

Vaccine-derived poliovirus 1 outbreak in Papua New Guinea

– Information for NSW Specialists



Health

1. There is an ongoing **outbreak of vaccine-derived poliovirus infection in Papua New Guinea (PNG)**
2. **Consider polio** in patients with acute flaccid paralysis or febrile illness **AND** history of travel to or contact with persons from PNG within 21 days of onset
3. **Collect and test adequate stool and other relevant specimens**
4. **Isolate suspected cases** and use contact precautions.

Current Situation

- To date there have been 18 confirmed cases of vaccine derived poliovirus 1 (cVDPV1) reported by PNG this year.
- One death due to polio has been reported in a child.
- Cases have occurred in a number of provinces, as well as Port Moresby.
- VDPV1 has been detected in environmental samples collected in Port Moresby.
- A national response in PNG, including vaccination campaigns, is underway.

Risk among travellers to and from PNG

People entering Australia from PNG are required by the Department of Home Affairs to provide evidence of having received a vaccine in the past 12 months, if they have spent more than 28 days in PNG. Travellers to PNG should ensure they are fully vaccinated against polio prior to departure.

The risk of acquiring the infection in PNG is **high** for people who are not immune. There is a risk that people visiting, or returning to Australia from PNG could be infected with polio, if they were not immune prior to spending time there.

Consider polio in patients who present with:

- Acute flaccid paralysis **OR**
- Symptoms consistent with abortive poliomyelitis (fever, headache, sore throat, listlessness, anorexia, vomiting, abdominal pain) or non-paralytic poliomyelitis (also displaying meningeal irritation) **OR**
- Febrile illness **AND**
- History of travel to, or contact with persons from PNG in the 21 days prior to onset

Notify public health (1300 066 055) immediately on suspicion of poliomyelitis. Do not wait for test results.

Test patients:

- Collect two stool specimens 24-48 hours apart, and a throat swab or nasopharyngeal aspirate (if lumbar puncture is performed CSF should also be sent for testing).
- Consult with your local laboratory and infectious disease physician or microbiologist regarding testing.
- Stool specimens should be collected from all cases of acute flaccid paralysis in children **irrespective of the provisional diagnosis** in order to exclude polio as the cause.

Infection control:

- Isolate suspected and confirmed cases with contact precautions and exclusive toilet access.
- Discard faeces directly into the sewer without preliminary disinfection; however disposable nappies should be discarded in clinical waste.
- Terminally disinfect all other potentially contaminated items.
- Ensure that patients, parents, and carers are educated on hand hygiene following contact with faeces.
- Check the vaccination status of staff and others caring for patients with polio. Do not assume that health care workers are immune. All staff and carers need to be adequately immunised against polio.
- Isolate confirmed cases until two stool samples, 7 days apart, are shown to be negative.

Further Information:

For detailed local clinical and laboratory advice see www.health.nsw.gov.au/Infectious/

For information on the outbreak and other WHO work in PNG see www.wpro.who.int/papuanewguinea/