



Ministry of Lands and Natural Resources

Kingdom of Tonga



UN-GGIM
UNITED NATIONS INITIATIVE ON
GLOBAL GEOSPATIAL
INFORMATION MANAGEMENT



United Nations

11TH TRANCHE DEVELOPMENT ACCOUNT PROJECT
STRENGTHENING GEOSPATIAL INFORMATION MANAGEMENT IN DEVELOPING COUNTRIES
TOWARDS IMPLEMENTING THE 2030 AGENDA FOR SUSTAINABLE DEVELOPMENT
(PROJECT 1819D)

Development Account Project Country Action Plan

Integrated Geospatial Information Framework | Integrated Geospatial Information Management

GEOSPATIAL LANDSCAPE - A GOVERNMENT PERSPECTIVE

ROSAMOND BING

Chief Executive Officer

Ministry of Lands and Natural Resources



NATIONAL GEOSPATIAL ACTION PLAN 2020 – 2025

(United Nations Trust Fund Development Account Project)



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VISION

***A higher quality of life for all Tongans
supported by accessible, accurate and reliable
integrated geospatial information***



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Mission Statement

Promote and support robust coordination and collaboration to achieve a integrated geospatial information management and leverage IGIM as a decision-based mechanism and provide sustainable solutions to local and national needs and opportunities.



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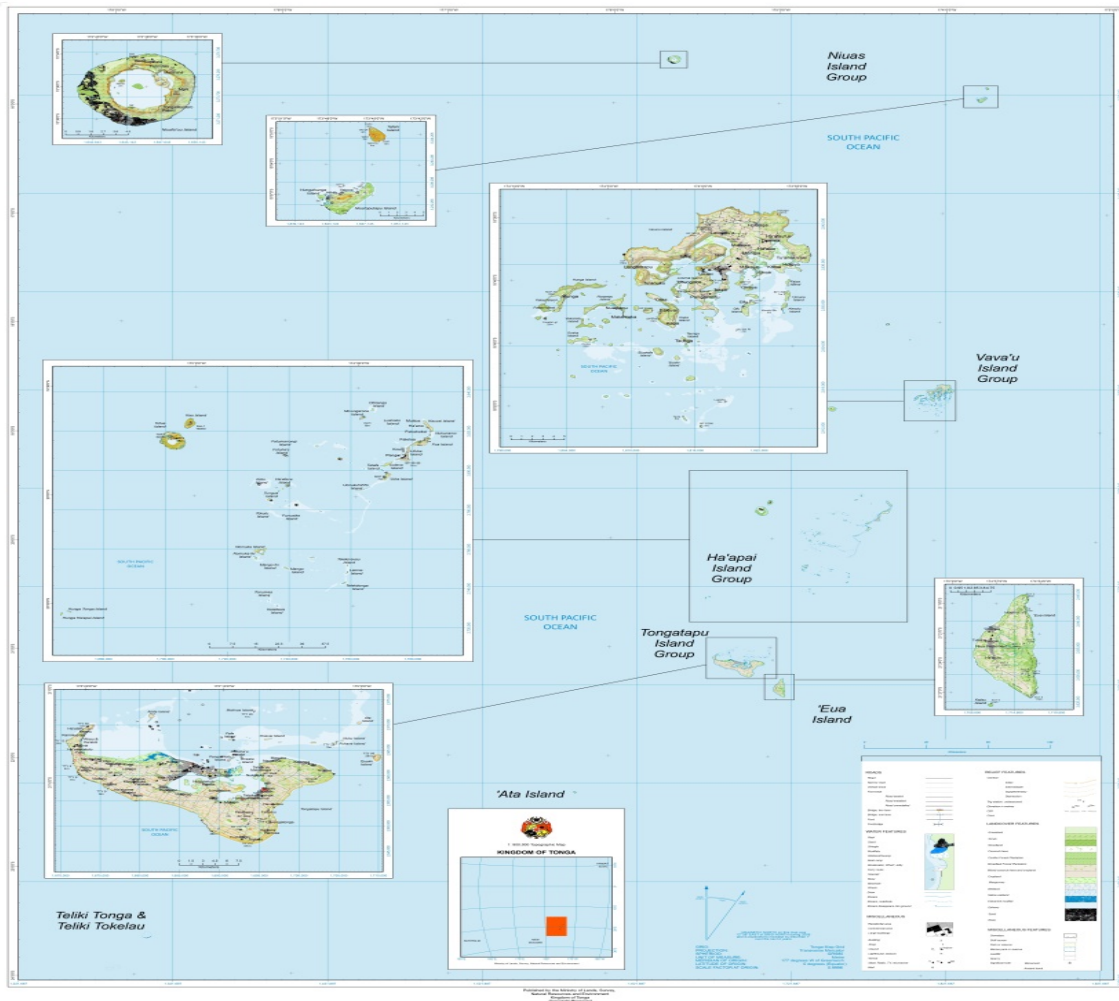
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Country Profile



