Technopoly and Policing Practice: Critical reflections on innovations in police control technology

James Sheptycki
Department of Social Science, York University, Toronto, Canada

Abstract
The paper defines Technopoly as ‘totalitarian technocracy’ in which all forms of social, cultural and economic life are brought under the aegis of technological governance. Policing here is understood in terms of a transnational assemblage of institutions and police practice is marked by two defining features: the capacity to undertake surveillance and use-of-force in the service of governance. This paper looks at innovations in policing technology, regarding them as symptoms of broader historical shifts in global culture, society and politics. The essay points to worrying questions concerning the democratic basis of techno-policing. The discussion emphasizes the continuing need to normatively ground policing practice in concerns about social justice.

Keywords: Predictive Policing; surveillance; use-of-force; police militarization; social justice

Introduction
Although it is difficult to agree on what to call the period we are living through, it seems inescapable that it is one of revolutionary social transformation. Perhaps it is due to the revolutionary nature of our contemporary times that we cannot agree how to label them. The ‘global networked society’ and the onset of ‘liquid modernity’ represent two powerful ways of conceptualizing the depth of change that emphasize the cultural consequences of the shifting morphology of the state and capitalist relations in a transnational world (Bauman, 2000; Castells, 2011; Sennett, 2006; Sklair, 2000). The bewildering uncertainty of the age raises unavoidable questions for would-be democratic police policy-makers (Brodeur, 2010; Ericson, 2007; Manning, 2010). Democratic policing is more paradoxical than authoritarian policing because it seeks to maintain the conditions of democracy with non-democratic means (Mazower, 1997). Authoritarian policing imposes authority on the basis that authority is there to be imposed (Bloom, 2016). Assuming that the rapid pace of technological innovation and change that is on-going within policing organizations across Europe and around the world does not, however inadvertently, lead towards authoritarian ends requires a fundamental commitment to social justice (Goldsmith & Sheptycki, 2007; Wood & Dupont, 2006).

These ideas have been repeatedly expressed by David Bayley over many years – in sum: that police professionalism, absent democratic roots, will not achieve lasting social justice no matter how efficient and effective the technologies of security-control appear to be (Bayley, 1990; Bayley, 2006; Bayley and Stenning, 2016). All too often police technical success undermines the dem-
The value of social justice is not.

values of efficiency, precision and objectivity are encoded

cations for policing (Sheptycki, 2017a; 2017b). The val-

Taylor in an earlier times and all of this has direct impli-

ciples of scientific management espoused by Fredrick

uperior to lax, ambiguous and complex human think-

aphysical status”. The belief that machine-thinking is

Masters of Technopoly “elevate information to a met-

influence over human affairs. In Postman’s vision, the

ing and judgment has much in common with the prin-

satisfactions in technology and takes its orders from

sers. Police control technology is central to a growing

The emergence of predictive analytics and a whole

range of other innovations in law enforcement should

be understood in this broader context. We need to

think more critically about the technological transfor-

mations that are occurring. It is generally agreed that,

in our present period, technological change has come

at a faster pace than at any time in recorded history and

we are all strongly encouraged to welcome the oppor-

tunities to innovate. But technological transformation

has a price that is not borne equally across society. Not

everybody benefits and some benefit more than oth-

ers. Police control technology is central to a growing

discomfort that police efficiency metrics disguise.

These complex issues and choices are greatly simpli-

fied by looking at innovations in police technology

through the lens of Neil Postman’s prescient 1992 book

Technopoly; the surrender of culture to technology (Post-

man, 1992). Postman argued the purveyors of tech-

nical innovation have been debased. In his words, our

culture “seeks its authorization in technology, finds its

satisfactions in technology and takes its orders from

technology” (p. 71-72). It suffers from a surplus of in-

formation generated by that very technology which, in

turn and paradoxically, requires new technological

tools in order to cope. Technological fascination has

become the source of direction and purpose for soci-

ey and the individuals that comprise it. Extrapolating

Postman’s view, the information technologies that we

play and work with every day – our smartphones and

-tablets – are the nearly perfect basis for technological

totalitarianism.

