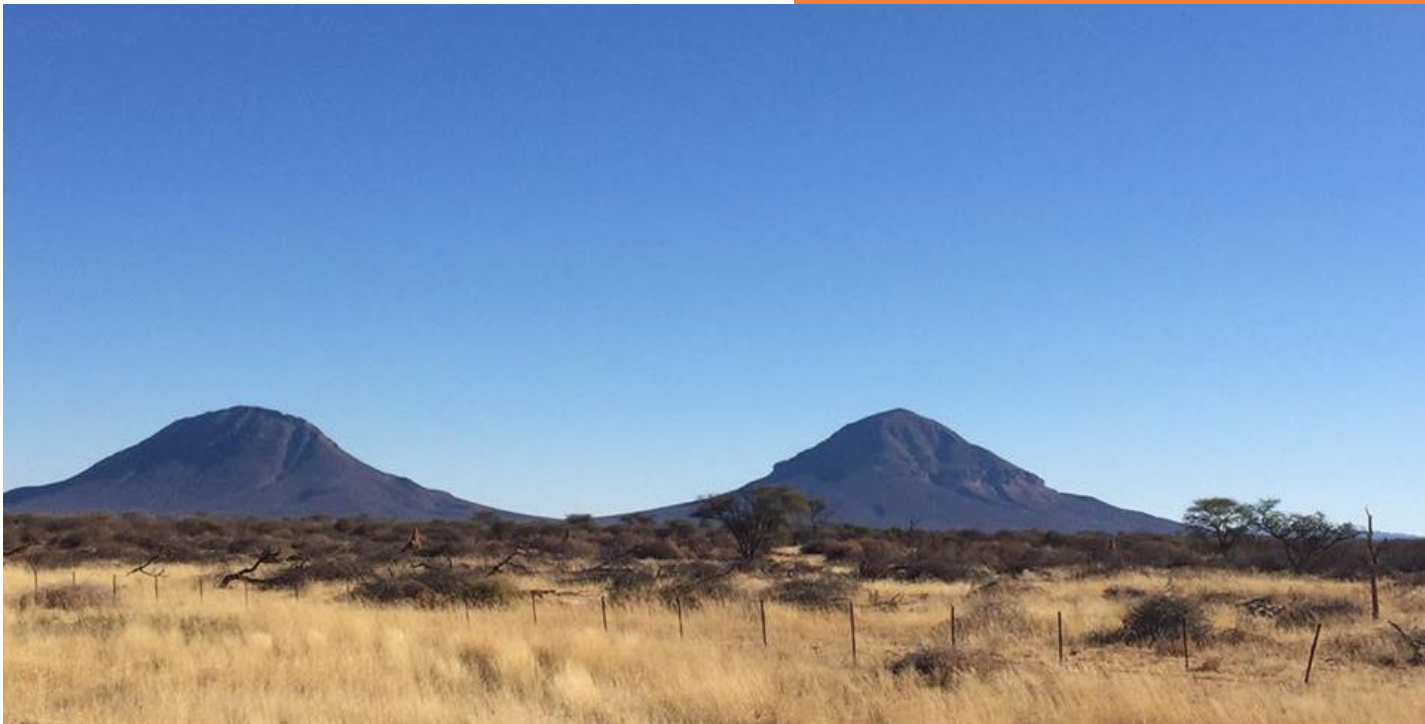




Capacity Assessment Report of the National Disaster Risk Management System in Namibia



September 2016

Table of Contents

Acronyms.....	5
1. Introduction	7
2. Capacity Assessment Methodology and Process	8
2.1. Methodology.....	8
2.2. Assessment team	9
2.3. Data collection and analysis.....	9
3. Capacity Assessment Results and Recommendations	10
3.1. Pillar 1: Understanding disaster risk.....	10
3.1.1. Existing capacities.....	10
3.1.2. Challenges	12
3.1.3. Recommendations	12
3.2. Pillar 2: Strengthening governance and institutions to manage disaster risk	15
3.2.1. Existing capacities.....	15
3.2.1.1. Legislative, policy and planning frameworks	15
3.2.1.2. Institutional framework	16
3.2.1.2.1. National level	16
3.2.1.2.2. Sub-national level.....	17
3.2.1.2.3. Sectorial level	18
3.2.2. Challenges	18
3.2.2.1. National level.....	18
3.2.2.2. Sub-national level.....	19
3.2.3. Recommendations	20
3.2.3.1. Recommendations for the DRM system at the national level	20
3.2.3.2. Recommendations for the DRM system at sub-national level	21
3.2.3.3. Recommendations for the Directorate DRM	21
3.3. Pillar 3: Investing in economic, social, cultural, and environmental resilience	23
3.3.1. Agriculture.....	23
3.3.1.1. Existing capacities.....	23
3.3.1.2. Challenges	25
3.3.1.3. Recommendations	26

3.3.2.	Health	27
3.3.2.1.	Existing capacities.....	27
3.3.2.2.	Challenges	27
3.3.2.3.	Recommendations	27
3.3.3.	Environment.....	28
3.3.3.1.	Existing capacities.....	28
3.3.3.2.	Challenges	28
3.3.3.3.	Recommendations	29
3.4.	Pillar 4: Enhancing preparedness for effective response, and building back better in recovery and reconstruction	30
3.4.1.	Coordination mechanism for preparedness and response.....	30
3.4.1.1.	Existing capacities.....	30
3.4.1.2.	Challenges	30
3.4.1.3.	Recommendations	31
3.4.2.	Emergency preparedness and response capacities	31
3.4.2.1.	Existing capacities.....	31
3.4.2.2.	Challenges	32
3.4.2.3.	Recommendations	32
3.4.3.	Contingency planning.....	33
3.4.3.1.	Existing capacities.....	33
3.4.3.2.	Challenges	33
3.4.3.3.	Recommendations	33
3.4.4.	Hazard monitoring, forecasting and early warning.....	34
3.4.4.1.	Existing capacities.....	34
3.4.4.2.	Challenges	34
3.4.4.3.	Recommendations	35
3.4.5.	Information management and communication.....	35
3.4.5.1.	Existing capacities.....	35
3.4.5.2.	Challenges	35
3.4.5.3.	Recommendations	36
3.4.6.	Post-disaster recovery.....	36
3.4.6.1.	Strengths	36
3.4.6.2.	Challenges	36

3.4.6.3. Recommendations	37
4. Recommendations related to leveraging UN System support to Namibian Government on DRM.....	38
5. Prioritized Recommendations for a National Plan/ Framework of Action	39
5.1. Prioritization methodology	39
5.2. Prioritized actions for Pillar 1: Understanding disaster risk.....	39
5.3. Prioritized actions for Pillar 2: Strengthening governance and institutions to manage disaster risk	43
5.4. Prioritized actions for Pillar 3: Investing in economic, social, cultural, and environmental resilience.....	46
5.5. Prioritized actions for Pillar 4: Enhancing preparedness for effective response, and building back better in recovery and reconstruction.....	48
5.6. Prioritized actions related to leveraging UN System support to Namibian Government on DRM.....	50

Acronyms

3W	Who does What, Where
4W	Who does What, Where, When
APEES	Agricultural Production, Extension and Engineering Services
CADRI	Capacity for Disaster Reduction Initiative
CCA	Climate Change Adaption
CDRMC	Constituency Disaster Risk Management Committee
DAPEES	Department for Agricultural Production, Extension and Engineering Services
DDRM	Directorate Disaster Risk Management
DM	Disaster Management
DRM	Disaster Risk Management
DRMA	Disaster Risk Management Act
DRMC	Disaster Risk Management Committee
DRR	Disaster Risk Reduction
EW	Early Warning
EWS	Early Warning System
FAO	Food and Agriculture Organization
GFDRR	Global Facility for Disaster Reduction and Recovery
GIS	Geographic Information system
HAZMAT	Hazardous materials and items
HIV	Human Immunodeficiency Virus
IFRC	International Federation of Red Cross and Red Crescent Societies
IM	Information Management
IOM	International Organization for Migration
ISDR	International Strategy for Disaster Reduction
M&E	Monitoring and Evaluation
MAWD	Ministry of Agriculture and Water Development
MET	Meteorological Service
MICT	Ministry for Information, Communication and Telecommunications
MoA	Ministry of Agriculture, Water Affairs and Forestry
MoE	Ministry of Environment
MoH	Ministry of Health
MoU	Memorandum of Understanding
NASA	National Aeronautics and Space Administration
NDF	National Defence Forces
NDP	National Development Plan
NDRMC	National Disaster Risk Management Committee
NDRMP	National Disaster Risk Management Plan
NDRMS	National Disaster Risk Management System

NEMS	National Emergency Management System
NGO	Non-governmental Organization
NSA	Namibia Statistics Agency
NSDI	Namibian Spatial Data Infrastructure
OCHA	Office for the Coordination of Humanitarian Affairs
OPM	Office of the Prime Minister
P-Code	Precision Code (part of the Global Positioning System signal)
PD	Post Disaster
PDNA	Post Disaster Needs Assessment
RDRMC	Regional Disaster Risk Management Committee
REMU	Regional Emergency Management Unit
SADC	Southern African Development Community
SARCOF	Southern Africa Regional Climate Outlook Forum
SOP	Standard Operating Procedure
TOR	Terms of Reference
UN	United Nations
UNAM	University of Namibia
UNCT	United Nations Country Team
UNDAC	United Nations Disaster Assessment and Coordination
UNDP	United Nations Development Programme
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNFCC	United Nations Framework Convention on Climate Change
UNICEF	United Nations Children's Fund
UNISDR	United Nations Office for Disaster Risk Reduction
UNITAR	United Nations Institute for Training and Research
UNOCHA	United Nations Office for the Coordination of Humanitarian Affairs
UNOPS	United Nations Office for Project Services
UNRC	United Nations Resident Coordinator
UT	University of Technology
WASH	Water, Sanitation and Hygiene
WFP	World Food Programme
WHO	World Health Organization
WMO	World Meteorological Organization

1. Introduction

Namibia is experiencing a complex combination of factors, which render it vulnerable to disasters. The HIV/AIDS pandemic, deepening food insecurity and the increasing challenges facing national institutions to effectively provide adequate social services have a negative impact on the resilience and coping mechanisms of households. Hazards such as floods, drought and desertification are interrupting progress in human development. The net result of the crisis is that limited resources intended for development have to be diverted to disaster response, which delays planned developmental programmes.

Poverty is the major contributing factor to increased vulnerability to disaster in Namibia. There are disparities in infrastructure development throughout the country especially between the urban and rural areas. In addition, there exists unequal access to quality education, health services and employment opportunities between the rural and urban areas. All of these represent other dimensions of poverty in Namibia. The economic and geographical dualism, which is partly a legacy of the colonial past of the country, poses one of the biggest challenges in the fight against poverty and vulnerability in Namibia.

In order to address the challenges posed by the disaster and climate risk facing the country, the Government of Namibia set up a National Disaster Risk Management System (NDRMS). The NDRMS is the successor of the National Emergency Management System (NEMS) established in 1994, and is founded on the Disaster Risk Management Act (2012) and its regulatory framework (2013), the National Disaster Risk Management Plan (2011), and the National Disaster Risk Management Policy (2009). This framework is representative of the wider global paradigm shift away from a disaster response approach to one of comprehensive DRM that takes account of a wide range of hazards and stakeholders. The NDRMS is aligned to relevant international agreements such as the Hyogo Framework for Action (2005-2015), the Sendai Framework (2015-2030), the Kyoto Protocol, and the Africa Regional Strategy for Disaster Risk Reduction.

