



Task Team on Population Estimates

Report on standards for annual population statistics

UN/POP/TTPE/2009/1

Prepared by the Population Division/DESA
United Nations, New York

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Terms of Reference

1. Review and recommend ways to improve consultations with countries in the process of producing national estimates.
2. Indicate to agencies how to factor in changes in the population figures from one revision to the next.
3. Discuss ways to address the concern that there are no internationally agreed standards for annual population statistics.



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Members

The Task Team has 12 + 2 members:

- African Development Bank (AfDB)
- Economic Commission for Africa (ECA)
- Economic Commission for Europe (ECE)
- Economic Commission for Latin America and the Caribbean (ECLAC)
- Economic and Social Commission for Asia and the Pacific (ESCAP)
- Economic and Social Commission for Western Asia (ESCWA)
- UNESCO Institute for Statistics (UIS)
- United Nations Population Division/DESA (UNPD)
- United Nations Population Fund (UNFPA)
- United Nations Statistics Division/DESA (UNSD)
- World Bank
- World Health Organization (WHO)
- **Pan-American Health Organization (PAHO)**
- **South Pacific Communities (SPC)**



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Analysis I, II

- Population estimates are being used widely within the UN system and beyond. They are the basis for a wide range of social, economic, environmental and other statistics.
- The complex and demanding mechanism created for monitoring and reporting MDG indicators have significantly increased the demand for comparable, consistent and continuous time series of population estimates. Annual availability of basic population data is essential to monitor progress made in achieving the MDG's.



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Analysis I, II, III: Data availability

- Population figures are either generated through enumeration of the population in a census or by maintaining accurate and complete registers.
- Population estimates between censuses are generated by applying a number of statistical and demographic methods.
- Annual population figures require the preparation of estimates.



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Analysis III: Challenges

- The lack of complete and continuous vital registration for most developing countries does not allow to apply the demographic accounting framework in order to move the populations forward from one enumeration to the next.
- Preparing population estimates based on surveys and other information and methods is demanding.

