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SUMMARY AND CONCLUSIONS

A. PURPOSE OF THE DOCUMENT

There are three reasons which make this document relevant: (i) the general agreement among the countries of the region about the need to respect and promote reproductive rights, including the ability to regulate fertility; (ii) the awareness that there is a demographic pattern associated with poverty which tends to act as yet another obstacle among the many that hinder the poor from escaping from marginalization; (iii) the conviction that reproductive health care must form part of any strategy that aims simultaneously to improve people's living conditions, raise the quality of human resources and reduce socio-economic inequalities.

In 1993, as part of their activities to prepare for the International Conference on Population and Development held in Cairo in 1994, the countries of the region organized the Latin American and Caribbean Regional Conference on Population and Development in Mexico City, and signed up to the Latin American and Caribbean Consensus on Population and Development. In this document it is recognized that *"the opportunity to regulate fertility is a universally recognized human right"*; it is recommended that Governments *"ensure the full exercise of this right as one of their prime objectives"* and, to this end, *"provide access to family planning services, expand their coverage and improve their quality, providing care without restriction to all men and women who want it, in a framework of full respect for individual freedoms and for the diversity of sociocultural and religious beliefs and values"* (p. 15).

This Consensus also recognizes the existence of chronic social inequalities within the countries, one of the most dramatic manifestations of which is the high proportion of people living in poverty. These inequalities manifest themselves demographically as *"differences in morbidity and mortality rates, particularly among mothers and infants, in patterns of territorial mobility and in fertility between different sectors of society and ethnic groups. In particular, there has been a lack of family planning programmes that live up to the principles of total care for women and children. If these requirements and others of a social nature (such as health and education) were met, this would not only meet the need for equity, but would have positive effects for the development of human resources"* (pp. 4 and 5). The links between the particular reproductive behaviour of the poor and the transmission of poverty between generations are dealt with more specifically in a document that the Secretariat of ECLAC presented at the Conference referred to above (ECLAC/CELADE, 1995): *"The decline in birth rates has not occurred with the same intensity in all social groups. Women in the poorest socio-economic strata have, on average, more children; analogously, the higher fertility rates in rural areas are found among small farmers, landless workers and ethnic minorities, who are excluded from the benefits of progress. A fact of singular importance is that many of the women of these sectors systematically declare that a high proportion of their pregnancies are undesired. Thus, family planning seems to have followed the lines of*

inequity; its unavailability to certain groups virtually prevents them from exercising an essential reproductive right and limits the freedom of couples belonging to these groups to decide how many children they wish to have... The differences in birth rate by social sector provide clear evidence of the inequity which prevails in the countries of the region (p. 44). Again, the follow-up report on the Latin American and Caribbean Regional Plan of Action on Population and Development presented by the Secretariat of ECLAC at its Twenty-sixth Session (1996) sums up the role played by the high fertility rates of the poor in the sequence of events that shapes the process whereby poverty is transmitted from generation to generation in individual families: *"...a high level of fertility is an element that contributes to the intergenerational perpetuation of poverty. Indeed, children born in poor homes —i.e., in homes where the parents, because of their limited participation in production and labour markets, have access only to low incomes— grow up under unfavourable circumstances as regards nutrition and care, health services and education. Thus, when they grow up, they are poorly equipped to gain access to highly productive occupations, and they end up replicating the low income of their parents, i.e., they become poor adults. This cycle is reinforced when the number of children in poor homes is relatively high, since in such cases, each child receives a smaller share of nutrition, education, etc. Moreover, because they grow up in poverty, they are quite likely to reproduce the fertility patterns of their parents. In this connection, it should be noted that poor households not only have different fertility rates, but they also have higher rates of early fertility (teenage pregnancy)..."* (p. 7).

The Programme of Action approved at the International Conference on Population and Development devotes a chapter to *reproductive rights and reproductive health* (pp. 32 to 41). Without entering into the debate about the ethical aspects implicit in the different points of view held about reproductive rights, but accepting the position agreed by the countries in the Consensus mentioned above, affirming *"the right of individuals, couples and those in conjugal unions to have access to a wide range of methods for regulating their fertility"* (p. 16), there is a consensus that reproductive health is of vital importance for people's health, and therefore that caring for people's reproductive health contributes to their physical and mental well-being and their ability to play a productive and participative role in society. Prevention and treatment in the area of reproductive health presuppose the active involvement of the individuals concerned, who need to have some knowledge about their physiology, and in particular about the repercussions of their sexual and reproductive behaviour, if they are to be in a position to opt for types of behaviour that are consistent with their aspirations and well-being. As well as being a substantive advance in terms of equity, the freedom to take informed decisions without distinction of sex, social class, ethnic origin or nationality is a legitimate means for promoting changes in reproductive behaviour, in particular among groups that are more vulnerable in socio-economic terms, and especially if the people who belong to these groups have revised their reproductive preferences downwards, but cannot as yet implement these new preferences.

In short, it needs to be borne in mind that as reproductive health is given greater prominence, the traditional focus of mother and infant health care is being widened to include the entire reproductive cycle and sexual behaviour, requiring the medical and sociocultural approaches to be combined and emphasizing gender aspects in relation to both sexes.[1] Furthermore, the new emphasis on reproductive health is giving rise to fresh ways of dealing with some traditional issues (between population growth and

[1] This is clearly apparent in the definition of reproductive health: "a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity, in all matters relating to the reproductive system and to its functions and processes. Reproductive health therefore implies that people are able to have a satisfying and safe sex life and that they have the capability to reproduce and the freedom to decide if, when and how often to do so" (United Nations, 1995a, p. 30).

economic and social development, for example) in the context of population and development; the promotion of reproductive health, in fact, requires the community as a whole to become aware of the sexual and reproductive aspirations, behaviour and practices of individuals and couples. As such, the links between patterns of reproduction and development will not be addressed solely from the governmental angle, which typically is macrosocial, as in the case of public health policies or official approaches to fertility levels and trends, but also from the point of view of families and individuals, which typically is microsocial, being a process of decision-making about everyday concerns.

B. MAIN RESULTS

How have socio-economic and demographic changes in the region affected the reproductive health of the population? What information is available on the current state of inequities in the area of reproductive health and behaviour and the interrelationship between these and social inequalities and poverty in Latin America and the Caribbean? What policy challenges lie ahead on the road to securing full enjoyment of reproductive rights and ensuring that reproductive health care is available to the entire population of Latin America and the Caribbean? In this section an attempt will be made to give some answers to these questions in the light of available secondary information and of the analysis carried out in the main body of this document.

The rapidity of the decline in fertility has been the distinguishing feature of demographic trends and patterns among the population of Latin America and the Caribbean over the last 30 years. Although all the countries in the region have seen their fertility rates drop, the differences between them have become slightly more pronounced. According to current estimates, at present (the five-year period 1995-2000) there is a small group of countries with total fertility rates that are lower than the replacement level (less than 2.1 children per woman on average), a large group, including most of the countries and the bulk of the region's population, with values that are above the replacement level but lower than the world average of 3 children per woman, and a third group of countries with total fertility rates in excess of this average. In general, the nations with the highest fertility rates are those that are the least developed and have the lowest indices of human development. The decline in fertility has been particularly marked among women aged over 35, and this, combined with the rise in intervals between pregnancies, has helped to bring down the incidence of high-risk births. At the other end of the age range, teenage fertility has also fallen, but more slowly and, in some countries, more erratically.

This decline in fertility has taken place in all groups in society, a development that may be regarded both as indicative of the success of policies implemented in certain countries to secure precisely this objective, and as an unequivocal manifestation of how potent and far-reaching are the structural forces that are impelling couples to have less children. Nonetheless, the most disadvantaged groups in society, such as the poorer strata, segments with little or no schooling, inhabitants of the countryside and indigenous peoples, still show levels of fertility that are higher than, and in some cases multiples of, the averages for the countries in which they live; in a number of countries the total fertility rates of these groups are of the order of 5 children per woman, reaching a maximum of 7 among women without schooling. Although the urbanization process and the inclusion of more of the population in the school system have meant the size of the illiterate and rural population diminishing as a proportion of the total in certain countries, there are still areas whose population shows a high level of fertility, existing in conjunction with poverty and marginalization.

Whether because of the globalization of socio-economic relationships or due to the uniformity of cultural messages, the number of children declared to be ideal by women in the different strata of society varies less than does actual fertility. Among poorer groups this discrepancy translates into a larger number of offspring than desired; as against this, in some countries the actual fertility rates of more highly educated groups are lower than the number of children declared to be ideal. Thus, reproductive rights may be vulnerable in both poorer groups and highly educated segments, although for different reasons and with different consequences. While society is failing to provide the former with the means to match actual fertility to desired fertility —as is clearly demonstrated by the low indices of contraceptive use— the demands that this same society imposes on the latter, in terms of what they have to do to maintain a standard of living that is compatible with their qualifications, tend to make it difficult for them to have children; in this case, the decision to have a smaller number of offspring than desired is a result of pressure exerted by the economic and sociocultural context in which this decision is made.

The particular reproductive behaviour of the poor is due in part to the pattern of early sexuality/union.[2] This pattern tends to lead both to teenage and early adolescent fertility, since reproduction is still one of the main purposes of unions, and to high rates of fertility, because in the absence of extended family planning the age at which reproductive life begins becomes a determining factor in the final overall fertility of women. Of course, the consequences of this pattern of nuptiality are not limited to fertility alone; in a number of countries the figures available show that among disadvantaged groups the average age at which the first union is formed is generally the same as or lower than the age at which schooling ends, a fact that is indicative of the potential that these patterns of union may have for disrupting the training of human resources among the poorer groups in the population. In addition, there are difficulties involved, irrespective to some extent of the socio-economic situation of the family, in the raising and education of the children of teenage parents, who are generally not mature enough to cope with the emotional and economic demands of having children.

It seems that a determined effort to deal with the consequences that the pattern of early sexuality/union entails is one of the keys to addressing the problem of teenage fertility, which, as the governments recognized in the Latin American and Caribbean Consensus on Population and Development, is one of priority concern in the region: *"teenage pregnancy gives cause for concern because of its impact on maternal and child health, especially in view of the high incidence of maternal morbidity and mortality, and because of its psychological and social repercussions, such as the disruption of schooling, its interference with the mother's training to enter the labour market and the difficulties it entails for the maintenance of unions"* (p. 16). Consequently, the Consensus urges Governments *"to devote their efforts, on a priority basis, to designing and adopting global reproductive health care models for teenagers, focusing particular attention on population education, and within that field, family life education, comprehensive sex education and family planning"* (p. 16). This concern is entirely appropriate, since teenage fertility rates are still high, and trends erratic, in some countries. Comparative analysis of the situation in the different countries, however, does reveal progress in some of them, and this demonstrates that effective action can be taken to mitigate this problem.

Although knowledge of contraceptive methods has become widespread in the region, there are still gaps in some countries, particularly among the most marginalized segments of the population.

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[2] A greater degree of commitment and stability is what distinguishes regular sexual relationships from casual ones. While regular sexual relationships are regarded by demographers as being synonymous with marriage, such relationships take widely differing forms, ranging from formal unions approved under civil or religious law, to less formal unions (United Nations, 1998). In this document, the term "union" is used to refer to any of these forms.

Furthermore, it has been found that claimed knowledge about contraceptive measures is often accompanied by ignorance about basic aspects of the physiology of reproduction, and this has implications for the effectiveness with which methods to regulate fertility can be used, particularly in the case of traditional or natural methods which presuppose the ability to track the woman's fertility cycle.

Positive attitudes to family planning are also widespread, but in all the countries there is a proportion of women who reject contraceptive use for ideological reasons, including disapproval on religious grounds or for reasons linked to cultural norms, or because of personal inclination; there are indices that show this objection to be more frequent among the poorer groups of the population, and this constitutes a further barrier to the objective of reducing social discrepancies in the area of family planning. In addition to ideological grounds, refusal to use contraceptives may be due to obvious reasons (the woman is pregnant, sterile, trying to become pregnant or not sexually active) or may be justified by arguments that, although valid for the woman concerned, may be based on prejudice (adverse health effects or loss of sexual potency).

Gender conflicts manifest themselves clearly in the way methods to regulate fertility are used. In the case of nearly all methods of contraception, it is the responsibility of the woman to use them (condom use and vasectomy are not widespread in the region), something that reflects both an imbalance of power within couples and a certain nonchalance among men as regards their sexual behaviour, or at least the reproductive consequences of this. Likewise, campaigns to promote family planning tend to be directed at women. Also illustrative of gender conflicts is the fact that in most cases where couples disagree about whether contraception should be used or not, it is the man who is opposed; this situation is more common among poorer groups in the population and is probably one of the manifestations of the machismo that still survives in social strata where the value set on women in society is often based on their role as wives and mothers. In most couples, however, both partners are willing to use methods to regulate fertility, and the data available are sufficient to rule out the possibility that ignorance about contraception on the part of men may be a reason why couples do not practise family planning.

To complete this brief reference to the factors that limit access to family planning, it needs to be noted that, across the board, economic causes (monetary cost of contraceptives) or physical ones (proximity of medical posts) are barely mentioned as reasons for not using methods to regulate fertility. Sociocultural barriers, including the concentration of responsibility on women, and fears about collateral effects, whether founded or unfounded, seem to be the main forces preventing family planning from become more widespread in the region.

The differing economic, sociocultural and political circumstances of the countries leave their imprint on every aspect of reproductive health and behaviour. In the Caribbean and Central America, for example, the ages of sexual initiation and union tend to be earlier than in the Andean area, and this is associated with much higher fertility rates among teenagers in the former subregions; the reasons for this pattern would appear to be overwhelmingly of a cultural type. Contraceptive use also varies widely, between countries like Brazil and Colombia where more than 80% of women in conjugal unions have at some time used a modern method of contraception, and others like Guatemala and Haiti where less than a third of these women have ever used some form of modern contraception. These peculiarities are also to be found in patterns of inequity within countries; for example, whereas in some countries access to family planning differs only slightly between social strata (although the difference is always to the detriment of poorer groups), in others the differences are staggering. Perhaps the clearest manifestation of these inequities is to be found in *unmet demand for family planning*. If the situation of the groups at the top and bottom of the educational spectrum is compared, it is found that the proportion of women

with a low level of education in conjugal unions who are unable to meet their family planning needs is from 4 to 10 times higher (depending on the country) than the proportion of women with higher education who are in this position. The reasons for reluctance to use family planning methods also have national peculiarities; in some countries, the main reason is the wish to conceive, while in others health fears predominate, and in a few —generally the most underdeveloped in terms of the coverage of family planning services— the most common causes are ideological objections or ignorance of methods or sources of supply.

It should be stressed that the national peculiarities referred to are not attributable exclusively to public policies that specifically promote family planning. The case of Brazil, which has never had an official policy of this kind, shows that fertility can fall in the different groups in society without there having been any obvious support from the state. Where such support is lacking, however, there are potential risks for society, the stability of couples and the health of women, such as high rates of abortion and limited choice in the supply of contraceptive methods.

In any strategy that aims to address the different aspects of reproductive health in a comprehensive way, it is essential for progress to be made in the provision of care during pregnancy, childbirth and puerperium, and in the area of sexual health, including prevention of sexually transmitted diseases and others that are associated with the reproductive system. As health programmes have concentrated on mother and infant issues, there has been a general improvement in the indicators that measure care given during pregnancy and childbirth. Nonetheless, these indicators, and those relating to morbidity and mortality, still lag behind those of industrialized regions. Indeed, a select few countries have managed to achieve virtually universal coverage with mother and infant services, and have thereby succeeded in reducing infant mortality rates to just over 10 per thousand, which is close to the average for the developed world; by contrast, two countries in the region (Bolivia and Haiti) still have infant mortality rates of over 60 per thousand.

A number of factors have been instrumental in enabling certain countries to make more progress than others in controlling infant mortality. The first factor is the political will to set in train, and the perseverance to continue with, infant health programmes that include primary care components with wide coverage nationally and initiatives directed especially at the most vulnerable sectors of the population. The second factor is consolidation of mother and infant health strategies, with a strong emphasis on monitoring and tracking individuals and applying preventive medicine measures. A third factor, which is peculiar to the area of reproductive health, is that these programmes and strategies have been applied within the context of a steady decline in fertility and in the number of high-risk births. Finally, the whole process of reducing infant mortality has taken place in a context of rising educational levels among the population at large, increasingly widespread knowledge about how people can protect and safeguard their own health, substantial improvements in the coverage of environmental sanitation services and enhanced communications and transport networks. The experience of these countries should be considered with a view not just to reducing the disparities between the countries of the region but also to easing the inequalities found within countries. The differences in infant mortality rates between social strata are acute manifestations of social inequality, as the rates found among poor and marginalized groups are generally several times higher than the averages for the countries concerned; even in those countries that have made the most progress in preventing infant mortality there are substantial relative differences between socio-economic segments.

