

It may be that emergency telephones may prove more useful than CCTV in that a person under threat can quickly call for assistance from the police and know that it is coming rather than relying on a camera to be capturing the event on video and that a security guard will alert the police. Or it may be that a person under threat may expect the camera to pick up the threat and alert the monitoring guard when such assurance is not guaranteed.

Community Consultation, Debate and Support

The general public may have unrealistic expectations of what surveillance camera systems can do and as ratepayers, they should be informed of the reality. Also when the pros and cons of CCTV are presented to a community they may realise it isn't really what they want, that is, they may not want to be watched so intensively when out in public or pay so much for questionable results. It appears that support for CCTV by the general public (particularly in Britain) is falling and once issues are raised and discussed within groups the public are less inclined to unconditionally support CCTV. Unfortunately there is still very little debate in the public arena about video surveillance and those who do ask questions are often held up to public ridicule and abuse, accused of being a friend to criminals. (Davies, S 1998).

In light of the fact that CCTV can only be expected to deter certain types of crime and can do little to police some anti-social behaviours (for example, those people affected by drugs and alcohol will not be deterred from being in a camera monitored space), or will be used to police other types of perceived anti-social behaviours that don't fit societal "norms", then the need to consult with a community as to what outcomes are required from a CCTV system, particularly in public space, becomes even more imperative.

One result of CCTV that the community may not condone is a reduction in policing. Another may be the expectation of the public that the cameras will stop crime and anti-social behaviour and when such events occur they will automatically be caught on tape. Disillusionment occurs when it is realised that actually catching a particular event on a camera, particularly in a highly trafficked area, is difficult.

Creation of a CCTV "Oversight" committee made up of representatives of relevant community agencies is recommended. It has been suggested that the capacity to engage with users of space, such as a diversity of young people, and to get their input in a way that enhances their feelings of both autonomy and safety and to allow different spaces to employ different strategies has been given very little attention. Community consultation is time consuming, particularly if one aims to get it right and to get it meaningful. Unfortunately "The speed and magnitude of contemporary urban development makes community input and influence difficult, particularly for those impacted on by the exclusionary tendencies of much urban development" (Crane and Dee, 2001 p.11).

Youth Councils can be and are set up and consulted by local governments however it is important to note that the youth that are engaged through such forums are not necessarily those most impacted by a particular crime prevention or public space development strategy and that frameworks need to be defined "about young people among planners and decision makers which assume their problematic nature, dependence or incompetence rather than their expertise and insight regarding how spaces are configured and managed" (Crane and Dee, 2001 p.16).

Without wishing to harp on about youth access and inclusion in public space issues and the control of youth by CCTV (there is a lot of literature available on this subject, and there are other stakeholders needs, wishes, safety to be taken into consideration), however, it is important to realise that the feelings and connectedness of young people to social and material supports are substantial protective factors in the "prevention of bad things happening" (such as crime, homelessness, mental illness etc). (Crane and Dee, 2001, p.17). Thus young people need to be "viewed as legitimate members of communities and citizens of the state (Crane and Dee, 2001, p.17).

The fact that youth as a microcosm of society, match the views and thoughts of the greater community is evidenced in research undertaken in Brisbane which found, among other things, that young people wanted and supported cameras in certain types of spaces but not others (Heywood & Crane 1998).

Promote Public Safety

CCTV can and does promote public safety. This is also partly because the CCTV increases 'natural surveillance' in that people, who are less fearful of crime because of the cameras, increase their usage of the area (Tilley 1999). This is particularly so at night where those who would not normally go out at night, now feel confident to do so (Horne 1998). However in converse people may feel that if an area needs CCTV it might not be a safe place.

