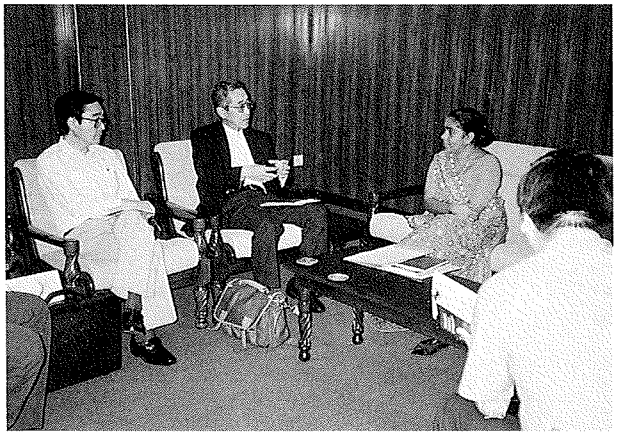
Report on the Basic Survey of Population and Development in Southeast Asian Countries

——Sri Lanka——

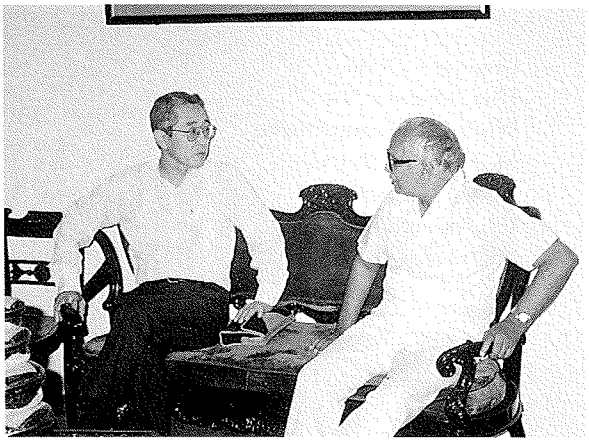
MARCH 1994

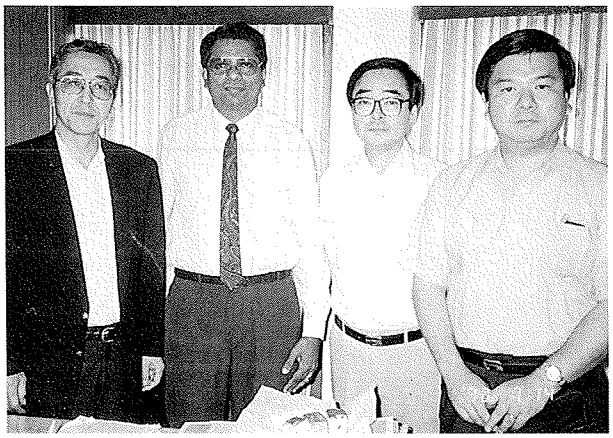
The Asian Population and Development Association



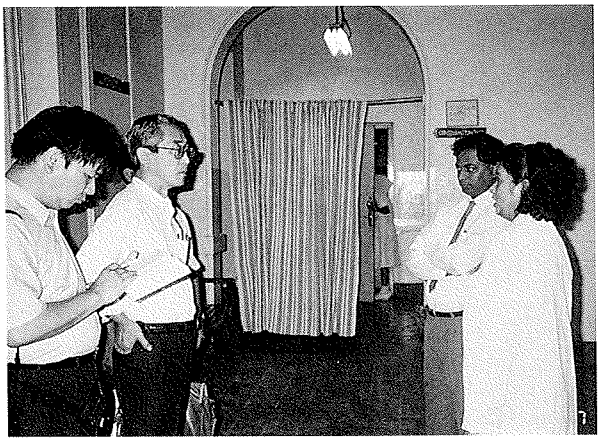
◀At Ministry of Health and Women's Affairs
From the right:
Hon, Minister Renuka Herath
Mr. Minoru Kiryu, Team leader
Mr. Masaaki Endo, team member

Courtesy Call on
Dr. Neville Fernando M.P.
Vice Chairman, Sri Lankan Parliamentarians for Population and Development ▶



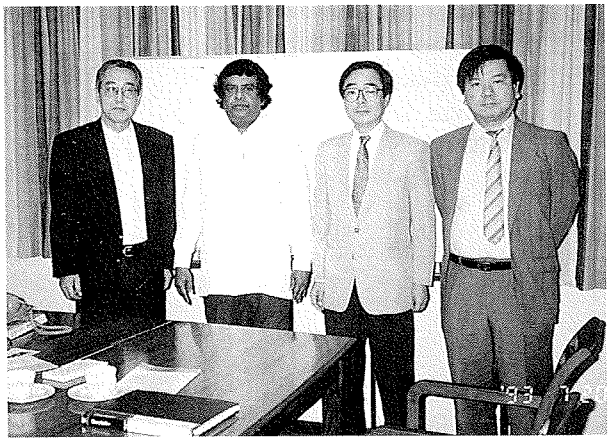


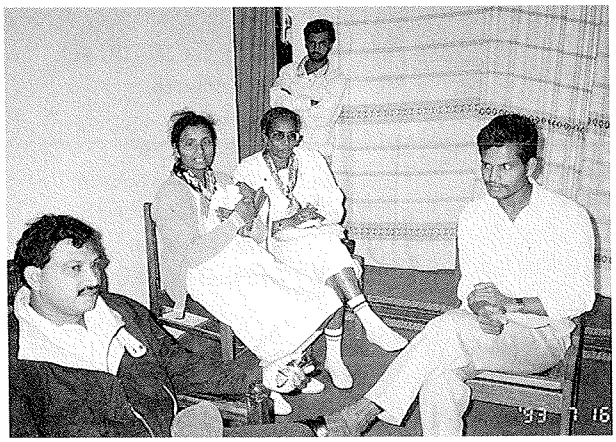
◀At Ministry of Health and Women's Affairs
From the left:
Mr. Minoru Kiryu
Dr. A. T. P. L. Abekoon
Director, Population Div.
Mr. Masaaki Endo
Mr. Tomomi Otsuka



◀At Kethumathi Hospital for Women
The first from the right
Dr. D. Suriyawasa, Director

Courtsy Call on
Hon. Minister. Dr.
Wimal Wickramasinghe
M.P. of Ministry of
Policy Planning and
Implementation
The second from the left ▶





◀At the dispensary in Nuwala Eliya District

Foreword

This report presents the findings of a basic survey of population and development in Sri Lanka. In 1993, the Asian Population and Development Association (APDA) was entrusted with the survey project "Basic Survey of Population and Development in Southeast Asian Countries" by the Ministry of Health and Welfare and Japan International Corporation of Welfare Services. APDA selected Sri Lank as the country in which its field survey would be conducted. The actual survey and analysis of the resultant findings were conducted by APDA's survey committee (Chairperson, Dr. Toshio Kuroda, Director Emeritus, Nihon University, Population Research Institute).

For effective application of population policies in the Souheast Asia and other countries, population dynamics as population growth, diseases, mortality, reproduction, population distrbution and internal migration, as well as static data of the population including family structure and population structure by age must be closely defined. In addition, effects of these factors on living and welfare standards, and medical care must be reviewed.

The objective of this survey was to contribute to resolving the problems related to population and development in Asian nations, by conducting a detailed survey of population dynamics, living and welfare standards and health and medical care and other aspects in the Southeast Asian countries.

The field survey was conducted with the guidance and cooperation of Ambassador Masaaki Kuniyasu and Mr. Masakazu Furuhata, First Secretary of the Embassy of Japan in Sri Lanka, Dr. Neville Ferunando, M.P. Vice chairman of Sri Lankan Parliamentarians for Population and Development. In Japan, members of Policy Planning & Evaluation Division, Minister's Secretariat, Ministry of Health and Welfare and Department of Policies, Economic Cooperation Bureau, Ministry of Foreign Affairs, cooperated in the planning and arrangements of the field survey. I would like to express my heart-felt gratitude to all of them.

In conclusion, I sincerely hope that this report would contribute to the further advancement of the population and development program in Sri Lanka as well as the Japanese Goverment's effective cooperation with Sri Lanka.

Furthermore, I would like to add that this report is the responsiblity of APDA and does not necessarily reflect the views nor policies of the Ministry of Health and Welfare or the Japanese Government.

March, 1994
Fukusaburo Maeda
Chairman
The Asian Population and
Development Association

Contents

Chapter One

OUTLINE
SRI LANKA - AN ISLAND NATION TOWARDS MODERNIZATION

Along with Nepal, Sri Lanka is one of the smallest nations on the Indian sub-continent, with a population in the 20 million range. It is a beautiful island sparkling with jewels afloat in the Indian Ocean. As if reflecting the beauty of the island, Sri Lanka has a high level of culture and education, as demonstrated by the fact that it is the only country in the region which has achieved a high degree of demographic transition.

Economically, however, Sri Lanka still strongly depends on primary industries, and the living standard is not very high. Its per capita GNP is US$ 470, only slightly higher than India (US$ 450), Bangladesh (US$ 210) and Pakistan (US$ 380) (ESCAP 1992 Population Data Sheet, 1990). But despite the fact that the modernization of the economy is lagging, Sri Lanka's demographic transition to a low birth and death rate is far more advanced than India, Pakistan and Bangladesh. Along with Kelala state in India, Sri Lanka is a known as a noteworthy case of demographic transition on the Indian sub-continent. Let us describe the distinctive character of Sri Lanka with a few vital statistics of the population. The table below shows the birth rate, total fertility rate, death rate, infant mortality rate, average life expectancy at birth (by sex), demographic transition index and for reference purposes the per capita GNP of Sri Lanka, compared to the four other South Asian countries (India, Pakistan, Bangladesh and Nepal).

Demographic Indices of Sri Lanka

Country	Birth rate	Death rate	Infant mortality rate	Average life expectance at birth		Total fertility rate	Demographic transition index	Per capita GNP (US$)
				Male	Female			
Sri Lanka	20.0	5.9	25	69.4	73.6	2.5	0.71	470
India	29.3	10.2	88	59.9	60.4	3.9	0.48	350
Pakistan	40.9	10.7	79	58.7	58.8	6.2	0.30	380
Bangladesh	38.2	13.8	109	52.9	52.4	4.8	0.28	210
Nepal	38.1	13.3	100	53.8	52.7	5.5	0.27	170

Source: ESCAP 1992 Population Data Sheet. Demographic transition indices from "Table 4 Demographic Transition Indices of Asian Countries" in Chapter 3. These calculations are from "Demographic Transition and Development in Asia", The Asian Population and Development Association, 1989.

It is immediately apparent that Sri Lanka displays notably higher levels for all these indices as compared to the other countries.

Sri Lanka's (crude) birth rate of 20 is near that of developed countries, whereas for all the other four countries it is between 30 and 40. The (crude) death rate is nearly half that of the other countries. This is reflected in the high life expectancy. The life expectancy for males in Sri Lanka is nearly 70, whereas in all the other countries it is between 50 and 60. The total fertility rate, which indicates the number of children to which women give birth throughout their lives, is a low 2.5 in Sri Lanka, but between 4 and 6 in the other countries.

The demographic transition index can be calculated from the above TFR and longevity. Sri Lanka has achieved a demographic transition index of 71%, whereas the index is below 50% in the other countries. This high demographic transition index is extremely clear evidence that in the field of population only Sri Lanka is achieving notable modernization.

On the other hand, the economy of Sri Lanka has not necessarily developed smoothly. The repatriation of emigrants who had remitted large sums of foreign currencies from Middle East oil-producing countries, the sudden decrease in the export of tea, previously the top export industry, and the political instability due to ethnic conflict have impeded Sri Lanka's modernization.

Since the 1980s, however, the Sri Lankan economy has shifted from an agricultural base to an industrial base, and transition to the industrial structure is being achieved. The export of traditional agricultural products has decreased, while the export of industrial products is beginning to increase. The latter accounted for 52.2% of exports in 1990, and this share has since been increasing phenomenally to 60.1% in 1991 and 68.9% in 1992. Thus, the modernization of Sri Lanka's industrial structure is proceeding at a very rapid pace.

