

# e-Government

What is the Impact on Responsible Leadership? | Excerpts from a panel discussion at the World Economic Forum

The recent World Economic Forum in Davos, Switzerland, gathered the world's top business and political leaders, academic experts, and media leaders to discuss the shape of global corporations and the next phase of the digital revolution.

Booz-Allen & Hamilton hosted a roundtable on the future of e-Government and its impact on traditional leadership and decision-making processes. Booz-Allen & Hamilton Senior Vice President Gerd Wittkemper moderated the roundtable, whose participants were:

**Dr. Ahmed Nazif**, the Egyptian Minister of Telecommunications and Information Technology. As Minister, he deals with the issues of deregulation and how to build the Egyptian information society — a role for which he is well suited, given his experience as the former Executive Manager of Egypt's Information and Decision Support Center and as a CEO in the private sector. Dr. Nazif is a graduate of Cairo University and holds a Ph.D. from McGill University. He is a former Professor of Computer Engineering.

**Dr. Geoffrey Mulgan**, Policy Advisor in Prime Minister Tony Blair's Policy Unit in the United Kingdom. He is Director of the U.K. Performance and Innovation Unit directly reporting to the Prime Minister. Established in 1988, the Unit seeks to improve the effectiveness of Government policies, their implications, and service delivery mechanisms, and to work with departments and others in cross-cutting and innovative projects. Mulgan is a former lecturer at the University of Westminster and is the founder of Demos, a London-based think tank. His latest book is "Connexity: How To Live in a Connected World" (Harvard Business School Press, 1998), which deals with the fundamental conflict between the freedoms enjoyed by many, mainly in the Western world, and the growing worldwide economic interdependence.

**Dr. Gerd Wittkemper**, a Düsseldorf-based Senior Vice President at Booz-Allen & Hamilton. As a member of the Worldwide Leadership Team he led the worldwide Telecommunications, Media and Technology Practice for several years. Now, as chairman of the firm's European consulting activities, he is focusing on the Public Sector and e-Government. Dr. Wittkemper studied Physics and Economics and holds a Ph.D. in Physics from the University of Hamburg. He can be reached by email at [wittkemper\\_gerd@bah.com](mailto:wittkemper_gerd@bah.com).

## The Overview:

**Wittkemper:** e-Government fits nicely into this year's World Economic Forum motto — "Bridge-building with Technology." It's a complex issue, so it becomes imperative to discuss what's really happening, where we stand, and the impact of e-Government on government leaders and society.

First, some background and data on e-Government: After the Internet grew to prominence and the industry created actions in the categories of B2B and B2C, governments started moving toward e-Government, which can be grouped into three classes:

- Government-to-Government, or G2G, is the nucleus and the heart of e-Government. It deals with a range of issues, from how citizens connect with the government to how to improve the process within the government, thereby reducing cost, increasing productivity, and creating new services, possibly even getting a driver's license online.
- Government-to-Citizens, or G2C, deals with a government's interaction with its people. This includes issues centered around democracy and the prospect of voting online.
- Government-to-Business, or G2B, deals with deregulation, and how to empower industry to work cooperatively with government, even creating joint activities such as public private partnerships.

All of the above are global trends. But one of the things to keep in mind with these initiatives is the country-specific aspect of each. The industry in every country has a different history of development, a different government, different legal system, and a different attitude to unions and other constituencies.

So what's to gain from a government embracing e-space? The first and most apparent advantage is to reap the benefits of the Internet — to introduce new services and reduce the cost of those services. Along those same lines, governments need to work to bridge the digital divide, which Geoff Mulgan is working toward so admirably in the U.K. Government must also work to find the right pace, which, in itself, can be a challenging task, since you can't make transformations without the mechanisms to do so.

We're only now starting to realize that the savings through e-Government can be substantial. The last Clinton/Gore report speaks of savings from e-Government to be \$600 billion over several years, until 2002. A smaller example is in Germany, where, if we introduced e-procurement from the government side, the savings could reach \$20 billion.

Implementing such substantial change takes time. It can't be done in a single year. But the benefits are demonstrable and becoming more so all the time. e-Government means governments invest in themselves — and encourage industry to do the same. In the U.S., for instance, \$2.5 billion a year is being invested in efforts to connect universities and libraries. And in Japan, Prime Minister Mori said recently he wants to invest \$15 billion in infrastructure in order to transform the society.