In the wake of the drought triggered by the El Nino phenomenon in 2016 which has affected Namibia along with the Southern Africa sub-region, the Government seized the opportunity to undertake a capacity and needs assessment of the NDRMS. The purpose of the assessment was to identify priority actions required for building the NDRMS capacity at all levels to reduce the risk of disasters, enhance preparedness levels, and to ensure swift recovery capacity after an emergency.

A national capacity assessment was thus undertaken under the leadership of the Government of Namibia through the Directorate Disaster Risk Management. The exercise was supported by the UN System through the UN Country Team in Namibia, the Capacity for Disaster Reduction Initiative (CADRI) and experts deployed through the United Nations Disaster Assessment and Coordination (UNDAC) system.

The national capacity assessment identified existing capacities, gaps and needs related to disaster risk management, and proposed a set of prioritized recommendations on how these capacities can be strengthened. The prioritized recommendations form the backbone of a National Plan/Framework for Action for Disaster Risk Management in Namibia which will guide the efforts of all stakeholders involved in disaster risk management to implement the requirements of the Sendai Framework.

2. Capacity Assessment Methodology and Process

2.1. Methodology

The capacity assessment was based on the CADRI methodology for assessing DRM capacity, and the UNDAC methodology for assessing capacity related to preparedness and response.

CADRI is an interagency partnership composed of UNDP, UNOCHA, UNICEF, WFP, FAO and WHO as executive partners and WMO, UNOPS, UNITAR, UNESCO, IFRC and GFDRR as observers. CADRI was established in 2007 and its membership expanded to additional agencies in 2012 and 2014. The objective of the CADRI partnership is to enable the UN and other members of the ISDR system to support Governments build and implement a coherent framework for developing national capacities for disaster risk reduction, including preparedness for response¹.

The **CADRI Capacity Assessment and Planning Tool for Disaster Risk Management** was developed by the CADRI members and other partners in order to support the assessment of capacities of the disaster risk management system in any given country in line with the priority areas of the [Sendai Framework for Disaster Risk Reduction](#) (2015-2030). The capacity assessment was conducted with a focus on national and local capacities for DRR, using the indicators set for the implementation of the Sendai Framework for DRR (see below) and the five technical areas of capacity development, namely (i) ownership, (ii) institutional arrangements, (iii) competencies, (iv) working tools and resources, and (v) relationships. The CADRI Tool is divided into a generic Disaster Risk Management questionnaire which is structured according to the 4 priority areas of action of the Sendai Framework and 9 sectorial modules: Health; Infrastructure; Agriculture and food security; Human mobility; Education; Environment; WASH; Nutrition; Climate services.

Figure 1. Sendai Framework for Disaster Risk Reduction (2015-2030): Priorities for Action



Based on the assessment findings, a set of capacity development recommendations are proposed to address the gaps and challenges identified for each of the priority areas. The level of the proposed actions takes into consideration the country's real capacity to implement them within an agreed timeframe. It is expected that the assessment results and recommendations presented in this report will guide the Government of Namibia in undertaking necessary steps in the implementation of its commitments under the Sendai Framework.

¹ More information on the CADRI partnership is available at www.cadri.net.

2.2. Assessment team

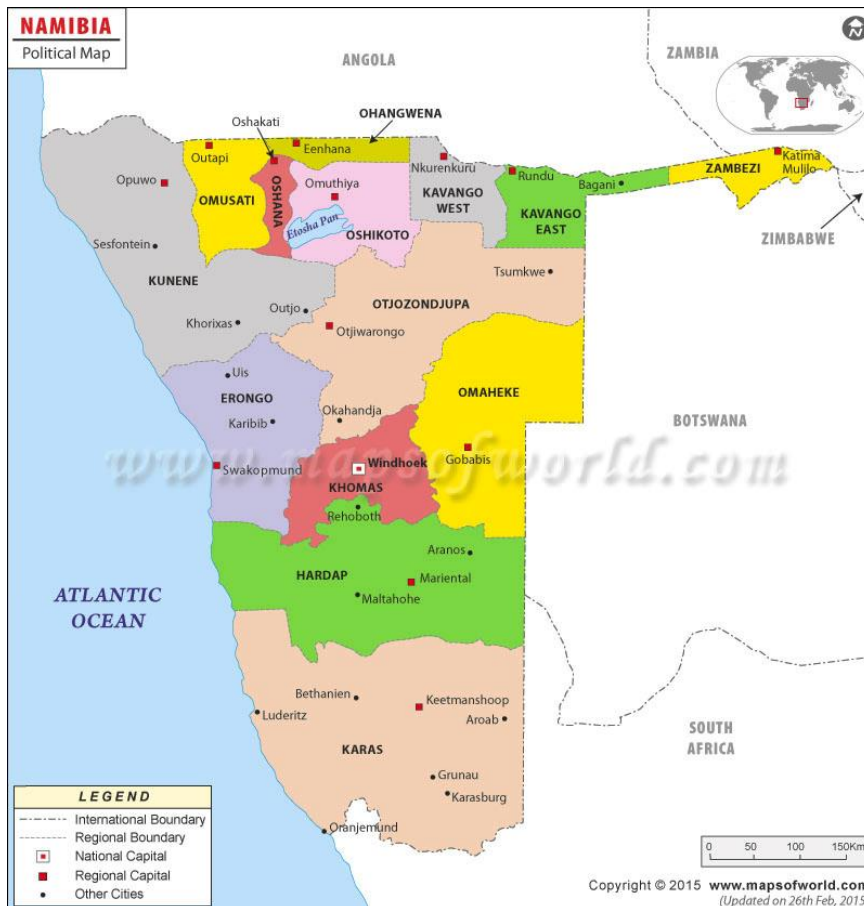
The capacity assessment was carried out by a multi-disciplinary team composed of:

- Five representatives of the Directorate Disaster Risk Management;
- Five staff from various agencies from the UN Country Team and the UN Resident Coordinator's Office;
- Five international staff of UN agencies from global and regional levels: UNDP Geneva; OCHA Nairobi; FAO Johannesburg; WHO Harare; IOM Maputo;
- Seven national experts deployed through the UNDAC system, representatives of Governments of: South Africa, Malawi, Mozambique, Nigeria, Germany, Estonia and MapAction, a UK-based NGO specialized in information management and mapping

2.3. Data collection and analysis

The capacity assessment included interviews with approximately 35 institutions (21 at the central level and 14 at local level), and comprised field trips to 4 Regions presenting various risk profiles (Ohangwena; Zambezi; Khomas; Hardap). The assessment also comprised a capacity and skills audit of the Directorate DRM as the main institution mandated to coordinate DRM activities for the national system in Namibia.

Figure 2. Field trip locations of the capacity assessment: Ohangwena; Zambezi; Khomas; Hardap



3. Capacity Assessment Results and Recommendations

3.1. Pillar 1: Understanding disaster risk

Policies and practices for disaster risk management should be based on an understanding of disaster risk in all its dimensions of vulnerability, capacity, exposure of persons and assets, hazard characteristics and the environment. Such knowledge can be leveraged for the purpose of pre-disaster risk assessment, for prevention and mitigation and for the development and implementation of appropriate preparedness and effective response to disasters.

3.1.1. Existing capacities

The assessment found that a majority of respondents have a **good understanding** of disaster and climate risks and a fair understanding of what disaster risk management means for their field of work. At the local level, **community awareness** on DRM is undertaken regularly by the Red Cross in the regions where it is operating and the local government structures. A **school initiative** programme is operational in the capital city, Windhoek (hazard awareness, emergency preparedness, school drills). UNICEF, IOM and the Ministry of Education have supported the Government in developing a manual on emergency preparedness and response for schools.

Various institutions are in charge of data collection and forecasting: meteorology, hydrology and statistics, among others.

The **meteorological service** is mandated to monitor and provide weather data to aviation and to disseminate the information through various means including their radio stations. Currently the Meteorological Service establishment is rather small but government through the Permanent Secretary for Works and Transport has recently approved a new organogram of the service. The new structure provides for 4 specialists being deployed to the regions. Currently the Meteorological Service has 6 weather stations, 35 automatic weather stations and 173 rain stations throughout the country. Satellite/ remote sensing is equally used for weather monitoring. The Meteorological Service has a unit that deals with data and information. Information sharing is done through the media in conjunction with the Ministry of Communication and Information Technology. The Meteorological Service also holds a secure database that can be accessed by Universities and students. The Meteorological Service also participate in DRM and Agricultural Assessments led by the Ministry of Agriculture and/ or DDRM. In addition, the Meteorological Service work in collaboration with SADC and World Meteorological Organization (WMO).

Hydrological services in Namibia fall under the mandate of the Hydrology Division under the Ministry of Agriculture, Water and Forestry. The Hydrology Division is contributing to the building of resilience to communities and livelihoods based on hydro data collection and monitoring of rivers and other surface reservoirs using satellite imaging as a means of early warning and flood management. The Hydrology Division collaborates with several organizations and institutions, such as Ministry of Agriculture, Water and Forestry, the Namibia Statistics Agency (NSA), Meteorological Services and various regional and international protocols as well as organizations such as University of Namibia (UNAM), Namibia University of Science and Technology (NUST), NASA, UNESCO and intergovernmental council. It supports staff capacity building through partnership with UNAM and NUST for tailored MSc training in Environmental Engineering as well

as in related short courses. Namibia has a network of 15 hydrological stations and 120 data collection points with automatic rain gauges, and uses satellite imaging. The division developed a data sharing protocol of information on droughts and floods including significant rainfall events. The Division has also undertaken hydrological mapping in partnership with NSA, which hosts the hydrological data sets.

The **Namibia Statistics Agency (NSA)** is the central statistical authority for the State and is mandated to develop and manage the National Statistics System. As such, the NSA collects, produces, analyzes and disseminates official and other statistics in Namibia and facilitates the capture, management, maintenance, integration, distribution and use of spatial data. The NSA is also in charge of establishing the National Spatial Data Infrastructure, acting as its Secretariat, and the Committee for Spatial Data. The NSA provides early warning and response information through GIS, and undertakes baselines analysis, mapping and projections. The NSA also participate in health surveys, and other sectorial surveys. The NSA has operational presence at regional level across the country. It has a communications unit, a documentation repository and disseminates information through the media, website and specific requests. The NSA has a MOU with University of Namibia and Namibia University of Science and Technology, enabling shared curriculum between the institutions.

In terms of community-based **early warning systems (EWS)**, the Zambezi region – which is the most flood-prone region in the country – has set up EWS in 8 communities along the most flood prone areas, based on the river scales. The Namibia Red Cross has conducted activities to strengthen community resilience to floods by capacitating them to build resilient houses based on the guidelines delivered from the support of the American Red Cross. In terms of the formal EWS, the hydrology department shares information with the Regional Disaster Risk Management Centre (RDRMC) regarding rainfall and river level projections. Early warning messages are also passed by the local radio stations.

Vulnerability assessments are carried out in Namibia by a number of institutions, including the DDRM, Ministry of Agriculture, Water and Forestry, the Meteorological Service. Vulnerability assessment training workshops and vulnerability assessments have been supported by partners such as FAO and WFP. For instance, FAO supports capacity building exercises such as training of trainers on community-based climate change adaptation (CCA), mainstreaming DRR and CCA, village-level training workshops targeting drought affected vulnerable communities.

DDRM with support from WFP have established a Food and Nutrition Security System that provides a harmonized information for early warning and impact analysis for timely evidence based decision making and response. The system utilizes sentinel site approach for household data collection on food access and utilization. The system is rolled-out nationally. The data on key food security indicators (including household level food sources, food market prices, food consumption patterns, income sources and expenditure patterns, livelihood coping strategies, terms of trade, water and sanitations) is collected, analysed and reported twice yearly to complement the annual vulnerability assessment by NamVac and Crop assessment by the Ministry of Agriculture and forestry.

