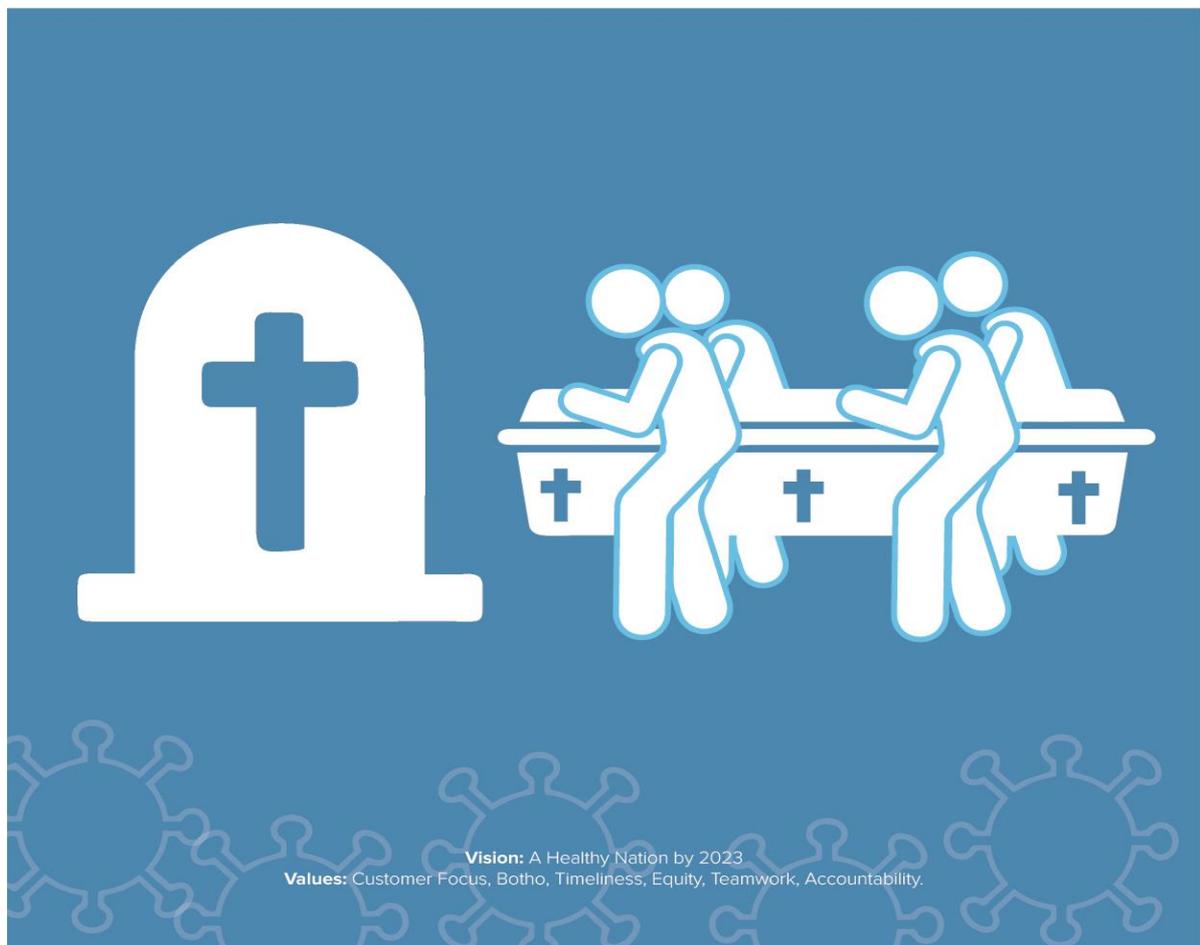




INTERIM IPC GUIDELINES FOR SAFE BURIAL OF COVID-19 DEAD BODIES



FOREWORD

On January 30, 2020, the International Health Regulations Emergency Committee of the World Health Organization (WHO) declared the Severe Acute Respiratory Syndrome due to novel coronavirus (SARS CoV-2) outbreak a 'Public Health Emergency of International Concern' (PHEIC) and the WHO declared the outbreak of Coronavirus Disease (COVID-19) a pandemic on 12th March 2020.