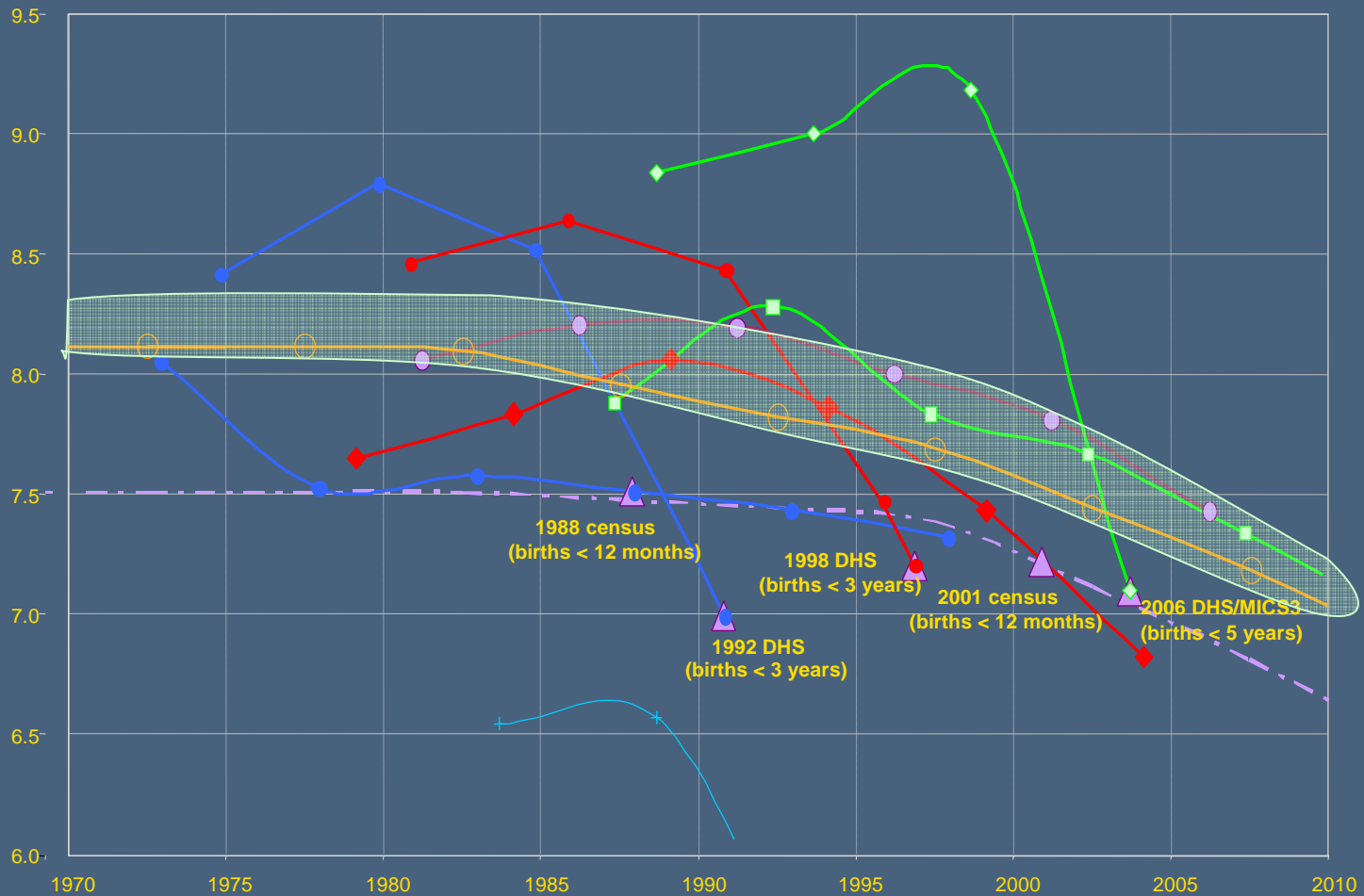
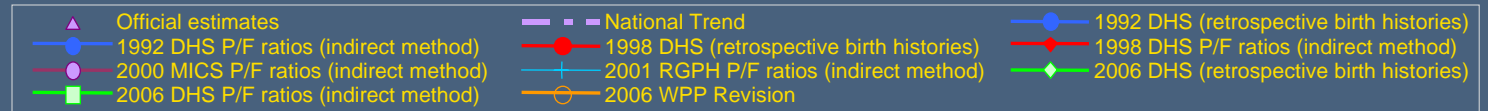
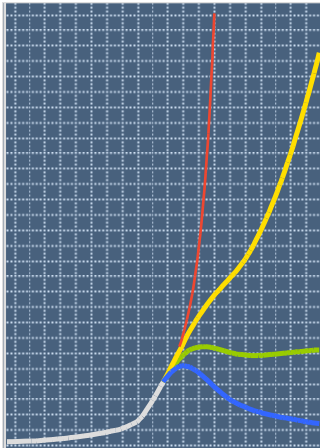


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Niger

TFR final estimates



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Conclusions I, II

1. Expanded consultations in preparation for each Revision of WPP
2. Users should revise whole time series based on new WPP Revisions, with well defined exceptions
3. Use of national data when required by user policy
4. Preparation of additional estimates by UNPD



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Conclusions III

- Significant gap between the increasing need for accurate and timely population estimates and existing capacity in many countries to produce them.



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Conclusions III

- Metadata are essential to inform users about the quality and reliability of data. Metadata provide valuable guidance to the user regarding the strengths and limitations of a particular statistic, including methods used in its preparation.
- Concentrate on improving the metadata on the preparation of population estimates.



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Preliminary analysis III

Possible addition to the original metadata questionnaire

1. Territorial coverage
2. Concepts and definitions used for population estimates
3. Criteria used for defining urban and rural areas
4. Estimation type
5. Status of estimates
6. Accuracy and quality of data
7. Continuity of time series
8. Base data for population in urban locations
9. Cohort-component method for preparing population estimates by age and sex

Review also terminology used and methods included, excluded.