Although, in general, maternal mortality accounts for only a small proportion of all deaths in the countries of the region, the very fact of its existence is a cause for concern, since in virtually all cases

death can be avoided by means of fairly simple preventive measures or treatments. Although only fragmentary information is available on this health problem, which obviously has a gender bias, Bolivia, Peru and Haiti are countries that can be identified as having high maternal mortality rates in the context of the region as a whole (over 250 per 100 thousand). The information obtained shows, furthermore, that maternal mortality is overwhelmingly a problem of poor and marginalized groups in the population: in Mexico, the rate of maternal mortality is eight times higher in the state of Oaxaca than it is in Nuevo León, and in Bolivia it has been estimated that, in the decade 1984-1994, the rate was six times higher in the rural areas of the Altiplano than in the plains.

Good sexual health is a prerequisite for safe reproduction. Although the information available on sexual health conditions in the region is likewise incomplete, it can be said that there are still numerous shortcomings in the timeliness and effectiveness of preventive care and treatment for a number of diseases, among them certain venereal diseases (syphilis and gonorrhea), some neoplastic diseases (cervical cancer, breast cancer and cancer of the testes) and, of growing importance, diseases related to AIDS/HIV. AIDS is a major concern in the region because of the rapidity with which it has spread, and because it is so lethal; despite the awareness campaigns that have been mounted, there are still segments of the population that are unaware of the existence of AIDS (only a third of rural women in Bolivia and 47% of illiterate women in Peru have heard of AIDS); ignorance about how to prevent AIDS is widespread among groups with a low level of education. Although information and education campaigns dealing with these issues need to be continued, particular importance should be given to those directed at segments of the population that are not covered, i.e., those that have the least exposure to the messages of the communications media and the most difficulty in understanding written public information material, especially if the conditions in which they live pose a high risk of infection.

C. CONCLUSIONS

What can be done about persistent shortcomings and inequities in the coverage and quality of reproductive health care and infringements of reproductive rights, among the poor in particular?

The Latin American and Caribbean Consensus on Population and Development, the Programme of Action adopted at the International Conference on Population and Development and the Latin American and Caribbean Regional Plan of Action on Population and Development provide a set of objectives, suggestions, recommendations and measures aimed at this very objective. The countries have already agreed upon a basic operating strategy: *"offer access to safe motherhood services, particularly those related to sex education, care during pregnancy, childbirth and puerperium, and family planning. These services should offer high quality, integral attention, taking into account the sociocultural identity of the users and assigning priority to the most vulnerable population groups"* (ECLAC/CELADE, 1996, p. 33).

There are great difficulties involved in implementing the above strategy successfully:[3] (i) the deficiencies in material, financial and human resources that need to be overcome are substantial and are

[3] In this section, rather than reiterating the contents of the two instruments for action approved unanimously by the countries of the region (the Latin American and Caribbean Consensus on Population and Development and the Latin American and Caribbean Regional Plan of Action on Population and Development), the focus will be on examining the strategic conclusions that emerge from the results discussed in the document.

particularly acute for the poor and marginalized segments of society, as these require free or subsidized care, implying a considerable charge on public funds; (ii) there is a lack of institutional experience in implementing health services that combine the different aspects of reproductive health (the rather traditional approach of family planning and mother and infant health programmes still predominates in the region); (iii) persistent sociocultural and psychosocial barriers that prevent reproductive health services from being generally accepted, in particular as regards sexual behaviour and the regulation of fertility. These difficulties mainly affect the poorer groups in the population.

Given the diversity of the situations in different countries, which is confirmed in the analysis, reproductive health policies and programmes, although based on reasoning that is generally accepted, need to be given justifications, features and contents that are appropriate to the circumstances of the country concerned. In some countries, existing material, sociocultural and psychosocial conditions are such that a very large proportion of the population could quickly be covered by comprehensive reproductive health care, since there is already massive and structured demand for family planning and mother and infant health services; thus, the main task appears to be to institutionalize reproductive health care, improve its quality and pursue integrated programmes that cover its different aspects, concentrating in particular on promoting the right to have the number of children desired, and to have them safely. In some countries, on the other hand, there are more serious material and sociocultural problems which manifest themselves, among other indicators, in higher levels of fertility, higher rates of ignorance about contraceptive measures, and higher indices of unmet family planning needs and infant mortality; these are countries in which even basic family planning and mother and infant health-care services have not yet been consolidated. National commitment, international support and cooperation from other countries in the region appear to be vital if progress is to be made in improving reproductive health care and in protecting reproductive rights in these countries. In all cases, special care needs to be taken to ensure that the strategy adopted treats men and women as active participants in caring for their own reproductive health and, in addition, ensures that there is a transparent and adequate supply, without coercion, of methods for controlling fertility.

Given the differences between social strata and groups, something that is also established in the analysis, reproductive health policies and programmes need to be adapted to the specific characteristics of these groups. For reproductive health services to be expanded, both promotional programmes and those relating to the supply of services need to be specially tailored to the target groups, which in most cases will be characterized by a situation of poverty linked with: (i) geographical disadvantages, as in the case of people living in the countryside or in thinly populated areas; (ii) cultural peculiarities, such as those that characterize indigenous groups; (iii) social disadvantages, like those faced by segments with little or no schooling; (iv) vulnerability inherent in the stage they are at in the life cycle, as in the case of adolescents; (v) risks due to age, as in the case of women aged under 20 or over 34; (vi) physiological predisposition, as when pre-existing illnesses or genetic factors linked with disease are present; (vii) reproductive history, such as a large number of deliveries or short intervals between pregnancies; (viii) incautious sexual behaviour, one of the consequences of which is manifested in the frequency of sexually transmitted diseases.

Comprehensive and general care for reproductive health is in itself a contribution to people's well-being, particularly in poor groups that have the greatest deficiencies in this area, and at the same time can help to reduce the inequalities that now exist. Achieving this, however, does not guarantee social mobility or an end to poverty. Although the struggle against this scourge may be less complicated if the reproductive patterns of the poor can be prevented from setting up a vicious circle that perpetuates their condition, for poverty to be eradicated it is necessary to remove its immediate causes, which are

associated, among other aspects, with economic growth, structural patterns of income distribution, participation in the labour market, educational performance and social investment. Furthermore, although it is true that if the basic reproductive right could be fully exercised there would be a fall in fertility within the region, since this is consistently higher than the average number of children desired, in the short term it is unlikely that fertility rates will fall below the replacement level, since current reproductive preferences are of the order of 2.5 children per woman. Furthermore, the issue of women who do not succeed in having the average number of children that they wish for, because of either infertility or the demands their environment places upon them, needs to be opened up for thorough debate to find ways for them to exercise their basic reproductive right. The European experience shows that actual fertility, at an advanced stage in the demographic transition, may be lower than the number of children desired, and that measures aimed at bringing the two indicators into line are not very successful.

Education is a powerful factor in changing potentially harmful sexual and reproductive behaviour. Providing the poor with a normal educational career should encourage them to delay forming their first union until they are older, thereby delaying sexual initiation and reducing the incidence of pregnancy in the teenage years and early adolescence. Again, sex education is a central pillar of risk prevention; furthermore, it can help encourage people to take an active approach to reproductive health and the exercise of reproductive rights. It is vital for efforts to be made in this direction within the sphere of education if the effectiveness with which contraceptive methods are used is to be increased, especially in the case of natural or traditional methods; these efforts would also be helpful in meeting the need for wide availability of contraceptive methods and reducing the risks of coercive programmes. Again, both formal education and sex education help to make people receptive to modern medicine, particularly in the case of ethnic groups, while improving the ability of mothers and fathers to prevent illnesses during childhood and giving people greater access to information about sexually transmitted diseases or diseases related to the reproductive system.

Now, formal education and sex education cannot by themselves guarantee responsible sexual and reproductive behaviour. Teenagers need special programmes that are carefully designed to influence sexual, nuptial and reproductive patterns. The figures show clearly that the highest indices of teenage fertility, and of sexual initiation and formation of first unions at early ages, are found among the most disadvantaged groups in society. Yet these groups are not characterized by having greater sexual freedom than others; on the contrary, a substantial proportion of the most disadvantaged segments seem to be virtually "destined" to early sexual initiation and union, due to the scarcity of alternative prospects in life. The wider horizons that education and access to labour market opportunities give young people are fundamental in enabling them to develop plans for their lives that do not include parenthood during their teenage years. As against this, modernization does entail a certain relaxation in social controls on sexual behaviour; although greater sexual freedom is not synonymous with a higher rate of teenage pregnancy, lack of access to the means for regulating fertility may bring about this result, and could also mean a rise in illegitimate births and unions at early ages that are forced on by pregnancy.

Given that maternal mortality can occur at any point during pregnancy, childbirth or puerperium, monitoring of pregnant women by mother and infant health services and institutional care during delivery are both key factors in reducing it. These measures are inadequate, however, because a substantial proportion of maternal mortality appears to be due to the effects of abortion, particularly when this is carried out under poor conditions. This being the case, it is essential for family planning services to be extended so that unwanted fertility can be prevented, and the need for abortion removed.

Finally, increasing gender equity is one of the most promising paths for generating active and structured demand for reproductive health care. Gender equity is also a prerequisite for reproductive rights to be exercised effectively. Experience shows unequivocally that when men and women are regarded as being on an equal footing in society, among the socially desirable results that follow is that women are able to plan their lives in a different way, and the cost structure that pregnancy and child rearing entail for couples is altered for the better. Thus, gender equity tends, in a strategic way, to alter patterns of reproduction and attitudes to birth control, contributing to convergence between actual and desired fertility.

I. BASIC CONCEPTS

A. A GENERAL OVERVIEW OF HUMAN REPRODUCTION

Reproduction is a process that is fundamental to the perpetuation of humankind, and it incorporates biological and social components that are constantly interacting among themselves, sometimes reinforcing and sometimes opposing one another. Among the manifestations of this process, a distinction may be drawn between day-to-day reproduction and intergenerational reproduction. *Day-to-day reproduction* is dependent on a set of factors, such as diet, disease control and environmental conditions, that determine whether individuals can survive. Given that success in coping with these factors can provide only a temporary solution to the encroachment of death upon life, a different and longer-term form of reproduction is required, and this takes the form of procreation of new individuals. As an enduring response to the encroachment referred to, *intergenerational reproduction* is the mechanism that prevents a population from becoming extinct with the passage of time.

There can be no doubt that a dynamic relationship exists between the two types of reproduction. For a generation to reproduce, it is indispensable for a substantial proportion of its members to be able to survive on a day-to-day basis until they have completed their fertile age cycle. Despite the interactions between them, the two types of reproduction are not always compatible. Thus, if the survival of individuals were put at risk —which is what would happen, for example, if there were a prolonged famine— intergenerational reproduction might be relegated to a position of secondary importance for a certain period; extreme manifestations of such priority being given to individual survival (day-to-day reproduction) are the practice of infanticide and the abandonment of children. If on the other hand the survival of an individual posed a threat to the sustainability of the community, the latter might be reluctant to allow the individual to continue living; as an example of this, we may cite the ancient Eskimo custom of abandoning old people to die, because their nomadic lifestyle as hunter-gatherers required them to be highly mobile, a prerequisite that older persons were unable to satisfy.

This document will concentrate on examining intergenerational reproduction, with emphasis accordingly being placed on the role of the two demographic variables that determine this: fertility and mortality. More specifically, the approach that will be adopted, in accordance with the Programme of Action approved by the International Conference on Population and Development (ICPD) held in 1994, will be based on reproductive health and its close connection with fertility, without however neglecting its links with mortality, in particular infant and maternal mortality. More broadly speaking, stress will be placed on the interrelationships between reproductive health and the conditions of poverty that affect the population of Latin America and the Caribbean.

B. REPRODUCTIVE BEHAVIOUR, HEALTH AND RIGHTS

These three concepts, although closely linked, relate to different aspects of reproduction, and thereby help us to understand its repercussions within a given population. Perhaps the most general of these concepts is that of *reproductive behaviour*. Although the reproductive process may be described as a chain of events with a biological basis that leads to the birth of new individuals, in human society these events are shaped within historical, social and cultural contexts that confer specific meanings upon them. Thus, the behaviour of individuals and couples in relation to procreation constitutes a pattern of conduct that, as such, derives from decisions that are made about the issue. These decisions manifest themselves in the individual sphere, but they are influenced by standards and norms that define what socially acceptable behaviour is. Two particularly important aspects covered by these decisions are the number of children that women or couples have (intensity of fertility) and the way their births are spread over the lifetimes of these women or couples (timing of fertility). Both aspects are related to what are regarded as the acceptable ways of regulating the number of children and the correct timing of births, and also to the possibility of separating sexual activity from procreation.

The notion of *reproductive health* is a fundamental aspect of the general subject of health. This issue is a cause for concern both because of its ethical aspects as they relate to the protection and preservation of life, and because, while involving both men and women, it is closely linked to the place of women in society and to the early adaptation of children to society. Reproductive health may be defined as "a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity, in all matters relating to the reproductive system and to its functions and processes. Reproductive health therefore implies that people are able to have a satisfying and safe sex life and that they have the capability to reproduce and the freedom to decide if, when and how often to do so" (United Nations, 1995a, p. 30). This definition also refers to women's right to have access to adequate health services while pregnant and during and after childbirth, and to receive information and training so that they can have access to safe, effective and acceptable methods of family planning of their choice. Likewise, the concept of reproductive health embraces sexual health and incorporates aspects of mental and social health, which were not included in traditional approaches to mother and child health or in programmes that were specifically about family planning.

Finally, the notion of *reproductive rights* embraces certain of the human rights recognized in United Nations documents that set out positions agreed by the international community and enshrined in national laws. One precept from which reproductive rights derive is recognition of the basic right of all couples and individuals "to decide freely and responsibly the number, spacing and timing of their children and to have the information and means to do so" (United Nations, 1995a, p. 30). The same approach is found in the Latin American and Caribbean Consensus on Population and Development, adopted unanimously by the Latin American and Caribbean Regional Conference on Population and Development (Mexico, 1993) held to prepare for the 1994 International Conference on Population and Development, which states: "that the opportunity to regulate fertility is a universally recognized human right, it is recommended that Governments ensure the full exercise of this right as one of their prime objectives and provide the accurate, complete information necessary for that purpose" (p. 15). These rights of course include the ability to take decisions on reproduction without discrimination, coercion or violence.

As may be deduced from the above, for reproductive rights to be effectively exercised, people need to be able to take free, responsible and informed decisions on matters connected with procreation

and their sex lives. Of course, for this condition to be met, individuals need to have options available to them, and these must include the full range of reproductive health services. Thus, the extent to which in practice it is or is not possible to exercise reproductive rights and enjoy reproductive health is a key factor in producing the social and cultural climate within which people act and which determines whether their behaviour as regards procreation is or is not in accordance with their actual aspirations. In other words, the relationships that can be established between the three concepts described help to produce a better understanding of the biological and social processes underlying reproductive and social decisions; likewise, they are of assistance in providing a more precise picture of the effects of those decisions on individuals, couples and their offspring.

C. POPULATION, REPRODUCTIVE HEALTH AND SOCIAL INEQUITY

There is a growing literature on the links between the reproduction of population and the reproduction of poverty. Although the exact nature of these links is still a matter for academic debate, the theoretical and empirical information available indicates that these two types of reproduction have an interactive relationship, and that the characteristics they display differ depending on whether they are examined on the macrosocial or the microsocial scale.

If a society is regarded as a whole, i.e., if the macrosocial scale is taken, different strata can be identified using various criteria, be these of an economic, cultural, geographical or ethnic nature. It is found that the rate of population growth varies between strata; if this growth rate were the only factor involved, it would show which way each stratum in the society concerned was moving in terms of population size. However, in a modern society that does not recognize caste discrimination, the existence of social mobility will be a factor that "distorts" that particular demographic trend. In fact, this mobility might play a more significant role than the differences in population growth rates between strata, and this is something that is of particular importance when we come to consider the incidence of poverty in the population as a whole.

Now, in the context of Latin America and the Caribbean, and perhaps throughout the world, one of the lessons that recent history teaches us is that the optimistic prognoses of steadily decreasing poverty over time, which were based on the expectations generated by the development that took place over the fifteen years following the second world war, were exaggerated. Everything appears to suggest that the effect of the development models implemented, compounded by structural crises, was to place stumbling blocks in the way of social equity. Different indices demonstrate the persistence of inequality, which is manifested both in incomes and in access to basic services; furthermore, recent decades have seen the emergence of new forms of social exclusion, while at the same time the position of the middle layers has been weakening. A telling symptom of this state of affairs is the high incidence of poverty, which affects 40% of the total population of the region as a whole. Given that the poorer groups tend in general to show a higher rate of demographic growth than the rest of the population, this factor makes it more difficult to cope with the challenge of reducing and eradicating marginal living conditions.

