

NATIONAL E-GOVERNMENT POLICY

2015–2018



E-Government Vision of Belize

**" An Integrated, Collaborative Government
Delivering Secure, Quality Public Services
that Connect and Empower People."**

Central Information Technology Office
Ministry of Finance
Government of Belize

ACKNOWLEDGEMENTS

This E-Government Policy is the result of extensive national consultations with stakeholders representing a majority of sectors, interests, demographics and perspectives. A list of consultant activities, meetings and consultations may be found at Appendix I of this document. The CTU is particularly grateful for the contributions and valuable comments of colleagues in the project team, notably Dr. Annalee Babb, Mr. Gary Kalloo, and Professor Thomas Andersson.

Special acknowledgment to the Belize Local Team that consists of the staff of Central Information Technology Office (CITO), Ministry of Finance, and the Ministry of Energy Science Technology and Public Utilities.

LIST OF ACRONYMS

C2C	Citizen-to-Citizen	CSIRT	Computer Security Incident Response Team
C2G	Citizen-to-Government	EWGs	Expert Working Group
CAC	Community Access Centres	CITO	Central Information Technology Office
CARICOM	Caribbean Community	C2G	Citizen-to-Government
CIO	Chief Information Officer	G2E	Government -to- Employees
CTU	Caribbean Telecommunications Union	SME	Small and Medium-Sized Enterprises
G2B	Government-to-Business	GCI	General Communication Inc.
G2C	Government-to-Citizen	HDI	Human Development Index
G2G	Government- to-Government	HDR	Human Development Report
GIS	Geographical Information Systems	GDP	Gross Domestic Product
GoB	Government of Belize	MTDs	Medium-Term Development Strategy
GOVNET/GWAN	Government Wide Area Network	WOG-EA	Whole Of Government Enterprise Architecture
ICT	Information and Communication Technology	HIPCAR	Harmonisation of Regional ICT-Related Legislation
NRI	Networked Readiness Index	ToR	Terms of Reference
PMS	Performance Management System	VOIP	Voice over Internet Protocol
PPP	Public Private Partnerships	WAN	Wide Area Network
R&D	Research and Development	WEF	World Economic Forum
SLA	Service Level Agreement	ToR	Terms of Reference
SMS	Short Message Service	VOIP	Voice over Internet Protocol
SoW	Scope of Work	WAN	Wide Area Network

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EXECUTIVE SUMMARY

1. INTRODUCTION

E-Government is about utilizing Information and Communication Technology (ICT) to bring the Government closer to its people through major improvements in the delivery of Government services. In recognition of this need the Government of Belize through its Central Information Technology Office (CITO), Ministry of Finance and Economic Development has engaged the services of the Caribbean Telecommunications Union (CTU) to design a National E-Government Policy, Strategy and Plan of Action to leverage the power of ICT as a driver of economic and social transformation.

The overarching goal of this undertaking is to define a strategic framework for Belize that supports the development and utilisation of world-class E-Government capabilities. The role of the CTU in this regard is to analyse the national setting as it relates to E-Government, establish the needs of various key stakeholders, identify the priority central areas requiring strategic intervention, and successfully integrate and translate those needs into a practical National E-Government Policy, Strategy and Plan of Action that supports the developmental vision of the Government and people of Belize.

In delivering on this mandate the following key objectives of the consultancy were defined: (A) identify and analyse regional and global E-Government trends and best-in-class approaches; (B) review existing E-Government strategies in Belize; (C) deliver a gap analysis of Belize's current state vis-à-vis state-of-the-art E-Government development and/or readiness; (D) review the policy, legislative, and regulatory framework for E-Government; (E) design an appropriate E-Government policy framework; (F) assess the structure, operations, effectiveness and capacity of the CITO to deliver, continuously monitor and effectively manage best-in-class E-Government strategies based on the agreed policy framework; (G) assess key existing public service structures, systems and/or processes to determine their capacity to deliver based on the agreed policy framework; (H) devise an analytical framework for policy assessment, monitoring and evaluation of steps towards implementation; (I) develop strategies for implementing the agreed E-Government policy; (J) outline a plan of action geared towards effective implementation of the strategies; (K) provide a summary report of all findings, including final recommendations, strategies, and a plan of action; and (L) conduct a national workshop to validate the findings.

In preparing this National E-Government Policy, Strategy and Action Plan, and in support of the development of a comprehensive E-Government ecosystem for Belize, the CTU drew on its pool of both international and regional expertise in the specific areas of infrastructure development, E-Government, innovation, national ICT planning, policy and strategy development and implementation and ICT-based capacity building to ensure the most appropriate set of targeted interventions were identified to bring about meaningful change in the shortest possible timeframe.

The use of ICTs to enhance public sector transformation is not unique to Belize. Economies everywhere are in transition, driven by technological and business model innovation that is disrupting conventional governance models at every level of interaction, both within government and with its public constituents. Indeed, traditionally rigid, complex, inefficient Government bureaucracies are becoming a drag on economic growth, social innovation and national development. Governments must therefore find ways to curb these inefficiencies, use its scarce resources more effectively for social and public good and infuse ICTs in its operations to assist in this endeavour.

In this regard the CTU, in the development of this National E-Government Policy, Strategy and Plan of Action, has sought to apply modern best-in-class E-Government models to minimise the bureaucracy and regimentation that currently exist in delivering services, making room for creativity, efficiency and flexibility, while also maintaining the operational integrity of the public service. The intention therefore is to apply appropriate solutions to the unique and specific issues facing Belize thereby motivating public service providers to view people both as clients and as shareholders in a national enterprise whose core mission is to create sustained and sustainable value.

The CTU in its ongoing work regionally, and in examining the international landscape has found that the application of emerging E-Government models has the capacity not only to improve the experiences of public servants and the efficiency of public service delivery, but also has a ripple effect on the private sector, providing new opportunities for innovation, business creation and enterprise development.

The expectation for Belize therefore is the establishment of a strong, creative, well-managed, empowered public service which will spur on the stimulus for entrepreneurship, private sector growth, foreign investment inflows, and sustainable national development.

To deliver on this promise the current structures and processes of Government must be reconfigured to unlock the potential of new technologies and digital frameworks to change operational cultures, processes and bureaucratic attitude within the public service.

The document is therefore designed to address these issues at this critical juncture in Belize's development roadmap. Left unattended the Government will continue to see revenues shrink and costs balloon as they deliver substandard services to frustrated citizens, businesses and foreign investors who will eventually seek other avenues through which to attain real value.

2. E – GOVERNMENT ANALYSIS KEY FINDINGS

Against this backdrop the consultancy sought to review the current E-Government state of play and the state of readiness for employing new and emerging models of E-Government in Belize.

The consultancy has established the following gaps in existing frameworks that have the potential to derail efforts to unleash the full potential of ICT, innovation and E-Government to contribute to the sustainable development of Belize. These were identified through a series of workshops and discussions with key stakeholders from Government, the private sector, academia and citizens. These are listed as follows:

1. A persistent silo culture in Government that empowers ministries, departments, and statutory corporations to be predominantly inwardly focussed;
2. 'Ad hoc activities' in individual ministries and departments that have no apparent linkages to an overall national plan for economic development;
3. High levels of fragmentation in respect of communications, coordination, collaboration, consumption, planning, and implementation in Government that result in high costs, decreased efficiency, and general wastage;
4. Marked absence of mechanisms that transcend politics to support continuity in public sector planning and implementation, resulting in erratic national development;

5. Failure to harness technological innovation, particularly ICT, to improve the efficiency of existing factor-based economic sectors like forestry, fishing, agriculture, oil and gas and, in the secondary sector, energy, leading to sub-optimal production and value output in these sectors;
6. Prohibitively high taxation, which inhibits entrepreneurship and innovation, and encourages the development of a parallel economy;
7. Most sparse population in Central America (22,800 sq. km., people: 324,060 > ½ living in rural areas, almost ½ under 18 years old) has implications for policy planning, Government revenues and economic growth;
8. Major national unemployment and under-employment and fluid, often undocumented, flows of people from Central America, with serious implications for policy planning and economic development;
9. Lack of ubiquitous infrastructure (telecommunications, electricity, water, roads) impedes public sector management, investment and economic growth;
10. Lack of legislation and the existence of weak regulatory frameworks to guide development of ICT-related sectors, including E-Government and e-commerce, have a dampening effect on public sector efficiency and productivity, business, entrepreneurship and innovation;
11. Lack of effective competition and regulation in the telecommunications and ICT sectors, resulting in high access costs and reduced performance, making the Internet inaccessible and unaffordable to many;
12. Deficiencies in education at the primary, secondary and tertiary levels, resulting in weak skills and human capacity in the public and private sectors, slowing economic expansion.

Additionally, in its analysis, the CTU has referred to the World Economic Forum (WEF) assessment on the state of ICT readiness to support an integrative E-Government ecosystem. In its 2012 Networked Readiness Index (NRI), for the first and only time to date, WEF assessed the extent to which Belize is leveraging ICT to increase its competitiveness and positively impact overall national development. Unfortunately, according to the 2013 Report, the most recent survey data “could not be collected in Belize”. Thus, along with other factors, the 2012 NRI findings are used as a basis for the policy prescriptions outlined in this document. In this regard, Belize was ranked 119 out of 142 countries globally in the 2012 NRI.

The specific indicators and corresponding individual rankings on which Belize’s 2012 NRI position is based on, are:

E-Government Readiness Assessment Indicators World Economic Forum (WEF) 2012 Global Information Technology Report (GITR)	
Indicator	Country Ranking/142
Laws relating to ICT	124
Government procurement of advance technology	125
Government prioritisation of ICT	136
Importance of ICT to Government Vision	139
Government Online Service Index	116
Impact of ICT on access to basic service	121
ICT use and Government efficiency	133
E-Participation Index	94
Firm-level technology absorption	129
Individuals using Internet	101
Extent of business Internet use	81
Government use of ICT	137

In arriving at the policy intervention areas and the strategies to be employed to advance Belize to a state of ICT readiness and one conducive to the application of emerging models of E-Government, the CTU in formulating its recommendations has sought to address these very basic and fundamental deficiencies in the E-Government ecosystem and enabling environment. The Strategic Interventions listed in the following section are geared at directly tackling these weaknesses.

3. STRATEGIC INTERVENTION AREAS

In order to guide the Central Information Technology Office (CITO) of Belize, which is the Government’s technology arm, in developing appropriate E-Government frameworks that support achievement of the goals set out in various national development plans and strategies, including *Horizon 2030* and Government’s *Medium Term Development Strategy 2010-2013*, and bridge the gaps identified during the consultancy engagements as stated above, the Caribbean Telecommunications Union (CTU) has designed this E-Government Policy, Strategy and Plan of Action. It contains the first three of five components in a holistic national programme to leverage information and communication technology (ICT) frameworks as a means of helping to catapult Belize to its next dimension of development. The five components of this holistic national programme are:

1. An E-Government Policy that outlines the wider vision, mission, guiding principles and core objectives that are to shape the delivery of government services in Belize during the next three to five years;
2. A set of roadmap strategies for the design of effective E-Government platforms based on the agreed E-Government Policy framework;
3. An E-Government action plan that gives direction to the roadmap, detailing the steps, timelines, potential partners and/or resources to implement the strategies and achieve the vision for E-Government in Belize;
4. An ICT Innovation Policy that outlines the wider vision, mission, guiding principles and core objectives that are to shape the development of ICT and innovation in Belize during the next three to five years;
5. A set of high-level projects and roadmap strategies for the design of effective ICT Innovation platforms based on the agreed ICT Innovation Policy framework.

These five components are intended to be complementary, with delivery of E-Government services being a driver for ICT innovation in Belize even as local advances in the ICT sector support innovation in E-Government.

The ultimate goal is to improve Belize's governance mechanisms, increase efficiency, enhance competitiveness, encourage innovation, attract new and more appropriate flows of foreign investment, and assist Belize in becoming a nation capable of leaping beyond old models of economic development to embrace and refine creative ways of engaging internally, with the region, and with the world.

This intervention is critical now for a number of reasons, not least of which is Belize's relatively poor performance in terms of global development standards and technology benchmarks when measured against the best in class. Moreover, stakeholders across all key sectors express the very strong view that the country's existing policy, regulatory and governance frameworks in relation to ICT are simply not fit for purpose, running counter to best-in-class global trends and negatively impacting the competitiveness of the business sector and, by extension, the national economy.

Analysis of WEF and other global rankings, comprehensive exchanges with stakeholders, research into the local ICT sector, and uncovering of global best practices have resulted in identification of the seven (7) strategic themes this Policy will use to guide E-Government development and implementation in Belize over the course of the next three to five years.

These seven strategic themes are:

1. **Public Sector Infrastructure Development:** Building out a world-class Government Wide-Area Network (GWAN) for the Belize public sector using common and shared platforms that enable delivery of robust, seamless, user-friendly, end-to-end E-Government and ICT services internally and to external clients.
2. **Creative Regulatory Reform:** Designing and implementing pioneering policy and regulatory approaches to ICT adoption and usage in the public service that allow E-Government to flourish in a secure environment.
3. **Targeted Human Capacity Development:** Shaping public sector frameworks for training, education and career-long learning that bridge significant existing deficiencies in individual and overall human capacity.
4. **Improved Government Efficiency:** Enhancing public sector responsiveness and the diffusion and use of ICT by upgrading existing delivery channels, creating new channels for delivery, designing compelling new content and services, changing the culture of bureaucracy and developing appropriate governance models.

5. **Effective Cross-Functional Collaboration:** Developing programmes and initiatives to build capacity for E-Government-related research and innovation, dissolve existing unproductive silos, improve collaboration, increase knowledge exchange, and support the sharing of experiences across Government.
6. **Enhanced National Security:** Applying ICT frameworks uniformly across all national security-related public service entities in ways that remove existing silos, promote close collaboration, encourage active exchange of information, and contribute to a national sense that law and order is being appropriately maintained.
7. **Quality Social Services:** Transforming the way Government engages with key clients and stakeholders such that they are placed at the centre of national development through the efficient sharing of information and the fast, seamless, secure, cost-effective delivery of Government services via modern ICT platforms.

These seven strategic themes around which the E-Government Policy is designed are intended to move Belize along the path to an **Integrative System** of E-Government and to create the environment necessary for the public service of Belize to eliminate existing bureaucratic silos. This, in turn, is expected to build a collaborative working environment where the public and private sectors and citizens connect in productive partnerships enabled by the transformative power of information and communication technologies (ICT).

Yet, these frameworks will deliver value to the Government and people of Belize only if there is a new approach in the way the public sector currently functions, including Cabinet as a body, the Caucus of CEOs, individual Ministries, departments, and statutory corporations.

To this end, the Strategy and Plan of Action are fashioned to give life to the policy framework for E-Government. Together, they constitute the roadmap required to manage change, monitor results and hold individuals accountable. Without this roadmap and the accompanying political will to implement agreed policy decisions, the power of culture, unproductive behaviours and inefficiency processes and systems are likely to overshadow technology's ability to bring about positive transformation.

As such, this document articulates concrete initiatives to move Belize forward, including modernising Government's ICT frameworks and infrastructure; upgrading the digital skills of public servants; improving the way Government conducts its business; upgrading the national security apparatus; enhancing delivery and diffusion of education and health care; managing change in a digital environment; and guiding evolution of legislative and regulatory models that support robust E-Government, innovation, and entrepreneurship.

4. STRATEGIC FRAMEWORK

These seven strategic themes are intended to move Belize along the path to an **Integrative System** of E-Government by addressing the gaps and fundamental deficiencies identified earlier. Such a model links local systems, systems with similar functionality, and systems across Government agencies horizontally (internally) and vertically (externally) such that more seamless communication, collaboration and exchange of information are possible.

In this vein, key initiatives under each of the seven themes include ICT-related training for public servants, and a Government network designed to consolidate core public service IT infrastructure. Once that IT infrastructure has been integrated, Government will use it to deliver several appealing e-services designed to allow it to meet

people’s needs in a more efficient and engaging manner, including with respect to delivery of mobile services to rural and more isolated communities, bringing Government closer to the people.

Key initiatives also include the creation and deployment of a Mobile Broadband Public Safety Network and a Computer Security Incident Response Team (CSIRT) as a means of enhancing Belize’s national security. In support of improved integration and greater collaboration within Government, the strategies also include a pilot project involving sharing Cabinet Papers in a digital environment with key policy makers across Ministries.

A detailed roadmap of practical programmes and projects, over a three to five year period, have also been identified under the various strategic themes which are geared toward creating an enabling environment for the deployment, application and use of E-Government functionalities.

The following summarised table provides the various thematic intervention areas, the objectives, the roadmap of programmes and the expected outcomes. The expectation is that the implementation of such a framework built on best in class global models and specifically designed to address the deficiencies in the E-Government infrastructure, human capacity, policy, regulatory and governance frameworks will accelerate Belize’s public sector transition to a modern and effective well- oiled machinery capable of supporting robust E-Government systems, innovation, and entrepreneurship.

