

A horizontal teal bar on the left side of the page, containing a white circular icon with a smaller teal circle inside.

## Standard for population terms



#### **Crown copyright ©**

This work is licensed under the [Creative Commons Attribution 3.0 New Zealand](#) licence. You are free to copy, distribute, and adapt the work, as long as you attribute the work to Statistics NZ and abide by the other licence terms. Please note you may not use any departmental or governmental emblem, logo, or coat of arms in any way that infringes any provision of the [Flags, Emblems, and Names Protection Act 1981](#). Use the wording 'Statistics New Zealand' in your attribution, not the Statistics NZ logo.

#### **Liability**

While all care and diligence has been used in processing, analysing, and extracting data and information in this publication, Statistics New Zealand gives no warranty it is error free and will not be liable for any loss or damage suffered by the use directly, or indirectly, of the information in this publication.

#### **Citation**

Statistics New Zealand (2014). *Standard for population terms*. Available from [www.stats.govt.nz](http://www.stats.govt.nz).

ISBN 978-0-478-42933-6 (online)

#### **Published in September 2014 by**

Statistics New Zealand  
Tatauranga Aotearoa  
Wellington, New Zealand

#### **Contact**

Statistics New Zealand Information Centre: [info@stats.govt.nz](mailto:info@stats.govt.nz)  
Phone toll-free 0508 525 525  
Phone international +64 4 931 4610  
[www.stats.govt.nz](http://www.stats.govt.nz)



# Contents

|  |           |
|--|-----------|
| <b>Standard for population terms</b> .....                         | <b>4</b>  |
| <b>National population measures and what they include</b> .....    | <b>5</b>  |
| <b>Subnational population measures and what they include</b> ..... | <b>6</b>  |
| <b>Census night population count</b> .....                         | <b>7</b>  |
| Definition .....   | 7         |
| Who is in this count?.....   | 7         |
| Data quality .....   | 7         |
| How to use this term .....   | 8         |
| <b>Census usually resident population count</b> .....              | <b>9</b>  |
| Definition .....   | 9         |
| Who is in this count?.....   | 9         |
| Data quality .....   | 9         |
| How to use this term .....   | 10        |
| <b>Estimated resident population</b> .....                         | <b>11</b> |
| Definition .....   | 11        |
| Who is in this estimate?.....                                      | 11        |
| Data quality .....   | 11        |
| How to use this term .....   | 12        |
| <b>Guidelines for presenting population data</b> .....             | <b>13</b> |
| <b>Related classifications and standards</b> .....                 | <b>14</b> |
| New Zealand.....   | 14        |
| International .....  | 14        |
| <b>Glossary</b> .....  | <b>15</b> |
| <b>References and further reading</b> .....                        | <b>20</b> |
| References.....  | 20        |
| Further reading .....  | 20        |



# Standard for population terms

*Standard for population terms* will help you understand and use Statistics NZ's population measures.

Historically, population data referred to the people **present** in an area at a given time. For most geographic areas, this was similar to the number of people who lived there.

However, as internal and international travel has increased, so has the number of people who are away from their usual residence. There is a need for population data about the people who **usually live** in an area at a given time, as this is often more relevant for many purposes (such as setting electoral boundaries and planning community services).

This document defines and explains the three main population measures Statistics NZ produces:

