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Pakistan's Fertility and Family Planning : Future Directions

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The country and people

Pakistan emerged as an independent state on August 14,1947, nearly 45 years ago, when the British presided over the partition of the Indian subcontinent. The country came about as a demand for an independent, Muslim state. In 1971, East Pakistan separated and became an independent state, Bangladesh.

The present country, has a land area of about 800,000 square kilo-metres, an estimated population of nearly 120 million, a per capita income of less than US $ 400, a literacy rate of about 30 per cent, and an annual population growth rate of more than 3 per cent. This population growth rate is one of the highest in the world, particularly among the larger developing countries.

The people are a blend of ethnic groups throughout the four provinces of Baluchistan, North West Frontier, Punjab and Sindh. Although Urdu is commonly used, the languages of everyday discourse number at least six, and English is used in official or commercial transactions. Religion is primarily Muslim.

Economy

The per capita income in 1990-91 was Rs. 9,000 (US$ 360). An estimated third of the, Population live below the poverty line. Nearly three-fourths live in rural areas and more than half, are employed in agriculture. The high rate of population growth places an additional burden on the economy as well as the social structure of the country [1]. The economic dependency burden in 1990 was estimated to be as high as 94 [2].

Literacy/Education

At 31 per cent, the country's literacy rate ranks among the world's lowest. A 1985 estimate showed that the female literacy was 18 versus 43 for males. In the province of Baluchistan, the 1981 census showed, only four percent female

literacy. Primary school enrolment is estimated at 50 per cent overall and 32 per cent for females.

Status of women

Female participation in society outside the family is constrained by social, political and religious factors. Labour force participation for women outside the home and for wages is extremely limited. Females on average have 6.8 births and 600 per 100,000 women having live births die of childbirth-related problems. Female enrolment in primary school is 32 per cent. Investment in human resources has considerable room for improvement. In terms of relative ranking among all countries, Pakistan has one of the highest fertility rates; one of the highest maternal mortality rates; the fourth highest ranking for percentage of low birth weights (28 per cent in 1984); and the world's, sixth lowest female to male primary school enrolment ratio [3].

Population

Pakistan has increased to four times its population at the time of Independence (1947): from 32.5 to an estimated 118 million by 1991. At the last census in 1981, the population was 84.3 million [4]. The 1961 census, including West and East Pakistan, showed an annual population increase of 2.3 per cent during the preceding decade. The Population Growth Estimation project placed it at 3.3 per cent for 1962-65. The growth rate since independence was estimated at 2.9 per cent per year [5]. The present population growth rate is about 3.1 per cent which means about 3.5 million more births than deaths per year. The high growth rate also reflects a substantial decline in the death rate since Independence.

According to the 1981 census, 72 per cent of the population lived in rural areas. Urban growth, however, has been dramatic over the past, ten years [2] and an estimated third of the people live in urban areas. Slum conditions are becoming increasingly widespread in cities such as Karachi, which had an estimated population of more than seven million in 1989. According to the 1981 Census, 98 per cent of the population was Muslim. The people are descendants of several racial and sub-racial groups, which came to the subcontinent some 5,000 years ago from central and western Asia. The sex ratio of 91 women to 100 men is one of the lowest in the world. And, about 45 per cent of the population, was under, 15 years of age. A summary of Pakistan's demographic characteristics may be found in Table 1.

Table 1 : Pakistan: Demographic characteristics, 1992

Population estimate (millions)	120
Population/sq. kilometre	1,500
Crude birth rate	42
Crude death rate	11
Natural increase rate (%)	3.1
Population doubling time in years (at current rate)	23
Population projected (millions) To the year 2000 To the year 2015	150 235
Infant mortality rate (per 1000 live births)	100
Total fertility rate	6.1
% Population <15/65+	44
Life expectancy at birth (years)	56-57
Urban population	28
% Married women using contraceptives (total/modern)	12/9
Per capita GNP, 1990-91 (US$)	$360

Source: 1992 World Population Data Sheet, Population Reference Bureau, Washington D.C., 1992.