Strategic Theme	Key Objectives	Programmes	Programme Outputs/Outcomes	Key Performance Indicators / Measures
Public Sector Infrastructure Development	<ol style="list-style-type: none"> To enhance the ICT - broadband access pervasive To enable robust, end-to-end, seamless, user-friendly ICT services To build out a world-class GWAN via common and shared platforms 	Network Consolidation – Multi-tiered GOVNET	<ol style="list-style-type: none"> Create a seamless and connected government. Reduce costs and improve the security of the network. Achieve greater efficiency 	<ol style="list-style-type: none"> Number of Ministries connected on GWAN. Level of integration and connectivity
		Systems Consolidation - Data Centres	<ol style="list-style-type: none"> Reduce Government’s energy costs Reduce overall IT expenditure Facilitate shared/ managed services provisioning 	<ol style="list-style-type: none"> Number of shared services deployed
		VOIP and Email Migration	<ol style="list-style-type: none"> Reduce Government cost Create WOG services 	<ol style="list-style-type: none"> Number of Ministries connected by VOIP and using common email platform
		Development and Standardisation of e-Services Platform	<ol style="list-style-type: none"> Government standardization of e services delivery Build once, use many concept Reduce service provisioning cost Provide ‘single face’ of Government 	<ol style="list-style-type: none"> Common platform deployed. Number of Ministries using common/shared platforms for e services

Strategic Theme	Key Objectives	Programmes	Programme Outputs/Outcomes	Key Performance Indicators / Measures
Creative Regulatory Reform	<ol style="list-style-type: none"> To implement policy and regulatory frameworks that enable <i>Enlightened Access</i> To streamline ICT governance for improved collaboration/service delivery To designate/create a central implementation and oversight agency to manage national E-Government initiatives 	Regulatory Framework	<ol style="list-style-type: none"> Increase accountability with Government Improve Government's performance, efficiency through structured systems and frameworks 	<ol style="list-style-type: none"> Number of processes/procedures developed institutionalized
		Data Privacy and Electronic Transaction Legislation	<ol style="list-style-type: none"> Create enabling environment for electronic transactions Engender confidence as citizens and businesses interact with Government in an online environment. Increase online transaction/interaction 	<ol style="list-style-type: none"> Number of users transacting online Laws enacted
Targeted Human Capacity Development	<ol style="list-style-type: none"> To enable a new culture across the E-Government workforce using performance- and achievement-based human capital management To develop superb skills, shared standards and key performance targets 	<ol style="list-style-type: none"> Future Skills Audit ICT Based HR Development Platform Institutionalised Training 	<ol style="list-style-type: none"> Build capacity in public sector workforce Effectively plan for and meet the requirements of a knowledge based workforce. 	<ol style="list-style-type: none"> Percentage of public service trained in ICT Number of programmes to train, attract and retain ICT professionals
Improved Government Efficiency	<ol style="list-style-type: none"> To make Government a model ICT user and leader To optimise already existing delivery channels To increase the number of delivery channels To reform backend support processes and operations 	<ol style="list-style-type: none"> Development of government portal Documents Management – Cabinet Pilot Single Electronic Window (SEW) 	<ol style="list-style-type: none"> Enhance public sector responsiveness Enhance diffusion and use of ICT in Government Facilitate cross functional collaborate and improve Government efficiency Improve service delivery, transparency and accountability 	<ol style="list-style-type: none"> Ranking in World Economic Forum's Global Competitiveness Report. Ranking in World Bank's Ease of Doing Business Survey. Number of business conducting online transactions. Number of Gov. documents in electronic format

Strategic Theme	Key Objectives	Programmes	Programme Outputs/Outcomes	Key Performance Indicators / Measures
Effective Cross-Functional Collaboration	<ol style="list-style-type: none"> To improve collaboration and increase knowledge exchange and sharing of experience across Government Ministries, Agencies and Departments To build the capacity for E-Government Research and Innovation 	<ol style="list-style-type: none"> IT Networking Forum Online Forum E-Government ICT Collaboration Award 	<ol style="list-style-type: none"> Build capacity for E-Government-related research and innovation. Dissolve existing unproductive silos, improve collaboration, increase knowledge exchange, and support the sharing of experiences across Government. Improve efficiency of government processes and the effectiveness of government policies. Ensure sound ICT investment, usage and cross functional efficiency. 	<ol style="list-style-type: none"> Percentage efficiency gains in government processes Cost savings accrued due to process efficiency/ cross functional efficiency gains
Enhanced National Security	<ol style="list-style-type: none"> To improve national capability to respond to natural/man-made disasters To create an environment that is safe to conduct business and to carry out day-to-day activities 	<ol style="list-style-type: none"> Mobile Broadband Public Safety Network Computer Security Incident Response Team (CSIRT) 	<ol style="list-style-type: none"> Secure and strengthen the country's critical information infrastructure Instil confidence in systems for business and citizens Develop national capability to respond to cyber threats Create one robust network which will significantly reduce costs and improve operational efficient. 	<ol style="list-style-type: none"> Number of government security agencies on Network Number of threats intercepted and averted Cost savings

Strategic Theme	Key Objectives	Programmes	Programme Outputs/Outcomes	Key Performance Indicators / Measures
Quality Social Services	<ol style="list-style-type: none"> To create and enhance service delivery channels To raise awareness of ICT initiatives in Government via an E-Government communication plan To support the most vulnerable groups in society To support equitable service delivery across various socio-economic classes 	<ol style="list-style-type: none"> Community Service Centres Mobile Government (Belize IT Express) Mobile Communications Platform (SMS) 	<ol style="list-style-type: none"> Cost-effective delivery of Government services to citizens Enabling infrastructure to facilitate the provision of a multichannel platform for the delivery of quality services Enhance Citizens' interaction with Government Reduce digital divide Increase universal access 	<ol style="list-style-type: none"> Number of centres deployed Number of transactions completed via access points per year Number of rural communities served/Rural site visits per year Number of services and subscribers on SMS platform Percentage reduction in service delivery cost
Effective Governance Framework	<ol style="list-style-type: none"> To develop and empower appropriate mechanisms to support the effective implementation and monitoring of the E-Government Policy, Strategy and Plan of Action. To focus on synergising and driving the successful planning and execution of nationwide, government-wide or major ICT initiatives that affect WOG initiatives 	<ol style="list-style-type: none"> Creation of a Central Information Technology Department (CITO) Establishment of Key Support Expert Working Groups Establishment of Inter-Ministerial Council Appointment of True North Group Appointment of E-Government Champion 	<ol style="list-style-type: none"> Efficiency gains and cost savings Greater accountability Collaborative and structured approach to E-Government ICT development 	<ol style="list-style-type: none"> Cost savings in whole of government service delivery Movement in WEF E-Government Ranking % Implementation of E-Government Strategy & Plan of Action
Strategic Theme	Key Objectives	Programmes	Programme Outputs/Outcomes	Key Performance Indicators / Measures

Strategic Theme	Key Objectives	Programmes	Programme Outputs/Outcomes	Key Performance Indicators / Measures
<p>Promote Change Management</p>	<ol style="list-style-type: none"> 1. To manage the organisational, process and business strategy for government efficiency and greater productivity 2. To ensure changes are carried out in a planned, coordinated and structured manner to ensure successful acceptance and adoption by all stakeholders 3. To identify areas for change, perform business process re-engineering, feasibility studies and cost benefit analysis for process change and efficiency 4. To develop marketing and communications campaign to inform all stakeholders of key information of the National E-Government Policy, Strategy and Plan of Action 	<ol style="list-style-type: none"> 1. Establishment of Programme Office 2. Establishment of Business Transformation Office 3. Communications Plan 	<ol style="list-style-type: none"> 1. Streamlined process, eliminate duplication of effort and greater efficiency in the services delivery process 2. Timely, cost effective delivery of WOG projects 3. Cost savings and greater process efficiency 4. Transformed public sector 5. E-Government Plan promoted as one that is progressive, collaborative and engaging. 	<ol style="list-style-type: none"> 1. Number of WOG Projects completed on time, within budget and with assigned resources 2. Number of government processes reviewed / re-engineered 3. Number of Promotion and awareness programmes developed /implemented 4. Impact on International Benchmarking Organisations for informing E-Government Rankings

5. VISION & MISSION

The report also presents the proposed vision, mission and guiding principles for E-Government in Belize. The vision and mission are supported by the policy statements and core policy objectives that guide the roll-out of the roadmap strategies and action plan as discussed above.

Vision for E-Government in Belize

“An Integrated, Collaborative Government Delivering Secure, Quality Public Services that Connect and Empower People”

The vision is designed to eliminate existing bureaucratic silos, to build a collaborative working environment where Government, the private sector and people connect in productive partnerships enabled by the transformative power of ICT. This vision for *Integrated Government* will be achieved by focusing on the following strategic mission tracks:

Mission for E-Government in Belize

Integrating For Greater Collaboration ... “Many Agencies, One Government”

Collaborating For Better Service ... “Working Together Works”

Serving People Through Quality Connections ... “Government At Your Service”

In support of the above, the following **Guiding Principles** are intended to inform all E-Government Policy interventions:

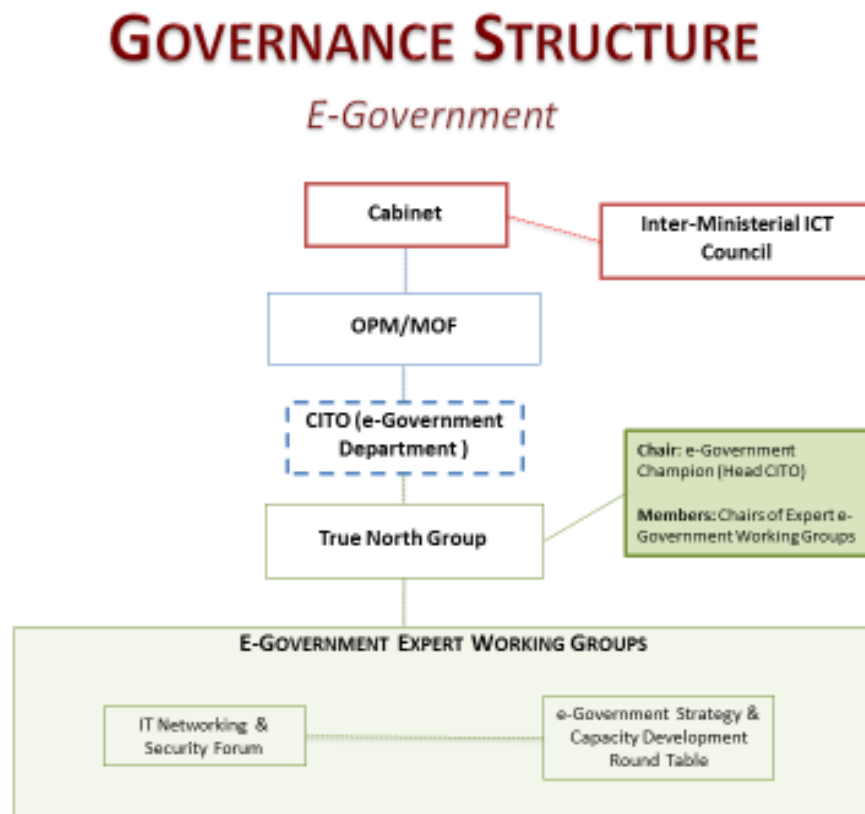
11. **Efficiency:** development and effective delivery of state-of-the-art e-services via reliable infrastructure;
12. **Transparency:** Design of standardised services that are ethical, equitable and protect individual privacy;
13. **Resilience:** Delivery of robust, dynamic, modern solutions that empower citizens, residents and visitors;
14. **Integration:** Interconnected, harmonised E-Government services based on universal service delivery;
15. **Service:** Shaping of policies, systems, frameworks and attitudes that facilitate and empower people.

6. GOVERNANCE FRAMEWORK

No policy framework can be effective or sustainable without viable mechanisms for programme management to give life to the policy design.

The report provides a suggested structure for managing the E-Government Policy and Strategy and implementing the Plan of Action. The Governance structure calls for the designation of a Champion at the highest level of Government; and establishes an Inter-Ministerial ICT Council of Cabinet to oversee and drive the overall National E-Government and ICT Innovation agendas for Belize.

The Governance framework also recommends that Government establish Expert Working Groups (EWGs) to guide activities related to the various thematic areas of the National E-Government Agenda. These would be made up of representatives from business, government, academia, and civil society, as well as other key constituencies. They would assist in validating plans, programmes and activities, as well as public and/or online consultations at the national and local levels. The Chairpersons of the EWGs will form a True North Group conceptualised to sign off on plans, programmes and activities before these are presented to Cabinet, report to the Inter-Ministerial ICT Council of Cabinet through CITO, and form part of the governance framework for implementation of E-Government strategies.



The structure also establishes a central implementation and oversight department to manage the national E-Government agenda. The department will have responsibility for the provision of ICT consulting and support services to Government Ministries, Divisions and Agencies with the aim of ensuring effective alignment, co-ordination, security, interoperability and cost effectiveness of ICT related projects and initiatives across Government.

This Department will be set up to be the ICT implementation arm for whole of Government initiatives with a focus on the optimal deployment and use of ICTs within Government and the effective delivery of Government e-Services.

Currently there exists a Central Information Technology Office (CITO) that performs, to a limited extent, some of these functions. The report proposes that the current mandate given to CITO be expanded and CITO be empowered to undertake these additional functions under this new governance structure. CITO will be rebranded, giving consideration to its new mandate, as the Central Information Technology Department.

One of the critical factors responsible for the slow uptake and implementation of E-Government in many countries is the lack of a government champion who has the right skills, knowledge, attitude and leadership qualities, to take responsibility and ownership for the implementation and roll out of government strategies for improving quality of services to the citizens and businesses.

In recognition of this the report proposes that an E-Government champion be appointed, with the mandate of executing on the E-Government Policy, Strategy and Plan of Action. This position will also head the Central Information Technology Department.

7. CHANGE MANAGEMENT

The consultancy also identified the need to undertake change management activities to manage the organisational, process and business strategy that are likely to occur due to the introduction of this E-Government Policy, Strategy and Plan of Action. It is recommended that that these changes are carried out in a planned, coordinated and structured manner to ensure successful acceptance and adoption of by all stakeholders. The report identified three key areas for immediate intervention with respect to change management, as follows

1. Establishment of Programme Office

The establishment of a programme office under CITO to plan, coordinate and manage the delivery of projects identified under the E-Government Plan of Action is critical for success. One focal point for the delivery of whole of government services will assist in the streamlining of process, eliminate duplication of effort and bring greater efficiency in the delivery of services process.

2. Establishment of Business Transformation Office

The Report also identifies the need to establish a Business Transformation Office under CITO comprising of business and technical analysts and change management specialist. The office will work with business owners within government to identify areas of change, perform business process re-engineering, feasibility studies and cost benefit analysis for process change and efficiency.

The Business Transformation Office will work closely with the ongoing Public Sector transformation initiative under the ministry responsible for public administrative services.

3. Communications Plan

It is essential that a proper communications plan be developed to inform all stakeholders of key information of the National E-Government Policy, Strategy and Plan of Action ICT Plan i.e. the rationale, benefits, impact, approach, timeline, and assistance plans.

The communications plan will detail the delivery and execution of a communications calendar, and the development of necessary communication kits. The communications plan will also instil a high level of awareness of the E-Government Agenda within Belize and internationally.

Marketing and awareness campaigns will also be used to target all stakeholder groups – community, businesses and the Government, and feature engagement events, promotions and awards prominently.

The **National E-Government Policy, Strategy and Plan Action** concludes with a National E-Government Action Plan detailing projects that are either in progress and those that are scheduled to start in the coming year. The Action Plan clearly illustrates that an integrated effort amongst Government, private sector, and civil society will be instrumental in the successful roll out of the Strategy. It further highlights that CITO will need to work in collaboration with other ministries, agencies, public and private sectors in the execution of its mandate.

The Government of Belize is confident that development and expansion of the E-Government sector will lead to many benefits for the citizens of the nation. Improvements such as increased citizen participation and a cultural drive for innovation will lead to a more inventive, informed, knowledge-based and IT savvy society. These elements will allow Belize to be more competitive regionally and globally.

Resulting advances in Global ICT Rankings will promote and engender investor confidence while creating an improved quality of life for the populous. Most importantly expansion of the E-Government sector will mean that citizens and Government will be able to communicate in unprecedented ways.

1.0 INTRODUCTION

“Governments and public organisations are slowly realizing the power of ICT for redefining governance and providing new modes of engagement with citizens. However, institutional change remains slow and hard. For ICT to be used effectively, technology needs to be matched to the local context and be sensitive to people’s needs.”

The Global Information Technology Report 2010-2011

1.1 ICT IN THE 21ST CENTURY: A WHOLE NEW WORLD

The persistent global economic recession has thrown many Caribbean small states into deep crisis, forcing Governments to re-think their traditional approaches to development. ICTs are breaking down silos, hierarchies and structures of control, blurring lines between industry sectors, increasing efficiency at all levels in the production cycle, and revolutionising entire areas of economic activity.

What is more, the age of always-on social media is transforming the way people live, learn, play, work, socialise and effect change in a complex global environment. The future of public and private sector growth is personalisation: content, products, technologies and services built around the desires of individual corporations, small businesses, citizens and consumers (Babb, 2003, 2006, 2008, 2010, 2012, 2013).

