

Introduction

ICT, Public Administration and Democracy in the Coming Decade

Albert Meijer^{a,*}, Frank Bannister^b and Marcel Thaens^c

^a*School of Governance, Utrecht University, The Netherlands*

^b*Department of Statistics, Trinity College, Ireland*

^c*Department of Public Administration, Erasmus University Rotterdam, The Netherlands*

1. Studying the future: A problematic but important pursuit

Yogi Berra was famous both as a baseball player and as a source of enigmatic epigrams which often carried a subtle truth. One of his most famous observations was that “the future ain’t what it used to be”. Translated, what Berra was saying was that our view of the future changes all the time and yesterday’s forecasts are often today’s source of wry amusement. For this reason amongst others, many academics believe that serious scholars should never attempt to write about the future or at least not beyond the short term. Longer term, events are all too likely to prove them wrong. The future is the domain of fortune tellers, tarot readers, astrologists and other non-scientific producers of “knowledge”; serious researchers should stay away from it. No empirical data about the future can be gathered and, as a consequence, it can never be investigated. Science should be about presenting adequate accounts of external reality on the basis of systematic empirical research.

On the other hand academic scholarship is about theory and good theory is, *inter alia*, about prediction. And there is a great need for knowledge about the future. Knowledge about the future is important to strategists, technology developers, managers, politicians, policy-makers and ordinary citizens as a basis for informed decision making. In the domain of public administration, knowledge about the future is not only needed for policy-making, but also for an informed public debate about the desirability of certain trends and the need for a public response. Knowledge about global warming stands out as a type of knowledge that is desperately needed to guide our behavior and decisions. We need information about the dilemmas we may be facing in the future in order to make informed choices today about the development and use of new technologies.

One problem for social scientists in general and for those that study new technologies in particular is that we are shooting at a moving target. We can study the present and the past, but when it comes to technology a question arises as to how reliable knowledge is when it comes to predicting the future.

*Corresponding author: Albert Meijer, E-mail: A.J.Meijer@uu.nl.

Scientists seldom re-evaluate their earlier work but in 2012 academics were invited to evaluate their contributions to the 1998 Handbook *Public Administration in an Information Age* [7,8]. In their chapter with the meaningful title “Too Early to Say” King and Kraemer [4] conclude that ‘Perhaps by 2026 the predictions made in the 1998 book will have come to pass. Yet that seems rather unlikely given that those predictions do not look very prescient as of 2012’. An important explanation for this conclusion is the fact that there have been surprising technological developments, but also major surprises in society such as the terrorist attacks in 2001 and the economic recession in 2008). King and Kraemer use these surprises to illustrate that socio-technical change occurs in complicated ecologies that seldom allow for simple prediction.

Even if we leave the impact of changes in society out and focus only on ICT alone, predictions about the future are still very difficult. The speed of information and communication technological developments is sometimes simply too high. Analyses of technologies such as telefax, Minitel and mainframe computing, all technologies that had impacts on the public sector in their day, were soon made redundant by new developments in computing and communications. This may have been good research at the time, but its conclusions were rapidly overtaken by events. Unsurprisingly therefore, academics and practitioners are seldom interested in research into old technologies; they want knowledge about the likely impacts of the emerging technologies of their day. Currently this includes social media, Internet 3.0, government apps, smart cities and so on. The speed of technological development and the need to understand its impact is a constant threat to the relevance of our research [5]. Some of the articles in this special issue go one step further, not just discarding the past, but looking beyond the present and the immediate future at possibilities on a more distant horizon.

Many commercial organisations make money by selling their predictions of the future and some have developed their own forecasting methodologies. The Rand Corporation in the US, for example, took up the challenge of developing methods for future oriented research in the 1950s. They developed the Delphi Method for investigating future developments through tapping into the knowledge of a large group of experts [2] and methods for scenario studies were developed by Herman Kahn [3] to emphasize that the future may not always follow directly from current developments and to analyze the possible effects of breaking points. More recently Gartner Group has developed the hype cycle to predict the evolution of technologies through different stages of impact [1]. Systematic approaches to studying the future of technologies have been developed in the field of technology assessment. Today, the field of future studies has matured to the extent where there are journals such as *Futures* and *Technological Forecasting and Social Change* dedicated to presenting views and/or forecasts about the future.