Peter Browning, the project director for the refurbishment of Queen Street Mall, had this to say in support of surveillance cameras (email to City Safe Officer, 12 Feb 2001)

"Basically why do young people like to gather in public spaces like malls and shopping centres. The reasons that emerge include color and excitement, things to look at etc. Also safety. What happens for young people in such spaces is that they are supervised through informal social controls rather than structured activity. They are usually too young to go to pubs and wanting to move away from structured activity such as sport, youth clubs, parents etc. These places provide a perfect opportunity where they can meet others and socialise. So safety is a key. With this in mind cameras play a role that most young people can benefit from and parents know that the space is monitored" (Browning, 2001).

However, Browning adds, "I do believe the situation shifts and different young people do bring their own dynamics. ... a city centre police officer confirms the view that cameras create an interesting dynamic when people know their actions are being monitored by CCTV. The police officer felt that some kids and rival groups chose to stand each other off and compete with each other because they knew if it got out of hand it would only be a short time before the cops came along. To assist in preventing this, and to assist in publicising the fact that the cameras are there and are extremely good at observing the space, Browning suggests that for certain times of the day security cameras could be rigged up to project the image they are recording onto a building within the precinct. "This would make the space more interesting to young people by turning it into an event and communicating more clearly to potential offenders that the space is monitored" (Browning 2001)

More Effective use of Resources

On a more positive note, surveillance camera systems can enable more effective deployment of security guards/police (Horne 1998 p.318 & Tilley 1999), be used to assist with evidence gathering by filming both the offender and potential witnesses. (Horne 1998 p.318) and assist with general town centre management (Horne 1998 p.318).

While CCTV does not prevent public order offences, (which are sometimes influenced or exacerbated by alcohol or drugs etc) use of cameras can result in a faster response thus minimising the seriousness of an offence and increasing the likelihood of an arrest (Horne 1998).

Assurance that Move On Powers will be Administered Appropriately

In respect of the Move On Powers in Queensland, it was brought to my attention recently that such legislation can be used to turn loitering into a crime. However, there is a way that the use of surveillance cameras in a mall precinct area, in particular, can be used to ensure this does not happen. For example, a group of youths are doing what youths do at times, which is to hang about, tussle with each other in fun and make loud noises. This may offend passersby who feel threatened and thus contact the police. Without any evidence to the contrary, only the observations of passersby, the police may move the youths on. But if they took a few moments to view the scene through the cameras they could observe the youths are not a threat to anyone and advise the complainant or complainants that the youths have a right to be in the area, and are not doing any harm. Some times, it is not the minority groups in our society who are the problem. Tolerance and respect for all needs to be promoted.

The Ability of CCTV to Provide the Required Outcomes

It has been argued that the cost of surveillance systems far outweigh their ability to save money, prevent crime and improve public perceptions of safety (Dee 2000). There is the ability of those who operate and monitor "live" CCTV to detect crime before it occurs, to be considered. Do those who commit crimes always act suspiciously beforehand? Generally they do not (Horne 1998). What if vandalism is the main concern in an area? Then you might train your camera on an object that has been continuously vandalised. This is easy for largish objects but if you are talking about a mass of water sprinkler heads in a park or along a promenade, then you could be in trouble. (*I am using the term "vandalism" throughout this paper to refer to acts of wilful or malicious destruction to private and public infrastructure that occur without permission from the owners*).

Let me give an example of my own personal experience of a surveillance camera operation which did not provide the desired outcomes. I was tasked with setting up surveillance in a small suburban park. There was a problem with general vandalism to the play equipment and park furniture but most bothersome was the vandalism to the water tap. I set up a covert, one camera surveillance in a nearby pumping station with the camera view trained close up onto the tap (as one camera could not adequately view the whole of the park). I visited the area daily for four months to change the 24 hour recording tape. If no vandalism had occurred I did not need to examine the tape. Towards the end of the four months I observed graffiti had appeared all over the park furniture and on the pumping station, however not in the area covered by the camera. I examined the tape anyway just in case and did actually see the perpetrator spray a pole. The camera also captured footage of two possible witnesses or at least, people who might be expected to know the vandal. However, after passing the tape on to the police, who were unable to identify anyone on the tape. Not all was lost though, as I was able to establish what a graffiti vandal looks like on the job, and confirm that, in Townsville at least, the main perpetrators of graffiti vandalism were young adult, Caucasian males, often on bikes. That fact at least gave further impetus to setting up the adult offenders graffiti busters group so that young adults convicted of graffiti vandalism could spend some or all of their court directed community work orders painting out graffiti.