Botswana announced the first positive case in the country on the 30th March and the first death the following day on the 31st March 2020. This document serves to aid health-care facilities and mortuaries, as well as religious leaders and public health authorities in the management of the dead in the context of COVID-19.

Dr. Malebogo Keabonye



Director of Health Services
Ministry of Health and Wellness

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NAME OFFICER	NAME OF FACILITY
Kabelo Gobe Zwinila	Ministry of Health and Wellness
Mosiane Lebalang	Ministry of Health and Wellness
Golebaone Senai	Ministry of Health and Wellness
Malebogo Letswee	Ministry of Health and Wellness
Matshidiso Letsholo	Ministry of Health and Wellness
Mphoentle Melissa Siviya	Ministry of Health and Wellness
Wame Segwagwa	Ministry of Health and Wellness
Gomolemo Maseelane	Ministry of Health and Wellness
Tshepho Selwe	Ministry of Health and Wellness
Penny Makuruetsa	Ministry of Health and Wellness
Victor R. Mosweu	Ministry of Health and Wellness
Poelo Mosweu	Ministry of Health and Wellness
Siwulani Sebetso	Ministry of Health and Wellness
Mopati Kgosimotho	Ministry of Health and Wellness
Farnwell Bojase	Ministry of Health and Wellness
Teto Dinake	Ministry of Health and Wellness
Gorata Manatswa	Ministry of Health and Wellness
Pinkie Mpinda Joseph	Nyangabgwe Hospital
Ngoni Mathumo	Ramotswa DHMT
Taaso Jane	Mahalapye DHMT
Tshepho Badisa	Mahalapye DHMT
Gaone Monyatsi	Boteti DHMT
Kagiso Dipholo	Serowe DHMT
Ntesang Phunyetsi	Mahalapye DHMT
Oageng Baraedi	Greater Phikwe RHMT
Kefilwe Maikano	Lobatse DHMT
Tapudzani Brown	Okavango DHMT
Janet John-Thabuka	Mahalapye DHMT
Umwe Makafiri	Ghanzi DHMT
Elsie S. Monthusi	Mahalapye Sub Council
Wazha Hlabano	Gaborone Private Hospital

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INTRODUCTION

Coronavirus disease (COVID-19) is caused by a type of virus called severe acute respiratory Syndrome coronavirus 2 (SARS-CoV-2). Typical symptoms of coronavirus include fever, shortness of breath and a cough that may progress to severe pneumonia causing breathing difficulties. The first case of COVID-19 was reported in Botswana on the 30th March 2020. The government of Botswana has put in place a number of measures to contain and mitigate the effects of the pandemic.

This Standard Operating Procedure (SOP) document is one of the several guidance documents that have been produced in the country. It is intended for health care workers (HCWs), including managers Environmental Health Officers, Mortuary attendants, Infection Prevention and Control (IPC) committees and focal persons as well as people engaged in COVID-19 response at all levels of services delivery. This includes healthcare facilities providing either inpatient or outpatient services.

The SOPs cover a wide range of measures including actions to minimize the transmission of COVID-19 in all settings; and guidance on actions to take in dealing with suspects or confirmed cases. The content also provides recommendations for non-healthcare workers in the community. It is based on the principles of the national IPC guidelines 2020 and currently available information on COVID-19 locally and internationally.

The SOPs will be updated based on emerging evidence and recommendations.

1. GENERAL INFECTION PREVENTION AND CONTROL MEASURES

COVID-19 preventive and control measures are key in healthcare, mortuaries and community settings. The most effective preventive measures include:

1. Perform hand hygiene;
2. Frequently wash hands with clean water and soap and dry up.
3. Frequently sanitize with an alcohol-based hand rub.
4. Avoid touching eyes, nose and mouth.
5. Practice sneezing and cough etiquette/hygiene.
6. Always wear a face mask.
7. Maintain social distance (a minimum of 1-2 metres).
8. Avoid touching surfaces unnecessarily.

