

Information for Humanitarian Aid Workers on Viral Haemorrhagic Fever (VHF)

What is Viral Haemorrhagic Fever? (VHF)

VHF is a severe, often fatal, infectious disease of humans and non-human primates (monkeys, gorillas, and chimpanzees) and bats, caused by viruses including the Ebola and Lassa viruses. It was first recognised in 1976 and has caused sporadic outbreaks since in several African countries.

How is VHF spread?

Chains of transmission begin when a person comes into contact with an animal, or animal products that are infected with a VHF-causing virus. Once a person is infected, the virus can be spread from one person to another. The virus is spread through direct contact with the blood and body fluids (urine, faeces, saliva, vomit and semen) of a person, suffering from, or having died with, VHF. A VHF virus can be transmitted through direct contact with items that have been contaminated with the virus, such as soiled clothing, bed linen or used needles. It can be contracted through unprotected sexual contact with patients who have recently recovered from the disease (up to three months). It is also thought to be spread by consumption of infected bushmeat.

How can you recognise VHF?

Between two days and up to 21 days following exposure to the virus the disease may start suddenly with fever, muscle aches, weakness, headache and sore throat. The next stage of the disease may be characterised by vomiting, diarrhoea, rash and failure of the liver and kidneys. Some patients also have heavy internal and external bleeding and multi-organ failure.

Initial spread from a primary case is generally through close contact, whether by direct contact with blood and body fluids or following indirect contact with environments or items contaminated with such fluids (such as clothing, bed sheets, discarded sharps). Burial ceremonies in which mourners have direct contact with the body of the deceased person can also play a role in the transmission of VHF.

People who have close contact with a person infected with the virus, or someone who handles clinical samples from patients are at risk. This includes hospital staff, family members and laboratory workers, all of whom will be at risk if they do not use proper barrier nursing techniques. These precautions include wearing protective gowns, gloves, and masks, in addition to wearing eye protection (e.g. eye glasses) or a face shield.

What is the risk of VHF?

For visitors to or residents in affected areas, the risk of infection in the community is considered very low if the following **GENERAL** precautions are strictly followed:

- Avoiding contact with symptomatic patients and/or their bodily fluids;
- Avoiding contact with corpses and/or bodily fluids from deceased patients;
- Avoiding contact with wild animals (including monkeys, forest antelopes, rodents and bats), both alive and dead
- Avoiding consumption of 'bush meat'
- Wash hands regularly, using detergents or antiseptics; alcohol hand rub is an effective hand decontaminant **if the hands are free from all visible soiling**. Dilute chlorine solution (0.05% in water) makes a simple but effective bleach cleaner. You must take care with stronger solutions – these should be used for disinfecting contaminated surfaces, on human remains etc.
- Check your travel insurance plan and ensure that medical evacuation is covered in the event of illness.

In addition, generic precautions for travelling in VHF-affected regions can also help prevent VHF infection

- Washing and peeling fruit and vegetables before consumption;
- Strictly practising 'safe sex';
- Avoid habitats which might be populated by bats such as caves, isolated shelters, or mining sites.
- Make your home as unattractive to rodents as possible. Keep food in sealed containers and dispose of refuse in a timely manner.

What steps/precautions do I need to do before travelling to an affected area?

Before you travel to an affected area to undertake humanitarian assistance work, you should ensure that you have taken certain basic precautions:

- Make sure you have all the information you need (about the virus, symptoms, transmission, prevention, etc.) including the VHF vaccine policy of your organisation. Undertake pre-deployment training, including practical use of PPE.
- You should obtain all your necessary personal protective equipment (PPE) from your organisation; check with your organisation what will be available. A personal supply of surgical masks and disposable gloves may also be useful, but this should be discussed with your organisation.
- You must ensure that you have received appropriate training in how to protect yourself against infection before you travel. **Be aware that VHF outbreaks put severe strain on local health systems. This may have serious implications for the availability of even basic (non-VHF) medical care in affected areas.** If you become infected with a VHF virus while in a remote part of one of the affected countries, getting to a hospital for treatment may be

extremely difficult. In hospital, obtaining basic health care may be challenging; and getting back to Ireland may not be possible (see below).