Red Light System

One cost effective solution in this respect, to keep the criminals guessing and to take into account the displacement of crime, might be to operate a "red light" camera system whereby one or two cameras are shared around a number of camera housings as need dictates. This is similar to the traffic red light camera system operated by police. The public will not know if a camera is operating or not. (However some enterprising types have worked out how to determine if a camera is operating in the housing or turned to focus on them).

Signage

For CCTV to provide deterrence to crime, signage that it is operating needs to be factored in to the costs. The fact of surveillance cameras being operated should be visibly displayed along with a reminder to the public of their rights and responsibilities in public spaces. CCTV may increase the confidence of the public to report crime and to intervene if they believe the situation is being observed and that police back-up will follow (Tilley 1999). However such risky behaviour is not to be condoned or encouraged and signage clearly stating that the police should be contacted in all instances of crime or violence being witnessed, should be highly visible.

One caution with signage is that it must reflect the fact that cameras *may* be operating, not that they are. A NSW council was successfully sued in the courts because signage gave the impression that 24 hour recordings of events in the area of the cameras was happening but at the time of one particular occurrence the nearest camera was being repaired and the incident was not captured on tape.

Other Cautions

Getting back to the costs, even if crime rates fall subsequent to the conspicuous installation of a camera surveillance system it could be due not to the cameras themselves but to the fact that crime problems are being addressed at all. (Tilley 1999). Also, people may be more cautious in areas covered, for instance where signs tell them they are at risk. CCTV could deter people from using an area because they deem it dangerous if CCTV is needed (Tilley 1999), thus less people equates to less crime. An increase in crime could actually result because public confidence in the CCTV system may lead to people lessening their vigilance in the area. There could also be an erosion of civil liberties in that operators of the CCTV might 'look for' incidents to justify the cost of the system, and hence target some groups. (Horne 1998)

CCTV Enforces morality and is a Medium for Prejudice and Discrimination

CCTV can be used to enforce morality and be a medium for the expression of prejudice and discrimination by some CCTV system operators who have been seen to monitor cameras on the basis of narrow and stereotypical assumptions about acceptable people and behaviours. This was demonstrated in a 1998 study in the UK (Dee 2000 & Davies 1997 and Norris & Armstrong 1998) which set out to discover who it is that is watched by CCTV. Researchers shadowed camera operators in three major areas covered by 148 cameras. 888 targeted surveillances resulted in 12 arrests. The research also found that people are targeted and selected by surveillance cameras according to the prejudices and assumptions of the CCTV operators. (Dee 2000). They found:

"The young, the male and the black were systematically and disproportionately targeted, not because of their involvement in crime or disorder, but for 'no obvious reason" (Norris & Armstrong 1998).

Also targeted were young people described as "scrotes", the homeless, and "anyone who directly challenged...The right of the cameras to monitor them..." (Dee 2000 & Norris & Armstrong 1998).

- 1 in 10 women were targeted for entirely "voyeuristic" reasons by the male operators, and:
- 40% of people were targeted for "no obvious reason", mainly "on the basis of belonging to a particular or sub-cultural group". "Black people were between one-and-a-half and two-and-a-half times more likely to be surveilled than one would expect from their presence in the population".
- 30% of targeted surveillances on black people were protracted, lasting 9 minutes or more, compared with just 10% on white people.
- People were selected primarily on the basis of "the operators negative attitudes towards male youth in general and black youth in particular. If a youth was categorised as a "scrote" they were subject to prolonged and intensive surveillance".
- Those deemed to be "out of time and out of place" with the commercial image of city centre streets were subjected to prolonged surveillance. "Thus drunks, beggars, the homeless, street traders were all subject to intense surveillance.

