

# Trends of Some Public Health Indicators in Chile, 1971-1980

The health policy of the Government of Chile is focused basically on services to individuals and environmental action. The health sector—which has been reorganized to help accomplish its objectives more efficiently—includes the Ministry of Health, a system of 27 health services, and other agencies that, because of their specific function, answer to the Ministry. Eighty per cent of the population (estimated at around 11 million) comes under the National Health Services System.<sup>1</sup>

Some biodemographic indicators show the development of public health in the country during the 1971-1980 period (Table 1).

In 1980, the birth rate was 22.8 per 1,000 population, which represents an increase over 1978 and 1979 (22.1). On the other hand, the death rate (6.6 per 1,000 population) showed a decline over previous years. As a result of these two factors, the increase in the vegetative growth of the population was 1.62 per cent.

In 1980 the total number of deaths of those under one year of age was 8,072, which reduced the rate per 1,000 live births to 31.9 (36.6 per 1,000 in 1979). This decrease was also noted in mortality among infants under 28 days and in late infant mortality, and was due mainly to the

reduction in the principal causes of death in children under one year: diarrhea and bronchopneumonia. Mortality in infants under 28 days for the first time exceeded the death rate in the following 11 months.

For the last two years, the maternal death rate has remained at 0.73 per 1,000 live births, mainly because abortion-related deaths rose from 0.24 in 1979 to 0.28 per 1,000 live births in 1980. However, an overall decline was noted in maternal deaths, and is directly related to the increase in professional deliveries.

The changes noted in the biodemographic indicators examined also modify the relative importance of the principal causes of deaths (Table 2). In effect, as the easily controllable causes, generally occurring in younger groups, are overcome, the causes of death characteristic of older age groups remain high or change at a slower rate.

Cardiovascular diseases, which went from fifth to first place as a major cause of death in the last 40 years, remained at the top of the list in 1980, with an annual rise of more than 1,000 deaths as compared with 1979; these figures represent 24.8 per cent and 26.6 per cent of the total in those two years.

In the same period, cancer rose from eighth to second place, growing slightly worse between 1979 when it caused 15.4 per cent of all deaths. Accidents and other violent deaths, which did not appear among the 10 principal causes 40 years ago, continued to multiply until they

<sup>1</sup>*Estrategias de salud de Chile hasta el año 2000*. Office of Communications and Public Relations, Ministry of Health, Chile, 1981.

**Table 1. Biodemographic indicators, Chile, 1971-1980.**

| Biodemographic indicators              | 1971      | 1972      | 1973      | 1974       | 1975       | 1976       | 1977       | 1978       | 1979       | 1980       |
|--|-----------|-----------|-----------|------------|------------|------------|------------|------------|------------|------------|
| Birth rate <sup>a</sup>                | 28.7      | 28.7      | 28.1      | 26.7       | 25.2       | 23.9       | 22.8       | 22.1       | 22.1       | 22.8       |
| Gross mortality rate <sup>a</sup>      | 8.7       | 9.1       | 8.4       | 7.8        | 7.3        | 7.7        | 7.0        | 6.7        | 6.8        | 6.6        |
| Infant mortality rate <sup>b</sup>     | 70.5      | 71.1      | 65.2      | 63.3       | 55.4       | 54.0       | 47.5       | 38.7       | 36.6       | 31.9       |
| < 28 days <sup>b</sup>                 | 28.3      | 29.0      | 26.9      | 25.8       | 24.8       | 23.6       | 20.9       | 18.5       | 18.3       | 16.4       |
| Late infancy <sup>b</sup>              | 42.2      | 42.1      | 38.3      | 37.5       | 30.6       | 30.4       | 26.6       | 20.2       | 18.4       | 15.5       |
| Mortality rate, 1-4 years <sup>b</sup> | 3.15      | 3.02      | 2.66      | 2.80       | 2.32       | 2.27       | 1.85       | 1.61       | 1.51       | 1.25       |
| Maternal mortality rate <sup>h</sup>   | 1.42      | 1.63      | 1.32      | 1.22       | 1.31       | 1.15       | 1.02       | 0.92       | 0.73       | 0.73       |
| Percentage of professional deliveries  | 83.6      | 85.0      | 85.1      | 86.4       | 87.4       | 88.5       | 90.0       | 89.6       | 90.4       | 90.5       |
| Total population                       | 9,533,989 | 9,697,448 | 9,860,611 | 10,026,069 | 10,196,423 | 10,371,939 | 10,550,886 | 10,732,863 | 10,917,485 | 11,104,293 |

<sup>a</sup>Per 1,000 population.  
<sup>b</sup>Per 1,000 live births.