Private investments and governmental development assistance are also increasing steadily as the political situation in Sri Lanka stabilizes. Revenues from tourism are once

again gradually recovering. In 1992, 393,000 tourists visited the country, the highest level since 1984. In particular, the number of tourists from Singapore, Japan and other Asian countries is increasing rapidly.

As for international development assistance, the United States accounted for the largest sums of bilateral development assistance until 1985, but in recent years Japan offers Sri Lanka the largest grant amounts.

Sri Lanka is a small country, with only 17.7 million or 1.4% of South Asia's total population of 1,235 millions (in 1992). However, in the field of demographics, it is reaching levels near those of developed countries, as already described. With this remarkable success in the fields of culture, education and health, Sri Lanka can be expected to play a leading role as an important member of the South Asian Association of Regional Cooperation (SAARC), since it has already virtually achieved the demographic conditions necessary for modernization.

Chapter Two

THE POPULATION OF SRI LANKA

1 Population Growth and Age Composition

The total population of Sri Lanka was 2.4 million in 1871, but by 1991 had reached 17,260,000. The population density increased from 37 to 267 persons per square kilometer over this period. Table 1 shows the historical trends in the population of Sri Lanka. As can be seen from this table, the population growth rate has generally been between 1 and 2%, and only exceeded 2% in three periods: 1953, 1963 and 1971. In neighboring countries (for the period from 1980 to 1991), the population growth rate was 2.1% in India, 3.1% in Pakistan and 2.2% in Bangladesh, so Sri Lanka's population growth rate is relatively low among South Asian countries.

Such trends in the population growth are closely related to the population's age composition. A population can be divided into three major brackets by age: the young population (ages 0 to 14), the population of productive age (15 to 64), and the aged population (65 and over). Table 2 shows the age composition indices of major South Asian countries (with Japan included for reference purposes) calculated based on these age categories (*1). As can be seen from this table, Sri Lanka has a relatively mature age composition compared to other South Asian countries.

Let us first look at the extent of aging of the Sri Lankan population, indicated by the aging index. Sri Lanka has an aging index of 12.93, highest among these South Asian countries, followed by India, Pakistan and Bangladesh. In other words, Sri Lanka is the country with the least active population in South Asia, and it is natural for its population growth rate to be low. However, we should note that this extent of aging of the population is only relative, and that Sri Lanka has a very low aging index as compared to Japan.

This situation is not necessarily disadvantageous. The child and the aged population, in other words the dependent population, is supported by the population of productive age. The ratio of dependent population indicates the economic burden of the population of productive age which supports the child and the aged population. As shown in Table 2, this burden of support of the population of productive age (the ratio of dependent population) is lowest in Sri Lanka. The reason is the low child population, as indicated by the dependency ratio of child population [49.4].

The low burden of support is a great advantage for promoting economic development. Let us refer to the situation in China on this point. China is energetically promoting developmental policies, one of which is the "single child" policy. Though this wording may be somewhat misleading, the objectives of this policy are, briefly, to promote economic growth by restraining the number of births and to use the resources thus freed up by the decrease in the economic burden imposed by the young population towards development (*2). Thus, China is curbing births in order to reduce the economic burden caused by its massive young population.

In this sense, the population situation in Sri Lanka is relatively favorable compared to other South Asian countries.

2 Trends in Fertility, Mortality, the Rate of Natural Increase and Their Causes

As already mentioned, a major distinguishing factor of Sri Lanka's population is its low growth rate compared to other countries in the South Asian region. Why has this low growth rate been possible? Here we will consider this issue based on vital statistics (birth rate, death rate and natural growth rate).

Table 3 shows the trends in fertility, mortality, and the rate of natural increase in Sri Lanka from 1945 to 1990. From this table we can gather the following three points:

① That after 1945 the death rate decreased abruptly and has stabilized at a low level;

② That the birth rate was high from 1945 to 1981, but has since been decreasing;

③ That with the effects of points ① and ②, the natural growth rate (birth rate - death rate) at first increased, but then entered a decreasing trend.

From these trends, we can say that the current situation of Sri Lanka's population corresponds to the third stage (characterized by a low death rate and decreasing birth rate) of demographic transition (transition from high birth and death rates to low birth and death rates) (*3). The extent of progression of demographic transition can also be verified by the demographic transition index (*4). If we calculate the demographic transition index for 39 Asian countries (Table 4), Sri Lanka's index is 0.71, 12th among the 39 countries, and extremely high among South Asian nations.

Demographic transition is thought to be brought about by socioeconomic development. However, as of 1991 Sri Lanka was a low income country, with a per capita GNP of only US$ 500. Thus, we cannot say that Sri Lanka's socioeconomic development is very advanced. Despite this, after 1945 the death rate decreased abruptly and since 1981 the birth rate has been declining steadily. What are the causes for this?

According to the results of research conducted in the past, some of the causes given for the sudden decrease in the death rate are: ① the eradication of malaria through the world-renowned spraying of DDT; ② the decrease in deaths from water system related infectious diseases and other sicknesses due to such efforts as installing waterworks in urban and rural areas, etc.; and ③ the fact that medical treatment is free, and that because Sri Lanka is a small island nation medical treatment and public health are easily disseminated. Some of the causes given for the steady decline in the birth rate are: ① the active promotion of family planning by the government; ② the resulting high rate of implementation of family planning (62% in 1987); and ③ the good education system and high level of education (education is free, and in 1981 the literacy rate was 91.1% for males, 83.2% for females).

In other words, Sri Lanka's demographic transition has been caused not by the internal factor of socioeconomic development, but rather by external causes such as the introduction of effective medicines and the implementation of family planning. The country's social system is another also cause which should not be ignored. Because Sri Lanka is a socialist country, medical treatment, public health, education, and other such aspects are extremely highly developed for a low income country. There is little doubt that these causes lying in the social system have greatly contributed to the advancement of demographic transition in Sri Lanka.

3 Internal Population Migration and Urbanization

Table 5 shows the internal population migration situation. For the period from 1971 to 1981, most of the district with an outflow of population are in wet zones where the population density is high, while most of the district with an inflow of population are in dry zones where

the population density is low. Thus, as far as we can see from this table, there is migration from regions with high population densities to regions with low population densities. Still, the total number of migrants is only approximately 1 million for this 10-year period, so population migration is not very active.

As we can see from this trend in population migration, urbanization in Sri Lanka is extremely slow. In 1970, the percentage of the urban population within the total population was 22%. In 1991, this percentage remained the same at 22%. As far as we can see from statistical data, the development of cities in Sri Lanka is quite slow.

However, there are problems here as well. The first is the influx of population to suburban areas. As stated above, there is little movement to urban areas, and urbanization is slow. On the other hand, there is a concentrated influx of population to suburban areas. Because of this, there is a risk that the living environment in these areas may deteriorate. The second problem is that of accelerated urbanization. Until now urbanization has been slow, but as Table 6 and Figures 1 and 2 show, urbanization may proceed quickly in the future. There is an urgent need to devise measures to deal with this situation.

Here we should note the following fact. According to information obtained from our field survey, there is an increasing concentration of the population in suburban areas, or sub-urbanization, as stated above, but the perception of sub-urbanization in Sri Lanka is slightly different from our own. The Colombo area is divided in three sections, the north, the center and the south. Of these, the center is what we refer to as Colombo. The population first concentrated in the north section with its port and industrial zones, and once this section was near saturation the population began concentrating in the south were there was extra space. This is what is called sub-urbanization in Sri Lanka. Considering that the Colombo area itself is extremely small, it does not seem proper to call this "sub-urbanization".

However, "true sub-urbanization" (not the "sub-urbanization" described above) is also progressing quietly. A substantial number of the workers employed in the Colombo area spend two or more hours commuting from outlining regions of the city. Though we could not obtain statistical information on the number of such workers, this number appears to be increasing. Administration covering a more extensive area than at present will no doubt be required to deal with the various problems this demographic phenomenon will bring about. In this sense, it will be necessary to pay attention to the trends in true sub-urbanization in the future.

4 International Migration

Table 7 shows the international migration situation. As we can see there is a chronic

excess in the number of people leaving the country. It is safe to say that the cause lies in the overseas dispatch of workers.

In Sri Lanka, whose economy has developed under governmental control, the industrial sector is not sufficiently developed and the balance of international payments is in a chronic state of surplus imports. The unemployment situation is serious, and the living standards of the nation are low. Because of this, the government has established a Bureau of Foreign Employment to promote the overseas dispatch of workers. In other words, the government is attempting to solve the domestic unemployment problem through overseas employment, and the problems of poverty and the balance of international payments through remittances from overseas workers.

Table 8 shows the number of workers dispatched overseas. This number has increased from 16,000 in 1986 to 43,000 in 1990. These statistical figures, however, are said to represent only some 40% of the total number of workers dispatched overseas, including illegal cases. With the increase in the numbers of workers dispatched overseas, the amount of the remittances from them has also increased, as shown on Table 9. The total amount of remittances is increasing yearly, and from 1986 has corresponded to 25% of the total amount of exports.

Remittances from overseas workers contribute to the acquisition of foreign currency. The increase of workers dispatched overseas is alleviating the problem of domestic unemployment. Money sent by workers overseas is helping to improve the living standards of their families. Thus, the overseas dispatch of workers brings about a number of economic advantages. However, it also generates such side effects as: ① the secret activities of corrupt brokers and ② the destruction of the family.

Here we should note that though employment overseas brings about economic advantages temporarily, in the long term it cannot be a decisive way for a country to solve its difficulties. The outflow of these workers is a negative factor for the development of the economy. If the economy slows down because of this, it will become necessary to send out ever increasing numbers of workers to alleviate the problems of unemployment, poverty and the balance of international payments. The overseas dispatch of workers can trigger this vicious circle (or state of dependency).

5 Population Growth and Demographic Problems

Sri Lanka's population growth rate is 1.4% (from 1980 to 1991), extremely low compared to other South Asian countries. Even so, the population is indeed growing. Table 10 shows the projected future population of Sri Lanka. As we can see, in the ten-year period

from 1990 to 2000, the population is expected to grow by some 2 million to approximately 19 million.

This growth of the population has an extremely important significance. As already stated, Sri Lanka is an agricultural country, with approximately 80% of its population living in rural areas. Furthermore, the country is quite small, covering only 65,500 km² (about 4/5 the size of Hokkaido), and the population density is extremely high (267 per km²).

Since 1970, the government has been strongly promoting a development project on the Mahaweli river system with the aim of solving food problems. The final goal of this project is to develop 360,000 hectares of rice paddies, and some 100,000 hectares have been developed so far. Overall, however, it seems fair to say that despite such governmental efforts, the frontiers for additional agricultural land development in Sri Lanka have disappeared.

Under such circumstances, the growth of the population, no matter how slow this growth may be, will steadily decrease the area of cultivated land per farm household. In fact, the settlement project within the Mahaweli river system development plan at first provided 2 hectares of rice paddies per settler household. By the end of the 1970s, however, this was reduced to 0.8 hectares per household.

Thus, there is a rapidly growing need to discover new frontiers for supporting the livelihood of the nation and growth of the economy in industrialization. Currently, the Sri Lankan government is actively promoting privitization and industrialization through foreign capital. The two major reasons for this can be considered as the increase in the population and the loss of frontiers in the agricultural sector. Though Sri Lanka does have a relatively favorable population situation among South Asian countries, there is little doubt that quite serious demographic issues will arise in the future.

Notes:

1) These indices are calculated using the following formulae:

Aging index = Aged population ÷ Child population

Dependency ratio of child population = Child population ÷ Population of productive age

Dependency ratio of aged population = Aged population ÷ Population of productive age

Ratio of dependent population = (Child population + Aged population) ÷ Population of productive age

The aging index is the percentage of the aged population with respect to the young population. The young population is supported by the population of productive age.

The dependency ratio of child population indicates the burden on the population of productive age for supporting the young population. The aged population is supported by the population of productive age. The dependency ratio of aged population indicates the burden on the population of productive age for supporting the aged population. The young and aged population together form the dependent population, supported by the population of productive age. The ratio of dependent population indicates the extent of the burden on the population of productive age for supporting the dependent population.