Looking at the issue in terms of individuals and families, i.e., from the microsocial point of view, we find that reproductive behaviour has a profound interrelationship with people's socioeconomic condition and their scope for social mobility. This is true both of the number of children people have, and the timing. It is consistently found in the countries of Latin America and the Caribbean that the poor have a greater number of children, and have them earlier. Particular emphasis needs to be laid on the obstacles

entailed by parenthood in early teen age years and in adolescence, particularly for people living in poverty.[4] These obstacles, which arise in the areas of health, nutrition and education and which affect both parents and children, tend to reduce people's opportunities to acquire or develop skills, abilities and knowledge that would turn them into better quality human resources, thus restricting their potential for upward social mobility. It is not unreasonable, therefore, to assign some role in the transmission of poverty between generations to the particular reproductive behaviour of the poor.

The high birth rates of the poor, due both to the direct and opportunity costs that motherhood and child-rearing entail, and to the effects that a high index of dependency has in reducing income in individual households, act as a brake on the accumulation of the capital, of all kinds, that is needed for a process of upward social mobility to take place. Similarly, when people are already coping with limited resources, their situation may be aggravated by reproductive behaviour that, by ignoring control mechanisms, leads to lower per capita investment for children and parents. In these circumstances, there is an increased risk of people turning to undesirable mechanisms to improve their economic circumstances, such as child labour that results in children dropping out of school.

Although the above illustrates the links that it is possible to establish between the socioeconomic position of individuals or human groups, the poor in particular, and reproductive behaviour, these need to be examined with greater conceptual and operational rigour. One example will suffice to indicate the complexity of these links. In a modern society of the urban type with an industrial production base (or a higher tertiary services base), children represent economic costs that are much higher than any benefits they might bring to their parents. Under these circumstances, one might think that the rational option, from a strictly economic point of view, would be to have no children at all. If however this option became the general norm for reproductive behaviour, the short-term effects, over the course of one generation, would be disastrous at the macrosocial level, since they would be nothing less than the virtual extinction of the population. Furthermore, despite its rational basis, that option conflicts with the aspirations and feelings that combine to form people's psychosocial reality and that help ensure that the motivations for having children elude the logic of exclusively economic cost-benefit relationships.

Given that there is still a great deal of uncertainty about reproductive behaviour, and that it is thus necessary to continue researching the trends, patterns and consequences of this for different social strata, everything seems to show that the discussion on policies relating to reproduction should be focusing on the areas of health and rights. As regards the first of these areas, the most important issues are those relating to health problems deriving from reproductive behaviour and to the social inequities suffered by mothers, fathers and children in terms of access to information and reproductive health care. As regards reproductive rights, the issues of most concern are those associated with the gap that exists between the aspirations of couples and their ability to make them a reality; this field includes both the legal aspects involved in the exercise of the freedom to take informed and responsible decisions about reproduction, and access to the means necessary for these decisions to be implemented.

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[4] In this document, the terms teenage fertility and adolescent fertility are used in relation to women who become mothers before their twentieth birthday; parenthood in early teen age years is a subset of this, and refers to women who become mothers before they are fifteen.

II. TRENDS IN REPRODUCTIVE BEHAVIOUR WITHIN DIFFERENT SOCIO-ECONOMIC GROUPS IN LATIN AMERICA AND THE CARIBBEAN

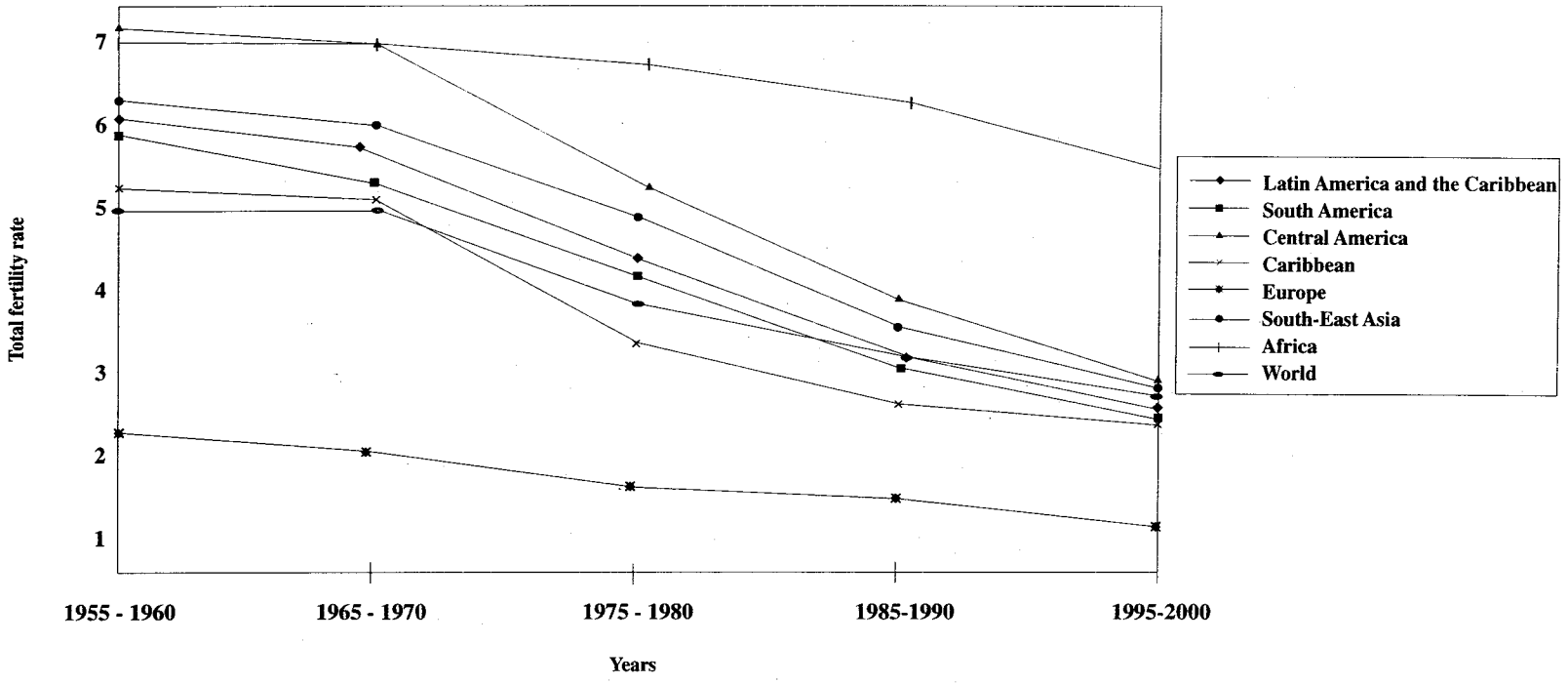
A. THE DECLINING BIRTH RATE

One of the most striking manifestations of the social change undergone by the Latin America and Caribbean region over recent decades has been the radical alteration in reproductive behaviour. As late as the mid-1970s, women were still having an average of six children. Thirty years later, this figure had halved. This enormous decline is unprecedented in human history and can only be compared with the drop recorded, over a similar period, in some countries in South-East Asia (see figure 1 and table 1 of the appendix). As regards future years, forecasts are based on expectations of a more gentle decline, gradually bringing the birth rate down to the population replacement level (this being a total fertility rate of 2.1 children per woman). If we depart from forecasts based on trends, there is room for speculation about the future course of the birth rate; we cannot dismiss the possibility that it may stabilize during certain periods, or that the tendency may be reversed to some degree, perhaps due to temporary circumstances; this could happen when lower fertility rates have been attained.

The decline in fertility is a concrete manifestation of a whole set of social changes that have occurred in the region. It would appear that this decline has occurred not so much because any one economic factor has been operating particularly strongly, but because of the gradual consolidation of a model of modern, urban society which imposes demands, in terms of people's education and working lives, that are difficult to reconcile with a large family. In this model, which is on the way to becoming predominant in the modern world, not only has the pattern of social stratification changed and social relationships (and the functions of institutions) become secularized to an ever greater degree, but decisions now tend to be made in accordance with a logic that is based on the exercise of instrumental rationality, where the calculation of costs and benefits plays a central role. Under these conditions, reproduction is beginning to lose its sacred character, and decisions about this issue are coming to be treated in exactly the same way as any other decisions —and these are covering greater and greater areas of life— that are intended to further the interests, expectations and needs of the individual.

Figure 1

TOTAL FERTILITY RATE: CHANGES IN THE PERIOD 1955-2000
BY MAJOR REGIONS OF THE WORLD

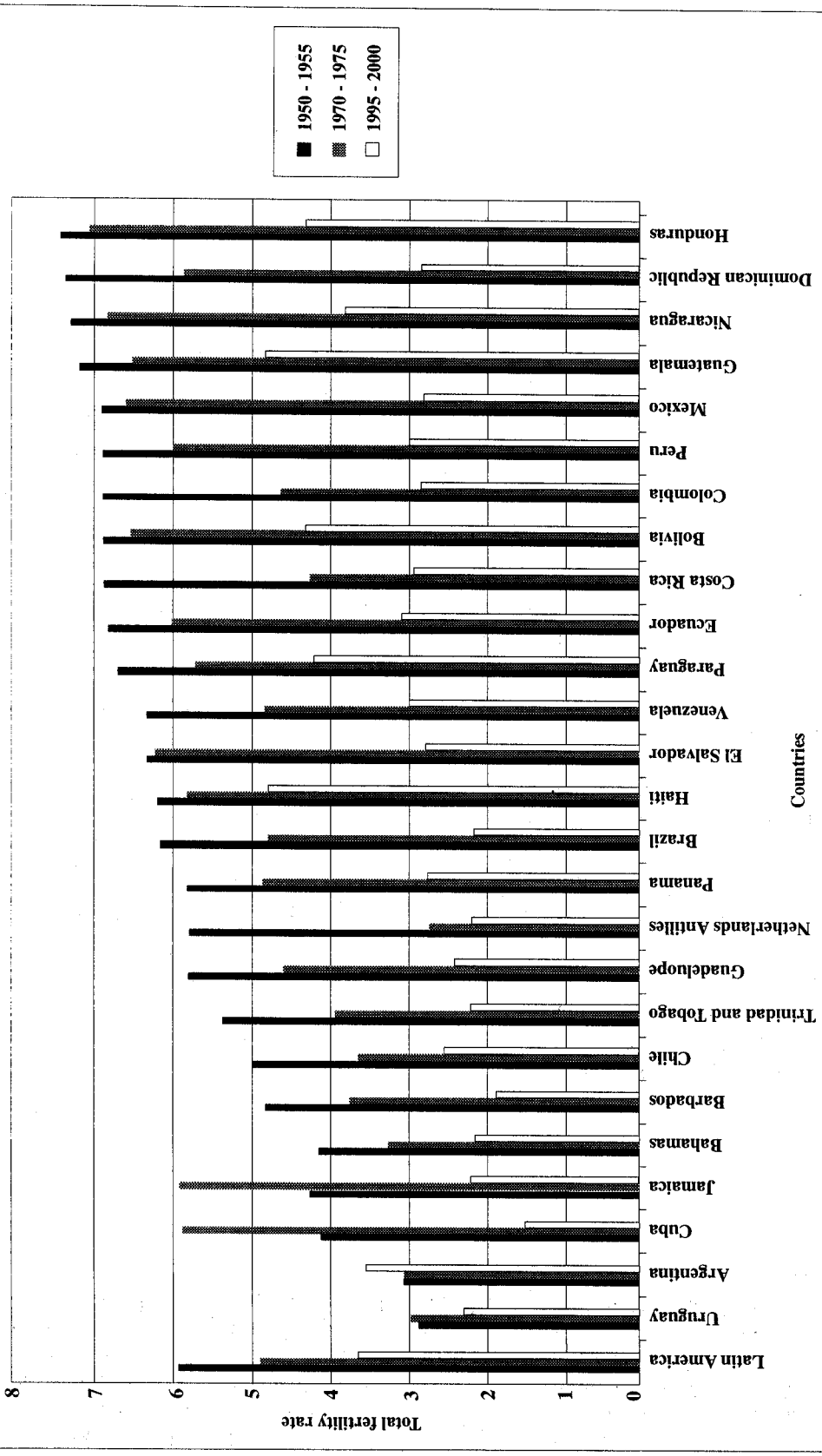


Source: United Nations, *World Population Prospects, the 1994 Revision* (ST/ESA/SER.A/145), United Nations publication, Sales No. E.95.XII.16, New York, 1995.

Figure 2

LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATE

1950-1955, 1970-1975 AND 1995-2000, BY COUNTRY



Source: CELADE, current population estimates and forecasts; United Nations, *World Population Prospects, the 1994 Revision* (ST/ESA/SER.A/145), United Nations publication, Sales No. E.95.XII.16, New York, 1995.

The rapidity with which the birth rate has dropped in the region as a whole should not be allowed to obscure the way in which this process has been marked by the socio-territorial diversity that has traditionally been a characteristic of the countries of Latin America and the Caribbean. Thus, in some countries the drop in fertility has been rapid enough for the fertility rates to have fallen by the middle of the 1990s to levels similar to, and in the case of Cuba and Barbados considerably lower than, those found in Uruguay and Argentina, where the process dates back a long way. In other countries, again, the decline has been less rapid, and in 1997 their total fertility rates of over four children per woman were higher than both the regional and world averages (see figure 2 and table 2 of the appendix). Although a careful study of the trends on which forecasting is based may lead us to suppose that, in the medium term, it is in these latter countries that the greatest declines in fertility will be experienced, it is probable that certain of these national peculiarities will be maintained over time.

In the longer term —towards the third or fourth decade of the 21st century— the mean variance of population forecasts predicts that the fertility of all the countries in the region will converge around a value equivalent to the replacement level. For this prediction to come about, fertility would have to increase in certain cases, such as that of Cuba, Barbados and the Bahamas, since current levels there are now below the replacement value. Furthermore, this convergence forecast is not entirely consistent with the patterns that birth rate declines have shown in recent years in Latin America and the Caribbean; although fertility rates fell across the board between 1950 and 1995, the gap between the total fertility rates in different countries widened.[5] In other words, the decline in fertility, like other changes in the sphere of demographics, has not proved an exception to the historical disparities between the countries of the region. Nonetheless, since these data relate to events that took place in the past, they should not be interpreted as being major impediments to realization of the forecast that levels of reproduction will converge in the future.[6]

Any attempt to discern what will happen in future as regards the falling fertility rate in the countries of Latin America and the Caribbean needs to take into account the strength of the forces that have helped bring about this decline. From this point of view, there appears to be no prospect of the tendencies perceived being reversed; i.e., it is improbable that a sustained increase in fertility can take place in the short term. Of course, whatever features the fertility trend may evince, i.e., the speed and manner of its continued downward course, and at what point this comes to an end, will determine how large populations grow to be and when they will stabilize in the region. These features, however, will be conditioned by various factors of a social, economic and cultural nature. Within this field, an important role will be played by the different social agents that influence procreation; in particular, by policies, be they explicit or implicit, that deal with the regulation of fertility.

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[5] The increasing heterogeneity within the region is demonstrated by the coefficient of variation for the series of total fertility rates in the countries, which rose from 22% in 1952 to 26% in 1972 and 31% in 1997.

[6] In fact, it is difficult to conceive that the decline in fertility will maintain its momentum in those countries where the population replacement threshold is now being approached, and more difficult still in the cases where the figures are already below that level. Consequently, it is probable that, in the short or medium term, the decline in fertility will steepen in countries that are still lagging in this respect; this would give some plausibility to the convergence theory.

B. DIFFERENCES IN FERTILITY WITHIN COUNTRIES

Socio-territorial diversity does not mean just the differences between countries; some of its most striking manifestations are found within individual ones, and are linked to social inequity. This link can be discerned by considering fertility values in different groups identified on the basis of their socioeconomic level. These differences, furthermore, tend to perpetuate themselves, since they produce real disadvantages for socially vulnerable segments. All the information available indicates that the groups which lag most in society, those whose members are furthest behind in terms of their participation in the structure of production, show the highest rates of fertility. At the same time, it is these groups that are worst placed in material terms to meet the challenges that this type of reproductive behaviour entails.

Although a great many criteria can be used to break down the relevant information in order to illustrate socio-territorial inequality within countries, two will suffice in the first instance: area of residence and level of education. The use of *areas of residence* in research on differences in fertility rates is justified because the location of population is linked with patterns of geographical distribution both of production —and the way production is organized— and of the lifestyles of individuals and communities. Both distributions appear to play a part in the differentiating effect produced by factors that determine reproductive behaviour. For the most part, the area of residence can be dealt with in terms of the urban-rural divide, and the information available for analysing this is fairly comparable between countries. The notion of this divide, furthermore, is of great use for highlighting disparities between the economic, social and cultural conditions prevailing in urban and rural areas, which seem to be instrumental in determining the specific reproductive behaviour patterns of each area.

