



TOWARDS NEXT GENERATION E-GOVERNMENT



Jaijit Bhattacharya

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E-Government has come as a new ray of hope for political functionaries and public administrators who have so far struggled to keep up with the rising aspirations of the public. Unless E-Government strategy and planning are future proof, today's E-Government projects run the risk of becoming irrelevant tomorrow.

Towards Next Generation E-Government is a compilation of very interesting papers on technology policy (interoperability and standards), enterprise architecture, workflow and process re-engineering, data centres, privacy & security, education, and next generation E-Government.

Since the book touches on important strategic issues, it should prove a valuable resource to those who are responsible for strategizing E-Government.

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FOREWORD

As technology moves on, e-governance also has to evaluate the new technological options and standards available to provide better governance. We have seen the internet embrace the technologies of Web 2.0. We have seen the world moving towards open standards such as Open Document Format (ODF) with much more vigour than ever before. We have seen communities moving towards a greater adoption of open source software such as Open Solaris and Linux. We are at a point of influx where we need to re-evaluate the options available to e-governance which will determine the next wave of IT adoption in governments.

Till now we have seen e-governance to only bring to the the electronic world that which existed in the brick and mortar world. We have not had any significant solution that has been a pure play e-governance solution, the equivalent of google or eBay in the e-business domains. We have also not yet seen any significant e-governance solution that leverages the power of Web 2.0 that can open up a whole new dimension in participatory governance, enabled by the interactive Web 2.0 technologies.

Similarly, driven by the need for technological sovereignty and need to protect government data for long periods of time, governments all over the world are aggressively adopting Open Standards. Governments such as the Government of Holland has adopted the ISO open standard Open Document Format (ODF) as their standard. It is necessary to have the appropriate open standards to ensure a longer duration of IT investments being put in by the governments.

And finally, the third dimension of the next wave of e-governance is Open Source adoption. Open Source is important not just from the point of view of reduced total cost of ownership but also from the point of view of control over the IT infrastructure and being able to give a boost to the local IT industry. Fortunately, the best of breed solutions are actually open source. A very good example is the Open Solaris operating system that is considered by many to be one of the best and most robust operating system on this planet, is an open source solution.

This book has deftly brings in the details of all these issues in a very comprehensive manner. The book will definitely help practioners of e-governance to take a more informed technology policy decision.

Lalith Weeratunga
Secretary to President of Sri Lanka
Govt. of Sri Lanka

PREFACE

We have come a long way from the days when e-government simply signified a web presence of the various government departments to e-government now represents the complex IT enablement of back-end processes of the government in a manner that it allows the government not only to be more efficient and effective but also to perform new processes which would have been impossible to perform without technology. To do so various standards, architectures, tools such as ontology approach have been applied.

While the e-government community at large is grappling with the task of implementing projects, there is equally a need to anticipate the challenges that future may bring. We have to recognize the risk that e-government projects which are held to be great successes today may become quite irrelevant tomorrow. The next generation of technology is something we need to look for. E-government has a web presence but its time to achieve a one-stop portal for the government through the standards of integration and interoperability. Advanced privacy and security measures need to be undertaken. When a new technology will be deployed the need for re-engineering will arise. This book covers the latest thoughts on e-government systems, technology models of e-government and e-government infrastructure.

Since e-government is a relatively new field, the e-government initiatives of individual government agencies should not be postponed just because standards are not yet in place. In fact such an approach would be consistent with the decentralization and freedom which have made internet what it is today. However, another facet of the issue is that if it proves impossible or prohibitively expensive to integrate the disparate e-government schemes at a future date, then e-government will fail to reach the advanced stages of Layne & Lee's evolution model. Therefore, the importance of interoperability and standards cannot be ignored. E-government architectures and the design and organization of data centres will have a significant bearing on cost effectiveness, performance, reliability, and the ability to adapt to the changed requirements of the future. Privacy and security are well known concerns in e-commerce. Failure to protect the confidentiality of data could induce existing users of transactional e-government services to revert to traditional channels and repel prospective adopters. I find that a number of e-government projects simply computerize the existing archaic business processes, without considering the opportunity of re-engineering them. E-learning has a great potential and it represents a new developmental opportunity for government and its institutions who can now reach top quality education to even underdeveloped locations. While e-government has made great strides, new technologies will be required to meet the complex requirements of the future.

In concluding, research needs to have a close liaison with practice so that work on interoperability & standards, architecture & data centres, privacy & security, process re-engineering, and new technologies proceeds in a manner that would make the existing e-government designs robust against the future. This book provides the impetus for thought and action in this regard.

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Jaijit Bhattacharya