HEALTH HOLDING

HAFER ALBATIN HEALTH CLUSTER MATERNITY AND CHILDREN HOSPITAL

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1. PURPOSE:

1.1 This policy outlines the guidelines on screening, isolation and transfer of patients with monkeypox.

2. DEFINITONS:

2.1 Monkeypox virus is an enveloped double-stranded DNA virus that belongs to the Orthopoxvirus genus of the Poxviridae family, the same family of the virus that causes smallpox (eradicated in 1980). It should be noted that Mpox is not related to chickenpox, which is caused by the varicella virus,a virus that is not an Orthopoxvirus. Currently, two phylogenetically distinct Clades have been identified: Clade I (formerly known as Central African (Congo Basin)) and Clade II (formerly known as West African Clade).

2.2 Modes of Transmission: occurs when a person comes into contact with the virus through an infected human,contaminated materials, or infected animal.

- 2.2.1 Human-to-human transmission: occurs mainly through physical contact with a person having Mpox symptoms or contact with contaminated surfaces or personal belongings
- 2.2.2 Animal-to-human (zoonotic) transmission: It is less likely in Saudi Arabia, and it may occur through bite or scratch, direct contact or indirect contact with body fluids, or cutaneous or mucosal lesion material of infected animals.

2.3 Signs and Symptoms

- 2.3.1 The incubation period can range from 3 to 21 days. A person is not contagious during this period
- 2.3.2 After the incubation period, the illness typically lasts for 2–4 weeks of infection, and it can be divided into two stages:
  - 2.3.2.1 The Febrile Stage
    - 2.3.2.1.1 Usually, it lasts between 1-3 days.
    - 2.3.2.1.2 Characterized by fever, intense headache, lymphadenopathy, back pain, myalgia, and intense asthenia (lack of energy).
    - 2.3.2.1.3 However, prodromal symptoms can be absent or follow rash onset.
    - 2.3.2.1.4 Lymphadenopathy is a distinctive feature of Mpox compared to other diseases that may initially appear similar (chickenpox, measles, smallpox).
  - 2.3.2.2 The Skin Eruption Stage
    - 2.3.2.2.1 The febrile stage is followed by the skin eruption stage, lasting for 2 to 4 weeks.
    - 2.3.2.2.2 Pattern: scattered or localized to a body site rather than diffuse
    - 2.3.2.2.3 The rash often starts in mucosal areas (e.g., genital, perianal, oral mucosa)and may not develop simultaneously in all body areas.
    - 2.3.2.2.4 The rash evolves through the following stages sequentially: macules (lesions with a flat base), papules (slightly raised firm lesions), vesicles (lesions filled with clear fluid), pustules (lesions filled with yellowish fluid), and crusts, which dry up and fall off.

2.3.2.2.5 A person is considered contagious until after all the crusts on the skin have fallen off and a fresh layer of intact skin has formed underneath.

2.3.2.3 Other symptoms include:

2.3.2.3.1 Genital lesions: included penile edema, paraphimosis, or phimosis

2.3.2.3.2 Proctitis: anorectal pain, tenesmus, and rectal bleeding; associated with visible perianal vesicular, pustular, or ulcerative skin lesions and proctitis

2.3.2.3.3 Oropharyngitis: complicated by tonsillar swelling, abscess, dysphagia

3. POLICY:

3.1 Surveillance Case Definitions of Human Cases of Mpox

3.1.1 A suspected case is defined as: A case that has metclinical criteria

3.1.2 A confirmed case is defined as: A person who meets the suspected case definition with laboratory confirmation of Monkeypox PCR positive OR Isolation of Monkeypoxvirus in culture.

3.1.3 Clinical criteria: Unexplained rash* (macular, papular, vesicular, pustular) AND one or more of the following:

3.1.3.1 high-grade fever (>38.2°C)

3.1.3.2 lymphadenopathy

3.1.3.3 intense headache

3.1.3.4 back pain/myalgia

3.1.3.5 intense asthenia (fatigue and lack of energy)

3.1.3.6 *Unexplained rash is a rash for which the following common causes of acute rash do not explain the clinical picture: drug eruption, food allergy, varicella-zoster, herpes zoster, measles, herpes simplex, bacterial skin infections, primary or secondary syphilis; and any other locally relevant common causes of papular or vesicular rash. In addition, An Unexplained rash includes Unexplained genital, ano-genital, or oral lesion(s) (for example, ulcers, nodules) or proctitis (for example, anorectal pain, bleeding)

3.1.4 Note: All suspected cases should have blood samples drawn for evaluation of HIV and other STIs (including Hep B &C), As per current guidelines.

