



**NQUTHU MUNICIPALITY**



## **NQUTHU DISASTER COORDINATION CENTRE**

### **SUMMER SEASON CONTINGENCY PLAN 2015/16**



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**Disaster Management & Emergency Services**  
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## **1. Introduction**

Nquthu Municipality faces severe and extreme weather and climate events that occur naturally in summer season in all part of the area, although some wards are more vulnerable to certain hazards such as lightning strikes than others. These hazards become disasters every year when people's lives, property, and livelihoods are destroyed. Human and material losses caused by such disasters area major obstacle to sustainable development. Preparing plans, and issuing accurate forecasts and early warnings in a form that is readily understood and by educating citizens how to prepare against such hazards, before they become disasters, lives and property can be protected.

As required by the RSA Disaster Management Act 57 of 2002 and Disaster Management Policy Framework notice 654 of 2005, Nquthu Disaster Coordination Centre initiated a process of developing a Summer Season Contingency plan in line with the National Disaster Management Centre guidelines for the development and implementation of Seasonal contingency plans.

In summer, the area is prone to hazards such as lightning strikes, heavy rain and floods, strong winds and hailstorm, and structural fires. The summer season contingency plan entails strategies and techniques to be implemented to reduce disaster risk. The principal purpose of the contingency plan is to provide guidelines for the prevention and appropriate response to disaster affecting the normal life operations of a given community.

