# Public Health Physician interview questions

careertips.com.au: common questions and what they're really testing

## What to expect

Public health physician interviews are usually panel based and lean heavily on scenarios, because the panel wants to see how you think when the evidence is incomplete and the clock is running. Expect to be tested on outbreak response, analytical judgement and how you handle advice that is technically sound but politically uncomfortable.

- **Outbreak and incident scenarios:** A cluster or emerging threat is described and you are asked to walk through your response, often with an incomplete picture and time pressure built in.
- **Technical and analytical:** Questions about surveillance methods, study design, statistical interpretation and how you separate a real signal from a reporting artefact.
- **Policy and advisory judgement:** Questions about screening programs, prevention investment and how you form a recommendation when the evidence is mixed and the trade offs are real.
- **Behavioural and teamwork:** Past examples of leading under pressure, managing disagreement with senior clinicians or executives, and working across agencies.
- **Stakeholder communication:** How you explain uncertainty to ministers, health service executives and affected communities without overstating what you know.
- **Credentialing and motivation:** Questions on your specialist training pathway, registration and why you chose population health over ongoing clinical practice.

A typical panel has three or four people, usually chaired by a senior public health physician, with a health service executive or manager and sometimes a clinical or community representative. The session often opens with credentialing and motivation questions, moves into one or two outbreak or policy scenarios, then behavioural questions about teamwork and leadership, and closes with your questions. Some processes include a short written exercise or a data interpretation task beforehand, and credentialing and registration checks are handled separately from the interview itself.

## 1. A regional hospital notifies a cluster of unexplained gastrointestinal illness over a long weekend. Walk us through how you would handle the first 72 hours.

**Why they ask**

This is the core of the role, and the panel wants to hear a structured incident response rather than a list of tests to order.

**How to structure your answer**

Use a chronological walk-through: confirm the signal, stand up the response, define cases, run descriptive analysis, act on the most plausible hypothesis, communicate, and state what you would have in place at 72 hours.

**Example answer**

*“First I would confirm the notification with the hospital and the laboratory, because a cluster can dissolve once you check case definitions and testing dates. I would stand up an incident management team under the local public health unit, appoint one lead for the epidemiological investigation and another for environmental follow up, and start a line list. From there I would draft a working case definition covering time, place and person and collect the details for every case: onset date, symptoms, food and water exposures, travel and any shared venues. With the line list in place I would run a descriptive analysis by date, place and person to see whether the pattern looks point source or ongoing, which shapes whether we go straight to a cohort study or start with environmental sampling. Control measures go in as soon as there is a plausible hypothesis, not after the analysis is finished,*

*so that might mean a food business exclusion, a boil water notice or targeted advice to clinicians. I would keep the hospital and the local council informed daily, prepare a short situation report, and set a clear trigger for escalating to the state communicable disease branch. At 72 hours I would want a case definition we trust, a hypothesis we are testing, control measures in place and a written record of decisions so the debrief is straightforward."*

## 2. How do you work out whether a rise in notifications for a notifiable disease is a genuine increase or a reporting artefact?

**Why they ask**

Surveillance interpretation is the daily analytical work of the role, and a wrong call leads either to a missed outbreak or an unnecessary public response.

**How to structure your answer**

Use an analytical reasoning structure: state the competing explanations, work through data quality and testing behaviour, then statistical methods, then how you would communicate the residual uncertainty.

**Example answer**

*"My first question is always whether the surveillance system changed, not whether the disease changed. I would check for a change in testing guidance, a new laboratory assay, a shift in who gets tested or a reporting backlog, because any of those can produce a step up in notifications with no change in underlying incidence. I would look at the data by age, sex, region and reporting source, and check whether the rise sits in one laboratory or one local health district, which points to a reporting effect rather than a real increase. If reporting looks stable, I would move to the epidemiology: whether cases are presenting with severe outcomes, whether the rise is in a group we would expect, and whether it matches what clinicians and emergency departments are seeing. Statistically I would test whether the change exceeds normal variation using a model that accounts for seasonality and trend, and compare it against sentinel systems and hospital admissions. Then I would write it up with the uncertainty stated plainly and recommend a proportionate response in the meantime."*

## 3. Tell us about a time you gave advice that a senior stakeholder did not want to hear.

**Why they ask**

Public health advice often conflicts with operational, political or commercial priorities, and the panel is testing whether you can hold a position without becoming adversarial.