So the benefits are clearly evident. Getting there however is a challenge. To help chart a successful path toward e-Government are our two distinguished panelists. Gentlemen?

**Nazif:** No question that adopting e-Government is a challenge — particularly in a developing nation such as Egypt.

I would hold Egypt up as the model of a developing country at the leading edge of e-Government initiatives, putting Egypt on the cusp of bridging the digital divide. But the thing we have to remember is that there are many countries nowhere near the bridge. So when we talk about developing and developed countries, it's really not two groups, but the whole spectrum that we need to take into account.

For now, I'll just focus on Egypt, because we're a good example of how to approach e-Government. *First and foremost*, we have the critical element for achieving success: *leadership from the highest levels of government*. In our case, President Mubarak announced in September 1999 a national plan for technology development in Egypt — focusing mainly, in the first phase, on the IT and telecommunications sector as an area where we can achieve success and build a track record in e-Government capabilities.

Without that kind of commitment at a very high level, there is no guarantee of e-Government success. In my view, the gap is an opportunity to catch up, since technology today provides possibilities that never before existed. Technology enables you to teach people faster. Think about medicine, for example, where information technology creates an endless realm of useful societal benefits. That alone presents an extraordinary opportunity.

So, what are we doing about it? In Egypt, we put together a national plan, made possible by that commitment from the top, which created our special Ministry to develop and implement the plan. We're calling our plan "Techno-Egypt," and we began implementation in January 2000. In a nutshell, the plan has two primary objectives — starting with building Egypt's information society and making it part of the fabric in everyday life. The possibilities are limitless, and the plan delves into all parts of society, from education to government, business and beyond.

*Our second objective is to build a value-added local industry in IT and telecommunications. We can't just be on the receiving side for technology, software and content: We have to be proactive.*

Egypt is well-positioned to achieve those objectives, in part because of our young population. Of the country's 65 million people, half are under the age of 30. Add to that about 150,000 university graduates every year. And add the steady investments in infrastructure we've made over the last 20 years, which has resulted in a sizable network of communications inside the country and with the rest of the world.

To put our program in motion, we targeted four main areas:

- **Human Resource Development:** We thought of all those university graduates and the need to get them "market-ready." To do so, we're in the process of implementing a lot of very ambitious training and professional training programs. We're doing that in very close coordination with Egypt's multinational companies and its private sector in Egypt. And we're proceeding with the clear objective of getting 5,000 professionals into the e-market every year. Our alliance with the private sector is ambitious. We're working with a total of 10 companies, including IBM, Cisco Systems, and Oracle. We concentrate in getting people "market-ready." They get certified by

the participating companies and focus primarily on development skills. One of the particular challenges of the program is how to build interest in a nation where people can't afford a computer or even think about having access at home. After all, we're a nation in which a family's average annual income is \$1,500 a year. To make it work, we had to bypass the family home. We created what we're calling "Information Technology Clubs" in which we travel to deprived areas and build centers with access to the World Wide Web. With the government leading the way, we estimate it costs perhaps one Egyptian pound an hour for Internet access, rather than the 10 pounds an hour it would cost for access at a Cairo Internet cafe.

- **Infrastructure Development:** The challenge is simple: We need more bandwidth, which is again a challenge in a developing country, where people are more interested in clean drinking water and sewage systems, and effective schools and hospitals. But what we're discovering now is that type of investment is becoming very attractive to the private sector, meaning government can work to create the environment that would allow the private sector to invest in these areas. That all becomes part of our plan — ensuring that the Egyptian regulatory environment allows big telecoms, software houses and others to invest in the country. It's a considerable challenge that is a governmental priority within the context of the average Egyptian family. It requires that we be innovative.
- **Ensuring the Infostructure:** These are the policies that government requires to implement e-Government initiatives. All federal ministries have to have a framework with common standards. Without them, different branches of government can become isolated islands.
- **Business Development:** How do you get people to invest in e-Government? How do you create such an industry? My answer is a general one: By relying on our own population, multinational companies can create the industry more cost effectively than in the developed world. Even with a shortage of IT professionals in Egypt, we still need to look within and work to develop from inside. For the multinationals, that's a "win-win" situation — they're getting products and services at a lower cost, and opening up their markets.