Even though methods of forecasting social and technical developments have become increasingly sophisticated, from the perspective of the philosophy of science, some still question the nature of this type of knowledge production. The idea of ‘truth as correspondence’ [6] cannot be met since there does not yet exist a situation in external reality that corresponds with the theory. External validity can only be established (if indeed it can be established) with time (and quite a lot of time at that). An alternative perspective on knowledge about the future is to regard this type of knowledge as a set of hypotheses or conjectures which may or may not be falsified in the future. This means that the set of papers in this special issue may run into quite different fates. In ten years, this special issue may generate outbursts of laughter when the predictions turn out to be far out of line with developments. Tetlock’s work on expert forecasting is a sobering reminder of the risks of this type of activity [9]. On the other hand, actors in the public sector act upon certain (implicit or explicit) ideas about the future and challenging these ideas is an important task for scientists. This is exactly the reason why we have invited academics to embark on this risky journey with us. We asked them to write provocative essays on the future of ICT

in public administration and democracy (i.e. e-government, e-policies, e-democracy, e-administration, e-participation, etc.). We feel that thought-provoking essays can contribute to academic and societal debates about the future of e-governance.

2. 25th anniversary of EGPA permanent studygroup on e-government

On the occasion of the 25th anniversary of the permanent study group on e-government of the European Group for Public Administration, we decided to take the risk and edit a volume on 'ICT and Public Administration and Democracy in the Coming Decade'. The 20th anniversary had already been used to look back at the work of this study group and this resulted in a rich special issue of *Information Polity* (Vol. 17, Nr. 4). We felt that we should now, as a counterweight to these backward looking reflections, look forward. This collection of papers celebrates the fact that research into e-governance is alive and well and presents cutting edge knowledge for academics and policy-makers.

Readers should be aware that the nature of the papers in this edition is somewhat different from what they will usually find in *Information Polity*. The authors of these papers were not asked to present rigorous analyses based on systematic empirical research deeply rooted in some theoretical framework. Instead we challenged them to write thoughtful and measured, but provocative, essays about ICT and public administration in the coming decade. The resulting articles present reflections on the nature of new and emerging technologies in the public sector and their impact on government and on democracy itself. In some instances these essays build upon empirical work, but we granted the authors the freedom to reflect upon expected developments in the future. Therefore, while all papers have been double blind reviewed, they do not comply with normal standards for research papers (theoretical framework, research methods), but instead seek to present a clear and hopefully though provoking message.

Curiously when we invited people to submit these essays, we had the sense that many of the authors (both established and younger) received our invitation with a sense of relief, even excitement. Many of these arguments are discussed informally and constantly in intense debates about 'where it is all heading', but academics seldom get the opportunity to present their thoughts on this subject in the form of academic papers in a good journal or book. The invitation resulted in a set of engaging pieces that were initially presented at the meeting of the permanent study group on e-government of the European Group for Public Administration in Bucharest in September 2012. In addition, the Call for Papers for the special was sent out through mailing lists and this resulted in a number of additional contributions. From those submitted, a number have been selected for publication.

3. Overview of the special issue

We have divided the papers into three groups: the past and present as a starting point, the future implications for government institutions and the future implications for research and practice.

3.1. Section 1. The past and present as a starting point

In this section we ask ourselves what lessons for the future can be learned if we look at the practice and visions of the impact of ICT on public administration and democracy in the past? Do they provide any clues for thinking about the future? Furthermore we focus on an important aspect of today's thinking about e-governance. Nowadays the impact of ICT in the public sphere is a subject often associated with

complexities. But, knowing what we know now, how can we deal with these complexities? Can they be of use as a starting point for thinking about the future?

The first paper in the first group, by *Bannister and Connolly* set the scene. Bannister and Connolly argue that the history of e-government is one of jobs left only half complete. Key concepts such as de-siloisation and interoperability have made only fitful progress while Governments and researchers are constantly beguiled by new technologies. While governments try to work out what to do with these new technologies, older ideas are often downgraded or forgotten, even when they are valuable. They argue that if an idea is worthwhile, governments should finish what they start before moving on to the next excitement. Projects of this nature require sustained commitment over several years and structures that can deliver this need to be put in place.