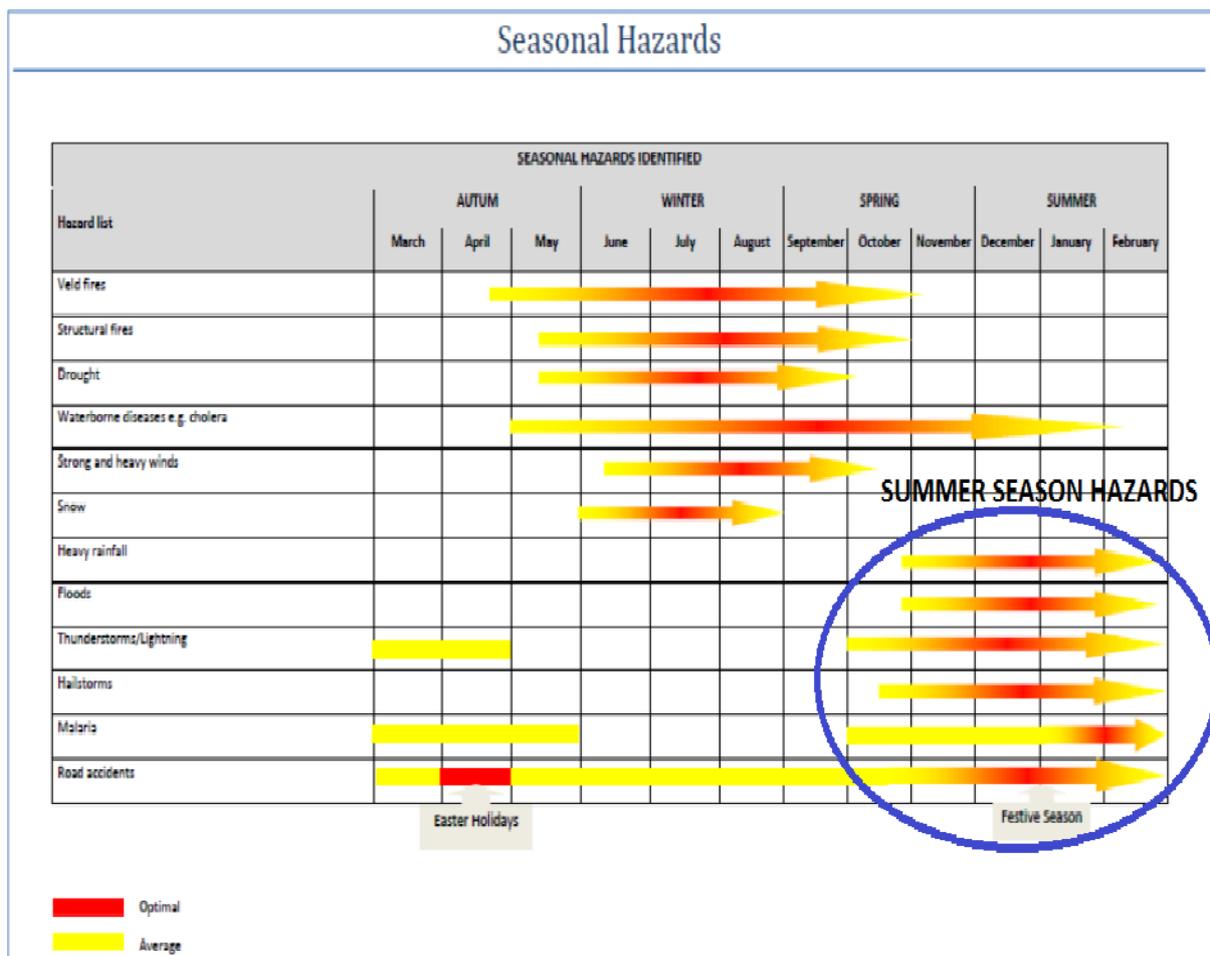
## **2. Legislative mandate**

The RSA Disaster Management Act 57 of 2002 establishes a disaster risk management system that defines disaster risk management as a continuous and integrated multi-sectoral and multi-disciplinary process of planning and implementation of measures that intends to prevent or reduce the risk of disasters, mitigate the severity of disasters, emergency preparedness, a rapid and effective response to disasters, and appropriate post disaster recovery and rehabilitation.

Disaster risk management remains everybody's business, so the summer season plan outlines strategies and associated plans for the management of disastrous events in Nquthu.

### 3. Risk Assessment, Monitoring and Continual Evaluation

The effective management of any other disaster risk or disaster threatening incidents calls for the identification, quantification, monitoring and on-going evaluation of the situation. This summer season plan covers the period from October 2015 to March 2016. This period incorporate spring and summer seasons, as historical data indicate adverse weather related events start to occur early in the spring season. The most prevailing and potential summer hazards are thunderstorms, lightning strikes, heavy rainfalls, malaria, road accidents and floods.



**Figure 1: Summer season potential hazards prevalent in Nquthu**

To this effect the weather data from the South African Weather Services has to be analysed and shared daily with communities at high risk to determine the level of possible threat. Other agencies such as Water Affairs should also contribute in information sharing such as Dam levels and possible period when river overflows can be expected.

#### 4. Risk Reduction Interventions

Risk reduction interventions enhance the role-play participation of all stakeholders involved in the management of the disaster situation (as per their respective constitutional mandates) to ensure an effective, well-coordinated management of the situation. All role players (line-function departments) are expected to present their contingency plans and strategies for the summer season. The Nquthu Disaster Management Plan encourages all stakeholders to be proactive and device prevention and mitigation strategies. Table 1 list the summer season disaster risk reduction strategies as follows:

HAZARD	POTENTIAL RISK	RISK REDUCTION STRATEGIES
<b>Floods, Thunderstorms, Heavy rainfall, Lightning, Hailstorm</b>	People cannot be able to evacuate the area	<ul style="list-style-type: none"> <li>• Identify vulnerable sectors informal/formal</li> <li>• Community awareness campaigns on flooding</li> <li>• Identified high ground shelter for accommodating displaced persons leave</li> <li>• Consider relocation of informal temporary shelter</li> <li>• Pro-active measures of mitigation (gabion baskets)</li> <li>• Early warning systems</li> </ul>
<b>Floods, Thunderstorms, Heavy rainfall, Lightning, Hailstorm</b>	Areas can be cut off by washed out roads, bridges etc., preventing access by response agencies.	<ul style="list-style-type: none"> <li>• Identify vulnerable sectors informal/formal</li> <li>• Awareness programs (proper drainage system)</li> <li>• Identify alternative routes</li> <li>• Planning, positioning and quality of roads</li> </ul>