2) Tomomi Otsuka, "Population Estimation of China", "Keizai-Shushi", vol. 51, no. 4, 1982, pp. 439 - 454.

3) Trends in the total population, birth rate, death rate and population growth rate can be explained by the theory of demographic transition, a hypothesis which systematically explains a country's population trends and the trends in the birth and death rates which determine these in relation to the stage of socioeconomic development. The following is a summary of this theory:

As the level of socioeconomic development increases, the population shifts from a high birth and death rate to a low birth and death rate. This is called demographic transition, and the process consists of four stages. In the first stage, both the birth and death rates are high (low development stage). The second stage is characterized by an abrupt drop in the death rate while the birth rate remains steady (increasing slightly at first, then decreasing slightly) (initial development stage). In the third stage, the birth rate drops abruptly, following the drop in the death rate (progressive development stage). In the fourth stage, the population reaches a stage of low birth and low death rates (high development stage). The natural growth rate, which is the difference between the birth and death rates, changes from a low level in the first stage, increases to a high level in the second stage, decreases from this high level in the third stage, then reaches a low level in the fourth stage.

4) The demographic transition index is a value theoretically between 0 and 1, demographic transition being completed when the value reaches 1. For details on how it is calculated, refer to the following:

Lee-Jay Cho and Janis Y. Togashi, Industrial Transition and Demographic Dynamics of the Asia-Pacific Region (Proceedings of the International Symposium on the Role of the Asia-Pacific Region in World Economic Development, in Commemoration of the 80th Anniversary; College of Economics, Nihon University, 1984)

Table 1 Population Growth and Population Density

Year	Population (in thousands)	Density (per km²)	Annual growth rate
1871	2,400	37	-
1881	2,760	43	1.4
1891	3,008	46	0.9
1901	3,566	55	1.7
1911	4,106	63	1.4
1921	4,498	69	0.9
1931	5,307	82	1.7
1946	6,657	103	1.5
1953	8,098	125	2.8
1963	10,582	164	2.7
1971	12,690	196	2.2
1981	14,847	230	1.7
1982	15,195	235	1.2
1983	15,417	239	1.5
1984	15,603	242	1.2
1985	15,837	245	1.5
1986*	16,117	250	1.8
1987*	16,361	253	1.5
1988*	16,586	257	1.4
1989*	16,806	260	1.3
1990*	16,993	263	1.1
1991*	17,261	267	1.5

Source: Census Reports, Department of Census and Statistics Statistical Unit, Registrar General's Department Population Division, Ministry of Health and Women's Affairs

"*" indicates tentative values.

Table 2 Comparison of Population Indices

(Units: %)

Country	Dependent population		Ratio of dependent population	Aging index
	Dependency ratio of aged population	Dependency ratio of child population		
Sri Lanka (1991)	6.4	49.4	55.8	12.93
India (1991)	6.6	59.5	66.1	11.17
Pakistan (1991)	4.7	82.2	86.9	5.68
Bangladesh (1991)	1.6	74.5	76.1	2.12
* Japan (1991)	17.7	26.0	43.7	67.95

Source: Calculated from World Development Report (1993).

Table 3 Trends in Fertility, Mortality, and the Rate of Natural Increase

Year	Crude birth rate (‰)	Crude death rate (‰)	Natural growth rate (‰)
1945	35.9	21.5	1.4
1955	37.3	11.0	2.6
1965	33.1	8.2	2.5
1975	27.8	8.5	1.9
1976	27.8	7.8	2.0
1977	27.9	7.4	2.1
1978	28.5	6.6	2.2
1979	28.9	6.5	2.2
1980	28.4	6.2	2.2
1981	28.2	5.9	2.2
1982	26.9	6.1	2.1
1983	26.3	6.2	2.0
1984	25.1	6.5	1.9
1985	24.6	6.2	1.8
1986*	22.3	6.0	1.6
1987*	21.9	5.9	1.6
1988*	20.7	5.8	1.5
1989*	21.3	6.2	1.5
1990*	20.0	5.8	1.4

Source: Statistical Unit, Registrar General's Department

"*" indicates tentative values.

Table 4 Demographic Transition Indices of Asian Countries

Country	Index	(Ranking)
1. Japan	1.00	(3)
2. Hong Kong	1.02	(1)
3. Singapore	1.01	(2)
4. Cyprus	0.89	(5)
5. Israel	0.90	(4)
6. South Korea	0.84	(6)
7. China	0.76	(7)
8. Sri Lanka	0.71	(12)
9. Malaysia	0.68	(13)
10. North Korea	0.72	(11)
11. Lebanon	0.75	(8)
12. Thailand	0.63	(16)
13. Bahrain	0.73	(9)
14. Turkey	0.64	(15)
15. Kuwait	0.73	(10)
16. United Arab Emirates	0.67	(14)
17. Philippines	0.67	(18)
18. Qatar	0.63	(17)
19. Indonesia	0.51	(20)
20. Burma	0.50	(22)
21. Vietnam	0.49	(23)
22. Mongolia	0.54	(19)
23. India	0.48	(24)
24. Iran	0.51	(21)
25. Iraq	0.48	(25)
26. Jordan	0.44	(26)
27. Syria	0.40	(28)
28. Saudi Arabia	0.43	(27)
29. Cambodia	0.31	(29)
30. Bhutan	0.29	(31)
31. Bangladesh	0.28	(33)
32. Pakistan	0.30	(30)
33. Nepal	0.27	(34)
34. Laos	0.26	(35)
35. Oman	0.23	(36)
36. People's Democratic Republic of Yemen	0.29	(32)
37. East Timor	0.22	(37)
38. Yemen Arab Republic	0.22	(38)
39. Afghanistan	0.16	(39)

Source: Asian Population and Development Association, "Demographic Transition and Development in Asia", 1989.

Table 5 Internal Migration

District	1963 - 1971		1971 - 1981	
	Number	%	Number	%
Colombo	+39,237	+1.16	-96,936	-6.07
Gampaha	-	-	+35,010	+2.74
Kalutara	-9,472	-1.39	-31,593	-4.06
Kandy	-74,055	-6.64	-185,686	-18.06
Matale	-5,349	-1.88	-32,114	-9.57
Nuwara Eliya	-22,593	-5.33	-78,424	-12.72
Galle	-19,502	-2.83	-46,481	-6.01
Matara	-46,111	-8.37	-69,319	- 11.28
Hambantota	-2,201	-0.72	+725	+0.19
Jaffna	-36,250	-5.52	-30,468	-4.00
Mannar	+1,846	+2.68	+12,317	+13.83
Vavuniya	+5,671	+6.92	+11,284	+14.80
Mullaittivu	-	-	+18,647	+31.86
Batticaloa	+2,126	+0.94	-5,987	-2 .05
Amparai	-2,023	-0.83	+40,819	+12.49
Trincomalee	+6,430	+3.94	+1,491	+0.68
Kurunegala	-22,238	-2.37	-30,923	-27.72
Puttalam	+2,569	+0.75	+10,054	+2.32
Anuradhapura	+25,120	+7.51	+71,209	+14.83
Polonnaruwa	+15,694	+11.31	+50,712	+24.36
Badulla	-32,479	-5.71	-102,251	-16.28
Monaragala	+16,369	+10.06	+14,359	+6.23
Ratnapura	-862	-0.14	-33,173	-4.52
Kegalla	-24,010	-3.89	-62,340	-9.40

Source: Census of Population, General Report, 1981

Table 6 Trends in Urbanization

		1950	1955	1960	1965	1970	1975	1980	1985	1990	1995	2000	2005	2010	2015	2020	2025
Population (in millions)	Total	7.68	8.72	9.89	11.16	12.51	13.60	14.82	16.11	17.21	18.32	19.38	20.39	21.46	22.54	23.55	24.45
	Urban	1.11	1.40	1.77	2.22	2.74	3.00	3.20	3.40	3.68	4.10	4.69	5.49	6.59	7.80	9.09	10.41
	Rural	6.57	7.32	8.12	8.95	9.78	10.60	11.62	12.71	13.53	14.22	14.69	14.89	14.87	14.75	14.47	14.04
Share of urban population		14.41	16.09	17.92	19.86	21.87	22.04	21.57	21.10	21.37	22.38	24.21	26.95	30.69	34.59	38.58	42.59
Share of agricultural population		58.05		58.56		55.28	54.33	53.36	52.52	51.69	50.86	50.03		48.37		46.69	45.84

		1950 -1955	1955 -1960	1960 -1965	1965 -1970	1970 -1975	1975 -1980	1980 -1985	1985 -1990	1990 -1995	1995 -2000	2000 -2005	2005 -2010	2010 -2015	2015 -2020	2020 -2025
Population growth rate (annual)	Total	2.55	2.51	2.43	2.28	1.67	1.71	1.67	1.32	1.25	1.13	1.01	1.02	0.89	0.88	0.75
	Urban	4.76	4.67	4.48	4.21	1.83	1.28	1.23	1.57	2.18	2.70	3.15	3.63	3.38	3.06	2.72
	Rural	2.16	2.07	1.95	1.77	1.62	1.83	1.79	1.25	0.99	0.65	0.27	-0.03	-0.17	-0.38	-0.60

Source: Asian Population and Development Association, "Urbanization of Populations in Asia", 1991.

Table 7 International Migration

Year	Influx	Outflow	Net migration	Net migration rate
1971	70,502	104,257	-33,755	-2.7
1972	93,082	134,614	-41,532	-3.2
1973	123,610	173,723	-50,113	-3.8
1974	135,347	189,032	-53,685	-4.0
1975	166,807	197,403	-30,596	-2.3
1976	187,494	239,112	-51,618	-3.8
1977	224,925	276,993	-52,068	-3.7
1978	314,684	355,084	-40,400	-2.8
1979	374,728	418,307	-43,579	-3.0
1980	415,550	483,596	-68,046	-4.6
1981	522,082	572,344	-50,262	-3.3
1982	564,009	655,454	-91,445	-6.0
1983	525,251	629,662	-104,411	-6.8
1984	551,293	628,175	-76,882	-4.9
1985	495,324	504,573	-9,249	-0.6
1986*	462,179	463,009	-830	-0.1
1987*	392,165	453,962	-43,797	-2.7
1988*	426,634	477,459	-50,825	-3.1
1989*	421,475	441,081	-19,606	-1.2

Source: Registrar General's Department

"*" indicates tentative values.

Table 8 Trends in the Overseas Dispatch of Workers

(Units: persons)

	1986	1987	1988	1989	1990
Specialists	86	34	60	122	120
Intermediate professions	1,188	1,445	1,244	1,466	1,676
Skilled workers	3,619	3,413	4,551	6,849	11,152
Unskilled workers	5,793	5,495	4,592	4,647	8,854
Maids	6,174	5,062	7,367	11,640	20,822
Others	17	0	0	0	0
Total	16,809	15,359	17,814	24,724	42,624

Source: Statistics of the Sri Lanka Bureau of Foreign Employment

Table 9 Amount of Remittances

Year	Amount of remittances (in millions of rupees)	% with respect to exports
1970	18	1
1971	20	1
1972	24	1
1973	48	2
1974	54	2
1975	60	2
1976	108	2
1977	190	3
1978	610	5
1979	935	6
1980	2,518	14
1981	4,430	21
1982	6,024	28
1983	6,916	28
1984	7,653	20
1985	7,920	22
1986	8,873	26
1987	10,324	25
1988	11,194	24
1989 (through June)	5,406	24

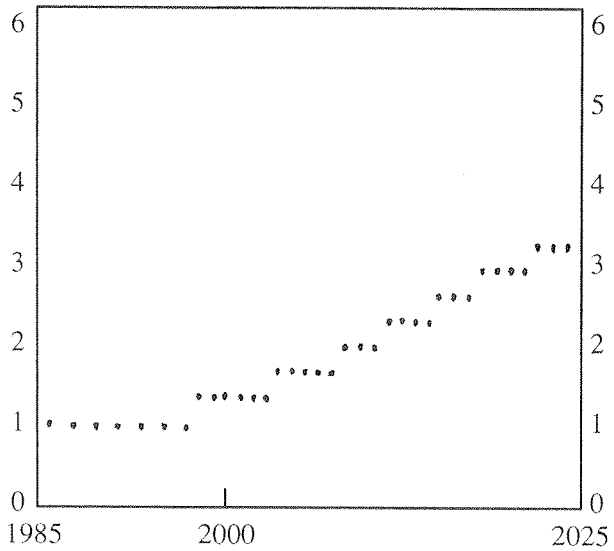
Source: Same as Table 8.