Although reliable data are difficult to obtain, it is estimated that the crude death rate is about 10-11 per thousand per year. At the time of Independence, it was about 25-30. This drop was due to changes in economic and social conditions. Infant mortality is estimated at less than 100 deaths per thousand live births. An estimated, 500-600 women per hundred thousand live births die of childbirth related causes annually: one of the highest rates in the world. Life expectancy is estimated at 57-58 years. Unfortunately, no more than half the population has, access to even the most basic of health services. More than half the population is without safe drinking water and about half live, in one-room housing

Fertility

The crude birth rate has varied from 37 to 43 per thousand population, and the total fertility from 5.9 to 6.9 children per woman, according to surveys since 1974. The total fertility rate was estimated at 6.1 in 1991 [6]. A recent national survey attributes what decline there has been to a gradual decline in the age at marriage [2]. In 1991, the crude birth rate estimated to be 43 per thousand, one of highest among South Asian countries. A third of married women of childbearing age interviewed in the national sample Demographic Health Survey in 1990-91 said they wanted more children [2].

Population Policy

Family planning services in the new nation of Pakistan were first introduced in an organized fashion by NGOS: mostly directed to refugees coming from India. Since 1952, family planning services were organized by NGO's in Karachi, Lahore and Dacca and family Planning associations formed. Public sector family planning services began in 1960 as part of Second Five-Year Plan, 1960-65 [7]. A definite population policy, however, did not appear the Third Five-Year Plan, 1965-70 [8].

"The improvement in living standards, as reflected in the earlier projections of per capita income, rests heavily on certain assumptions regarding growth of population. With the planned improvement in health facilities and nutritional standards, the mortality rate is likely to decline fairly rapidly. Unless it is checked by fertility rate, the population growth could easily be pushed beyond 3 per cent per annum. If this happens the population will double itself by 1985. Such an increase would defeat any attempt to raise per capita income by a significant amount. A vigorous and broadly based programme of family planning is therefore an integral part of the strategy of the perspective plan." [5] Implementation of this policy consisted of a national programme to provide contraceptives and person-to-person family counseling by paramedical staff to couples of reproductive ages.

The government has not changed its policy greatly since 1965, although implementation and organizational inputs have been subject to numerous financial and political constraints which have produced periods when relatively little family planning service was being provided. At present, the goal is to reduce the growth rate from 3.1 to 2.5 per cent by the end of the century. This goal, has been publicly reiterated by the Prime Minister in terms of the serious handicap the present population growth rate is to socio-economic development. He has requested more active involvement from all public socio-economic sectors and under a directive to all federal and provincial ministries, inter-ministerial committees have been set up at the federal and provincial levels to review and monitor the family, planning programme. The Government continues to state that the country's current population growth is a major deterrent to socio-economic development. Its stated goal is to reduce fertility in order to control growth. The Ministry of Population Welfare is responsible for developing and implementing family planning policy and programmes as an integral component of the national socio-economic development plan. Emphasis is on improving the standard of living and quality of life by promoting a small family norm.

The present Seventh Five-Year Plan, 1988-93 [9], also emphasizes a population policy, which focuses on reducing infant and child mortality on the assumption that the resulting increase in child survival will help reduce fertility. The target for the five-year period is to lower the crude birth rate from 42.3 to 38.0 per 1,000 by increasing the contraceptive practice rate from 12.9 to 23.5 per cent, which is projected to prevent some 3,170,000 births.

The Family Planning Programme

The public national family planning programme began in July 1965 with the start of the Third Five-Year Plan (1965-70). Its goal was to lower the crude birth rate from 50 to 40 per 1,000 by providing contraceptive protection to 25 per cent of the 20 million fertile couples by 1970 [8]. Similar targets have been the major focus of each of the five-year development plans. Several implementing organizations have changed or developed over this period to deliver these services and numerous strategies have been developed related to outreach, contraceptive methods, and delivery systems, and approaches used to provide services.

It is generally agreed both within Pakistan and outside that there has been insufficient demand created and inadequate provision of services, particularly in rural areas. The programme has a history of ambitious objectives that have not been met as the programme tried to increase services various uses of the Family Welfare Centers, NGO's and supply distribution schemes [10]. These unrealized plans generally have been attributed to a "lack of consistent government commitment and social and cultural constraints" as well as financial, organizational and operational obstacles [2].

The national family planning programme consists primarily of 1,246 Family Welfare Centers staffed by lay workers spread throughout the country, except in tribal areas. In addition, Government hospitals and clinics are the major source for female sterilization. The contraceptives provided include condoms, oral contraceptives, IUDS, injectables and sterilization, primarily female. The use of mass media is limited. A social marketing programme to promote the sale of condoms and oral contraceptives is in effect and the major source of pills and condoms is the drug store and other shops. It is doubtful that public outreach services are able to reach more than 12 per cent of the couples of childbearing ages. Outreach is limited and worker morale is believed to be, low.