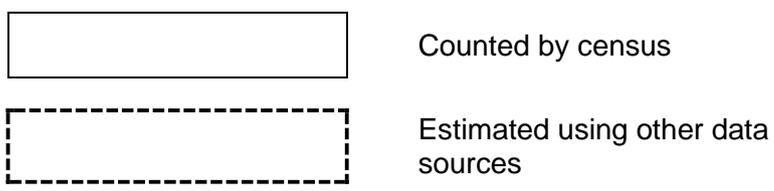
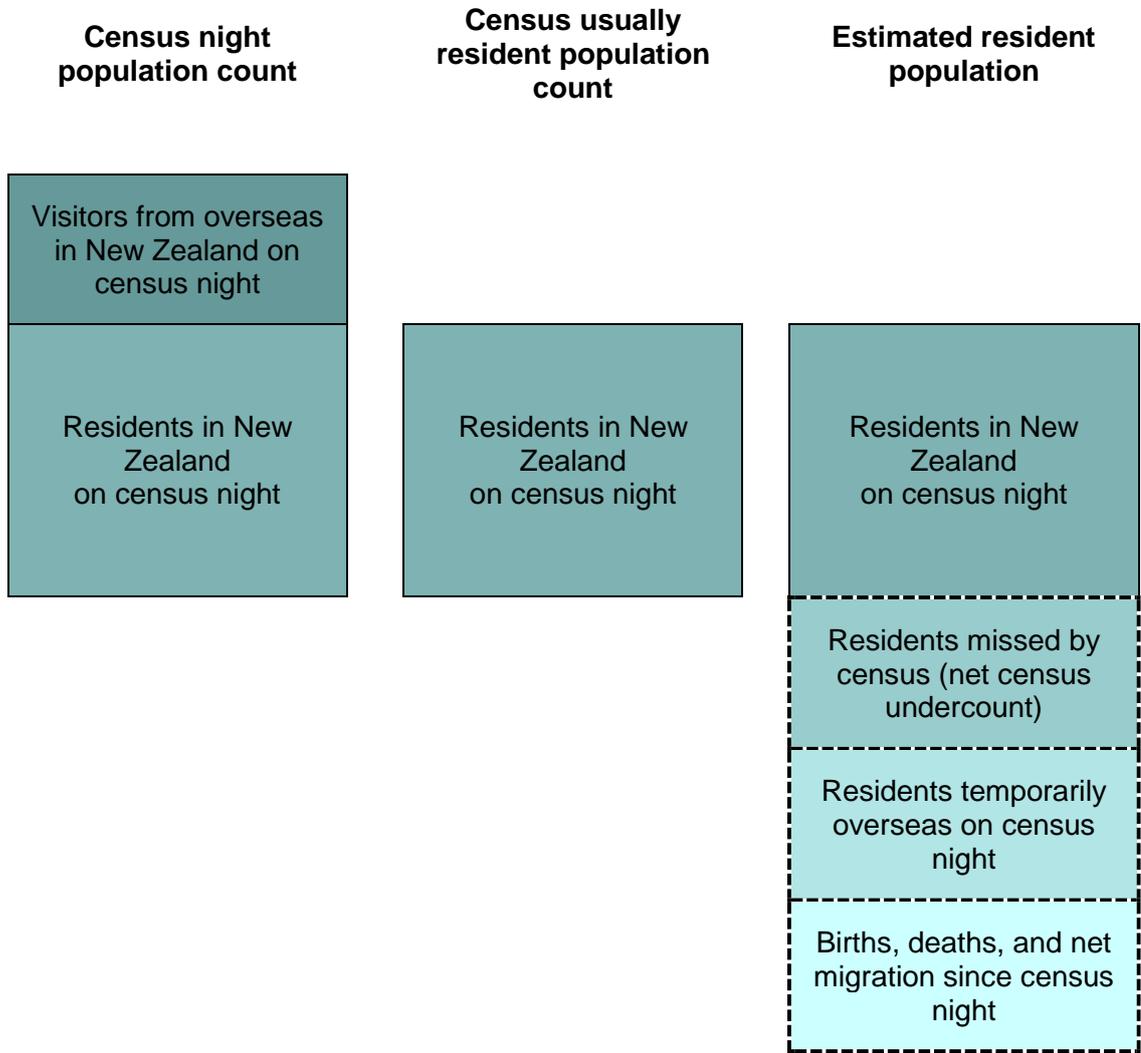
- [Census night population count](#)
- [Census usually resident population count](#)
- [Estimated resident population](#).

**Anyone presenting population data must use the full standard terms for these measures**, so users know which measure has been used. This will prevent confusion when they compare data from different sources. *Standard for population terms* tells you how to use the terms correctly.