Finally, anyone who directly challenged, by gesture or deed, the right of the cameras to monitor them was especially subject to targeting" (Dee 2000 & Norris & Armstrong 1998).

Only people wearing "uniforms" were completely exempt from targeting. The 888 monitored "targeting" led to 45 "deployments" of police and 12 arrests - 7 related to fighting and 3 to theft. This "low level of deployment was accounted for by 2 factors: that CCTV operators could not themselves intervene nor could they demand intervention by the police. This was compounded by the fact that suspicion rarely had a concrete, objective basis which made it difficult to justify to a third party such as a police officer why intervention was warranted" (Norris & Armstrong 1998).

And so the report concludes:

"The gaze of the cameras does not fall equally on all users of the street but on those who are stereotypically predefined as potentially deviant, or through appearance and demeanour, are singled out by operators as unrespectable. In this way youth, particularly those already socially and economically marginal, may be subject to even greater levels of authoritative intervention and official stigmatisation, and rather than contributing to social justice through the reduction of victimisation, CCTV will merely become a tool of injustice through the amplification of differential and discriminatory policing". (Norris & Armstrong 1998)

With the imminent development of face recognition cameras and databases of known offenders to which police can be alerted by cameras, the questions need to be asked: what groups are acceptable and which unacceptable? Football hooligan databases, bank robber databases, suspected illegal immigrant databases might be "acceptable" but are databases on animal rights activists and environmental campaigners? (Dee 2000).

A Snapshot of a Control Room- as Experienced by a News Reporter in England in 1995

(Malik 1995, Independent News) gives a good example of a CCTV system set up for the wrong reasons and providing meaningless results. Fifteen cameras were installed in West End, Newcastle Upon Tyne, "one of the most socially deprived areas in Britain. The scheme is controlled from the police station by 4 civilian operators who monitor the cameras 24 hours a day". The cameras can, and are, used to even look through uncovered windows at times and at the whim of the operators. One of the operators is a Youth Training Scheme volunteer and usually sits on reception so whether she has appropriate training to be operating the cameras is questionable. She certainly has her fair share of prejudice and is quoted as saying "They're all...round here – petty thieves, vandals, druggies...there's not much you can do but keep any eye on them.

The cameras have been completely vandalproofed, sitting on top of a 20ft mast and housed within bullet-proof glass. A vibrating hoop stops anyone putting a ladder up to the mast. Metal spikes run the length of the mast and it is surrounded by anti-ram bollards running 15ft into the ground and designed to withstand the impact of a three-ton van travelling at 60mph. (KDIS ONLINE 1999 & Malik 1995, Independent News). In other words, the area looks more like a battle zone than an English suburban, residential street.

Consider the comments made by the local councillor behind the surveillance scheme. He states he would not like the camera outside his front door and, in fact, he doesn't have one. He lives in a sought-after area to the north of the city centre. But he admits that much of the talk about crime in the West End where the cameras are, is exaggerated and "people who live there are overwhelmed by a fear of crime, but it is a fear that is not really substantiated by the facts". In fact there are far more burglaries in his own suburb than in the camera surveilled suburb. When asked why then the cameras were not in his suburb he answered "It's to do with the kind of community you have there...you have a problem of loose families. Single mothers, men who drift around. There is a dislocation from normal expectations, from normal manners, if you like, a breakdown of basic rules and social codes". When asked how a camera surveillance system would help solve problems of

family breakdown or the disintegration of traditional and social values he replied "It's a superficial solution. What we need are jobs, housing, social projects. We've started some of these in the area. What we are dealing with is people who have been discarded." and he goes on: "What do you do with working-class men who no longer have any possibility of a job and no means to earn self-respect? They have lost any sense that there are social boundaries. They are too poor, and too poorly educated, to take collective responsibility for their own problems. To some extent, I suppose, the cameras are a form of containment".