Table 10 Projected Future Population

Year	Total	Males	Females
1990	17,017	8,623	8,394
1991	17,243	8,732	8,511
1992	17,461	8,837	8,624
1993	17,673	8,939	8,734
1994	17,880	9,039	8,842
1995	18,085	9,137	8,948
1996	18,286	9,233	9,053
1997	18,482	9,327	9,155
1998	18,675	9,419	9,256
1990	18,866	9,510	9,356
2000	19,058	9,602	9,456
2005	20,006	10,054	9,952
2010	20,901	10,479	10,422
2015	21,657	10,832	10,824
2020	22,276	11,116	11,160
2030	23,076	11,462	11,614
2040	23,266	11,509	11,757

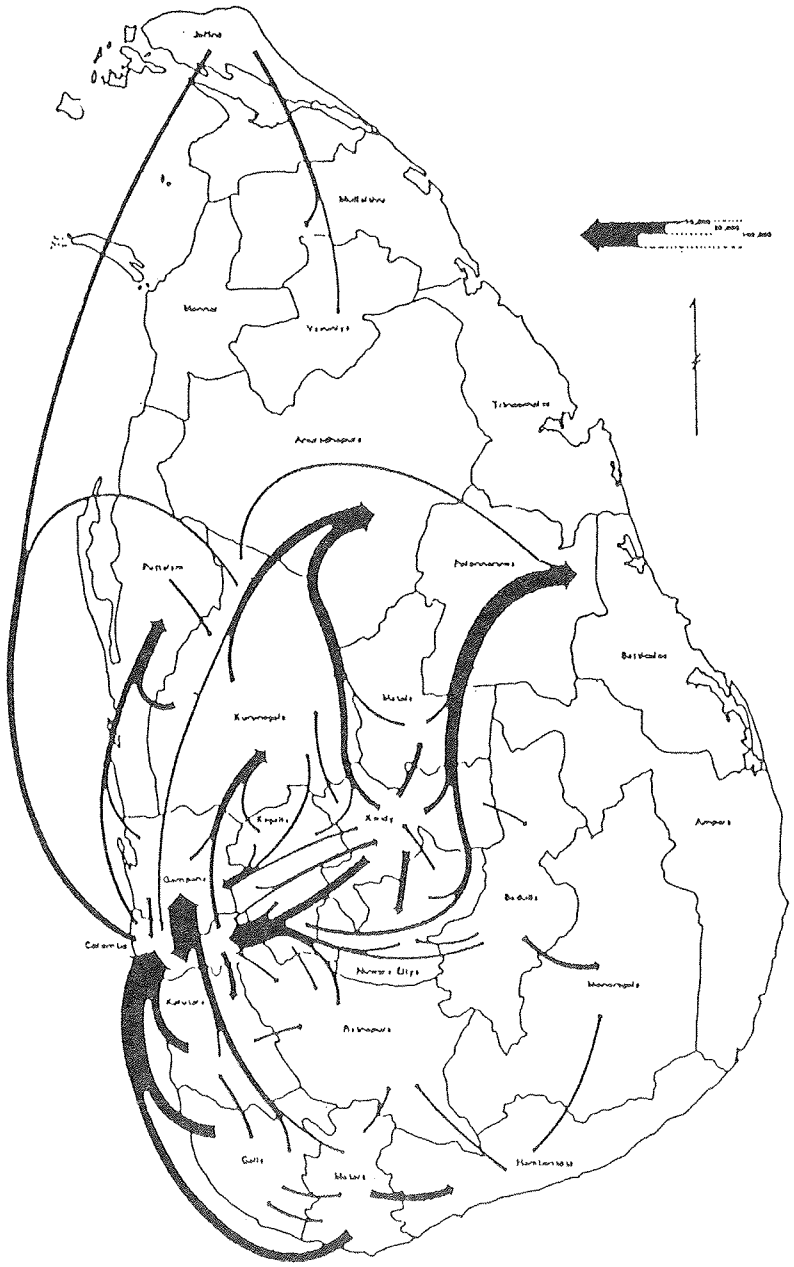
Source: Population Division, Ministry of Health and Women's Affairs

Figure 1 Urbanization in Sri Lanka



Source : Same as Table 6.
Note : Values are indices with 1985 as 1.

Figure 2 Flows of Internal Population Migration (lifetime migration, 1981)



Source : Department of Census Statistics, Census of Population and Housing 1981, General Report, vol. 3, 1986.

Note : Only movements of over 10,000 persons are indicated.

Chapter Three

HEALTH AND MEDICAL CARE SITUATION

1. Health and Medical Care

(1) General environmental hygiene

Due to its small size and population growth, Sri Lanka has a population density of 262.9 persons per km² (compared to 252 in India and 327 in Japan). In the Colombo area, in particular, the density is extremely high at 2,605 persons per km². The higher the population density, the more important environmental issues.

In 1981, the sources of drinking water were: tap water (17.7%), wells (72.9%), river tanks (7%) and others (2.5%). 28.3% of the wells were uncovered.

One out of three homes has no toilet. The percentages of the different types of toilets are: flush toilets (4.8%), water seals (22.1%), pits (37.7%), bucket types (1.9%) and no toilets (33.5%). In the Colombo area, 20.6% of the toilets are of the flush type, but the area with the next highest percentage is Jaffna at 8.0%. In March, 1992, the government set up a Presidential Task Force (PTF) and set targets for health policies for the year 2002. These targets include a 100% diffusion rate of tap water and 100% rate of sewage treatment. Other targets were also set for the infant mortality rate, the average lifespan and various infectious diseases. Public hygiene services are conducted by MOHs (Medical Officers of Health) for the promotion of health, including the above targets, and the prevention of disease.

(2) Health care services

The government is promoting primary health care with the goal of "health for all citizens" by the year 2000. For this purpose it has decided to promote health care services, public hygiene services, dental hygiene, medical treatment institutions, human resources, the use of the National Institute of Health Sciences (NIHS), medical expenses, qualitative improvements in the supply of medical equipment, medico-legal services, and the use of the National Poison Information Centre.

Furthermore, laboratory services (for various tropical diseases and general environmental hygiene), training, blood transfusion services and malignant tumor control units were established in 1980 for the registration, early detection and treatment of cancer. In addition, community health services such as maternal health care, family planning, environmental health, quarantines and epidemiological surveillance are also conducted.

(3) Health expenditure

Health expenditure in 1991 was 5,438,000,000 rupees (RS), equivalent to 5% of total government expenditure (an increase of 1.03% over the previous year) and 1.6% of the GNP (a decrease of 30% over the previous year). 93.8% of this came from consolidated funds, 6.2% from foreign aid.

2. Current Situation of Medical and Health Institutions and Medical Personnel

(1) Medical institutions

In 1991, there were 427 hospitals with a total of 42,437 beds in Sri Lanka (not including the eastern and northern provinces), or 2.9 beds per 1,000 inhabitants (compared to 10.1 in Japan) and 178.6 inpatients. Table 1 shows the breakdown.

In addition, there are specialized hospitals under the direct jurisdiction of the Ministry of Health for tuberculosis (1,197 beds), leprosy (117 beds), psychiatry (2,531 beds), cancer (552 beds), etc. There is also a mental institution with 338 beds for long-term male patients, a hospital with 282 beds for rheumatics and rehabilitation, a hospital with 143 beds for patients with infectious diseases, a dental hospital with 62 beds and a police hospital for criminals. However, unlike the figures shown on the table, the duration of stay is 23.8 days for the cancer hospital, 60.4 days for the mental institution, and 18.8 days for the respiratory disease hospital, though overall this is decreasing yearly.

(2) Medical personnel

Table 2 shows the number of medical personnel per 100,000 inhabitants. By district, the number is highest in Colombo, where the rate is 50.5 medical officers per 100,000 inhabitants (compared to 164.9 in Japan). The next highest is Kandy at 17.6, indicating the great disparity between the regions. In 1991 there were 378 graduates of medical colleges (5 years of study), 44 graduates of dental colleges (5 years of study), and 1,195 graduates of nursing schools (3 years of study). In addition a total of 38 Ayurveda hospitals and 90 Ayurvedic Central Dispensaries were responsible for the treatment of 1,920,000 out-patients and 20,000 in-patients.

3. Cause of Death and Disease Structure

(1) Causes of Hospitalization and Morbidity

We were not able to obtain materials showing the cause of death and disease structure for Sri Lanka as a whole, only hospital statistics, so we will infer the overall situation from these hospital statistics. Table 3 shows the 10 leading causes of hospitalization in 1991. The top three remain unchanged from 1985, but malaria has increased (from 8th to 4th place), as have causes 6, 8 and 10.

The leading cause of morbidity among out-patients is symptoms, signs and ill-defined conditions (19.1% of the total), followed in order by diseases of the respiratory system (12.9%), diseases of the musculoskeletal system and connective tissue (10.5%), parasitical diseases (9.3%), and malaria (9.0%). The six leading causes of out-patient morbidity among infants are diseases of the respiratory system (28.2%), symptoms, signs and ill-defined conditions (22.1%), intestinal infectious diseases (9.4%), diseases of the skin and subcutaneous tissue (7.1%), diseases of the upper respiratory tract (6.9%) and malaria (6.6%). 25% of out-patients have infectious diseases or parasitical diseases, and 55% are women.

(2) Cause of death structure

According to Sri Lanka's birth and death registration laws, deaths are reported, but most deaths are registered by families, and only 10% are registered by qualified Western medical doctors. Thus, there are no accurate statistics on the causes of death. 30 to 35% of recorded deaths take place at government-related hospitals. Table 4 shows the leading causes of hospital deaths in 1991. Table 5 shows age specific causes of death. 34% are diseases which can be considered adulthood diseases. The percentage of suicides is high among pesticide poisonings, the 4th leading cause of death. 59% of the deaths due to gastrointestinal diseases

are diseases of the liver, including cirrhosis. As for the sex differentials in the mortality rate, mortality has been higher among males since 1963. In 1987 the death rate per 1,000 inhabitants was 7.1 for males, 4.7 for females. Accidents and poisonings are increasing due to the changes in lifestyles and industrialization, as represented by the liberalization of the import of cars and motorcycles and the expanding market for agricultural chemicals. 43% of external wounds and poisonings are from attempted suicide. 77% of suicides are in the 15 to 44 age bracket, and most of these cases are males.

Cancer is the third leading cause of death in the 40 to 69 age bracket, and 5,500 new cases are discovered each year. The most common types of cancer in Sri Lanka are oral cancer, breast cancer, cervical cancer of uterus, and cancer of the esophagus. These are found mostly between the ages of 50 and 60, and together account for 60% of all cancer. Leukemia is high among infants. Cancer of the liver is high among males. 90% of all cancer patients are registered. There are many people who do not have accurate knowledge of cancer, so education is needed.

(3) Crude birth rate, neonatal mortality rate, infant mortality rate and maternal mortality rate

The crude birth rate, neonatal mortality rate, infant mortality rate and maternal mortality rate have all been decreasing yearly (see Table 6). However, there are major differences between regions. The crude birth rate is 27.4 in Batticaloa but 12.7 in Jaffna. The neonatal mortality rate is 32.6 in Nuwara Eliya but 4.5 in Monaragala (compared to 5.7 in Japan), a difference of 7.2 times. For the infant mortality rate as well, there is a difference of 3.8 times between Ratnapura at 31.4 and Monaragala at 8.3 (4.4 in Japan), and the maternal mortality rate is 2.1 in Mullaittivu but only 0.1 in Colombo and Hambantota (0.09 in Japan). Most causes of infant mortality are infectious diseases, including diseases of the respiratory system and parasites, and infectious diseases and parasites account for 44% of gastrointestinal diseases.

