## **TUBERCULOSIS**

#### Disease name

## Disease

Tick the appropriate category:

### Tuberculosis disease - new case

Active TB in a person who has never been treated for TB before or has active disease from a new genotype.

#### Tuberculosis disease - relapse or reactivation

Active TB in a person whose tuberculosis has been non-infectious or quiescent following full, partial, or no treatment.

#### Latent tuberculosis infection<sup>1</sup>

A person with both of the following:

 positive Mantoux test, Mantoux conversion or positive interferongamma release assay (IGRA)

#### AND

no evidence of active disease.

# Tuberculosis infection – old disease on preventive treatment<sup>1</sup>

No active disease or latent infection.

## **Basis of diagnosis**

#### Laboratory criteria

Laboratory criteria

Indicate whether the case meets the laboratory criteria.

Laboratory confirmation status

Indicate the status of laboratory confirmation. If the laboratory test results were positive tick the 'Yes' option and specify the site from which the specimen was taken, if negative tick the 'No' option. If the results of the laboratory test are not yet available, tick 'Awaiting results'. If any of the laboratory tests were not carried out, tick 'Not Done'.

## Confirmation method

Demonstration of Mycobacterium tuberculosis complex nucleic acid:

- This **does not** include positive DNA 'probe'. (This identifies nucleic acid from a mycobacterial culture and therefore by definition confirmation has already been made).
- It does include a positive nucleic acid amplification test (NAAT), where
  the clinician accepts this as presumptive evidence of TB. In body fluids,
  positive NAATs do not show whether the organisms are dead or alive.



<sup>&</sup>lt;sup>1</sup>There is no legal obligation to notify these cases, patient consent is required for notification.

#### Mantoux status

Mantoux tests Indicate v

Indicate whether Mantoux tests were carried out. If not known or unavailable, then tick the 'Unknown' box. If 'Yes', provide the date and induration measurement for each test. If the results are not yet available, tick 'Awaiting results'.

Tick the most appropriate result from the Mantoux tests. Refer to the

current edition of the Guidelines for tuberculosis control in New Zealand for the definition of Mantoux status. (The cutting point may be 5, 10 or

15mm, depending on an individual's circumstances.)

#### **IGRA** status

IGRA testing

Indicate whether an IGRA test was carried out. If not known or unavailable, then tick the 'Unknown' box. If 'Yes', specify whether the result was positive, negative or indeterminate. If the results are not yet available, tick 'Awaiting results'.

#### Other criteria

Treatment for presumptive TB

Full anti-tuberculous treatment has been started by the clinician.

Interim treatment for presumptive tuberculosis infection in children < 5 years of age

The child has been placed on interim treatment for possible latent TB

infection pending further testing.

## Previous history of tuberculosis (relapses and reactivations only)

Date of first tuberculosis

diagnosis

Give the date (day, month and year if available) that tuberculosis was first diagnosed and the <u>name of the doctor</u> who made the diagnosis if known.

If the date is unknown, tick the 'Unknown' box.

Place where diagnosis made Specify the city and cour

Specify the city and country where the initial diagnosis was made.

Laboratory confirmation Indicate whether the initial diagnosis was confirmed by laboratory testing.

If not known or unavailable, then tick the 'Unknown' box.

Was the case treated? Indicate whether the case was treated for tuberculosis at the time of

initial diagnosis. If not known or unavailable, then tick the 'Unknown' box.

If 'Yes', specify the duration of treatment in months.

## Additional clinical details

Site of disease, pulmonary (TB disease cases only)

Indicate whether the case had pulmonary disease.

Note that pleural disease or mediastinal/hilar adenopathy without parenchymal lung involvement should be classified as extrapulmonary.

If 'Yes', complete the radiology section and indicate whether the chest X-ray suggests active disease, TB of uncertain activity or was normal. If an X-ray has not been done, indicate so. Otherwise tick the 'Unknown' box.

Indicate whether there is evidence of cavity formation. If not known or unavailable, then tick the 'Unknown' box.



Site of disease, extrapulmonary (TB disease cases only) Indicate whether the case had extrapulmonary disease. If 'Yes', tick all of the sites that apply. If an affected site is not covered tick 'Other site' and specify the site(s) in the adjacent box.

Please note there is a difference between disseminated TB and Miliary TB. Disseminated TB means TB involving multiple body systems. Miliary TB is a specific type of disseminated TB where the case has multiple, small, uniformly sized nodules of active TB throughout the body.

How was case/infection discovered?

Indicate whether the person was identified by contact tracing, attending a practitioner (e.g. GP) with symptoms, screening of immigrants/refugees, or 'Other' method. If 'Other' please give details. Otherwise tick the 'Unknown' box.

## Additional laboratory details

Mycobacterial species (Culture positive TB disease cases only) Indicate whether the organism was *Mycobacterium tuberculosis*, *Mycobacterium bovis* or another species. If 'Other', specify the species.

Susceptibility testing results (Culture positive TB disease cases only)

For the antibiotics listed, tick either 'Susceptible' or 'Resistant' according to results received from antibiotic susceptibility testing. **Please note** the two different Isoniazid concentrations and take care that the correct result is assigned to the correct concentration.

If testing was carried out for other antibiotics which are not listed, specify the antibiotic(s) and indicate whether the result was 'Susceptible' or 'Resistant'.

Specimen details and molecular typing

These fields will eventually be automatically completed from the laboratory results. In the meantime, if there are WGS results select the check box and enter the lineage, sublineage and cluster ID as per the laboratory result.