No longer will we be presumed innocent until proven guilty but rather vice versa.

Now this may not concern some people who feel if you do nothing wrong you have nothing to worry about. But who decides what is "wrong"?

The assumption that all people in a country understand the rules, whether written laws, or taught behavioural norms of that society, can lead to a problem for visitors to a country if they do not understand and conform to those rules. Add to that the pushing of those in our society unable to control all their actions - such as the mentally ill - back out into society to fend for themselves and to remember to take all their medications, and one can see that care really has to be taken to ensure people do not become victims of abuse by camera control.

Guidelines

The New South Wales Government in 2000 released guidelines to promote an integrated, across government approach to the use of closed circuit television in public places as a crime prevention tools. The guidelines also provide guidance in protecting the rights and responsibilities of the ordinary citizens. Though mainly for use in NSW with different privacy laws to other states, nevertheless it is a useful document that can be adapted to suit.

The guidelines are principally aimed at local councils "as the most appropriate owners of CCTV schemes in public places". This is because "Local councils are democratically organised, are close and accountable to local communities, and generally have the capacity to co-ordinate local activities in crime prevention and the promotion of community safety." However there is a caution "It must be recognised that ownership brings with it accountability, responsibility for securing funding, responsibility to consult with and inform the community as interested parties, and responsibility for design, management, running costs, evaluation and audit activities" (Lawlink 2000).

The guidelines provide, among other things:

- the steps which local councils, transport authorities and other organisations should take when considering establishing and implementing a CCTV scheme
- the issues relating to privacy and liability which need to be considered
- a list of other sources of information or assistance which can supplement the Guidelines
- some information on the technical factors which need to be considered in establishing a CCTV scheme
- some information on Code of Practice, Protocols and Standard Operating Procedures which should apply to operating schemes. (Lawlink 2000)

In addition the Guidelines stress that CCTV can be effective in reducing or preventing crime if it is part of a broader crime prevention and community safety strategy. CCTV should not be implemented as the only means of addressing crime in public places.

Also, that

"Continuing community support for the operation of CCTV schemes will depend upon the confidence people have that the scheme is providing the anticipated benefits. It is therefore essential that:

- the recording and retention of images should be undertaken fairly and lawfully;
- the purpose for which the information is being obtained is know
- the information not be used for any other purpose than that proclaimed
- people be aware that they may be subject to CCTV surveillance
- the CCTV surveillance should only be used to identify crimes occurring within the CCTV area;
- the CCTV surveillance should never be used to monitor or track individuals who have not obviously been involved in a crime;
- the CCTV surveillance should not be used for general intelligence gathering; and
- the owners of the scheme are known and accountable for its operation."

(Lawlink 2000)

Accountability, Compliance and Complaints Procedures

Operators of CCTV need to be adequately and appropriately trained in youth issues and issues that affect a range of community groups and a set of protocols for the operation of a CCTV system needs to be set in place. All operators should be made aware, as a matter of course, that their camera operation may be audited and that they may be called upon to satisfy their interest in a member of the public. (Lawlink 2000) Also staff of the control centre should sign a form noting their compliance.

A grievance and complaints procedure needs to be implemented so that the community can have faith in the knowledge that what is captured on the cameras is safe and will only be viewed by "legitimate" authority". (Lawlink 2000).

Local councils must regularly audit compliance with guidelines and all logs of Control Centre activity should be regularly scrutinised by the owners of the scheme. In addition Local councils should arrange for an independent audit to be carried out. (Lawlink 2000).