4. PROCEDURE:

4.1 Reporting of suspected cases

4.1.1 The Mpox is an emerging incident, and suspected cases must be reported by all healthcare facilities using the notification form immediately to:

4.1.1.1 Health Electronic Surveillance Network (HESN).

4.1.1.2 Email the notification form immediately to:

4.1.1.2.1 Communicable diseases program at Clusters and /or MOH branches / offices.

4.1.1.2.2 Coordinators at the MOH branches/offices report to the Communicable Disease Department at MOH.

4.1.1.3 Note: Failure to report reportable infectious diseases by healthcare organizations and/or professionals is punishable by law.

4.2 Infection Prevention and Control

4.2.1 Mpox is believed to be transmitted between humans mainly via physical contact with a person having Mpox symptoms or contact with contaminated surfaces or personal belongings. Transmission through respiratory droplets might occur when face-to-face contact with a person having Mpox symptoms happens.

4.3 Early recognition and source control.

4.3.1 Healthcare workers should be aware of the signs and symptoms of mpox and are encouraged to apply them to hospital clients for early detection and source control.

4.3.2 Use of signage to remind healthcare workers (HCWs) of the signs and symptoms.

4.3.3 Respiratory hygiene is another important measure that should be applied to all HCWs, patients, and visitors.

4.3.4 Whenever possible, patients identified as suspected mpoxcases should be placed in a separate area from other areas of care.

4.3.5 If a patient seeking care is suspected to have mpox, infection prevention and control personnel should be notified immediately

4.4 Precautions for suspected and confirmed patients with Mpox

4.4.1 Strict adherence to standard, contact and droplet precautions should be followed when handling patients suspected or confirmed for Mpox. These include:

4.4.1.1 Proper hand hygiene.

4.4.1.2 Use of Personal Protective Equipment (PPE) in a correct sequence (gowns, masks, goggles if splashes are expected, and gloves).

4.4.1.3 Safe usage and disposal of sharps

4.4.1.4 Aseptic technique.

4.4.1.5 Environmental cleaning and disinfection.

4.4.1.6 Medical waste management.

4.5 Patient placement:

4.5.1 Suspected or confirmed patients with Mpox should isolated in a single room with a dedicated bathroom under contact and droplet precautions.

4.5.2 Avoid performing aerosol-generating procedures inside the room.

4.5.3 Any aerosol-generating procedures (AGPs) should be performed in a single-bed negative pressure room. If the negative pressure room is not available, the case should be placed in a single room with the use of a portable high-efficiency particulate air (HEPA) filter.

4.5.4 Healthcare workers must adhere to fit-tested N95 or PAPR during AGPs in addition to other precautions.

4.5.5 Cohorting of cases should be considered only when there is a significant shortage in single rooms and based on the infection prevention & control recommendations with the following considerations:

4.5.5.1 Cohorting only for confirmed cases.

4.5.5.2 Place the patients with distance between beds.

4.5.5.3 Place physical separations between the beds.

4.5.5.4 Use proper signage indicating the care of cases.

4.5.5.5 Disallow any visitors or caregivers.

4.6 Personal Protective Equipment PPEs:

4.6.1 PPEs should be donned and doffed in correct sequence whenever handing suspected or confirmed cases.

4.6.2 PPEs should be donned prior to entry to the isolation room and doffed prior to exit from the patient room.

4.6.3 In case of AGPs, all PPEs should be donned prior to entry to the negative pressure room or single room with portable HEPA filter and doffed prior to the exit from the patient room except for the high particulate respirator which should be removed after exit or in the ante room if available.

4.6.4 Disposable gowns: use disposable gowns whenever care is provided to patients.

4.6.5 Surgical mask: is a loose-fitting, disposable device that creates a physical barrier between the mouth and nose of the wearer and potential contaminants in the immediate environment.