## Overview of each population measure

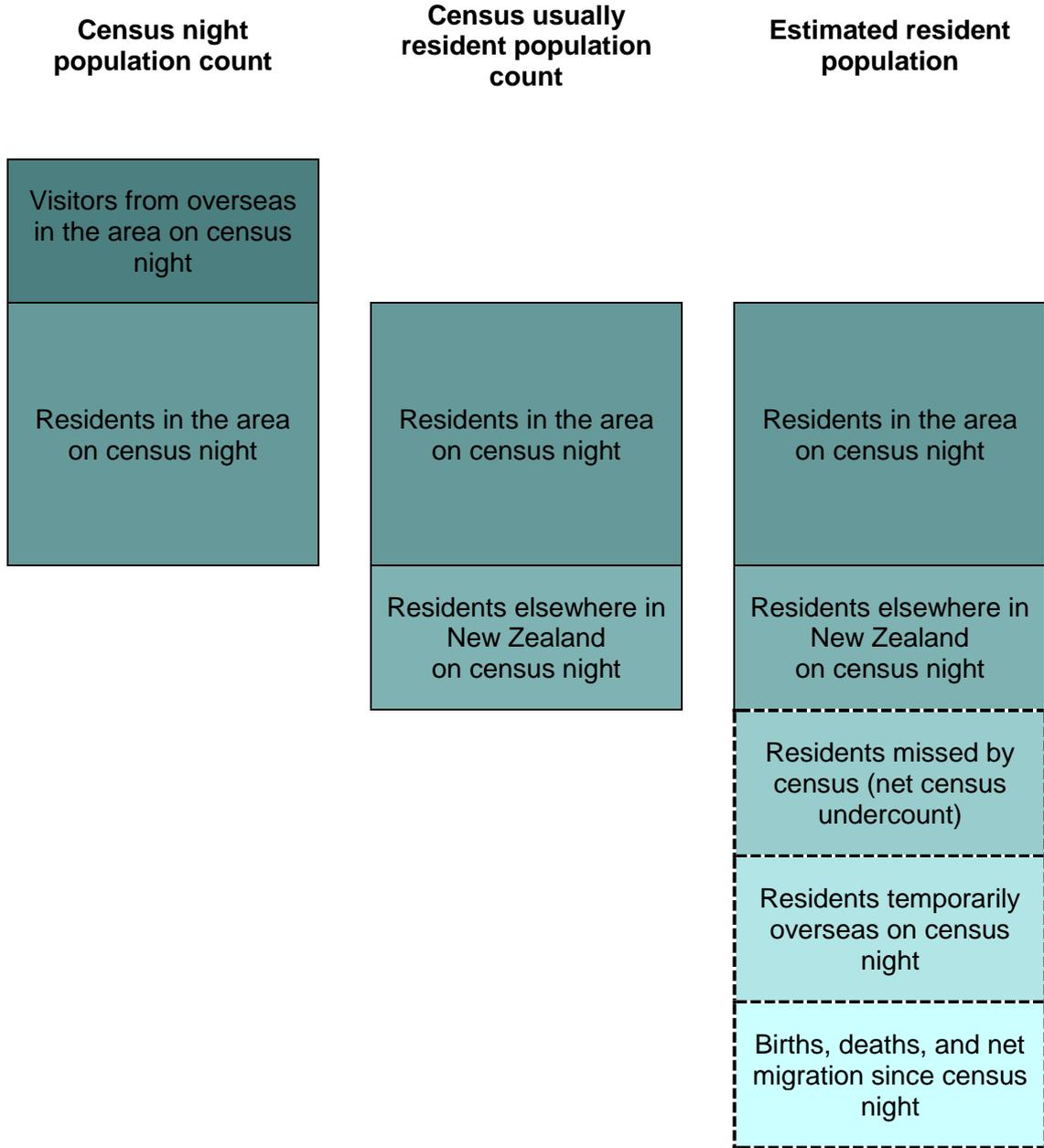
- The **census night population count** of New Zealand is a count of all people enumerated by census, who were present in New Zealand on census night.
- The **census usually resident population count** of New Zealand is a count of all people enumerated by census, who usually live in New Zealand, and were present in New Zealand on census night.
- The **estimated resident population** of New Zealand is an estimate of all people who usually live in New Zealand at a given date.