Technology is also driving convergence at the consumer end, providing the ability to access multiple mobile services through a single device, including iPads, tablet PCs, mobile phones, and game consoles. This convergence is having a divergent effect for service providers, who can no longer focus on one type of sector, consumer, medium, or device, but must develop for and exploit services from diverse industries via the Internet and multiple digital media and communications channels. These changes represent an evolution from mass society and mass media to the digital, networked society with its personalised, niche media, products and services. This has implications for every aspect of modern life, including the way governments interface with their citizens (Ibid).

Indeed, citizen expectations have changed significantly. Yet, the public sector has often been slow to respond. At the same time, governments are faced with shrinking resources as tax revenues plummet or remain stagnant in countries still troubled by sluggish economies, rising costs and, for many, an inability to provide the types of seamless service solutions citizens truly desire. Coupled with uncertainty as to when the economic recession will end and a more demanding citizenry, many governments find themselves challenged to take a lead role in helping to guide this social and economic transformation.

These realities place immense demands on a wide range of public service players, for whom the pressure to deliver value is immediate and critical. Today’s civil servants find themselves caught between the curse of budgetary constraints and the constant demand for increased efficiency on one hand and, on the other, pressure to produce improved social outcomes from citizens increasingly exposed to superior customer service and sophisticated product offerings from around the world. In this context of rapid economic and social transformation, speed of implementation is critical to future success.

Thus, in order to support CITO in developing appropriate E-Government frameworks that support achievement of the goals set out in various national development plans and strategies, including **Horizon 2030** and Government’s **Medium Term Development Strategy 2010-2013**, the CTU has designed this E-Government Policy as the first of five components in a holistic national programme to leverage ICT frameworks as a means of helping to catapult the country to its next stage of development. The five components of this holistic national programme are:

1. An E-Government Policy that outlines the wider vision, mission, guiding principles and core objectives that are to shape the delivery of government services in Belize during the next three to five years;
2. A set of roadmap strategies for the design of effective E-Government platforms based on the agreed E-Government Policy framework;
3. An E-Government action plan that gives direction to the roadmap, detailing the steps, timelines, potential partners and/or resources to implement the strategies and achieve the vision for E-Government in Belize;
4. An ICT Innovation Policy that outlines the wider vision, mission, guiding principles and core objectives that are to shape the development of ICT and innovation in Belize during the next three to five years;
5. A set of high-level projects and roadmap strategies for the design of effective ICT Innovation platforms based on the agreed ICT Innovation Policy framework.

As the 21st century unfolds, it is becoming clear that the structures built by earlier generations to manage the affairs of state are, largely, in tatters. As the old models fail it is imperative that developing countries like Belize design new ones that allow them to unleash the full potential of their citizens to create lifelong value.

All indications are that the Government of Belize recognises this moment in the country's history as being what analysts refer to as a "strategic inflection point", defined as "a moment of dramatic change, especially in the development of a company, industry, or market (<http://www.thefreedictionary.com/inflection+point>)."

Given the existence of such a moment, this E-Government Policy is tailored to allow CITO to partner with other key public sector players in capitalising on the country's assets and exploiting existing opportunities presented by the modern revolution in ICT. The desire to mitigate some of the threats facing Belize in a competitive global environment while also overcoming inherent as well as man-made weaknesses that prevent key sectors from realising their developmental potential is also one of the key goals of this Policy. To this end, the Policy identifies the following seven (7) strategic themes that will guide E-Government development and implementation in Belize over the course of the next three to five years.

1. **Public Sector Infrastructure Development:** Building out a world-class Government Wide-Area Network (GWAN) for the Belize public sector using common and shared platforms that enable delivery of robust, seamless, user-friendly, end-to-end E-Government and ICT services internally and to external clients.
2. **Creative Regulatory Reform:** Designing and implementing pioneering policy and regulatory approaches to ICT adoption and usage in the public service that allow E-Government to flourish in a secure environment.
3. **Targeted Human Capacity Development:** Shaping public sector frameworks for training, education and career-long learning that bridge significant existing deficiencies in individual and overall human capacity.
4. **Improved Government Efficiency:** Enhancing public sector responsiveness and the diffusion and use of ICT by upgrading existing delivery channels, creating new channels for delivery, designing compelling new content and services, changing the culture of bureaucracy and developing appropriate governance models.
5. **Effective Cross-Functional Collaboration:** Developing programmes and initiatives to build capacity for E-Government-related research and innovation, dissolve existing unproductive silos, improve collaboration, increase knowledge exchange, and support the sharing of experiences across Government.

6. **Enhanced National Security:** Applying ICT frameworks uniformly across all national security-related public service entities in ways that remove existing silos, promote close collaboration, encourage active exchange of information, and contribute to a national sense that law and order is being appropriately maintained.
7. **Quality Social Services:** Transforming the way Government engages with key clients and stakeholders such that they are placed at the centre of national development through the efficient sharing of information and the fast, seamless, secure, cost-effective delivery of Government services via modern ICT platforms.

The remainder of this introductory Section 1 outlines more fully what E-Government is, presenting a simplified service delivery model that explains infrastructure requirements, various mechanisms for the supply of services to target subjects, and the necessary enablers for successful E-Government provision. The section then introduces three conceptual frameworks the CTU's team of consultants used to shape the policy frameworks contained herein, namely the ***Six-Layered Model of Societal Access, An 'Unbroken Chain of Proof for E-Government'***, and ***The 7 Core Functions of Government (+1)***.

Section 2 analyses the special brand that is Belize, highlighting national development considerations relevant to the design of an effective E-Government framework, including the perceptions and experiences of key stakeholders concerning the areas requiring timely intervention. The section also incorporates a view of CITO, its existing makeup, functions, achievements and challenges. Section 2 ends by suggesting 'a new standard for Belize' given the very specific challenges and opportunities the country now faces.

Section 3 addresses Belize's technology ranking based on a number of key global indices, benchmarking the country against the best in class in an agreed set of core dimensions.

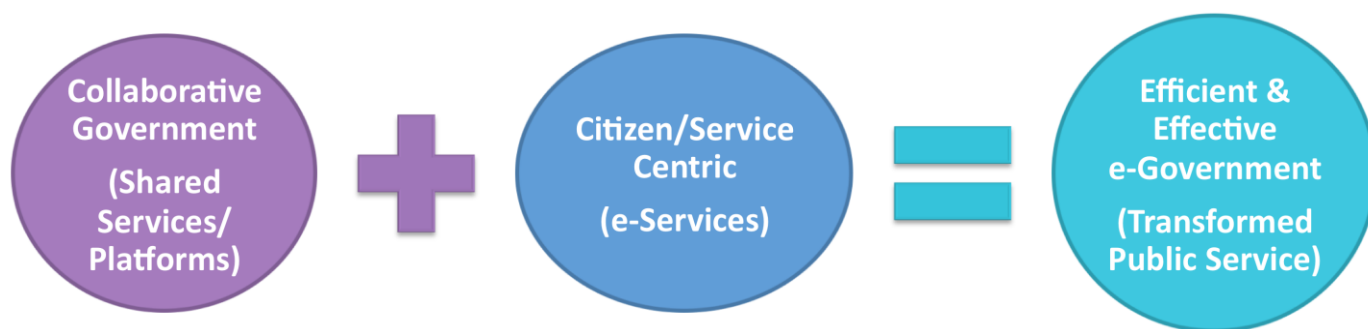
Section 4 presents the E-Government Policy framework, including the proposed vision, mission and guiding principles. This section also sets out the core policy objectives and corresponding policy statements that will guide roll-out of roadmap strategies and action plans with respect to infrastructure development, regulatory reform, human capacity development, Government efficiency, cross-functional collaboration, national security, and delivery of quality social services.

Section 5 speaks to the institutional framework for E-Government, explaining various types of E-Government models, presenting the recommended new governance framework, and addressing issues related to change management, infrastructure, and e-services.

The Conclusion at Section 6 summaries the strengths, weaknesses, opportunities and threats facing Belize as they relate to E-Government, reinforcing the reasons why action is now imperative if Government is to deliver on the developmental promise of the nation.

1.2 UNDERSTANDING E-GOVERNMENT

The purpose of E-Government is to bring governance closer to people through major improvements in the delivery of Government services and provision of information in ways that are most convenient to citizens and businesses. In essence, therefore, it is about transforming the way Government does business, going beyond the automation of existing procedures to transforming how the public service interacts with its various constituencies. Through E-Government, ICT is integrated into key functions to bring about greater efficiency in the delivery of government services, thereby increasing responsiveness to citizens and businesses, and improving the reach of Government services into previously marginalised communities. In short, E-Government is the use of ICT to deliver services that are secure, innovative, high performing, interactive, progressive, evolutionary, integrative, and customer centric.



Typical Government services for which there might be shared platforms or models for collaboration include applications for birth certificates, driving permits and licenses as well as renewals; applications for passports and/or visas and renewals; Social Security or National Insurance interfaces; payment of taxes as well as refund of taxes; applications for social services and grants; customs clearances and payment of customs duties and/or taxes; company registrations and renewals; and applications by foreign investors and/or firms to set up in-country operations as well as to track the status of those applications.

Citizen centric service delivery enables such Government services to be available 24 hours a day, seven days a week, 365 days a year ... anytime, anywhere, without significant interruption or delay. This results in fewer visits to Government offices, fewer steps or forms to complete transactions, and availability of services closer to home or accessible from the home, business, or any remote location, subject to the necessary security protocols. At its ultimate level, citizen centric service delivery provides a 'one-stop-shop' to the whole of Government, including safe, secure, transparent "cashless" systems able to benefit from economies of scale in service delivery.

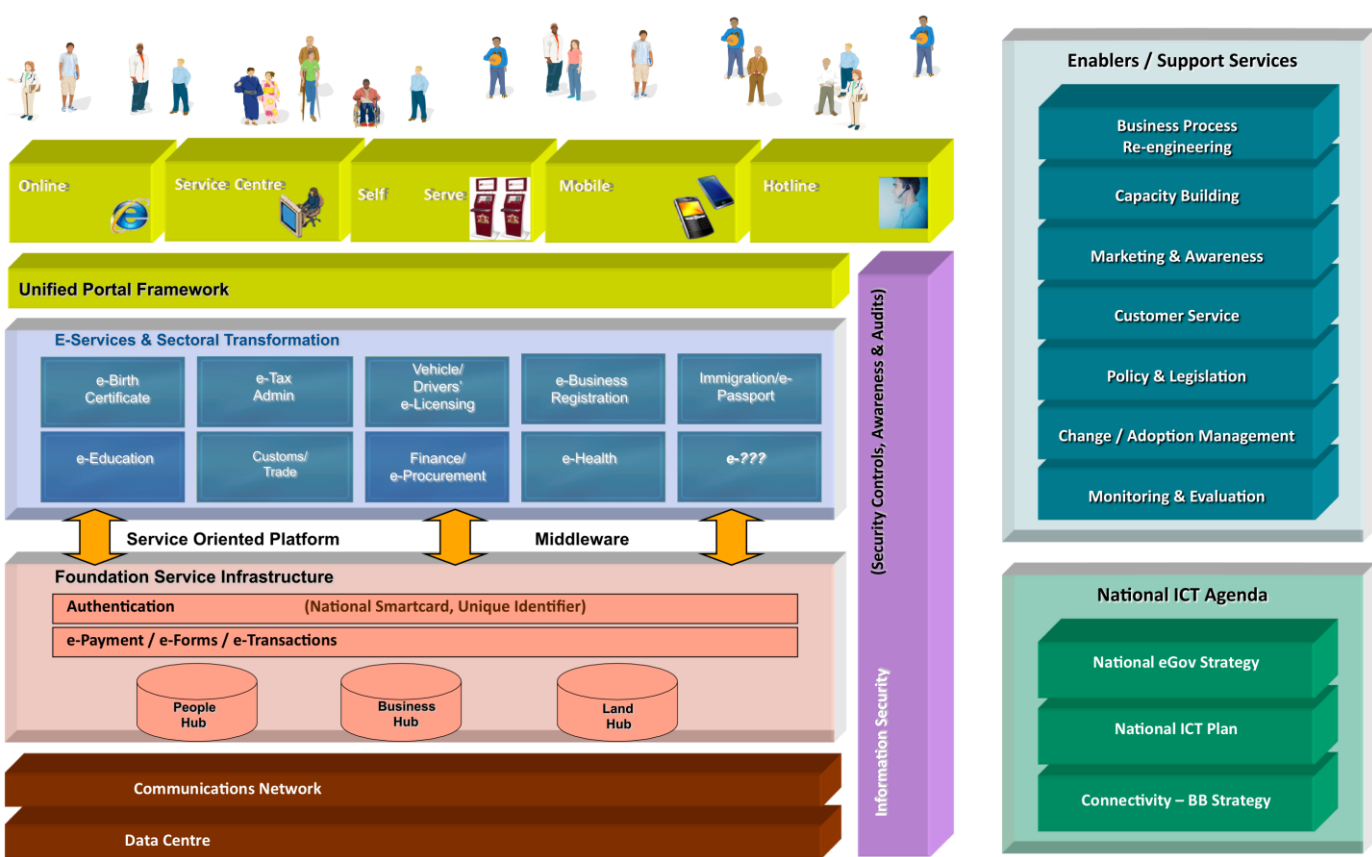
If applied correctly, efficient, effective E-Government results in a transformed public service. It might, in this regard, include service delivery based on the following configurations:

1. Government-to-Government (G2G): Online interaction between one set of Government organisations, departments, and authorities and others. G2G typically reflects the following two service delivery models (<http://en.wikipedia.org/wiki/Government-to-government>):
 - o **Internal:** Linking a single Government's departments, agencies, organisations and authorities to each other, for example via an integrated online government gateway that allows anyone to access any Government services available via the Internet; and

- External: Linking the information systems of multiple Governments, one example being integration of CARICOM member states' immigration and customs functions for security purposes to enable a single regional travel space during the 2007 IIC Cricket World Cup.
2. Government-to-Business (G2B): Online sale/procurement of local and central Government goods and services to the commercial business sector;
 3. Government-to-Citizen (G2C): Online interaction of local and central Government with private individuals in ways that develop closer relationships between Government and citizens/residents; and
 4. Citizen-to-Government (C2G): Creation of channels for citizens to participate in and contribute to Government policy development, for example via e-participation and e-democracy initiatives.

What follows is an E-Government Service Delivery Model that illustrates infrastructure requirements, mechanisms for the supply of services to target subjects, and the necessary enablers for successful E-Government provision.

E-GOVERNMENT SERVICE DELIVERY MODEL



Trinidad and Tobago

By way of explanation, the horizontal lime-green layers at the top left of the model are access layers representing Government's possible channels of interaction/interface with and service delivery to businesses, stakeholders, and

citizens. These might include online mechanisms; service centres; self-serve kiosks; mobile devices; and express buses equipped with digital access, telephone hotlines and the like.

The horizontal layer in blue and light blue represents agencies/ministries/departments and the information, services and/or processes they might provide/utilise. These are likely to encompass everything from Government entities responsible for healthcare to those responsible for immigration, taxation, education, customs and trade, business registration and regulation, transportation and citizen registration.

The foundation service infrastructure beneath the blue layer might be thought of as the tier that authenticates users and services, providing unique identifiers for both user and supplier that validate all parties as legitimate.

The common infrastructure layer sits as the model's foundation. Represented by the horizontal brown pillars, it is simply the shared communications and data infrastructure that enables Internet connectivity and access to digital information.

Completing the core of the model are the security controls and protocols vital to the safe delivery of online services and information, the vertical lavender-coloured column near the model's centre. At the far right of the model are those activities and frameworks that support efficient E-Government delivery, such as capacity building, marketing and awareness, policy and legislation, and monitoring and evaluation, among others.

Looking across countries, the public sector's engagement with ICT has gradually evolved from addressing the quality and efficiency of internal government, through making public service offerings available across traditional as well as electronic channels, to promoting administrative and institutional reform, engaging citizens in policy- and decision-making processes, and (more recently) directly supporting policy and development goals in health, education, security and other sectors.

This evolution has incorporated a transformation from technological (ICT in Government), through organisational (Electronic Government), to socio-economic (Electronic Governance) orientations. Today in most countries, the focus is turning towards specific policy and development goals in business, trade, health, education, environment, governance, security and other sectors, taking into account specific local conditions and priorities. Pursuing "better government" puts the focus on capacity development, electronic commerce, research, policy support, education and network development. This in turn requires achieving productive relationships between different parts of government, as well as between government and citizens and businesses at the national as well as the regional levels. The role of different actors varies between countries but, in general, the government is expected to engage all relevant parties in innovation, collaboration and action to generate public value, typically requiring legal, institutional, cultural and other transformations.

In order to pursue its vision, government must set performance targets and assess its progress in satisfying such targets. It is essential to find a way of defining both input and output measures, so as to be able to determine the level of productivity in key respects. At the end of the day, performances in specific respects stand to be compared with what resources have been allocated and consumed to enable them. In order for measures of performance to be meaningful, however, it is important to move away from simple quantitative estimates and incorporate serious considerations of relevance and quality improvements.

The state of Belize's business environment requires careful consideration in this regard. Typically, a government would be concerned with generating income through its tax regime, tariffs and perhaps export duties. At the same time, it also wishes to allow economic expansion to support higher revenues, a stronger state and more agreeable conditions for its population, and therefore would have reason to avoid imposing a burden on business through

excessively strict restrictions or bureaucratic practices. As part of the picture, it is important to be aware of which conditions are most problematic for businesses in Belize and compare across similar countries.