Non-governmental organizations also offer services but primarily to urban areas and on a limited basis. The Family Planning Association of Pakistan is the most active. Much of the NGO work, is intended to be guided by the NGO Co-ordinating Council (NGOCC) situated in Karachi.

The private sector is estimated to account for about one-third of all acceptors each year, versus from 55-65 per cent by the public sector. This private sector includes pharmacies, private physicians, allopathic and indigenous medical practitioners and traditional birth attendants or dais.

The State of the Art

A recent international review has ranked Pakistan's family planning programme effort as "moderate" among developing countries. It is listed as 42nd among 98 countries ranked by level of effort. For comparison, India's and Bangladesh's are rated as "strong" and 9th and 10th in level of effort among the 98 countries.

The natural increase rate is generally accepted to be about 3.1 per cent. According to the recent Pakistan Demographic and Health Survey of married women 15-49, which suggests a lower increase rate [2]

1. Current family planning method practice is about 12 per cent.

2. About 9-10 per cent are currently using a modern contraceptive.

3. About 21 per cent had ever used a method.

4. Fewer than half (46 per cent) who had ever used family planning began use when they had fewer than three living children.

5. About one in five had heard of family planning in the mass media.

6. About 45 per cent know of a modern method and a source where they can get the method.

7. Some 62 per cent who know of a contraceptive method approve of family planning use

8. A quarter of women say it is ideal for a women to get married at age 15 or younger.

9. The infant mortality rate remains in the 90-100 range; and

10. 36.4 per cent of currently married women aged 15-49, want no more children.

Some lack of achievement in Pakistan's seventh Five-Year Plan, identified in the draft proposal for the Eighth Five-Year Plan's [12] includes:

1. Contraceptive service expansion to a of the population has not materialized to, among others, lack of funding and restrictions on staff recruitment; it remains no more than 20 per cent.

2. Targets for clinical methods had not been achieved by the end of 1991 since planned expansion to 45 new Reproductive Health Services. A Center, 130 mobile service units and 97 Family Welfare Centers as well as involvement of health departments did not materialize.

3. Although targets for conventional contraceptives have been met, there is reasonable doubt that all the contraceptives issued have been used due to the low price, which promotes worker over-reporting.

To help correct some of these problems and prepare for the Eighth Plan (1993-1998) several evaluation and operations research projects were started including, among others:

1. The prices for condoms and oral pills were raised in November 1991. Early results of contraceptive distribution evaluation suggest that some previous over-reporting may be reduced.

2. A situation analysis of the present status of a sample of 100 Family Welfare Centers is being completed (June-August 1992) to assess the supply and quantity and quality of outreach service being provided.

3. A sample IUD follow-up survey to determine the actual extent of use and situation of IUD acceptors was started in August 1992.

4. The Demographic Health Survey was completed and a profile of the unmet need of married women 15-49 prepared.

The present public and private family planning service delivery system is estimated to reach no more than 20-25 per cent of the population. The Eighth Five-Year Plan calls for increasing family planning coverage to 70 per cent of the rural and 100 per cent of the urban population. To do so, a new emphasis, increased energies and expenditure, and new infrastructure in the field are called for.

New Directions (1993-1998)

The overall objectives of the Eighth FiveYear Plan are:

1. To raise the level of contraceptive use from an estimated 14 per cent in 1992-1993 to 29 per cent in 1997-1998.

2. To reduce the total fertility rate from 5.9 in 1992-1993 to 4.7 in 1997-1998.

3. To reduce the crude birth rate from an estimated 41.5 in l992-1993 to34.8 by l997-1998.

4. To prevent 4.8 million births.

5. To reduce the rate of population growth from 3.1 per cent in 1992-93 to 2.6 per cent by 1997-1998, in line with the targeted reduction of the population growth rate to 2.5 per cent by the year 2000.

Without a recent census though, it is difficult to have more than an estimated baseline from which the Eighth Five-Year Plan is to start. Recent Government announcements indicate that the postponed National Census will be conducted in late 1992.

In order to catch up with the Seventh Plan target shortfall, an accelerated programme has been funded for the last two years of the Plan. Recent action taken by the Federal Government includes:

1. Exempting population welfare funds from the overall 1991-1992 budgetary cut as well as increasing the budget.

2. The Prime Minister has issued a written directive to all federal and provincial ministries requesting full support for an effective integrated approach and set up inter-ministerial committees at federal and provincial levels to monitor progress.