4.6.6 High-efficiency particulate respirators: use fit-checked sealed masks whenever performing AGP. If the mask doesn't match the size of the healthcare provider or the non-fitted healthcare provider' Powered Air Purifying Respirator (PAPR) should be used.

4.6.7 Goggles and eye protection: whenever splashes are expected, use goggles and eye protection to minimize the risk of exposure.

4.6.8 Gloves: use gloves whenever in contact with the patient, examining and contact with the patient'ssurroundings.

4.7 Transportation of suspected and confirmed monkeypox patients:

4.7.1 Patients' movements should be restricted as much as possible unless indicated.

4.7. Use portable machines such as portable x-rays machines whenever investigations are required. If not available, transport the patient in a designated pathway that avoids crowded areas.

4.7.3 Notify the receiving designation about the case to allow them to take the proper precautions prior to receiving the patient.

4.7.4 Those who are transferring the patient should adhere to isolation precautions and wear proper PPEs. They should also place an isolation transportation card and ask the patient to wear a surgical mask.

4.7.5 Cover any of the patient's exposed skin lesions with a sheet or gown.

4.8 Environmental infection prevention & control measures:

4.8.1 Housekeepers and workers responsible for cleaning and disinfection should wear appropriate PPEs when cleaning rooms housing patients.

4.8.2 In-patient rooms should be cleaned and disinfected at least daily and at the time of patient transfer or discharge or when required.

4.8.3 More frequent cleaning and disinfection may be indicated for high-touch surfaces and following aerosol producing procedures (e.g., tables, hard-backed chairs, doorknobs, light switches, remotes, handles, desks, toilets, sinks)

4.8.4 Standard cleaning and disinfection procedures are adequate if nationally approved disinfecting products are used. Suitable options include hypochlorous acid, chlorine dioxide, sodium chlorite, isopropanol (isopropyl alcohol), quaternary ammonium compounds, or hydrogen peroxide. Ensure that adherence to the manufacturer's instructions for contact time have been
followed to achieve effective disinfection.

4.8.5 Activities such as dry dusting, sweeping, or vacuuming should be avoided. Wet cleaning methods are preferred.

4.8.6 Care should be taken when handing used patient-care equipment in a manner that prevents contamination of skin and clothing.

4.8.7 Ensure that used reusable equipment has been cleaned and reprocessed appropriately.

4.8.8 Linens and clothing should be collected and put in bags inside the room before the cleaning process begins.

4.8.9 Soiled laundry should be gently and promptly contained in an appropriate laundry bag and never be shaken or handled in manner that may disperse infectious material.

4.8.10 Adherence to standard precautions when handling contaminated laundry that generated from mpox cases and minimizing agitation of the contaminated items are considered sufficient to prevent the dispersal of potentially infectious aerosols.

4.8.11 Transportation of food tray to the patients should be delivered from the food server' to the nurse and accordingly the nurse delivers it to the patient.

4.8.12 Generated wastes from patients' room should be handled as infectious waste and discarded accordingly.

4.9 Visitation

4.9.1 Visitors should be avoided when patients have Mpox to minimize the risk of exposure and prevent transmission of the infection. If visits are necessary, they should be limited in number and conducted under the observation of healthcare workers.

4.9.2 Comprehensive education and training about required isolation precautions, as well as infection prevention and control recommendations, should be provided.

4.10 Discontinue Isolation and Transmission Precautions

4.10.1 Confirmed Cases:

410.1.1 All confirmed cases should be isolated in the healthcare facility. Based on bed capacity and if the confirmed case is clinically stable, home isolation may be considered based on the assessment of the public health team and the treating

physician under the supervision of the regional command and control center (Regional CCC)with approval of the central command and control center (Central CCC) and after providing the patient' appropriate education in regard to the isolation measures.

410.1.2 Discontinuity of isolation should be done in consultation with the treating physician.

410.1.3 Patients should remain under isolation and transmission precautions until the resolution of the symptoms and the lesions have crusted, those crusts have separated,and the skin started to form a new layer underneath.