Table 2. Principal causes of death, by group, Chile, 1976-1980.

| Causes of death,<br>by group  | 1976   |       | 1977   |       | 1978   |       | 1979   |       | 1980   |       |
|---|--------|-------|--------|-------|--------|-------|--------|-------|--------|-------|
|   | No.    | %     | No.    | %     | No.    | %     | No.    | %     | No.    | %     |
| Total   | 79,389 | 100.0 | 73,541 | 100.0 | 72,321 | 100.0 | 74,178 | 100.0 | 73,711 | 100.0 |
| Diseases of circulatory system<br>(390-459)   | 16,753 | 21.1  | 16,348 | 22.2  | 17,498 | 24.2  | 18,374 | 24.8  | 19,625 | 26.6  |
| Malignant tumors<br>(140-208)   | 10,706 | 13.5  | 10,566 | 14.4  | 10,563 | 14.6  | 11,237 | 15.1  | 11,321 | 15.4  |
| Traumas and poisonings<br>(800-999)   | 7,347  | 9.3   | 7,871  | 10.7  | 8,184  | 11.3  | 8,198  | 11.0  | 8,739  | 11.9  |
| Undefined morbid signs,<br>symptoms, and conditions<br>(780-799)  | 7,846  | 9.9   | 7,446  | 10.1  | 7,953  | 11.0  | 8,087  | 10.9  | 7,455  | 10.1  |
| Diseases of the respiratory system<br>(460-519)   | 12,445 | 15.7  | 8,085  | 11.0  | 7,042  | 9.7   | 7,549  | 10.2  | 7,033  | 9.5   |
| Diseases of the digestive system<br>(520-579)   | 5,441  | 6.9   | 5,730  | 7.8   | 6,213  | 8.6   | 5,930  | 8.0   | 5,736  | 7.8   |
| Certain infections arising<br>in the perinatal period<br>(760-779)  | 4,701  | 5.9   | 4,263  | 5.8   | 2,957  | 4.1   | 2,883  | 3.9   | 3,176  | 4.3   |
| Infectious and parasitic diseases<br>(001-009,<br>020-139)  | 4,096  | 5.1   | 3,827  | 5.2   | 2,811  | 3.9   | 2,672  | 3.6   | 2,078  | 2.8   |
| Diseases of the endocrine glands,<br>nutritional and metabolic dis-<br>eases, and problems of immunity<br>(240-279) | 2,246  | 2.8   | 1,953  | 2.7   | 1,986  | 2.7   | 2,060  | 2.8   | 1,874  | 2.5   |
| Diseases of the genito-<br>urinary system<br>(580-629)  | 1,708  | 2.2   | 1,709  | 2.3   | 1,593  | 2.2   | 1,763  | 2.4   | 1,702  | 2.3   |
| Others  | 6,100  | 7.6   | 5,743  | 7.8   | 5,521  | 7.7   | 5,425  | 7.3   | 4,972  | 6.8   |

Note: The figures in brackets correspond to categories in the Ninth Revision of the International Classification of Diseases.

became the third major cause, exceeding 1979 figures by almost 7 per cent, to account for 11.9 per cent of all deaths.

On the other hand, deaths due to early infant diseases continued to decline, as did those resulting from infectious and parasitic diseases, falling from second to eighth place, with 2,078 deaths (2.8 per cent of the total).

Tuberculosis, which caused almost 13,000 deaths a year four decades ago (at a rate of 260 per 1,000 population), disappeared from the list of the 10 major causes, with only 1,355 deaths in 1980.

The changes mentioned above reflect the efforts made in disease control, which in addition to reducing the total

number of deaths have also altered the age composition of the population. For example, as a result of the increase in older age groups, the causes of death characteristic of those groups also rose. Accidents, though a cause in which improvements can be made, are the one exception since they increase constantly among the young and middle-aged, influenced as they are by the transformation of an agrarian society into an industrial one and by the displacement of rural populations to urban areas.

(Source: *Boletín de Vigilancia Epidemiológica*, Vol. VII, Nos. 5 and 6, May-June 1981, Ministry of Health, Chile.)