In Summary

It has been argued by many concerned analysts that surveillance cameras do not reduce crime - "CCTV systems have little or no deterrent effect on criminal activity, often malfunction and are trained away from where incidents occur, lull people into a false sense of security and contribute to the commission of crime through displacement onto non-surveilled areas and crimes against camera installations themselves. (Dee 2000 & Davies 1997)

However, despite the cautions listed above, which do need due consideration and should be catered for in the overall strategy, I believe CCTV does have a role to play in preventing crime but only as one part of total strategy to promote safety and access to all public areas by all groups in a community.

Some analysts believe that "the new technologies of mass surveillance could be harnessed to encourage participation rather than exclusion, strengthen personhood rather than diminish it, and be used for benevolent rather than malign purposes" and that the way to achieve this is to establish proper systems of democratic accountability, control and oversight over the implementation and use of these technologies. (Norris & Armstrong 1999).

As stated earlier in this paper - local government, guided by State Government and appropriate privacy laws, and in consultation with community groups and agencies under the umbrella of a CCTV safety and security committee, is the proper agency to implement and manage security camera schemes.

And finally, open and healthy debate about CCTV should be encouraged. In a multicultural society local councils are tasked with upholding and protecting the rights of all groups in their communities. Public spaces should not be allowed to become no-go areas for the aggressive and criminally minded few. However the homeless, disaffected, poor, unemployed, the young, the ill, the disabled, the ethnic minorities etc should be protected from a control that seeks to keep them out of, rather than include them in, public space.

It may be a fine line to draw, but so long as the police and all in authority keep well to the first and foremost of their minds that any and all public spaces are for any and all of the public then, I believe, with that focus, coupled with the promotion of inclusivity for all, tolerance and respect, that there is indeed a role for CCTV as part of a total package to prevent crime and to deter some antisocial behaviours.

Acknowledgments

Thanks to the following for their assistance, thoughts and ideas in shaping this paper.

Nick Nash, Senior Project Officer (City Safety and Crime Prevention), Adelaide City Council Phil Crane, School of Human Services, Queensland University of Technology Peter Browning, Queensland Health Allan Carter, Manager, Youth Justice Service, Townsville/Thuringowa region.

Mike Dee, Visiting Academic, Queensland University of Technology Robyn Morgan, Coordinator, Thuringowa Crime Prevention Partnership