4.10.1 Suspected Cases:

4.10.1.1 All suspected cases must be tested and isolated in the healthcare facility. Based on bed capacity and if the suspected case is clinically stable, home isolation may be considered based on the assessment of the public health team and the treating physician under the supervision of the regional command and control center (Regional CCC) with approval of the central command and control center (Central CCC) and after providing the patient' appropriate education in regard to the isolation measures and until the result becomes available.

4.10.1.2 If clinically unstable, the suspected case must be isolated in a hospital until the result becomes available and he/she will be managed accordingly.

4.10.1.2 If the case is clinically stable, they can be discharged to home if a negative result appears

4.10.1.3 If the result is positive, the suspected case is considered a confirmed case and managed accordingly.

4.11 Laboratory Diagnosis. Nucleic acid testing (NAT) is the primary diagnostic tool for mpox. Clinical and epidemiological data should be considered, and collection of appropriate and sufficient specimens is important. Infection is confirmed by detection of Monkeypox virus using PCR.

4.12 Specimen collection.The best source of specimens for laboratory diagnosis of mpoxinfections is skin lesions. Specimens should be collected by trained staff wearing full PPE, including gowns, gloves, and masks.

4.13 Specimen Type for NAT testing. Lesion material is required for persons with active lesions or rash. Lesion material, scrapings, biopsy tissue (non-formalin fixed), lesion fluid can be collected. Collect specimens from at least 3 lesions and preferably from different sites on the body.

4.14 Collection of specimen and Storage:

4.14.1 Collect the appropriate sample type in a sealed sterile container

4.14.2 Sample each lesion separately. For swabs, use sterile nylon, polyester, or Dacron swabs. Swabs are intended for bacterial preservation and cotton swabs should not be used.

4.14.3 The use of liquid transport media might cause dilution of the specimen. Label the specimen with all the essential information.

4.14.4 If multiple specimens are collected, please indicate the site of the collection for each one. Store refrigerated at (2-8°C) within an hour after collection (for up to 7 days).

4.14.5 Freeze specimens at (-20°C or lower) for longer storage (up to 1 month).

4.15 Collection of specimens for nucleic acid testing. Appropriate equipment for specimen collection:

4.15.1 Personal protective equipment

4.15.2 A small scalpel blade or 25G needle

4.15.3 Leak-proof sealed tubes

4.15.4 Dry swabs

4.15.5 A waterproof sharps container for needles, syringes, scalpels

4.15.6 Waterproof plasters

4.15.7 A sealable plastic specimen bag. Absorbent packaging material and a strong metal outer container plus biohazard tape to seal it and appropriate disinfectant solution to clean the outside before transport to the laboratory.

4.16 Procedure for collection of specimens for nucleic acid testing

4.16.1 Wear appropriate personal protective equipment

4.16.2 Gently deroof a vesicle using a syringe.

4.16.3 Rub the base of the lesion firmly using a dry swab while rotating the swab to absorb fluid from the lesion onto the swab, and to get the cellular material from the lesion base.

4.16.4 Sample at least 3 lesions from different locations on the body or from lesions which differ in appearance.

4.16.5 Place the swab into a sterile, leak-proof container.

4.16.6 Label the tubes with patient information and site of collection, place in the zip-lock plastic specimen bag and seal.

4.16.7 Use waterproof dressing(s) to cover the deroofed lesions.

4.16.8 After specimen collection, all protective materials (gloves, mask, gown, etc.) and all used collection materials must be placed in biohazard bags and autoclaved or incinerated prior to disposal. Use an appropriate sharps container to dispose of Needles and immediately autoclave.

4.17 Referral of samples to Public Health Laboratory:

4.17.1 In HESN Plus you can register the case and request the test Monkeypox (mpox) PCR , select the type of samples, collection sites, and for the distention select Public Health Laboratory (PHL).

4.17.2 Label each specimen container with the patient's ID number, HESN requisition ID, and the date the sample was collected.

4.17.3 Store the samples at 2-8°C and ship to PHL on ice pack.

4.17.4 Lab Results will be reported to HESN Plus

4.17.5 The average Turnaround time (TAT) for the lab results is 48 Hours

4.18 Specimens Packaging and Shipment to the PHL laboratory: All materials transported within and between laboratories should be placed in a secondary container to minimize the potential for breakage or a spill.

4.18.1 Patient specimens from suspected or confirmed cases should be transported as UN3373, "Biological. Substance, Category B. All specimens being transported as UN3373 should have appropriate packaging, labelling and documentation.