This policy document therefore makes comparisons with Trinidad and Tobago, Barbados, and Iceland. The WEF's 2012 GCI suggests tax rates, corruption, policy instability, access to financing, inefficient government bureaucracy, and poor work ethic stand out as particularly problematic in Belize. Interviews and examination of the factual conditions on the ground have verified what is behind these perceptions. In Belize, entrepreneurs have to subject themselves to high Government charges just to have the right to set up a company, which runs against and impedes entrepreneurial activity and also hampers the growth of SMEs. This situation is interrelated with the dearth of jobs in existing enterprises, contributing to the permanently high level of unemployment and presenting young people with few avenues forward to establish themselves either in the labour market or as entrepreneurs.

What are the fundamental sources of such issues? In a nutshell, they are all related to governance. The concept of governance is itself multifarious. The impact of governance can be measured in two ways, by "effectiveness" and "rule of law" respectively. On both these measures, Belize is ranked relatively weakly compared with countries at a similar development level, although considerably higher than a country such as Haiti (see ICT Innovation Policy). In short, putting in place an appropriate governance model for ICT, E-Government and innovation meets with particular challenges due to the cross-cutting and also development-oriented nature of the agenda. This topic involves practically all parts of government and society. It also requires gaining acceptance for the introduction of new tools and the reorganisation, or outright abolition of, some practices. Since such tasks are almost bound to run into resistance, it is essential to put in place strong mandates and mechanisms underpinning effective horizontal coordination and broad stakeholder involvement.

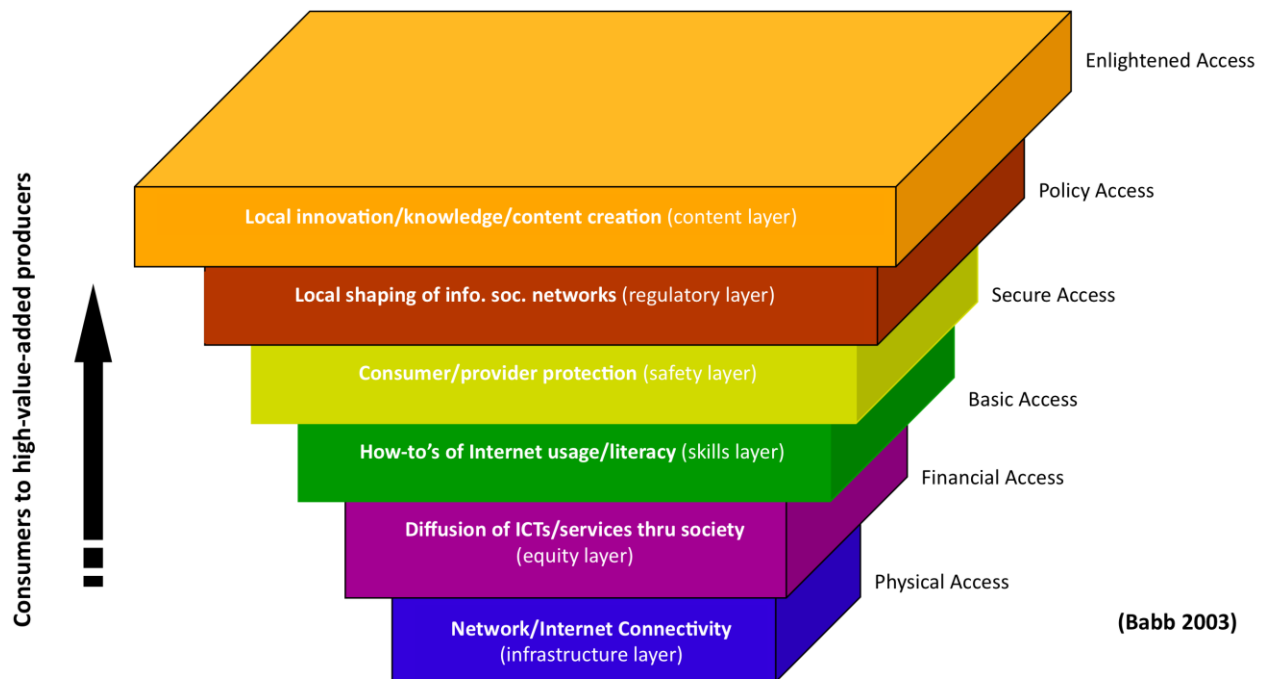
1.3 GOVERNANCE WITH PEOPLE IN MIND: 3 CONCEPTUAL FRAMEWORKS

Any meaningful analysis as the basis for policy design and implementation requires the application of conceptual frameworks or mental maps through which to think about and treat to ICT and E-Government development. The following subsections suggest three conceptual frameworks based on best-practice criteria that might assist Belize in developing E-Government platforms that serve the interests of people. These are the ***Six-Layered Model of Societal Access***, ***An Unbroken Chain of Proof for E-Government***, and the ***7 Core Functions of Government (+1)***. Taken in concert, they provide a more nuanced understanding of ICTs and E-Government development in the context of the new global realities with which Belize is being faced. Collectively, they assist in identifying the gaps that must be bridged if the country is to leverage these frameworks to support sustained national development.

1.3.1. THE SIX-LAYERED MODEL OF SOCIETAL ACCESS

There are six aspects to effective use of ICT frameworks that together create a six-layered model of societal access without which developing countries cannot build local innovation and foster knowledge creation. These are physical access, financial access, basic access, secure access, policy access, and enlightened access, illustrated in the diagram that follows (Babb 2003).

Six-Layered Access Model



With the growth of e-commerce, E-Government and e-communities, as well as the consumption of online products and services, **physical access** in the form of appropriate ICT infrastructure is required to engage with the new digital networks. This includes access to hardware, software, dial-up connections, high-speed connections, and general network connectivity (Ibid).

Financial access speaks to the affordability of telecommunication's and ICT networks, products and services. It is the ability of governments, businesses, organisations and individuals to meet the costs required to (a) join the global network of networks that is the Internet, and (b) take advantage of costly high-value-added services and knowledge resources once they get there. This is diffusion throughout society, including affordability at every level for broader numbers of people, in homes as well as through public facilities (Ibid).

Researchers often refer to obstacles to the realisation of **basic access**, which is another way of speaking about people's levels of language literacy and education as well as their ability to understand new ICT frameworks and learn how to use them effectively. This includes the capacity to engage with new digital systems, hardware, software, products, and services (Ibid).

Secure access refers to the level of security required to ensure consumer, merchant and participant protection, boost confidence and guarantee personal privacy. This is the level of certainty participants have that their online

transactions are protected. Secure access enables the creation of local and global digital marketplaces for the safe delivery of digital financial, business, government, and social services (Ibid).

Policy access is about writing the rules of the game locally, regionally and globally to ensure good governance of the Internet and other ICT-related mechanisms, whether such governance is concerned with management of telecommunications and other services sectors, liberalisation of financial sectors or design and management of intellectual property rights agreements. There are three aspects to policy access: design of the actual policy frameworks; crafting of appropriate legislation and/or regulations to give policies the force of law; and enforcement or regulation that results in practical application and resultant change (Ibid).

The ultimate level of access – **enlightened access** – allows actors to effectively absorb and apply innovative information, tools, products, processes, applications and services emerging from all sectors of a sophisticated global economy while also amassing value from the development and distribution of their own knowledge creations. Enlightened access might be thought of as the content or innovation layer of the access model (Ibid).

Each of these six aspects of access might be seen as strategic parts of an organic whole, a set of components that, when present and working in concert, form a holistic social framework that facilitates the creation and diffusion of knowledge and innovation. Each layer feeds into and supports the other layers to a point where the ultimate goal of knowledge creation and innovation may begin to be met as a society achieves enlightened access to the technological tools and communications frameworks of the information age (Ibid).

Depending on a country's historical experience, stage of development and its international standing, its levels of access, and thus the limitations and opportunities with which it is faced in the contemporary global economy, differs significantly from others in the community of nations (Ibid).

When presented with this conceptual framework, key stakeholders in Belize recognised gaps in the national ICT framework at every level of the access model. The CTU consultant team analysed those gaps and, in tandem with other research and benchmark analysis, developed the E-Government Policy framework on the basis of their findings. The resultant policy objectives and accompanying policy statements have been designed to fill the most critical gaps over the course of the next three to five years.

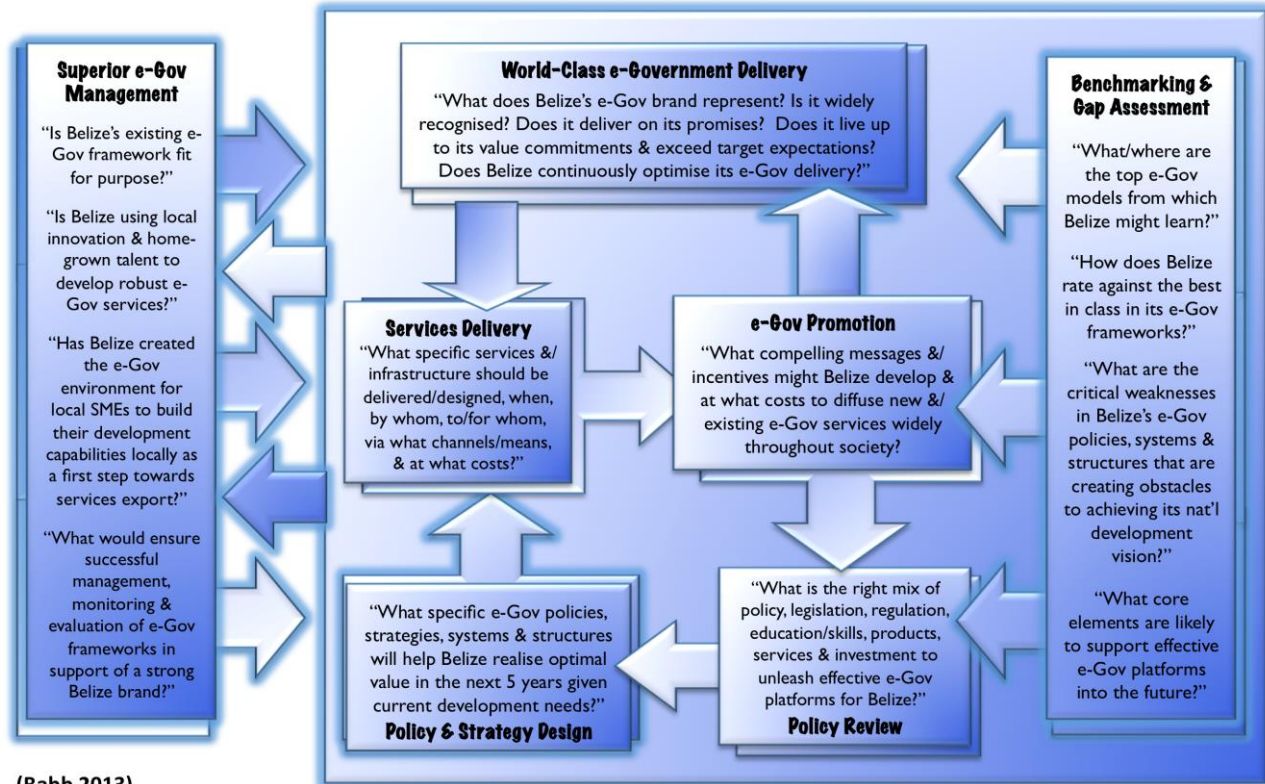
1.3.2. AN 'UNBROKEN CHAIN OF PROOF' FOR E-GOVERNMENT

“Countries are judged by what they do, not by what they say, as they have always been ... In order to achieve a better reputation, as Socrates is said to have observed, we must endeavour to be as we desire to appear. ... it is necessary to provide people with proof of one's virtues ... Places require new and dedicated structures to coordinate, conceive, develop, maintain, and promote such an unbroken chain of proof. None of the traditional apparatus of trade or government is fit for such a purpose.”

Simon Anholt, *Beyond the Nation Brand*, 2011.

WORLD-CLASS E-GOVERNMENT DESIGN

Supporting an 'Unbroken Chain of Proof'



The second conceptual framework informing this E-Government Policy is based on national brand image expert Simon Anholt’s concept of “an unbroken chain of proof”, as detailed in the preceding self-explanatory visual. It suggests that in order to be effective, E-Government platforms must be designed using a logical process that uncovers what is unique about a country, and then builds an E-Government brand around those peculiar attributes and needs. Equally important having designed the framework is to ensure that delivery, monitoring and evaluation are sufficient to safeguard and enhance whatever promises the brand makes to its customers and partners.

1.3.3. 7 CORE FUNCTIONS OF GOVERNMENT (+1)

The seven core mandates of democratic government in a stable society are to maintain law and order; protect public health; protect the most vulnerable; ensure the efficient delivery of social services, including healthcare and education; preserve public spaces in the public interest; safeguard the national identity; and protect consumers in the marketplace. Many countries initially designed E-Government frameworks not specifically to fulfil those seven core mandates, but to support public revenue collection, allocation and oversight. This E-Government Policy is crafted on the premise that the seven core mandates place people at the centre of development, where they rightly belong, and ought to be counted, where appropriate, among the key drivers of the Policy framework.

FUNCTIONS OF GOVERNMENT

In a Democratic Society



There is no law requiring all of ↑ to be delivered from within a traditional public sector

(Babb 2013)

2.0 THE SPECIAL BRAND THAT IS BELIZE

Of the member states of the Caribbean Community (CARICOM), Belize is in an enviable position on several fronts. It is a position that, while it has its weaknesses, also exhibits distinctive strengths and provides competitive opportunities Belize does not appear yet to have maximised. In particular, Belize may claim to possess degrees of cultural, racial, ethnic, ecological and biological diversity that are rare and precious commodities even in a Caribbean region known for its ecological, ethnic and creative range. Belize has a varied history and cultural heritage, stretching back to the ancient Maya civilisation, including the Arawak and Carib people, the British and Spanish and their descendants, including the *Garifuna*. The country also boasts numerous Maya ruins and artefacts that draw tourists, and most unfortunately looters, year round. Its geographical location and abundance of natural resources also contribute to its uniqueness. In many ways, Belize remains unspoiled, brimming with opportunity for those with the imagination to see the tremendous possibilities and the determination to contribute to the country's development in spite of some of the obvious challenges. Indeed, several of these challenges are man-made in nature, likely to be overcome through the right mix of policy and action on the part of Government with the intent to unleash the latent potential of the private sector and civil society to fuel Belizean development.

2.1 THE BELIZE FACTOR

Ecological diversity and a profusion of terrestrial and marine species make Belize a key part of the Mesoamerican Biological Corridor. The country can claim an impressive 300-kilometre-long barrier reef, part of the 900-kilometre Mesoamerican Barrier Reef System that runs from Cancun on the north-eastern tip of the Yucatán Peninsula through the Riviera Maya to Honduras. It is Belize's top tourist attraction, celebrated around the world as an exceptional scuba diving and snorkelling experience. Rounding out this triumvirate of world-class attractions are the Maya ruins of Belize, including a number of renowned and historically important pre-Columbian Maya archaeological sites, all part of the Mesoamerican Culture Area.

These are rare and coveted endowments in a world where increasing numbers of people seek ecologically and environmentally appealing vistas in which to live, play, work and/or invest. Yet, there are disturbing reports that key elements of this invaluable national patrimony are being harmed through man-made and environmental interventions. While the linkage to a National E-Government Policy might not be apparent at first blush, the growing need for the Government of Belize to find creative ways to protect the national birth right in the interest of future generations simply cannot be ignored.

Indeed, Belize's diversity as a nation extends to its population, which is comprised of many races, ethnic mixtures, cultures and languages. Belize is the only country to hold full membership in three key regional organisations: CARICOM, the Community of Latin American and Caribbean States (CELAC), and the Central American Integration System (SICA).

2.2 NATIONAL DEVELOPMENT CONTEXT

Mirroring the variety inherent in its national makeup, Belize's economy is driven by a mix of factor-based or 'primary' activities in the areas of forestry, agriculture, fishing, and oil and gas; 'secondary' activities including energy, construction, and manufacturing; and services within the 'tertiary sector', mainly in the area of tourism.

There is room for significant upgrade of the country's knowledge, skills, capacity and technological capability in the primary and secondary sectors of economic activity through the creative application of new digital information and communication technologies, products and services, located largely in the 'tertiary' sector of economic activity.

Indeed, traditional primary and secondary sectors might leverage services and/or experiences from the 'tertiary' sector to supplement and add value to core products and production processes, thus also strengthening and extending the 'tertiary' or services sector as a whole. This movement up the value chain in all sectors might be enabled by the digital technology revolution, with the potential to unleash innovation within both the public and private sectors in the interest of national economic and social development.

This is particularly significant given the fact that from an economic point of view, the World Bank classifies Belize as a lower-middle-income developing country. While the country is reported to have the second highest per capita income in Central America, that figure conceals the significant income disparity between rich and poor. Independent assessments suggest more than four of ten people in Belize live in poverty.