The SADC Regional Vulnerability Assessment and Analysis (SADC-RVAA) has also supported vulnerability assessments in Namibia.

3.1.2. Challenges

At the time of the assessment, a **national multi-hazard risk profile of Namibia** was absent. Similarly, there is no unified multi hazard risk analysis and assessment methodology commonly agreed and used by all institutions that need to participate to such an exercise. Namibia does not have a central repository for historical disaster impact data.

Although **information sharing protocols are in place**, and information is shared among institutions largely on a bilateral basis (i.e. the Meteorological Service to DDRM; the Meteorological Service to Ministry of Agriculture; etc.). The assessment found that the operational coordination among technical services such as meteorological and hydrological services and line ministries was inadequate. Similarly, there is inadequate coordination between DDRM and line ministries with regards to early warning.

Certain respondents indicated the need for «life skills» in **school curricula** to be expanded to include DRM focusing on preventive action as well as preparedness and response skills. At higher education level, DRM programmes could be further promoted particularly with the view of producing the right skilled professionals. Professions such as information management, analysis, statistics and assessment could be reinforced if technical education and training are provided at secondary and postgraduate education levels.

Regarding **information management**, standard codes, such as P-Codes are not used for the numerous assessments carried out. Although information is shared, it is unclear if all outward going communication is received and understood by intended recipients.

During the field trips organized for the assessment, it was found that **duplications** are common in local-level **data collection**. Ministries and Institutes should work together to reduce the amount of duplicate data collection in the field.

There is a gap in understanding the **logistical reach** of the DRM structures, for example the network of government vehicle hubs and supply routes may not cover the whole population.

Another challenge is that the existing legislation does not make clear provisions for linking crucial technical institutions to DDRM. These include the Meteorological Service or hydrology services amongst others. There are certain skills limitations in the current technical establishment, a lack of regional presence by Meteorological Service specialists and equipment limitations. The Hydrology Division has relative weak capacity and collaboration with other institutions on early warning, limited infrastructure and equipment, and limited available human and financial resources.

3.1.3. Recommendations

1. Conduct multi-hazard risk assessment and develop and update regularly a national multi-hazard risk profile of the country. Ensure that climate change scenario modeling is also linked to the national disaster risk profile. Tools such as Inform are available (<http://www.inform-index.org/Countries/Country-profiles>).
2. In order to support the development of a nation-wide multi hazard risk profile of Namibia:

- Develop a unified methodology for multi-hazard nation-wide risk mapping, risk identification, risk assessment and risk-monitoring;
 - Purchase and use a multi-hazard risk assessment application/automated tool that enables regular risk monitoring/ recalculation;
 - Set up a comprehensive training programme, and required tools and equipment, to enhance competencies at all levels of national technical agencies for risk assessment.
3. Establish a central database of historical disaster events comprising data and information on damage and loss from past disasters to systematically evaluate, record, share and publicly account for disaster losses and understand their impacts (for instance, DESINVENTAR). Integrate the damage and loss database to an open-source common database containing the national multi-hazard risk profile (see recommendation 1). This database should include data and information on risk (hazard, exposure, socio-economic data, and disaggregated data) and should integrate datasets already available from the Namibia Statistics Agency. Locate the database with the NSA to avoid duplications.
 4. Develop SOPs and formalize data and information exchange among various technical institutions, line ministries, DDRM, NSA, University etc. Introduce procedures and regulations ensuring open access to the risk profile database to all relevant stakeholders at all levels.
 5. Formalize the use of unique identifiers such as P-codes by all ministries, institutes and organisations collecting data in the field so that results can be combined and analysed.
 6. A technical project should be developed to link up different ministries management information systems.
 - The lead organisation for this would naturally be the Ministry of Information and Communication Technology, but unsure of their technical capacity as only met media departments.
 - The ideal outputs would be feed based, rather than exporting all information into one place as this would be quickly out of date.
 - Key databases / stakeholders to include would be: the Meteorological Service with forecasting information; Min. Agriculture with the Agriculture Information Management System; Namibia Statistics Agency with their census information; Namibia Statistics Agency as custodians of the Namibian Spatial Data Infrastructure (NSDI); Min. Poverty Eradication with their intended database of all intervention activities in the country.
 7. An information management working group structure should be implemented at national and regional levels, suggested format would be a forum to share knowledge, agree standards, guidance, best practice and support amongst all those working in information management.
 8. Conduct regular awareness events targeting decision-makers at all levels and in all sectors in order to ensure that the risk profile is used as a guidance to influence risk-informed decision-making for national, local and sectorial development processes.
 9. Develop a national DRM awareness and communication strategy to include, among others public and community awareness campaigns at national and local levels through TV, radio, social media, printed material, dedicated national days.

10. Strengthen the capacity of the Ministry of Education, Arts and Culture to develop appropriate curriculum and teaching material on disaster risk management and climate change adaptation, and ensure teacher training. The Ministry could partner with the Red Cross to establish a Youth network or “DRM Clubs” in schools.
11. The Ministry of Higher Education, Training and Innovation should undertake a survey of skills gaps in all ministries and pass on as mandatory course list to higher education institutes, this will in time produce the necessary skills to fill roles, within the topic of DRM, gaps were noted in analysts, statisticians, geographic information systems and data architects.
12. The Ministry of Information Communication and Technology should undertake a review of its communication channels, including speaking to local level representatives to validate whether outward communications reach everyone and are understood correctly at all levels and sociological groups.

Note: [Chapter 5.2. “Prioritized actions for Pillar 1: Understanding disaster risk”](#) comprises a prioritized list of the above recommendations.

3.2. Pillar 2: Strengthening governance and institutions to manage disaster risk

Disaster risk governance at the national, regional and global levels is of great importance for an effective and efficient management of disaster risk. Clear vision, plans, competence, guidance and coordination within and across sectors as well as participation of relevant stakeholders are needed. Strengthening disaster risk governance for prevention, mitigation, preparedness, response, recovery, and rehabilitation is therefore necessary and fosters collaboration and partnership across mechanisms and institutions for the implementation of instruments relevant to disaster risk reduction and sustainable development.

3.2.1. Existing capacities

3.2.1.1. Legislative, policy and planning frameworks

The **legislative framework** for DRM in Namibia is embodied by the following legal instruments:

- The Namibian Constitution, Article 95
- The Disaster Risk Management Act (Act No. 10 of 2012)
- The Disaster Risk Management Regulations (2013)
- Local Authorities Fire Brigade Services Act (Act No. 5 of 2006)
- Local Authorities Act (Act No. 23 of 1992)
- Decentralization Enabling Act (Act No. 33 of 2000)

The **National Disaster Risk Management Policy of the Republic of Namibia (2009)** is the instrument which gives direction and defines the parameters for the application of the concept of disaster risk management within the established National Disaster Risk Management System in Namibia. The Policy is in the process of being updated in order to be aligned to the DRM Act of 2012 and the Sendai Framework for DRR. The Government developed a National DRM Plan in 2011. At present, there is no National DRM Strategy.

The main **national development planning instrument** of the Government of Namibia is the 4th National Development Plan (2012/13-2016/17). The 5th National Development Plan is currently being developed and is coordinated by the National Planning Commission. The Directorate seeks to ensure disaster risk reduction and resilience issues are properly reflected in the NDP5. The skills audit/ assessment and its recommendations will be instrumental in articulating how the DRR thematic area should be reflected in the NDP5.

In 2005 Namibia developed a **National Action Plan for Capacity Development in Disaster Risk Reduction** based on the Hyogo Framework for Action (2005-2015). With the upcoming revision of the DRM Policy, and based on the recommendations of the present report, the Government intends to develop a new capacity development plan/ framework to guide its efforts in implementing the provisions of the Sendai Framework.

An extensive legislative and institutional analysis is presented in the UNDP-IFRC report "[Namibia: Country Case Study Report How Law and Regulation Supports Disaster Risk Reduction](#)".

3.2.1.2. Institutional framework

The **institutional setup** for DRM in Namibia is regulated by the National Disaster Risk Management Act (2012) and associated Regulations (2013) set up the national DRM system in Namibia, composed of:

- the National Disaster Risk Management Committee;
- the Directorate: Disaster Risk Management;
- the Namibia Vulnerability Assessment Committee;
- Regional Disaster Risk Management Committees;
- Constituency Disaster Risk Management Committees;
- Local Authorities Disaster Risk Management Committees; and
- Settlement Disaster Risk Management Committees.

The assessment found that the institutional structure provided by the law is performing at varying degrees at various levels.

3.2.1.2.1. National level

At the **national level**, the **Directorate Disaster Risk Management** is responsible for coordinating disaster risk management in Namibia and executing the decisions of the National DRM Committee. The Directorate currently has 41 employees. The Directorate DRM is fulfilling its mandate to a satisfying degree despite limited resources.

The capacity and skills audit of the Directorate DRM undertaken as part of the capacity assessment of the DRM system highlighted the following existing capacities and resources (gaps and needs are presented in the following section):

- The Directorate DRM employs well-respected, experienced, long-serving professionals;
- It is strategically located within Government structure at the level of the Office of the Prime Minister enabling privileged position to assume inter-sectorial coordination;
- Staff have competencies and extensive experience in managing disaster response;
- The Directorate DRM displays a good gender balance among its staff, including at managerial level (i.e. the two Deputy functions are filled by long-serving female civil servants);
- The Directorate DRM maintains regular working relations at decentralized levels with the 14 Regional DRM Field Officers (however the latter do not have direct, formal reporting lines to DDRM) and with DRM Focal Persons placed in line ministries;
- The Directorate DRM has modern warehouse facilities and good basic infrastructure, well located in the Capital City.

The **National Disaster Risk Management Committee** is placed under the authority of the Prime Minister and is composed of representative of Ministries in charge of finance; health and social services; agriculture, water and forestry; defence; education; information and communication technology; urban and rural development; safety and security; works and transport; and gender equality and child welfare. In addition, the Committee comprises a representative of the Association for Regional Councils in Namibia/ the Association for Local Authorities in Namibia.

Despite the legal provisions regarding the National DRM Committee, the assessment found that it is not an active decision-making and oversight body, as it does not meet regularly. For instance,

the National DRM Committee has not been convened before or after the drought emergency has been declared in May 2016.

An analysis of the institutional structure in Namibia is presented in the UNDP-IFRC report "[Namibia: Country Case Study Report How Law and Regulation Supports Disaster Risk Reduction](#)".

3.2.1.2.2. Sub-national level

At **sub-national level**, DRM functions exist de facto only at regional level and in some constituencies: there are Regional DRM Committees that meet regularly and 14 DRM Field Officers placed in the 14 regions of the country. The Field Officers do not have a formal and direct reporting line to the Directorate DRM. They are employed by the Regional Council and in most Regions report to the Deputy Director for Administration. However, they communicate regularly with the Directorate staff. At constituency level, there are Constituency DRM Committees, however, not all of them are active. In certain constituencies there are DRM Focal Persons that communicate directly with the Regional DRM Field Officer. At lower administrative levels, the DRM structures and functions are not activated (i.e. Local Authorities DRM Committees and Settlement DRM Committees do not exist).

The assessment included a number of field visits in order to assess the functioning of decentralized institutions, particularly at regional and constituency (town) levels.

As an **example**, the Zambezi Regional Disaster Risk Management Committee (RDRMC) is functional and has a Regional DRM Field Officer. The RDRMC has replaced the previously established Regional Emergency Management Unit (REMU) after the DRM Act was passed in 2012. The RDRMC is composed of 42 members, including Regional Government officers and the Namibia Red Cross. The RDRMC has an awareness raising committee that also takes into account DRM issues (early warning, generic awareness). The RDRMC has also collected information on traditional knowledge on EWS.