4.18.2 Specimens should be put in a sterile, leak-proof container screwed properly then sealed with Para film tape and placed in waterproof secondary container e.g., ziplock bags after which they should be put in a third container. Cooling agent should be outside the secondary container.

4.18.3 Paper sheets should be sealed in waterproof bags and kept separated from the specimens

4.18.4 Samples can be shipped free of charge via SMSA courier to Public Health Laboratory (PHL) as per regulations. Notify the PHL of the dispatch of the specimen and courier or airway bill number as appropriate.

4.18.5 Shipment addressed to:
Public Health Laboratory
Public Health Authority
Al Aarid, Riyadh. phl@pha.gov.sa

4.18.6 The courier service is available for sample transportation and pickup locations throughout the country for the collection of samples from MOH and non-MOH hospitals and other healthcarefacilities. Courier services are provided 24 hours / 7 days a week.

4.19 Public Health Measures at Ports of Entry (PoE) In response to recent outbreaks of Mpox disease in multiple countries, the Kingdom of Saudi Arabia has implemented procedures for all travelers arriving (refer to the public health measures at ports of entry guideline).

4.20 Contact Tracing

4.20.1 Contact tracing is considered one of the most important public health measures to control the spread of communicable diseases. A contact is defined as a person who, in the period beginning with the onset of the source case's first symptoms and ending when all scabs have fallen off, has had one or more of the following exposures with a confirmed case of mpox:

4.20.1.1 Direct skin-to-skin and skin-to-mucosal physical contact (such as touching, hugging, kissing, intimate or sexual contact).

4.20.1.2 Contact with contaminated materials such as clothing or bedding, including material dislodged from bedding or surfaces during laundry handling or cleaning of contaminated rooms.

4.20.1.3 Prolonged face-to-face respiratory exposure in close proximity.

4.20.1.4 Respiratory exposure (i.e., possible inhalation of) or eye mucosal exposure to lesion material (e.g., scabs/crusts) from an infected person.

4.20.2 As soon as a suspected case is identified, contact identification and contact tracing should be initiated, and fill out the List of Patient's Contactsform. Contacts should be notified within 24 hours of identification. Contacts should be monitored at least daily for the onset of signs/symptoms for a period of 21 days from the last contact with a patient in the infectious period. The public health team at the regional health directorate is responsible for listing, tracing, and following up,as well as looking for symptoms of household and other contacts of patients with Mpoxinfection in the community. Regional public health teams should keep all lists of contacts in an excellent professional format.

4.20.3 Note: Healthcare contacts should follow the management of exposed healthcare workers (HCWs) to a Mpox case in healthcare facilities.

4.21 Vaccination

4.21.1 Use of JYNNEOS vaccine(Live, Non-replicating)

In the meantime, mass vaccination for the general population is not recommended for Mpox disease outbreak control. However, it is recommended for a specific group of people with a high risk of Mpoxinfection. In order to implement vaccination strategies, the JYNNEOS vaccine is used in the Kingdom of Saudi Arabia as the following:

4.22 Indications and Usage of Vaccines

4.22.1 Pre-exposure prophylaxis (Prep) – for the certain targeted at-risk group

4.22.1.1 A vaccine is administered to people at high risk of Mpox (for example, laboratory workers who handle monkeypoxcontaminated specimens in laboratories dedicated toMpox diagnosis or healthcare personnel who deal with Mpox cases for performing diagnostic testing). Currently, most clinicians and laboratories are not advised to receive Mpox vaccines as preventative measures because they do not perform the Orthopoxvirus generic test.

4.22.1.2 An individual with a new diagnosis of one or more sexually transmitted illnesses (after consulting the treating physician)

4.22.1.3 An individual with more than one sexual partner.

4.22.2 Post-exposure prophylaxis (PEP) – for close contact with a confirmed case

4.22.2.1 It is appropriate to consider this approach to be the "standard PEP" for Mpox during the current outbreak. In order to prevent Mpox virus infections, vaccination is available following exposure to Mpox. Identifying contacts of confirmed Mpox cases is crucial for offering PEP vaccinesand monitoring early symptoms.