- Discuss with your organisation what you should bring with you such as basic travel health kit (basic first aid essentials such as sunscreen, insect repellent containing DEET, painkillers, anti-diarrhoea tablets, a thermometer, household disinfectant, and alcohol-based hand rubs for hand hygiene (unless your hands are visibly soiled, then you need to use soap and warm water).
- You should familiarize yourself with your organisation's health and safety policies and arrangements.
- Make sure you have received all necessary travel-related immunisations and medications. Make sure you have access to any personal health information you may need.
 - You must ensure that you have taken your malaria prophylaxis correctly when travelling to a VHF area and you **MUST** ensure that you complete the course as prescribed
- If you have a medical condition requiring therapeutic treatment, check with your specialist/consultant before travelling that you are fit to travel and to take part in humanitarian work. You must ensure that you have a more-than-sufficient supply of your medication to carry you over your period of humanitarian work.
- Obtain the most up-to-date information on the health, social and political situation in the country to which you will travel.
- Make sure that your travel insurance is valid for the country to (and for the purposes for) which you are travelling. Travel to affected areas for the purposes of providing humanitarian aid may require additional cover.
- Give clear information to your family before travelling.
- **Be aware that some international health/medical insurance companies may restrict the availability/operation of new policies for people travelling to VHF-affected areas.**
- Make sure that you are aware of, and have discussed with your organisation, the healthcare resources available in the country to which you are travelling, including availability of vaccination. Your organisation should identify in advance the healthcare institution in- country to which you would report in the event of any non-VHF related illnesses or accidents.
- You should also satisfy yourself that your organisation has adequate medical evacuation/repatriation policies and arrangements in place. It is important to remember that there is a significant global shortage of operators (commercial or otherwise) with the appropriate aircraft and isolation equipment to oversee a medical evacuation where a patient has confirmed or suspected VHF.
- You should be aware that, were you to develop VHF (or if you were to be injured e.g. in a road traffic accident and you were to be admitted to a local hospital and were to come into contact with a patient with VHF), the medical realities and infrastructural difficulties on the ground might make it impossible for you to be returned to Ireland for treatment.

Any consular assistance that the Department of Foreign Affairs and Trade might be in a position to offer will be made on a case by case basis and guided by the medical advice on best and safest care for the patient/case.

Anyone considering the possibility of volunteering in a VHF-affected area should satisfy themselves in advance of travel that:

- The organisation you intend to work with has medical insurance that will continue to be valid in a VHF-affected region;

- The organisation has sufficient medical evacuation contingency planning in place for non-VHF related medical evacuation;
- The organisation has sufficient medical evacuation contingency planning in place in the case that you are involved in a high-risk exposure to VHF or a diagnosis of VHF is confirmed.

While working in the affected country

- Adhere strictly to your organisation's policies and advice on keeping healthy and safe while working and living in the country.
- Ensure that you habitually take the following **SPECIFIC** precautions necessary when carrying out humanitarian/medical aid work that involves contact with patients and their surroundings:
 - Wear appropriate PPE at all times when in contact with ill or dead people
 - Adhere to the core principles of infection control **at all times**
 - Scrupulous, frequent **hand washing** using soap and water (or waterless alcohol-based hand rubs when soap is not available and there is no visible soiling of the hands)
 - Wearing **gloves** at all times when in contact with:
 - patients,
 - their relatives,
 - their body fluids/clinical samples,
 - environments with which the patient has come in contact
 - proper/safe disposal of needles and other equipment
 - adequate sterilisation of non-disposable equipment
 - proper disposal of body fluids and tissues from patients
 - Observe STRICT barrier techniques when in close contact with persons suspected or known to have VHF (see WHO's [Interim Infection Prevention and Control Guidance for Care of Patients with Suspected or Confirmed Filovirus Haemorrhagic Fever in Health-Care Settings, with Focus on VHF](#)).
 - **Crucial barrier techniques** include wearing:
 - protective gowns,
 - gloves,
 - masks and
 - eye protection/face shields,
 - Just as important as these techniques is the **careful removal of these items** after use (contamination accidents are just as likely to happen during removal as when the equipment is being used).
- Look after your general physical and mental health. Take measures to prevent illness from any cause.
 - **Malaria:** It is essential to take malaria prophylaxis. Also use repellents and impregnated bed nets (it is important to remember that there is no strong evidence that air-conditioning protects against biting mosquitoes during sleep).
 - **Gastrointestinal diseases:** Washing hands, hygienic measures for food preparation, drinking filtered water and regular disinfection of toilet facilities.

