

# Long white cloud heads online

The New Zealand Government is taking a coordinated approach to its e-government efforts.

By Alicia Camphuisen

AS THE INTERNET permeates society, governments around the world have focused efforts on delivering services electronically to their citizens. Joining countries such as Australia, Canada and the UK in this task has been the New Zealand Government, which has sought to bolster the success of its e-government initiatives with a top-down focus that has started by applying the lesson of facilitating interoperability in the mission to allow cross-agency information sharing.

The eGovernment Interoperability Framework (eGIF) is a core part of the NZ Government's e-Government program that dates back to May 2000, and has come from a realisation that agencies and departments were likely unable to replace their respective legacy or recently purchased IT infrastructure with new systems under a uniform platform across the country.

"The Interoperability Project (as eGIF is also known) is about working together to make services more available, uniting rules to allow systems to 'talk' to each other through a transformation mechanism," said Greg Sloane, senior IT specialist, advisor and project manager at the e-Government Unit, which falls under the reign of the NZ State Services Commission in educating agencies about e-Government. "It provides a layer to allow systems to find commonality in their operations and vocabularies and to exchange information."

To realise its vision of enabling e-services without requiring agencies to purchase new systems to participate, the e-Government Unit has worked with vendors of various sizes to build its policy of interoperability on open

standard Extensible Markup Language (XML) schemas. The project has seen companies such as Microsoft, Cisco Systems, Australian information management platform developer and consultancy MSI Business Solutions, EDS and NZ systems integrator gen-i work together for this goal.

"XML is a way of exposing information components to use and provide e-services," said MSI director George Langley of the impetus behind using the language.

"New Zealand will not move to one standard infrastructure for government, so we will use XML as one of the standards to deliver common or shared services from a range of computing infrastructures," added Mr Sloane.

## LONG HISTORY

The NZ Government's nearly two-year-old e-Government plan has its beginnings in the NZ Ministry of Social Policy's establishment of what is important in managing an agency's system,

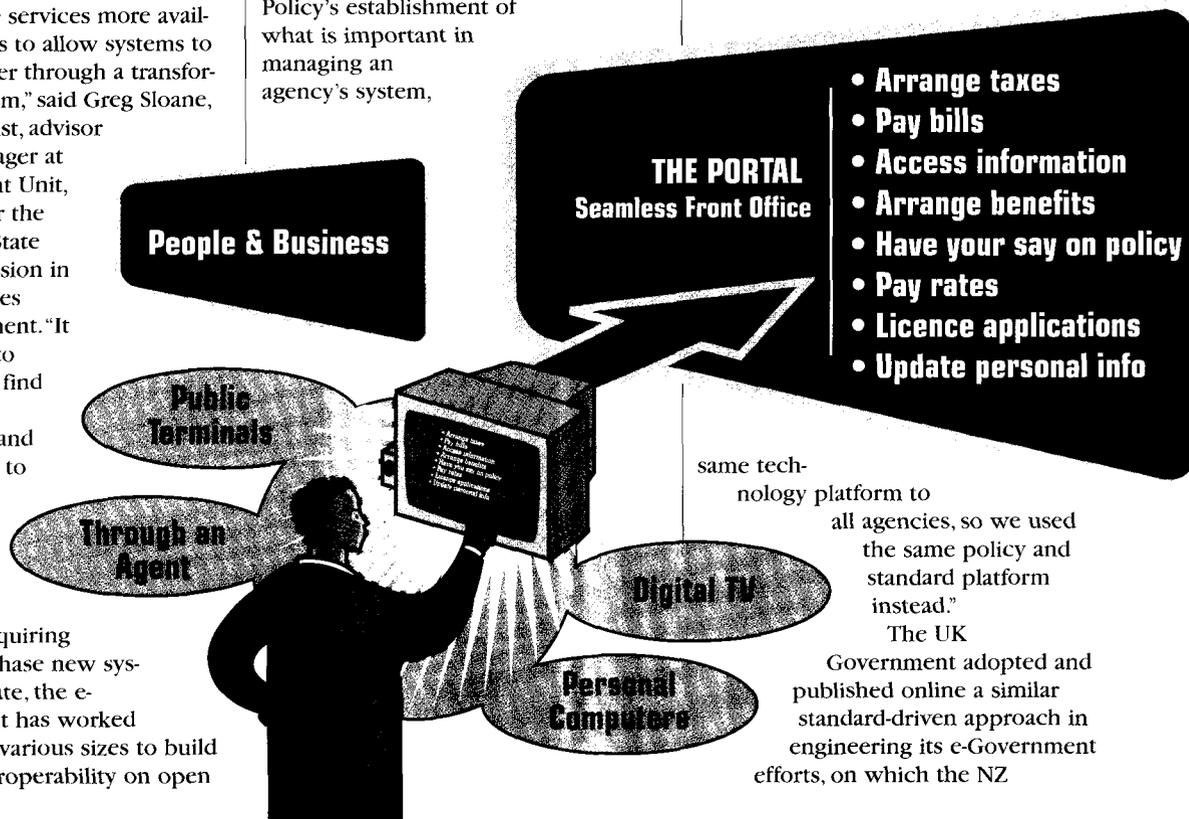


which was published in Information Systems Management and Document Management policies and standards in August 2000.