4.22.2.2 For the public: The vaccine is given to anyone who has been exposed to high-risk direct contact of a confirmed case (according to the assessment of public health), including contact with skin lesions, exposure to body fluids, and sexual intercourse.

4.22.2.3 For healthcare workers: The vaccine is given to anyone exposed to medium or high-risk unprotected contact of a confirmed or probable case (according to the assessment of infection control in the facility).

4.22.2.4 The vaccine should be given as soon as possible, and for the best chance of preventing the onset of the disease, the vaccine should be given within four days of exposure.

4.22.2.5 The vaccination may reduce symptoms of the disease when administered within 4 to 14 days of exposure, but it may not prevent it.

4.22.2.6 PEP is a useful tool for controlling Mpox outbreaks and preventing further transmission when used in conjunction with self-isolation and other prevention procedures.

4.22.3 Vaccine Dosage and Administration

4.22.3.1 Dose and Schedule

4.22.3.1.1 Standard JYNNEOS regimen: administer two doses by subcutaneous route (0.5 mL each) 4 weeks apart (28 days).

4.22.3.1.2 The use of fractured dose JYNNEOS regimen by intradermal route is no longer recommended.

4.22.3.2 Preparation and Administration; Allow the frozen vaccine to thaw and reach room temperature before use. Which usually takes 10-15 minutes

4.22.3.2.1 JYNNEOS is a milky, light yellow to pale white colored suspension when thawed.

4.22.3.2.2 Inspect each vail visually for particulate matter and discoloration before administration; if either of these conditions exists, the vaccine should not be administered.

4.22.3.2.3 Swirl the vial gently for at least 30 seconds and clean the vial stopper with a single-use antiseptic swab before each use.

4.22.4 Subcutaneous injection for individuals less than 18 years of age

4.22.4.1 Withdraw a dose of 0.5 mL into a sterile (23–25 gauge, 5/8" needle) syringe for injection.

4.22.4.2 Administer by subcutaneous injection, preferably into the anterolateral thigh for infants less than one year of age or into the upper arm (deltoid) for individuals 1 through 17 years of age.

4.22.5 Vaccine Contraindication and Precautions

4.22.5.1 Contraindications Based on the limited available data on the emergency uses of JYNNEOS, the vaccine should not be given to individuals who are known to have a severe (life-threatening) allergic reaction to a previous dose of JYNNEOS. Vaccine providers must know how to recognize and handle immediate allergic reactions, such as anaphylaxis, when administering the vaccine.

4.22.5.2 Precautions

4.22.5.2.1 History of a severe allergic reaction (e.g., anaphylaxis) to gentamicin, ciprofloxacin, chicken, or egg protein. The vaccine can be given if the benefits outweigh the potential risk of anaphylaxis. Vaccinated individuals should be monitored for 30 minutes post-vaccination.

4.22.5.2.2 If an individual is suffering from a severe acute systemic illness, immunization may be postponed until they have fully recovered.

4.23 Vaccine Special Considerations

4.23.1 Pregnancy: data, suggests the probable safety of the vaccine for the fetus and mother. However, it's not routinely recommended to vaccinate pregnant women unless the potential benefits outweigh the theoretical risk.

4.23.2 Lactations It is not known whether JYNNEOS is excreted in human milk, but this is unlikely as the vaccine virus does not replicate effectively in humans. Individuals who are breastfeeding and have significant exposure to Mpox should therefore be offered vaccination after discussing the risks of Mpox to themselves and the breastfed child.

4.23.3 Individuals with underlying medical conditions Individuals with atopic dermatitis are known to have developed more site-associated reactions and generalized symptoms followingMpox vaccination. Individuals in this group, therefore, need to have a risk assessment before being offered vaccination.

4.23.4 Immunosuppression JYNNEOS is a replication-defective virus and should pose no risk to those who are immunosuppressed. The safety and immunogenicity have been demonstrated in immunocompromised. However, the immune response to the vaccine could be reduced in severely immunosuppressed individuals. Vaccination should proceed using a 0.5mL subcutaneous dosein individuals with immunosuppression.