Refernces

ACLU News 1999	Second Attempt Fails To Install Spy Cams On Oakland Streets. ALCU-NC News. Full article available from the internet at: http://www.privacy.org/pi/issues/cctv/ or contact American Civil Liberties Union of Northern California, 1663 Mission Street, Suite 460, San Francisco, CA 94103	
Baldry, P & Painter, K 1998	Watching Them Watching Us. The Surveyor 30/04/98	
Berry, G & Carter, M (1992)	Assessing Crime Prevention Initiatives: The First Steps. Crime Prevention Unit Paper 31. London: Home Office. (Available from the Internet - Home Office website).	
Brown, B. (1995) <i>Closed Circuit Television In Town Centres: Three Case Studies</i> . Crime Prevention and Detection Series Paper 73. London: Home Office.		
Browning, P. (2001)	Surveillance Cameras In Public Places - Refurbishment of Queens St Mall. 2 x e-mails to Townsville City Council City Safe Officer, 12 February 2001.	
Crane P & Dee M (2001)	Young People, Public Space & NEW URBANISM. in Youth Studies Australia, v20, n.1, p.11-18.	
Davies, S (1997)	10 Reasons why public CCTV schemes are bad - KDIS Online www.brs.legend.org.uk	
Davies, S.G. (1998)	<i>The Case Against: CCTV Should Not Be Introduced.</i> International Journal of Risk, Security and Crime Prevention Vol. 1. No. 4 PP 327-331	
Dee, M. (2000)	The Use Of CCTV To Police Young People In Public Spaces - A Case Of Big Brother Or Big Friend? Paper presented at the 27th International Conference on Making Cities Livable, Vienna, Austria. De Montfrot University, Youth and Community Division, Scraptoft Campus, Leicester, LE7 9SU, U.K. (Available on the Internet from Yspace: http://www.yspace.net/)	
Ditton, J. (1999)	The Effect Of Closed Circuit Television On Recorded Crime Rates And Public Concern About Crime Rates In Glasgow. Scottish Office/HMSO	
Egginton, A. & Kaighin, J. 2000	Viva bris-Vegas! Public space project, proceedings of the First International Youth Service Models Conference, Adelaide.	
French, P. (1995) <i>The Opinions Of The Public And Offenders Concerning The Use Of Closed Circuit Television Surveillance In Public Places.</i> MA thesis (unpublished). University of Exeter		
French, P. (1998) Video Nation. Police Review 03/07/98		
Geraghty, T. (1998)	The Irish War. Harper Collins, London.	
Heywood, P & Crane, P (1998)	Out And About: In Or Out? Better Outcomes From Young People's Use Of Public And Community Space In The City Of Brisbane – Vols 1-3. Brisbane City Council, GPO Box 1434, Brisbane 4001, Qld, Australia. ISBN 1-876091-28-2	
Home Office (1994)	CCTV: Looking Out For You. London: Home Office, pp12.	
Horne, C.J. (1998)	<i>The Case For: CCTV Should Be Introduced.</i> International Journal of Risk, Security and Crime Prevention Vol 1, No. 4 pp.317-326	
KDIS Online (1999)	Big Brother Targets The Poor. www.brs.legend.org.uk Dec 1999	
KDIS Online (2001)	Now public can obtain Council's spy-camera footage. www.brs.legend.org.uk Feb 2001	
Keim, P. (2001)	Building Code To Aid Fight On Crime. Courier Mail 21 Feb, 2001 (Australia)	

Lawlink NSW (2000)	CCTV Guidelines. http://www.lawlink.nsw.gov.au/cpd.nsf/pages/cctv_intro
Ludlow, M (2001)	Freedom Curtailed In Fight Against Crime. Report in Courier Mail, 7.05.01
Malik, K (1995) If You're Poor, They'll Keep An Eye On You Independent on Sunday 3/9/1995 (available from the internet, KDIS Online: http://www.brs.legend.org.uk) Copyright (C) Newspaper Publishing Plc	
Norris, C. & Armstrong, G. (1998)	The Unforgiving Eye: CCTV Surveillance In Public Space. Copies of the report are available from Dr Clive Norris, Centre for Criminology and Criminal Justice, University of Hull, Hull HU6 7RX. Tel: 01482 465817/465779
Norris, C. & Armstrong, G. (1999)	The Maximum Surveillance Society: The Rise Of CCTV. Berg. Oxford and New York.
Pease, K. (1994)	Crime Prevention in Maguire, M., Morgan, R. and Reiner, R. (eds) The Oxford Handbook of Criminology. New York: Oxford University Press.
Short, E. & Ditton, J. (1995)	Does CCTV Affect Crime? CCTV Today, Vol.2, pp 10-12.
Sunshine Coast Street Angels Association Inc (August 2000)	STREET ANGELS – Briefing paper for Government, Media, Businesses, Community Groups, Sponsors, Donors, Volunteers and Interested Individuals, August 2000 – and Safety Net/outreach Service Strategy. Contact: streetangels@flexinet.com.au Ph: Shay Zulpo 5444 4855
Tilley, N. (1999)	Whys And Wherefores In Evaluating The Effectiveness Of CCTV. International Journal of Risk, Security and Crime Prevention, Vol 2 No. 3 pp.175-185
Vanstone, A. (2000) Ministe	Surveillance Cameras To Boost Australia's Fight Against illicit Drugs. Media Release, er for Justice & Customs, Australian Federal Government. July 2000 (Available on the Internet: http://www.ag.gov.au/aghome/agnews/2000newsjus/105_00htm .