(4) Poison information center

In 1991, there were 479 inquiries by telephone to the National Poison Information Centre. Of these, 37.4% concerned pesticides, 19% industrial chemicals, 16.7% drugs and therapeutic agents, 5.9% household chemicals, 10% plant poisons, 1% poisonous snakes, 0.2% agrochemicals, and 9.8% others. Of the 328 cases of poisonings in which the causes were clear, 63.4% were self-poisonings, 34.5% accidental, 1.2% homicidal, and 0.9% occupational. By age group, the most frequent poisonings were in the 19 to 25 bracket (27.6%), followed by the 26 to 40 bracket (21.8%), and the 0 to 5 bracket (13.6%). 52.9% of the cases involved men, 41.3% involved women.

4. Countermeasures Against Infectious Diseases

(1) Malaria

The incidence of malaria is high in Sri Lanka. In 1991, approximately 1.4 million blood film examinations were conducted, and approximately 400,000 cases were positive. It is important that insecticides be sprayed and that patients be discovered and treated.

(2) Tuberculosis

The number of newly registered cases of tuberculosis is decreasing yearly. In 1991 there were 6,174 new cases (35.8 per 100,000 inhabitants). Incidence increases with age, from 3.3 between 0 and 14, to 18.6 between 15 and 24, 39.7 between 25 and 34, and peaks at 106.8 between 65 and 74. 66.3% of newly registered cases are males (46.1 for males, 24.8 for females). It is important to spread BCG vaccination and health education. Public hygiene is a major issue.

(3) Filariasis

The incidence of filariasis is high along the coastline from the southwest to the south of the country. The number of people receiving blood tests is decreasing, due to the increasing number of people refusing to give blood unless new needles are used for fear of AIDS. Microfilaria is present in 0.3 percent of blood samples.

(4) Sexually transmitted diseases

In 1991 there were 8,561 new cases of venereal disease, including 1,312 cases of gonorrhoea, 992 cases of syphilis and 818 cases of herpes genitalis. However, it is estimated that the actual number of cases is 5 to 6 times higher than this figure. The incidence of sexually transmitted disease is highest between the ages of 20 and 29, and affects mostly laborers and traders.

(5) AIDS

As of 1991, 47 persons had been diagnosed as HIV positive (11 foreigners and 36 Sri Lankans), of which 11 had developed full-blown AIDS and 8 had died. The estimated number of people infected with HIV is 1,500. The male:female ratio is 4:1, and the incidence is highest in the 20 to 49 age bracket.

(6) Hansen's disease

An estimated 12,000 people have Hansen's disease, and 2,881 new cases were registered in 1991.

(7) Rabies

The estimated number of dogs in the country is 2 million, one for every 8 persons. Over the past 35 years there have been 7,200 deaths from rabies. There is a need to exterminate stray dogs and spread vaccination.

(8) Other infectious diseases

In 1991, 4 cases of polio, 1 case of diphtheria, 25 cases of pertussis, 188 cases of tetanus, 6 cases of neonatal tetanus and 1,896 cases of rubeola were reported.

(9) Vaccination

The rate of vaccination is 89% for BCG, 87% for DPT, 86.3% for OPV, and 79.2% for rubeola.

5. Conclusion

We cannot judge the overall health and medical care situation in Sri Lanka based on limited statistical materials. Furthermore, the statistical values gathered here themselves do not accurately reflect reality. However, to judge from the disease and cause of death structure, we can say that measures for protecting maternal health and counteracting disease should be stressed and that there is a need for improved medical institutions, manpower, and improvements in education.

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Table 1 Number of Hospitals, Beds, Duration of Stay and Occupancy Rate (1991)

	Teaching hospitals	Provincial hospitals	Base hospitals	District hospitals	Peripheral units	Rural hospitals	Maternity homes and central dispensaries	Other hospitals	Total	Beds per 1,000 inhabitants
No. of institutions	10	6	15	109	100	109	62	16	427	--
No. of beds	9,499	4,741	5,329	11,062	4,512	2,501	655	4,138	42,437	2.9
Duration of stay	6.0	5.2	4.3	3.3	3.0	3.5	4.2	--	--	--
Bed turnover rate	59	71	80	68	81	56	11	--	--	--
Bed occupancy rate	98	102	95	62	66	55	13	--	--	--

Table 2 Medical Personnel (1991)

Occupation	Number	Rate per 100,000 inhabitants	Occupation	Number	Rate per 100,000 inhabitants
Curative medical officers	2,609	15.1(164.9)	Public health midwives	3,583	20.7
Administrative and preventive medical officers	170	1.0	Hospital midwives	1,776	10.3 (18.2)
Dental surgeons	358	2.1 (58.3)	Pharmacists	494	2.9 (72.8)
Registered/assistant medical officers	1,201	7.0	Dispensers	683	4.0
Nurses	9,934	57.5(639.5)	Medical laboratory technologists	588	3.4
Medical officers of health	155	0.9	Radiographers	245	1.4
Public health nursing sisters	101	0.6 (21.6)	Physiotherapists	168	1.0
Public health inspectors	914	5.3	Attendants	5,697	33.0

Figures in parentheses are values for Japan in 1990.

Table 3 10 Leading Causes of Hospitalization (1991)

Rank	Disease	Cases (no. people)	% of total cases	Cases per 100,000 inhabitants [NOT DEATHS]
1	Diseases of the respiratory system (not including upper respiratory tract, pneumonia, bronchopneumonia and influenza)	211,315	9.6	1,435.3
2	Signs, symptoms and ill-defined conditions	194,008	8.8	1,317.7
3	Traumatic injuries	184,907	8.4	1,255.9
4	Malaria	121,439	5.5	824.8
5	Intestinal infectious diseases	118,122	5.4	802.3
6	Diseases of the musculoskeletal system	89,957	4.1	611.0
7	Viral diseases	83,937	3.8	570.1
8	Diseases of the gastrointestinal tract	76,698	3.5	520.9
9	Diseases of skin and subcutaneous tissue	74,628	3.4	506.9
10	Other injuries and early complications of trauma	61,420	2.8	417.2

(Excludes Northern and Eastern Provinces.)

Table 4 10 Leading Causes of Hospital Deaths (1991)

Rank	Disease	Cases (no. people)	% of total cases	Cases per 100,000 inhabitants [NOT DEATHS]
1	Ischaemic heart disease	2,669	10.9	18.1 (41.8)
2	Cerebrovascular disease	2,304	9.4	15.6 (96.2)
3	Diseases of the pulmonary circulation and other forms of heart disease	1,849	7.6	12.6 (94.3)
4	Pesticide poisoning	1,667	6.8	11.3 (2.7)
5	Diseases of the gastrointestinal tract	1,617	6.6	11.0
6	Malignant neoplasms	1,536	6.3	10.4 (181.7)
7	Diseases of the respiratory system (not including upper respiratory tract, pneumonia, bronchopneumonia and influenza)	1,217	5.0	8.3
8	Pneumonia and bronchopneumonia	1,067	4.4	7.2 (56.9)
9	Signs, symptoms and ill-defined conditions	1,042	4.3	7.1 (24.5)
10	Slow fetal growth, fetal malnutrition and immaturity	1,011	4.1	6.9

Figures in parentheses are values for Japan in 1991.

Table 5 Age Specific Mortality Rates (per 100,000 inhabitants) (1987)

Cause of death	Under 1 year	1 - 4	5 - 9	10 - 14	15 - 19	20 - 24	25 - 29	30 - 39	40 - 49	50 - 59	60 - 69	70 & over	Total
1. Signs, symptoms and ill-defined conditions	185.3	41.1	16.6	10.0	11.7	16.3	21.1	30.2	67.0	177.0	644.9	4947.7	193.8
2. Diseases of the circulatory system	61.0	8.2	4.7	4.7	6.8	13.4	19.4	39.8	115.5	310.2	641.0	1156.3	98.8
3. Other external causes of injury and poisoning	31.9	17.4	15.2	21.5	75.1	133.7	120.9	101.3	96.5	105.9	141.5	196.0	78.6
4. Diseases of the nervous system	87.2	15.6	10.0	6.1	7.2	9.2	9.3	13.2	20.5	63.2	231.7	699.8	43.5
5. Diseases of the respiratory system	197.4	24.5	5.7	4.3	4.0	6.7	7.5	12.4	28.1	74.5	159.6	304.9	33.7
6. Infectious and parasitic diseases	131.9	41.2	15.2	8.7	7.2	10.0	11.3	19.2	33.0	63.8	119.1	237.4	33.6
7. Malignant neoplasms	3.8	3.0	3.3	2.5	4.5	4.3	5.6	12.8	45.5	102.9	172.1	194.2	26.8
8. Diseases of the gastrointestinal tract	21.0	5.9	3.9	1.8	2.7	2.9	4.9	13.8	39.8	58.8	65.4	67.0	16.3
9. Intestinal infections diseases	57.4	27.2	6.9	3.3	2.4	2.9	3.2	5.1	9.9	21.7	46.1	132.8	14.5
10. Transport accidents	1.4	1.3	2.5	2.4	4.5	9.3	10.7	11.2	13.4	16.2	20.5	29.3	8.4
11. Endocrine and metabolic diseases and immunity disorders	7.3	1.2	0.2	0.4	0.5	1.2	1.5	2.8	8.5	22.1	55.0	104.9	8.2
12. Diseases of the urinary system	7.8	1.7	0.9	1.3	1.6	2.9	2.6	4.7	10.2	17.8	30.8	64.9	6.9
13. Diseases of the musculoskeletal system and connective tissue	0.7	0.4	0.1	0.3	0.3	0.4	0.6	1.1	2.5	7.4	22.2	109.5	4.8
14. Diseases of blood and blood forming organs	5.7	2.0	0.8	0.6	1.2	2.0	3.1	2.3	5.8	10.4	20.1	36.0	4.3
15. Nutritional deficiencies	22.0	5.3	1.2	0.6	0.5	0.2	1.0	1.2	2.0	4.6	8.1	13.5	2.8
16. Mental disorders	2.4	0.2	0.1	0.3	0.1	0.7	1.3	2.7	6.1	7.6	11.5	10.2	2.4
17. Congenital anomalies	42.8	2.5	2.4	0.8	0.8	0.7	1.1	0.9	0.7	0.8	2.1	4.0	2.4
18. Accidental poisonings	0.7	0.6	0.3	0.3	1.8	2.7	2.8	2.1	1.7	1.7	4.0	2.3	1.6
19. Diseases of skin and subcutaneous tissue	5.2	0.4	0.0	0.0	0.2	0.1	0.4	0.4	0.6	1.7	1.7	3.3	0.6
20. Infant perinatal disorders	1291.6+											1291.6	
21. Complications of pregnancy, childbirth and puerperium				1.7*	3.3*	4.3*	4.8*	1.3*				3.2*	
All causes	1909.2	172.5	83.5	66.6	131.4	218.7	227.4	274.8	498.5	1047.7	2353.8	8184.2	597.1

* Rates based on female population + Related to registered births

Table 6 Crude Birth Rate, Neonatal Mortality Rate, Infant Mortality Rate and Maternal Mortality Rate

Year	Crude birth rate	Neonatal mortality rate	Infant mortality rate (per 1,000 births)	Maternal mortality rate (per 1,000 births)
1945	36.6	75.5	140.0	16.5
1950	40.4	49.2	82.0	5.6
1955	37.3	45.3	71.0	4.1
1960	36.6	34.2	57.0	3.0
1965	33.1	33.3	53.2	2.4
1970	29.4	29.7	47.5	1.5
1975	27.7	27.0	45.1	1.0
1980	28.4	22.7	34.4	0.6
1985	24.6	16.2	24.2	0.5
1990	20.0	--	19.3	--

Chapter Four

REPORT ON FIELD SURVEY

Introduction

This survey was conducted in Sri Lanka from July 12 through July 26. The itinerary was planned principally by Dr. Neville Fernando M.P., Vice Chairman, Sri Lankan Parliamentarians for Population and Development. Three areas were visited: Colombo, the Nuwara Eliya district, and the Kalutara district. As described in the survey objectives, mainly health and medical care institutions were visited, including a hospital and institutions in the fields of population and family planning.