# National population measures and what they include





# Subnational population measures and what they include



Counted by census



Estimated using other data sources



---

# Census night population count

## Definition

The **census night population count** of New Zealand is a count of all people enumerated by census, who were present in New Zealand on census night.

A person is considered 'present in New Zealand' if on census night, they were:

- on New Zealand soil
- on a vessel in New Zealand waters
- travelling between New Zealand ports.

The census night population count is as at midnight on census night.

## Subnational count

The census night population count **of an area in New Zealand** is a count of all people enumerated by census, who were present in that area on census night.

For example, a Christchurch city resident visiting Wellington city on census night is included in the census night population count of Wellington city.

The terms 'census', 'New Zealand', and 'subnational' are defined in the [glossary](#).

## Who is in this count?

### Included

- Residents in New Zealand.
- Visitors from overseas, including:
  - People in diplomatic residences in New Zealand
  - Foreign military personnel and their families in New Zealand.
- Visitors from elsewhere in New Zealand (**for subnational counts only**).

### Excluded

- Residents temporarily overseas.
- Residents temporarily elsewhere in New Zealand (**for subnational counts only**).

Terms such as 'visitor', 'visitor from overseas', 'resident', and 'resident temporarily overseas' are defined in the [glossary](#).

## Data quality

During the census collection process, we apply strategies to try to count everyone in New Zealand.

If we get sufficient evidence during the collection process that a person exists or a dwelling was occupied, but do not receive a corresponding form, we create a substitute record. We do this during the processing stage.

Inevitably, given the complexity and size of the census, some people in New Zealand on census night are not counted by the census. Apart from creating substitute records (as

described above), we make no adjustment to the census night population count for undercount or overcount.

The terms 'net census undercount' and 'substitute record' are defined in the [glossary](#).

## How to use this term

The wording of the term 'census night population count' clarifies its source as a census count, and differentiates it from the other two population measures.

**Use the full standard term** when presenting data. For example:

- "The census night population count of New Zealand at 5 March 2013 was 4,353,198."

**Do not use shortened terms**, such as 'census night population', because they can be confused with other population measures.



---

# Census usually resident population count

## Definition

The **census usually resident population count** of New Zealand is a count of all people enumerated by census, who usually live in New Zealand, and were present in New Zealand on census night.

A person is considered 'present in New Zealand' if on census night, they were:

- on New Zealand soil
- on a vessel in New Zealand waters
- travelling between New Zealand ports.

The census usually resident population count is as at midnight on census night.

## Subnational counts

The census usually resident population count of an area in New Zealand is a count of all people enumerated by census, who usually live in that area, and were present in New Zealand on census night.

For example, a Christchurch city resident visiting Wellington city on census night is included in the census usually resident population count of Christchurch city.

The term 'usual residence' is defined in the [glossary](#).

## Who is in this count?

### Included

- Residents in New Zealand.
- Residents temporarily elsewhere in New Zealand are included at their usual address (**for subnational counts only**).

### Excluded

- Residents temporarily overseas.
- Visitors from overseas.
- Visitors from elsewhere in New Zealand (**for subnational counts only**).

## Data quality

During the census collection process, we apply strategies to try to count everyone in New Zealand.

If we get sufficient evidence during the collection process that a person exists or a dwelling was occupied, but do not receive a corresponding form, we create a substitute record. We do this during the processing stage.

Inevitably, given the complexity and size of the census, some people in New Zealand on census night are not counted by the census. Apart from creating substitute records (as described above), we make no adjustment to the census usually resident population count for undercount or overcount.