Like many other countries, NZ realised that

"turning into e-government is essential...Creating e-government is a key to our future social wellbeing through its focus on better understanding and meeting individual New Zealanders' needs and creating opportunities for greater public participation in government and democratic processes", according to NZ Minister for State Services Trevor Mallard.

"eGIF looked at leveraging Information Systems Management policies and standards," said Mr Sloane. "It was not cost efficient to ship the



The UK Government adopted and published online a similar standard-driven approach in engineering its e-Government efforts, on which the NZ

Government modelled its program.

Information sharing is key to the NZ Government's e-Government program, which was why interoperability between agencies' systems was so crucial to the process. "If you need to get a driver's license," Mr Sloane offered as an example, "under the old system you may have to go to the motor registry, find out the information you need such as a birth certificate, and then have to line up at the Births, Deaths and Marriages (BDM) office to obtain this. Then you have to get in another line at the motor registry to get your license. Or if you had to obtain a marriage certificate to change your name on your license, you may have to go to BDM to get this. While these are separate transactions, the information exists in the same database."

"There is obvious room for working together, and this is where interoperability and shared services meet, so that you could go to

Consortium; MSI contributed much of its intellectual property on xNAL during the schema's development.

Mr Sloane said the e-Government Unit has also built a testing environment to put these schemas to work and demonstrate their possible appli-

sharing of geospatial information; developing electronic procurement; and implementing a shared policy workspace in which people from different agencies in dispersed locations can collaboratively develop policy that crosses multiple areas.

## "There is room for working together, and this is where interoperability and shared services meet"

cation to agencies. "Agencies are starting to see their information management policies need tweaking and are seeing how they can apply the XML schemas," he said.

XML has not only been key to avoiding investments in new systems to support e-Government; it is also hoped that the deliberately open approach the e-Government Unit has taken to the schemas will encourage public sector buy-in to the program.

In NZ there are around 40 public service departments over which the Government can bring its mandate to bear; then there are more than 240 Crown agencies and State- and Crown-owned enterprises and other public sector stakeholders whom the Government can only encourage to participate, meaning openness is essential to the e-Government message.

"We worked with more than 65 agencies," said Mr Sloane of the NZ Government's collaborative approach to the program. "What is done internally is each agency's own management call; eGIF is about providing a platform to build business solutions."

### BIGGER VISION

eGIF is one part of the NZ Government's e-Government program, but key to facilitating other aspects such as providing for a whole-of-government approach to electronic billing and payments with the goal of a common secure transactional facility across government agencies; enabling

The NZ Government will provide the avenue for citizens to access and transact with agencies through a portal that Mr Sloane said is slated for an official opening on July 1.

The government has released the NZ Government Locator Service (NZGLS) metadata standard for the systematic creation of discovery-level metadata for this portal, that will initially be informational in nature - providing searched-for information on online and offline government services - and will in its second phase adopt a transactional model, offering services such as electronic bill or fine payments.

The metadata standard has been developed to define the structure of descriptions government agencies apply to their information and services, as so many stakeholders contribute their information to the portal; it will also define the words used to describe information and services in a move to maximise the portal's usefulness to citizens.

eGIF, as a key element in driving NZ's e-Government program, is now going through due government process, after which the framework will be briefed to ministers and a white paper will be prepared for the NZ cabinet to approve. Mr Sloane said he expected these steps to be completed by June; then he said that eGIF will await approval for use, "meaning it sits in agency land waiting for them to implement it with the help of integrators or consultants. It has to wait for agencies to decide to work together."

Confident that the e-Government Unit's combined work with vendors to create an open standard approach will win broad public sector support, Mr Sloane said that the e-Government program is planned for completion by July 2003.

### THE BACK OFFICE

- Local government
- NZ public service departments
- Crown entity
- State-owned enterprises
- Other

the motor registry where they could obtain the necessary information from BDM. It's about thinking about how government and citizens interact."

"The framework also includes security and privacy considerations," said Mr Langley. "There is strong governance, as agencies have a stake in the other guy's system with interoperability."

The two schemas on which eGIF is set to be based are the Geography Markup Language (GML) developed by the Open GIS Consortium, and the extensible Name and Address Language (xNAL) from the Organisation of Advancement of Structured Information Standards (OASIS) and the Worldwide Web