1 Activities of Related Institutions

(1) Family Planning Association of Sri Lanka

The Family Planning Association of Sri Lanka, established in 1953, is a private organization supporting family planning in Sri Lanka. It currently has a staff of 175 persons,

of which 35 are dispatched to various fields. In Sri Lanka, it appears that contraceptives are distributed free of charge at various types of medical institutions. The Family Planning Association, however, sells contraceptives (the pill, condoms, etc.) at low prices, and the profits account for 50% of the association's budget for activities. Furthermore, the associations sells contraceptives in substantial numbers, so financially it is quite successful, and this success sustains its dynamic family planning activities.

Considering the general situation throughout the world, it is not an exaggeration to say that overall family planning activities are on the decline. The Family Planning Association of Sri Lanka, however, is highly active on various fronts. The following are the association's main activities:

(1) Contraceptive education and services (counseling, medical programs, holding various types of training and workshops, etc.)
(2) Population education and vocational training for young people
(3) Establishing health care education and young counseling centers, etc.
(4) AIDS education
(5) Surveys and research
(6) Other activities.

In part as a result of the association's resolute activities, 145,000 persons in 1990 and 87,000 in 1991 began family planning activities.

(2) Current situation in Sri Lanka as seen by various international organizations and their activities

Here we will briefly describe the structures of two international organizations, their views of the current situation in Sri Lanka, and what activities they are involved with (or are planning to be begin).

a. United Nations Population Fund (UNFPA)

The UNFPA staff consists of two persons, one employee dispatched by the UNFPA and one local secretary. The UNFPA considers that the various social, economic and demographic indices for Sri Lanka demonstrate that the situation in Sri Lanka is extremely good compared to other South Asian countries.

Currently, the UNFPA is active in a variety of areas, including maternal health care and family planning programs, family planning, family life education, IEC (Information, Education and Communications) projects, training and research in the field of population, and so on. Overall, however, it appears that the UNFPA is now shifting its emphasis from family

planning programs per se to IEC projects designed to lay the foundations for the acceptance of family planning programs.

For example, in preparation for the implementation of an IEC project, the UNFPA has just completed surveys in various regions to select priority regions to be pilot areas, in cooperation with the Population Division of the Ministry of Health and Women's Affairs. The IEC project will begin once the priority regions are selected based on these results, with these regions as pilot areas.

b. World Bank

The World Bank staff consists of a total of six persons, including one headquarters' employee and five locally hired employees (specialists in the fields of agriculture, industry, anthropology, economics and agricultural engineering). The World Bank considers that Sri Lanka is the most developed country in South Asia in all aspects. For example, it has achieved a high standard of public hygiene, elementary and intermediate education for women is extremely widespread, and higher education for women is also good. The performance of the economy is also improving at present. The leather and textile industries in particular are internationally competitive and have the capacity for creating employment.

Still, there are many problems. With the progress of industrialization, environmental issues are becoming apparent. Problems produced by poverty, such as malnutrition, are currently the most serious issues, and to overcome them it will be necessary to make improvements to malnutrition and to promote health care. Furthermore, environmental improvement projects are necessary in large urban areas to deal with such issues as water supplies, waste disposal, and the resettling of slum dwellers. Of these, the World Bank appears to consider the problem of malnutrition due to poverty as the most important problem.

What is distinctive in the perception of the World Bank, however, is that it believes Sri Lanka has currently surpassed the stage of attempting to approaching these different problems individually, and has entered the stage of trying to approaching them systematically. It appears to be establishing a concept for approaching such problems as poverty, the resettlement of slum dwellers, public hygiene, education, the environment, and social capital in an integrated fashion. We may add that the World Bank seems to believe that Sri Lanka is somewhat weak when it comes to the capacity of managing individual projects as part of an integrated whole.

2 Surveyed Areas

(1) Nuwara Eliya district

The Nuwara Eliya district is located at the center of Central Province. The entire district consists of highlands with an altitude of over 1,000 meters, and Nuwara Eliya city, the district capital, is located at an altitude of 2,000 meters.

Many clear streams run through the district, and hills covered by fields of tea and highland vegetables can be seen throughout the district.

The average annual temperature in the Nuwara Eliya district is a cool 16.1°C, and there is always a temperature difference of more than 10°C with Colombo and other areas.

The district covers an area of 1,718.7km², consisting of Nuwara Eliya division (486.4km²), Ambagamuwa Korele division (477.8km²), Walapane division (303.6km²), Hanguranketha division (231km²) and Kotmale division (219.9km²).

The population of Nuwara Eliya district is 706,768 (*1) as of 1992, by no means high as compared to other districts. As can be seen on Table 1, which shows the population of the different divisions, the population of the entire district grew by 103,191 persons over the last 11 years (1981 to 1992).

From Table 2 showing the trends in the population of the district, we can see that the population grew by 4.6 times from 1901 to 1992, from 153,038 to 706,768. With this, the population density increased from 89 inhabitants per km² in 1901 to 411.2 per km² in 1992.

The population growth rate in the Nuwara Eliya district is the highest of any district in all of Sri Lanka. In 1987, the crude birth rate in the district was 27.4 and the crude death rate was 7.6, so the population growth rate was 1.98%. For all of Sri Lanka, the average annual crude birth rate was 21.9 and the crude death rate was 5.9, so the population growth rate was 1.6%.

In 1990, the crude birth rate in the Nuwara Eliya district was 27.8, the crude death rate was 9.1, and the population growth rate was 1.87%. For all of Sri Lanka, in 1990 the crude birth rate had fallen to 21.3, the crude death rate to 6.2 and the population growth rate to 1.5%.

One distinguishing feature of the population growth in Nuwara Eliya district is that the crude birth rate is not decreasing. This may be because family planning services are not as complete as in other regions. Another possible factor is that the hilliness of the Nuwara Eliya district impedes the activities of health nurses.

Now let us look at statistics on maternal and child health in the Nuwara Eliya district. The population growth rate of the Nuwara Eliya district is the highest in Sri Lanka, as stated

before, and the maternal and child health figures are likewise high.

In 1987, maternal mortality in the Nuwara Eliya district (per 1000 births, here and below) was 1.0, compared to the national average of 0.6. In 1990, this had fallen to 0.6 in the Nuwara Eliya district and 0.5 for Sri Lanka as a whole. Thus, maternal mortality in the Nuwara Eliya district improved somewhat over this period.

As for infant mortality (per 1000 births, here and below), in 1987 it was 51.5 in the Nuwara Eliya district, 28.4 for Sri Lanka as a whole. In 1990, the gap between the district and the national infant mortality continued to be more than two-fold, at 49.1 for the former, 23.2 for the latter.

The neonatal mortality figures (per 1000 births, here and below) show the same trend as infant mortality. Neonatal mortality in the Nuwara Eliya district was 31.9 in 1987, 34.8 in 1988, and 32.1 in both 1989 and 1990. This compares to the national figures of 17.3 in 1987, 17.7 in 1988, and 16.2 in 1989 and 1990. The figures in the Nuwara Eliya district are roughly twice as high as the average for Sri Lanka.

The major factors for the high infant and neonatal death rates in the Nuwara Eliya district are thought to be the poorer access to health care services as compared to other districts due to the poor geographical conditions, and the fact that there is a high rate of delivery at home. Furthermore, if we look at vaccination, a measure of prevention of infant and neonatal death, the BCG vaccination rate for the Nuwara Eliya district was 72.9% in 1987, but had fallen to 55.4% in 1990. This trend can also be seen in DPT (diphtheria, pertussis and tetanus) vaccination, whose rate fell from 79.1% in 1987 to 60% in 1990.

Ethnic groups

Table 3 shows the ethnic composition of Sri Lanka and the Nuwara Eliya district. Whereas in Sri Lanka as a whole over 70% of the population is Sinhalese, in the Nuwara Eliya district 42.7% of the population is Indian Tamils, slightly outnumbering the Sinhalese.

If Sri Lankan Tamils are included, Tamils account for a majority of 55.4% of the population. This is thought to be due to the fact that Indian Tamils were brought in to work on the Nuwara Eliya district's tea plantations. For the production of vegetables as well, often land owners are Sinhalese while the farm workers are Tamils. The small minority of Sri Lankan Moors are thought to be involved mostly in commercial activities in the cities, rather than in agriculture.

Religion

Table 4 shows the population of the district by religion. Because of the relationship

between ethnic group and religion, we can in general classify the Sinhalese as Buddhists, the Tamils as Hindus, the Moors and Malays as Islamic, and the Burghers as Christians.

As in Sri Lanka as a whole, in the Nuwara Eliya district the percentage of Christians is higher than percentage of ethnic group. This is because some Sinhalese and Tamils believe in Christianity. There is also a slight number of people of other ethnic groups who believe in Islam.

Industry

The climate of the Nuwara Eliya district is similar to Karuizawa in Japan. Despite being located on the equator, the Nuwara Eliya district is at an altitude of 1,500 to 2,000 meters, so it is used as a summer resort by both Sri Lankans and Europeans.

There are many villas and elegant hotels built in British colonial times in the area around Nuwara Eliya city.

The major industry is agriculture, but tourism is also an important source of revenue for the district. The Nuwara Eliya district is one of the major producers of tea and vegetables in Sri Lanka. The production of tea in particular is second only to the neighboring Kandy district. The tea acreage in the district accounts for 18% of the entire tea acreage of Sri Lanka. For vegetables, the district is also known for the production of potatoes. It is also one of the major producers of seed potatoes in the country.

In 1990, the total national production of potatoes was 50,947 tons in the Maha season, 35,882 tons in the Yala season. For the Nuwara Eliya district, production was 24,787 tons in the Maha season, 5,505 tons in the Yala season. Thus, the Nuwara Eliya district produced 50% of the national yield of potatoes in the Maha season, 18% in the Yala season. This shows that the Nuwara Eliya district has the most suitable natural conditions in Sri Lanka for the production of potatoes.

For other produce, the Nuwara Eliya district is the third largest production of millet in the nation in the Maha season, the fourth largest in the Yala season. Production of tomatoes, eggplants and carrots is also high, taking advantage of the high altitude.

Thus we have seen that the major industries of the Nuwara Eliya district are agriculture and tourism. The most important factor for this is the natural conditions. Continuing to take advantage of these conditions is likely the key to the district's development.

(2) Kalutara district

The Kalutara district belongs to the Western Province, the same as Colombo, and faces

the Indian Ocean. The district capital is the city of the same name, Kalutara, a very bustling city. Kalutara city is only 43 kilometers from Colombo, so it is within commuting range. The city is a resort area for Europeans and other foreigners. The Kalutara district is a fruit producing area, and in particular has the largest production of mangosteens in Sri Lanka.

The Kalutara district covers an area of 1,588.6km², consisting of Raigam Korale East division (264.8km²), Kalutara Totamuna North division (80.6km²), Kalutara Totamuna South division (71.2km²), Panadura Totamuna division (59.8km²), Gangaboda Pattuwa division (214.8 km²), Pasdun Korale South division (215km²), Pasdun Korale East division (328.9km²), Pasdun Korale West division (120.5km²), Raigam Korale West division (89km²) and Dodangoda division (117km²).

Population

The population of the Kalutara district is 945,000 as of 1991, making it about medium in size among the country's districts. The population has grown by 115,000 persons over the last ten years. As shown on Table 6, in 1991 the population density of the Kalutara district was over twice as high as the Sri Lankan average of 267 inhabitants per square kilometer. Also, the population of Kalutara city was only 34,000 in 1989, but the entire urban population of the district, including Panadura and other cities, accounted for 21.5% of the total population.

The district's average population growth rate over the last ten years has been only 1.39%, despite the yearly increase in marriages. This is thought to be a consequence of the high rate of implementation of family planning.

Now let us look at statistics on maternal and child health in the Kalutara district. In 1989, maternal mortality in the Kalutara district (per 1000 births, here and below) was 0.8, somewhat higher than the national average of 0.6. Infant mortality (per 1000 births, here and below) was 12, approximately half of the Sri Lankan average. These good maternal and child health statistics are thought to be due to the existence of exclusive maternity hospitals in the district, and the fact that access to health care services is better than in many other districts due to the proximity of Colombo.