The data from the most recent demographic and health surveys are very telling in this respect: we find that fertility levels are consistently higher in the rural environment than in the urban one (see figures 3 and 4 and table 3 of the appendix).[7] Of the twelve countries for which comparable information was available, the smallest discrepancy between the total fertility rates for urban and rural areas was found in Costa Rica, where the difference was 35%; in all other cases, the disparity was in excess of 50%.[8] These differences, which have been recorded regularly over the years, have proved persistent, and the reasons for them are to be found, at least in part, in the differing scale of the costs and benefits that children bring in these different areas of residence, and in the cultural patterns that prevail, which are also different as far as reproduction is concerned. Undoubtedly, a decisive factor in these differences is the extent to which vast segments of the rural population lag behind economically, socially and culturally, having only limited access to the resources and benefits of modernity.

One point that is worth emphasizing is that the differences between the rural and urban environments as regards the total fertility rate are not closely linked with the levels of the indicator in the urban environment, although they are with those of the rural environment.[9] This would suggest that in

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[7] The series of demographic and health surveys, including those known by this name in English and abbreviated to DHS, forms part of a long-term worldwide project financed mainly by the United States Agency for International Development (USAID).

[8] It should be noted that this difference was recorded between the Metropolitan Area of San José on the one hand, and rural areas on the other.

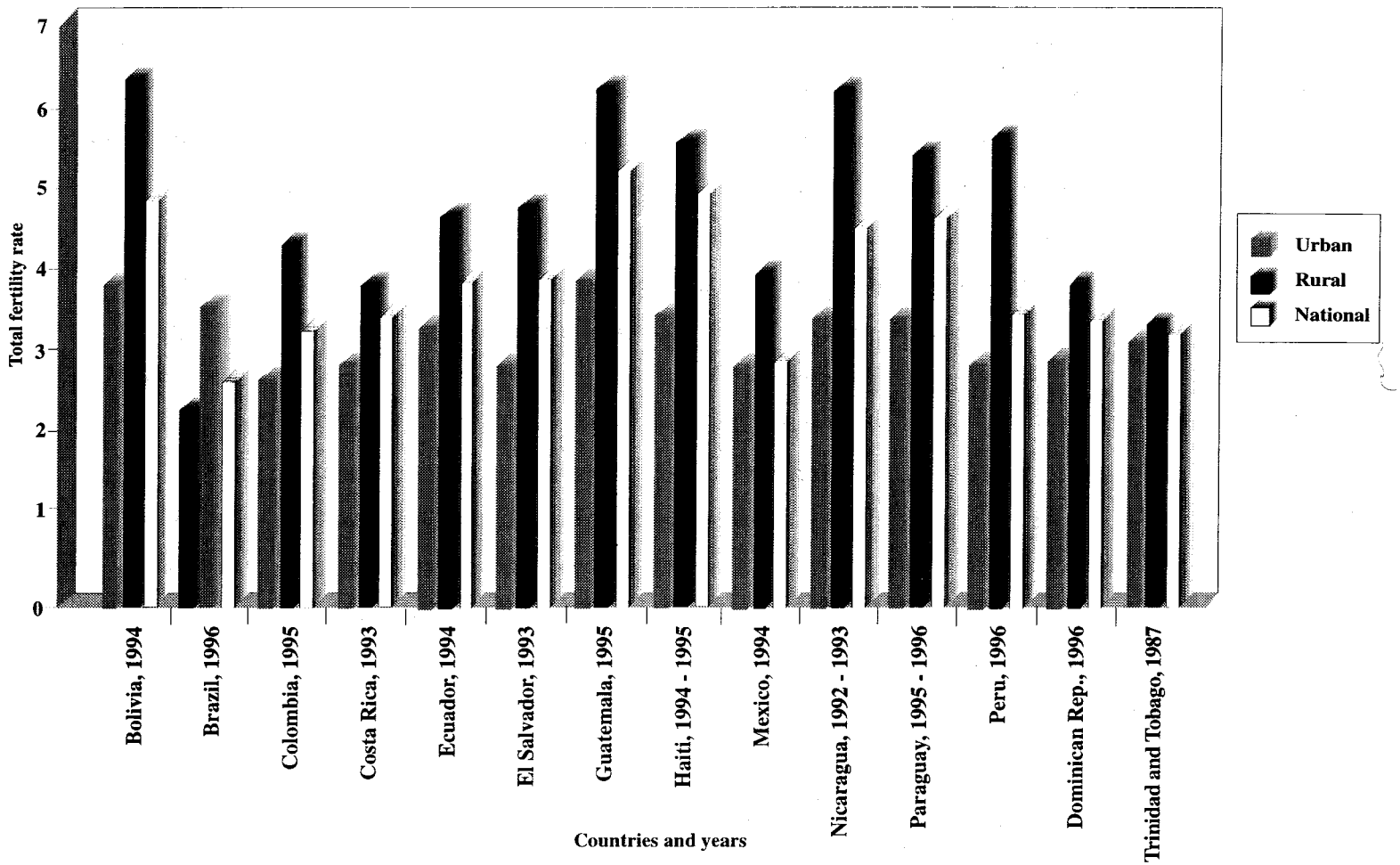
[9] The difference between the total fertility rates (TFRs) in urban and rural areas shows a simple correlation coefficient of only 0.16 with the urban TFR; on the other hand, this coefficient rises to 0.68 when the correlation is with the rural TFR. Again, the simple correlation coefficient between the urban and rural TFRs is 0.83.

those countries that have higher fertility in the rural area —where it would seem that the sustained reduction in fertility has scarcely begun— there are more pronounced inequalities between the two areas of residence; these inequalities stand out because in the urban areas of those same countries we can find evidence of a steady decline in fertility. Apparently, to make progress in reducing fertility in countries that are largely rural, it would be necessary to break down the resistance still found among the population of the countryside. Thus, given that fertility is declining in all the countries of the region, a historic gap must be opening up between urban and rural areas in a not inconsiderable proportion of these, since it is only in the urban areas that we can discern a sustained shift in reproductive behaviour.

This observation may be regarded as giving further expression to a trait which might be considered almost axiomatic for any analysis of the social situation in Latin America and the Caribbean: the countries of the region have roots, structural processes and basic characteristics in common, but there are also profound differences between them. This is why it is relevant to consider countries separately when interpreting the reproductive behaviour observed in the rural and urban areas of each of them. In fact, we can discern substantial differences in the fertility levels of these countries, even after adjusting for the effects of the area of residence.[10] Of course, national peculiarities are in the background as regards the differences observed between urban and rural areas. In some cases these peculiarities consist of circumstances that are specific to rural areas which, despite being beyond the reach of the communications media and far from the mechanisms of citizen participation, use production techniques that require little human capital. In other cases, these peculiarities are manifested by rural environments that are relatively well integrated into the processes of economic and sociocultural change, and this gives rise to improvements in material living conditions and easy access to the means for securing fuller participation in the society and economy of the modern world in the form of education, knowledge, information and credit, among other things.

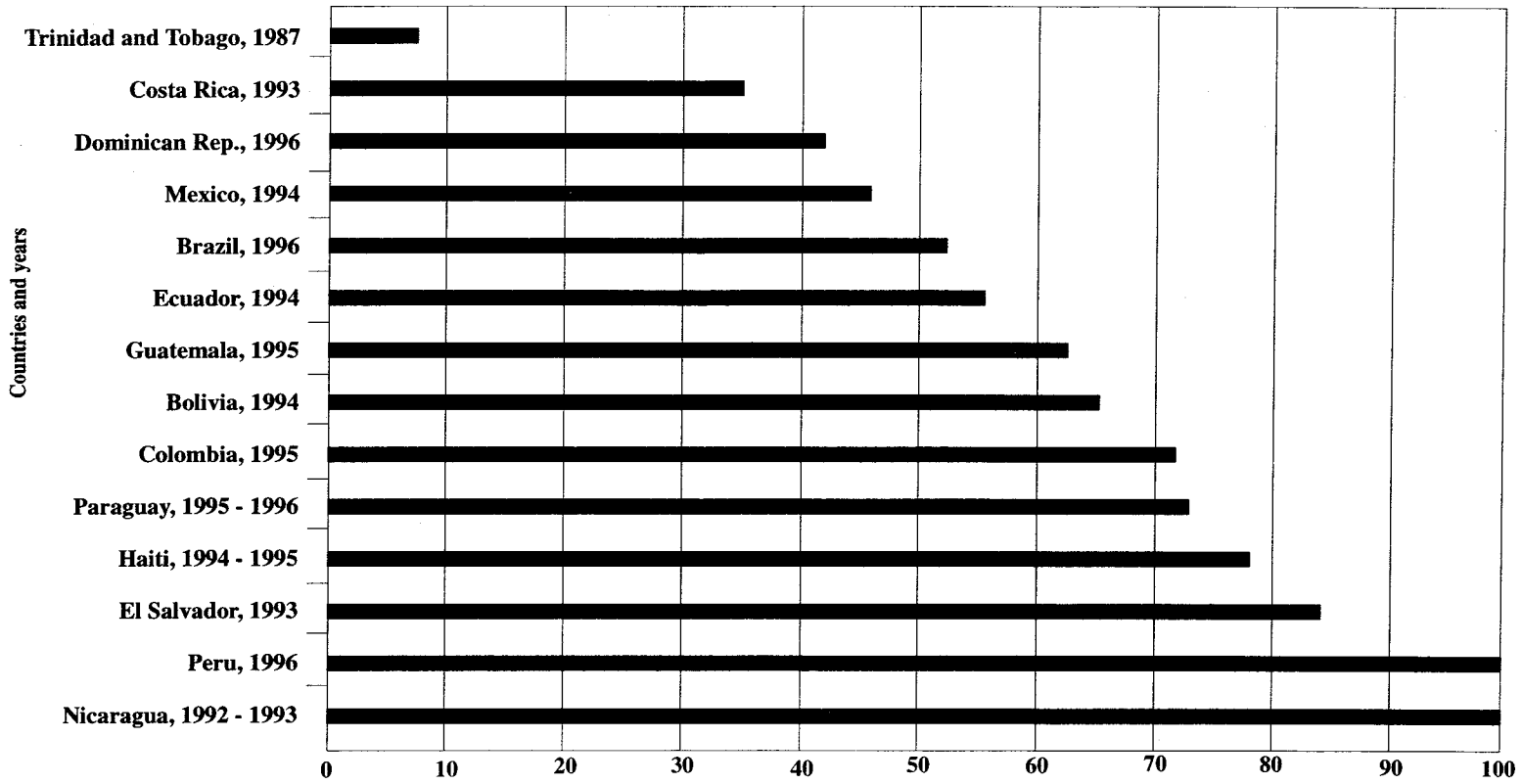
[10] The discrepancies referred to are reflected in variation coefficients of 15% for urban areas and 20% for rural ones; although these values reflect a diversity that is by no means negligible, they are lower than the coefficient of 30% that is obtained if the area of residence is not allowed for.

Figure 3
LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATES OF URBAN AND RURAL RESIDENTS AND NATIONAL TOTALS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 4
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE DIFFERENCE IN FERTILITY BY AREA OF RESIDENCE, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Box 1

RECENT FERTILITY TRENDS IN LATIN AMERICAN COUNTRIES, BY AREA OF RESIDENCE

The information collected in Latin American countries where two or more demographic and health surveys have been carried out in the last twelve years shows that, in general, fertility has been on the decline in urban and rural areas. Nonetheless, this decline has not been equally rapid in the two areas of residence. In particular, in countries where the demographic transition process has begun only recently and has not yet had profound effects (Bolivia, Guatemala and Paraguay), the rate of decline has been slower in rural areas, where fertility is still at high levels. In countries where the demographic transition process is at a more advanced stage, on the other hand, the annual average rate of decline in fertility has been higher in rural areas than in urban ones (Brazil, Dominican Republic and Colombia).

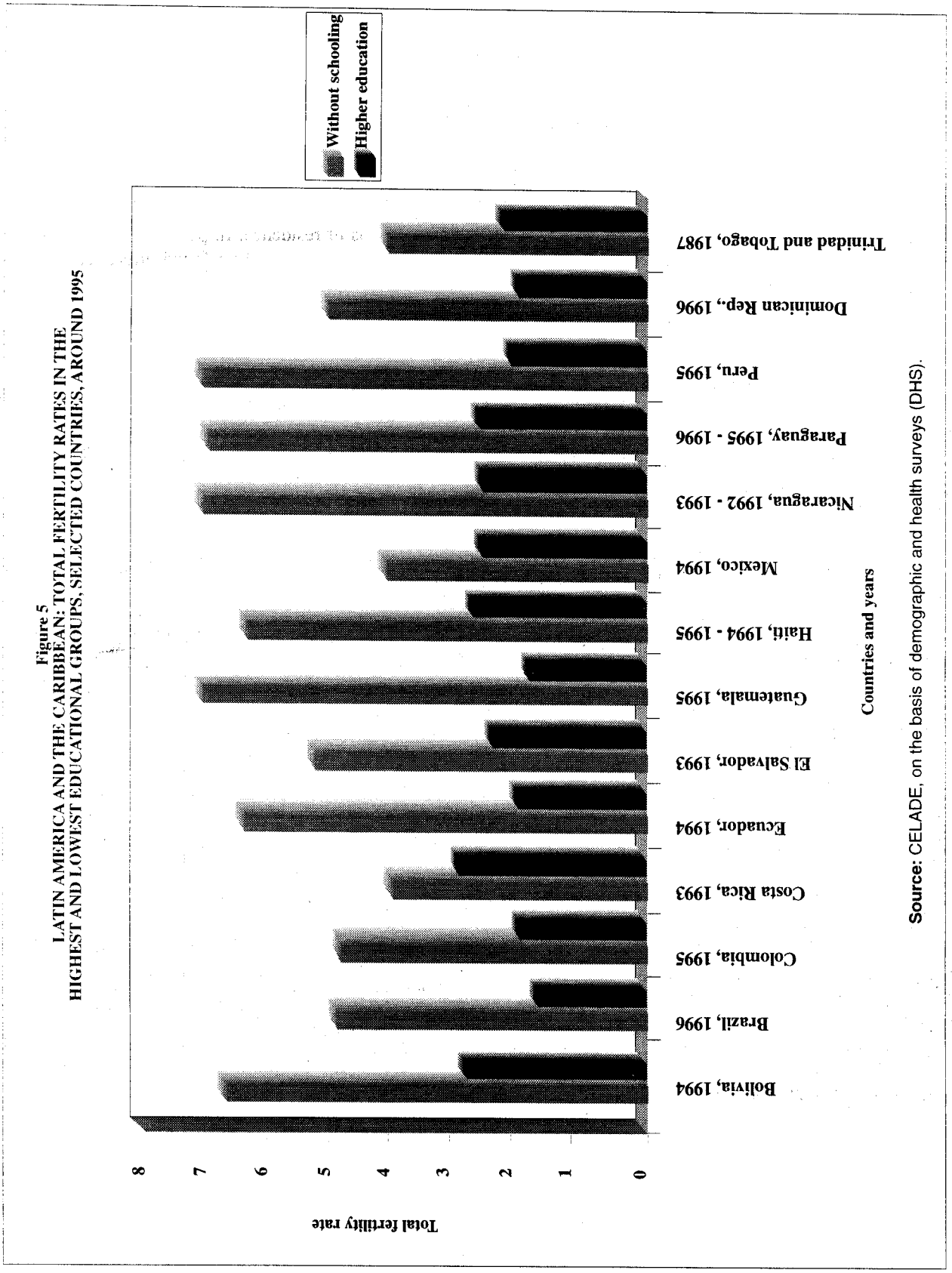
It also appears from the data available that the transition towards lower levels of reproduction has taken place first in urban areas, manifesting itself only later in rural ones. This at least is suggested by the fact that it is in the countries with a total urban fertility rate of less than 3 children per woman (Brazil, Colombia, Peru and the Dominican Republic) that rural fertility shows a greater tendency to decline than does urban fertility. From this same observation it may be inferred that the process of urbanization could be one of the mechanisms that exerts downward pressure on fertility within countries.