Based on the United Nations Development Programme's (UNDP) 2013 Human Development Report (HDR) and Human Development Index (HDI), Belize's score of 0.702 ranks it at No. 96 out of 187 countries in the world, above the average of 0.64 for countries in the medium human development group but below the average of 0.741 for countries in Latin America and the Caribbean (UNDP, HDR, Explanatory Note on Belize, 2013, pp. 3). The following

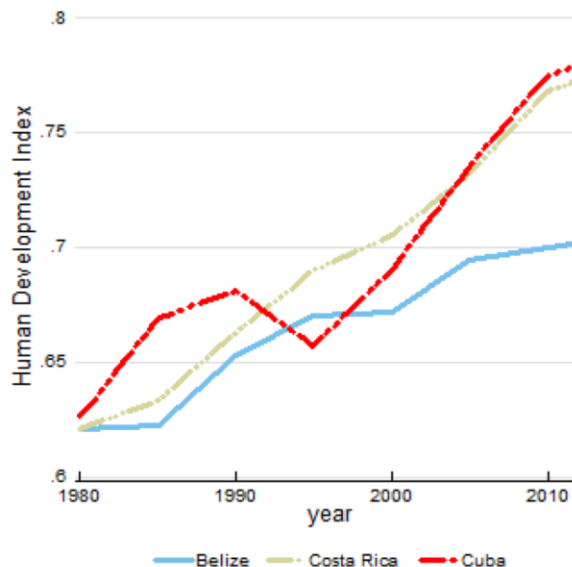
table shows that in Latin America and the Caribbean (LAC), Bahamas and Jamaica, countries similar to Belize in population size, have HDIs of 49 and 85 respectively (Ibid).

Table B: Belize’s HDI indicators for 2012 relative to selected countries and groups

	HDI value	HDI rank	Life expectancy at birth	Expected years of schooling	Mean years of schooling	GNI per capita (PPP US\$)
Belize	0.702	96	76.3	12.5	8.0	5,327
Bahamas	0.794	49	75.9	12.6	8.5	27,401
Jamaica	0.73	85	73.3	13.1	9.6	6,701
Latin America and the Caribbean	0.741	—	74.7	13.7	7.8	10,300
Medium HDI	0.64	—	69.9	11.4	6.3	5,428

Relative to other countries, one might also track the long-term progress of Belize based on its geographical location and HDI value. In this regard, between 1980 and 2012, Belize, Costa Rica and Cuba experienced different degrees of progress toward increasing their HDIs, as illustrated in the figure below (Ibid).

Figure 2: Trends in Belize’s HDI 1980-2012



Aside from its pressing developmental concerns relative to countries with similar endowments, other challenges for Belize include its heavy foreign debt burden, continuing high levels of unemployment, growing drug trade, high crime rate, and the existence of one of the highest HIV/AIDS prevalence rates in Central America.

Perhaps most regrettably, underdeveloped infrastructure continues to be a major inhibitor to economic growth. Belize is, indeed, said to have the most expensive electricity in the region, and its telecommunications and ICT sectors are lagging behind countries of similar potential.

This is a serious threat to any attempt by Government to diversify and grow its economy. Certainly, an excellent communications infrastructure is vital in order to encourage people to share ideas and to collaborate across the country as well as with the Diaspora, which is an important source of creativity, ideas, financing and know-how. The same applies to the global business and investment community, which requires world-class infrastructure to capitalise on its core efficiencies.

Nevertheless, tourism is one of Belize's main foreign exchange earners, joined by agriculture and services. Primary commodity exports include petroleum, citrus, sugar, and bananas. Despite the contribution of other sectors to the country's GDP, experts suggest the economy is still largely uncompetitive with too high a dependence on tourism and too high a degree of taxation. Exacerbating these economic challenges are major barriers to business climate efficiency, which Belize will have to address in order to attract appropriate investment, expand exports, and bolster sustainable growth. Again, the role that high-quality ICT technologies and infrastructures might play in this regard cannot be underestimated.

Finally, although Belize has the lowest population density in Central America, it is significant that about 16 percent of Belizeans live abroad while immigrants make up approximately 15 percent of the internal population. It is worth mentioning again that Belize is likely to succeed in exploiting the value of this sizeable Diaspora only with a creative set of ICT-related policies that draw on the tremendous potential of the new digital technologies and media frameworks to connect people, ideas, opportunities and financing. This is especially important when treating to the issue of equipping the country's citizens to take advantage of the opportunities inherent in the digital information age and, more than that, unifying an increasingly diverse people into a cohesive nation.

The fact that immigration from the Central American countries of Guatemala, El Salvador and Honduras accounts for an increasing share of the country's population growth is quite notable when understood in the context of Belize's steadily declining fertility rate. These new immigrants are changing the face of what is a former British colony, resulting in more native Spanish speakers than English or Creole speakers despite the fact that English is the country's official language. Moreover, Central American immigrants are establishing new communities in rural areas, in stark contrast to the trend towards urbanisation seen in neighbouring countries.

These demographic and developmental factors likely influence the level of adult literacy, which stands at 76.9 percent, as well as unemployment, which is approximately 19.5 percent. With almost 60 percent of the population 24 years of age or younger, 35 percent between the ages of 25 and 54, and eight percent aged 55 and over, any National E-Government Policy must treat to the challenges being posed by Belize's changing ethnicity, culture, language, literacy, and age distribution. Indeed, **Horizon 2030**, the country's national development vision and framework, has this to say about the challenges (pp. 4):

“Across Belize, people feel that divisions along ethnic, religious, class, gender and political party lines have created a fragmented national identity, a lack of social cohesion and a weak sense of patriotism. Where political party affiliation becomes the primary factor determining access to public resources, stakeholders feel that this leads to the inefficient and ineffective use of these resources. Stakeholders spoke passionately of the need to create ‘One Belize–Un Belice’ where national identity encompasses inclusion, unity of purpose and ethnic and cultural diversity.”

Clearly, **Horizon 2030** embodies a set of core values that include recognition of the need to build one nation out of a diverse people. Other explicit vision statements drawn from stakeholders and contained in that 20-year national development framework, which are of relevance to this E-Government Policy, include the following (pp. 9):

- *“Belizeans are capable of using state of the art technology which they incorporate into productive enterprise.”*
- *“The economy is competitive and public policy is well managed and supportive of entrepreneurs, small enterprise and private sector growth.”*
- *“Belize has a well-balanced distribution of wealth and resources and modern infrastructure is supportive of economic growth.”*

- *“The state is respectful of people’s rights; citizens and visitors respect the rule of law and feel safe and secure.”*
- *“Democracy is vibrant with citizens fully participating in the development process and women performing at the highest levels of political leadership.”*

In support of these expressed vision statements, Belize’s **Medium-Term Development Strategy** (MTDS) outlines the following sectoral focus areas again of direct relevance to the National E-Government Policy (pp. 8):

1. ***“Environment and Disaster Risk Management.*** *Confronting economic and physical shocks requires the ability to plan adequately and to make adjustments at the individual, institutional and community level. Furthermore, ensuring that individuals have decent living conditions, sources of income and an assurance of resources for future consumption will require the sustainable use of natural resources.”*
2. ***“Human Development.*** *The ability of each citizen to reach his or her full development potential and to make meaningful contributions to his community requires a sound foundation. The human and social development objectives of the MTDS will be achieved through investment in education and health delivery and in social safety net provisions. The latter will include measures aimed at specific groups, such as women, youth and the aging.”*
3. ***“National and Citizen Security.*** *Increasing levels of crime as well as continuing interest in securing citizens’ well-being require focus on national as well as citizen security issues. This area will therefore encompass those measures that will lend to improved border security and reduced levels of crime.”*

To this end, the MTDS also presents a set of “cross cutting focus areas” critical to enabling development. These “are intended to fill existing gaps and/or to ensure effective implementation of the strategy.” The following four cross cutting focus areas contained in the MTDS are relevant to the National E-Government Policy (pp. 9-10):

1. ***“Public Sector Institutional Strengthening.*** *Many ministries point to the need for additional human and financial resources to execute their mandates. This, along with the need for improved efficiency in service delivery identified by stakeholders in the last two budget consultations, emphasizes that public sector institutional strengthening will be critical to Medium Term Development Strategy implementation. Aside from additional human resources, assessments have shown that the existing body can benefit considerably from capacity building activities. In addition to training in the various areas of specific service delivery, such initiatives should include training in [strategic planning, customer service, ICT ... and management].”*
2. ***“Improved Governance Systems.*** *There continues to be a pressing need for improvement in the capacity of the key oversight agencies. These agencies, particularly the Ombudsman, Auditor General and Contractor General, are central to the effective operations of the ministries, and to their relationship of accountability with the citizenry. Their institutional strengthening is therefore of primary importance over the medium term period.”*
3. ***“Citizen Participation, Gender Focus and Equitable Development.*** *Achieving development objectives depends on the extent to which citizens participate in the various strategic initiatives and to which they target different socio-economic conditions that impede such participation. This latter refers particularly to uneven access to resources across groups and communities*

along age, gender and geographic or ethnic lines. MTDS measures will be implemented ... to provide for the full participation of the non-government and private sectors and to remove impediments to the ability of specific groups achieving their full potential.”

4. **“Information and Communication Technology.** *Given Belize’s relatively small size, human resource constraints are ever present. Notwithstanding this constraint, output levels can be improved significantly by applying information and communication technologies to established systems and processes. Many of these continue to be manually operated, particularly in the public service. Whilst the implementation of a computerized financial management system (SmartStream) has led to some improvement in the recent years, there is a need for better use of communication technologies and for enterprise solutions to fit key operational activities. An example of this latter is the Land Information Management system developed under the GOB/IDB Land Management Project. Importantly too, information and communication technology can play a critical role in meeting the needs of those living in the rural sectors. Examples of recent efforts in this regard include a BRDP initiative to construct tele-centres in rural communities and to facilitate real-time transmission of agricultural market information from the districts. Over the medium term, the latter efforts will be intensified through initiatives such as the Agricultural Services Programme and the Agriculture Enterprise Development Project.”*

Based on exchanges with stakeholders, key findings for which are outlined below, the E-Government Policy Framework in Section 4 addresses the most critical gaps hindering Belize from integrating its existing E-Government efforts in ways that allow it to achieve some of the main goals set out in the aforementioned strategy documents.

2.3 KEY FINDINGS

Based on key findings and Consultant observations, there are several attributes Belize might leverage to fuel E-Government growth at the national level, including:

1. Low labour costs as well as relatively low production and input costs;
2. Abundance of land, natural resources and undeveloped spaces; significant development potential;
3. Diverse population comprising several races, ethnic mixtures, cultures and languages;
4. Influential and well-placed Belizean diaspora;
5. Potential for maintaining and growing a diversified, more balanced economy based on existing primary, secondary and tertiary sector activities;
6. Vibrant tourism sector supported by world-class attractions: a 300-kilometre-long barrier reef that is a major tourist attraction, the Maya ruins of Belize, the Mesoamerican Biological Corridor with its ecological diversity and a profusion of terrestrial and marine species;
7. Strong indigenous models of good governance, including the Central Bank of Belize, and CITO, the latter of which is responsible for E-Government.

However, stakeholders also point to the following gaps in existing frameworks that have the potential to derail efforts to unleash the full potential of ICT, innovation and E-Government to contribute to the sustainable development of Belize:

1. A persistent silo culture in Government that empowers ministries, departments, and statutory corporations to be predominantly inwardly focussed;
2. 'Ad hoc activities' in individual ministries and departments that have no apparent linkages to an overall national plan for economic development;
3. High levels of fragmentation in respect of communications, coordination, collaboration, consumption, planning, and implementation in Government that result in high costs, decreased efficiency, and general wastage;
4. Marked absence of mechanisms that transcend politics to support continuity in public sector planning and implementation, resulting in erratic national development;
5. Failure to harness technological innovation, particularly ICT, to improve the efficiency of existing factor-based economic sectors like forestry, fishing, agriculture, oil and gas; in the secondary sector, energy leading to sub-optimal production and value output in these sectors;
6. A US\$547.5M super-bond concluded by Belize in 2013 that limits the pace, size and direction of national development initiatives at many levels;
7. Prohibitively high taxation, which inhibits entrepreneurship and innovation, and encourages the development of a parallel economy;
8. Most sparse population in Central America (22,800 sq. km., people: 324,060 > ½ living in rural areas; almost ½ under 18 years old) has implications for policy planning, Government revenues and economic growth;
9. Major national unemployment and under-employment and fluid, often undocumented, flows of people from Central America, with serious implications for policy planning and economic development;
10. Lack of ubiquitous infrastructure (telecommunications, electricity, water, roads) impedes public sector management, investment and economic growth;
11. Lack of legislation and the existence of weak regulatory frameworks to guide development of ICT-related sectors, including E-Government and e-commerce, have a dampening effect on public sector efficiency and productivity, business, entrepreneurship and innovation;
12. Lack of effective competition and regulation in the telecommunications and ICT sectors, resulting in high access costs and reduced performance, making the Internet inaccessible and unaffordable to many;
13. Deficiencies in education at the primary, secondary and tertiary levels, resulting in weak skills and human capacity in the public and private sectors, slowing economic expansion.

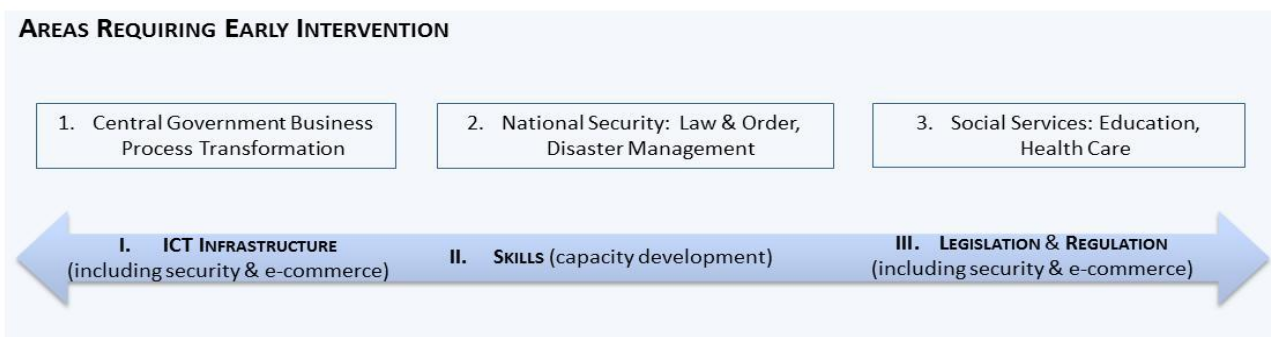
These gaps might be distilled into the following four broad areas requiring intervention to support E-Government. All are interconnected, with each element having the potential to strengthen and enhance others:

1. **Efficiency**
 - Broadband. Infrastructure. Skills. Automation. Integration. Collaboration.
2. **Security**
 - Legislation. Regulation. Infrastructure. Identity. Privacy. Order.
3. **Social Equity**
 - Legislation. Regulation. Access. Affordability. Diffusion.
4. **Social Services (Public Health and Education)**
 - Quality. Efficiency. Privacy.

Aligned with the preceding four broad areas requiring intervention on the E-Government side is the following stakeholder ranking of the top three functions of government on which this E-Government Policy should be most focussed (please refer to the third Conceptual Framework outlined in Section 1.3.3. of this policy document, namely **7 Functions of Government (+1)**, pp. 30):

- I. Security
- II. Social Services (Public Health and Education)
- III. Social Equity

Based on all of the above, therefore, and in order to bridge existing gaps in the interest of the deployment in Belize of effective E-Government frameworks, the key areas requiring early intervention might be illustrated as follows:



In sum, the E-Government Policy Framework outlined in Section 4 of this document is designed to create the environment necessary for Belize to continue the process of unleashing the potential of ICT to 1. Improve the way in which Government conducts its business; 2. Upgrade Government’s ability to manage its national security apparatus; 3. Enhance the delivery and diffusion of education and health care; 4. Modernise Government’s ICT frameworks and infrastructure, including with respect to broadband deployment and security; upgrade the digital skills of public servants; and guide the evolution of the ICT legislative and regulatory environment in support of robust E-Government, innovation, and entrepreneurship.

2.4 THE CENTRAL INFORMATION TECHNOLOGY OFFICE (CITO)

The role of CITO, a department of Belize's Ministry of Finance, in respect of all of the above is vital. The Office was established in 2004 with a mandate to provide strategic ICT services to the public sector as a whole. It operates the largest Government Wide Area Network (GWAN) due to the pervasive nature of the applications it deploys and supports. These applications include Government's accounting and taxation systems as well as its email services.

Due to its wide reach, CITO is well positioned to take a lead role in the implementation, supervision and monitoring of a National E-Government Policy for Belize. Indeed, it has the basic internal capacity to drive efforts for a more strategic and collaborative approach to infrastructure deployment and management in the Belize public sector.

In order for this to become a reality, however, CITO will require appropriate levels of authority, administrative support, human, technical and financial resources to function effectively and to inspire the confidence of the wider public sector in its ability to deliver. It is likely also to require some degree of organisational realignment and/or upgrade in order to cope effectively with what is likely to be a broader and more demanding mandate.