3. Some progressive increase, in the proportion of government to foreign assistance over the Plan period.

The rise in the budget is particularly significant because the actual allocations provided over the first three years of the Plan were less than the budgets requested.

Numerous proposals approved by the cabinet for the accelerated programme include, among others, two innovative approaches with significant potential to improve the programme:

1. Introducing a family planning component in some 7,800 rural health centers with a lady doctor or female paramedic.

2. A large pilot study of community-based family planning workers in nine districts (4 in Punjab, 2 in Sindh, 2 in NEFP and 1 in Baluchistan) to improve person-to-person counseling and service delivery.

Both of these projects would be used to expand service delivery in rural areas during the Eighth Plan.

The thrust of the Eighth Plan is to get family planning counseling and supplies to the rural areas, i.e., to increase outreach. To do so, the major approaches will be:

1. A major change in the programme infrastructure. It consists of hiring 12,000 workers from villages to provide counseling, supplies and referrals.

2. Involving all health outlets in the provision of family planning services.

3. Involving private medical practitioners in service provision.

4. Strengthening supervision, monitoring and feedback at the division and tehsil levels.

5. Emphasizing the IUD, injectables and contraceptive surgery.

6. Upgrading the IEC campaign and integrating it with the expanded person-toperson approaches.

The proposed five-year targets for contraceptive prevalence rates and their breakdown by method are contained in Table 2. To achieve these targets, it is estimated that the present rural coverage of the programme will need to rise from five per cent to 70 per cent and the urban coverage from 50 to nearly 100 per cent. In other words, total outreach needs to quadruple from its present estimated 20 per cent to 80 per cent in the six years remaining till the end of the Eighth Plan. To achieve these targets, IEC, urban and rural strategies have been developed.

Table 2: Contraceptive prevalence rate (CPR) targets, and percent distribution of contraceptive users by method, 1992-3 to 1997-8

Year	CPR targets		Percent distribution of contraceptive users						
	CPR*	Total user (Million)	Condom	Pill	IUD	Injectable	Other	Foam	Total
Base year (1992-93)	14.0	2.7	30	8	34	9	18	1	100
Year 1 (1993-94)	17.0	3.4	28	8	32	11	20	1	100
Year 2 (1994-95)	20.0	4.1	25	9	30	12	23	1	100
Year 3 (1995-96)	23.1	4.9	23	9	28	14	25	1	100
Year 4 (1996-97)	26.1	5.7	21	10	26	15	27	1	100
Year 5 (1997-98)	29.0	6.6	19	10	24	17	29	1	100

*Source: Adapted from Ministry of Population Welfare, Government of Pakistan, Proposed Population Welfare Programme for Eight Five-Year Plan 1993-1998 (Draft). Islamabad, April 1992.

IEC Strategy

A general IEC strategy will be developed based on the need to improve interpersonal communication backed by electronic media, such as the radio and TV. In addition, point of service identification (e.g. visible family planning signboards) will be provided nationally, cent of the population.

1. Increasing coverage by involving Basic Health Units, Rural Health Centers and MCH centers in counseling and service delivery.

2. Fielding some 400 Mobile Service Units it the tehsil level to provide services to remote villages.

3. Increasing the number of trained birth attendants from 5,000 to 7000 to provide counseling, supplies and referrals, working closely with mobile units and Rural Health Centers.
4. Hiring a new type of village-based worker for villages with 2,000 or more people. This community-based, motivator-cum-service-cum referral worker would be female, married, matriculate if possible, and children and using contraception when feasible. She would be from the village she would serve. She would be trained for 3 months to administer injectables, supply pills, condoms, foam tablets, and refer for IUD and contraceptive surgery. This scheme will be tested on a pilot basis in 1993 and, if

successful, expanded to 12,000 villages covering 60-70 per cent of the rural population.

Observations

If the number of married women aged 1549 increases, as projected, from 19.3 million in 1992-93 to 22. 8 million by 1997-98, the number of couples who would have taken up contraceptive methods will be immense. In other words, for current use of contraceptive practice to rise from 14 to 24 per cent over five years as proposed, the actual number of contraceptive users will have to more than double. Considering that the baseline may be an overestimate, becomes a more than ambitious undertaking. Increase in age of marriage may mitigate some of these assessments but to what extent, remains uncertain.