Tonga Country Action Plan Background

- Tonga Location: **Latitude: 21°24'30"S** and **Longitude: 175°58'46" W.**
- Population: 100,651 (2011 census) 19% increase projected by 2030.
- **Land Areas by Island Group:** Tongatapu 706.703km², Vava'u: 237.332km², Ha'apai: 356.248km², Niuas: 71.220km²
- **Ocean Area (EEZ):** 761011.823km²



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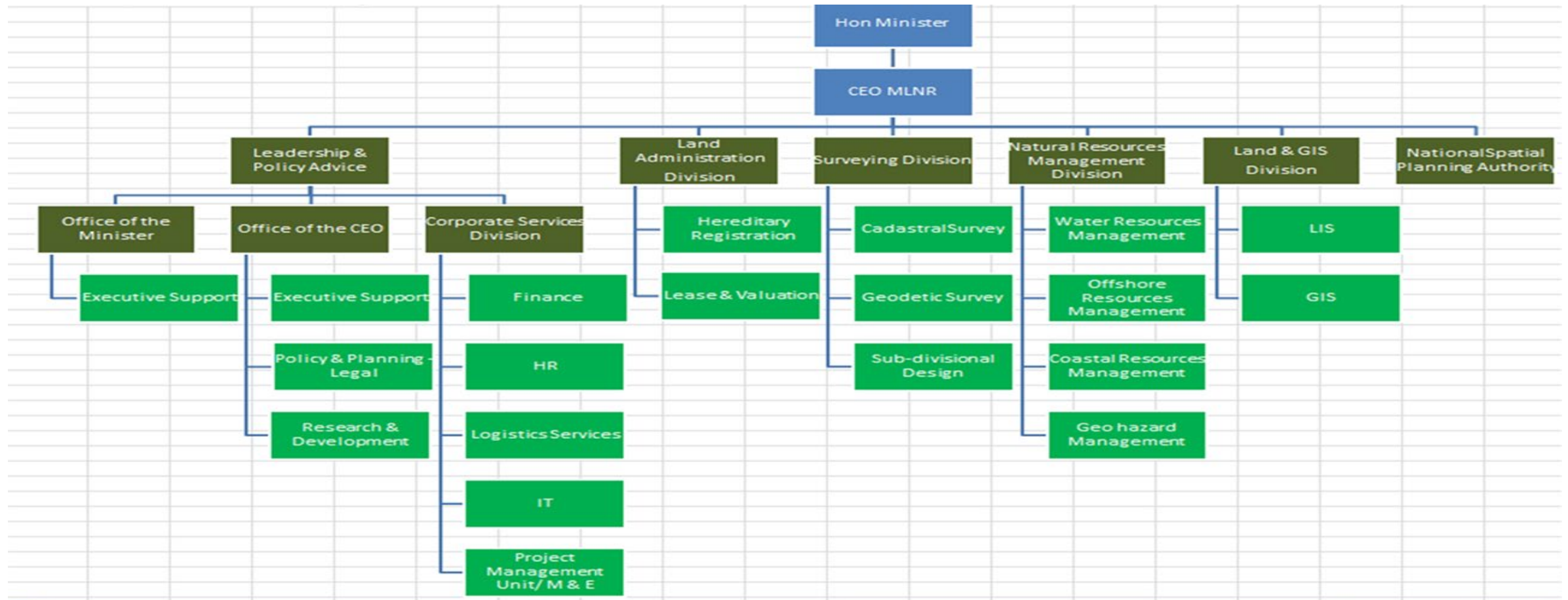
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Organizational Profile of the Ministry of Lands and Natural Resources