At the Katima Mulilo town level, the capital of the Zambezi region, there is a DRM Focal Person nominated from the Department of Community Services and 5 fire emergency servants working full time (for a total population of 30.000). In terms of DRM the Katima Mulilo Town Council relies on the Zambezi Red Cross and the RDRMC. Although they seem to be well coordinated, the City Council acknowledges that there's a weak information sharing mechanism, which contributes to a slow disaster response. There is a single health inspector for the Katima Mulilo Town.

The Namibian Red Cross is a member of the Zambezi RDRMC and the Katima Mulilo CDRMC. It carries out numerous activities particularly for disaster preparedness, assisted by 500 volunteers in the region, including: assessments, contingency planning, provision of relief items, WASH, HIV and Malaria, recovery, and training of volunteers.

The relatively well-functioning regional and constituency structures dedicated to DRM in the Zambezi region can be explained through the recurrence of floods. In March 2009, river levels in Zambezi region (Zambezi, Chobe) were at heights not recorded since 1963. As a result, more than 90% of the area South-East of Katima Mulilo were flooded, about 9,000 people displaced and a total of 23,000 affected.

3.2.1.2.3. Sectorial level

At **sector level**, line ministries and technical departments have “DRM Focal Persons” who take part in various meetings related to DRM called by the Directorate DRM and other partners. However, not all ministries have designated focal persons. Staff turnover is a common challenge to institutionalizing the focal person function properly.

3.2.2. Challenges

3.2.2.1. National level

The DRM system in Namibia is founded on a sound legislative basis and provides for a solid institutional architecture with high performance potential. The assessment has revealed a set of challenges confronting the national DRM system. If addressed properly and timely, these gaps and needs are likely to make way for a performing system that can set a standard for DRM regionally and globally.

A **misalignment** between the well-articulated legal framework and actual implementation of its provisions and DRM activities generally emerged as a key challenge. This is of particular concern to the Government of Namibia in the context of institutional and individual performance assessment system under implementation.

Although the DRM concepts are fairly clear for a majority of institutions, the assessment found a limited understanding of DRM from an **operational point of view** at all levels. In other words, if the concepts are fairly clear, their practical application is less straightforward.

With respect to **budgetary allocations for DRM**, the assessment found that funds are mostly provided for disaster preparedness and response, not prevention, despite separate allocated DRM budget in each ministry being set out in the law, this does not happen. There is no systematic and integrated budgeting process for DRM including at sectorial level, both nationally and locally. In the event of a disaster, ministries pull funding from existing programmes for disaster response which has a negative impact on planned development activities.

The capacity and skills assessment of the **Directorate DRM** highlighted a series of challenges facing the institutions. Among these, the following can be cited:

- The focus of the Directorate DRM is emergency response more than strategic coordination, whereas its mandate should focus on the latter;
- There are limited capacities, processes and systems for coordination within the Directorate DRM and with line ministries and other stakeholders, which impedes the Directorate to fully assume its coordination role;
- There is a certain limitation of empowerment of and delegation to middle managers and technical staff; senior managers in Directorate DRM tend to assume oversight and coordination roles as well as operational and implementation roles;
- The division of responsibilities among senior management representatives (Director and two deputy Directors) is unclear and its scope is not broad enough; there is a clear need for a third deputy director, so that the three key functions under the Director are: (i)

- Prevention, risk reduction, assessment; (ii) Preparedness, early warning, response; and (iii) Finance, administration, operations;
- The Directorate DRM is understaffed in technical experts and generic managerial capacity, including HR management;
 - There is a clear need to ensure staff motivation, guidance and management;
 - Despite the strategic location of Directorate DRM under the authority of OPM, the hierarchical level of the directorate DRM not high enough for proper and timely decision-making;
 - There are limited opportunities for career evolution which impedes recruitment and specialization in DRM topics;
 - There is limited knowledge and capacity for risk reduction, resilience, prevention and preparedness, most skills are focused on response and general administration;
 - The Directorate DRM has obviously challenges in facilitating the proper functioning of NDRMC, for instance through convening regular meetings (for instance, the NDRMC has not called for a meeting on the occasion of the declaration of state of drought emergency);
 - The logo used by the Directorate DRM confuses its core message around directorate function (the Directorate DRM uses the internationally-acknowledged Civil Protection logo, which does not fit with the wider, more comprehensive DRM mandate; the Directorate DRM does not have a Civil Protection unit/ function);
 - The «branding» of Directorate DRM as an entity is weak, thus not facilitating its coordination efforts; the Directorate is very often referred to by counterparts as “OPM”;
 - The mandate of the Directorate is not efficiently disseminated to stakeholders.

3.2.2.2. Sub-national level

The **reporting lines and levels of hierarchy** between central and decentralized levels are not harmonized, leading to inefficient decision-making and accountability. For instance, the Directorate DRM, placed under the authority of the OPM, does not exert authority over the Regional DRM Field Officers or the DRM focal persons at constituency level, who report to the decentralized structures of the Ministry of Urban and Rural Development. However, these decentralized DRM structured directly contribute to implementing DRM activities locally.

It was found that there is limited understanding of **roles and responsibilities of DRM Committees** members at all decentralized levels (regional and constituency, which are the only two levels where these Committees are established).

Similarly, there is a **lack of understanding** of the TORs and SOPs related to DRM for Regional Councils, and how they relate to the Regional DRM Committees which fall under their authority. The irregularity of meetings of the CDRMCs and RDRMCs contributes to this situation. In those cases, where the CDRMCs and RDRMCs do meet, the agenda mostly focuses on disaster response rather than all aspects of DRM in relation to the particular risk profile of the respective region, thus leading to inadequate delivery on DRM.

For instance, in the **Oshana Region**, the RDRMC has representation from different government ministries and departments and councilors. However, the meetings of the committee are not held regularly. Attendance of meetings by members is also usually poor due to lack of understanding of DRM and their roles and responsibilities by members. The RDRMC is, therefore, not effective. The presence of the Red Cross Society in the region, with their long

experience in DRM, especially disaster response, is an asset that can be used by the Regional Council and the RDRMC. The Ohangwena Regional Council has a DRM Field Coordinator who is responsible for disaster risk management activities. However, the officer is currently only involved in implementation of disaster response activities, such as distribution of relief food, as he does not have knowledge in disaster risk reduction. While the officer is under the regional council, he is supposed to submit reports on DRM activities to the Directorate DRM. His position in the hierarchy of the regional council requires that his reports go through three officers (Control Administrative Officer, Deputy Director for General Services and Director for General Services) before they are vetted by the Chief Regional Officer for a go ahead to be given to submit the reports to D DRM. This results in delays in submitting reports.

Across the various regions and constituencies visited, there is a generic lack of adequate DRM training and capacity building for committee members and focal persons.

There is limited or no capacity in DRM in most town councils. As such no risk assessments are being undertaken to inform decision making. The response to disasters is reactive and not proactive. They also lack basic response services. There is also a lack of information management capability. The region does not have a central database and has weak capacity to collate, analyse and share DRM data for effective planning.

At sub-national level in regions and constituencies visited by the assessment team, there is no **budgetary provision for DRM**. Although the DRM law provides for line ministries to make budgetary allocations for DRM at national and sub-national levels, there is an expectation that the Directorate DRM or OPM allocated funds for local-level DRM activities. The existing public accounting and finance system capture poorly DRM.

3.2.3. Recommendations

3.2.3.1. *Recommendations for the DRM system at the national level*

1. Review the National DRM Policy to align it to the DRM Act (2012) and the Sendai Framework. Ensure linkages of the future Policy with the climate change legal and policy framework so that the two are not implemented in isolation from each other. Develop a national action plan to guide and track the progress of the implementation of the legal and policy provisions for the DRM system in Namibia.
2. Implement the legal and policy framework for DRM so that roles, responsibilities and standard operating procedures of all institutions involved in DRM at all levels are clear.
3. Review reporting lines and hierarchical levels/grades between the central and local levels to increase accountability and effectiveness of implementation of DRM mandates.
4. Include a budget line for DRM activities in line ministries and regions (percentage) as per DRM Act, to establish transparent financial accountability mechanism between all these institutions at all levels.

5. Formalize partnership between regions (horizontal coordination). Organize peer-to-peer experience exchange among regions, using capacities and skills that exist in certain regions to boost those of regions less developed.

3.2.3.2. Recommendations for the DRM system at sub-national level

1. Reorganize the position and hierarchy of the Field Coordinator in order to streamline its reporting obligations to the regional structure and the Directorate DRM. Organize regular coordination meetings of the Regional DRM Field Officer and local DRM focal persons from all local constituencies in all regions. Ensure that the Regional DRM Field Officer provides regular reporting to the Directorate DRM at central level in a systematic and formalized manner.
2. Organize sensitization of regional stakeholders on the DRM legislation, regulations and policy. The sensitization would have to target regional governors, members of DRM committees at regional, constituency, settlement and local authority level, Field Coordinators, technical officers from different ministries and departments and town councils.
3. Provide induction session on DRM to members of the RDRMCs and DRM Focal Persons from constituencies and lines ministries by the Directorate DRM. Trained staff in RDRMCs to provide same training to CDRMCs.
4. Conduct awareness raising for the members of the RDRMC and CDRMC to foster political will and decision-making on DRM matters.
5. Integrate budget line for DRM at the level of Regional and Town Councils so that the RDRMC and CDRMC can implement DRM activities effectively. In addition, the Directorate DRM/ OPM should decentralize emergency funds to Regional Councils. Currently, DRM task/responsibilities have been decentralized to the Regional Councils but the required financial resources have not. This results in challenges for the regional councils to implement response activities properly.
6. Regional Councils should develop stronger and formalized partnerships with organisations outside government, such as the Red Cross Society. In view of the known expertise and capacity of the Red Cross Society in DRM and especially in disaster response, there is need for the regional council to partner with the organization so that it can effectively complement government efforts.

3.2.3.3. Recommendations for the Directorate DRM

1. Refocus the mandate and enhance capacities of the Directorate DRM towards strategic coordination instead of operational implementation, and from response to comprehensive/ holistic DRM.
2. Elevate the hierarchical level of the Directorate DRM in the Government structure.

3. Restructure DDRM to include more senior management to cover core DRM functions.
4. Reinforce leadership competencies in senior management, particularly with respect to delegation and empowering middle level management and technical staff.
5. Develop and implement HR management strategy for the Directorate DRM, including, among others:
 - Organize systematic training events to enhance technical expertise of the staff;
 - Review job titles to properly reflect roles;
 - Create career development opportunities in collaboration with universities in Namibia and abroad;
 - Establish collaboration with higher education institutions to integrate next generation of DRM specialists.

Note: [Chapter 5.3. “Prioritized actions for Pillar 3: Strengthening governance and institutions to manage disaster risk”](#) comprises a prioritized list of the above recommendations.

3.3. Pillar 3: Investing in economic, social, cultural, and environmental resilience

Public and private investment in disaster risk prevention and reduction through structural and non-structural measures are essential to enhance the economic, social, health and cultural resilience of persons, communities, countries and their assets, as well as the environment. These can be drivers of innovation, growth and job creation. Such measures are cost-effective and instrumental to save lives, prevent and reduce losses and ensure effective recovery and rehabilitation.