		<ul style="list-style-type: none"> <li>• Include IMS protocol in conjunction with department of transport</li> </ul>
<b>Floods, Thunderstorms, Heavy rainfall, Lightning, Hailstorm</b>	Building (Public and Private) and informal settlements can be destroyed, leaving large number of people homeless.	<ul style="list-style-type: none"> <li>• Awareness in terms of building codes in rural areas. (Quality of homes) and (management of household possessions)</li> <li>• Pre-identify alternative accommodation/Maintain database of resources.</li> </ul>
<b>Major &amp; traffic incidents</b>	The bad mechanical condition of vehicles traversing Municipality roads can cause road accidents.	<ul style="list-style-type: none"> <li>• Awareness programs: Road and vehicle safety principles to be adopted by drivers and passengers.</li> <li>• Co-ordination /Implementation of law enforcement Road and vehicle safety principles to be adopted by drivers and Major &amp; traffic incidents passengers.</li> <li>• Implement IMS protocol, including all emergency services</li> </ul>
<b>Major &amp; traffic incidents</b>	Inappropriate driver behavior can cause road accidents	<ul style="list-style-type: none"> <li>• Awareness programs: Road and vehicle safety principles to be adopted by drivers and passengers.</li> <li>• Co-ordination /Implementation of law enforcement</li> </ul>
<b>Major &amp; traffic incidents</b>	Deteriorating road conditions must cause road accidents	<ul style="list-style-type: none"> <li>• Awareness e.g. warning signage and information</li> <li>• Law enforcement to combat e.g. overloading</li> </ul>
<b>Major &amp; traffic incidents</b>	Incident in a distant/ isolated area;  High accident zones	<ul style="list-style-type: none"> <li>• Pre- deployment of ambulances ins strategic positions</li> <li>• Make provision for mortuary services</li> </ul>

**Table 1: Potential hazards and risk reduction strategies**

## **5. Response and recovery coordination**

Response and recovery consists of a series of interconnected steps in a continuum. It is imperative that disaster management practitioners and other relevant organizations observe and understand these steps as they provide a simplistic sequence for emergency preparedness. These steps are generic and can be adjusted to suit any operational needs of every disaster management related stakeholder.

The Nquthu Disaster Coordination Centre will be in constant communication with sector departments as well other organs of state to share information on the circumstances and developments on the ground in as close to real time as possible.

Timeous and effective response to incidents is imperative to ensure service delivery and sustainable development. To this effect, a well-coordinated response and recovery system will be in place 24/7 to manage the incident consistent with strategic focus areas and assist disaster victims with every possible assistance.

## **6. Education and public awareness campaigns**

For the above interventions strategies to be well executed, it is imperative to promote a culture of risk avoidance among stakeholders by capacitating role players through integrated education, training and public awareness programs. To inculcate risk avoidance behaviour by all stakeholders, public awareness campaigns aimed at raising consciousness about disaster risks will provide information on how to reduce vulnerability and exposure to hazards. These campaigns will include:

- Organized and planned awareness programs
- Public gatherings such as izimbizo
- Annual recognition and celebration of World Disaster Risk Reduction Day
- Rewards, incentives, competitions and recognition schemes to enhance awareness of and participation in risk reduction activities
- Dissemination of information to all role players

The ward councillors and traditional leaders must play an active part in engaging schools to ensure a practical approach to awareness programs. Education and awareness campaigns targeting communities who are directly affected by the

incidents such as severe weather phenomenon have been conducted and are still on-going. The awareness campaigns also seek to ensure that all volunteers are trained to be active as the first line of response when incidents occur.

### 7. Standard operating procedures

Since an incident may occur at any time, it is necessary to maintain the plan and it's implementing procedures so that effective response can be affected rapidly. The activities undertaken to ensure constant readiness constitute the emergency preparedness program and strategies that must be developed and implemented. Response and recovery consists of a series of interconnected steps in a continuum. It is imperative that disaster management practitioners and other related organizations observe and understand these steps as they provide a simplistic sequence for emergency preparedness. These steps are generic and can be adjusted to suit any operational needs of every disaster related organization. Figure 4 below presents a diagrammatical illustration of the response and recovery