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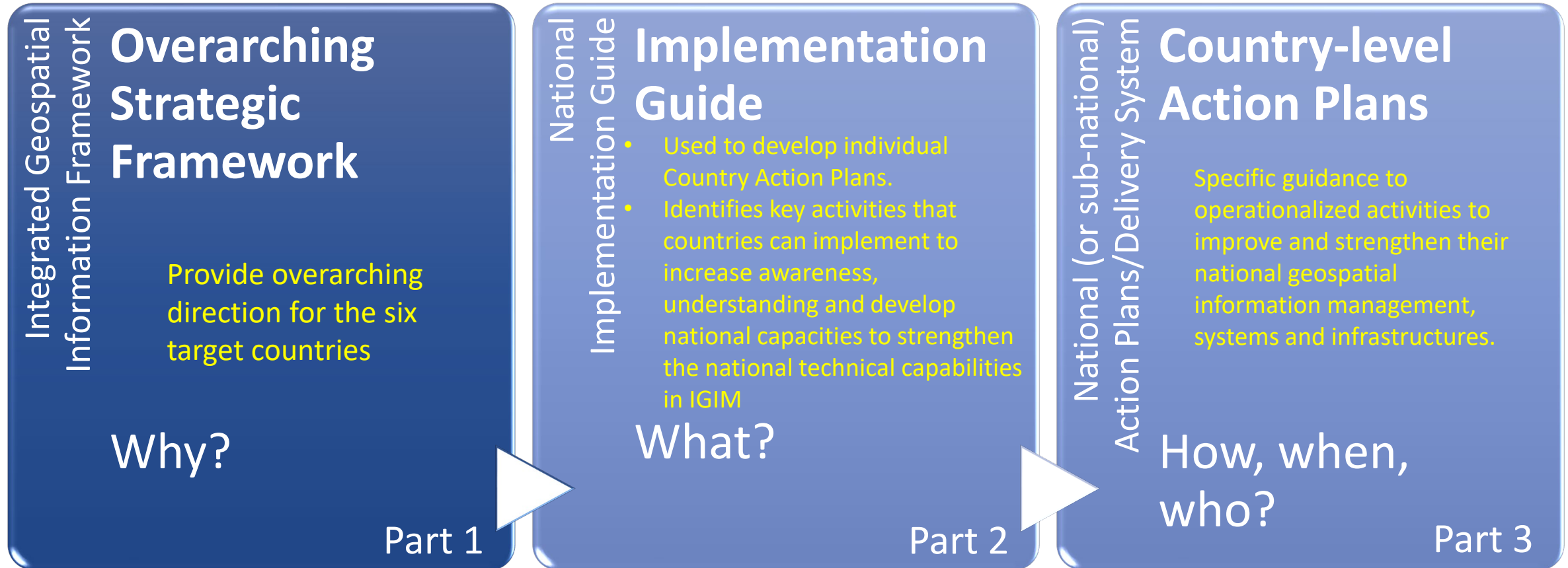


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Integrated Geospatial Information Framework Parts





Development Account Project Plan

TOWARDS STRENGTHENING ARRANGEMENTS IN NATIONAL GEOSPATIAL INFORMATION MANAGEMENT

United Nations 11th Tranche Development Account
**Project 1819D “Strengthening Geospatial Information Management in Developing Countries towards
Implementing the 2030 Agenda for Sustainable Development”**



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METHODOLOGY:

Survey Questionnaires
distributed
to identify Current and
Desired Performance

GOAL 1: Effective Geospatial Information Management		
Enabling geospatial information governance, policy and institutional arrangements that ensure effective geospatial information management, accommodate individual organizational requirements and arrangements, and that are aligned to national and global policy frameworks.		
Current Performance <u>Progress</u> 1 = Not started; 2 = Minimal; 3 = Moderate; 4 = Extensive; 5 = Achieved	Statement The extent to which our governance arrangements for geospatial information management bring together a broad range of institutions to share and provide access to data.	Desired Performance <u>Priority</u> 1 = Low and 5 = High
① ② ③ ④ ⑤		① ② ③ ④ ⑤
Comment:		
Current Performance <u>Progress</u> 1 = Not started; 2 = Minimal; 3 = Moderate; 4 = Extensive; 5 = Achieved	Statement The extent to which our geospatial policies and laws stimulate data sharing, innovation and use of geospatial information.	Desired Performance <u>Priority</u> 1 = Low and 5 = High
① ② ③ ④ ⑤		① ② ③ ④ ⑤
Comment:		
Current Performance <u>Progress</u> 1 = Not started; 2 = Minimal; 3 = Moderate; 4 = Extensive; 5 = Achieved	Statement The extent to which our technologies and processes enable geospatial information to be easily shared with the broader community of users.	Desired Performance <u>Priority</u> 1 = Low and 5 = High
① ② ③ ④ ⑤		① ② ③ ④ ⑤
Comment:		