Overall, the assessment found that there is a fair understanding of the current and potential impacts of disasters (including from climate change) on various sectors, particularly agriculture, environment and health. However, during the assessment, many institutions highlighted the fact that limited human, financial, technical capacities that they dispose of seriously hamper the effectiveness of their work as far as DRM is concerned. The assessment team interviewed a large number of sectorial institutions at both local and national levels. While this report does not comprise a comprehensive sectorial analysis of all sectors taken into account in the assessment, three key sectors are presented in detail in the section below, namely agriculture, health and environment. Other sections of this report include an analysis of capacities and gaps related to other sectors, however these have not been presented as stand-alone sectors in the present chapter.

3.3.1. Agriculture

The national economy, communities and households in Namibia are impacted by disaster and climate risks, particularly frequent droughts and floods. Together with water supply and livestock diseases the management of these hazards are at the core of the mandate of the Ministry of Agriculture and Water Development (MAWD).

3.3.1.1. Existing capacities

The MAWD has the mandate to ensure agricultural development in the country. It comprises eight departments: Agricultural Production, Extension and Engineering Services (APEES); Forestry; Rural Water Resources Management; Veterinary Services; Planning and Business Development; Research and Development; General Services; and Rural Water and Sanitation.

Under the Disaster Risk Management Act, 2012, the MAWD is a key stakeholder in DRR through Representation by its Permanent Secretary who is a member of the National Disaster Risk Management Committee (NDRMC) under the office of the Prime Minister (OPM). The role of the National Disaster Risk Management Committee is to advise the President and the Cabinet, through the Prime Minister, on matters relating to disaster risk management in Namibia.

The policy framework regulating the agriculture sector is the following:

- **The National Agricultural Policy** of 1995, undergoing review. The policy mentions the need to strengthen joint Government and private sector drought and disaster management mechanisms. It recognizes the need for government to continue providing support to the Early Warning and Food Information System

- **The National Drought Policy and Strategy** of 1997, undergoing review. The document focuses on changing the mode of administering emergency support by government in terms of cropping, livestock and water for affected communities.
- **The Strategic Plan for the Ministry of Agriculture, Water and Forestry** (2008–2012). The strategy recognizes the need to carry out research on coping mechanisms in place for addressing adverse effects of climate change on production (including global warming, floods, droughts and ‘veld’ fires) as well as on negative human and animal impact on environment health (including pollution and waste management)
- **The Forest Research Strategy for Namibia** (2011–2015). The Strategy provides for conducting research, monitoring and evaluation for improved and integrated natural resources management; coping mechanisms in place for addressing adverse effects of climate change on production (including global warming, floods, droughts and ‘veld’ fires); reduced negative human and animal impact on environment health (including pollution and waste management).

The **Namibia Vulnerability Assessment Committee (NAMVAC)** was established in 2002 and formally institutionalized in 2009. The committee plays an important role in generating regular reports on livelihood vulnerability and food and nutrition security. The Mandate of NAMVAC as set out in the Disaster Risk Management Act has enabled the annual generation of vulnerability information that is crucial for addressing food and nutrition security challenges in the country. The Mandate of NAMVAC is to:

- Collect Vulnerability information and tracking of indicators to provide early warning on impending disasters, guide rural development strategies and inform poverty reduction and social safety net programming.
- Assess disaster risk indicators to assess factors that influences vulnerability such as livelihoods and means of survival for communities in Namibia.
- Update livelihood zones and baselines for monitoring vulnerability.
- Maintain information for recording and storing vulnerability assessment information.
- Compile regular vulnerability assessment reports and submit them to cabinet through Disaster Risk Management Committee.
- Train regional and constituency officials on vulnerability assessment and monitor early warning systems.

The **Food and Nutrition Security System** helps to track changes in rural household food security conditions and provide real time data on the general food and nutrition security conditions in the country. The system is now operational in all 14 regions. Periodic food security monitoring activities are carried out in selected sentinel sites to assess food insecurity at household level. The Food and nutrition monitoring is providing crucial information for evidence based decision making. FNSM activities have been adopted in all the regions. Forums for discussion of food and nutrition have been opened to more partners through, an improved multi-sectoral coordination which led to the establishment of a multi-sector FNSM taskforce. There is also greater harmonization of existing food and nutrition security systems that allows for coordinated analysis of macro and micro food and nutrition security information in the country.

In terms of information systems, the MAWD has an integrated agricultural information system, with an intranet and data warehousing system. The MAWD produces some communication products and has a public relations officer. The Hydrology Department issues a daily flood bulletin which goes to the OPM.

The MAWD has a crops and livestock research directorate which is working on risk reduction technologies, such as the development of drought tolerant varieties. The Hydrology Department supports a drought and flood management MSc training in Environmental Engineering at University of Namibia and University of Technology, with a tailored curriculum.

In terms of risk and vulnerability assessments for agriculture, the DAPEES carries out a number of routine assessments through the Agro-Business Information unit, agricultural inputs and household assessments, Preliminary Crop Estimates, and post-harvest crop assessments. Currently the MAWD conducts some surveillance for transboundary pests and diseases of crops and livestock as wells for forest fires. The information generated from the Assessments is targeted at the following stakeholders: Directorate DRM; Regional Councils; Farmer Cooperatives; Local Extension Staff; Local development partners and Communities.

In carrying out assessments under its mandate area, the MAWD's coordinates with various ministries, institutions and departments. It also participates in assessments that are carried out by other stakeholders among which are the Food Assessments as well as the Food security and nutrition Assessments. Among key stakeholders MAWD collaborates are: Climate Services (APEE sits on one of the sub-committee); Meteorological Service; National Statistics Agency (NSA); and SADC-SARCOF (external).

At the local level, there are examples of agricultural practices that boost adaptive capacities of communities and provide employment for local farmers. The assessment team visited the Kalimbeza rice fields and factory run by AGRIBUSDEV, a state-owned private company. The factory is in its second production year after several years in research and development under the University of Namibia. The enterprise has several irrigated plots of land of 140 ha and 36 ha and intends to expand these to 250 ha. The factory expects the yield of 2016 to be at 300 tons of rice in two varieties, medium and long grain. The basmati variety is under testing. The enterprise uses 3-month (short term) and 6-month (long term) rice crops, the latter being planted during the flood periods as it can survive under water for longer periods. The Kalimbeza factory currently employs 15 permanent staff with an outlook of expansion to 40 staff, and approximately 300 seasonal workers from local communities for manual works. Individual farmers also have their own plantation near the Kalimbeza fields. The Kalimbeza rice factory contributes to local employment opportunities for neighboring communities and provides a valuable source of food that can be purchased in case of emergency.

3.3.1.2. Challenges

A number of challenges confront the agriculture sector in Namibia, namely:

- **Institutional arrangements:** DDRM does not have structures at regional level and often relies on the Regional Councils (MURD) with different reporting lines, to coordinate and implement food assistance programmes. This complex disaster management structure often leads to conflicting priorities, which affect or delay the implementation of new innovations in Disaster Risk Management (DRM).
- **Unpredictable funding sources:** For capacity development to be effective, long-term commitments and flexible and predictable funding is required but the current unpredictable funding models do not allow for long term planning. The efforts being made to identify available local sources of funding is a step towards ensuring the sustainability of food security monitoring and analysis in Namibia.

- **Inadequate dissemination and utilization of Food and Nutrition Security updates:** Dissemination and utilization of quarterly FNSM bulletins at policy level is still lacking. While these bulletins and the NamVAC annual report have been used to scale up government emergency response in Kunene region for instance, these early warning products are yet to be used to inform higher level policy discussions around food and nutrition security across different ministries and departments. The need remains for OPM to identify effective channels of communication and dissemination of the FNSM findings at policy level including Cabinet and the use of media channels to publish results from monitoring assessments.
- **Limited local expertise:** Availability of local expertise in food and Nutrition security monitoring in Namibia is very limited close to no capacity. This poses a challenge for sustainability beyond donor and development partner support.
- **Policies and strategies:** The existing policies and strategies do not adequately address DRM which emphasizes coordination, early warning, preparedness and response through knowledge sharing.
- **Coordination:** There is currently no clear coordination mechanism for risk assessments within the MAWD.
- **Dedicated financial and human resources:** There are currently no human or financial resources allocated to DRM programming in the sector/ with the MAWD.
- **Awareness and capacity development:** Awareness of DRM is still low given that it is relatively a new concept. Lack of training on DRM for MAWD staff within the ministry, however the Directorate DRM has been supporting the building of capacity of extension staff including those from the regions in assessments through training.
- **Information sharing:** At operational level, there is no formal link or obligatory mechanism for knowledge sharing and interaction between the DAPEES and institutions that are key to DRR such as OPM DRM office and Meteorological Service.
- **Monitoring:** As DRM is not yet mainstreamed into the DAPEES structures and the concept not well understood, there is no specific monitoring for DRM activities and results.

3.3.1.3. Recommendations

1. DRM should be mainstreamed in the MAWD directorates, the National Agricultural Policy, National drought policies and any other related documents currently undergoing review.
2. Mainstream DRM into the work program of the DAPEES and other directorates.
3. DRM strategies should be developed to operationalize specific aspects of agriculture.
4. Benchmark and map DRM activities in the agriculture sector, interventions and actions as well as develop a monitoring framework.
5. At the local level, train communities in alternative agriculture measures to reduce the people's dependence on relief items provided by the government in times of drought.

Note: [Chapter 5.4. "Prioritized actions for Pillar 3: Investing in economic, social, cultural, and environmental resilience" – Agriculture sector](#) comprises a prioritized list of the above recommendations.

3.3.2. Health

3.3.2.1. Existing capacities

Across various institutions mandated to work on health issues, there is a good understanding and awareness of the DRM concepts. There is a natural focus on epidemics that have potential to turn into national disasters.

At the institutional level, there is a **National Health Emergency Committee** that meets quarterly with other stakeholders, such as the Directorate DRM, Red Cross and MAWD among others. The Ministry of Health has a division on epidemiology which is supported by WHO. It undertakes surveillance with specific tools for early warning, preparedness and response to emergencies. A rapid response team is available to respond to emergencies/ disasters, and it operates based on standard operating procedures. The Ministry of Health conducts research on epidemiological issues and has harmonized data collection protocols.

The **regulatory framework** is composed of a wealth of policy, strategic and guidance documents including the Public Health Act of 2015 which are available to the public via the website. The Ministry issues a "Health Newsletter". The Ministry collaborates with the National Public Health Institute.

At the local level, **emergency health systems** seem to function quite well. For instance, the Zambezi Region has one state hospital in Katima Mulilo, the capital city, and several clinics spread in various constituencies. There is a private ambulance available. In order for patients to have access free of charge, they must first go to the local clinic/ health center that calls the ambulance.

3.3.2.2. Challenges

A number of challenges confront the health sector in Namibia, namely:

- There is no operational mechanism for exchange of information with instructions that are key to DRR such as the Meteorological services;
- There is limited capacity in health risk assessment in terms of both skills and financial means;
- There is a lack of capacity for predictive modelling;
- There is a lack of electronic data at certain health structure levels;
- There is no mechanism for exchange of data with the private health providers;
- The Ministry needs increased capacity in DRM, including on disease prediction, training, simulation and coordination.

3.3.2.3. Recommendations

1. Design operational mechanisms for regular engagement of the Ministry of Health with key institutions of the national DRM system, such as Meteorological Service, agriculture, Universities, private health providers and the Directorate DRM.
2. Increase capacity in assessments through training of health staff.

3. Increase capacity in disease prediction, mapping, training, simulation and coordination.
4. Increase capacities of the Ministry of Health staff to train and implement DRM activities at community level.
5. Develop emergency preparedness plans for hospitals.

Note: [Chapter 5.4. “Prioritized actions for Pillar 3: Investing in economic, social, cultural, and environmental resilience” – Health sector](#) comprises a prioritized list of the above recommendations.