Starting from Pollitt's observation that the past always has a strong influence on the future in politics, *Taylor* argues for a return to the idea of the polity as the focus of our analysis for the relationship of ICT and government. He argues that because too much comment focuses on the trees, we are losing sight of the wood. He offers three principles: choice, confidence and accessibility as a framing device for thinking about the future. Taylor is quite critical of some of the more evangelistic visions of the future of e-government and e-democracy suggesting that the social contract for the information intensive type of society (and in particular its implications for privacy) has yet to be signed up to by many citizens. He argues that the failure of many of these early visions to become reality has important implications for the future of the polity. The high expectations attaching to e-government are matched with those for e-democracy. Yet as we go through different technological phases each of these sets of expectations is largely unrealized. In the era of social networking we may appear to have a two speed polity, one where e-government seems slow and cumbersome yet where e-democracy seems fast changing and innovative. Available evidence suggests however that the pace of change in each of these areas is slow, that we cannot expect governmental or democratic change commensurate with the high expectations generated around the adoption of these new technologies.

Based on a description of some of the responses of the Australian Government to the February 2011 earthquake in Christchurch, *Lips* starts her observation of e-government by stating that ICT's have become a critical infrastructure for government with profound governmental, managerial, and democratic implications. However, she points out that the complexities associated with e-government are huge and should not be underestimated. Chronic project delays, incompatible systems, high costs and suppliers failing to deliver on their contractual commitments are a few examples of these complexities. The dominant focus on technological aspects of e-government initiatives and misleading beliefs in the transformational potential of ICTs have led to the development and adoption of technology-related rational, objective and linear perspectives on e-government, its impact, and its outcomes. In her contribution Lips argues that an alternative stream of thinking on e-government is needed, which she labels 'e-government 3.0'. This stream builds upon a deeper understanding of the unique characteristics of public sector organizations.

Webster too pleads for a new perspective for looking at the application and use of ICTs within the public sector. He sees a new 'surveillance perspective' emerging and becoming more prominent in academic debate. According to his view, this perspective offers new and different insights into comprehending the nature of emergent technologies and their application in governmental and public service settings. In this new perspective surveillance is perceived to be a factor of production in that society has become organized and structured around principles and practices that facilitate widespread technologically mediated surveillance. This perspective is valuable because it highlights informational relationships in the polity and in society and because it 'shines a light' on why information is collected

and processed and how this is achieved. As a tribute to Taylor who used the term X-ray vision in 1998 with regard to informatization, Webster points out that the surveillance perspective can be used to provide scholars of public administration with form of 'x-ray vision'.

3.2. Section 2. Imagining the future

This section covers topics that are relevant for thinking about the way government works and functions. One of these topics is the added value of interorganizational information sharing and integration. Discussions about new concepts like the 'publicness' of information or more classic themes like 'transparency' fit well within this section as does the future of participatory democracy and the idea of a 'do-it-yourself state' which are both described and discussed.

The first contribution in this section is by *Gil-Garcia*. He problematizes the 'whole-of-government' approach that is often used by governments that are looking for ways to become more efficient and effective. With regard to the use of ICTs this approach can be characterized as government inter-organizational information integration. According to Gil-Garcia it is necessary to start thinking beyond the 'whole-of-government' approach. This means thinking from an intergovernmental, multi-national perspective in which organizations are involved with the executive, legislative and judicial branches of government. He argues that we need to go 'beyond Government 2.0': not only do we need to re-think the role of governments, citizens and other social actors, but we also need to explore the potential of new and emergent information technologies. Combined, these trends possibly could lead to a smart, networked and integrated virtual state, though even if this turns out to be technically possible, it is another question whether we, as a society, want to live such a state.