At the moment, CITO is committed to providing efficient ICT systems management, support and development services for Government's WAN. According to its website, it "strives to ensure that the Public Service in Belize is among the world leaders in the effective exploitation of new and emerging Information and Communication Technologies in the delivery of its services".

Based on key findings and the perspectives of stakeholders, there is a relatively high degree of confidence in CITO as a potential champion for this E-Government Policy. Section 5 of this document addresses more fully the role of CITO in this regard, even as it outlines the institutional framework required within the wider public sector for the E-Government Policy to become a lived exercise.

Part of that process will require Government as a whole to integrate its various ICT-related activities into frameworks that allow for more effective collaboration and communication, as well as improved sharing of information and resources at all levels. It is therefore important to note the following concepts, plans, proposals and/or projects relevant to the E-Government Policy that are already in train in Belize:

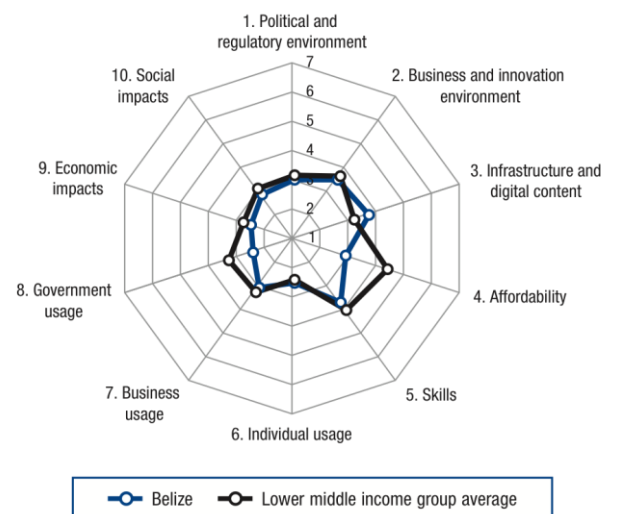
1. Government of Belize Wide Area Network – fibre ring (CITO, Belize Telemedia Ltd);
2. Government of Belize Financial and Taxation Systems (CITO);
3. Belize Electronic Licences and Permit System – BELAPS (CITO, Forestry, Fisheries, Agriculture, BAHA (Belize Agricultural Health Authority), Customs, Supplies Control Unit, Government of Taiwan);
4. Supplies Control ASYCUDA Interface (CITO, Government of Taiwan);
5. International Merchant Marines Registry of Belize – Ships' Registry (Ministry of Finance);
6. Tourism Data Management System (Belize Tourism Board, IDB);
7. HIPCAR (Harmonisation of Regional ICT-Related Legislation);
8. Human Resource Management Information System (Ministry of the Public Service);
9. Transportation Master Plan (Ministry responsible for Transportation, Republic of South Korea);
10. Belize Health Information Service (Ministry responsible for Health);

11. National Spatial Data Infrastructure Act and Technology Framework (30 key stakeholders);
12. Lands Records Management System (Lands Department);
13. Early Warning System (NEMO – National Emergency Management Organisation);
14. Computer Crime Information Management System – CCIMS (Police Department);
15. Digital Two-Way Radio Network (Police and Defence Force);
16. Belmopan Joint Operations Centre (Police, Coast Guard, Defence Force, Customs, Immigration housed in one state-of-the-art building equipped with an integrated ViDA system, mobile networks, etc.);
17. One-Stop-Shop for Tourism Investment (no identified champion, significant stated demand);
18. National ID Infrastructure (no identified champion, initial exploration, significant stated demand).

3.0 ICT SITUATION ANALYSIS

The preceding views as expressed by the Prime Minister on behalf of his Government are a tall order for Belize to realise under current conditions. In its 2012 Networked Readiness Index (NRI), for the first and only time, the World Economic Forum (WEF) assessed the extent to which Belize is leveraging ICT to increase its competitiveness and positively impact national development. Unfortunately, according to the 2013 Report, the most recent survey data “could not be collected in Belize”. Thus, along with other factors, the 2012 NRI findings are used as a basis for the policy prescriptions outlined in this document. In this regard, Belize was ranked 119 out of 142 countries globally in the 2012 NRI. The rankings identified the following weaknesses in the country’s ICT environment:

- Low broadband penetration
- Relative lack of ICT affordability
- Low individual/business/Government usage
- Very low capacity for innovation in business
- Lack of laws related to ICT
- Poor contract management and enforcement
- Low levels of venture capital financing
- Poor quality education/school management
- High levels of complexity and time required to start a business
- Lack of competition
- Lack of staff training in the private sector



3.1 BELIZE TECHNOLOGY STANDINGS

The specific indicators and corresponding individual rankings on which Belize’s 2012 NRI position is based are:

E-Government Readiness Assessment Indicators	
World Economic Forum (WEF) 2012 Global Information Technology Report (GITR)	
Indicator	Country Ranking/142
Laws relating to ICT	124
Government procurement of advance technology	125
Government prioritisation of ICT	136
Importance of ICT to Government Vision	139
Government Online Service Index	116
Impact of ICT on access to basic service	121
ICT use and Government efficiency	133
E-Participation Index	94
Firm-level technology absorption	129
Individuals using Internet	101
Extent of business Internet use	81
Government use of ICT	137

Other relevant indicators include the following:

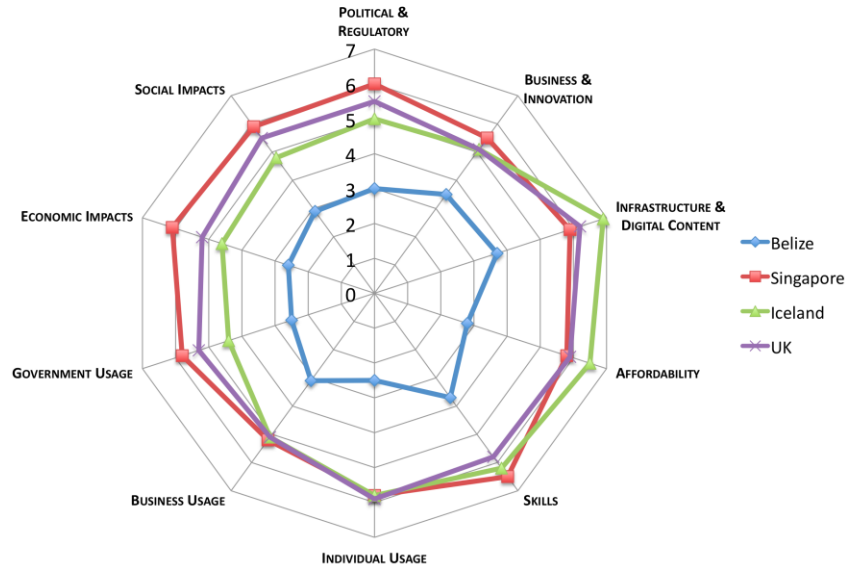
CLASSIFICATIONS	2010 CENSUS	
Size	22,966 Sq km	
Population (2012)	324,060*	
Population 15 – 64	194,105	
Total Households	79,492	
GDP (2011)	\$1.493 billion*	
GDP Per Capita (2011)	US\$4,576.64*	
H/Holds w/computers	13.6%	
Internet users > 5 years old	80,356	
FIXED		
Service Type	Total Customers	Penetration in Belize
<i>High Speed Internet</i> BTL - H.S.I.	14,230	17.90%
Cable Internet	2,397	3.02%
Grand Total	16,627	20.92%

3.2 SELECTED BENCHMARKS ON 3 DIMENSIONS

When compared to *Global Best-in-Class Nations* like Singapore, Iceland and Ireland, unsurprisingly, Belize is weak in all key dimensions, as illustrated below. Yet, none of those frontrunners began in that position. Their success is due to implementation of bold policy frameworks and strategies that improved their standing over the years.

PERFORMANCE COMPARISON

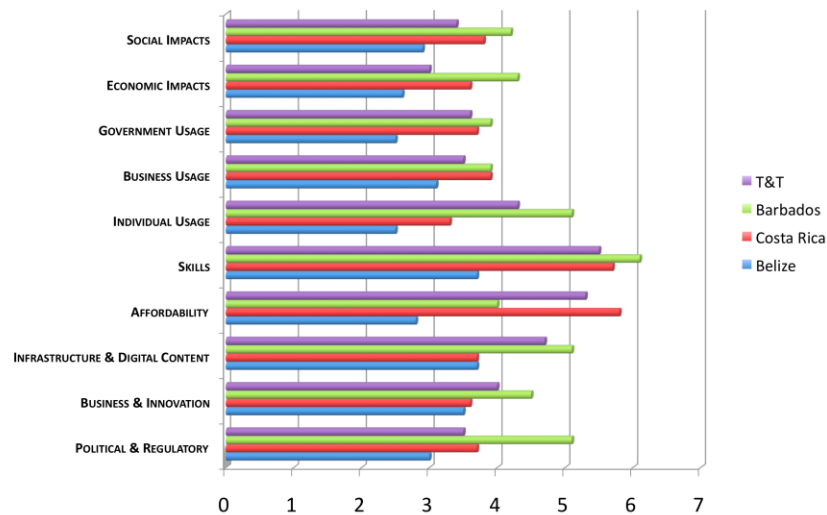
WEF Networked Readiness Index 2012



The same might be said for *Regional Best-in-Class Nations* like Costa Rica, Barbados, and Trinidad and Tobago, whose 2012 NRI performance is illustrated in the three visuals that follow.

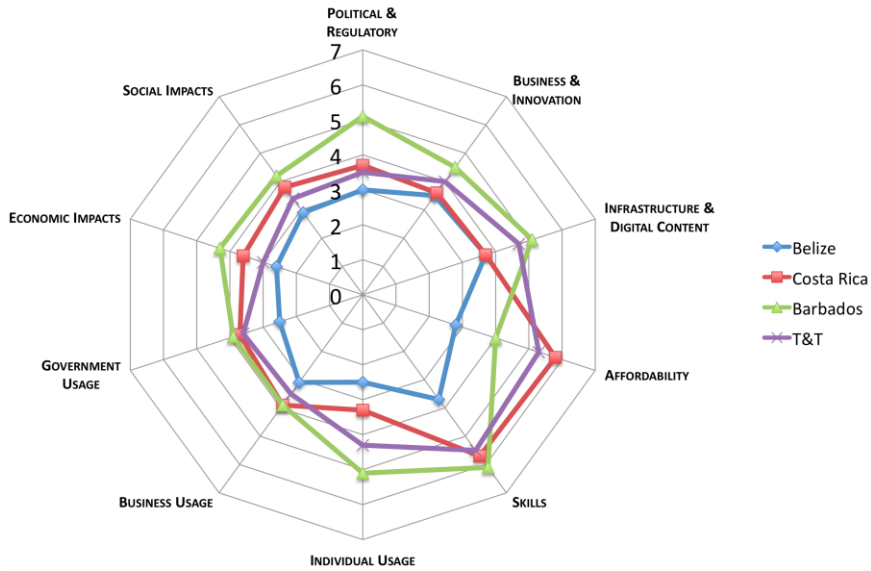
PERFORMANCE COMPARISON

WEF Networked Readiness Index 2012



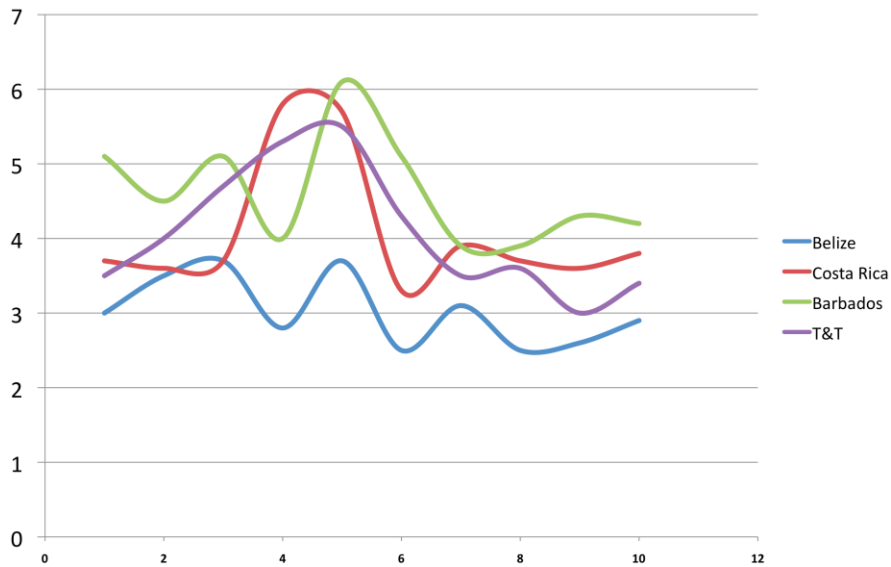
PERFORMANCE COMPARISON

WEF Networked Readiness Index 2012



PERFORMANCE COMPARISON

WEF Networked Readiness Index 2012



The good news is many of the countries that have achieved the greatest success in applying ICT to improve governance have become adept at delivering public value by leapfrogging generations of older service delivery models. Many have even become **Best-Practice Case Studies** that give insight into how policy and strategic frameworks might be designed to meet national development objectives. They prove that governments *can* do better. In this context, there are five evolving trends governments might exploit to minimise resource gaps while delivering better service in the area of E-Government:

1. *Standardised to personalised services*: Traditionally, governments put significant resources into producing homogenised templates that deliver the same services to everyone. This old-school model contrasts with the best-in-class concept of mass customisation that allows individuals to tailor their services to their needs. This requires governments to design their public services in partnership with citizens, integrated and delivered to provide exactly what people need, when they need it, and how they need it (Accenture, 2013).
2. *Reactive to “insight-driven” approaches*: E-Government leaders around the world are moving away from reaction-based approaches to insight-driven public service strategies that allow them to anticipate the future public service needs of citizens and frame approaches that provide cost-effective solutions. In more advanced economies, this is where the notion of “big data” is gaining significant traction. As ICT frameworks evolve and people use them more and more, it is possible to extract valuable insights from the data these frameworks accumulate to stay ahead of the curve and deliver solutions to citizens they might not even be aware they desire (Ibid).
3. *Traditional public service management to public entrepreneurship*: Public entrepreneurship involves creating value, building new relationships, removing traditional silos and working together across existing boundaries to improve efficiency. Public entrepreneurs create partnerships that deliver value. They take risks understanding that while some efforts might fail, others will not. The shift to public entrepreneurship in many countries is retooling the machinery of government, revitalising the public sector’s bottom line, encouraging collaboration, and increasing the value of government investments (Ibid).
4. *Piecemeal efficiency improvements to holistic “mission productivity” mind-sets*: Rather than gradual attempts to improve efficiency over time, innovative governments are shifting to a more holistic “mission productivity” approach that calls for broad, integrated thinking to prioritise and manage activities across ministries, departments and sectors. This helps eliminate service delivery duplication and leverages the public sector’s considerable scale and assets to minimise costs and improve outcomes (Ibid).
5. *Whole Of Government Enterprise Architecture (WOG-EA) and Framework*: In becoming a world-class leader in the delivery of E-Government services, Singapore has adopted a WOG-EA approach that provides a national view of all government agencies' enterprise architectures (EA). The purpose is to leverage Government’s total asset base and purchasing power to achieve greater cost savings and avoid unnecessary duplication and wastage of resources. The approach enables Government to improve its services and optimise its ICT assets by analysing and identifying strategic opportunities from its various lines of businesses and technology investments. This results in the creation of unified technology standards, product registers and best practices designed to guide agencies in the construction of ICT systems, with the added objective of enabling inter-agency systems’ interoperability.

These approaches represent best-in-class thinking on effective delivery of public services. The Government of Belize will have to decide how far along this continuum of innovation it wishes to position itself, remembering that it is not planning for the present state but for the future. Certainly, this revolutionary thinking on E-Government holds significance for Belize on many fronts, two of which are worth mentioning herein.

The first of these is linked to public entrepreneurship, which has the power to break down entrenched silos, encourage collaboration across traditional boundaries, retool the machinery of government, stimulate economic outcomes by catalysing the private sector to create lasting value, and multiply the value of the investments Government makes in its efforts to accelerate national development.

Essentially, the public entrepreneurship model empowers individuals to work together to develop solutions. It moves public servants away from bureaucratic, regimented, robotic responses to the delivery of services even as it makes room for creativity, efficiency and flexibility, all while maintaining the operational integrity of Government. Applied correctly, it motivates public service providers to view citizens both as clients and as shareholders in a national enterprise whose core mission is to create sustained and sustainable value.

But models of public entrepreneurship might not only improve the dispositions of public servants and the efficiency of public service delivery, but also have a knock-on effect on the private sector, providing new opportunities for business creation and enterprise development. Inefficient, unresponsive, complex Government systems are a huge drag on economic activity and social innovation. A strong, creative, well-managed, empowered public service is a stimulus to private sector growth, foreign investment flows, and sustainable national development.

Yet, the current structures and processes of most Governments in the Caribbean are not configured to deliver on this compelling promise. If Governments fail to unlock the potential of new technologies and digital frameworks to reconfigure their operational cultures, they will continue to see revenues shrink and costs balloon as they deliver substandard services to frustrated citizens, businesses and foreign investors who will eventually seek other avenues through which to attain real value.