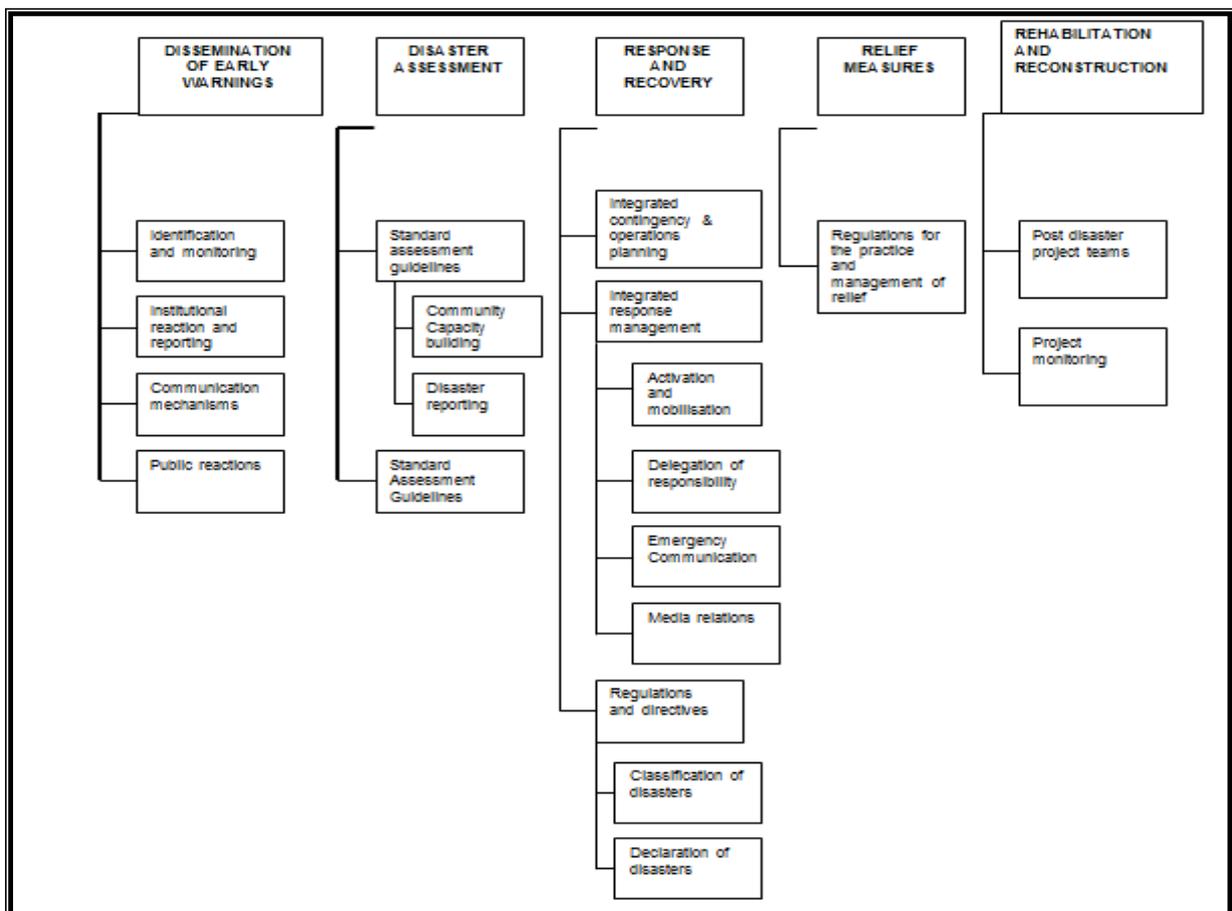


Figure 2: Disaster Response and Recovery

The basic steps and actions of the response and relief management procedure are summarised below. Table 2 illustrates a steps involved in the response and relief procedures. This procedure is compatible with KPA 4 of the National Disaster Management Policy Framework.

Steps	Action
<b>Notification and Activation</b>	<ul style="list-style-type: none"> <li>• Detection</li> <li>• Mobilization</li> </ul>
<b>Rapid Initial Assessment</b>	<ul style="list-style-type: none"> <li>• On-scene assessment e.g. hazards, injuries etc.</li> <li>• Initial report on the situation</li> </ul>
<b>Integrated Response Management Structure</b>	<ul style="list-style-type: none"> <li>• Unified Incident Management</li> <li>• Forward Control Point / On-site JOC</li> <li>• Team Coordinator</li> <li>• Inner Cordon</li> <li>• Outer Cordon</li> <li>• Staging Areas</li> <li>• Process Management</li> <li>• Sectors</li> </ul>
<b>Re-assess</b>	<ul style="list-style-type: none"> <li>• Resources</li> <li>• Hazard</li> <li>• Situation</li> </ul>
<b>Strategic Response Management Structure</b>	<ul style="list-style-type: none"> <li>• Disaster/Joint Operations Centre</li> <li>• Initial Strategic Situational Analysis</li> <li>• Structures to provide relief</li> </ul>
<b>Monitor/Evaluate/Review</b>	<ul style="list-style-type: none"> <li>• Disaster management team</li> </ul>
<b>Close and document</b>	<ul style="list-style-type: none"> <li>• De-mobilise</li> <li>• Debrief (Post Mortem)</li> <li>• Corrective actions</li> </ul>

**Table 2: Steps in the response and relief procedure**

## **8. Joint Operations Centre**

A Joint Operations Centre is the sphere within a response management system where the combined or joint tactical co-ordination and management of a significant event or disaster involving multi-agency operations takes place. Municipal JOC should be established and positioned at the disaster management centre.