Ethnic groups

Table 7 shows the ethnic composition of Sri Lanka as a whole and of the Kalutara district. Whereas in the Nuwara Eliya district the percentage of Indian Tamils is higher than the national average (see Table 3), in the Kalutara district the percentage of Sri Lankan Tamils is 11.7 points lower than the national average, and the percentage of Indian Tamils is 1.45 points lower. The percentage of Sinhalese is 13.1 points higher than the national

average. Other ethnic groups are represented in about the same percentages as the national average.

Religion

Table 8 shows the population of the district by religion. Whereas 87% of the Kalutara district is Sinhalese, the percentage of Buddhists is 2.7 points lower at 84.3%. In the same way, together Sri Lankan and Indian Tamils account for 5.05% of the population, but the percentage of Hindus is 0.65 points lower at 4.4%. On the other hand, the percentage of Burghers is only 0.05%, but 3.5% of the population is Christian. This shows that some Sinhalese, Tamils and Sri Lankan Moors believe in Christianity. The same trend was seen in the Nuwara Eliya district. We can say that in Sri Lanka people who believe in Christianity are a minority, but that the religion crosses the boundaries of ethnic groups.

Industry

Looking at the industry of the Kalutara district, we can immediately notice major differences with the Nuwara Eliya district. Agricultural production in the Nuwara Eliya district is centered around tea and vegetables, but in the Kalutara district the main agricultural products are rice, coffee, mangosteens and cinnamon and other spices.

Industrial production is also active, due in part to the district's proximity to Colombo. There are many factories in the district, including more than 120 small varied factories and factories producing lumber, bicycles, clothing, palm liquor, and so on.

Furthermore, as the Kalutara district is a resort area facing the Indian Ocean, there are 20 hotels catering to foreigners which are busy year-round. According to a district official, there are plans for eventually improving several hotels to five-star class to further promote tourism.

Concerning employment, however, in 1989 there were 76,629 unemployed, so solving the problem of unemployment is a major issue for the district.

3 Population Migration and Hospitals

(1) Population migration in Nuwara Eliya

Let us first look at the basic tendencies in population migration in Sri Lanka. Generally speaking, there are two distinctive features in population migration in Sri Lanka. The first is

that it is concentrated in the western provinces of Colombo, Gampaha and Kalutara, and particularly in the coastal areas. (Refer to Chapter 3, Figure 2.) The second is the trend in migration from the densely populated wet zones to the dry zones (Chapter 3, Table 5).

Now, let us look how population migration in Nuwara Eliya fits in within the above trends. One general point we can identify as far as our statistical data indicates is that there is a steady outflow of population from the area. 22,593 persons left the area in the period from 1963 to 1971 (-5.33%), 78,424 in the 1971-1981 period (-12.72%) (Chapter 3, Table 5).

Next, let us look at the direction of this population outflow. According to an analysis of the 1981 national census (Chapter 3, Figure 2), we can see the above two tendencies in the population outflow from Nuwara Eliya. In other words, there are two distinct flows, one towards Colombo, the other towards Polonnaruwa (in the dry zone). In this sense, Nuwara Eliya is typical example of a population outflow region.

The major factors causing this population migration can be divided into pull factors and push factors. First, the pull factors can easily be surmised from the destinations of this outflow of population (Colombo and Polonnaruwa). That is, there is no doubt that expectations for employment and higher salaries in the Colombo area and settlement in the area of the Mahaweli river system development plan being carried out in the Polonnaruwa area constitute strong factors (pull factors) which draw people from Nuwara Eliya to these areas.

Second, one push factor is the high population density in the Nuwara Eliya area. Nuwara Eliya has the highest population density in all of Sri Lanka, and the resulting demographic pressure is a factor (push factor) which drives people away. The cause of this high population density can be interpreted as follows: ① Because of the high infant mortality in Nuwara Eliya (as stated above), ② people want many children, so the birth rate also remains high (as stated above), causing ③ an increase in the population growth rate of the area (as stated above), and thus ④ the population density has grown.

Infant mortality is also an index of socioeconomic development and living standards. Thus, infant mortality is high in poorer societies, low in richer societies. If this is so, then we should be able to assume that the poverty of the Nuwara Eliya area is a major factor for raising people's expectations for employment and higher salaries in other areas.

However, information on recent trends obtained from the Nuwara Eliya Statistics Branch shows the exact opposite. According to this information, at least at the present stage there is virtually no outflow of population from the area. Also, there is a major contradiction between the analysis based on the 1981 national census mentioned above and the information obtained locally. That is, as previously stated, the infant mortality, birth rate and population growth rate in Nuwara Eliya in 1987 and 1990 continues to be high. Thus, though the push factors encouraging an outflow of population continue to be present, the output of population from Nuwara Eliya is decreasing.

We have reason to believe that the local information indicating that population outflow is decreasing is credible. This is because the Nuwara Eliya Statistics Branch estimates that the population of the area is increasing, as shown in Table 9 (population estimates of Nuwara Eliya by ethnic group). This demographic trend is reciprocal with the outflow trend shown in Table 5 (Chapter 3).

If so, to what factors does the local administration attribute the outflow of population in the 1963-1971 and 1971-1981 periods? The answers given by the local authorities can be summed up as follows:

① The population outflow before 1981, and in particular between 1971 and 1981, was a result of the fact that Tamil (both Sri Lankan and Indian) left to avoid the intense ethnic struggles at the time. (The tea plantations in the area employ many Tamil workers.)

② The living environment and infrastructure in the area is relatively highly developed, so people do not have a strong desire to emigrate from the area.

③ Thus, now that the ethnic struggle has subsided and the political situation is stable, it is natural that the outflow of population has stopped.

Which is correct, the conclusions reached based on past data or the information obtained from our field survey? We have no way of answering this question accurately at present. This is because it is not possible to verify this issue statistically since the results of the national census conducted in 1991 have not yet been made public for various reasons. If population outflow from Nuwara Eliya has subsided since 1981, this trend should be reflected in the 1991 national census.

We can conclude as follows: We cannot categorically dismiss the opinion of the local authorities that there are signs of changes in the population migration trends. However, we can also not assert that the trends of the past continue to persist at the present. It will be necessary to wait for the publication of the results of the 1991 national census and to study them carefully before we can make any conclusions about the population outflow from Nuwara Eliya.

(2) Kethumathi Hospital for Women

Though the Kethumathi Hospital for Women is a national hospital, it was established in 1979 by donations from the local inhabitants. From this fact we can infer that the local population places strong trust in the activities of the hospital.

Currently, the hospital has a staff consisting of 10 physicians, 36 nurses (of which 4 are head nurses), 22 midwives, and 52 employees. The hospital has a complete set of the necessary facilities, including 58 beds, a treatment room, an operating room, a laboratory, a patient

ward, facilities for premature infants, a pharmacy, a classroom and a blood bank. It also owns an ambulance. Our overall impression is that though it is not particularly large it is a clean and well-balanced hospital.

Now we will outline the medical activities of the Kethumathi Hospital for Women. The hospital ordinarily has some 38 in-patients and over 750 out-patients. There are approximately 500 births per month at the hospital, and 5 to 6 sterilizations per day. Treatment is free of charge for both in- and out-patients. The hospital seems to be involved not only in direct medical activities (treatment) but also active in the areas of educational activities and medical examinations for mothers and expectant mothers, vaccination, and so on.

The hospital has a blood bank with approximately 5 donors per day, and is self-sufficient in blood required for surgery and other purposes. This fact along with the manner in which the hospital was established indicate the deep interest in health of the local population. There is also a system in place by which blood can be obtained from a blood bank in Colombo should the hospital's own blood supply be insufficient.

As the above outline indicates, the Kethumathi Hospital for Women is not particularly large, but it is a clean, well-balanced hospital with a relatively complete set of facilities. Furthermore, it has a sufficient system of nursing, with a nurse-to-inpatient ratio of virtually 1:1. With this, the local population places extremely strong trust in the hospital. This is also evident in the fact that virtually all expectant mothers in the area give birth at this hospital.

Thus, the Kethumathi Hospital for Women conducts its medical activities smoothly based on the trust of the local population, but it is also facing two major problems. The first problem consists of financial difficulties, a problem faced by medical institutions in all countries. The second is the lack of medical equipment. For example, we heard complaints that the hospital has requested stethoscopes and other lacking equipment from the government but that the government is not forthright in supplying it. The hospital also desires such advanced equipment as intensive care units and CT scans.

Still, to judge from the feeling we perceived from our survey of the hospital, it seems that the hospital is not facing absolute insufficiencies as is the case in most developing countries, whether financially or in terms of medical facilities. The insufficiencies the hospital is facing are relative - basic necessities are being met. We believe that the very fact that these insufficiencies are relative tends to shroud the areas in which the hospital truly requires assistance, and this fact is the major obstruction to solving the hospital's problems. In this sense, we can say that Sri Lanka is now in the midst of experiencing the birth pains for proceeding to a higher level of development.

Table 1 Population of the Nuwara Eliya District by Division

(Units: persons)

Division	1981	1992
Nuwara Eliya	172,617	202,129
Ambagamuwa Korele	166,976	195,523
Walapane	93,938	109,998
Kotmale	92,493	108,306
Hanguranketha	77,553	90,812
Total	603,577	706,768

Source : Statistics Branch Kachcheri Nuwara Eliya
Note : Estimated population for 1992.

Table 2 Population Growth and Density in the Nuwara Eliya District

Year	Population (persons)	Population density (persons/km²)	Average growth rate (%)
1901	153,038	89	3.3
1931	235,775	137.2	3.6
1971	450,278	262	1.5
1981	603,577	351.3	3.0
1992	706,768	411.3	1.7

Source : Department of Census and Statistics
Note : Statistics Branch Kachcheri Nuwara Eliya for 1992.

Table 3 Ethnic Composition

(Units: persons)

	Sri Lankan total (1981) (%)	Nuwara Eliya district (1992) (%)
Sinhalese	10,980,000 (73.9)	297,864 (42.1)
Sri Lankan Tamils	1,887,000 (12.7)	89,519 (12.7)
Indian Tamils	819,000 (5.5)	301,498 (42.7)
Sri Lankan Moors	1,047,000 (7.1)	14,242 (2)
Burghers	39,000 (0.3)	815 (0.1)
Malays	47,000 (0.3)	1,331 (0.2)
Others	28,000 (0.2)	1,499 (0.2)
Total	14,847,000 (100)	706,768

Source : For the Sri Lankan total, Statistical Pocket Book of the Democratic Socialist Republic of Sri Lanka, Department of Census and Statistics. For the Nuwara Eliya district, Statistics Branch, Nuwara Eliya.

Table 4 Population by Religion

(Units: persons)

	Sri Lankan total (1981) (%)	Nuwara Eliya district (1992) (%)
Buddhists	10,288,300 (69.3)	294,203 (41.62)
Hindus	2,297,800 (15.48)	355,472 (50.29)
Islamites	1,121,700 (7.55)	17,448 (2.5)
Christians	1,130,600 (7.61)	39,455 (5.57)
Others	8,300 (0.06)	190 (0.02)
Total	14,846,700 (100)	706,768 (100)

Source : Same as Table 3.

Table 5 Acreage of Major Crops in the Nuwara Eliya District

(Units: km^2)

Crop	Acreage
Tea [1]	662.34
Vegetables	111.21
Tobacco	110.94
Rice	55.35
Total	939.84

Source : Statistics Branch Kachcheri Nuwara Eliya

1) Including small estate tea fields.

Table 6 Population of the Kalutara District (Kalutara City)

	Population (in thousands)	Population density (person/km^2)
1981	830 (32)	522
1991 [1]	945 (34) [2]	595

Source : Dept. of Census and Statistics.

Notes : 1) Estimated. 2) As of 1989.

Table 7 Ethnic Composition

(Units: persons)

	Sri Lankan total (1981) (%)		Kalutara district (1981) (%)	
Sinhalese	10,980,000	(73.9)	723,483	(87.0)
Sri Lankan Tamils	1,887,000	(12.7)	9,744	(1.0)
Indian Tamils	819,000	(5.5)	33,659	(4.05)
Sri Lankan Moors	1,047,000	(7.1)	61,159	(7.3)
Burghers	39,000	(0.3)	431	(0.05)
Malays	47,000	(0.3)	762	(0.1)
Others	28,000	(0.2)	466	(0.5)
Total	14,847,000	(100)	829,704	(100)

Source : Same as Table 6.