4.23.5 Vaccine Adverse Reactions In smallpox vaccine-naïve healthy adults who received JYNNEOS subcutaneously, the most common (>10%) solicited injection site reactions were

pain (84.9%), redness (60.8%), swelling (51.6%), induration (45.4%), and itching (43.1%); the most common solicited systemic adverse reactions were muscle pain (42.8%), headache (34.8%), fatigue (30.4%), nausea (17.3%) and chills (10.4%).

4.24 Storageand Handling of Vaccine

4.24.1 If the vaccine is received frozen and requires storage before use, it can be stored in two ways:

4.24.1.1 Freezer storage: between -25°C and -15°C can be stored in the freezer up to the expiration date.

4.24.1.2 Refrigerator storage: between 2°C and 8°C: after 10 minutes, it becomes thawed vaccine and must be used within eight weeksfrom thawing. Do NOT refreeze

4.24.2 If the vaccine is received refrigerated and requires storage before use:

4.24.2.1 Maintain refrigerated between 2C° and 8°C.

4.24.2.2 Refrigerated vaccine is thawed vaccine and must be used within eight weeks from thawing.

4.24.2.3 DO NOT refreeze.

4.24.3 General Consideration.

4.24.3.1 Store in the original packageto protect from light.

4.24.3.2 Do not refreezea vial once it has been thawed.

4.24.3.3 Once thawed, the vaccine may be keptat +2°C to +8°C for up to eight weeks.

4.25 Registration and Reporting of Vaccine Adverse Events

4.25.1 Constant data and updates are being generated regarding the vaccine's efficacy, safety, and usability. Therefore, it's important that all vaccine recipients be registered in the National Vaccination Registry (NVR) to allow for continuous monitoring and direct contact if necessary. All adverse events related to the vaccine should be reported to the Vaccine Adverse Events Reporting System (VAERS) system under the Saudi Food and Drug Administration (SFDA). Refer to the SFDA guidelines for more details.

4.26 Dealing with Dead Bodies

4.26.1 Dead bodies of mpox confirmed or suspected patients could pose a risk of infection transmission.

4.26.2 Personnel who perform post-mortem care of remains should wear PPE as recommended for Standard, and Contact transmission-based Precautions.

4.26.3 Isolation precautions should be continued for the deceased mpox confirmed or suspected case.

4.26.4 Cadaver bags that fulfill MOH-approved specifications should be used for the transport of dead bodies of deceased Mpox patients, and those handling the body at this point should use PPE (for only AGPs; fit-tested seal checked respirator or powered air-purifying respirators (PAPR) [for personnel who cannot wear respirators because of facial hair or other fitlimitations], clean gloves, surgical mask, and isolation gown).

4.26.5 The trolley carrying the body must be disinfected post-transportation.

4.26.6 Only experienced morgue staff deal with the bodies of deceased Mpox patients. The morgue's staff should be well trained and familiar with standard precautions and transmission-based precautions while handling dead bodies,especially hand hygiene and the safe and proper use of PPE.

4.26.7 The morgue's staff should be informed about the infectious status of the deceased, the risk of infection,and appropriate precautions required through the use of the morgue's transportation card attached to the dead body or the bag about the disease and transmission-based precautions required.

4.26.8 Prevents relatives from direct surface contact with the body, such as touching or kissing it. However, it is acceptable to open the body bag for family viewing while wearing PPE (surgical mask, isolation gown,and clean gloves)

4.26.9 Limit the number of morgue's personnel dealing with the dead body to the minimum number required.

4.26.10 All persons performing or attending the body washing and preparation should wear PPE (fit-tested seal checked respirator or powered air-purifying respirators (PAPR) [for personnel who cannot wear respirators because of facial hair or other fitlimitations], isolation gown, and clean gloves, plastic apron and eye protection) and should perform hand hygiene after removal of the gloves and when required.

4.26.11 Body Washing of Mpox confirmed or suspected dead bodies should be done at hospitals and is not allowed to be transferred to home or public washingauthorities.