3.3.3. Environment

3.3.3.1. Existing capacities

According to the **Environmental Management Act** (Act No. 7 of 2007), the Ministry of Environment is mandated to provide coordination and environmental quality assurance across ministries, to promote the sustainable management of the environment and the use of natural resources by establishing principles for decision making on matters affecting the environment, to establish the Sustainable Development Advisory Council, to provide for the appointment of the Environmental Commissioner and environmental officers, to provide for a process of assessment and control of activities which may have significant effects on the environment.

In terms of existing capacities, the Ministry has an environmental information unit. The Ministry has a set of environmental assessment tools and climate adaptation tool kits for each region. The Ministry provides quality assurance for impact assessments undertaken by various actors. It has functional information system that links to important multi-sectoral information resources including policies and strategies related to climate change, biodiversity and conservation agriculture. It is planned that a knowledge management unit be established in the Ministry. There are several ongoing programmes on enhancing resilience for women and other vulnerable groups, rain water harvesting for community gardens in collaboration with the Ministry of Agriculture, and drip irrigation and excavation of natural dams. The Ministry has equally developed a climate change strategy and action plan for the agriculture sector and has a communication manual which was supported by UNFCC.

3.3.3.2. Challenges

At the institutional level, the Ministry of Environment has weak coordination capacity and weak institutional linkages to the Directorate DRM and other DRM stakeholders. The weak monitoring system and lack of a risk profile is an additional challenge. Insufficient human capacity and financial resources are also limiting factors.

As far as environmental management issues at the local level are concerned, in certain regions visited unsustainable development practices increase the vulnerability of populations to natural hazards (i.e. unplanned settlement, waste management, littering). For instance, in the Zambezi

Region erratic informal settlement and house building practices are common (i.e. soil excavation that renders portions of land unusable, and produce stagnant water holes breeding mosquitos). Environmental Impact Assessments are not carried out for all infrastructure development works. There are insufficient public funds for upgrading the urban drainage systems, and WASH infrastructure is absent in informal settlements.

3.3.3.3. Recommendations

1. Improve coordination and linkages to DRM and other DRR stakeholders through establishing of focal point within the Ministry of Environment.
2. Mainstream DRR into environment work plans and budgets.
3. Increase technical skills in DRM through training of Ministry of Environment staff.
4. Develop local investment/ business plan for main urban centers in the Regions for solid waste management by involving the private sector (businesses, local commercial centers, banks, etc.) and local communities for waste collection systems, safe waste recycling/transformation sites, volunteers, cleaning days in schools and public areas.
5. Develop local investment/ business plan for urban sewage and drainage systems, and continue advocacy with regional and local counselors, and Ministers/ Permanent Secretaries for fund allocation, planning and implementation.
6. Integrate awareness and education sessions in schools at all levels (pre-school to high school) on environmental protection and preventive measures (personal hygiene, waste management, etc.).
7. Conduct public awareness raising on negative impacts of littering in informal settlements and facilitate low-cost waste collection and disposal for these communities.

Note: [Chapter 5.4. "Prioritized actions for Pillar 3: Investing in economic, social, cultural, and environmental resilience" – Environment sector](#) comprises a prioritized list of the above recommendations.

3.4. Pillar 4: Enhancing preparedness for effective response, and building back better in recovery and reconstruction

The steady growth of disaster risk, including the increase of people and assets exposure, combined with the lessons learned from past disasters, indicates the need to further strengthen disaster preparedness for response, take action in anticipation of events, integrate disaster risk reduction in response preparedness and that ensure capacities are in place for effective response and recovery at all levels. Empowering women and persons with disabilities to publicly lead and promote gender equitable and universally accessible response, recovery rehabilitation and reconstruction approaches are key. Disasters have demonstrated that the recovery, rehabilitation and reconstruction phase, which needs to be prepared ahead of the disaster, is a critical opportunity to build back better, including through integrating disaster risk reduction into development measures, making nations and communities resilient to disasters.

3.4.1. Coordination mechanism for preparedness and response

3.4.1.1. Existing capacities

Historically, Namibia's efforts to combat the impact of disasters have been focused almost exclusively on relief for flooding and drought. The disaster response system performs relatively well when it comes to responding to limited droughts and floods but is likely to face challenges if two or more disasters are striking at the same time. The preparedness component is still weak and will need support at all levels: national, regional, communal, community.

It is evident that in some regions, the RDRMC is effective which appears to be linked to personalities and frequency of/ familiarity with disasters.

Focal persons for DRM are in place within each Ministry. Some disaster specific plans (e.g. drought/ flood response) have been put in place which also addresses coordination.

The legal framework for implementing a sound disaster management system exists, however has some difficulties to be translated into a simple, robust, logical system that can be sustainable with limited resources. The assessment found that the legal framework has excellent provisions regarding preparedness.

3.4.1.2. Challenges

Coordination is often done on a needs/ ad-hoc basis in response, but rarely in preparedness.

The DRM coordinating structures (DRM Committees) at all levels are too complex without clear financing and operating systems. A formal operational DRM coordination mechanism between all levels (vertical coordination) or inter-regional (horizontal coordination) is not established yet.

Overall a very weak understanding/ confusion between addressing poverty related issues (development) and disaster response activities (humanitarian/ emergency) was observed.

There seems to be a lack of accountability and feedback between the DRM structures at the different levels. It has been confirmed that there is no dedicated budget/ grant/ fund for disaster preparedness, response, prevention, mitigation and recovery.

Although the policy, legislation and regulations have excellent provisions regarding preparedness, it is evident that it has not been implemented.

3.4.1.3. Recommendations

1. It is recommended that the existing legislation be implemented by operationalizing the DRM Act, Policy and Regulations.
2. Roles, responsibilities and reporting lines in RDRMC and between RDRMC and central/ local level should be defined precisely.
3. In addition, DRMC must be strengthened all levels to support inter-sectoral coordination mechanisms. It is also recommended that induction training be rolled out to all DRMC members at all levels.
4. A central DRM Operation Centre could be established and equipped, combining the activities of the City of Windhoek, Khomas region as well as national bodies involved in DRM activities, to optimise available funds and effective/ streamlined coordination. Furthermore, consideration should be given to the establishment and equipping of regional emergency operations centres.

3.4.2. Emergency preparedness and response capacities

3.4.2.1. Existing capacities

Emergency preparedness and response capacities are more developed on Capital level and in those regions where frequent disasters are occurring, for example Zambezi. The responsibility for emergency response lies with local municipalities while ambulance services are mostly assigned to hospitals or private services.

Advanced emergency services are established in Windhoek City with 122 highly motivated and professional uniformed personnel (total 148), covering tasks such as firefighting, technical rescue, hazmat incidents, but also ambulance services.

Most other municipalities have voluntary or half-professional services with limited facilities and equipment. The Ministry of Urban and Rural Development is in the process of building fire stations, 26 to date, and buying new fire vehicles.

The Windhoek International Airport commands advanced fire and rescue facilities and equipment.

Namibian Red Cross assists with emergency services, especially in regions frequently affected by disasters.

For large scale emergencies and disasters, the resources from the National Defence Forces (NDF) and the Police are also available to support disaster response. Representatives of NDF are also present in Regional DRMCs.

3.4.2.2. Challenges

Lack of staff and appropriate training has been identified by almost all stakeholders as one of the major challenges for their organizations and institutions to fulfil their mandates, e.g. Windhoek International Airport. In addition, emergency response assets as well as appropriate budgets are missing in the regions.

Although there are trained trainers at national level and in each region, their roles and capacities are not clear and they receive limited financial support to conduct capacity development activities and roll out the trainings, due to a limited understanding of what these activities entail.

A common approach for emergency response is missing, for example to cover highways with emergency and ambulance services. All processes are carried out on an ad-hoc basis.

Due to a lack of proper hazard mapping in some sectors, an absence of communication and cooperation between different institutions and levels was observed, for example between DDRM and Namibian Airports Company in case of an air crash.

A countrywide well-known call number for emergency services including fire and ambulance services should be established.

3.4.2.3. Recommendations

1. The existing legislation, policies and plans have to be fully implemented and harmonised in and between all institutions. Well-defined, well-known, accepted and practiced lines of command are essential, have to be formalised and put in place.
2. Budgets should be slowly decentralised, allocated and easily accessible for emergencies.
3. A national roster of trained and prepared volunteers could be established to enhance capacities and support the emergency response activities all-over Namibia, using already trained personnel.
4. Windhoek Emergency Services could become a centre of excellence for capacity building to support regional and local emergency response capacities. Therefore, additional funding is needed.
5. A functional central call number for all emergency services including fire and ambulance services across the telephone networks should be established.

3.4.3. Contingency planning

3.4.3.1. Existing capacities

The existence of well-equipped strategic storage facilities (warehouses) in some regions is an asset for the DRM system in the country. This ensures that the country is in a state of preparedness to respond to different types of disasters by stock-piling food and non-food relief supplies in readiness for response. The warehouses are also well equipped with facilities to store fresh foods as they have cold rooms.

There is some ad-hoc institutional knowledge on contingency planning and disaster preparedness in some institutions at different levels which has been used, in some cases, to develop draft contingency plans.

3.4.3.2. Challenges

There is a general lack of understanding of the general contingency planning process amongst stakeholders at national, regional and lower levels. This has made it difficult for contingency plans to be developed at all different levels. The contingency planning process entails developing planning assumptions, scenarios, SOPs, response gap analysis, budget, roles and responsibilities.

Due to the lack of understanding of the contingency planning process, contingency plans have not been developed at different levels. There is, as such, no state of preparedness for different hazards that can occur in the different areas.

Limited risk assessments have been undertaken at all levels. As such, there hasn't been much risk analysis being done at the different levels to better understand potential risks.

Information on activities being implemented or planned to be implemented by different stakeholders in response to a disaster is key to ensuring proper coordination and avoidance of duplication of efforts. However, the assessment found that information on who is doing what, where (3Ws) and when (4Ws) is not available at the different levels.

Although there are existing strategic storage facilities, it was observed that these facilities are not being effectively used and relief supplies were being stored on tarpaulins which could reduce their shelf life.

3.4.3.3. Recommendations

1. Capacities of stakeholders should be built at all levels in contingency planning through training. This will enable them to have a better understanding of the concept and start developing contingency plans, thereby improving their state of preparedness to different hazards in the country.
2. The contingency planning process requires adequate allocation of funds for the development process as well as implementation. There is, therefore, need for adequate resources to be allocated for this process. There is also need to develop a work plan for

the implementation of contingency plans and assign institutions responsible to coordinate the contingency planning process.

3. Contingency planning outputs need to be taken into account in development planning. This would contribute to addressing disaster risks through development initiatives and strategies.
4. Develop, test and validate response plans at national and regional levels to be better prepared and respond to different disasters.
5. Contingency plans can be effective if they are tested to ensure that different stakeholders who have roles and responsibilities to play when a disaster occurs know how to react when the disaster actually occurs. There is, therefore, need to build capacity at all levels to regularly undertake simulation exercises to test contingency plans.
6. The Windhoek City Council has an elaborate emergency service compared with other areas. There is, therefore, need to review the decentralised Fire Services structure currently existing in relation to the Windhoek Emergency Service to make it more effective.

3.4.4. Hazard monitoring, forecasting and early warning

3.4.4.1. Existing capacities

A fairly good understanding of the DRM concepts could be identified, particularly regarding disaster prevention/ risk reduction and disaster response.

Properly equipped and good capacities were found in different organizations in charge of data collection and forecasting. The Department of Meteorological Services releases the seasonal rainfall and medium and short range weather forecasts, and the hydrological institute is able to provide rainfall and river level projections for flood forecasting.