Change in the total fertility rate by area of residence in eight countries of Latin America, 1980s and 1990s

	Area of residence			Area of residence	
Country and years	Urban	Rural	Country and years	Urban	Rural
Bolivia, 1989	4.0	6.4	Brazil, 1986	3.0	5.0
Bolivia, 1994	3.8	6.3	Brazil, 1996	2.3	3.5
Rate of increase	-1.0	-0.3		-2.7	-3.6
Colombia, 1986	2.8	4.9	Ecuador, 1987	3.5	5.4
Colombia, 1990	2.5	3.8	Ecuador, 1989	3.3	5.4
Colombia, 1995	2.5	4.3	Ecuador,1994	3.0	4.6
Rate of increase	-1.3	-1.5		-2.2	-2.3
Guatemala, 1987	4.1	6.5	Paraguay, 1990	3.6	6.1
Guatemala, 1995	3.8	6.2	Paraguay, 1996	3.3	5.7
Rate of increase	-0.9	-0.6		-1.4	-1.0
Peru, 1986	3.1	6.3	Dominican Rep., 1991	2.8	4.0
Peru, 1991-1992	2.8	6.2	Dominican Rep., 1996	2.8	4.0
Peru, 1995	2.8	5.6	**Rate of increase**	0.0	-1.9
Rate of increase	-1.1	-1.3			

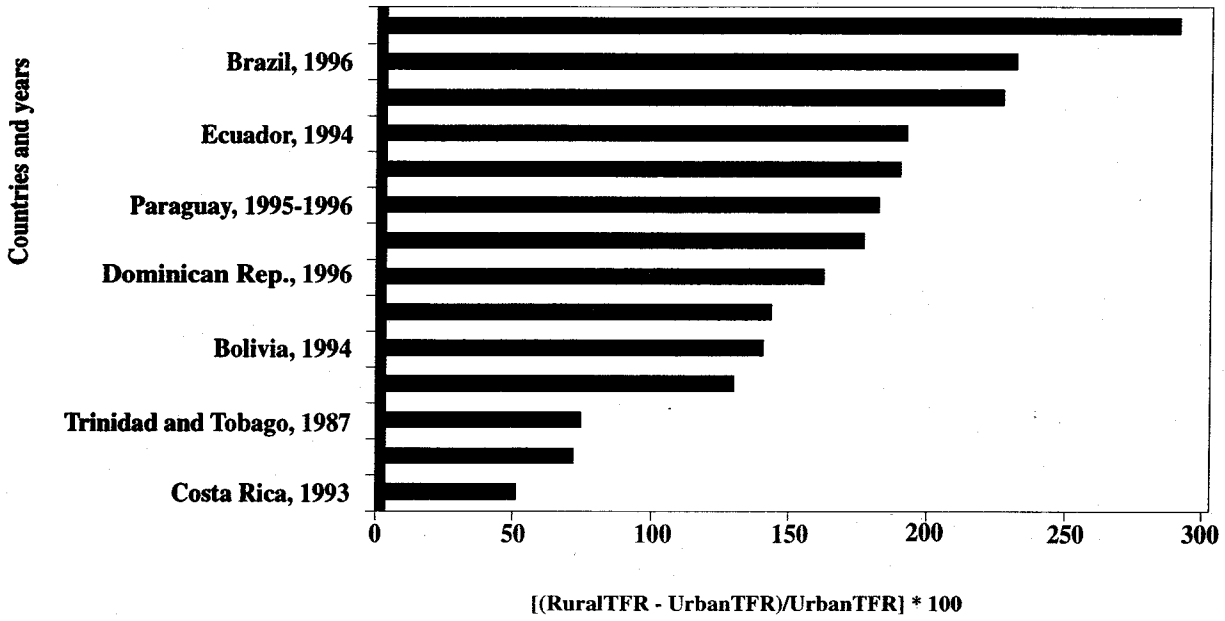
Source: Demographic and health surveys (DHS); CELADE, on the basis of official data.

Figure 5
LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATES IN THE HIGHEST AND LOWEST EDUCATIONAL GROUPS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 6
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE DIFFERENCE IN TFR BETWEEN WOMEN WITH NO SCHOOLING AND WOMEN WITH HIGHER EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

People's *level of education*, as an indicator of social segmentation, is an important differentiating factor in reproductive behaviour, since it has an effect on the economic and socio-cultural components of the decisions that people make about having children. In relation to the economic components of these decisions, people's level of education affects their appreciation of the direct, indirect and opportunity costs that paternity or maternity entails; in contemporary life, education helps to prepare people to perform social functions which, because of the demands they impose, tend to be incompatible with a large number of offspring. As regards the socio-cultural components of decisions made about reproduction, people's level of education conditions the way they participate in the realm of secularization and is instrumental in redefining their criteria of rationality; consequently, it encourages individuals to evaluate, in terms of the aims they have set themselves in life, the extent to which having children is compatible with their expectations in terms of social mobility and careers. These components have been examined in research using data from different sources; in particular, the demographic and health surveys carried out during the 1990s in several Latin American and Caribbean countries have brought to light persistent differences in reproductive behaviour in relation to people's level of schooling. Within any given country, a higher level of education is found to coincide consistently with a lower level of fertility (see figures 5 and 6 and table 4 of the appendix).

In order to illustrate more clearly the inequities associated with education, and thereby make it easier to carry out a comparative analysis of the information available from demographic and health surveys, it was considered that the best approach would be to look at the circumstances of people situated at either end of the educational spectrum: those without schooling, and those with higher education. Focusing on these two levels enables us to examine the extremes in terms of people's degree of social integration and the likelihood of their attaining upward social mobility. Study of these data reveals, firstly, that the differences between the reproduction indicators of the two sets of people are substantial, the disparities that emerge being much greater than those that are seen when urban and rural areas are compared with one another.[11] In fact in all cases, apart from that of Costa Rica, the total fertility rates of women with no schooling are more than double —and, in the case of Guatemala, are triple— those of women who have passed through higher education.[12] This marked discrepancy brings to light the high fertility rate of women without schooling, as these, except in the case of Costa Rica, average five children or more. These very high figures reveal that women in this position have scarcely begun, if they have begun at all, to adopt the kinds of reproductive behaviour that have more and more been becoming the norm in the societies of Latin America and the Caribbean. This degree of fertility means that both women without schooling and their families are facing especially high obstacles in terms of health and participation in the workforce. Furthermore, these difficulties are likely to have repercussions on the upbringing and education of the children and restrict their horizon in terms of the real opportunities available to them. By contrast, in the twelve countries for which comparable information is available, women with a high level of education have on average less than three children each. Furthermore, in four of these countries, the fertility rates of these women are below the replacement level. Thus, it now

[11] This does not mean that education is necessarily a factor that leads to greater differentiation in terms of fertility than a person's area of residence. It needs to be borne in mind that the comparison by educational level is being carried out between the extreme groups (people without schooling as against people with higher education) of a set of specific categories; the comparison by area of residence, on the other hand, refers to segments that, albeit mutually exclusive, are contiguous, have a high degree of internal diversity and, taken together, include the entire population.

[12] The exceptional situation of Costa Rica can be explained in part by the type of information available, which made it necessary to replace the "without schooling" category by a category including those with a "low" level of education; this includes both women who have not attended school and those who failed to complete the primary stage.

appears to be the norm for women who have attained a high level of education not only to want a small family of two or so children, but to have access to the means to achieve this.

It should be added that, as was mentioned in relation to areas of residence, the specific features of fertility rates differ by country, even after adjusting for the effects of education.[13] Although it is clear that education is a variable that has enormous influence in producing differentiation between patterns of reproduction, this influence cannot be isolated from the national context in which it operates. The sharp contrast between highly educated women in Paraguay and Brazil gives some idea of these peculiarities: the total fertility rate of these women in Paraguay is virtually double what it is in Brazil. In these circumstances, the influence of national peculiarities on reproductive behaviour makes itself felt not so much through the medium of the content or characteristics of education, as through a whole range of social, economic and cultural factors that give particular meanings to educational usages. Likewise, it is unlikely that raising a population's level of education can be a sufficient condition —although it is a necessary one— for bringing about a hypothetical convergence in fertility rates between countries. For this convergence to take place it is necessary not only to make progress in education, but to put in place conditions that enable greater uniformity to be achieved in fundamental aspects of society, these being the way people participate in productive activities, social and gender equity, secularization and the role of the family.

The tenuousness of the linkage between the fertility rates of women without schooling and those of women with higher education well illustrates the importance of the national environment as a factor that conditions the effects of education on fertility.[14] This fact points to the existence of demographic dynamics that differ by educational level *in each country*. Thus, in some cases, women with a high level of education have fertility rates that are exceedingly low in relation to what would be expected in view of the stage reached in the demographic transition process by the country as a whole. As an example, we can consider the case of Guatemala, a country where the demographic transition is only in its initial stages and women without schooling, who make up a substantial proportion of the female population, have an average of more than seven children; furthermore, various indicators reveal that the economic and social development of the country is not very great. Nonetheless, Guatemalan women who have attained a high level of education are distinguished by fertility levels that are similar to those seen in several Western European countries. Although it would be reasonable to maintain that this behaviour is due to the fact that Guatemalan women with higher education are a select minority, this interpretation does not seem to hold true in the case of other countries, like Paraguay, where women with a high level of education have considerably higher fertility rates; on the other hand, in some countries where access by women to higher education is somewhat more widespread, such as Colombia, the total fertility rates of the group that has attained this level of education are similar to those noted in Guatemala.

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[13] The coefficient of variation between different countries as regards the TFR of women with no schooling is similar to that obtained from the series covering women with a high level of education (around 16%).

[14] The simple correlation coefficient between the data from different countries in the two series of rates is only 0.11.

Although the fertility indices of women without schooling are generally high, they too show signs of being influenced by the national context. In some countries, these indicators stand at relatively low levels. This could reflect the emergence of a rapid demographic transition process, as appears to be the case in El Salvador and the Dominican Republic.[15] Since the conditions of social equity in these countries are not significantly different from what they are in others, it must be supposed that this apparent acceleration in the demographic transition, and the lower fertility rates of women without schooling, are due to the implementation of policies and programmes to reduce the fertility of specific groups in the population. Although these measures appear to have been effective, given that the fertility rates of women without schooling are lower than those seen in other countries, their scope is still limited, as can be deduced from the persistence of total rates in excess of five children per woman. The persistence of this state of affairs would seem to be largely due to the continuing existence of structural conditions of marginalization.

[15] The fact that the total fertility rate of women without schooling is lower in Haiti than in other countries at a more advanced stage of the demographic transition such as Ecuador, Paraguay or Peru could be due to poor health conditions acting as an obstacle to higher fertility.

Box 2

THE REPRODUCTIVE BEHAVIOUR OF DIFFERENT SOCIAL GROUPS: THE CASES OF BOLIVIA, 1994 AND COLOMBIA, 1995

After adjustment for education, the differences in reproductive behaviour between the urban and rural areas of the countries diminish. In Bolivia, for example, women without schooling have higher levels of fertility in both areas. Of course, it cannot be inferred from this that the area of residence is irrelevant to reproductive behaviour, since the results from Bolivia also make it plain that among women who have gone into the formal education system, fertility rates in rural areas are consistently higher than those found in urban areas.

Processing of the microdatabases of the Demographic and Health Survey has enabled a broader and more precise study of these relationships to be carried out, and disparities between countries brought to light. In fact, if the cases of Colombia and Bolivia are collated, it is found that among women without schooling the differences between urban and rural reproductive behaviour are smaller; in Bolivia, the differences for certain aspects of reproductive behaviour are practically nil. In Colombia, inequalities are most clearly manifest in the area of contraceptive use, and thus in the timing and number of births. As regards attitudes towards and knowledge of family planning, on the other hand, there are practically no differences between urban and rural women without schooling.

Comparison of the information profiles of Bolivia and Colombia also enables us to identify the reason behind the great dissimilarity in the demographic situations of the two countries. In particular, among the women who may be regarded as the most excluded in Colombia, i.e., rural women without schooling, the index of modern contraceptive use is 20 times higher than it is among their Bolivian counterparts.

INDICATORS OF REPRODUCTIVE BEHAVIOUR IN THE HIGHEST AND LOWEST EDUCATIONAL GROUPS BY AREA OF RESIDENCE, COLOMBIA, 1995 AND BOLIVIA, 1994

	COLOMBIA			BOLIVIA		
Percentage of women without schooling who:	Rural	Urban	Total	Rural	Urban	Total
had their first child before they were 18	43.9	35.3	40.8	25.8	26.7	26.1
had six or more children	38.3	25.1	33.4	49.5	40.6	47.2
did not want to have their last child	48.8	37.2	46.1	62.0	62.9	62.2
are familiar with some modern method of contraception[a]	98.7	97.3	98.2	35.8	66.4	44.0
have at some time used a modern method[a]	55.6	69.7	60.8	2.8	8.7	4.4
currently use a modern method[a]	36.8	46.8	40.5	1.7	4.9	2.5
approve of family planning	86.1	86.8	86.4	55.7	66.1	58.5
have unmet family planning needs[a]	15.3	8.9	13.1	38.6	26.4	35.8
whose partners want more children than they do	22.4	21.1	21.9	15.4	13.8	15.0
Percentage of women with higher education who:[b]						
had their first child before they were 18	5.4	4.1	4.9	4.5	6.7	6.6
had six or more children	0.0	0.1	0.1	0.0	1.1	1.0
did not want to have their last child	15.2	9.1	9.6	18.9	12.5	12.9
are familiar with some modern method of contraception	100.0	100.0	100.0	97.9	99.9	99.8
have at some time used a modern method[a]	72.5	69.4	69.6	31.5	45.8	45.0
currently use a modern method[a]	38.5	40.1	40.1	23.2	25.3	25.2
approve of family planning	96.5	98.5	98.4	96.4	96.9	96.8
have unmet family planning needs[a]	0.0	4.0	3.7	7.9	3.6	3.8
whose partners want more children than they do[a]	23.9	17.5	17.9	10.4	20.3	19.8

Source: Demography and health surveys (DHS).

[a] Married women.

[b] In general, the data for women with higher education is based on a small number of cases.

III. CHANGES IN THE TIMING OF REPRODUCTION: INCREASED CONCENTRATION AND GREATER PROMINENCE OF TEENAGE FERTILITY

A. THE CHANGE IN TIMING

The decline in fertility has differed in rapidity between the different ages at which Latin American and Caribbean women have children, the sharpest reductions being seen, generally speaking, in the latter stages of reproductive life, over the age of 35. As a result, fertility has tended to be concentrated between the ages of 20 and 34, a development which is generally regarded as positive, since the health risks attendant upon pregnancy and childbirth are less frequent at these ages. Furthermore, from the point of view of cultural values, these are supposed to be the ideal ages for taking on the physical and material demands of procreation and child rearing: individuals enter fully into a stage of the life cycle that coincides with the end of regular education and entry into the world of work, making it easier to meet the economic burdens of bringing up children and reducing possible conflicts between child-care responsibilities and others.

As mentioned, the concentration of fertility between the ages of 20 and 34 has come about because of the decline in the fertility rates among older women. As against this, the under-20s group has not contributed to this concentration, but instead has held out against the general fall in fertility; although, in general, the fertility rates of this group have declined, the rate of decline has been lower than in the other age groups. This fact has become a cause for concern for most of the governments of Latin America and the Caribbean, which have agreed upon the need to "implement programmes which will help reduce the incidence of teenage pregnancy and its psychosocial consequences and will promote continuation of the mothers' educational process and create improved conditions for their insertion into the labour market and society as a whole" (ECLAC/CELADE, 1996, p. 33). Likewise, these governments have proposed "to make maximum efforts to reduce the incidence of unplanned and unwanted adolescent pregnancies" (ECLAC/CELADE, 1996, p. 35). This concern springs from the conviction that teenage fertility involves risks both for the children and for their parents and families.

Of course, while making the above observations, it must not be forgotten that patterns of fertility —in particular among teenagers— are established within specific sociocultural contexts. Thus, among several ethnic groups in the region, the norms governing the beginning of people's sex lives and entry into marital union mean that teenage fertility is perfectly normal and consistent with the workings of the social group or community to which the teenagers belong. In these circumstances, although there are health risks, teenage parenthood does not lead to social restrictions or exclusion; it can of course act as an obstacle for people who wish or are obliged to leave the community environment. Nonetheless, the extent to which the population of Latin America and the Caribbean is concentrated in cities means that cultural frameworks associated with the lifestyles and workings of an urban society are the dominant ones.

Against this type of background, it is understandable that teenage fertility should become a cause for concern, since it make it harder to bring about the conditions whereby people can gain access to opportunities for improving their position in the workplace. Furthermore, in modern urban societies adolescence is regarded as a stage of transition between more clearly defined phases of the life cycle. From this point of view, teenagers are regarded as lacking the firm psychological preparation needed to deal with the demands of pregnancy, childbirth and childcare.