## How to use this term

The wording of the term 'census usually resident population count' clarifies its source as a census count, and differentiates it from the other two population measures.

**Use the full standard term** when presenting data. For example:

- "The census usually resident population count of New Zealand at 5 March 2013 was 4,242,048."

**Do not use shortened terms**, such as 'usually resident population' and 'resident population', because they can be confused with other population measures.



---

# Estimated resident population

## Definition

The **estimated resident population** of New Zealand is an estimate of all people who usually live in New Zealand at a given date.

The estimated resident population of New Zealand **at a given date after census night** is derived by updating the census usually resident population count for:

- estimated net census undercount
- the estimated number of residents temporarily overseas on census night
- natural increase (births less deaths) between census night and the given date
- net migration (arrivals less departures) between census night and the given date.

The estimated resident population is as at midnight of the reference date.

Terms such as 'estimate', 'natural increase', and 'migration' are defined in the [glossary](#).

## Subnational estimates

The estimated resident population **of an area in New Zealand** is an estimate of all people who usually live in that area at a given date.

The estimated resident population for each area at a given date after census night is derived in the same way as described above.

## Who is in this estimate?

### Included

- Residents in New Zealand.
- Residents temporarily overseas.
- Residents temporarily elsewhere in New Zealand are included at their usual address (**for subnational counts only**).

### Excluded

- Visitors from overseas.
- Visitors from elsewhere in New Zealand (**for subnational counts only**).

## Data quality

The estimated resident population uses data from many sources, including administrative data collected by organisations other than Statistics NZ. This data may be subject to error, depending on the coverage and quality of the information collected.

## How to use this term

The wording of the term 'estimated resident population' clarifies that it is a demographic estimate, and differentiates it from the other two main population measures.

**Use the full standard term** when presenting data. For example:

- "The estimated resident population of New Zealand at 30 June 2013 was 4.47 million."

**Do not use shortened terms**, such as 'resident population' and 'usually resident population', because they can be confused with other population measures.



# Guidelines for presenting population data

Follow these guidelines when you present population data.

1. **When making a table or graph, include the full standard term.** This will prevent the data from being misleading if used separately.
2. **When writing about data, use the full standard term at the beginning of each section of text,** and make sure it appears at least once per page. This will prevent the data from being misleading if used separately.
3. **Do not use shortened terms,** such as 'census night population', 'usually resident population', and 'resident population', when presenting data. Shortened terms are not specific enough, and can easily be confused with other population measures.
4. **After the full standard term has been used, general words or phrases may be used.** For example:
  - these people
  - residents
  - those who usually live in New Zealand.

These terms refer generally to a population, but do not contain any detailed technical information. They are sufficiently broad terms that are unlikely to be used instead of the standard terms, and are only suitable for use alongside the standard term.

5. **When subgrouping data, use the full standard term alongside the characteristic** you are analysing. For example:
  - *census usually resident population count* of Māori ethnicity
  - *census night population count* of Pacific ethnicities
  - European ethnicities *estimated resident population*.

Do not split the full standard term. For example, it is not acceptable to use the term '*estimated European ethnicities resident population*'.

6. **When responding to an ad hoc request, specify which population measure you have used.** For example, a footnote that says 'Based on the census usually resident population count, 2013 Census'.
7. **Include the standard definition** in any publication of population data. Preferably also specify the inclusions, exclusions, and quality note.
8. **Include a copy of, or link to, this document,** *Standard for population terms*, with population data. This will help users choose the most appropriate measure for their needs.

# Related classifications and standards

## New Zealand

### Standard for usual residence (2008)

1. The standard for usual residence affects the census usually resident population count and the estimated resident population.
2. By definition, each respondent can only have one usual residence.
3. The term 'usual' must be included in the questionnaire module to make it clear that a usual residence is required.
4. Guidelines for identifying a respondent's usual residence are given.

