

MOBILE CELLULAR TELEPHONE SUBSCRIBERS PER 100 POPULATION		
Economic development	Information and communication technologies	

1. INDICATOR

- (a) **Name:** Mobile cellular telephone subscribers per 100 population
- (b) **Brief Definition:** The indicator is derived by dividing the number of mobile cellular telephone subscribers by the population and multiplying by 100.
- (c) **Unit of Measurement:** Measured as the % of population.
- (d) **Placement in the CSD Indicator Set:** Economic development/ Information and communication technologies

2. POLICY RELEVANCE

- (a) **Purpose:** This indicator, together with the fixed telephone lines, is the broadest and most common measurement of the degree of telecommunication development in a country.
- (b) **Relevance to Sustainable/Unsustainable Development (theme/sub-theme):** Telecommunications and social, economic, and institutional development are closely linked. Modern communications is considered to be relatively benign to the environment. There is unlikely to be sustainable development without a well-developed communications infrastructure. Communications is critical to support sustainable development.
- (c) **International Conventions and Agreements:** WSIS documents and targets and ITU Strategic plan highlighting the need to bridge the national and international digital divide in ICTs.
- (d) **International Targets/Recommended Standards:** World Summit on the Information Society (WSIS) target 10 (2015): "To ensure that more than half the world's inhabitants have access to ICTs within their reach."
Millennium Development Goals (MDGs) target 18 "In cooperation with the private sector, make available the benefits of new technologies, especially information and communications
- (e) **Linkages to Other Indicators:** The linkages between this indicator and other sustainable development indicators are many. For instance, a well-developed communication infrastructure will reduce the need for transport with beneficial effects on the environment. Another example is the requirement of telecommunications for the innovative delivery of health and educational services. Yet, another example is the potential of telecommunications for reducing economic and social gaps within an economy and assisting to reduce the need for urbanization. Access to telecommunications provides

those in rural and remote areas with contact to the outside world, reducing their sense of isolation and providing them with a tool to improve economic, social and cultural awareness.

3. METHODOLOGICAL DESCRIPTION

(a) **Underlying Definitions and Concepts:** Mobile cellular telephone subscribers refer to users of portable telephones subscribing to an automatic public mobile telephone service using cellular technology, which provides access to the Public Switched Telephone Network PSTN.

(b) **Measurement Methods:** The indicator is derived by dividing the number of mobile cellular telephone subscribers by the population and multiplying by 100.

(c) **Limitations of the Indicator:** The indicator provides no measure of the quality or reliability of the telephone service.

(d) **Status of the methodology:** The indicator is widely used in over 200 economies around the world.

(e) **Alternative Definitions:** If accessibility is a main interest, then the number of households with telephone (fixed or mobile) service may be more relevant especially for countries which have large households.

4. ASSESSMENT OF DATA

(a) **Data Needed to Compile the Indicator:** The data needed to compile the indicator are mobile cellular telephone subscribers and population.

(b) **National and International Data Availability and Sources:** The International Telecommunications Union (ITU) collects this information on an annual basis. Data are available for 1960, 1965, 1970, and annually from 1975 onwards. Population data is widely available from UN agencies.

(c) **Data References:** *World Telecommunication Indicators (WTI)* database, International Telecommunication Union; *World Telecommunication Development Report*, ITU; *Yearbook of Statistics*, ITU.

5. AGENCIES INVOLVED IN THE DEVELOPMENT OF THE INDICATOR

(a) **Lead Agency:** The lead agency is the International Telecommunications Union (ITU). The contact point is the Head, Market, Economics and Finance Unit, ITU; fax no. (41 22) 730 6449.

(b) **Other Contributing Organizations:** None.

6. REFERENCES

(a) Readings:

Definitions, methodology and other information regarding telecommunication indicators can be found in the ITU's *Telecommunication Indicator Handbook*.

Application of the indicator including country data can be found in the ITU's *World Telecommunication Development Report*. The data are also provided by the ITU to other agencies and appear in the following publications: *UN Statistical Yearbook*, *World Bank World Development Indicators*, *UNDP Human Development Report*, and *OECD Communication Outlook and EUROSTAT Communications Statistics*.

(b) Internet site: <http://www.itu.int/ict>