Based on recent research, *Mergel* states that the use of social media applications is mainly driven by innovative citizen use and government organizations are currently slow in adopting these tools. Government agencies are using a diverse set of social media tactics: broadcasting existing web content, increasing participation by asking citizens to provide their insights and opinions and actively participating in actual networking and actual transactions (by conducting services through social media applications). In practice government organizations are faced with a number of challenges in realizing the potential benefits of social media. The use of social media applications has created high expectations for new forms of transparency, publicness of once unpublished information and accountability. This is challenging government's static information and education paradigm. Another challenge has to do with organizational procedures. These procedures and managerial oversight need to be adapted to curate content appropriate for social media applications in a way which reaches citizens in the environments where they prefer to receive their information. The third challenge is to show evidence that the investments are effective and efficient. In order for government to be able to shift to a new governing mechanism based on fluid social media use, these challenges have to be met in the near future.

A topic which has gathered considerable momentum over recent years is transparency. Many commentators foretell a future of open government and open data with an end to the secret governance of smoke filled rooms and bureaucratic obfuscation and opacity. *Grimmelikhuijsen* examines the validity of some of the assumptions underlying such thinking and suggests that highly transparent government might not be as beneficial as some people think. Governments often muddle through and that consequently, and paradoxically, citizen trust in government can be undermined when too much information about it is made available. He suggests that the increasing power of technology to make information readily accessible will have to be carefully managed if transparency is not to do more harm than good.

In his contribution *Meijer* asks for attention to participatory practices that are emerging in society. He assumes that these practices will become more salient in the near future which has important consequences

for the position of government. These practices are often not included in academic analysis if our perspective on democracy is defined only by looking at election processes and/or debates. An additional focus on practices is also needed. With new technologies, citizens increasingly organize their own forms of public value production in a Do It Yourself (DIY) State: governance without government. They do not use technology to elect better representatives or improve democratic debates, but to realize societal solutions and produce public benefits. A key issue in a DIY state is who the actors will be that will dominate networks of power. Furthermore it points out a different role for government in such a state: government no longer needs to produce public value but it needs to ensure that public value is being produced for everyone in a 'commonwealth' of citizens. However, the DIY state is no utopia, the future will show whether it will take the character of a 'jungle' or of a 'supportive community'.

3.3. Section 3. Implications for research and practice

In this section a shift is made to the future of the study and research of ICT in public administration and democracy and its development in the future. How can we raise the explanatory power of our studies in the future? In what way can we benefit from the body of knowledge in different scientific areas? And how useful is 'a big question' approach for the further development of e-governance studies? What are major trends regarding the development of e-governance?

Like Bannister and Connolly in the first section, *Scholl* starts from the evergreen promise of new technology. In a thought provoking paper he suggests five interconnected trends that are likely to affect the way ICT is used in government in the coming years. These including changing ways of thinking about market regulation, a third industrial revolution, a return to sustainable government finance, the evolution of smart government and new models of participation. Scholl is cautiously optimistic about the role of technology in these developments and concludes that developing smarter government is going to be critical to the future success of economies and societies and that e-government will be instrumental in facilitating these changes.

One of the most intriguing questions in social science research is why things are the way that they are? Why do organisations take certain forms? Why do political parties coalesce along the lines that they do? In his paper, *Bekkers* asks this question about e-government suggesting not only that we really do not have a satisfactory answer to this question, but that e-government has become a 'magic concept'. He proposes three bodies of knowledge that he believes can help to address this problem namely the study of innovations, the socio-political shaping of technology and the intelligent state/society. Looking in the mirror asking why government is the way it is provides an alternative way of predicting what the future of e-government might be.

In a paper that has some parallels with the starting point of Bekkers paper, *Yildiz* proposes that the academic community needs to ask what he calls 'big' questions. Starting from Behn's article "The Big Questions of Public Management" and drawing on an extensive review of the literature, Yildiz identifies eight such questions including: 'How can e-government become better theorized?' and 'Are parallel systems in government a curse or a blessing?' Each of these questions might form the basis for a future special issue of Information Polity. Yildiz does not attempt to answer any of these questions, but argues that in looking to the future of e-government, these are the types of questions that need to be addressed.

Overall, we hope that these essays provoke interesting debates both in academic and practice communities about ICT and public governance. The issues identified by the authors are important and merit more debate. We hope to have convinced the reader that the future is too important to be ignored by academic researchers.

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