## International

The standard population terms are comparable to the terms used by the Australian Bureau of Statistics (ABS). The ABS terms are described in the paper [Population concepts \(2008\)](#).

| <b>Statistics New Zealand</b>            | <b>Australian Bureau of Statistics</b> |
|--|--|
| census night population count            | census place of enumeration count      |
| census usually resident population count | census usual residence count           |
| estimated resident population            | estimated resident population          |

Statistics NZ outputs most census data based on the census usually resident population count.

Before the 2006 Census in Australia, many of the Australian census products presented data based on the place of enumeration. From the 2006 Census onward, the focus was on place of usual residence. The estimated resident population (ERP) is the official measure of the population of Australia, and is based on the concept of usual residence.

### United Nations Statistics Division

There are no international standards for collecting population data. The United Nations Statistics Division (UNSTATS) collect population data from most countries in the world. In the [Demographic Yearbook 2012](#), UNSTATS stated:

As far as possible, the population statistics presented in the tables of the *Demographic Yearbook* refer to the *de facto* population. Those reported to have been based on the *de jure* concept are identified as such.

Terms such as 'de facto' and 'de jure' are defined in the [glossary](#).



---

# Glossary

## **Area unit**

Non-administrative areas made up of [meshblocks](#). Area units aggregate to define geographic areas such as territorial authorities, regional councils, and New Zealand. At the 2013 Census there were 2,020 area units.

## **Census of Population and Dwellings**

The five-yearly Census of Population and Dwellings is the official count of population and dwellings in New Zealand, providing a snapshot of society at a point in time.

The 2013 Census of Population and Dwellings was taken on Tuesday 5 March 2013, and the official time for the census to be taken was midnight of that day.

As Statistics NZ also conducts censuses for agricultural statistics, population data should reference the Census of Population and Dwellings in full.

## **De facto population concept**

People present in a given area at a given time. The 'census night population count' is a census measure, and the 'estimated de facto population' is a demographic measure, of the de facto population concept. Statistics NZ stopped producing population estimates based on the de facto population concept in 1997, instead using the estimated resident population concept.

## **De jure population concept**

See [Usual residence](#).

## **Estimate (population)**

Population estimates are produced using data from the most recent Census of Population and Dwellings, updated with estimates of the components of demographic change (births, deaths, and net migration) since that last census.

Population estimates based on the resident population concept include adjustments for net census undercount and residents temporarily overseas. Population estimates based on the de facto population do not include these adjustments. Statistics NZ stopped producing population estimates based on the de facto population concept in 1997.

## Availability of population estimates<sup>(1)</sup>

| Estimate type                                   | Availability            | Frequency | Reference date(s)  | Concept             |
|---|-------------------------|-----------|--|---------------------|
| National population estimates <sup>(2)</sup>    | March 1991 to present   | Quarterly | <ul style="list-style-type: none"> <li>• 31 March</li> <li>• 30 June</li> <li>• 30 September</li> <li>• 31 December</li> </ul> | Resident population |
|   | March 1936 to June 1997 | Quarterly | <ul style="list-style-type: none"> <li>• 31 March</li> <li>• 30 June</li> <li>• 30 September</li> <li>• 31 December</li> </ul> | De facto population |
|   | 1926 to 1935            | Annually  | <ul style="list-style-type: none"> <li>• 31 December</li> </ul>  | De facto population |
| Subnational population estimates <sup>(3)</sup> | 1996 to present         | Annually  | <ul style="list-style-type: none"> <li>• 30 June</li> </ul>  | Resident population |
|   | 1986 to 1995            | Annually  | <ul style="list-style-type: none"> <li>• 31 March</li> </ul>   | De facto population |

1. Population estimates are 'as at' the given reference dates. National population estimates 'mean quarter ended' and 'mean year ended' are also available as derived from the 'as at' population estimates.
2. Available by single year of age and sex for 1936–75 (December de facto population estimates), 1976–95 (quarterly de facto population estimates), and from 1991 (quarterly resident population estimates).
3. Available by five-year age groups and sex from 1996 for regional council and territorial authority areas. De facto population estimates relate to boundaries at 31 March 1995. Resident population estimates relate to latest boundaries. Population estimates for other geographic areas (eg urban areas, area units) are also available for some years.