Examination of the information available suggests that the timing of births has changed substantially in Latin America and the Caribbean. Data from the beginning of the 1950s show that very nearly a quarter of all children were born to women aged 35 and over; by the end of the 1990s, this proportion had fallen to around 15%. Teenagers accounted for only one third as many births as women aged 35 or over in the 1950s; in the five year period 1995-2000, the fertility rates of the two groups are seen to be similar (see figures 7 and 8 and table 5 of the appendix). To put it another way, the concentration of fertility between the ages of 20 and 34, while reducing the number of births to older women in relative as well as absolute terms, has not had the same effect as regards the proportion of births to teenagers, which has risen.[16] These changes in the structure of fertility across the region have meant a shift towards younger age groups; the peak is no longer in the 25 to 29 age group, but in the 20 to 24 group. This phenomenon appears to be a unique feature of fertility in Latin America and the Caribbean; in other regions of the world, the decline in levels of reproduction has produced a concentration between the ages of 25 and 34, this being explained by the difficulties of reconciling motherhood with the growing demands being experienced by women in terms of education and work.[17]

[16] Since fertility has diminished in all age groups, this rise is to be understood as an increase in the percentage of births to teenagers in relation the total.

[17] It is within the realms of possibility, and perhaps of probability, that these demands will also arise in the countries of the region in future. It is reasonable to suppose, therefore, that future tendencies in fertility will move away from the present ones, with these being replaced by new patterns of fertility distribution by age. Of course, this is a rich field for speculation about the interactions between social change and reproductive behaviour.

B. TRENDS IN TEENAGE FERTILITY

In Latin America and the Caribbean as a whole, the level of teenage fertility has dropped at a noticeably slower pace than that of women at the other childbearing ages.[18] Due to this uneven pattern of change, the contribution made by teenage mothers to total fertility has increased from a little over 8% in the five year period from 1950 to 1955 to around 14% in the last five years of the 20th century. Even in countries that have followed different paths in demographic terms, the reproductive behaviour of teenagers has shown a trend that is contrary to the general decline in fertility. In the English-speaking Caribbean, the changes in teenage birth rates have been particularly complex: up until the second half of the 1970s the rate fluctuated, after which it fell steadily, and for the last fifteen years it has declined at a rate similar to those seen in the other fertile age groups. Nonetheless, the net effect has been an increase in teenage births as a proportion of the total, so that this issue is still a social and health problem of high priority for the Caribbean countries (Boland, 1997).[19]

Although the fertility rates of teenagers in Brazil have been below the regional average, between the 1980-1985 and 1990-1995 periods there was an increase which, although slight, represented a setback to the declining trend noted since the end of the 1970s. Since there is no certainty as to what factors might have contributed to this apparent reversal, it may be surmised that a temporary set of circumstances was responsible rather than a genuine change in the behaviour of certain groups in the population. Another case of rising teenage fertility seen in Argentina between the 1960s and the second half of the 1980s appears to have been a passing phase, as the rate has begun to decline in the 1990s. The trend of fertility among teenagers in Cuba has been different: after being among the lowest in the region in 1950, the teenage birth rate in this country showed a definite increase up until the beginning of the 1970s, surpassing the figures seen even in countries with very high fertility rates; after this rise, it has tended to decline, but at a slower rate than total fertility. As a result, at the beginning of the 1990s the birth rate among Cuban teenagers was similar to what it had been forty years previously; over this same period, the total fertility rate of the country fell to a third of its initial value.

Interpretation of the fluctuations exhibited by teenage fertility rates is complicated by the need to take account of numerous factors associated with changes in types of behaviour that have a high degree of specificity; the lack of suitable background information can lead to erroneous ideas being formed. For example, the increase recorded in Cuba between 1960 and 1980 might be put down to a combination of inadequate sex education and limited use (and knowledge) of contraceptive measures. Yet in Cuba there is a far-reaching programme of formal teaching about sexuality and reproduction which is open to everybody, especially teenagers. Furthermore, there is an official supply of contraceptive materials.

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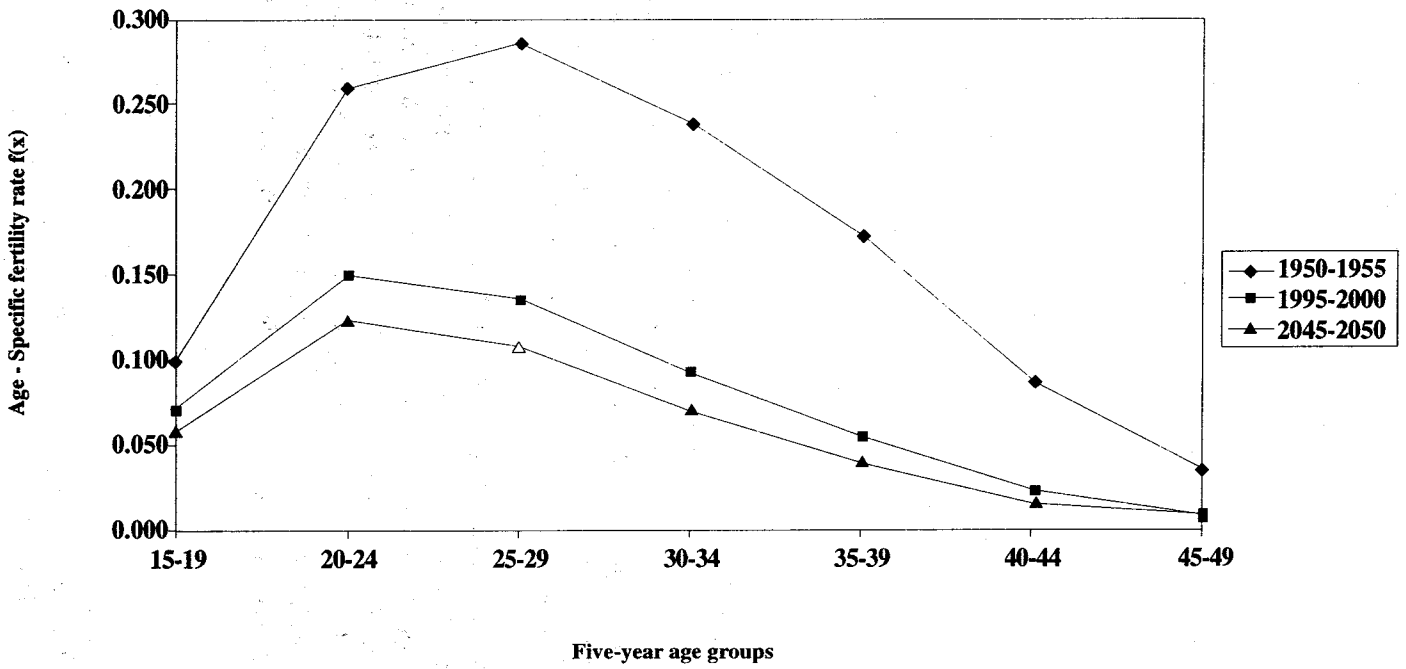
[18] The specific rate of fertility among women aged from 15 to 19 dropped from 100 per thousand at the beginning of the 1950s to 73 per thousand at the end of the 1990s. During the same period, by contrast, the birth rate of the 25 to 29 age group, which was the highest during the 1950s, fell from 289 per thousand to 137 per thousand, and that of the 20 to 24 age group, which was the highest during the 1990s, fell from 264 per thousand to 152 per thousand.

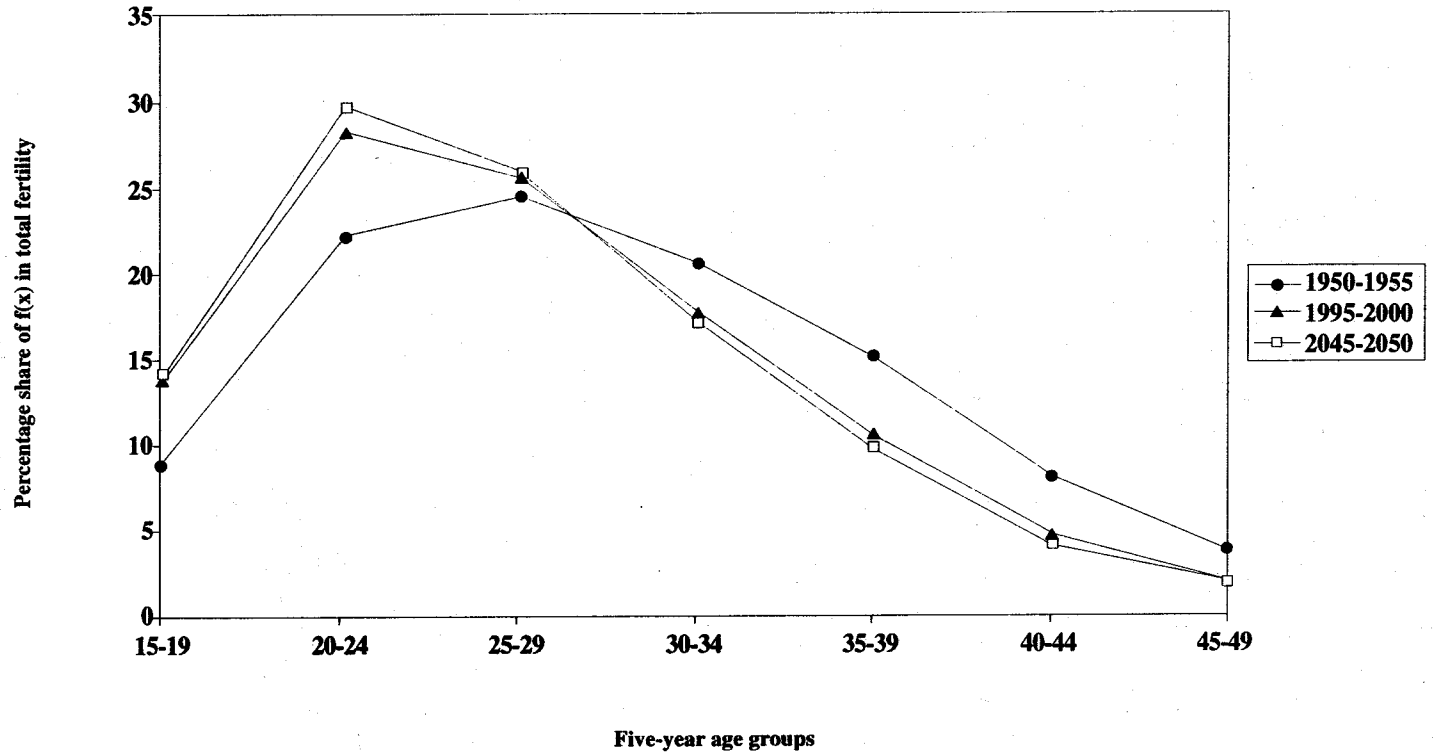
[19] According to Boland (1997, p. 44), "teenage fertility rates, though decreasing, have remained extraordinarily high... Today, the fertility of teenagers is now somewhat lower than the fertility of their parents during their teenage years, in the 1950s".

Figure 7
LATIN AMERICA AND THE CARIBBEAN: SPECIFIC FERTILITY RATES, 1950-1955, 1995-2000 AND 2045-2050



Source: CELADE, on the basis of current population estimates and forecasts.

Figure 8
LATIN AMERICA AND THE CARIBBEAN: THE STRUCTURE OF FERTILITY, 1950-1955, 1995-2000 AND 2045-2050



Source: CELADE, on the basis of current population estimates and forecasts.

The specific characteristics of teenage fertility need to be understood by reference to factors at work in society as a whole, as well as to the teenagers themselves. Among the former is a reluctance, on the part of both families and officialdom, to accept that the individuals concerned are sexually active. As examples of the particular factors at work among teenagers, mention may be made of: the perception that giving birth is a way of achieving independence from the parental home, a relative lack of concern for the consequences of one's acts during this stage of life, and the reinforcement of identities that are not yet sufficiently consolidated. Given the peculiarities that distinguish teenage fertility, initiatives that are designed to prevent it should not merely replicate the reproductive health programmes made available to people of other ages. It is vital for teenagers to be correctly educated and encouraged to take responsibility and develop their personalities if their sexual and reproductive decision-making and behaviour are not to lead to unwanted pregnancies, sexually transmitted diseases or abortions. The governments of the region are in agreement on this, stating that it is necessary to "design and adopt models of integral reproductive health care for adolescents, including educational components on population and family planning, adequate to their sociocultural context" (ECLAC, 1996, p. 33).

C. SOCIO-ECONOMIC DIFFERENCES IN TEENAGE FERTILITY

When the reproductive behaviour of teenagers is analysed to determine its correlation with variables that reflect the segmentation of the socioeconomic world, great disparities come to light, some of them showing similarities to those referred to in the analysis of variations in the total fertility rate, while others are different. The first criterion for this analysis is the *area of residence*, which is broken down into urban and rural. As in the case of total fertility, the reproduction rate of rural teenagers is higher than that of their urban counterparts in all the countries for which recent and comparable information is available from demographic and health surveys. Although the magnitude of this difference varies from 47% (Ecuador) to 153% (Peru), in most of the countries it ranges between 50% and 80% (see figures 9 and 10 and table 8 of the appendix).

The consistent disparity between urban and rural rates must call into question, at least to some extent, the argument that "sexual freedom" is a factor in explaining the relative slowness of the decline in teenage fertility rates. It is highly probable that this "freedom" has come about to a greater extent in urban situations, which are virtually synonymous with the movement towards secularization and greater permissiveness in usages and customs. If this argument were applied, therefore, fertility should be higher among urban teenagers; yet the differences actually found clearly show the opposite.[20]

[20] This observation is not intended to dispute the validity of the argument in general, but to question its applicability as a way of explaining stubbornly high teenage fertility rates. In point of fact, it is conceivable that there is greater "sexual freedom" in the modern world than there was in the past, and it is also possible that this is true to a greater extent in cities than in the countryside, but it cannot be inferred that this will necessarily show up in fertility rates.

Box 3

FERTILITY AMONG CARIBBEAN TEENAGERS: EXAMPLE OF A PROGRAMME DESIGNED TO MITIGATE ITS CONSEQUENCES

Although teenage fertility rates in the countries of the Caribbean have dropped, especially since 1980, they are still high by comparison with those recorded in more developed countries. Fertility at this stage of life entails a number of negative repercussions, which manifest themselves clearly in the subregion. Among them may be mentioned:

School leaving: in 1987, around one third of 13 to 24-year-old women who were attending educational establishments became pregnant and around 81% of these discontinued their studies after giving birth; it should be mentioned that three quarters of these births were unwanted.

Health risks: teenage motherhood, due to the physical immaturity of the mothers, entails risks of illness and death for both mother and child. Although, as a number of studies have pointed out, the effects of this physical constraint tend to diminish from the age of 16 onwards, the poor conditions in which teenage mothers generally live continue to pose health risks.

Poverty: given that births to teenage mothers are more frequent in environments where unemployment and low levels of schooling prevail, it is very likely that in a substantial proportion of cases teenage motherhood is simultaneously a factor that contributes towards the perpetuation of poverty, and a consequence of it. Under these circumstances, teenage motherhood can mean a burden both for the families, who have to accept financial responsibility for the children, and for the State, which has to provide health, food and housing subsidies.

Given the unfavourable consequences of teenage motherhood, which primarily affect the mothers themselves and their children, governments in the subregion have recognized the importance of measures to reduce fertility in this group. Their prospects for success in achieving this objective are reduced, however, by a tradition of sexual initiation at a young age, and by strong resistance among teenagers to the use of contraceptives, among other factors.

There are not a great many public programmes to mitigate the negative consequences of teenage fertility, but there is one that has been particularly successful: the Jamaica Women's Centre Programme, set up in 1978 with the objective of helping young women to stay in education when pregnant, return to the education system after the birth or participate in the world of work under less disadvantageous conditions. An assessment carried out at the beginning of the 1990s showed that around 55% of female students who became pregnant and took part in the activities of the Centre succeeded in recommencing their studies, while in the control group the proportion was only 15%. Furthermore, it was found that just 15% of the women who came out of the Centre had become pregnant again by the end of three years, the rate for the young women in the control group being 39%. Finally, it was also found that the wages received by teenage mothers who had passed through the Centre and were in work were higher than those received by their counterparts in the control group.

Source: Barbara Boland, *Dinámica de la población y desarrollo en el Caribe*, Cuadernos de la CEPAL series (LC/G.1879-P, LC/DEM/G.171), Santiago, Chile, 1977, pp. 67-69.

If the greater "sexual freedom" of urban teenagers does not result in higher maternity rates, the discussion about what factors do affect their fertility needs to transcend the restricted sphere of sexual activity. Furthermore, it is reasonable to suppose that it is more feasible for young people in an urban environment to dissociate sexual activity from procreation, both because the sociocultural setting is favourable and because they have easier access to knowledge and use of the necessary safeguards. In the final analysis, in the absence of conditions that facilitate this dissociation, it is not surprising that fertility rates are higher among rural youths, particularly if the prevailing cultural norms encourage conjugal union at an early age.

