

## GENERAL FUNCTIONS OF THE DIVISION HYDROLOGY DIVISION

### HYDROLOGY LOGO



#### 1. MANDATE

To ensure protection and sustainable use of the water resources through the provision of Sections 7 (A) to 21 of the Water Act 54 of 1956 and Sections 44-55 (Part 11. License to Abstract and Use) & Sections 92-100 ( Part 17, Dams, Dam safety and Flood Mgt) of the Water Resources Management Act 11 of 2013

#### Divisional functions

- a) To **collect, process, store, safe keep, disseminate** and publish historic hydrological data.
- b) To collect in **real-time surface water data** and advice on related action.
- c) To **assess** and **advise** on the development and safety of water abstraction and other works in rivers (carry out flood related investigations & carry out runoff related investigations).
- d) To **quantify** surface water resources, **assess** the potential and make recommendations regarding the optimal utilization for water supply and other purposes.
- e) To **give advice** regarding the feasibility of small surface water schemes in rural areas, especially with regards to site, capacity and lay-out, and the monitoring of inflow and sedimentation patterns for such dams.

#### 2. MISSION

The Mission for the Division of Hydrology is to provide information and advice on the development and safety of water abstraction and other works in rivers. It delivers the service of a national hydrological center for the processing, safekeeping, dissemination and publication of hydrological data.

#### 3. VISION

“A national surface water that is efficiently manage so as to ensure high quality water and surface resources are available for the sustainable use of present and future Namibians”.

#### **4. OPERATIONAL OBJECTIVES**

To assist the Government in the national and regional monitoring and management of surface water resources by:

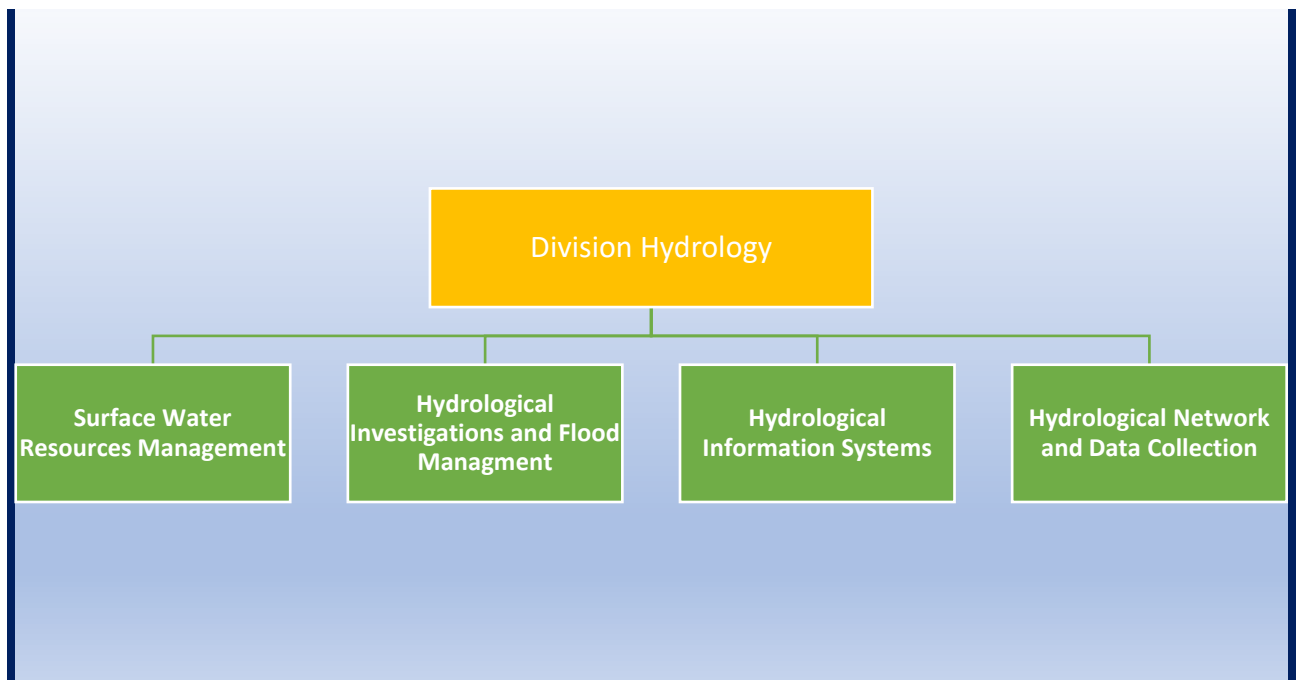
- a) Rendering the service of a national hydrological center in the country by collection, processing, storage, provision, dissemination and publication of hydrological data;
- b) Carrying out hydrological investigations and assessments, at international, national, regional and local levels;
- c) Providing information and advice on the potential and optimal development and utilization of surface water resources, at international, national, regional and local levels;
- d) providing information and advice on the development and safety of water impoundments and water abstraction and other works in the rivers;
- e) Carrying out flood monitoring, providing early warning and forecasting information for flood readiness and response and performing assessments for mitigation and other flood management measures

##### **4.1 DIVISIONAL OUTPUTS**

- National Hydrological Services
- Hydrological surface water data archive
- Issuance of Daily Flood and Drought Bulletins during rainy season
- Surface water databases, reports and publications
- Flood maps, etc.