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MANAGEMENT

GIS User Group

- **Ministry of Lands and Natural Resources**
- **Ministry of Tourism**
- **Ministry of Agriculture, Forestry and Food**
- **Ministry of Fisheries**
- **Tonga Statistic Department**
- **Ministry of Education and Training**
- **His Majesty's Armed Forces**
- **Tonga Power Limited**
- **Tonga Water Board**
- **Tonga Airport Limited**
- **Waste Authority**
- **Police Tonga Department**
- **Ministry of Environment, Information, Disaster, Energy and Climate Change**



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Needs Assessment and Gap Analysis

- articulates the collective vision and goals of Tonga and its stakeholders for integrated geospatial information management;
- reviews the current state of integrated geospatial information management and identification of the challenges faced
- identifies possible strategies of action to minimize or solve the gaps and improve the current state of integrated geospatial information management



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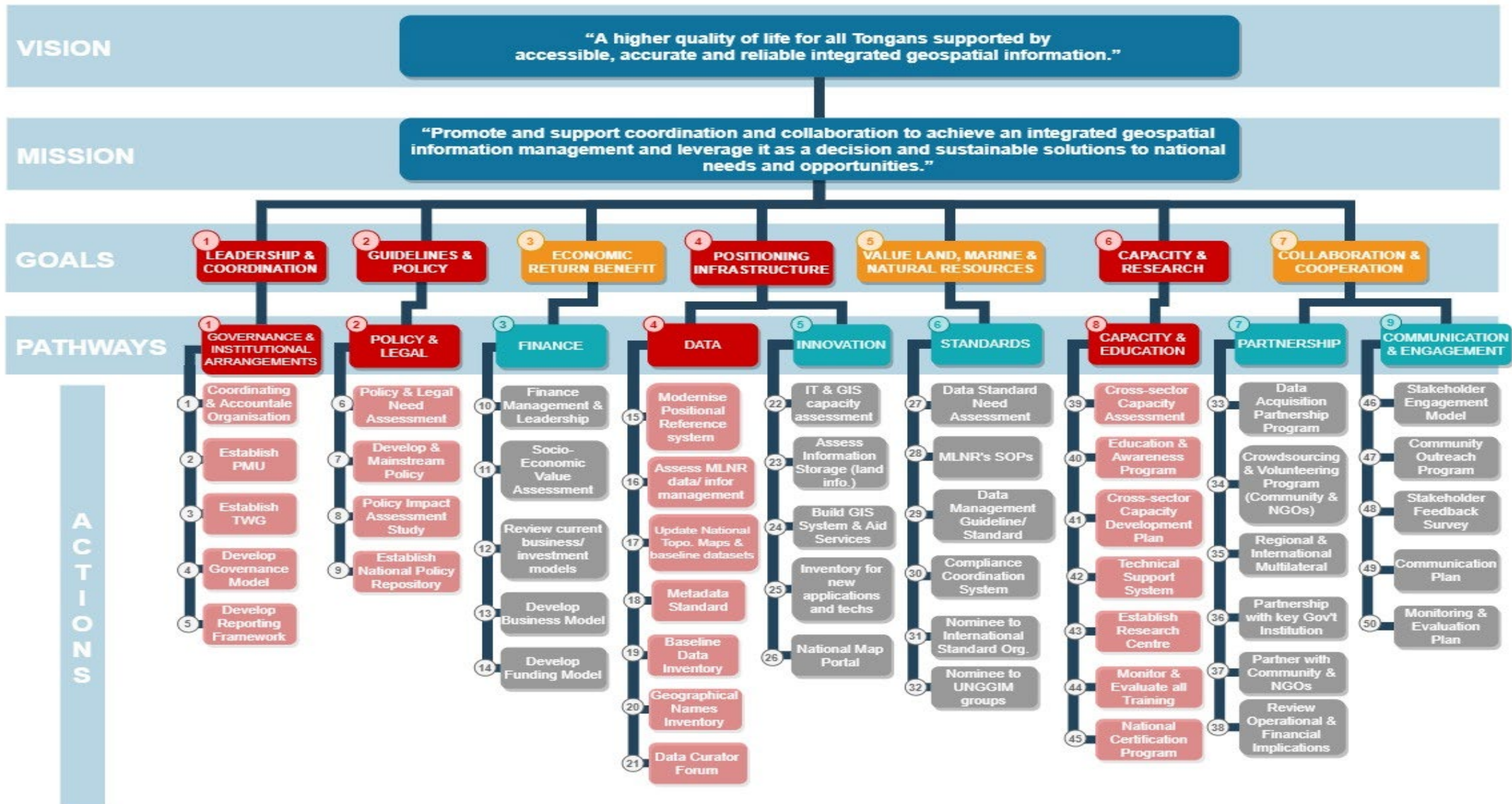


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Structure of Tonga CAP



CAP GOALS : 4 PRIORITY AREAS

To expand capacity development, initiate research and innovation of GIS application progressively with a focus on advancing ENVIRONMENTAL MONITORING , EMERGENCY MANAGEMENT AND DISASTER RISK REDUCTION.