## Imputation

Replacing missing information with what is expected to be true information.

## Migration

The movement of people from one area to another. When the movement is between countries, it is called **international migration**; when it is within a country it is called **internal migration**.

**Net migration** represents the net change (arrivals less departures) in the population of an area resulting directly from migration.

## Meshblock

The smallest geographic unit for which Statistics NZ collects statistical data. Meshblocks vary in size from part of a city block to large areas of rural land. Each meshblock borders another to cover all of New Zealand, and extending out to the 200-mile economic zone (approximately 320 kilometres). Meshblocks aggregate to build larger geographic areas, such as area units, territorial authorities, and regional councils. At the 2013 Census, there were 46,637 meshblocks in New Zealand.

## Natural increase

The excess of births over deaths. When deaths exceed births, this is a negative natural increase, or natural decrease.

## Net census undercount

**Undercount (undercoverage)** is the number of people missed who should have been counted.

**Overcount (overcoverage)** is the number of people counted who should not have been, or who were counted more than once.

**Net census undercount (net undercoverage)** is the difference between undercount and overcount of the census, usually expressed as a percentage of what should have been the complete count rather than as a percentage of what was counted.

Statistics NZ has conducted post-enumeration surveys after each Census of Population and Dwellings since 1996, to provide estimates of undercount, overcount, and net census undercount.

[See definition of 'post-enumeration survey'](#)

## New Zealand

For statistical purposes, the term 'New Zealand' refers to geographic New Zealand. In addition to North, South, Stewart, and Chatham islands, this includes offshore islands such as: Kermadec Islands, Three Kings Islands, Mayor Island, Motiti Island, White Island, Moutohora Island, Bounty Islands, Snares Islands, Antipodes Islands, Auckland Islands, and Campbell Island.

This does not include the Cook Islands, Niue, or Tokelau. For the 2013 Census, people on ships in New Zealand waters and on the Taranaki and Southland oil rigs were included.

## Post-enumeration survey

A sample survey to check the accuracy of coverage and/or response of another census or survey (for example the Census of Population and Dwellings).

## Regional council

A regional council is defined by the Local Government Commission (unknown date) as "A local authority having jurisdiction over a region. Its main functions are related to environmental and resource management."

Regional councils were established in 1989, with boundaries conforming to one or more water catchments, and giving consideration to regional communities of interest. Regional councils are defined at the meshblock and area unit levels, and cover every territorial authority, with the exception of the Chatham Islands Territory. However, there are eight instances where territorial authorities straddle regional council boundaries. At the 2013 Census, there were 16 regional councils in New Zealand.

## Resident

A person who usually lives in an area. This is a statistical, not a legal, definition generally based on a person's self-identified usual address. The term 'resident' may be used differently in other contexts, such as economic statistics.

In census statistics, a resident is a person who self-identifies on the census individual form that they usually live in an area.

Residents overseas on census night do not complete a census form.

In international travel and migration statistics, a resident is a person who is living in New Zealand for 12 months or more.

### **Resident population concept**

People who usually live in a given area at a given time. The 'census usually resident population count' is a census measure, and the 'estimated resident population' is a demographic measure, of the resident population concept.

### **Resident temporarily overseas**

A person who usually lives in New Zealand but who is overseas for less than 12 months.

In census statistics, a resident temporarily overseas is a person who is identified on the census dwelling form as usually living in that dwelling but who is overseas for a period of less than 12 months.

In international migration statistics, a resident temporarily overseas is a person who is living in New Zealand for 12 months or more, and is overseas for less than 12 months.

### **Subnational**

A geographical unit of a country, for example, area unit, territorial authority, or regional council. The boundaries of these units are defined for legal, administrative, or statistical purposes.

See definitions of [area unit](#), [territorial authority](#), and [regional council](#).