Part of the challenge of e-Government is achieving balance and shifting its priorities to account for developing countries. To date, the world has focused on 20 percent of its population, leaving the other 80 percent in the dark. By not shifting priorities, developing countries run the risk of saturation. Building e-capabilities requires that we all work to develop the markets of developing countries by encouraging multinationals to invest in our countries. The encouraging news is that our efforts are starting to pay off: Hundreds of software engineers and new entrepreneurs are discovering Egypt, and, in the process, creating a very strong local industry. So the wave is coming, and with our guidance and help, it seems to be working toward that balance.

**Mulgan:** The Italian novelist, Italo Calvino, may have put it best in describing how we need to change our thinking about how government works in the new millennium. To his mind, governments need to be built on the principals of quickness, lightness, exactitude, multiplicity, and transparency — the opposite qualities to those we traditionally associate with governments, which have tended to be slow, heavy, vague about their goals, and secretive.

So to my mind, e-Government plays into the new model — and speaks to a much bigger process of transforming governments, qualities, structures and the way it works.

The best way to explain how we're trying to think about e-Government in the UK is through describing six tasks and four issues. Let me briefly summarize each one.

First, the tasks:

- **Achieving Access:** In the U.K., nearly 50 percent of the population have home Internet-access — a figure that we want to increase to 100 percent access within three to five years. We hope to do so through a combination of means — regulatory pressure to bring down prices for Internet access, subsidized access for PCs to low-income families, access through libraries, neighborhood centers, and Internet cafes. We're moving quickly in this area, but our biggest advance would be achieved if we were to become the first country to move entirely to digital television — if the many complexities involved in switching off analog systems could be achieved, the U.K. might be in a position to quickly achieve 100 percent Internet access.
- **Providing Services:** Our goal is to provide all government services online by 2005. A year ago, that target was 2008, and it's possible the target will be brought forward again. Certainly progress is already being made with one-third of government services online already through a single portal, linked through what we call life transitions — having a baby, finding a job and retiring. A key technical and organizational challenge we're wrestling with at the moment is how best to combine online, telephone-based services, and face-to-face services. In our health service, for instance, we have created a detailed, online diagnostic information source, alongside 24-hour phone services providing advice and face-to-face help from doctors and nurses. In the employment field, we have online databases for jobs, but also more investment in face-to-face help and advice for people with motivational problems. The same goes for schools and small business support. Online is often not a replacement of other services, but it helps you to reconfigure the mix.
- **Tackling Transactions:** As in other countries, the digital world is creating big potential improvements for transactions such as paying taxes and benefits, and in the management of procurement and licenses. To my mind, this is the area already delivering the biggest cost-savings and transformations. But I suspect, as in business, the real productivity breakthroughs for government as a whole will take much longer than most people expect, and will only come once the organizational and HR issues have been tackled.
- **Creating New Machinery:** After a long period of decentralizing control over purchasing to agencies and departments, we are now moving back to some more centralized control under what we call the e-envoy's office, which has a budget of £1 billion to support e-government. The e-envoy has a double key to approve departmental plans and to ensure they fit together, along with responsibility for ensuring common standards and quality particularly of the government's 1,000 or so Web sites. Its other goal is to ensure that we use e-Government to achieve horizontal linkages across government, rather than simply reinforce the existing vertical silos.
- **Creating Hybrids:** The e-world enables us to work in a more flexible and pragmatic way with private and volunteer sectors. As a result, some of the tasks traditionally performed by govern-

ment are being given entirely to the private sector, thereby improving service in the process. An example: Three companies have been contracted to run a system that notifies all government departments when a person changes their address. Along similar lines, we've supported what we call a time bank in which we have worked with the BBC and voluntary organizations to develop a database of volunteer opportunities in the U.K. In each case, government provided the funding — but our partners have performed the work and done so better than we ever could.

- **Creating Learning:** E-Government makes it possible to transform government's ability to learn and to continuously improve. One part of this is more transparency of performance information so the public can see how well their local schools, hospitals, and police are doing. Another is more horizontal linkage between the different units across the public sector so they can learn together, share best practices and, on their own, develop emerging conclusions without having to go through policy makers like me back in London.