Computerized information processing establishes sov-

ereignty over all areas of human experience because

technology ‘thinks’ better, faster and more exactly

than humans can. It follows that some people have a

‘knowledge monopoly’ in these domains, and the

great gurus of Technopoly – Bill Gates, Mark Zucker-

berg, Elon Musk, and the rest of them – have argua-

bly been granted undeserved prestige, authority, and

fluence over human affairs. In Postman’s vision, the

Masters of Technopoly “elevate information to a met-

aphysical status”. The belief that machine-thinking is

superior to lax, ambiguous and complex human think-

ing and judgment has much in common with the prin-

ciples of scientific management espoused by Fredrick

Taylor in an earlier times and all of this has direct impli-

cations for policing (Sheptycki, 2017a; 2017b). The val-

ues of efficiency, precision and objectivity are encoded

into machine-thinking. The value of social justice is not.

Innovations in policing - an example and

some considerations

The new technologies of security-control get between

the police and the public. This is not properly recog-

nized. Contemporary security control is mediated by

a host of technological wonders: Big Data, predictive

analytics, and a myriad of surveillance technologies

can be cited here. Purveyors of the new technolo-

gies of social control seductively promise an elevated

ability to achieve social order through more effective

law enforcement (Sanders & Sheptycki, 2017). With

that view, the problem becomes one of ensuring that

police leadership can successfully implement techno-

logical innovations, following which presumably the

functional aim of enforcing social order is supposedly

assuredly achieved. Let’s consider that critically.

Since its inception in the late 19th and early 20th centu-

ry, professional policing has been at the cutting edge

of technological change. Historically, the adoption of

new communications technologies especially has af-

ected the organization of policing. Most people in the

police profession (and certainly the academics who

study them) are aware that in the early-20th century

urban police used centralized police ‘call box systems’
to coordinate walking police patrol. This eventually

gave away to sectorial and functional differentiation

within police organizations with the advent of two-

way mobile radio systems. During the mid to late 20th

century, virtually all urban police agencies were heavily

dependent on mobile radio communications and tele-

phones with fixed landlines to coordinate field opera-

tions. By the end of the century, with the invention of

mobile telephones and mobile data terminals, police

organization was again transformed by the possibility
of direct point-to-point communication. There can be little doubt that for the last century, police organization has been in a more-or-less permanent state of technological revolution (Dupont, 2001; Manning, 2001; Nogala, 1995; Sheptycki, 2013).

The move to radio-dispatched police patrol cars in the middle years of the 20th century changed the organizational practice of policing in fundamental ways, but not all were necessarily positive. Here it is instructive to take note of Mollie Weatheritt’s long ago told ‘cautionary tale’ about the unintended consequences of innovations in policing (Weatheritt, 1986). As she told the story, in the late 1950s traditional policing in the British Isles was largely achieved through a broadly dispersed system of police patrol supervised through a myriad number of highly localized constabularies. In larger centers this was supplemented by a ‘fixed point’ system of police call-boxes which allowed police agencies in larger geographical locales to provide some level of supervision and communication to officers working their beats.

Weatheritt documented a number of police ‘experiments’ productive of a consensus that radio-dispatched car patrol was more efficient and effective than the previous model, but in so doing she argued that these demonstration projects were not true experiments. Rather, they were ‘foregone conclusion research’ designed to arrive at the results that everybody wanted, which in this case was to demonstrate the speed and efficiency of radio-dispatched patrol cars. Years later, Weatheritt observed, it was subsequently realized that putting police in cars created a barrier between police and public. Simplifying for the sake of brevity, when police patrolled their beats on foot, there were a variety of opportunities for ‘non-adversarial contact’ between police and public, but by putting police officers in cars, mobilized for fast response to radio calls, these opportunities for non-adversarial contact diminished and what remained were the more complex, conflictual and often adversarial kinds of police-citizen interaction. At the time, nobody envisaged that putting police in cars would decrease the number of non-adversarial contacts in proportion to other kinds of police-citizen interaction and, in the process, change the cultural expectations of both police and citizens eventually contributing to the erosion of police legitimacy. But that is what happened.