Additional precautions are required by healthcare workers, mortuary attendants and other personnel involved in handling COVID -19 corpses to protect themselves and prevent transmission in the - mortuary and other settings include the following:

1.1 Applying administrative controls:

Ensure the availability of resources for IPC measures such as: appropriate infrastructure (e.g. hand washing facilities), the development of clear organizational IPC policies, and facilitated access to laboratory testing and training of staff. Proper corpse transportation

1.2 Ensuring environmental and engineering controls:

- 1.2.1 Provide adequate space to allow social distance of at least 1 – 2 metres, and ensure the availability of well-ventilated spaces where COVID-19 corpses are handled.
- 1.2.2 Environmental cleaning and disinfection
- 1.2.3 Ensure proper Waste management

1.3 Appropriate PPE use:

- 1.3.1 Select the appropriate PPE for intended purpose and according to the risk assessment
- 1.3.2 Ensure proper donning and doffing.
- 1.3.3 Ensure proper disposal of used PPE.

2. MANAGEMENT OF BODIES OF PERSONS WHO DIED OF COVID-19 OR SUSPECT CASE.

2.1 Purpose

To guide the safe and dignified management of bodies of deceased persons of suspected or confirmed COVID -19 cases and prevent transmission of the virus to healthcare workers, mortuary staff families and the community. Management includes handling, transportation, storage and burial.

The dignity of the dead, their cultural and religious traditions, and families should be respected and protected throughout. Practice hand hygiene at all times; before and after handling the corpse, during and after burial procedure.

2.2 Scope

The guideline applies to all persons who manage the bodies of deceased persons; law enforcement personnel, isolation ward staff, mortuary staff, transporting staff, religious and public health authorities and families.

2.3 Responsibility

All personnel managers and leaders who oversee management of bodies of deceased persons and funeral proceedings are responsible for implementation of this guideline.

2.4 Requirements

The following equipment is required for management of dead bodies from COVID - 19.

- **Packing and transport of the body**
 - Disposable gloves
 - Gown
 - Surgical mask (if there is risk of splashes from body fluids or secretions)
 - Goggles or face shield (if there is risk of splashes from body fluids or secretions)
 - Cleaning materials and waste disposal bags.

- **Mortuary care**

- Disposable gloves
- Surgical mask
- Gown
- Goggles or face shield
- Shrouds/ body wraps, cotton wool and packs for closing body openings.
- Cleaning materials and waste disposal bags.

- **Autopsy**

- Disposable gloves
- Respirator mask (N95 or FFP2)
- Gown
- Goggles or face shield
- Rubber gloves
- Boots or closed work shoes

- **Religious observation – Care of body by family members**

- Disposable gloves
- Gown
- Surgical mask
- Goggles or face shield
- Cleaning materials and waste disposal bags.

3. CORPSE HANDLING

3.1 When A Person Dies At The Facility

The following PPE should be used to handle corpses; gloves (surgical type), N95 or FFP2 or equivalent masks, plastic apron, scrub suits, goggles, gum boots or closed work shoes and gown. Care must be taken on proper donning and doffing of the above PPE

1. Ensure that all body orifices openings are closed.
2. Embalming to be reserved when necessary as discussed with the health personnel.
3. Wrap body in cloth and transfer it as soon as possible to the mortuary area.
4. There is no need to disinfect the body before transfer to the mortuary area.
5. Remove gloves at the end of every procedure or if they become visibly soiled, perform hand hygiene and put on a new set of gloves.
6. Ensure the body is bagged twice before putting it into a coffin.
7. Cleaning of reusable PPE should be conducted in accordance with manufacturer's instructions for all cleaning and disinfection products (e.g. concentration, application method and contact time).