Another way of looking at the differences between urban and rural fertility rates among teenagers is to measure the proportion of total fertility that these represent in each of these areas. In five of the twelve countries for which data are available, teenage fertility accounts for a smaller proportion of the total in cities than in the countryside. In four of these countries —Brazil, Colombia, Costa Rica and the Dominican Republic— it is possible that the use of contraceptives is also widespread among urban teenagers.

A further indicator for examining differences in fertility between young women in urban and rural areas is the proportion of these that had reproductive experience at the time the demographic and health surveys were carried out.[21] As well as confirming that teenagers account for a high proportion of all births in Latin America and the Caribbean, the figures show that in rural areas in all the countries, with the exception of Haiti, at least one in five women have had their first child before reaching the age of 20 (see figures 11 and 12 and table 9 of the appendix). Although somewhat lower, the equivalent figure for urban areas in most of the countries is still 15% or more of teenagers. An extreme case is Nicaragua, where a quarter of urban women and four out of ten rural women have given birth during their teenage years.

Of the large numbers of young women with reproductive experience, many will experience interruptions in their educational careers that are detrimental to the aim of improving human resources and entail serious risks of social vulnerability. It is worth highlighting the wide gap between urban and rural areas that is found in Peru, and that appears to be due both to a lagged sociocultural situation and to the poor material conditions of life in the rural areas of the country.

The information referred to confirms, once again, that teenage fertility is particularly high in the rural areas of Latin America and the Caribbean. This is indicative of severe inadequacies and inequities in reproductive health services, particularly as regards the sex education and family planning components. Although it might be an encouraging sign that teenage fertility has fallen slightly in the urban areas of the region, it should not be forgotten that these rates are still high by comparison with the values found in more developed countries. Generally speaking, the urgency of the task of implementing policies to prevent teenage parenthood, whether urban or rural, is due not to any judgement about the level of this, but to the limitations and obstacles that it entails in terms of the position that will later be occupied by young people in society; in addition to the biological risks already mentioned, parenthood can become a factor that restricts the social and economic opportunities of teenagers. The perception that young people themselves have of these risks seems to be accurate in the case of the high percentage of conceptions occurring before the age of twenty that are declared to be unwanted.

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[21] Teenage girls with reproductive experience are those who declared in the survey either that they are mothers or that they are pregnant.

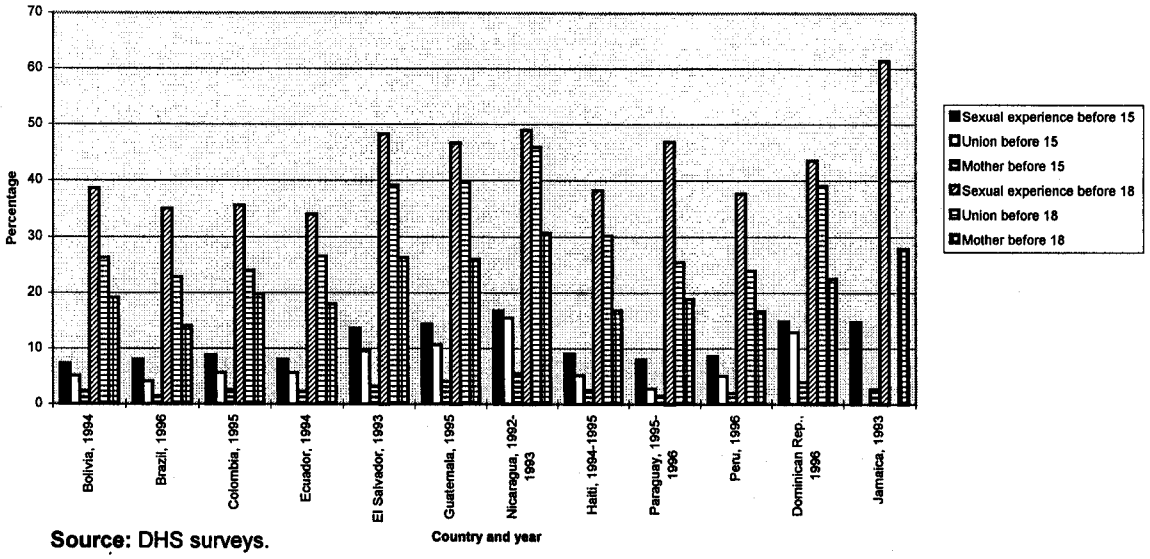
Box 4

FERTILITY DURING EARLY ADOLESCENCE AND PUBERTY

The negative repercussions of fertility at early ages tend to be coped with in different ways depending on which social stratum the teenagers and adolescents belong to. Of course, in the better-off social groups, the prospects for coping with the more harmful effects of this are better. In poorer groups, by contrast, the difficulties tend to be multiplied, many of them, such as dropping out of school for financial reasons, being associated with social exclusion and, as such, predating the pregnancy. It would not be strange if, in extreme circumstances of social marginalization, some teenage girls were to perceive that "there is only one thing they can possibly plan for in life: motherhood" (Pantelides, 1996, p. 244). In any case, these specificities should not obscure the fact that, in modern society, motherhood at an early age is a problem that affects the parents, their offspring and the community. In general, the earlier the age of motherhood, the greater is the complexity of the problem, especially as regards the risks entailed, as is demonstrated by the complications affecting the health of both mother and infant that result from giving birth before the age of 18.

Early motherhood is a challenge of the highest importance for reproductive health in Latin America and the Caribbean. In a number of countries, more than a fifth of all women under 18 are mothers. In Nicaragua, this proportion stands at 30% (see the graph below). The information available suggests that there is a close link between the rate of early motherhood and the incidence of early unions, some of them well before the age of 18. This situation should alert us to the far-reaching repercussions that reproduction between such young people has in society, as in many cases their educational careers are cut short, and they are consequently unable to acquire the qualifications necessary to avoid early and poorly paid participation in the labour force. Within families that suffer from these limitations, the opportunities for the children also tend to be curtailed. Given these conditions, people's ability to plan their lives is severely restricted, and society as a whole, deprived of the human resources required to increase its economic potential, tends to remain stuck in a situation of inequality.

FIRST SEXUAL EXPERIENCE, FIRST CONJUGAL UNION AND FIRST CHILD BEFORE 15 AND BEFORE 18: PERCENTAGE OF WOMEN AGED BETWEEN 20 AND 49, SELECTED COUNTRIES OF LATIN AMERICA AND THE CARIBBEAN



Source: DHS surveys.

What can be done to prevent fertility before the age of 18? Perhaps the first requirement is to achieve a consensus that recognizes its existence and the need to prevent it. The next step would be to design and implement programmes that are explicitly and deliberately aimed at achieving the objective of preventing it. For this action to be relevant, the necessary consideration will have to be given to the sociocultural context in which this fertility

arises. For example, in a number of societies the cultural bases on which early fertility rests form part of ethnic identities, with all the wealth of usages, customs and traditions that underlie their historical survival strategies; in these situations, reducing early fertility will be an extremely complex task, and one that will require special studies and novel forms of participation by communities.

Given that a large proportion of early fertility has its roots in the structural categories of poverty and marginalization, efforts could be made to prevent it by means of programmes aimed at two of the most direct sources, and centred on those: early unions, and sexual activity without the use of contraceptives. Since many teenagers in the poorer groups do not go to school, information and education programmes would have to be applied in the places where they live, with the aim of broadening the horizons of teenage girls to prevent their marginalized condition leading them to "find partners or become mothers as soon as possible". The participation of the family, and of mothers in particular, is necessary for these programmes; recent research carried out in Buenos Aires concluded that the poorest women —those with little education and high fertility rates— and their daughters should be "the top priority as targets for policies and programmes... it is important for mothers to be taught that action undertaken by them to take care of themselves and their daughters will be more effective than abstract advice" (Geldstein and Infesta, 1997, p. 21).

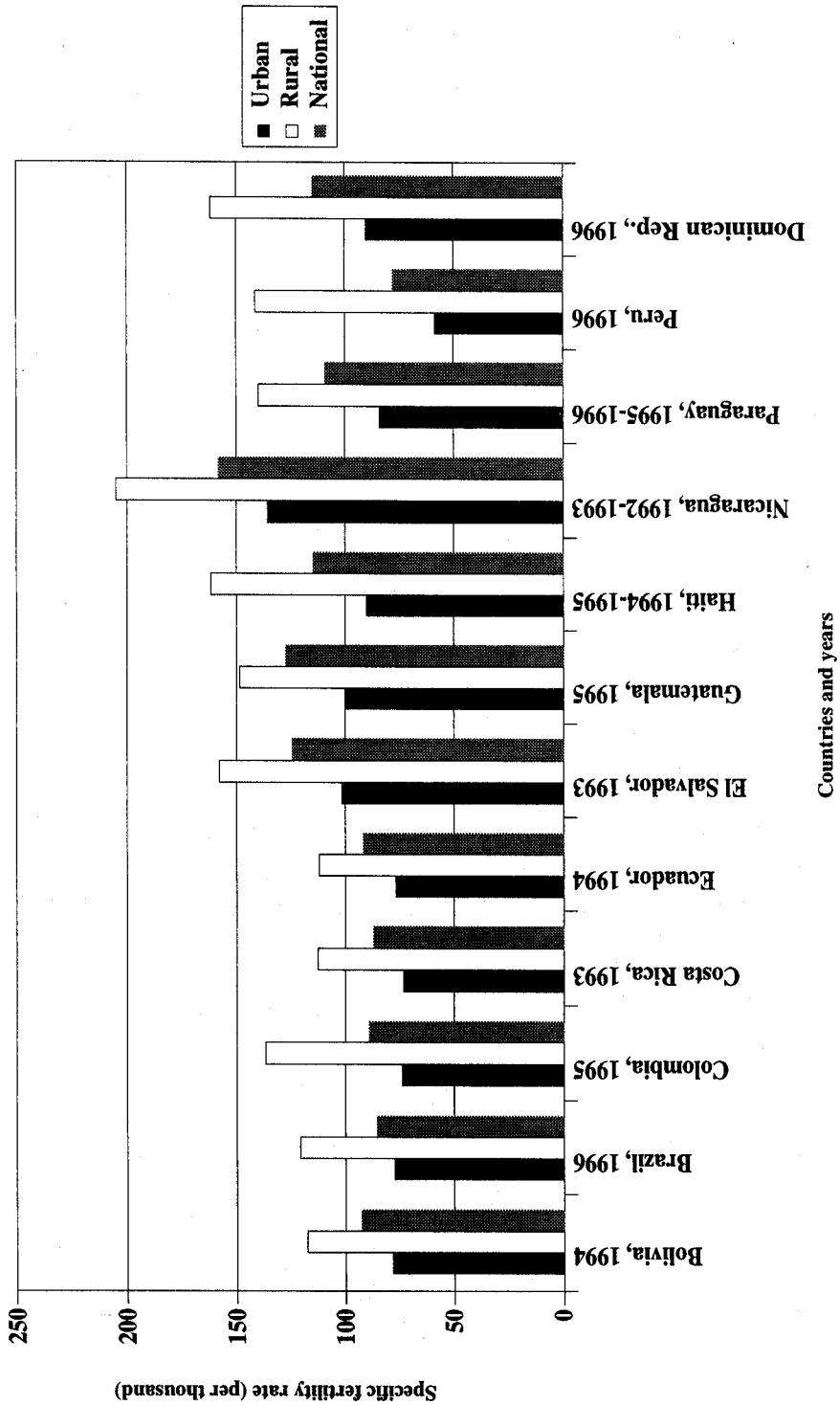
It should not be forgotten that another component of early fertility is associated with greater sexual permissiveness without the use of safeguards. In view of this situation, schools and the communications media are probably appropriate channels for promoting responsible sexual behaviour, since guidelines for conjugal behaviour are generally designed for older age groups. Meetings at which sexuality can be discussed openly among adolescents and teenagers can be effective in encouraging them either to delay beginning their sex lives or to take precautionary measures. Undoubtedly mothers and fathers, given the importance of the guiding role they play, need to take part in these programmes, joining in the conversations described and carrying out additional back-up activities.

Source: Rosa Geldstein and Graciela Infesta, *Las dos caras de la moneda: la salud reproductiva de las adolescentes en la mirada de las madres e hijas*, Centre for Population and Social Studies (CENEP), Buenos Aires, document presented at the Fourth Argentinian Conference on Population, 17 to 19 September 1997, Resistencia, Argentina, 1997. E. Pantelides, "Adolescentes, sexualidad y salud reproductiva", *Salud reproductiva, nuevos desafíos*, Cayetano Heredia University of Peru, Institute for Population Studies (IEPO). Reproductive Health Programme (PROSAR), Lima, Peru, March 1996.

The second differentiation criterion that is considered, in order to examine further the issue of disparities in the reproductive behaviour of teenagers, is their level of education. In this case, use is made of the information given about reproductive experience as of the time the demographic and health surveys were carried out in eight countries in the region, and to enable the data to be compared, the young women interviewed are divided into two categories: those without schooling, and those who received some kind of formal education. As when total fertility is examined, the differences that emerge from this comparison are more pronounced than those encountered when the differentiation is by area of residence. In fact, the percentages of teenagers with reproductive experience who have no schooling are double and even triple the figures for those who have some education (see figures 13 and 14 and table 10 of the appendix). The disparity between the two categories is wide enough to suggest that formal education is instrumental in preventing maternity among women aged under 20. Nonetheless, it is also clear that access to education is not a sufficient condition to prevent fertility among teenagers.[22]

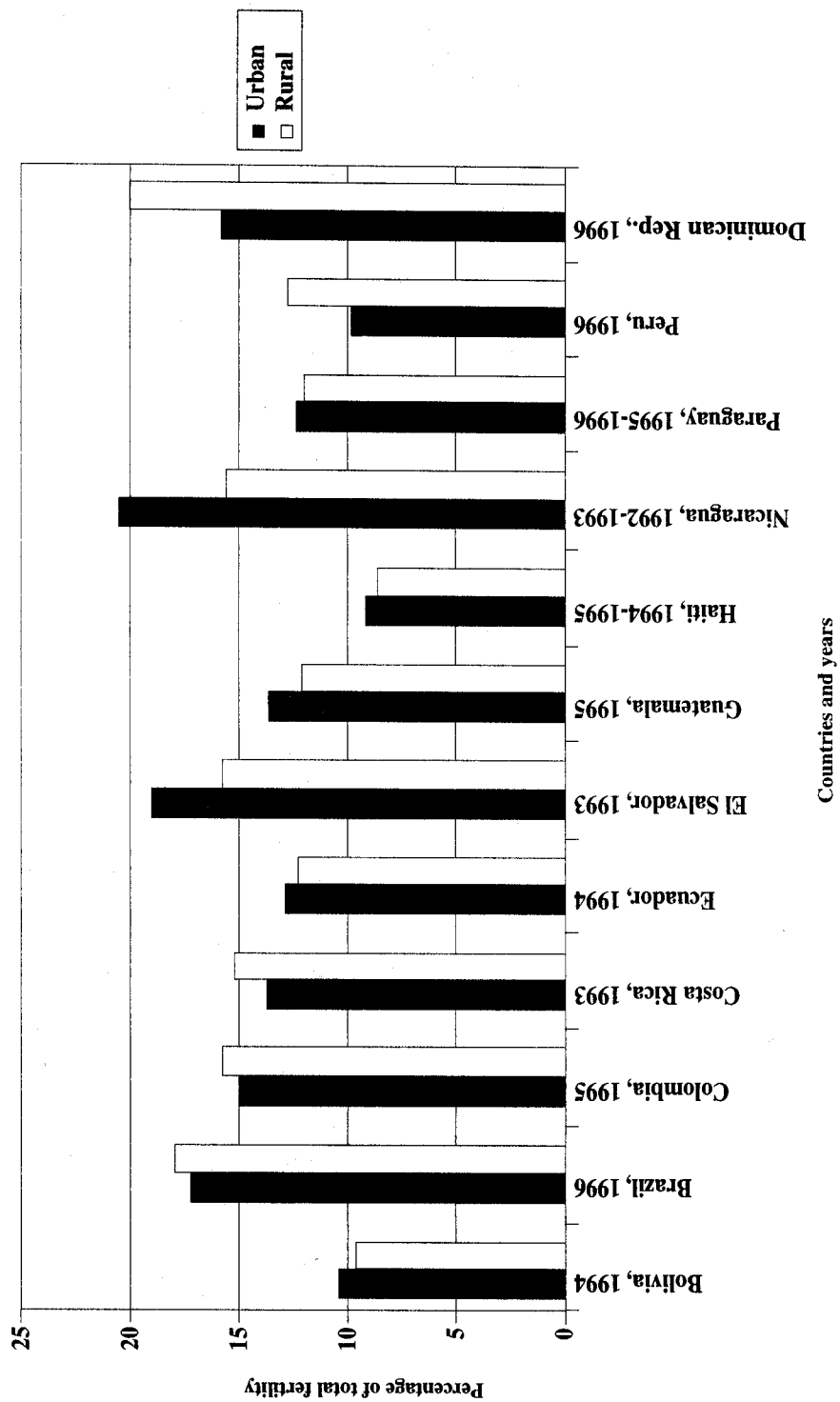
[22] Further still, it must be added that a small proportion of young women who have attained higher levels of formal education are mothers. If this situation can still be found even in the most privileged sections of society, it seems to follow that policies devised to prevent teenage motherhood need to acknowledge that there are groups at risk at all levels of society.