This points to the second area of significance for Belize in terms of revolutionary E-Government services, linked to the notion of “mission productivity”, or what is known as “mission leadership”. This approach uses broad, integrated thinking to prioritise and manage Government initiatives. In the Caribbean context, mission productivity is really about restructuring and repurposing the way in which the ministerial style of government functions in modern economies and societies driven by technological innovation. Simply put, best-in-class E-Government integration is not achievable without rethinking and restructuring how Cabinet manages the affairs of state.

In reality, the prevailing Cabinet approach was designed for an “analogue” world where ministerial and departmental silos were the order of the day and Governments were not well attuned to the benefits of cross-functional internal collaboration. Indeed, Caribbean public sectors were originally crafted to maintain high levels of secrecy and control for colonial masters who lived continents away. Speed, efficiency, collaboration, and innovation in decision-making were not values to be encouraged. In some sense, many ministries, departments and statutory corporations today still function like isolated, self-sufficient fiefdoms untouched by events outside their mandate.

Yet, the world in 2013 is different from what existed when most Caribbean countries gained independence in the 1960s and 1970s. Global financial systems designed in a post-colonial post-war era are in freefall. Health care and educational sectors are out of alignment, national insurance schemes are in danger of failing, even the delivery systems for traditional public goods like water, electricity, telecommunications, broadcasting, transportation, and sanitation services have become obsolete (Babb 2010, 2012, 2013; ACB Knowledge Consultants, 2005, 2006).

As the 21st century continues to unfold, it is becoming more and more clear that the structures built by earlier generations to manage the affairs of state are, largely, in tatters. As the old models fail it is imperative that developing countries design new ones that allow them to unleash the full potential of their citizens to create lifelong value. Such a reconfiguration, if it is to be successful, has to begin at the Cabinet level with the mission

productivity approach outlined in the preceding section: i.e., broad, integrated thinking to prioritise and manage initiatives (Ibid).

It is true that as part of their commitment to mission productivity, some public-service organisations are adopting performance management approaches that align their resources, systems and employees to strategic objectives and priorities, thus bringing behaviour in line with results and improving outcomes. At the same time, however, Cabinet might also deploy technology-based performance systems to drive continuous improvement. The latter approach requires budgetary models that reward outcome delivery rather than those that are inflation-based, increasing annually regardless of programmatic success.

Moreover, mission productivity encourages the restructuring through consolidation and collaboration of core public service functions delivered by individual departments and statutory corporations. This allows Governments to achieve higher levels of productivity through economies of scale and scope, which can dramatically reduce overhead costs and duplication.

In the final analysis, the Government of Belize will need to decide once more how far it will go in the cycle of E-Government innovation; while considering the consequences if needed transformations continue to be deferred, namely escalating citizen demands for greater public service efficiency and accountability, continuously falling revenues and escalating costs.

4.0 E-GOVERNMENT POLICY FRAMEWORK

The unvarnished truth is that this E-Government Policy will deliver value to the Government and people of Belize only if there is a sea change in the way the public sector functions, including Cabinet as a body, the Caucus of CEOs, individual Ministries, departments, and statutory corporations.

Without the required roadmap to manage change, monitor results and hold individuals accountable, as well as the will to implement agreed policy decisions, ***the power of culture and entrenched unproductive behaviours overshadows technology's ability to bring about positive transformation ... every time.***

In this regard, mechanisms must be developed to break down existing ministerial and departmental silos, an issue highlighted by stakeholders as a key obstacle to Belize's success.

New models must be developed that showcase the benefits to everyone of cross-functional internal collaboration.

In this sense, Belize is likely to benefit from a policy and planning mechanism that spans all ministries and key projects, guiding and monitoring national development initiatives in a holistic, systematic manner.

Linked to this is the need to adopt the WOG best-practice approach referred to in the preceding section. It provides a national view of all government agencies' enterprise architectures (EA) for the purpose of leveraging Government's total ICT asset base and purchasing power to achieve greater cost savings and avoid unnecessary duplication and wastage of resources. An added benefit is the enabling of inter-agency systems' interoperability.

It is also important to design frameworks that treat businesses, citizens, residents and investors as partners in public service delivery rather than as subjects to be regulated and controlled. To do so, the E-Government Policy must address development and delivery of e-services in ways that are user friendly and effective. Technical infrastructure and platforms for e-services will have to be created and standardised, particularly in respect of procurement, design and management, as the WOG approach advocates.

This is likely to require change management and the reengineering of backend ICT processes.

Consideration should also be given to the use of ICT to support Government employees (G2E) in respect of human resources functions, performance management, capacity and skills enhancement, and the like.

This, of course, has implications for the operation of the wider public service. As such, there is likely to be need for alignment between the E-Government Policy, Strategy and Plan of Action and ongoing efforts at public sector reform. Standardisation of processes, infrastructure, products, and services will become critical, as will some reclassification of functions and the eventual emergence of new government models.

Information and communications technologies are ideal tools to assist with respect to all of the above, but they cannot function effectively if internal cultures, politics, and people refuse to allow it.

4.1 VISION AND MISSION

Vision for E-Government in Belize

“An Integrated, Collaborative Government Delivering Secure, Quality Public Services that Connect and Empower People”

This E-Government Policy is designed to eliminate existing bureaucratic silos to build a collaborative working environment where Government, the private sector and people connect in productive partnerships enabled by the transformative power of ICT. This vision for *Integrated Government* will be achieved by focusing on the following strategic mission tracks:

Mission for E-Government in Belize

Integrating For Greater Collaboration ... “Many Agencies, One Government”

Collaborating For Better Service ... “Working Together Works”

Serving People Through Quality Connections ... “Government At Your Service”

4.2 GUIDING PRINCIPLES

In support of the above, the following **Guiding Principles** should inform all E-Government Policy interventions:

1. **Efficiency:** development and effective delivery of state-of-the-art e-services via reliable infrastructure;
2. **Transparency:** Design of standardised services that are ethical, equitable and protect individual privacy;
3. **Resilience:** Delivery of robust, dynamic, modern solutions that empower citizens, residents and visitors;
4. **Integration:** Interconnected, harmonised E-Government services based on universal service delivery;

5. **Service:** Shaping of policies, systems, frameworks and attitudes that facilitate and empower people.



4.3 CORE POLICY OBJECTIVES AND CORRESPONDING POLICY STATEMENTS

Analysis of global rankings, comprehensive exchanges with stakeholders, research into the local ICT sector, and uncovering of global best practices have resulted in identification of the seven (7) strategic themes this E-Government Policy will use to guide E-Government development and implementation in Belize over the course of the next three to five years.

The 7 strategic themes are intended to move Belize along the path to an **Integrative System** of E-Government. As described more fully in Section 5.1 of this Policy, *Integrated Government* links local systems, systems with similar functionality, and systems across Government agencies horizontally (internally) and vertically (externally) such that more seamless communication, collaboration and exchange of information are possible.

This supports several goals outlined in the introduction to this section, namely developing mechanisms to break down existing ministerial and departmental silos and encourage new models that showcase the benefits of cross-functional internal collaboration.

It also supports the adoption of WOG best-practice approaches that enable a holistic view of the enterprise architectures (EA) of all government agencies for the purposes of leveraging Government's ICT assets and purchasing power to achieve cost savings and avoid duplication and wastage of resources. As stated earlier, an added benefit is the enabling of interoperability among various agency networks.

Ultimately, this allows the design of frameworks that treat businesses, citizens, residents and investors as partners in public service delivery. Of course, technical infrastructure and platforms for e-services will have to be created and standardised, particularly in respect of procurement, design and management.

What follows are the **7 Strategic Themes** on which the **Core Policy Objectives** and **Corresponding Policy Statements** of the E-Government Policy are based.

1. **Public Sector Infrastructure Development:** Building out a world-class Government Wide-Area Network (GWAN) for the Belize public sector using common and shared platforms that enable delivery of robust, seamless, user-friendly, end-to-end e Government and ICT services internally and to external clients.
2. **Creative Regulatory Reform:** Designing and implementing pioneering policy and regulatory approaches to ICT adoption and usage in the public service that allow e-Government to flourish in a secure environment.
3. **Targeted Human Capacity Development:** Shaping public sector frameworks for training, education and career-long learning that bridge significant existing deficiencies in individual and overall human capacity.
4. **Improved Government Efficiency:** Enhancing public sector responsiveness and the diffusion and use of ICT by upgrading existing delivery channels, creating new channels for delivery, designing compelling new content and services, changing the culture of bureaucracy and developing appropriate governance models.
5. **Effective Cross-Functional Collaboration:** Developing programmes and initiatives to build capacity for e-Government-related research and innovation, dissolve existing unproductive silos, improve collaboration, increase knowledge exchange, and support the sharing of experiences across Government.
6. **Enhanced National Security:** Applying ICT frameworks uniformly across all national security-related public service entities in ways that remove existing silos, promote close collaboration, encourage active exchange of information, and contribute to a national sense that law and order is being appropriately maintained.
7. **Quality Social Services:** Transforming the way Government engages with key clients and stakeholders such that they are placed at the centre of national development through the efficient sharing of information and the fast, seamless, secure, cost-effective delivery of Government services via modern ICT platforms.

STRATEGIC THEME	STRATEGIC OBJECTIVES
<p>Public Sector Infrastructure Development</p>	<ul style="list-style-type: none"> • To build out a world-class Government Wide-Area Network (GWAN) for the Belize public sector using common & shared platforms • To enable delivery of robust, seamless, user-friendly, end-to-end E-Government and ICT services internally & to external clients • To design & deploy a central enterprise infrastructure & platform for Government-related ICT services • To simplify & standardise infrastructure & management, reduce costs & complexity, & improve security • To establish a network connecting ministries, departments & agencies & a fully redundant data centre to house critical public infrastructure systems
<p>Creative Regulatory Reform</p>	<ul style="list-style-type: none"> • To designate/create a central implementation and oversight Department to manage national E-Government initiatives (CITO) • To design & implement pioneering policy & regulatory approaches to ICT adoption & usage in the public service, in accordance with the overarching national regulatory reform agenda, that allow E-Government to flourish in a secure environment • To streamline public service E-Government governance for improved collaboration & service delivery
<p>Targeted Human Capacity Development</p>	<ul style="list-style-type: none"> • To shape public sector frameworks for training, education and career-long learning that bridge significant existing deficiencies in individual & overall human capacity • To enable a new culture across the E-Government workforce using performance- & achievement-based human capital management • To develop superb skills, shared standards and key performance targets
<p>Improved Government Efficiency</p>	<ul style="list-style-type: none"> • To make Government a model ICT user and leader • To enhance public sector responsiveness & the diffusion & use of ICT • To optimise already existing delivery channels • To increase the number of delivery channels • To design new content & services, change the culture of bureaucracy & develop governance models that support E-Government development • To reform backend support processes and operations

Effective Cross-Functional Collaboration	<ul style="list-style-type: none"> • To develop programmes & initiatives to build capacity for E-Government-related research & innovation • To develop an internal public service culture that discourages territorial behaviour, improves collaboration, increases knowledge exchange, & supports sharing of experiences within & between various entities
STRATEGIC THEME	STRATEGIC OBJECTIVES
Enhanced National Security	<ul style="list-style-type: none"> • To improve government capability to respond to natural/man-made disasters affecting government's assets, infrastructure and citizens' data security and privacy • To instil confidence by creating an environment that is safe to conduct business with and within government and to carry out day-to-day activities • To build technical and legislative capacity to respond to, mitigate and protect against cybercrime and offences against the public sector
Quality Social Services	<ul style="list-style-type: none"> • To create and enhance service delivery channels that embody "Government At Your Service", "Working Together Works", and "Many Agencies, One Government" • To raise awareness of ICT initiatives in Government via an E-Government communication plan • To support the most vulnerable groups in society • To support equitable service delivery across various ethnicities and socio-economic classes

4.3.1 PUBLIC SECTOR INFRASTRUCTURE DEVELOPMENT

Policy Statements

The Government of Belize will build out a world-class Government Wide-Area Network (GWAN) for the Belize public sector using common and shared platforms that enable delivery of robust, seamless, user-friendly, end-to-end E-Government and ICT services internally and to external clients.

The Government of Belize will take the steps necessary to design and deploy a central enterprise infrastructure and platform for Government-related ICT services to simplify and standardise infrastructure and management, reduce costs and complexity, and improve security. It will establish a network connecting all ministries, departments and agencies and a fully redundant data centre to house its critical systems.

Purpose

These broad commitments to the widespread development of ICT infrastructure in Belize are aimed at implementing the IT Policy and Plan, including the E-Government infrastructure framework, outlined in the Government Communications Assessment produced by the CTU.

GOVNET - The Government will build out this core network by leveraging existing networks wherever feasible. The GWAN would be comprised of Core and Edge Sites arranged in a multi-tiered topology (or, in some parts of the network, in a hybrid star-tree topology).

Centralised Hosting Facility – The Government will centralise its critical infrastructure within core sites and establish data centres to more efficiently utilise its limited resources. It will enhance the capacity at the E-Government ICT Centre, a core site, to provide the best facility for centralising and managing servers, for all of Government, with a high level of availability.

Scope

These policy statements have implications for all of Government (ministries, departments and agencies), as well as businesses, residents, and anyone utilising Government’s services.

These policy statements should not require any legislative or regulatory changes in order for shared infrastructure to be accessible by authorised users across Government and externally. They are, however, likely to require appropriate standards and protocols to govern design, procurement, deployment, management and monitoring of infrastructure.

These policy statements address the existing lack of coordination in procurement, deployment and management of Government’s ICT infrastructure. This will significantly reduce capital expenditure and ongoing maintenance costs across government and streamline IT acquisition and deployment of E-Government services. It will also lead to greater collaboration between IT stakeholders in the Public Sector.

Governance and Management

The central implementation and oversight agency to be identified by Government and designated to manage national E-Government initiatives is expected to take the lead role in giving effect to these policy statements.

An Inter-Ministerial ICT Council guided by technical working groups is expected to be formed and to take a subsidiary role in governance and management. CITO will play a critical role in the establishment and management of this core infrastructure. The Government will lease capacity, wherever feasible, and outsource the management of services where there is a lack of capacity in-house with respect to service delivery.

4.3.2 CREATIVE REGULATORY REFORM

Policy Statement

The Government of Belize will design and implement, in alignment with the overarching national regulatory reform agenda, pioneering policy and regulatory approaches to ICT adoption and usage in the public service that allow E-Government to flourish in a secure environment.

Purpose

This is necessary in order to remove barriers and resolve conflicts inhibiting ICT development and usage within government, as well as inspire the confidence of businesses, investors, stakeholders and the general public.

Scope

This policy statement affects Government, the public and private sectors, citizens, and anyone with interests in the socio-economic development of Belize.

This policy statement is likely to impact laws and/or regulations related to electronic transactions, e-signatures, authentication, data privacy/protection, e-payments, cyber security ... and any area related to ICT development and usage for E-Government.

The policy statement addresses recognised weaknesses in all laws related to ICT as an enabler for the development of E-Government in Belize, as highlighted in the 2012 NRI of the WEF.

Governance and Management

The Office of the Attorney General is the designation authority to play the lead role in giving effect to this policy statement under the guidance of the Prime Minister and the Cabinet. CITO will also play a major role in initiating and guiding the development of legislation and accompanying regulatory framework in support of the establishment of an enabling E-Government ecosystem. Various other Ministries and Departments with specialised responsibility for ICT-related legislation and regulation will be required to play secondary roles in shaping the policy positions on which the Office of the Attorney General acts. The Harmonisation of Regional ICT-Related Legislation (HIPCAR) initiative is likely to provide significance guidance in this regard.

These authorising bodies will also ensure that the subsequent legislation and regulations arising from this E-Government policy statement are in support of, and in alignment with, the overall national regulatory reform agenda for Belize.

4.3.3 TARGETED HUMAN CAPACITY DEVELOPMENT

Policy Statement

The Government of Belize will shape public sector frameworks for training, education and career-long learning that bridge significant existing deficiencies in individual and overall human capacity.

Purpose

This policy requirement is critical to overcoming the skills, training, educational and capacity deficits identified in various global assessments of Belize's human resource capability, gaps that inhibit the country's ability to develop strong E-Government frameworks.

Scope

This policy affects public servants in particular, but if effectively implemented will have positive external impacts on the wider national human resources environment.

This policy statement should not require any legislative or regulatory changes.

Governance and Management

The Ministry with responsibility for the public service will be required to take the lead role in giving effect to this policy statement.

Individual ministries, departments, and agencies of Government will play subsidiary roles in enhancing the capacities and skills of their work force.

4.3.4 IMPROVED GOVERNMENT EFFICIENCY

Policy Statement

The Government of Belize will enhance public sector responsiveness and the diffusion and use of ICT by upgrading existing delivery channels, creating new channels for delivery, designing compelling new content and services, changing the culture of bureaucracy and developing appropriate governance models that support E-Government development.

Purpose

This policy commitment is in keeping with the broad promise made by Prime Minister the Hon. Dean Barrow in the Party Leader's Message contained in the 2012 UDP Manifesto, namely that "Government must become more efficient. Red tape has to be cut, bureaucracy made leaner, and a culture of quick, courteous and efficient service made the hallmark of the next Administration." This promise is validated in Government's **Medium Term Development Strategy**, which points to "the need for improved efficiency in service delivery identified by stakeholders in the last two budget consultations."