Traditional early warning systems (EWS) are present in some communities. In most at-risk locations, people use their indigenous knowledge to prevent the adverse effects of the hazards. Some RDRMC have awareness raising committees who also take DRM activities like early warning and dissemination of EW messages in local languages into account.

A Vulnerability Assessment Committee is operational at national level.

3.4.4.2. Challenges

EWS are unequally functional across regions or communities which are dependent on the frequency and magnitude of disasters. It is evident that no unified early warning system is in place across the country.

Direct institutional responsibility for the management of the national EWS is unclear. A lack of dedicated communication lines between DDRM and ministries on all levels to jointly coordinate,

conduct, monitor and disseminate multi-hazard assessments and mapping national wide was identified.

Formalized exchange of EW-related information between the Government of Namibia and other SADC countries does not exist.

For example, MET made predictions of the current drought emergency buy felt they were ignored.

3.4.4.3. Recommendations

1. A responsible authority/ national team from different ministries/ institutions to lead the management of the EWS process in the country should be defined. An inter-ministerial team of technical staff could regularly conduct joint risk assessments with the objective of updating the already existing risk maps and streamlining hazard mapping and risk analysis.
2. EWS should be consolidated and integrated with the neighbouring countries on the basis of MoUs.
3. Existing capacities (i.e. radios, mobile communications, TV, hydro-/ meteorological stations) should be used to design and establish proper integrated, simple and effective multi-hazard EWS with timely, simple and clear instructions for all users at all levels. Awareness should be build up and trainings as well as simulation exercises carried out on all levels, especially at local level to respond to EW messages.

3.4.5. Information management and communication

3.4.5.1. Existing capacities

A dedicated Ministry for Information, Communication and Telecommunications (MICT) is established and some ministries have dedicated Information Management (IM), Geographic Information system (GIS) and analytical skills at their command.

Communication is identified as a function of DRMCs in general.

An amount of data on relief activities is available on all levels. Vulnerability assessments serve as a source of information.

3.4.5.2. Challenges

In general, the skills capacities for IM and analysis across DRM structures are low.

It was identified that a lot of data is held at different ministries on all levels, but not sufficiently utilized and shared. Data collection is often done on paper, without agreed and common structure, and often not digitized into central databases. There is a definite lack of centralised IM systems (3Ws, SOP's etc.) to effectively coordinate preparedness, response, prevention, mitigation and recovery activities.

Common assessment methodologies are not in place and humanitarian concepts not clearly defined (e.g. the definition of “affected population”).

Communication lines, for example to the communities, are not checked.

3.4.5.3. Recommendations

1. To strengthen the capacities and expertise in IM, a centre of excellence could be established in the MICT to serve as a hub for training, central services and support to other ministries and DDRM.
2. Regular IM training should be provided to DDRM staff and also be part of a DRMC induction training.
3. An IM profile should be included in DDRM structure.
4. A single and integrated citizen registration database, used by all ministries, is highly recommended, for example to serve as a base for registration of people in disasters. In addition, central databases for information exchange should be established, based on existing capacities, and used by all ministries on all levels. Therefore, a common list of definitions and an agreed methodology for assessment and information retrieval could ensure a valid base of data and information.
5. NSA, as the mandated institution in charge of data production and management, should continue to develop, host and maintain the needed databases, with input and linkages to other institutions, particularly DDRM and MICT. All ministries on all levels need institutional capacities for systematic collection, storing, analysing and interpreting disaster related data and information for decision making.

3.4.6. Post-disaster recovery

3.4.6.1. Strengths

It was observed that some sections of the DRM act and policies made provisions for post disaster activities which include likelihood of recovery being formalised.

It is also worthy to note that the DRM policies are currently undergoing review as to align with Sendai Framework of Action.

3.4.6.2. Challenges

There is general weak awareness of the post disaster recovery activities at local and regional level. The DRM at all levels obviously engage in minimal activities with regard to post disaster recovery strategies, thereby channelling most efforts to response while activities beyond relief activities, e.g. Post Disaster Needs and Damage Assessment, are given little or no attention

3.4.6.3. Recommendations

1. Recovery should be integral part of the revised DRM Policy. It is also recommended to integrate post disaster activities in the revision of the DRM policies.
2. Advocacy should be strengthened to allocate part of line ministry DRM budget for disaster recovery activities in order to strengthen awareness. A framework for monitoring and evaluation of recovery activities should be established, including Post Disaster Needs Assessment (PDNA) methodology.
3. It is strongly recommended that the Treasury consider pre-during and post disaster grants allocated to specific ministries.

Note: [Chapter 5.5. “Prioritized actions for Pillar 4: Enhancing preparedness for effective response, and building back better in recovery and reconstruction”](#) comprises a prioritized list of the above recommendations by section.

4. Recommendations related to leveraging UN System support to Namibian Government on DRM

1. **DRM Task Force convening Government, UN System, other partners in Namibia through regular meetings at both technical and strategic levels.** Working relations between the UN System and national authorities involved in disaster risk management activities could be reinforced through the creation of a task force at the technical level supporting national authorities meeting on a regular basis in order to define yearly priorities, integrated work plan, monitoring systems and translate these priorities into common programmes for DRM. At the strategic/ political level, the task force could be convened twice a year and could extend a standing invitation to major development partners in Namibia, such as international financial institutions, development banks, embassies and private sector. The purpose of the meetings at the strategic/ political level would be to foster a dialogue of all interested stakeholders around DRM priorities in Namibia – from prevention to response.
2. **Training workshops and learning resources on DRM concepts and methodologies, processes, standard operating procedures, and good practice.** Various UN agencies have training packages on the basics of DRM. A co-financing by several agencies will ensure a harmonised approach in this field and will help national authorities to better decentralize its DRM activities and improve linkages as communication lines at all levels. This could also be a good opportunity to support and fully integrate all cross cutting activities such as protection, gender, HIV AIDS control, etc. in disaster preparedness, response, prevention, recovery, resilience common programmes.
3. **Enhanced regional cooperation on early warning, preparedness and response with neighboring countries.** The Namibia UN Country Team, through its relations with surrounding UN Country Teams, the UN agencies' Regional and sub-Regional Offices, UNISDR and SADC may support a coordinated and harmonized sub regional early warning, preparedness and response mechanism, leading to a better use of available assets at regional level to respond to disasters in Namibia.
4. **Post-disaster inter-agency assessment.** The post-disaster needs assessment (PDNA) methodology can complement and support national knowledge in this field, thus improving post disasters data collection, analysis and restitution. This will have a positive impact for fundraising activities.
5. **Improved advocacy for better fundraising.** Namibia is challenged in raising its profile when a disaster strikes as it often occurs in tandem with other countries with bigger disasters support needs in Southern and Eastern Africa. Namibia needs a better advocacy strategy, better documents, more precise information on the crisis, its evolution, impact, location, number of persons affected, monitoring and identifying gaps in the response, cost of the response, etc. to attract donor's attention. The UN as "one" using its own information management capacities can already efficiently support nsational authorities and together build the needed international advocacy for better visibility of the crisis.

5. Prioritized Recommendations for a National Plan/ Framework of Action

5.1. Prioritization methodology

The prioritization exercise was based on the following methodology:

Recommendations were categorized by urgency (how urgent is it to work on this issue) and duration (how long does it take to establish it). For duration, “short” means up to 6 months, “medium” is up to 1 year, “long” is more than 1 year.

After applying the urgency – duration criteria, recommendations were ranked in three steps:

- Step 1: Actions with a high urgency and a short duration could be done in a first step in the next six months (“quick wins”).
- Step 2: Actions with high urgency / medium duration or medium urgency / short duration could be done in a second step, in a timeframe of one year.
- Step 3: Actions with medium priority and medium or long duration could be done in a third step, in a timeframe of 3 years.

The prioritization of actions should be an iterative exercise whereby the plan/ framework for action can be reviewed every 6 months to take stock of progress against targets and re-prioritize remaining actions. It is recommended that the following prioritized list of actions be complemented by a proper monitoring and evaluation system comprising timeline (that could replace the “steps”), baseline, targets, responsible institution(s), implementing agency, partners, required and allocated resources.

5.2. Prioritized actions for Pillar 1: Understanding disaster risk

Action	Topic	Urgency	Duration	Step
1. Conduct multi-hazard risk assessment and develop and update regularly a national multi-hazard risk profile of the country. Ensure that climate change scenario modeling is also linked to the national disaster risk profile.	Risk assessment	High	Medium	1
2. In order to support the development of a nation-wide multi hazard risk profile of Namibia: - Develop a unified methodology for multi-hazard nation-wide risk mapping, risk identification, risk assessment and risk-monitoring; - Purchase and use a multi-hazard risk assessment application/automated tool that enables regular risk monitoring/recalculation;	Risk assessment	High	Medium	1

Action	Topic	Urgency	Duration	Step
- Set up a comprehensive training programme, and required tools and equipment, to enhance competencies at all levels of national technical agencies for risk assessment.				
3. Conduct regular awareness events targeting decision-makers at all levels and in all sectors in order to ensure that the risk profile is used as a guidance to influence risk-informed decision-making for national, local and sectorial development processes.	Awareness	High	Short	1
4. Develop a national DRM awareness and communication strategy to include, among others public and community awareness campaigns at national and local levels through TV, radio, social media, printed material, dedicated national days	Awareness	High	Medium	1
5. Establish a central database of historical disaster events comprising data and information on damage and loss from past disasters to systematically evaluate, record, share and publicly account for disaster losses and understand their impacts (for instance, DESINVENTAR). Integrate the damage and loss database to an open-source common database containing the national multi-hazard risk profile (see recommendation 1). This database should include data and information on risk (hazard, exposure, socio-economic data, and disaggregated data) and should integrate datasets already available from the Namibia Statistics Agency. Locate the database with the NSA to avoid duplications.	Risk assessment	Medium	Medium	2
6. Develop SOPs and formalize data and information exchange among various technical institutions, line ministries, DDRM, NSA, University etc. Introduce procedures and regulations ensuring open access to the risk profile database to all relevant stakeholders at all levels.	Information management	Medium	Short	2
7. Formalize the use of unique identifiers such as P-codes by all ministries, institutes and organisations collecting data in the field so that results can be combined and analysed.	Information management	Medium	Short	2
8. The Ministry of Information Communication and Technology should undertake a review of its communication channels, including		Medium	Short	2

Action	Topic	Urgency	Duration	Step
speaking to local level representatives to validate whether outward communications reach everyone and are understood correctly at all levels and sociological groups.				
<p>9. A technical project should be developed to link up different ministries management information systems.</p> <ul style="list-style-type: none"> - The lead organisation for this would naturally be the Ministry of Information and Communication Technology, but unsure of their technical capacity as only met media departments. - The ideal outputs would be feed based, rather than exporting all information into one place as this would be quickly out of date. - Key databases / stakeholders to include would be: Met Services with forecasting information; Min. Agriculture with the Agriculture Information Management System; Namibia Statistics Agency with their census information; Namibia Statistics Agency as custodians of the Namibian Spatial Data Infrastructure (NSDI); Min. Poverty Eradication with their intended database of all intervention activities in the country. 	Information management	Medium	Long	3
10. An information management working group structure should be implemented at national and regional levels, suggested format would be a forum to share knowledge, agree standards, guidance, best practice and support amongst all those working in information management.	Information management	Medium	Long	3
11. Strengthen the capacity of the Ministry of Education, Arts and Culture to develop appropriate curriculum and teaching material on disaster risk management and climate change adaptation, and ensure teacher training. The Ministry could partner with the Red Cross to establish a Youth network or "DRM Clubs" in schools.	Education	Medium	Long	3
12. The Ministry of Higher Education, Training and Innovation should undertake a survey of skills gaps in all ministries and pass on as mandatory course list to higher education institutes, this will in time produce the necessary skills to fill roles, within the topic	Education	Medium	Long	3

Action	Topic	Urgency	Duration	Step
of DRM, gaps were noted in analysts, statisticians, geographic information systems and data architects.				