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CAP GOALS : 4 PRIORITY AREAS

Establish LEADERSHIP AND COORDINATION
necessary to deliver and manage an
effective integrated geospatial information
by 2020 - 2023



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CAP GOALS : 4 PRIORITY AREAS

Develop GEOSPATIAL GUIDELINES,
RESPONSIBILITIES AND POLICY
FRAMEWORK by 2020-2025 to promote
data standards, sharing and accessibility



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CAP GOALS : 4 PRIORITY AREAS

To provide accurate, reliable, timely,
accessible and fit-for-purpose
**INTEGRATED GEOSPATIAL
INFORMATION FOR ALL USERS in
Tonga**



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Tonga CAP Development Progress

1. Project Execution

- Initiatives Meeting/ Training
- Pre-needs assessment & Activities
- Stakeholder Meetings

2. Baselines and Assessment

- Questionnaires distributed to Government Ministries & NGOs

3. Country Action Plan

- Planning
- Reviewing
- Amending
- Conduct *Talanoa* Sessions

4. Implementation

- Monitoring
- Evaluation



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Current Tonga CAP

- Reviewing of the CAP
- Weekly Meetings with the UN consultants
- Take comments from UN consultants
- Amending of the CAP (Tonga GIS Team)
- 2nd Stakeholder meeting (Soon)
- Once is all ready the Launching of the Tonga CAP



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Alignment of Strategic Goals



TONGA
National Infrastructure Investment Plan
2013 -2023

Combine Utilities Business Plan
2018 - 2022

THE KINGDOM OF TONGA
Tonga Agriculture Sector Plan
2016-2020

THE KINGDOM OF TONGA
Tonga Fisheries Sector Plan
2016-2024

NATIONAL



GOVERNMENT OF TONGA
JOINT NATIONAL ACTION PLAN 2 ON CLIMATE CHANGE
AND DISASTER RISK MANAGEMENT (JNAP 2)
2018-2028

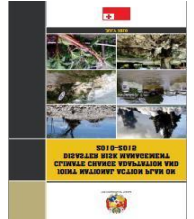


August 2018

Kingdom of Tonga

National Biodiversity Strategy & Action Plan

The 2018-2023 Tonga Digital Government Strategic Plan
"Building A More Progressive Tonga Supporting Higher Quality of Life for All"



REGIONAL

**THE FRAMEWORK FOR
PACIFIC REGIONALISM**

2014



**Framework for Resilient
Development in the Pacific**

2017 - 2030



INTERNATIONAL



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ACKNOWLEDGEMENTS



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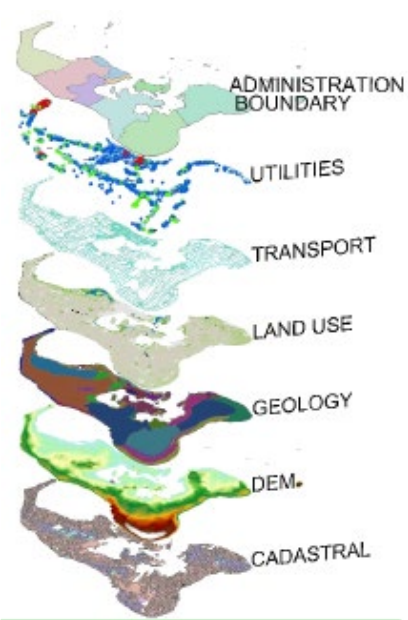


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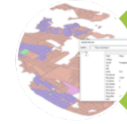
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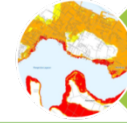
GIS-based Decision
Support System



Disaster Risk
Management Services



High Quality Land
Administration Services



Climate Change Impact
Assessment Services

MALO 'AUPITO

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Ministry of Lands and Natural Resources (MLNR),

Vuna Road, Nuku'alofa, Tonga.

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