Overriding all those tasks are our key issues. They are as follows:

- **Leadership:** As Dr. Nazif discussed, clear leadership from the top — which, in our case, is Prime Minister Tony Blair — is essential to creating change. Without it, nothing is achieved. But, it is essential as well that there be leadership within each department and agency, which doesn't always happen.
- **Building Skills:** At the moment, we're lacking people with sufficient skills to carry out our e-Government goals, in part because the private sector is booming and the pay and rewards of working there are much greater than working in government. More generally human resources and IT issues are intimately interwoven and can't be separated anymore.
- **Privacy in Data-sharing:** e-Government has created the potential for a step-change in data sharing between public agencies to make government more efficient and deliver better services. But those goals are only achievable if we put in place clearer guarantees of citizens' rights over their own data. The right to know what is happening to their information and to be able to check it is important. My unit is completing a major study to create a new approach to this issue.
- **Vested Interests:** Pushing e-Government initiatives forward creates profound implications for a nation's power structures — how we organize money, how we organize roles, and how much investment is sunk in the old regime. Inevitably, it is always quite a battle to establish new structures. It's easy to get the superficial application of technology but much harder to really redesign your systems.

That last issue can be a particularly tough challenge for today's leaders, most of whom come from a generation or two before the start of the Information Age. Driving progress forward requires a mix of very clear, powerful leadership qualities and a vision. It needs to be driven through the system in such a way that it overcomes vested interests. At the same time, it requires a great deal of humility, because those leaders usually do not understand the processes they are trying to achieve. Making it happen then can be hard.

## Questions & Answers:

**Q: *What benchmarks and measurements do you use to push e-Government forward?***

**A: Nazif:** One way in the G2C area is to set targets for services provided by the government.

Say you're due for a driver's license in a week and get it in two days; that is easily measured.

The other benchmark is measuring in actual monetary figures, as we're doing in the area of e-procurement, or procurement by the government. In Egypt, we estimate that using IT can save £200 million a year in the area of government purchasing.

**A: Mulgan:** We've done a lot of work thinking about how to measure performance and targets to drive change. Some aspects are straightforward, like setting targets on services going online, computers in schools, and training teachers. But on a broader scale, one of the things we're trying to do is to change the philosophy of target-setting and performance indicators — to move it much more toward genuine outcome goals.

In the late 1980s and early '90s, there was an obsession with activity performance or intermediate indicators. That has evolved to the point where we now have 200 overall targets which we, in the center of government, use for our departments. We try to ensure that those targets have traction by linking them with local indicators so users can find out how their hospital or police force compares with others across the U.K.

Taking that a step further, we try to continually refine those indicators, keeping in mind that from the public point of view, the most important indicator is the quality and the subjective experience of the service. Governments have often gone wrong by thinking that technical measurements actually get to the heart of a service. They don't give sufficient weight to people's experience. So it's important to build in more subjective indicators as well.

At the same time, we're trying to do more formal benchmarking with other countries on both cost and a quality base. We've been urging the European Union to do much more serious benchmarking than it has in the past, but it's a complex issue. Although some areas like the speed of license-delivery or tax transactions are relatively simple to measure, others have no straightforward measure. How, for instance, do we measure people's sense of safety or health? Governments that put too much weight into believing this can be explained in a quantitative way will find their citizens unhappy.

**Q: *Can you elaborate on how you plan to measure the cost-cutting benefits of e-Government initiatives?***

**A: Wittkemper:** Our savings figures result a lot from re-engineering of different processes in the government area. Take the restructuring of U.S. Internal Revenue Service as an example: Here is a huge government organization where processes are being streamlined, in part, via information technology that allows it to be more productive in ways that bring in taxes more efficiently. A pre-condition is a restructuring of the organization along customer groups. It results in savings of hundreds of millions of dollars.

Measuring the savings in the e-procurement area is more obvious. The rule of thumb is that you can achieve in the first year approximately 5 percent of the savings of the total buying volume. In the second year, it goes up to 10 percent. There are certain areas where you can achieve even higher savings, e.g. when it comes to managing documents and support staff.

Besides direct cost cutting other savings come by enhancing services, which you can again measure through gains in productivity. Add everything up — cost-savings on one side and new services on the other side — you will get benefits of several billion for a nation's economy.