It is imperative that all relevant role players to be activated for the coordination and execution of activities during a specific event, emergency or disaster. This will ensure continuous coordination and cooperation between the relevant role players for the duration of the situation. The nature of an incident/disaster would determine the levels of Joint Operations Centres (JOCs) to be established.

### **Functions of a JOC**

- To ensure continuous coordination and cooperation between role players.
- To serve as an information and communication nodal point.
- To render guidance and assistance to the operational functionaries at the incident.
- To promote communication and decision making between relevant role players.
- To ensure that all joint instructions are communicated to the relevant role players.
- To maintain complete administrative recording of all activities during the situation.
- To update and inform relevant higher levels of command and management on relevant activities and incidents.
- The nature of event, emergency and disaster must determine the role player, composition of the JOC and the JOC commander (coordinator).
- For security related incidents, the SAPS must assume command of the JOC whilst with non-security related incidents; the responsibility must rest with Disaster Management Unit of that respective level.
- The role of the JOC Commander must be to coordinate and ensure unity in command without assuming command over line functionaries of different departments/role players.

- Each role player must be responsible to delegate a senior official to the JOC who must assume coordination and command pertaining to the specific functional and operational activities for that specific discipline.
- The representative in the JOC must issue these instructions after coordination, deliberation, decision making and on request of the JOC Commander.

## **9. Institutional roles and responsibilities**

### ***Nquthu Disaster Coordination Centre role***

- The NDCC will activate a 24-hour operational centre situated in Technical Services, Nquthu Municipality, Nquthu.
- The operational centre will be manned by 5 officials working 3-day shifts on a rotational basis;
- The contact numbers for the operational centre are as follows:
  - **072 948 6678 Mr Mlungisi Zulu**
  - **083 551 0345 Mr Mthokozisi Ndlovu**
  - **082 296 9482 Mr Xolani Mbatha**
- Adverse weather warnings from the SA Weather Services will be circulated to all stakeholders. When adverse weather commence, all stakeholders will be notified immediately.
- The NDCC representatives will monitor and coordinate all disaster related incidents in all Wards;

The municipality having primary responsibility for the co-ordination and management of a local disaster will deal with a local disaster in terms of existing legislation and contingency arrangements, if a local state of disaster has not been declared in terms of section 55: or in terms of existing legislation and contingency arrangements as augmented by by-laws or directions made or issued in terms of section 55(2), if a local disaster has been declared. This section does not preclude a national or provincial organ of state, or another municipality or municipal organ of state from providing assistance to a municipality to deal with a local disaster and its consequences.

## 10. Discussion

Nquthu faces many different types of risks on a daily basis, including health, environmental, financial and security risks. However, disaster risk specifically refers to the likelihood of harm or loss due to the action of natural and man-made hazards or other external threats on vulnerable structures, services, areas, communities and households.

Disaster risk assessment is the first step in planning an effective disaster risk reduction program. Disaster risk assessment provides an objective and transparent information for making decisions on countermeasures to reduce disaster risk. Disaster risk assessment examines the likelihood and outcomes of expected disaster events.