#### **5. THE DIVISIONAL OPERATIONAL STRUCTURE**

The divisional operational structure consists of four (4) sub-divisions and the respective functions are presented in the following paragraphs.



## **FUNCTIONS: SUB-DIVISIONAL LEVEL**

### **5.1 SUBDIVISION: SURFACE WATER RESOURCES MANAGEMENT**

Assess and advise on utilization of

- surface water resources, on impoundments
- flood management for water management and control purposes

Determine potential and investigate optimal utilization

- of internal rivers
- border surface water resources
- hydrological research and investigations

EIAs

Permits:

- Water Abstraction
- Sand mining/abstraction
- Works in Rivers

Hydrological data collection and monitoring river flow events

- hydrological routine trips
- flood warning
- real time hydrological data
- historical events

Basin management committees

IWRM activities

## **5.2 SUBDIVISION: HYDROLOGICAL INVESTIGATIONS & FLOOD MANAGEMENT**

Flood & drought (hydrological) warning

- a. Bulletin - during rainy season
- b. NamPower, NamWater, RSA website (collection, evaluation and releasing real-time hydrological data)
- c. advise on flood & drought related actions

Special hydrological studies and investigations (WMO, UNESCO-IHP, SASSCAL)

Assess and advise on utilization of

- d. surface water resources, on impoundments
- e. flood management for water management and control purposes

Hydrological data collection and monitoring river flow events

- f. hydrological routine trips
- g. flood warning
- h. real time hydrological data
- i. historical events

Basin management committees

IWRM activities

## **5.3 SUBDIVISION: HYDROLOGICAL INFORMATION SYSTEMS**

National hydrological database system

- processing,
- storing
- archiving hydrological data

Data Requests (Hydrological data (i.e. runoff, flow and water stages) from rivers and dams in Namibia

Publish hydrological information

Disseminate hydrological information to:

- NamWater, Consultants, Students, other Government Departments
- Researcher Institutions, NGO's, GRDC, etc

Hydrological data collection and monitoring river flow events

- hydrological routine trips
- flood warning
- real time hydrological data
- historical events

Exchange hydrological information

- other organizations in Namibian
- with other river basin countries

Basin management committees

IWRM activities

#### **5.4 SUBDIVISION: HYDROLOGICAL NETWORK AND DATA COLLECTION**

National hydrological data collection network

- constructing,
- maintenance

Hydrological data collection and monitoring river flow events

- hydrological routine trips
- flood warning
- real time hydrological data
- flow gauging
- historical events

Hydrological data collection & monitoring

- other organizations
- from observer

Basin management committees

IWRM activities

Assess and advise on utilization of

- surface water resources, on impoundments
- flood management for water management and control purposes

Procurements, Budget, Transport

#### **Contact Details:**

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**See attached**

**Annexure A: Hydrology Data Request Form:**

**For data request do contact:**

Pauline Mufeti, Deputy Director:

Hydrology Division,

E-mail: [paulina.mufeti@mawlr.gov.na](mailto:paulina.mufeti@mawlr.gov.na)

CC: [geraldine.diergaardt@mawlr.gov.na](mailto:geraldine.diergaardt@mawlr.gov.na); [hydrologynamibia@gmail.com](mailto:hydrologynamibia@gmail.com)

**Annexure B: Daily Flood Bulletins:**

Flood/Hydrological Drought Bulletins are disseminated daily during the rainfall season to various key stakeholders such as government entities, farmers, local authorities, lodge owners and other interested stakeholders. The bulletins provides river and dam level information, flood/drought forecasting and early warning, rainfall and other related information.

To receive or to be added to the distribution list do forward e-mail to:

National Hydrological Services, E-mail: [hydrologynamibia@gmail.com](mailto:hydrologynamibia@gmail.com)

For flood data/information do contact:

Pauline Mufeti, Deputy Director:

Hydrology Division,

E-mail: [paulina.mufeti@mawlr.gov.na](mailto:paulina.mufeti@mawlr.gov.na)

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Annexure C: List of Stations?