### **Substitute record**

A substitute is a census record Statistics NZ creates where we get sufficient evidence during the collection process that a person exists or a dwelling was occupied, but we received no corresponding form.

Substitutes are part of census non-participation, as although they are part of the census count, no forms were received from respondents. The other component of census non-participation is census undercount – people missed by the census.

Age, sex, and usual residence meshblock are imputed for substitute records. All other variables are coded to non-response. Substitution therefore has the effect of increasing the level of item non-response for non-imputed variables.

[See definition of 'imputation'](#)

### **Territorial authority**

City and district councils, defined by aggregations of meshblocks or area units. When defining the boundaries of territorial authorities, the Local Government Commission placed considerable weight on the 'community of interest'. Most harbours and fiords, and some offshore islands, are included in territorial authority boundaries. At the 2013 Census, there were 67 territorial authorities in New Zealand.

### **Usual residence**

This is a statistical, not a legal, definition generally based on a person's self-identified usual address. The [statistical standard for usual residence](#) (2008) states that usual residence is the address of the dwelling where a person considers themselves to usually reside, except in the specific cases listed below.

- Dependent children who board at another residence to attend primary or secondary school, and return to the home of their parent(s) or guardian(s) for the holidays, usually reside at the address of their parent(s) or guardian(s). Tertiary students usually reside at the address where they live while studying. If they give

up their usual residence in the holidays (for example, terminate the lease on a flat or give up their hostel room) and return to the home of their parent(s)/guardian(s) during the holidays their usual residence over that period would be the home of their parent(s)/guardian(s).

- Children in shared care usually reside at the place where they spend more nights, or if they spend equal amounts of time at each residence, they usually reside at the place where they are at the time of the survey.
- People who are in rest homes, hospitals, prisons, or other institutions, usually reside where they consider themselves to live, and this may include the institution.
- A person whose home is on any ship, boat, or vessel permanently located in any harbour shall be deemed to usually reside at the wharf or landing place (or main wharf or landing place) of the harbour.
- A person from another country who has lived in New Zealand the past 12 months, or has the intention of living in New Zealand for 12 months or more, usually resides at his or her address in New Zealand (as in international travel and migration).
- People of no fixed abode have no usual residence. However, for enumeration purposes, a meshblock of usual residence is assigned to people of no fixed abode based on their location on the date of data collection. They are still recorded as having 'no fixed abode'.
- People who spend equal amounts of time residing at different addresses, and cannot decide which address is their usual residence, usually reside at the address they were surveyed at, assuming that they are not a visitor.
- If none of the above guidelines apply, the person usually resides at the address they were surveyed at.

## **Visitor**

A person who usually lives elsewhere. This is a statistical, not a legal, definition generally based on a person's self-identified usual address.

## **Visitor from overseas**

A person who usually lives overseas. This is a statistical, not a legal, definition generally based on a person's self-identified usual address.

In census statistics, a visitor from overseas is a person who indicates on the census individual form that they usually live overseas.

In international travel and migration statistics, a visitor from overseas is a person who spends less than 12 months in New Zealand.



---

## References and further reading

### References

Australian Bureau of Statistics (2008). [Population concepts](#). Available from [www.abs.gov.au](http://www.abs.gov.au).

Local Government Commission (nd). [Glossary](#). Available from [www.lgc.govt.nz](http://www.lgc.govt.nz).

Statistics New Zealand (2008). [Usual residence](#). Available from [www.stats.govt.nz](http://www.stats.govt.nz).

United Nations (2013). [Demographic yearbook 2012](#). Available from <http://unstats.un.org>.

### Further reading

Department of Statistics (1992). *New Zealand Standard Areas Classification Manual*. Wellington: Author.

Statistics New Zealand (2013). [2013 Census Usually Resident Population Counts – Definitions](#).

Statistics New Zealand (2013). [2013 Census definitions and forms](#).

Statistics New Zealand (2013). [2013 Census collection methods](#).

Statistics New Zealand (2013). [Subnational Population Estimates: At 30 June 2013 \(provisional\)](#).