To lower the growth rate to 2.6 per cent by 1997-98 means a rise in contraceptive prevalence of 3 per cent per year. A recent team has indicated that this is a rate" rarely achieved by any country for a period of five years or more" [13]. Countries such as Bangladesh, Indonesia and Thailand have been able to achieve increases in contraceptive prevalence over longer periods in the range of two per cent per year but only with considerable government commitment, resource allocation and intensive field outreach efforts. There appears to be increasing national political backing for the family planning, programme and public statements of government support. It will take an all-out effort to reach the targets proposed, however. Most important will be ways to: upgrade the quality, of counseling and services; to get to the village; and to be certain that the targets are realistic and attainable and will not affect continuation of use adversely.

One lesson we may be able to learn from the experience of Pakistan and other South Asian countries is that any launching of a large-scale new intervention could profitably be preceded by a smaller-scale pilot project to identify the likely problems to be dealt with it is refreshing to note the emphasis on using the remaining time in the Seventh Plan to begin some of the kind of diagnostic studies, operations research, pilot and demonstration studies required before upscaling. For example, a Pilot (one-district or less) study, to figure out how best to recruit, select, train, supervise, and manage the proposed community-based worker.

A reasonable amount could be learned from the experience of Bangladesh with demonstration projects that pay close attention to the quality of care in the expanded outreach system. Some recent criteria for a proposed demonstration project that involves a closely monitored multi-intervention approach has, applicability here. The interventions include:

1. Hire a sufficient number of workers to cover the geographic area.

2. Select female worker's who are married, have children, practice contraception and live where they work.

3. Provide a better mix of contraceptives (IUD, condom, pill, injectables, etc.) that are where they ought to be when needed.

4. Train workers to be truthful about possible side effects and give them the means to treat them.

5. Develop and implement a systematic home visiting procedure.

6. Give credit/incentive to the field worker for continuation of use of these methods by building long-term use into the targets.

7. Promote spacing as a way of introducing contraceptive use, as a major health benefit, and as a logical demographic method to cut back on fertility.

8. Revise the management information system to better monitor field efforts.

9. Improve the quality and availability of counseling and IEC materials (eg. portable pocket size flipcharts, etc.).

10. Focus supervision primarily on helping fieldworkers do a better job. Where feasible, use mobile service units to help.

11. Go back and retrain existing fieldworkers and their trainers. Help them refocus the approaches and, in particular, try to match the person to the contraceptive method with attention to quality of care and continuation of use; and

12. Use community volunteers initially as contraceptive depot holders and later as motivators. The key to success here is to do it all at once in one place and in the most simple and direct manner to demonstrate that change can take place and be replicated elsewhere. [14]

References

1. Khan, R.N.A.: Some Facts about the Demographic Situation and its Socio-Economic Implications for Pakistan, Ministries of Population Welfare, Forestry and Co-operatives, Government of Pakistan, Islamabad, 1992.

2. National Institute of Population Studies: Pakistan Demographic and Health Survey, 1990/1991, Islamabad, Pakistan, July 1992.

3. Duncan, A.: Women in Pakistan: An Economic and Social Strategy, A World Bank Country Study. The World Bank, Washington, D.C., 1989.

4. Population Census Bureau of Pakistan: 1981 Census Report of Pakistan, Islamabad, Pakistan, 1984.

5. Hardee, J.G. and Satterthwaite, A.P.: "Pakistan," Countrv Profiles, The Population Council, New York. March 1970.

6. Population Reference Bureau: 1992 World Population Data Sheet, Washington D.C., 1992.

7. Planning Commission, Government of Pakistan: The Second Five-Year Plan, 1960-1965, Karachi, 1960.

8. Planning Commission, Government of Pakistan: The Third Five-Year Plan, 1965-1970, Islamabad, 1965.

9. Ministry of Planning and Development, Government of Pakistan: Proposed Population Welfare Programme for Eighth Five-Year Plan 1993-98 (Draft), Islamabad, April 1992.

10. Robinson, W.: "The New Beginning in Pakistan's Family planning programme, "Pakistan Development Review, 26(1):107-118 (1987).

11. Mauldin, W.P. and Ross, J.A.: Family Planning Programmes: Efforts and Results, 1982-89. Studies in Family Planning, 22(6):350-367 (1991).

12. Ministry of Population and Welfare: Government of Pakistan, Population Welfare Programme: Seventh Five-Year Plan 1988-931, Islamabad, 1988.

13. United Nations Population Fund: Contraceptive Requirements and Logistics management needs in Pakistan, Islamabad, March 1992.

14. Cernada, G.: "Every sixth person in the World", International Quarterly of Community Health Education, 11(4):311-314 (1990-91).