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Suggestions

1. UNSD and UNPD to collaborate in reviewing and revising existing metadata questionnaire.
2. Test revised metadata
3. Submit to CCSA after tests.
4. UNPD to enhance scope and accessibility of metadata for UNPD population estimates [metadata recovery].

Publish and advertise metadata



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World Population Prospects: The 2006 and 2008 Revisions

Data Sources

- By Country By Indicator
- Afghanistan
 - Albania
 - Algeria
 - American Samoa
 - Andorra
 - Angola
 - Anguilla
 - Antigua and Barbuda
 - Argentina
 - Armenia
 - Aruba
 - Australia
 - Austria
 - Azerbaijan
 - Bahamas
 - Bahrain
 - Bangladesh
 - Barbados
 - Belarus
 - Belgium

Display Data Sources

Afghanistan

The 2006 Revision

Total population (2005): Estimated to be consistent with the 1979 census adjusted for underenumeration, with the structure by age and sex from the 2003 Afghanistan Multiple Indicator Cluster Survey (MICS-2) and the 2004 Afghan pre-census results, as well as with intercensal estimates of the trends in fertility, mortality and international migration. There is considerable uncertainty about the size of the population in 1979 because the census enumerated only the settled population and the number of nomads, reported to be of about 2 million at the time, is not exactly known.

Total fertility: Based on: (a) births in the preceding 12 months to the 1979 census classified by age of mother, and (b) data on children ever born and births in the preceding 12 months, both classified by age of mother, from the 1972-1973 Afghanistan Demographic Survey as well as the 2000 and 2003 Afghanistan MICS. Reproductive health studies conducted in Afghan refugee settlements in Pakistan were also considered.

Infant and child mortality: Based on: (a) data on births and infant deaths in the past 12 months from the 1979 census, adjusted for underreporting; (b) data on children ever born and surviving produced by the 1972-1973 Afghanistan Demographic Survey as well as the 1997, 2000 and 2003 Afghanistan MICS (adjusted for underreporting); and (c) estimates from UNICEF.

Life expectancy at birth: Based on: (a) a life table, derived from adjusted deaths in the past 12 months by age and sex, and the population by age and sex from the 1979 census, and (b) derived from estimates of infant and child mortality by assuming that the age pattern of mortality conforms to the West model of the Coale-Demeny Model Life Tables.

International migration: Based on UNHCR statistics on the number of Afghan refugees in the main countries of asylum (Pakistan, India and Iran) and on assumptions about the subsequent return of refugees.

The 2008 Revision

Total population (2007): Estimated to be consistent with the 1979 census adjusted for underenumeration, with the structure by age and sex from the 2003 Afghanistan Multiple Indicator Cluster Survey (MICS-2), the 2004 Afghan pre-census results and the 2006 MOH Health Survey, as well as with intercensal estimates of the trends in fertility, mortality and international migration. The 1979 census enumerated the settled population only; an attempt was made to adjusted for the number of Kuchi (nomads), reported to be of about 2 million at the time.

Total fertility: Based on: (a) births in the preceding 12 months to the 1979 census classified by age of mother, and (b) data on children ever born and births in the preceding 12 months, both classified by age of mother, from the 1972-1973 Afghanistan Demographic Survey, (c) data on children ever born by age of mother from the 2000 and 2003 Afghanistan MICS, (d) data on children ever born and births in the preceding 24 months, both classified by age of mother, from the 2006 MOH Health Survey. Reproductive health studies conducted in Afghan refugee settlements in Pakistan were also considered.

Infant and child mortality: Based on: (a) data on births and infant deaths in the past 12 months from the 1979 census, adjusted for underreporting; (b) data on children ever born and surviving produced by the 1972-1973 Afghanistan Demographic Survey, the 1997, 2000 and 2003 Afghanistan MICS (adjusted for underreporting), as well as the 2006 MOH Health survey (adjusted for underreporting); and (c) estimates from UNICEF.

Life expectancy at birth: Based on: (a) a life table, derived from adjusted deaths in the past 12 months by age and sex, and the population by age and sex from the 1979 census, and (b) derived from estimates of infant and child mortality by assuming that the age pattern of mortality conforms to the West model of the Coale-Demeny Model Life Tables.