This cautionary tale was expounded in the mid-1980s, when academic research on policing was beginning to seriously develop. Many of those involved at the time took the cue to embark on research concerning the effectiveness of police foot patrol and other tactical innovations, and the ‘community policing’ and ‘problem-oriented’ paradigms blossomed as police professionals and professional police researchers sought to develop and refine democratically appropriate approaches to policing innovation (Brodeur, 1998). Today the field is dominated by so-called evidence-based police research and policy, but this viewpoint largely fails to comprehend the social and political background against which police experimentation and innovation occurs. Police research of this kind creates the appearance of success using police-control metrics rather than subjecting policing activity to critical evaluation in terms of social well-being (Manning, 2010, pp. 101-106). Institutionally speaking, the police manager is subject to pressures of many kinds and often struggles to achieve diametrically opposed expectations. It is no small wonder that they are indisposed to research that might attract criticism. It is safer to police by numbers and targets. Given the constraints, the research that gets done is usually achievement-oriented and, while the problems measured are subsequently seen to be solved, the symptoms those problems express continue and may even become worse (Bowling, 2011).

At a general level, Weatheritt’s cautionary tale reminds us that modern and technologically innovative changes in policing need to be gauged against normative criteria and not simply in terms of efficiency gains defined by the police organization. The distinction between adversarial and non-adversarial contact between police, and the ratio between them, presents a metric of a different kind which signals something about the quality of police-community relations. In general, that shifting quality has to do with an often ill-recognized yet fundamental paradox of democratic policing; that it aims to serve and to maintain the civil conditions conducive to democracy by recourse to non-democratic means. Management by numbers does not usually recognize this paradox and the degree of any consequent failure of democratic police legitimacy can be reliably gauged by the number and intensity of public accusations regarding police institutional hypocrisy.
**Techno-policing in the 21st Century**

‘Predictive analytics’ has become the new magic wand of technological policing. That is to say, ‘predictive policing’ is another one of those technological innovations that seems to be a foregone conclusion. It promises something short of total information awareness. It promises to orchestrate policing on the basis of superior knowledge of the situation. It promises to be cost effective. Sometime in the not-too-distant future, public policing will be more fully automated, focused through the technological wizardry of mass surveillance, co-ordinated by centralized command-and-control systems and more demonstrably efficient than ever (Caplan, et al, 2011; McCue, 2014; Perry et al, 2013). This model is being heavily promoted and not only because of its presumed benefits in terms of increased social control, but also especially because of costs savings. According to *The Police Chief*, a magazine for law enforcement managers in the United States:

> ‘The strategic foundation for predictive policing is clear enough. A smaller, more agile force can effectively counter larger numbers by leveraging intelligence, including the element of surprise. A force that uses intelligence to guide information-based operations can penetrate an adversary’s decision cycle and change outcomes, even in the face of a larger opposing force. This strategy underscores the idea that more is not necessarily better, a concept increasingly important today with growing budget pressures and limited resources’ (Beck & McCue, 2009).

Note the militaristic language. Police departments across North America are increasingly adopting the organizational principles of ‘real time intelligence operations’ co-ordinated through centralized fusion hubs. These organizational principles, and all of the technology that goes with it, have been transplanted directly from the US military (Harwood & Stanley, 2016). That all of it can be bought, while saving the tax-payer’s money, seems a good bargain on its own terms. But again, what of social justice? The claim that ‘reality is wholly knowable, that knowledge necessarily liberates, and that absolute knowledge liberates absolutely’ is as dubious as it is hubristic (Berlin, 1969, p. 80). Predictive policing is one of a plethora of Technopoly products being sold on the basis that police knowledge systems – based on stochastic calculation and dubious data – produce superior knowledge which can be strategically translated into operationally effective actions, like ‘crackdowns’ (Sherman, 1990; Koper & Mayo-Wilson, 2006). But only because the enforcement perspective is increasingly that of an occupying army trying to control ‘hostiles’ in ‘hostile territory’ and because the metrics used to evaluate success are based on those assumptions (Fassin, 2011). Increasingly in the democratic countries of the West, technologically enhanced policing does not look like or feel like policing by consent of the governed and it seems very far away from concerns about social justice.1