3.2 Handling of Dead Bodies Where The Person Died At Home

1. Immediately inform the relevant authorities (Police, DHMT-Nearest health facility)
2. Wear gloves and mask before preparing the deceased
3. For handling bodies at the community level, cover the body with a sheet before handling, turning or rolling it.
4. Clothing worn to prepare the body should be immediately removed and washed after the procedure.
5. Maximum of two people to prepare the body to reduce exposure as much as possible.
6. Children, older people (>60 years old), and anyone with underlying illnesses (such as respiratory illness, heart disease, diabetes, or compromised immune systems) should not participate in preparation of the corpse
7. Anyone who has assisted in preparing the body should thoroughly wash their hands with soap and water when finished.
8. After preparation of the corpse, it should be handed to the relevant authorities for transportation to the mortuary.

4. TRANSPORTATION

1. Trolleys used for conveying dead bodies must be disinfected.
2. Linen used on trolleys for conveyance should be handled with due care, handlers wear mask, gloves and aprons.
3. Wash infectious linen from COVID-19 care areas at 60 - 90 degrees Celsius temperatures using commercial detergents. To disinfect, soak in 0.05% chlorine-containing disinfectant for at least 30 minutes before washing.
4. Standard transport for funeral parlour can be used for transportation (Hearse).

5. STORAGE

1. Dead bodies can be stored in normal mortuary settings and temperatures.
2. Mortuary trays keeping dead bodies must be cleaned and disinfected.

6. BURIAL BY FAMILY MEMBERS

To guide burial by family members or where it is usual for ill people to die at home, families and traditional burial attendants can be equipped and educated to bury people under supervision. Timely burial during COVID-19 pandemic is essential to avoid potential overwhelming the mortuary mortuary space and the health system and to reduce the possible spread of COVID-19 through mass gatherings as is custom during mourning periods.

1. Where possible the dead body should be buried within 72 hours from the time of death/ body being handed over to family by the health facility
2. Family can take their loved one home the night before the burial from the mortuary:
 - a. Where possible, family should collect the coffin on the day of the funeral.
 - b. Family not allowed to open the coffin while at home
 - c. Practicing cultural / religious final rites that promotes physical contact with the body is prohibited.
3. Body viewing is allowed **ONLY** for immediate family members:
 - a. Arrangement should be made with the mortuary
 - b. Limit viewing of the body to 10 people
 - c. Those attending the viewing should practice social distancing and wear face mask
 - d. No touching or kissing shall be allowed
4. Provision for hand washing must be available during funeral proceedings.
5. A register must be maintained during the funeral proceedings.
6. A maximum number of 50 people should be involved in preparations and burial.
7. After burial clean and disinfect the vehicle as per the SOP for disinfection of ambulances.
8. People with respiratory symptoms should not participate in the funeral proceedings to prevent contamination of the place and further transmission of the disease to others.
9. One team of pall bearers is recommended for the entire funeral proceeding duration. Pall bearers should wear gloves and face masks and appropriately dispose them after use immediately. **WEARING OF FULL PPE INCLUDING COVERALLS AND SHOE COVERS IS NOT RECOMMENDED.**
10. Pall bearers should wash hands with soap and water immediately after the task.
11. People involved in filling the grave with soil must practice social distancing, wear face masks and wash hands after every filling session.
12. After the burial, any other funeral practices that require gatherings should be postponed (e.g. after tears).

7. SUPERVISION

Community leadership through the existing community based structures with support of health (DHMT) and Local Authorities will be responsible for the supervision of safe burial and ensuring adherence to COVID 19 protocols.

8. ENVIRONMENTAL CLEANING IN THE MORTUARY

Human corona viruses can persist for up to 9 days on inanimate surfaces such as metal, glass or plastic. Cleaning environmental surfaces is essential.

1. Keep the mortuary clean and properly ventilated.
2. Surfaces and instruments used for care of the dead body should be made of materials that can be easily cleaned, disinfected and maintained between autopsies.
3. Instruments used during mortuary care, at the funeral home or during the autopsy should be cleaned and disinfected immediately after use, as part of routine procedure.
4. Environmental surfaces, where the body is prepared, should first be cleaned with soap and water and disinfected with 0.1% (1000 ppm) sodium hypochlorite (bleach) or 70% ethanol for at least one minute. A commercially prepared disinfectant solution can also be used according to manufacturer's recommendations.
5. All waste generated must be regarded as infectious waste therefore should be handled and disposed as such.