International migration: Based on UNHCR statistics on the number of Afghan refugees in the main countries of asylum (Pakistan, Iran and India) and on assumptions about the subsequent return of refugees.



World Population Prospects: The 2006 and 2008 Revisions

Data Sources

Total Population

By Country By Indicator

The 2006 Revision

The 2008 Revision

Total Population	Country	Revision_2006	Revision_2008
Total Fertility	Afghanistan	Estimated to be consistent with the 1979 census adjusted for underenumeration, with the structure by age and sex from the 2003 Afghanistan Multiple Indicator Cluster Survey (MICS-2) and the 2004 Afghan pre-census results, as well as with intercensal estimates of the trends in fertility, mortality and international migration. There is considerable uncertainty about the size of the population in 1979 because the census enumerated only the settled population and the number of nomads, reported to be of about 2 million at the time, is not exactly known.	Estimated to be consistent with the 1979 census adjusted for underenumeration, with the structure by age and sex from the 2003 Afghanistan Multiple Indicator Cluster Survey (MICS-2), the 2004 Afghan pre-census results and the 2006 MOH Health Survey, as well as with intercensal estimates of the trends in fertility, mortality and international migration. The 1979 census enumerated the settled population only; an attempt was made to adjust for the number of Kuchi (nomads), reported to be of about 2 million at the time.
Infant and Child Mortality	Albania	Estimated to be consistent with the 2001 census, with official population estimates for 2005, and with estimates of the subsequent trends in fertility, mortality and international migration.	Estimated to be consistent with the 2001 census, with official population estimates for 2005, and with estimates of the subsequent trends in fertility, mortality and international migration.
Life Expectancy at Birth	Algeria	Estimated to be consistent with the 1998 census, with official population estimates for 2003 and with estimates of the subsequent trends in fertility, mortality and international migration.	Estimated to be consistent with the 1998 census, with official population estimates for 2007, with preliminary results of the 2008 census and with estimates of the trends in fertility, mortality and international migration.
International Migration	American Samoa	Estimated to be consistent with the 2000 census and with estimates of the subsequent trends in fertility, mortality and international migration.	Estimated to be consistent with the 2000 census and with estimates of the subsequent trends in fertility, mortality and international migration. Estimates of the Secretariat of the Pacific Commission were also taken into account.
	Andorra	Estimated to be consistent with 2000 and 2004 official population estimates, and with	Estimated to be consistent with 2005 and 2007 official population estimates, and with

Display Data Sources



United Nations, Department of Economic and Social Affairs (DESA)
Population Division, Population Estimates and Projections Section

World Population Prospects: The 2008 Revision.

User Name:

Password:

This web site is best viewed at a screen resolution of at least 1280 x 1024 with a maximized window.
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<http://esa.un.org/peps/index.htm>

User Name: PEPS

Password:
WPP2008



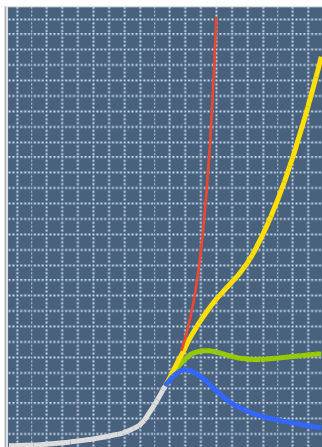
Thank you!

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Quality of population estimates

UN 1952, Manual I



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- It is desirable to appraise the possible errors in population estimates, at least in broad terms, and to publish a statement of the approximate degree of reliability in order to minimize the dangers of misuse and to encourage legitimate uses. ☹️
- Estimates should ordinarily be presented with at least as many digits as are useful [...]. 😊
- Where there are important inconsistencies in the data used for population estimates, the data should be rendered consistent by adjustments or "corrections". These adjustments or corrections should be indicated [...]. 😊
- In general; estimates are internationally comparable if they conform to the "modified de facto" definition. Deviations from this definition should be indicated. 😊
- Estimates should be made for the middle of each year [...]. 😊