- **Urinary tract infection:** Sufficient hydration is recommended to prevent urinary tract infections and urinary tract stones.
- **Manage stress;**
 - Participate in briefings and trainings to obtain knowledge and understanding of risks.
 - Make sure you take time off to eat, drink, relax and sleep. Take a minimum one day off each week.
 - Share emotions, difficulties and satisfaction with colleagues, and discuss coping strategies,
 - Maintain contact with friends and family.
- **Health support:** Make sure you know who to talk to and where to go if you have any health problems or worries. If you experience any episode of ill health, you should seek medical advice. You have a professional responsibility to report any episode of ill health to your employing organisation.

What should I do if I think I have been exposed to VHF?

If you think you have been exposed to VHF whilst in the affected area:

- If you do not have any symptoms but think that you have been exposed to VHF (e.g. through a breach/failure in PPE), contact your organisation immediately. They will be able to advise you what to do. You may need to make immediate arrangements to leave the country.
- If you develop symptoms, you should immediately go off duty and seek medical advice without delay, informing the attending doctor that you may have had contact with VHF (you may also be legally required to inform your organisation that you are symptomatic and have sought medical assistance). When travelling to seek medical attention, restrict your contact with other people to an absolute minimum. Avoid all other travel.
- It is important to bear in mind that the symptoms of VHF are nonspecific and a fever will not necessarily be due to VHF. Also bear in mind that even in affected countries, VHF is uncommon; you are much more likely to have acquired another tropical fever, such as malaria or typhoid. These are, however, serious conditions and will need to be treated urgently.

What do I need to do on my return home?

For information on returning home, please see the *Information for Humanitarian Aid Workers returning from areas affected by Viral Haemorrhagic Fever (VHF)* on the HPSC website [here](#).

Is there anything else I should look out for?

Whilst humanitarian aid work can be immensely rewarding, it is also likely to be stressful and emotionally demanding. You will need to recover from your experiences. The level of suffering that you are likely to have encountered while working in one of the affected countries might be beyond anything you had seen so far in your career. This could be extremely distressing for you and you may, on your return, feel the need for support as you recover. This distress, following such a challenging experience is completely natural. On your return home there are a few simple measures that can help you cope:

- Participate in debriefing, medical assessment and other measures provided by your organisation to assist with your return.

- Talk to family, friends and colleagues about your experiences – sharing your feelings is an important part of healing
- Get back into your “normal” routine
- Make sure that you take care of yourself:
 - Relax and socialise (go to the movies, go out with friends for a meal/coffee)
 - Look after yourself physically, don't overwork, get plenty of exercise, fresh air and sleep
 - Do not relax using alcohol – the odd drink is fine, but do not deal with any stressful feelings by medicating yourself with alcohol – there are much healthier ways to unwind
 - If you are having trouble sleeping, do not take sleeping tablets – try to promote your sleep with natural methods such as exercise during the day and gentle relaxation in the evening
- If you find your experiences while away and the subsequent memories are causing you to struggle – seek help early. Discuss your feelings and concerns with your supervisor and with your humanitarian organisation.
- Make sure you check the [HPSC VHF website](#) for the latest information on the outbreak.