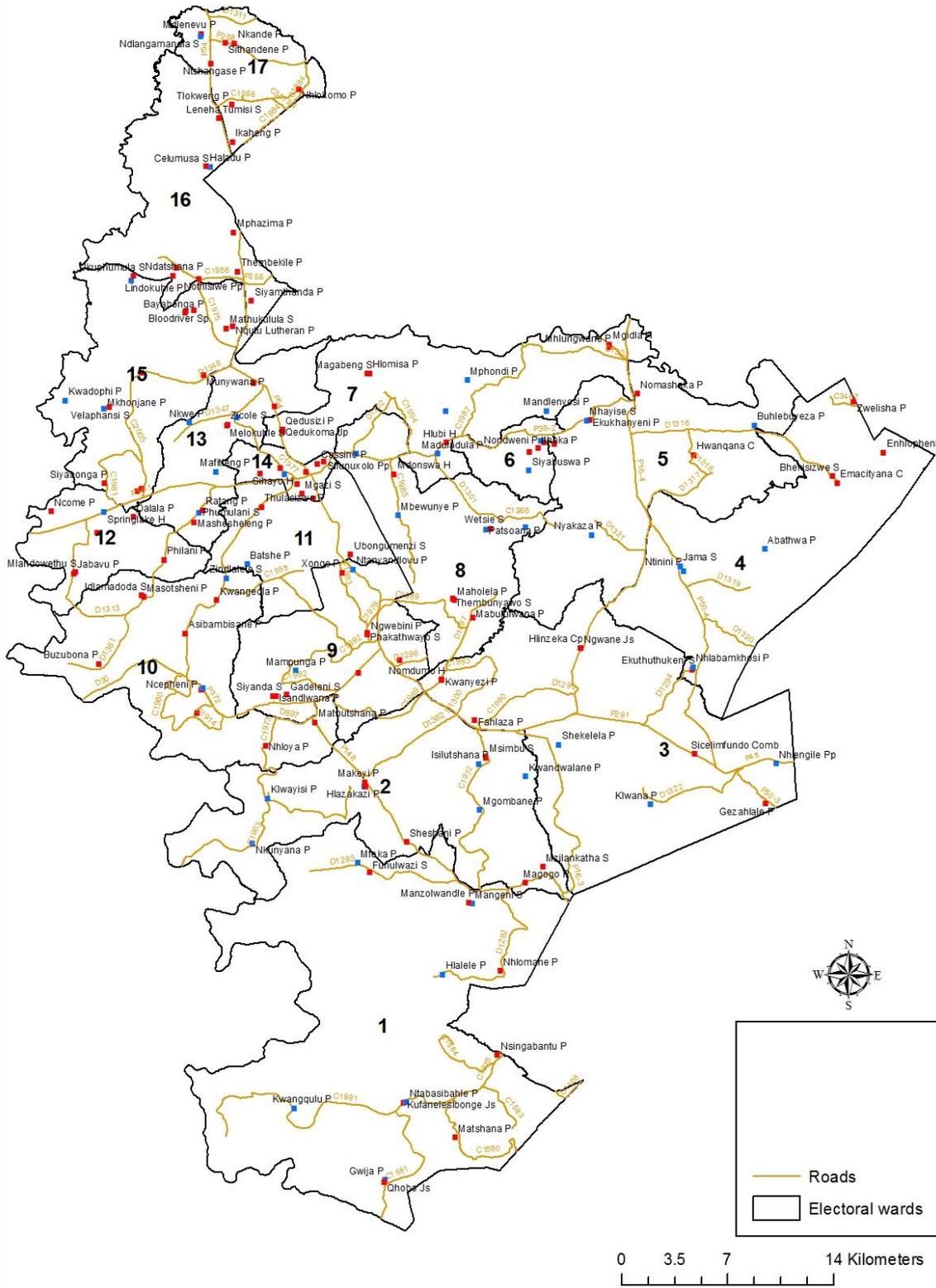
Disaster risk assessment includes the investigation of related hazards and conditions of vulnerability that increase the chances of loss and also the capacity or resources to deal with such hazards and vulnerabilities. Prior to the development of the summer season plan a risk assessment was conducted. Part of this document will illustrate risk profile at ward levels.

The table below illustrates the most occurring hazards that normally pose risk to hundreds of people in Nquthu during summer season.

<b>Thunderstorm and Lightning</b>	<b>Heavy rain and Floods</b>
<b>Strong winds and Hailstorm</b>	<b>Structural fires</b>