Scope

This policy statement affects all of Government.

It should not require any legislative or regulatory changes.

It addresses the lack of efficiency in Government as identified by various global and national assessments.

However, this policy statement does fail to address the endemic lack of collaboration that is the result of a strong silo culture currently operating in the public service of Belize. The policy statement that follows is designed to treat to the existing lack of collaborative frameworks that are needed for successful E-Government deployment.

Governance and Management

The central implementation and oversight agency to be identified by Government and designated to manage national E-Government initiatives is expected to take the lead role in giving effect to this policy statement.

An Inter-Ministerial ICT Council guided by technical working groups is expected to be formed and to take a subsidiary role in governance and management.

4.3.5 EFFECTIVE CROSS-FUNCTIONAL COLLABORATION

Policy Statement

The Government of Belize will develop programmes and initiatives to build capacity for E-Government-related research and innovation, dissolve existing unproductive silos, improve collaboration, increase knowledge exchange, and support the sharing of experiences across Government.

Purpose

This policy commitment supports the vision contained in **Horizon 2030** that “strong public sector and civil society organizations collaborate effectively and tailor their programmes to meet Belize’s development goals and objectives.”

Scope

This policy statement affects all of Government and its key partners.

It should not require any legislative or regulatory changes.

It addresses the silo culture that currently exists in Government, which inhibits effective communication, information sharing and cross-functional collaboration in the interests of fuelling creativity, problem solving and innovation within the public sector as well as with the private sector and civil society.

Governance and Management

The central implementation and oversight agency to be identified by Government and designated to manage national E-Government initiatives is expected to take the lead role in giving effect to this policy statement.

An Inter-Ministerial ICT Council guided by technical working groups is expected to be formed and to take a subsidiary role in governance and management.

4.3.6 ENHANCED NATIONAL SECURITY

Policy Statement

The Government of Belize will apply ICT frameworks uniformly across all national security-related public service entities in ways that remove existing silos, promote close collaboration, encourage active exchange of information, and contribute to a national sense that law and order is being appropriately maintained.

In addition, ICT frameworks will be applied, as part of the wider national security agenda, to ensure that all government network infrastructure is secure, resilient and private. Cyber security measures will be instituted within all aspects of inter and intra government interaction. Government and citizen’s information and records will be captured, stored and disseminated with the level of security, protection and privacy in keeping with international standards and best practice.

Purpose

This policy commitment is designed to give support to the overall National Policy and Strategy on Security, Cybercrime and Cybersecurity, particularly with respect to establishing a secure and protected setting where E-Government can flourish and function effectively. It is also designed to give effect to the vision contained in **Horizon 2030** that “the state is respectful of people’s rights; citizens and visitors respect the rule of law and feel safe and secure.” It also supports the position as contained in the **Medium Term Development Strategy** that “increasing levels of crime as well as continuing interest in securing citizens’ well-being, require focus on national as well as citizen security issues. This area will therefore encompass those measures that will lend to improved border security and reduced levels of crime.”

Scope

This policy statement affects Government’s security and disaster management apparatus, as well as all those involved with or affected by considerations of national security in Belize.

It has implications for laws and regulations related to security and/or disaster management in Belize.

It addresses the lack of cohesion in the security and disaster management at the national level.

Governance and Management

The central implementation and oversight agency to be identified by Government and designated to manage national E-Government initiatives is expected to take the lead role in giving effect to this policy statement.

Ministries, departments, and agencies of Government responsible for security and disaster management will play subsidiary roles in this regard.

4.3.7 QUALITY SOCIAL SERVICES

Policy Statement

The Government of Belize will transform the way in which the public service engages with key clients and stakeholders such that they are placed at the centre of national development through the efficient sharing of information and the fast, seamless, secure, cost-effective delivery of Government services via modern ICT platforms.

One of the key objectives of this E-Government Policy is to create the enabling infrastructure to facilitate the provision of a multichannel platform for the delivery of quality services to the citizens and business community of Belize. To achieve this end, the Government will provision services through electronic means to allow customers to access them conveniently, easily, quickly and at a time and location of their choice.

Purpose

The aim of this policy commitment is to implement the aspect of the **Medium Term Development Strategy** that states, “The human and social development objectives of the MTDS will be achieved through investment in education and health delivery and in social safety net provisions.” The policy commitment also extends to the

Horizon 2030 vision statement that “Belize has a well-balanced distribution of wealth and resources and modern infrastructure is supportive of economic growth.”

Government will be more responsive to the needs of its customers, more efficient in service delivery, and more transparent in its processes. The three components of the envisaged service delivery framework include:

1. **Infrastructure:** To build a robust and resilient Government network and a delivery platform to provide end-to-end, secure and timely transactions to enhance the convenience and value of e-Services to the public;
2. **Backend Systems and Processes:** To gear up the back end systems for integration with the online e-Services offered on the delivery platform to enable a one-stop processing service from submission to approval for customers; and
3. **Service Delivery Channels:** To create multi-channel interface options and delivery modes for access to Government services.

In the near-term plan, the Government will seek to put key G2C (Government-to-Citizens) and G2B (Government-to-Businesses) services online and ensure that all e-Services are of high quality. The online services will be delivered through one touch point and will require Government agencies to take the lead, in collaboration with the central implementation and oversight agency, in the integration of Government information and services. Quality will be assured by ensuring ease of use, usability, responsiveness, reliability in terms of availability, accuracy, security and customer centricity. The objectives for the e-Services development will be to:

- Deliver convenience and improve access and overall service experience to citizens and businesses;
- Provide more services for delivery through various channels; and
- Improve Government efficiency and transparency, and reduce operating costs.

By achieving these objectives, e-Services’ development will contribute to the improvement of Belize’s E-Government ranking. It will also result in increased citizen satisfaction of the Government service delivery process.

Scope

This policy statement affects Government, the public and private sectors, citizens, and anyone with interests in the equitable socio-economic development of Belize.

It should not require any further legislative or regulatory changes, other than what have already been prescribed under the E-Government Legislative Reform policy framework above.

It is designed to address weaknesses in the equitable diffusion and distribution of quality social services.

However, the policy statement does not necessarily address the costs of deployment or the challenges associated with the demographic and topological makeup of Belize.

To support the delivery of G2C and G2B e-Services, effective and efficient sharing of personal and business information among various Government agencies through a central repository of personal information (a People Hub) and a central repository of business information (a Business Hub) will also be undertaken. While these are key enablers, they are separate initiatives that will be approached separately for implementation in parallel with e-Services development and delivery.

Governance and Management

The central implementation and oversight agency to be identified by Government and designated to manage national E-Government initiatives is expected to take the lead role in giving effect to this policy statement.

Ministries, departments, and agencies of Government responsible for delivery of social services, including health care and education, will play subsidiary roles in this regard.

5.0 E-GOVERNMENT INSTITUTIONAL FRAMEWORK

No policy framework can be effective or sustainable without viable mechanisms for programme management to give life to the policy design. This section suggests a structure for managing the E-Government Policy that designates a Champion at the highest level of Government; and establishes an Inter-Ministerial ICT Council of Cabinet to oversee and drive the overall National E-Government and ICT Innovation agendas for Belize. Among other responsibilities, this Council will be responsible for policy-level decision making, budget provisioning, and monitoring and accountability related to the national E-Government and ICT Innovation Policies.

It is further recommended that Government establish Expert Working Groups (EWGs) to guide activities related to the various thematic areas of the National E-Government Agenda. These would be made up of representatives from business, government, academia, and civil society, as well as other key constituencies. They would assist in validating plans, programmes and activities, as well as public and/or online consultations at the national and local levels. The Chairpersons of the EWGs will form a True North Group conceptualised to sign off on plans, programmes and activities before these are presented to Cabinet, report to the Inter-Ministerial ICT Council of Cabinet through CITO, and form part of the governance framework for implementation of E-Government strategies.

5.1 E-GOVERNMENT MODELS

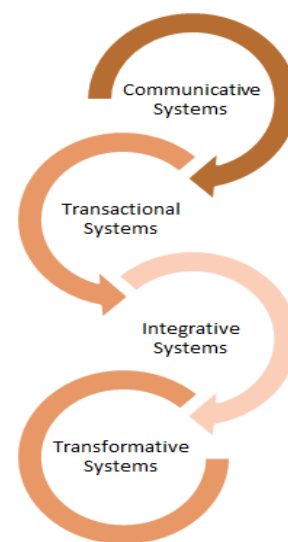
Global E-Government best practice suggests success is based not simply on automating existing systems and deploying sophisticated infrastructure. In order to be effective, E-Government must be built with people in mind, designed from the ground up in a continuous process that involves the implementation of systems that might be characterised by the following four (4) main models:

Communicative Systems

These embody an established online Government presence that disseminates information about e-services and their requirements. This model has potential limitations despite the presence of dynamic websites. Essentially, portals provide information about all Government services but these services are mainly independent of each other and any efforts at integration.

Transactional Systems

In this model, a Government's online presence is upgraded to provide full electronic transactional services. This represents an enabler stage aimed at empowering users



who can initiate and complete processes, pay for services or monitor and manage the progress of a service as it is delivered. In this context, services may also be independent.

Integrative Systems

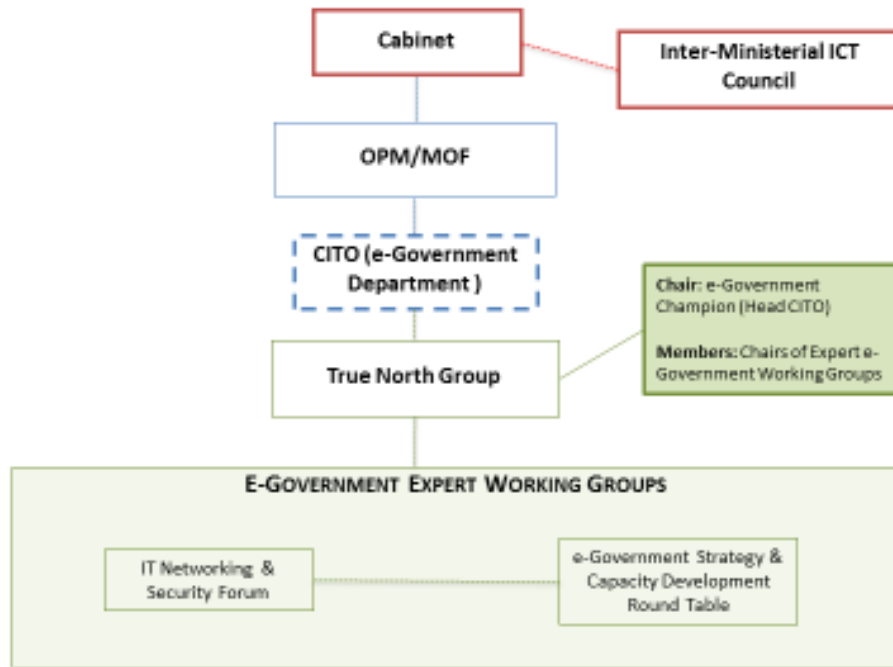
These approaches aim to link local systems, systems with similar functionality, and systems across government agencies. Integration is likely to be both horizontal (across agencies) and vertical (within agencies), as well as involve Integration of technologies and processes, requiring the examination of existing methods and the possible reengineering of those methods.

Transformative Systems

These systems are the ideal models for a knowledge society. They reflect the stage of growth that can facilitate the strengthening of democracy and promotion of transparency in governance. Under this model, Governments seek to combine delivery of public services with applicable private sector services. It is the stage of transformation where new functionality and services are discovered and implemented, and where citizens and the public become partners in service delivery.

GOVERNANCE STRUCTURE

E-Government



Policy Statement

The Government of Belize will develop and empower appropriate mechanisms beginning at the level of the Cabinet to support the effective implementation and monitoring of the E-Government Policy, Strategy and Plan of Action. The Government will establish CITO as a centralised Department to have oversight of all E-Government initiatives.

Purpose

- To oversee and drive the overall National E-Government Agenda.
- To provide regular progress reports to Cabinet.
- To provide executive sponsorship and guidance for all major and enterprise-wide Government ICT and e-Services delivery projects.
- With respect to the Inter-Ministerial ICT Council of Cabinet, to be the highest approval and decision-making Committee for all major and enterprise-wide Government ICT initiatives.
- To secure active participation from Ministries, Agencies, and Departments.

- To endorse E-Government project budgets that require Cabinet’s approval.

Scope

This policy statement affects Government as a whole, Cabinet, the CEO Caucus, and the current CITO.

It should not require any legislative or regulatory changes.

It is designed to enable the effective deployment of the E-Government Policy.

Governance and Management

Governance and management will be undertaken by the Prime Minister, Cabinet, the CEO Caucus, the True North Group, Line Ministries, CITO as the central Department with overall E-Government responsibility, and two Expert Working Groups.

Terms of Reference, roles and responsibilities for the various actors in the governance structure will be developed as part of the implementation framework to ensure coherence, coordination and operational effectiveness in key elements of the governance process.

5.3 CHANGE MANAGEMENT

Policy Statement

The Government of Belize will undertake change management activities to manage the organisational, process and business strategy that are likely to occur due to the introduction of this E-Government Policy Framework. The government will seek to ensure that these changes are carried out in a planned, coordinated and structured manner to ensure successful acceptance and adoption of by all stakeholders.

Purpose

- Greater organisational effectiveness.
- By addressing people’s concerns, the adoption of new processes and technology can be accelerated to boosts overall organisational effectiveness and efficiency.
- Improved work quality and morale.
- By placing people in the centre of the change process, ensuring people’s needs and concerns are addressed, the quality of work and morale be improved.
- Address changes in culture and behaviour.
- Address changes in roles and responsibilities.
- Change in processes and workflows.
- Change in skills and knowledge requirement

This policy statement will affect all stakeholders including:

1. Government leadership, i.e. management and senior leadership in the Government ministries;
2. Government officers involved in the E-Government processes e.g. CITO;
3. Public users of the e-Services (residents and businesses); and
4. The General Public.

New legislation may be required to change job description, roles and responsibilities of public sector employees. This process must be aligned with the public sector transformation initiative currently being undertaken by the government of Belize.

The policy is likely to address the current process and work flow inefficiencies that exist within the public service in delivering services to the citizens. Change management initiative in the public service should be pioneered by the highest level of government official, in this case the Prime Minister of Belize supported by CITO and Ministry responsible for administrative services. This initiative must also be complemented by a Communications Plan to keep all stakeholders informed and aware of the changes and policy impact.

CONCLUSION

Citizen expectations have changed significantly as the world navigates the 21st century. Yet, the public sector has often been slow to respond. At the same time, governments are faced with shrinking resources as tax revenues plummet or remain stagnant in countries still troubled by sluggish economies, rising costs and, for many, an inability to provide the types of seamless service solutions citizens truly desire. Coupled with diverse populations, uncertainty as to when the global economy will return to stable growth and a more demanding citizenry, many governments find themselves challenged to take a lead role in helping to guide contemporary social and economic transformation.

These realities place immense demands on a range of public service actors, for whom the pressure to deliver value is immediate and critical. Today's civil servants find themselves caught between the curse of budgetary constraints and the constant demand for increased efficiency on one hand. On the other hand is the pressure to produce improved social outcomes from citizens increasingly exposed to superior customer service and sophisticated product offerings from around the world.

The good news is that many developing countries are quite innovative in delivering public value by leapfrogging generations of delivery models. This proves governments can, indeed, do better.

From Costa Rica, Barbados and Trinidad to Singapore, Iceland and the United Kingdom, countries around the world are designing unique models for their cultural contexts that empower citizens to become part of the process of sustained and sustainable development.

This E-Government Policy prepared on behalf of the Government of Belize is designed to develop solutions for a country that faces a distinctive set of national challenges and opportunities. In the final analysis, the power of culture and entrenched unproductive behaviours can overshadow technology's ability to bring about positive transformation. As such, these efforts will deliver value only if there is a sea change in the way in which the public sector of Belize functions, and that sea change must begin with inspired leadership from the very highest levels of Government.

Consultation Visits	
Government	Private Sector
Ministry of Finance and Economic Development	Belize Trade and Investment Development Service
Ministry of Foreign Affairs	Belize Telemedia Ltd.
Police Department, Ministry of National Security	Speednet Communication Ltd.
Ministry of Education, Youth and Sports	Karl Heusner Memorial Hospital
Ministry of Natural Resources and Agriculture	Central Bank of Belize
Ministry of Labour, Local Government, Rural Development, NEMO and Immigration and Nationality	Public Utilities Commission
Ministry of Health	Belize Coalition of Service Providers
Ministry of Forestry, Fisheries and Sustainable Development	University of Belize
Ministry of Energy, Science & Technology and Public Utilities	Belize Chamber of Commerce and Industry
Belize Archives and Record Service, Ministry of Tourism and Culture	National Institute of Culture and History
Customs and Excise, Ministry of Finance and Economic Development	
Income Tax, Ministry of Finance and Economic Development	
General Sales Tax, Ministry of Finance and Economic Development	
Ministry of Human Development, Social Transformation and Poverty Alleviation	
Ministry of Trade, Investment, Promotion, Private Sector Development and Consumer Protection	

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