5.3. Prioritized actions for Pillar 2: Strengthening governance and institutions to manage disaster risk

Action	Topic	Urgency	Duration	Step
Recommendations for the DRM system at the national level				
13. Review the National DRM Policy to align it to the DRM Act (2012) and the Sendai Framework. Ensure linkages of the future Policy with the climate change legal and policy framework so that the two are not implemented in isolation from each other. Develop a national action plan to guide and track the progress of the implementation of the legal and policy provisions for the DRM system in Namibia.	Policy	High	Short	1
14. Implement the legal and policy framework for DRM so that roles, responsibilities and standard operating procedures of all institutions involved in DRM at all levels are clear.	Legislation	High	Medium	1
15. Include a budget line for DRM activities in line ministries and regions (percentage) as per DRM Act, to establish transparent financial accountability mechanism between all these institutions at all levels.	Budget	High	Medium	1
16. Formalize partnership between regions (horizontal coordination). Organize peer-to-peer experience exchange among regions, using capacities and skills that exist in certain regions to boost those of regions less developed.	Coordination	Medium	Medium	2
17. Review reporting lines and hierarchical levels/ grades between the central and local levels to increase accountability and effectiveness of implementation of DRM mandates.	Institutional accountability	Medium	Long	3
Recommendations for the DRM system at sub-national level				
18. Organize sensitization of regional stakeholders on the DRM legislation, regulations and policy. The sensitization would have to target regional governors, members of DRM committees at regional, constituency, settlement and local authority level, Field Coordinators, technical officers from different ministries and departments and town councils.	Awareness	High	Short	1
19. Provide induction session on DRM to members of the RDRMCs and DRM Focal	Training	High	Short	1

Action	Topic	Urgency	Duration	Step
Persons from constituencies and lines ministries by the Directorate DRM. Trained staff in RDRMCs to provide same training to CDRMCs.				
20. Conduct awareness raising for the members of the RDRMC and CDRMC to foster political will and decision-making on DRM matters.	Training	Medium	Medium	2
21. Reorganize the position and hierarchy of the Field Coordinator vis a vis the difference between its integration in the regional structure and its reporting obligations to the Directorate DRM. Organize regular coordination meetings of the Regional DRM Field Officer and local DRM focal persons from all local constituencies in all regions. Ensure that the Regional DRM Field Officer provides regular reporting to the Directorate DRM at central level in a systematic and formalized manner.	Institutional reform	Medium	Medium	2
22. Integrate budget line for DRM at the level of Regional and Town Councils so that the RDRMC and CDRMC can implement DRM activities effectively. In addition, the Directorate DRM/ OPM should decentralize emergency funds to Regional Councils. Currently, DRM task/responsibilities have been decentralized to the Regional Councils but the required financial resources have not. This results in challenges for the regional councils to implement response activities properly.	Budget	Medium	Long	3
23. Regional Councils should develop stronger and formalized partnerships with organisations outside government, such as the Red Cross Society. In view of the known expertise and capacity of the Red Cross Society in DRM and especially in disaster response, there is need for the regional council to partner with the organization so that it can effectively complement government efforts.	Partnerships	Medium	Long	3
Recommendations for the Directorate DRM				
24. Refocus the mandate and enhance capacities of the Directorate DRM towards strategic coordination instead of operational implementation, and from response to comprehensive/ holistic DRM.	Institutional reform	High	Medium	1

Action	Topic	Urgency	Duration	Step
25. Elevate the hierarchical level of the Directorate DRM in the Government structure.	Institutional reform	High	Short	1
26. Restructure DDRM to include more senior management to cover core DRM functions.	HR	High	Medium	1
27. Reinforce leadership competencies in senior management, particularly with respect to delegation and empowering middle level management and technical staff.	HR	High	Short	1
28. Develop and implement HR management strategy for the Directorate DRM, including, among others: <ul style="list-style-type: none"> - Organize systematic training events to enhance technical expertise of the staff; - Review job titles to properly reflect roles; - Create career development opportunities in collaboration with universities in Namibia and abroad; - Establish collaboration with higher education institutions to integrate next generation of DRM specialists. 	HR	Medium	Medium	2

5.4. Prioritized actions for Pillar 3: Investing in economic, social, cultural, and environmental resilience

Action	Topic	Urgency	Duration	Step
Recommendations for the agriculture sector				
29. DRM Policy/ Strategy should be developed to operationalize specific aspects of agriculture.	Policy	High	Short	1
30. DRM should be mainstreamed in the MAWD directorates, the National Agricultural Policy, National drought policies and any other related documents currently undergoing review.	Mainstreaming	Medium	Medium	2
31. Mainstream DRM into the work program of the DAPEES and other directorates.	Mainstreaming	Medium	Medium	2
32. Benchmark and map DRM activities in the agriculture sector, interventions and actions as well as develop a monitoring framework.	M&E	Medium	Medium	2
33. At the local level, train communities in alternative agriculture measures to reduce the people's dependence on relief items provided by the government in times of drought.	Local-level resilience actions	Medium	Long	3
Recommendations for the health sector				
34. Design operational mechanisms for regular engagement of the Ministry of Health with key institutions of the national DRM system, such as MET services, agriculture, Universities, private health providers and the Directorate DRM.	Coordination	Medium	Medium	2
35. Increase capacity in assessments through training of health staff.	Training – assessment	Medium	Medium	2
36. Increase capacities of the Ministry of Health staff to train and implement DRM activities at community level.	Training – community based DRM for health sector	Medium	Medium	2
37. Develop emergency preparedness plans for hospitals.	Preparedness	High	Medium	1
38. Increase capacity in disease prediction, mapping, training, simulation and coordination.	Prevention, EW	Medium	Long	3
Recommendations for the environment sector				
40. Improve coordination and linkages to DRM and other DRR stakeholders through establishing of focal point within the Ministry of Environment.	Coordination	High	Short	1
41. Increase technical skills in DRM through training of Ministry of Environment staff.	Training	High	Short	1

Action	Topic	Urgency	Duration	Step
42. Mainstream DRR into environment work plans and budgets.	Mainstreaming	Medium	Medium	2
43. Integrate awareness and education sessions in schools at all levels (pre-school to high school) on environmental protection and preventive measures (personal hygiene, waste management, etc.).	Education	Medium	Medium	2
44. Conduct public awareness raising on negative impacts of littering in informal settlements and facilitate low-cost waste collection and disposal for these communities.	Awareness	Medium	Medium	2
45. Develop local investment/ business plan for main urban centers in the Regions for solid waste management by involving the private sector (businesses, local commercial centers, banks, etc.) and local communities for waste collection systems, safe waste recycling/ transformation sites, volunteers, cleaning days in schools and public areas.	Local-level DRM	Medium	Long	3
46. Develop local investment/ business plan for urban sewage and drainage systems, and continue advocacy with regional and local counselors, and Ministers/ Permanent Secretaries for fund allocation, planning and implementation.	Local-level DRM	Medium	Long	3

5.5. Prioritized actions for Pillar 4: Enhancing preparedness for effective response, and building back better in recovery and reconstruction

Action	Topic	Urgency	Duration	Step
47. Induction training for all DRMC members at all levels	CoordPrep	High	Short	1
48. Strengthen the DRMC at all levels to support inter-sectoral coordination	CoordPrep	High	Short	1
49. Streamline lines of communication between different levels	CoordPrep	High	Short	1
50. Allocate sufficient funds for the contingency plan process, develop work plan for implementation and assign accountability for contingency planning process at all levels (DDRM)	ContPlan	High	Short	1
51. Streamline hazard mapping and risk analysis	HazMon/EWS	High	Short	1
52. Ministries should share existing databases	IM/Comm	High	Short	1
53. All ministries should use the Ministry of ICT communication channels not ad hoc	IM/Comm	High	Short	1
54. Develop framework for monitoring and evaluation of recovery activities, including post disaster needs assessment (PDNA) methodology	PD Recovery	High	Short	1
55. Operationalize DRM Act and Regulations	CoordPrep	High	Medium	2
56. Clear roles (TOR), responsibilities (M&E) should be first formalized then harmonized at all levels	CoordPrep	High	Medium	2
57. Build capacity in contingency planning at all levels	ContPlan	High	Medium	2
58. Create clear response plans for all different hazards	ContPlan	High	Medium	2
59. Develop capacities for simulation exercises to test all contingency plans	ContPlan	High	Medium	2
60. Clear allocation of decentralised budget	EmergPrepResp	High	Medium	2
61. Creation of a proper integrated multi-hazard early warning system for the country. To be done under a clearly defined authority	HazMon/EWS	High	Medium	2
62. Make more use of existing data from various ministries secondary data	HazMon/EWS	High	Medium	2
63. Need to create and integrate a single citizen registration database for all ministries located with the NSA.	IM/Comm	High	Medium	2

Action	Topic	Urgency	Duration	Step
64. Profile of Information Management should be included in DDRM	IM/Comm	High	Medium	2
65. Allocate part of line ministry DRM budget for disaster recovery activities	PD Recovery	High	Medium	2
66. Developmental planning should take account of contingency planning outputs	ContPlan	Medium	Short	2
67. Information management should be part of DRMC induction training	IM/Comm	Medium	Short	2
68. Integrate recovery in the revised DRM Policy	PD Recovery	Medium	Short	2
69. Establish and properly equip one common operation centre for City of Windhoek, Khomas Region and national bodies involved in DRM to optimise available funds	CoordPrep	Medium	Medium	3
70. Use available technical staff of ministries to conduct joint risk assessments to update risk maps	HazMon/EWS	Medium	Medium	3
71. Advocate for strengthening Remote Sensing capacity	HazMon/EWS	Medium	Medium	3
72. Need to increase capacity of Ministry ICT to include information management centre of excellence	IM/Comm	Medium	Medium	3
73. Validation checks should be put in place to ensure effective national communication efforts	IM/Comm	Medium	Medium	3
74. Need for institutional capacity for systematic collection, storing, analysing and interpreting of disaster related data and information for decision making	IM/Comm	Medium	Medium	3
75. Post-disaster recovery should be included in the contingency planning process	PD Recovery	Medium	Medium	3
76. OPM through its Treasury should consider post disaster recovery grants for specific ministries	PD Recovery	Medium	Medium	3
77. Establish and properly equip regional emergency operations centers	CoordPrep	Medium	Long	3
78. Review of the decentralised Fire Services with support of Windhoek Emergency Services	ContPlan	Medium	Long	3
79. Develop a national volunteering roster to support DM activities	EmergPrepResp	Medium	Long	3

5.6. Prioritized actions related to leveraging UN System support to Namibian Government on DRM

Action	Topic	Urgency	Duration	Step
80. DRM Task Force convening Government, UN System, other partners in Namibia through regular meetings at both technical and strategic levels.	Coordination	High	Short	1
81. Training workshops and learning resources on DRM concepts and methodologies, processes, standard operating procedures, and good practice.	Training	High	Short	1
82. Enhanced regional cooperation on early warning, preparedness and response with neighboring countries.	Regional cooperation	Medium	Medium	2
83. Improved advocacy for better fundraising. (Link with action 1)	Advocacy	Medium	Medium	2
84. Post-disaster inter-agency assessment.	Training	Medium	Short	2

*** End of Report***