One way to illustrate this point further is to shift attention away from the magic of contemporary police surveillance and communications technology and consider another manifestation of the police technopoly-mindset. Policing is not only about surveillance since it can also involve use-of-force, that is why the increasing surveillance power of police is so contentious, because it is connected to physically coercive means. No other issue in policing is more inflammatory than police use-of-force which – in the United States especially – is frequently increasingly thought of in terms of ‘police brutality’. The technological solutions found in police use-of-force training are interesting and revealing. For example, there is the Shockknife an innovative, patented and trademarked device for police edged-weapons training.2 Quoting from the company website, the Shockknife is the “only training knife in the world that is capable of inducing FEAR” (Note that the word ‘Fear’ is in all-capital letters). The logic is that police need to train in order to cope safely with people who are holding knives or other edged weapons. Evidently, the old-fashioned way of undertaking such training using rubber knives is insufficient because it is not ‘realistic’ enough. According to the webpage, the Shockknife will “revolutionize the edged weapon training industry with the only training knife that induces the necessary stress required for realistic edged weapon training.” To quote further, “Shockknife is designed to improve tactical knife defense training in law enforcement, military and corrections markets around the world.”

---

1 I am aware that the terminology of ‘policing by consent’ is not in use everywhere around the world. I am also aware that it is very difficult to define what we mean by democratic policing. The extent to which the general public understands and endorses what police do, one can speak about policing by consent. Indeed, it strikes me as the very opposite of democratic policing when an uncomprehending public experiences a police presence that they do not endorse. Lack of consent is an indicator of un-democratic policing.

2 http://www.shockknife.com/about.php - last accessed Feb. 17, 2018
The only reason this even makes sense in the context of policing is because, especially in the United States, people have been encouraged to think of it in terms of the ‘war on crime’ and the ‘war on drugs’ (Kraska, 2001; Parenti, 2003). If its war out there, then the training should be stressful, painful and hurtful. How else will the troops get desensitized? This is a new piece of equipment found increasingly in police training academies across North America and it needs to be read as another symptom of something very wrong with the way technological innovations are being used to shape policing transformation.

The emerging techno-policing of the 21st century looks to bring together ‘ambient surveillance’ (Stalcup & Hahn, 2016) backed up by police agents holding coercive means, all coordinated by centralized command-and-control systems, and it aims to be more demonstrably economic, efficient and effective than ever. It will mark another intensification of the wars on crime of the past, and the uncertainty and anxiety it provokes will further fuel the mistaken belief that “that more will work where less has not” (Ericson, 2007, p. 12).

Technopoly thinking in policing is currently, and very evidently, antithetical to the democratic ideals captured in the terminology of community and problem oriented policing that were de rigueur in professional policing circles not so very long ago. Need it be?

**Conclusion**

This short essay began by observing that contemporary innovations and transformations in policing and its organization are manifestations of broader historical shifts in global culture, society and politics. These complex transformations coincide with technological changes which police policy-makers at every level of governance have historically taken enthusiastic part in. Police leaders are Technopolists par excellence. This paper began by defining Technopoly as ‘totalitarian technocracy’ in which all forms of social, cultural and economic life are brought under the aegis of technological governance. Policing has become a transnational assemblage of governance institutions that are difficult to empirically map (Bowling & Sheptycki, 2012). Certainly all are marked in one way or another by the two defining features of police practice: the capacity to undertake surveillance and the use-of-force. If the words ‘totalitarian technocracy’ are passed off as a mere provocation, the expressed centrality and importance of social justice in policing is being denied.

The drift towards militaristic and authoritarian style policing in the liberal democratic countries of the West has almost the feel of a forgone conclusion. The Technopolists of law enforcement are coming closer to achieving, not without challenge, a monopoly on authoritative knowledge about the science of social ordering (Hope, 2009). In matters concerning peace, order and good governance, techno-policing does not possess the only relevant scale of value. The ‘human security’ that ‘policing with intelligence’ seeks to provide can, for example, be judged in terms of ‘freedom from fear and from want’ (Sheptycki, 2008). Prior to the arrival of the millennium, Neil Postman presciently observed a much wider phenomenon of ongoing and breakneck technological transformation of culture. Much like the French Revolution, say, or the Industrial Revolution, our current historical period has the feeling of a natural cataclysm which affects everyone whether they welcome it or not. From the point of view of the individual history does seem ‘inevitable’ in that we are all born into a stream of change which carries us along. Between a past that none can alter and an uncertain future there is the present fleeting moment in which one is free to act in ways that may affect future history. We might not be able to precisely steer that trajectory, but we can try to nudge it in the right direction. The task is difficult and sometimes it feels to me like trying to change the drift of an iceberg by pushing it with a toothpick.
References