**How to structure your answer**

Use STAR: describe the situation and the advice, the resistance you met, what you actually did, and what changed as a result.

**Example answer**

*"We were preparing for a respiratory season and I was asked to sign off on a plan that prioritised intensive care capacity and left community testing largely untouched. I looked at our surveillance and admissions data and thought the plan would miss cases in residential aged care and among people who could not easily get to a testing clinic. I asked for a short meeting with the executive sponsor, brought a one page summary of the local data and a set of options rather than a flat refusal. I explained what the plan did well, then set out what I thought we would miss and what it would take to add outreach testing in three aged care facilities. The sponsor was not persuaded at first, so I offered to run it as a pilot with clear measures and report back within a month. We ran it, the pilot picked up cases early enough to start antiviral treatment and cohort residents, and the approach was written into the next season's plan. What I took from it is that you get further with data and a workable alternative than with simply being right."*

## 4. You are asked to advise on introducing a new population screening program. How do you approach that decision?

**Why they ask**

Screening decisions affect whole populations and carry real harms, so panels listen for whether you can weigh benefits against overdiagnosis and inequity rather than advocating on enthusiasm.

**How to structure your answer**

Use a criteria-based judgement structure: frame the decision and who owns it, apply the national screening criteria, weigh harms and equity, then give a defensible recommendation with conditions.

**Example answer**

*“I would start by being clear about what decision is actually being made and who owns it. Then I would work through the national screening criteria: whether the condition is an important health problem, whether there is a recognisable latent stage, whether there is an accepted test and agreed treatment, and whether the evidence shows screening does more good than harm at population level. I would look hard at the harms, because overdiagnosis and false positives are real and they fall unevenly across the community. I would want to know whether the program would reach the people at highest risk or mostly reach people who are already well served, since that determines whether it narrows or widens inequity. I would be explicit about the evidence base, whether we have local data or are extrapolating from overseas trials, and what we would need to monitor. If the case is not made I would say so and suggest an alternative such as targeted case finding or a pilot with proper evaluation. If it is made, I would recommend a staged rollout with defined measures, an equity lens and a planned review point.”*

## 5. How would you explain a finding with wide confidence intervals to a minister's office, and then to an affected community group?

**Why they ask**

Communication is where public health advice either lands or fails, and the two audiences need very different framing of the same evidence.

**How to structure your answer**

Use an audience-first structure: identify the decision each audience has to make, lead with what is known, be explicit about uncertainty, then offer a recommended action.

**Example answer**

*“I start with the decision the audience has to make, because a minister's office and a community group are rarely asking the same question. For the minister's office I would lead with what we know, state the uncertainty in plain terms, and then give a recommended action with the trade offs attached. I would say something like: the estimate points to a moderate increase, the range around it is wide enough that we should not overreact, and the proportionate step this week is to strengthen surveillance in the affected area and reassess in two weeks. For a community group I would drop the modelling language, explain what the finding means for them and their families, and be honest that we do not have all the answers yet. I would also say what we are doing next and when we will come back to them, because people can live with uncertainty if they can see the process. The rule I follow is never to hide behind the numbers, and never to overstate certainty to make a message land better.”*

## 6. What drew you from clinical practice into population health, and how does your training fit the specialist pathway?

**Why they ask**

Panels want to know you understand the specialist pathway and that your move to population health is a settled choice rather than a fallback from clinical work.

**How to structure your answer**

Use a direct answer plus evidence plus forward-looking structure: give the honest reason, show the training and supervised experience behind it, then connect it to the work of this team.

**Example answer**

*“I moved into public health after several years of clinical work because I kept seeing the same presentations, and the fixes were almost always upstream: housing, access, vaccination and screening. The individual consultations were valuable, but I wanted to work on the conditions that produce the pattern. I completed a Master of Public Health while working clinically, then entered specialist training through the Australasian Faculty of Public Health Medicine, which gave me supervised experience across communicable disease control, environmental health and health policy. What I bring to a role like this is a clinician's ability to read a case and a public health physician's habit of asking whether the system is measuring the right thing. I am particularly interested in the prevention and health protection work this team does across a large and diverse region, because that sits exactly where surveillance, policy and service delivery meet.”*