**Table 3: Potential Summer Season hazards**

# Nquthu Municipality



**Figure 3: Map of Nquthu Municipality showing municipal electoral Wards**

## **11. Nquthu Municipality**

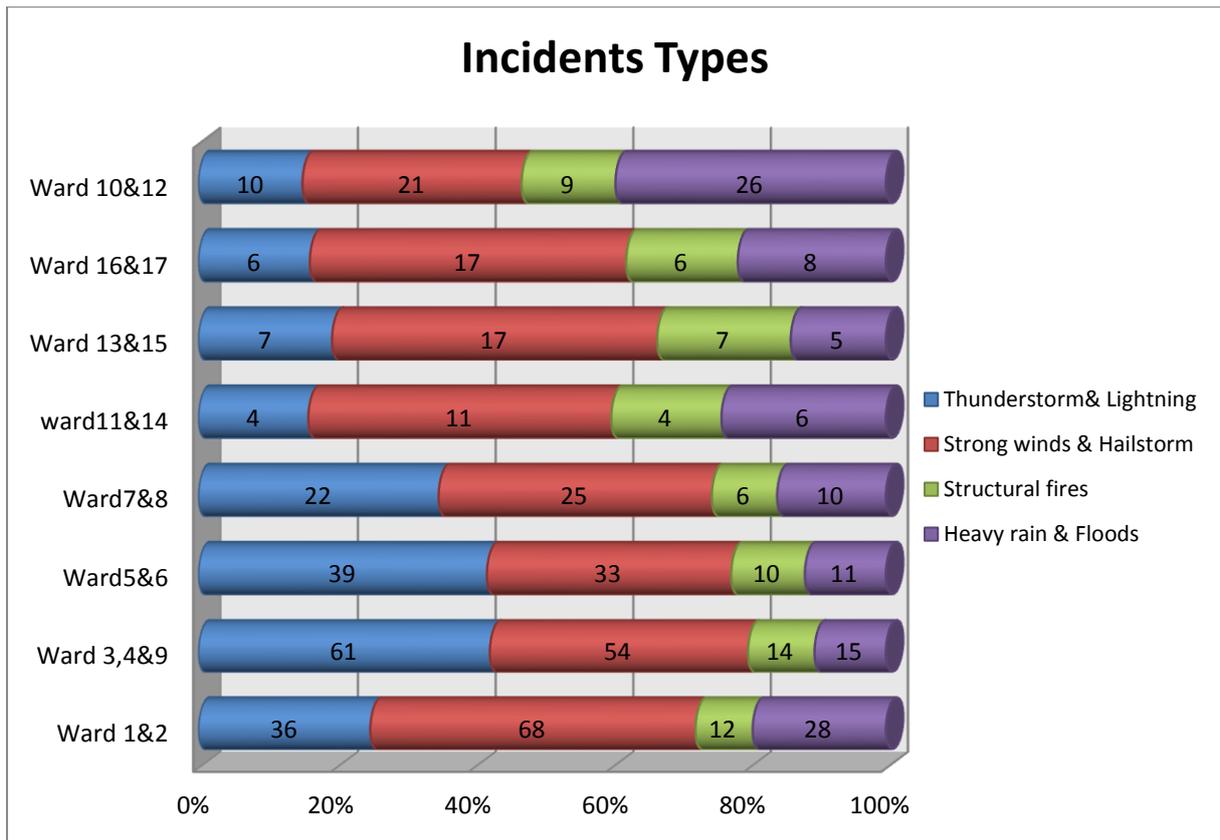
The Nquthu Municipality is situated in the inland region of the province of KwaZulu Natal. The local municipality covers a geographical area of less than 2000 square kilometers. According to the statistics South Africa Community Survey of 2011, Nquthu Municipality has a population of more than 150 000 residents divided unevenly across the 17 electoral wards.

Thunderstorms, lightning strikes, fires, extreme cold, strong winds, and hailstorms are common occurrences in the area of Nquthu. Of the aforementioned incidents lightning strikes, fires, and hailstorms are the most frequently experienced resulting in a high to very high risk profile. Semi-urban areas within the municipality are mainly affected by affected house fires and heavy rains that may lead to flash flooding due to poorly maintained infrastructure and storm water drainage systems.

The existence of poorly constructed structures in deep rural inaccessible areas and along river banks increases the risks to communities residing there, particularly during the summer rainy season and in winter when fires are lit to keep warm. The R68 regional route that traverses the municipal area increases the risk of traffic accidents.

The municipality is prone to the following hazards during summer season:

- Strong winds,
- Thunderstorm and lightning,
- Heavy rain and floods, and
- Structural fires.



**Figure 4: Showing incidents % distribution as per wards and types**

## 12. Conclusion

The primary function of the Nquthu Disaster Coordination Centre is to integrate and co-ordinate disaster risk management issues and responses in the area and to ensure that all other organs of state within the boundaries of the municipal area establish various structures and plans to initiate and co-ordinate actions deemed necessary to prevent untoward occurrences, mitigate the impact of incidents and respond to emergencies that may negatively influence any community.