### Classification

Classification (only available in EpiSurv for active TB disease cases)

**Under investigation** - a case which has been notified but information is not yet available to classify it as probable or confirmed.

**Probable – presumptive** (without laboratory confirmation).

There is no laboratory confirmation but

(a) there are symptoms or signs compatible with active tuberculosis, such as compatible radiology or clinical evidence of current disease,  $\underline{\sf AND}$ 

(b) full anti-tuberculous treatment has been started by a clinician.



**Confirmed** – (with laboratory confirmation)

A clinically compatible illness that is laboratory confirmed by one of the following:

- positive culture for *M. tuberculosis* complex
- positive microscopic examination for acid-fast bacilli when a culture has not been or cannot be obtained
- demonstration of *M. tuberculosis* complex nucleic acid directly from specimens
- histology strongly suggestive of tuberculosis when there is a strong clinical probability.

If you are ticking 'Confirmed' then one of the categories under 'Laboratory Criteria' should be ticked 'Yes'.

**Not a case** – a case that has been investigated, and subsequently found not to meet the case definition

### **Risk factors**

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Has HIV test been performed	Indicate whether the person has been tested for HIV or not. Otherwise, tick 'Unknown'.
Other immunosuppressive illness	Indicate whether the person has an immunosuppressive illness such as chronic renal failure, alcoholism, diabetes or gastrectomy. If not known or unavailable, then tick the 'Unknown' box. If 'Yes' specify the illness(es).
Immunosuppressive medication	Indicate whether the person is taking immunosuppressive medication. If not known or unavailable, then tick the 'Unknown' box
Contact with a confirmed case of tuberculosis	Indicate whether the person had contact with a confirmed case of tuberculosis. If 'Yes', specify the nature of the contact and whether the contact occurred in New Zealand. If contact occurred in New Zealand give the name of the confirmed case. If not known or unavailable, then tick the 'Unknown' box.
Born outside New Zealand	Indicate whether the person was born in a country other than New Zealand. If not known or unavailable, then tick the 'Unknown' box. If 'Yes', specify the country of birth and date (or approximate date) of arrival in New Zealand. If unknown tick the 'date unknown' option
Current/recent residence in a household with person(s) born outside NZ	Indicate whether the person has resided recently in a household with person(s) not born in New Zealand. If 'Yes', specify the main country or countries of birth of such person(s) in the household. If not known or unavailable, then tick the 'Unknown' box.
Exposure in a health care setting	Indicate whether the person has been exposed to tuberculosis in a health care setting. If 'Yes', specify the type of exposure. If not known or unavailable, then tick the 'Unknown' box.
Current/recent residence in an institution	Indicate whether person is currently residing or has recently resided in an institution such as a prison, psychiatric hospital, rest home, or reform centre. If 'Yes', specify the details. If not known or unavailable, then tick the 'Unknown' box.



Exposure to animals or animal products in work or recreation	Indicate whether the case has had any contact with cattle, deer, possums, or other wild animals or animal products, (e.g., leather, hide, fur), in the course of their work or recreation. If 'Yes', specify the exposure. If not known or unavailable, then tick the 'Unknown' box.
Other risk factor for tuberculosis	Specify any other risk factors under surveillance for tuberculosis.

## **Protective factors**

source of the information - BCG Scar, patient/caregiver recall or documented evidence.	vaccine time be 'Unkno source	• • • • • • •
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# Management

Case management	
Case under specialist care	Indicate whether the case is under specialist care. If 'Yes', give the name of the specialist. If not known or unavailable, then tick the 'Unknown' box.
Receipt of treatment	Indicate whether the case received treatment, treatment was declined by the case, or treatment was not appropriate. If not known or unavailable the tick the 'Unknown' box.
Date treatment started	If 'Yes' to treatment, indicate the date treatment started. If not known or unavailable, then tick the 'Unknown' box.
Date treatment ended in NZ	If 'Yes' to treatment, indicate the date treatment ended in NZ. If not known or unavailable, then tick the 'Unknown' box. Complete this even if you believe the case is still on treatment outside NZ.
Treatment interrupted	Indicate whether the case's treatment was known to be interrupted (two or more consecutive months of missed treatment). If not known or unavailable, then tick the 'Unknown' box.
Reasons for ending the treatment	Indicate the main reason for ending the treatment in NZ. If not known or unavailable, then tick the last box 'reason unknown'.
	N.B. This information may not be available when the case is first notified to the Public Health Unit. However, it is the responsibility of the public health officer to complete this field whenever the information becomes available.
DOT received during the intensive phase of treatment	Indicate whether the case received Directly Observed Therapy during the intensive phase (the first two months) of treatment. If not known or unavailable, then tick the 'Unknown' box.
	<b>DOT definition</b> : person trained in DOT observes every dose taken.
DOT received throughout the course of treatment	Indicate whether the case received Directly Observed Therapy throughout treatment. If not known or unavailable, then tick the 'Unknown' box.



## **Contact management**

Contacts at risk of infection (disease only)

For cases of tuberculosis **disease** (new or reactivation), indicate whether there were any contacts at risk of infection. If not known or unavailable, then tick the 'Unknown' box. If 'Yes', specify the number of close and casual contacts identified.

A contact is defined as follows:

A person who has had contact with a confirmed case of active tuberculosis disease.

**Close contact**: members of the same household as the index case (sharing a kitchen and/or bathroom facilities), or who are very close contacts of the case.

Casual contact: all other contacts.