Table 8 Population by Religion

	Sri Lankan total (1981) (%)		Kalutara district (1981) (%)	
Buddhists	10,288,300	(69.3)	699,613	(84.3)
Hindus	2,297,800	(15.48)	37,035	(4.4)
Islamites	1,121,700	(7.55)	62,659	(7.5)
Christians	1,130,600	(7.61)	30,121	(3.5)
Others	8,300	(0.06)	276	(0.3)
Total	14,846,700	(100)	829,104	(100)

Source : Same as Table 6.

Table 9 Population Estimates of Nuwara Eliya by Ethnic Group

Ethnic group	1981	1992*
Sinhalese	254,375	297,864
Sri Lankan Tamils	76,449	89,519
Indian Tamils	257,478	301,498
Sri Lankan Moors	12,163	14,242
Europeans	696	815
Malays	1,136	1,331
Others	1,280	1,499
Total	603,577	706,768

* Values for 1992 are estimates.

Source : Statistics Branch, Nuwara Eliya.

Chapter Five

SURVEY MEMBERS AND ITINERARY

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Embassy of Japan

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Ministry of State for Policy Planning and Implementation

Hon. Wimal Wickramasingle, M.P.	Minister

World Bank

Mr. Robert Bentjerodt — Resident Representative

United Nations Population Fund (UNFPA)

Mr. Hans G.P. de Knocke Meulen — Country Director for Sri Lanka and Maldive

Community Development Services (CDS)

Mr. Brig Dennis Hapugalle — Executive Director

Family Planning Association of Sri Lanka (FPAS)

Mr. Daya Abeywickrame — Executive Diretor

Survey Itinerary

(July 12 - July 26, 1993)

Date	Activities
July 12 (Mon.)	• Departure from Narita. • Arrival in Colombo. • Discussion of outline of survey with local counterpart.
July 13 (Tues.)	• Discussion of outline of survey with Dr. Neville Fernando M.P., Vice Chairman, Sri Lankan Parliamentarians for Population and Development. • Visit to the Embassy of Japan. Briefing on Japanese medical assistance to Sri Lanka by First Secretary Masakazu Furuhata. • Visit to the Central Bank of Sri Lanka. Briefing on the economic situation in Sri Lanka by Mr. Amaranada S. Jayawardena, Senior Deputy Governor.
July 14 (Wed.)	• Visit to the Ministry of Health and Women's Affairs. Briefing on population policies and population situation in Sri Lanka by Dr. A.T.P.L Abeykoon, Director, Population Division. • Briefing on family planning and maternal and child health in Sri Lanka by Dr. K.P. Wickramasuriya, Medical Officer, Evaluation Unit, Family Health Bureau. • Courtesy call on Hon. Renuka Herath M.P., Minister of Health and Women's Affairs.
July 15 (Thurs.)	• (Move from Colombo to Nuwara Eliya)
July 16 (Fri.)	• Visit to the Nuwara Eliya Statistics Office. Collection of statistical data on Nuwara Eliya. • Visit to the Nuwara Eliya District Office. Briefing on health and medical care and family planning and maternal and child health services in Nuwara Eliya by the Regional Director of Health Services. • Courtesy call on Hon. Tilaka Herath, Mayoress of Nuwara Eliya. • Visit to dispensary, 6-mile post at Nuwara Eliya. Briefing on dispensary's health and medical activities.

Date	Activities
July 17 (Sat.)	• (Move from Nuwara Eliya to Kalutara)
July 18 (Sun.)	• Free
July 19 (Mon.)	• Visit to the Kalutara District Office. Briefing on medical services of the district by Dr. B.V.S.H. Benerasama, Regional Director of Medical Service. • Visit to Kethumathi, Hospital for Women. Observation of the hospital's facilities. • (Move from Kalutara to Colombo)
July 20 (Tues.)	• Visit to the Ministry of Policy Planning and Implementation. Briefing on demographic statistics and economic development in Sri Lanka by Hon. Dr. Wimal Wickramasinghe M.P., Minister. • Visit to the World Bank. Briefing on population, health care and nutrition programs in Sri Lanka from Mr. Roberto Bentjerodt, Resident Representative.
July 21 (Wed.)	• Visit to the regional office of the United Nations Population Fund (UNFPA). Briefing on the Family Life Project by Mr. Hans G.P.K. Meulen, Country Director. • Visit to the Parliament. Discussions with members of the Sri Lankan Parliamentarians for Population and Development on population and health care in Sri Lanka. • Visit to the Community Development Services (CDS). Briefing on the CDS' activities by Mr. Brig Dennis Hapugalle, Executive Director. • Visit to the Family Planning Association of Sri Lanka. Briefing on the association's activities by Mr. Daya Abeywickrame, Executive Director.
July 22 (Thurs.)	• Visit to Sri Jayawardenapura General Hospital. (Facilities could not be observed due to a strike). • (Move from Colombo to Kalutara) • Visit to Government Agent, Kalutara District Office. Briefing on general situation in Kalutara by Mr. Andrew de Silva, District Secretary.

Date	Activities
July 23 (Fri.)	• Visit to the Embassy of Japan. Report on survey findings to First Secretary Masakazu Furuhata. • Visit to Ministry of Health and Women's Affairs. Collection of materials on health care.
July 24 (Sat.)	• Report on survey findings to Dr. Neville Fernando M.P.,Vice Chairman, Sri Lankan Parliamentarians for Population and Development. • Arrangement of collected materials.
July 25 (Sun.)	• Arrangement of collected materials. • Departure from Colombo.
July 26 (Mon.)	• Arrival in Narita.

Appendix Documents and Map

List of Documents

1. Annual Health Bulletin Sri Lanka 1991, Ministry of Health p157.

2. Sri Lanka: Country Economic Update FY93 Public Sector Rationalization for Private Sector Development and Poverty Alleviation June 2, 1993, World Bank, p83

3. Sri Lanka in Figures 1992, Dept of Census and Statistics, Ministry of Policy Planning and Implementation, p133

4. Survey of Demographic and Social Aspects 1986/87 Sri Lanka Health and Housing Report, Dept. of Census and Statistics Ministry of Policy Planning and Implementation, p83

5. Land Reforms in South Asia - A Study of Sri Lanka, Karori Singh South Asia Studies Center University of Rajasthan, Jaipur, South Asian Publishers, New Delhi 1989, p182

6. Sinhalese Immigrants in Malaysia and Singapore 1860 - 1990 History through Recollections, S.N. Arseculerate, K.V.G De Silva and Sons (Colombo) LTD, p405

7. Seeing Ceylon, R.L. Brohier, Lake House Investments Limited 1981, p272

8. Statistical Pocket Book of the Democratic Socialist Republic of Sri Lanka 1992, Dept., of Census and Statistics Ministry of Policy Planning and Implementation, p224

9. Statistical Abstract of the Democratic Socialist Republic of Sri Lanka 1992, Dept. of Census and Statistics Ministry of Policy Planning and Implementation, p524

10. Population Statistics of Sri Lanka, Population Information Centre, Population Division Ministry of Health and Women's Affairs, 1992, p41

11. Emerging Population Issues in Sri Lanka, Population Division of the Ministry of Health and Women's Affairs, 1993, p22

12. Household Income and Expenditure Survey 1990/91 Preliminary Report, Dept., of Census and Statistics Ministry of Policy Planning and Implementation, 1993, p96

13. Family Planning Association of Sri Lanka Annual Report 1991 - 92, p65

14. Situation Analysis: Identification of Pockets Where Population Programme Activities Need to be Strengthened - Population Information Centre Reseach Paper Series 6 - , Dr. Abeykoon, Dr. K.Wickramasuriya, D.P.P.Devapriya, Population Information Center Population Division Ministry of Health and Women's Affairs, p31

15. Annual Report on Family Health Sri Lanka 1991, Family Health Bureau Ministry of Health and Women's Affairs, p36

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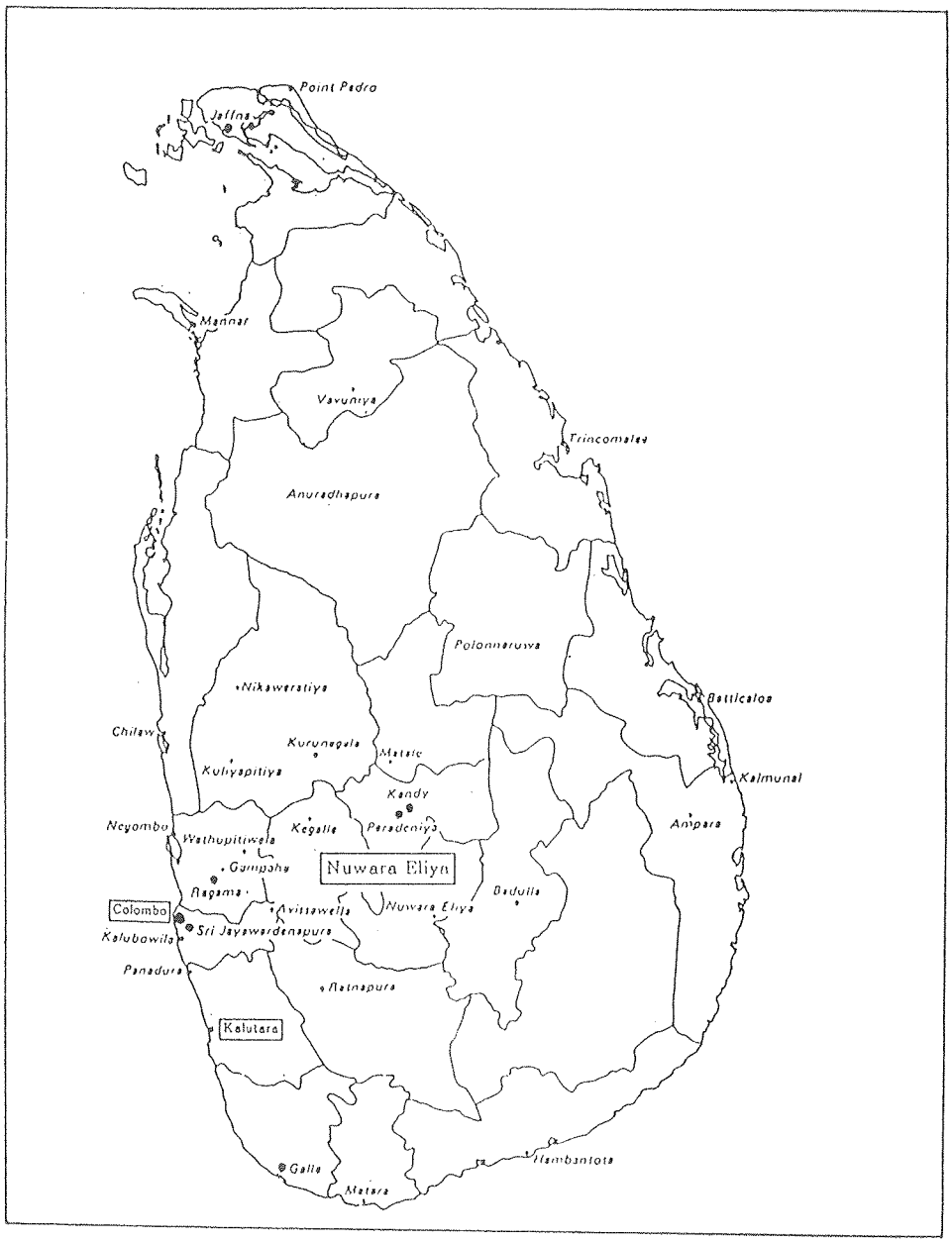
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Kuliyapitiya
Kandy
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Negombo
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Kegalle
Peradeniya
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Gampaha
Nuwara Eliya
Ragama
Badulla
Colombo
Avissawella
Nuwara Eliya
Sri Jayawardenapura
Kalubowila
Panadura
Ratnapura
Kalutara
Galle
Hambantota
Matara