**A: Mulgan:** In the U.K., we have determined that paying benefits online — that is making the payment directly to a person's bank account as opposed to the current system of paying through the local post offices — drives down the cost of the transaction 50-fold.

I use that example to show the massive savings involved, but also to point out the complexity of the issue. Despite the possible savings, we need to acknowledge that the public is very attached to their post offices, and may not want government to drive through change too quickly.

A second example is health. If people can diagnose their own health problems online through better information — in our case, through National Health Service Direct — the number of people going to doctors and hospitals should, in principle, be reduced, thus increasing the time doctors can spend with patients. That happens to some extent, but we find that people's expectations of the overall quality of service rises as well. The online world actually increases a consumer's demands, making me a bit skeptical of some of the more extravagant claims for e-Government cost savings in mainstream public services. We need to guard against over-optimism surrounding cost savings, because it will lead to disappointment.

**A: Wittkemper:** We need to keep in mind that the process of implementing e-Government initiatives is a long process. It wasn't so long ago that government started with information-only Web sites. The next step then is to introduce a two-way, Web-based communication. It's the third step that I feel will be the most challenging: making a real transaction when people ask for a service and get it.

Then comes the fourth step: connecting the processes and integrating all the government services behind those processes. At this point, there are only a few examples of this true e-Government in action: Singapore has perhaps the world's most advanced system.

**Q: *Getting a license online is one benefit of e-Government. But how do you gauge something greater — the way e-Government stands to change a citizen's ability to contribute ideas and change the electoral process? And can you measure how it stands to really move the nature of government in a different direction?***

**A: Wittkemper:** In a discussion on re-inventing government yesterday some people highlighted that in the information society the structures we have created for industry will no longer be ideal. They suggested that we need to find a new ways to communicate and to vote. What's the best way? Maybe we should ask the politicians.

**A: Nazif:** There's no question that the information society can improve how governments communicate with citizens.

But it's a two-way street and should be seen this way. At the ministry, we have a Web site where we receive suggestions. To me, as a decision-maker, it has opened up a new window and expanded my channels of input tremendously. It's one thing to sit in my office and listen to my advisors; with the Web, I can multiply those channels by thousands, which is a real value-add to how I perform my job.

I'm not sure we can yet answer how the Internet would affect voting. In the last election in Egypt, there were complaints about the electoral lists. And anyone who followed the recent U.S. presidential election knows that those problems extend even to the most high-tech countries.

**A: Mulgan:** Looking ahead, I think the most interesting trend will not be push-button democracy, Ross Perot-type "town hall meetings," and so on. Rather, there will be a general shift of government, operating in a much more "inside-out" way.

It would be a continuation of what has already started. And it's both separate from technology and aided by it — putting laws and regulations and policies in the public domain at a much earlier stage so people can comment and get involved in the process.

Already, we've moved to a position of greater transparency on performance information, which empowers people to demand parity in relation to the services they get across the country.

E-Government has established a much more open process of dialogue — and I look for that to continue to evolve. The key is taking the current Internet usage rate of 50 percent and expanding it to presently excluded groups.

I expect that trend to continue even in the next year or two, when we plan to empower local neighborhoods to have much more control over their main services. It's a matter of using information technology to ensure they draw the best expertise, the best knowledge, and the best practices, and, in a sense, re-energizing local control — by using the Internet. I see that as a more practical solution than voting online.

**A: Wittkemper:** Ladies and gentlemen, e-Government is an issue that will accompany us for some time in the near future. For today thank you very much for your discussion. I hope you can take some of the mentioned ideas and implement them at home. ■

**e-Government at Booz-Allen & Hamilton:** Booz-Allen's highly regarded work in e-government is extensive, including clients and projects throughout the world. The practice, based in McLean, Virginia, has partnered with a number of its U.S. federal government clients to win prestigious citations such as the E-Gov E-Learning Award and the E-Gov 2000 Pioneer Awards. Among its current or recent e-government-related clients are the (U.S.) Internal Revenue Service; the European Union; the (U.S.) Food and Drug Administration; the Dutch Ministry of Economic Affairs; The (U.K) Digital Divide Program; the D-21 Initiative in Germany; and, the (U.S.) Departments of Energy and Agriculture.

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