5. MATERIALS AND EQUIPMENT:

5.1 **Forms and Records**

5.1.1 N/A

5.2 **Materials and Equipment**

5.2.1 N/A

6. RESPONSIBILITIES:

6.1 It is the responsibility of the IPCD to implement this policy.

7. APPENDICES:

7.1 Immediate Notifiable Form for A Suspected Case of Monkeypox in Saudi Arabia.

8. REFERENCES:

8.1 Interim Guidelines for Mpox (Monkeypox) V2.0 August 2024

9. APPROVALS:

	Name	Title	Signature	Date
Prepared by:	Ms. Marilou C. Magallano	IPC Practitioner		November 14, 2024
Prepared by:	Ms. Wadha Mohd Al Shammari	IPC Coordinator		November 14, 2024
Reviewed by:	Ms. Awatif Hamoud Al Harbi	IPC Director		November 17, 2024
Reviewed by:	Mr. Sabah Turayhib Al Harbi	Nursing Director		November 18, 2024
Reviewed by:	Mr. Abdulellah Ayed Al Mutairi	Quality & Patient Safety Director		November 19, 2024
Reviewed by:	Dr. Thamer Naguib	Medical Director		November 21, 2024
Approved by:	Mr. Fahad Hazam Al Shammari	Hospital Director & IPC Committee Chairman		November 24, 2024

7.1 Immediate Notifiable Form for A Suspected Case of Monkeypox in Saudi Arabia.

Notification

Name of who completed the form(Staff Name):

Staff Contact Number:

Date | Email:

At the time of this report, is the case? ☐ Confirmed مؤكدة ☐ Suspected مشتبهة
☐ Case under investigation الدراسة تحت ☐ Not a case مستبعدة

Patient Information

Full Name:	Age:
Identification Number:	Sex: __Male __Female
Nationality	Date of Birth:__
Occupation: HCW? ___Yes __No Specify:_____	Marital Status:
Phone number:_____ Additional number:_____	If a female, pregnancy status? __Positive __Negative __Unknown
Education:	Workplace /Study:

Address: House No._____ Street Name:_____ District_____ City:_____
Province/Region:_____

Clinical Information:

Date of symptoms onset:

Symptoms	Yes	No
Fever >38.2°C		
Headache		
Lymphadenopathy		
back pain		
Myalgia آالم العضالت		
Exhaustion اجهاد		

Symptoms	Yes	Location	No
Sore throat			
Macular Rash (lesions with a flat base)			
PapularRash (slightly raised firm lesions)			
Vesicular Rash (lesions filled with clear fluid)			
Pustules Rash (lesions filled with yellowish fluid)			
Crusts which dry up and fall off.			

Comorbid conditions (check all that apply)

☐ None وجد ال ي ☐ Unknown معروف غرن ☐ Immunocompromised مناعة ضعف ☐ HIV (CD4 count ____)
☐ STIs ☐ Diabetes ☐Cardiac Case ☐ hypertension ☐ Chronic pulmonary disease ☐ Chronic kidney disease ☐ Chronic liver disease ☐ Obesity ☐ Smoking ☐ Others_____

Hospital Information

Is/was the patient hospitalized? __Yes , date of Admission_____ __No
Reason for hospitalized? ___ Isolation __Patient's medical condition

Still admitted in the hospital? __Yes __No	Discharged? __Yes __No	Admitted to ICU? ___Yes __No	Patient died? ___Yes __No

Epidemiological Information

Visiting and Travel History:

Did the patient travel in the 21 days prior to illness onset? __Yes __No __Unknown
If Yes ? Trip 1 date of travel_____ Country:_____ City:_____
Trip 2: date of travel_____ Country:_____ City:_____

During travel, is the case did any activities that contain direct physical contact such as massage sessions, sexual activity, or tattoos? __Yes Date:_____
Type (Place)_____ /// __No

In the 21 days prior to illness onset, did the patient have close contact with someone who travelled outside the Country? __Yes __No __ Unknown
Describe individual (including location):_____

If the patient was tourist, please complete information below :
☐ Airline الجو ☐ Ship البحر ☐ Busباص ☐ Car سيارة ☐ Otherاخرى
Airline Information: Airline Name: _____ Flight Number:_____ Origin:_____
Date of arrival:_____ Date of Departure:_____
Transit Destination:_____
Other Trans Information:_____ Type of transportation:_____ Date of arrival:_____
Port of entry:_____ Origin:_____
Resident Information after arrival:_____
Name of resident@hotel etc..)_____ where:_____
Date of check in:_____ Date check out:_____
Note: (Describe the timeline of contact movement)