Figure 9
LATIN AMERICA AND THE CARIBBEAN: SPECIFIC TEENAGE FERTILITY RATES (AGE 15 TO 19) BY AREA OF RESIDENCE, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

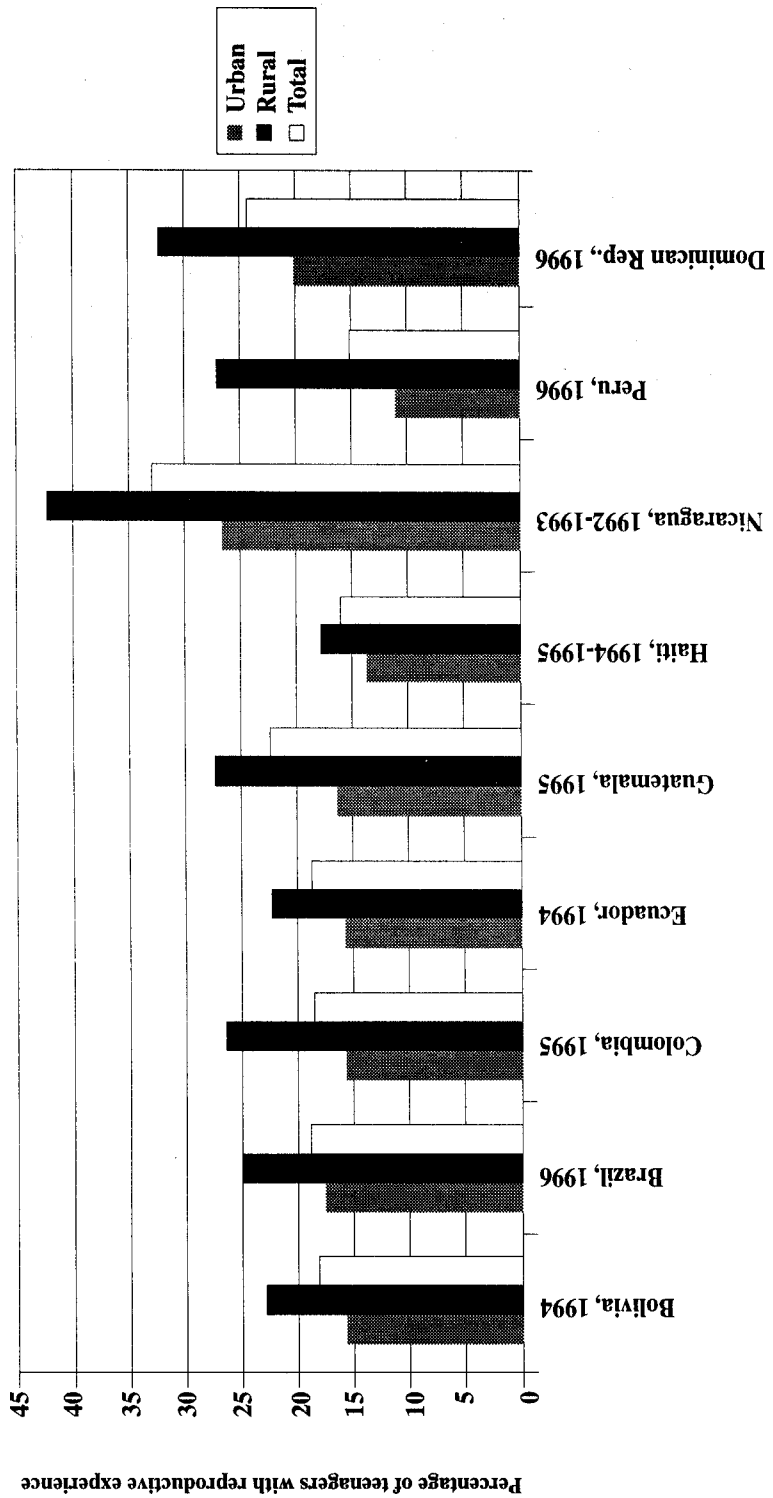
Figure 10
LATIN AMERICA AND THE CARIBBEAN: TEENAGE FERTILITY AS A PROPORTION OF TOTAL FERTILITY BY AREA OF RESIDENCE, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

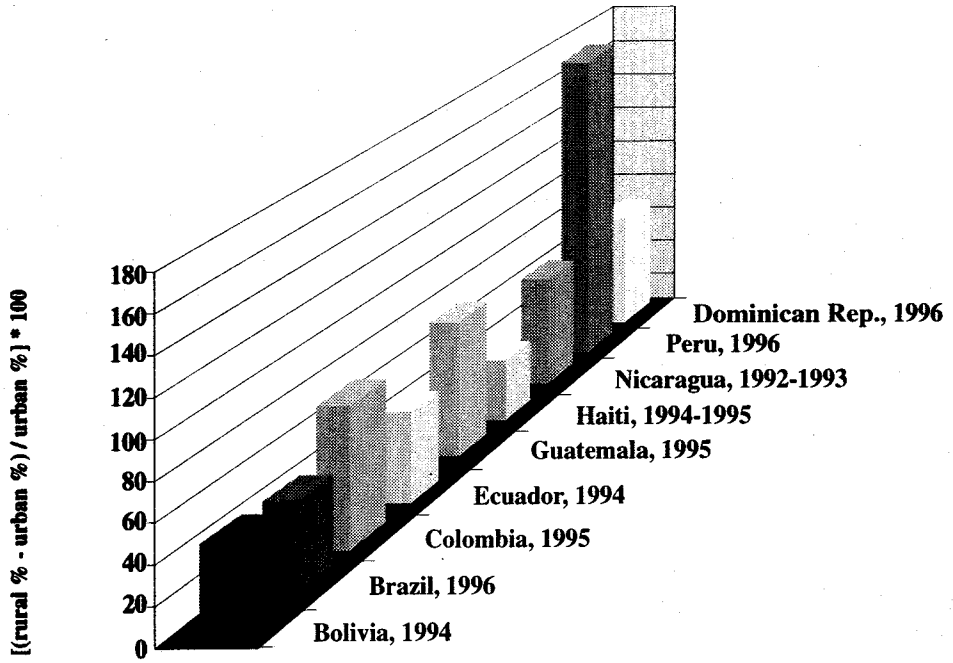
One of the results emerging from this examination is that in four of the eight countries for which comparable information is available, more than half of all women under 20 who have no schooling are mothers. This finding reveals one of the most persistent manifestations of the process whereby poverty is transmitted between generations. Given that women who are excluded from formal education —understood as a mechanism that contributes to equity— begin their history of reproduction at very early ages, their social marginalization tends to perpetuate itself, and in the same way it is very likely that this condition will be perpetuated among their children as a result. This very high incidence of motherhood among young uneducated women also makes another fact plain: the stubbornly high rates of teenage fertility in the countries of Latin America and the Caribbean can be explained to a great extent by the behaviour of the women who are most lacking in the means to play a full role in society. These observations provide a reaffirmation of the social problem that teenage pregnancy entails, and to combat this it will be necessary to design policies that, besides providing for the delivery of reproductive health services, address wider areas of people's lives.

Figure 11
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF TEENAGERS WITH REPRODUCTIVE EXPERIENCE BY AREA OF RESIDENCE AND IN TOTAL FOR SELECTED COUNTRIES, AROUND 1995



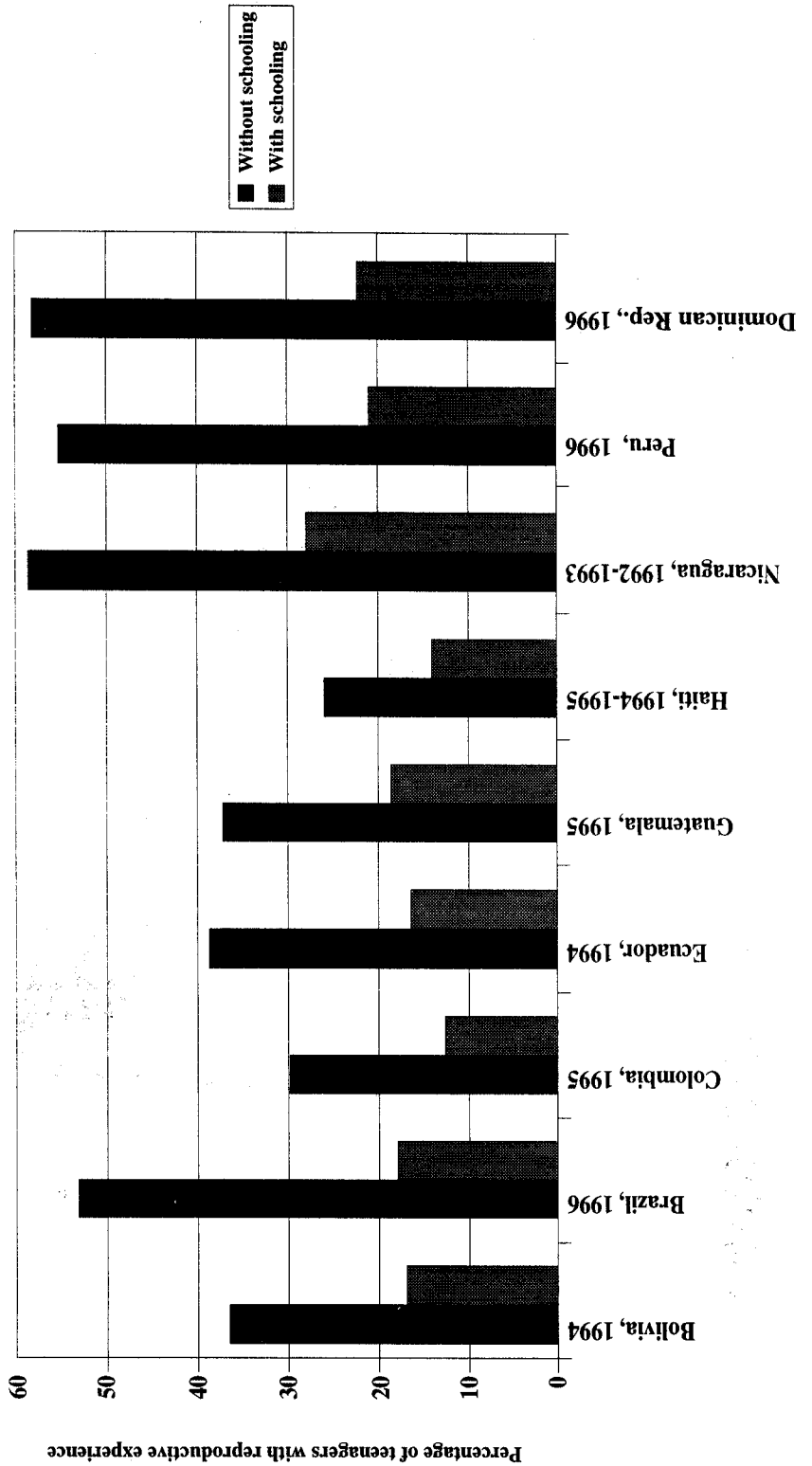
Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 12
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE DIFFERENCES BETWEEN RURAL AND URBAN AREAS IN THE NUMBER OF TEENAGERS WITH REPRODUCTIVE EXPERIENCE, SELECTED COUNTRIES, AROUND 1995



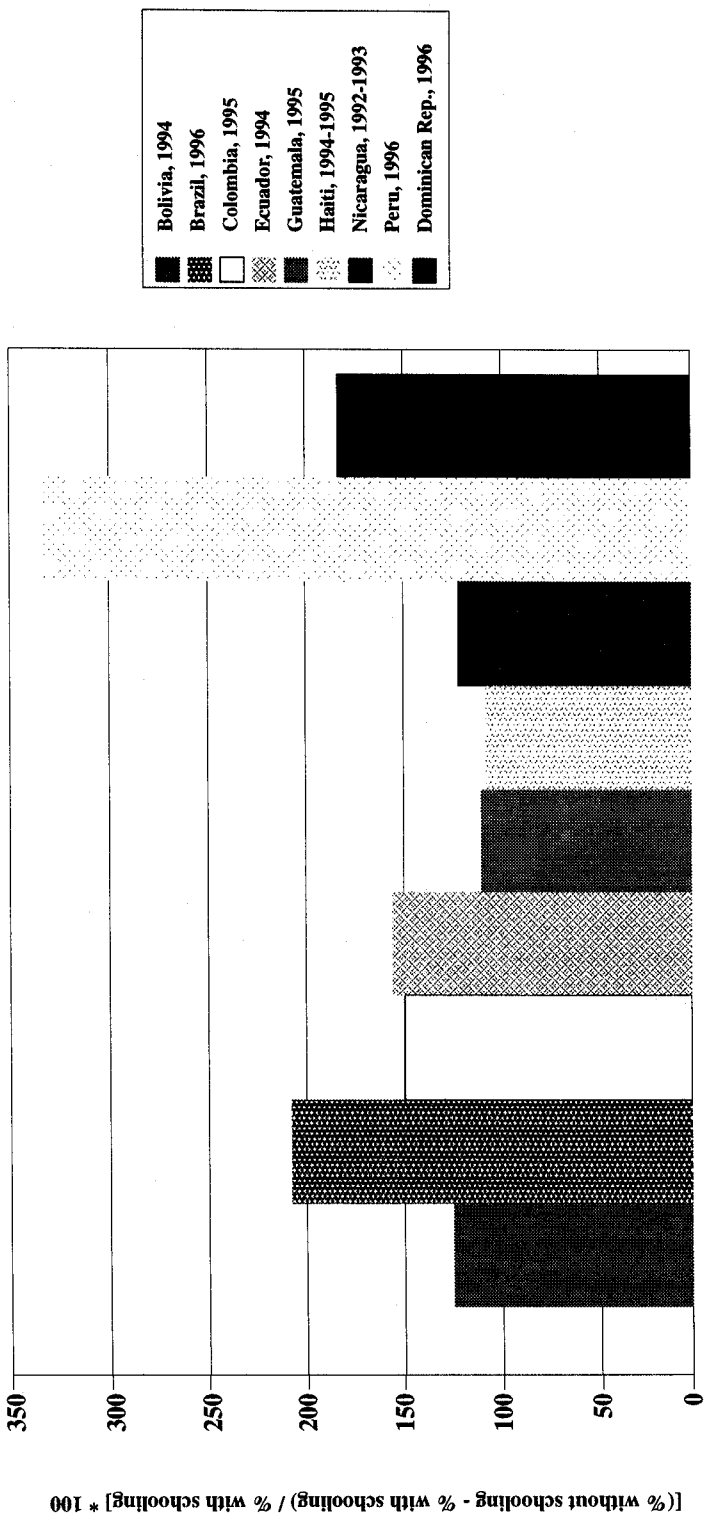
Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 13
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF TEENAGERS WITH REPRODUCTIVE EXPERIENCE BY LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 14
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF TEENAGERS WITH REPRODUCTIVE EXPERIENCE BY LEVEL OF SCHOOLING, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

IV. REPRODUCTIVE IDEALS AND UNWANTED FERTILITY

The examination of fertility levels and trends which was carried out in the previous sections has enabled significant differences to be discerned between the countries of Latin America and the Caribbean, and has made it clear that these differences derive to a great extent from the marked heterogeneity of reproductive behaviour in the different national contexts. As can be deduced from the analysis of disparities between people in different areas of residence and with different levels of education, that heterogeneity is a manifestation of the effects of acute and persistent social inequities, and any interpretation of these would be incomplete if it did not make some reference to the perception that individuals and couples themselves have of their options, expectations and aspirations. To that end, this section will once again draw on the demographic and reproductive health surveys and will look at the information these contain about, on the one hand, the number of children that the individuals interviewed wished to have and, on the other, actual fertility levels that contrasted with their reproductive expectations.[23]

Within a given society, the average number of children that people aspire to have may be regarded as representative of the prevailing "reproductive culture"; consequently, this is the number that would be obtained if the coverage of family planning services were universal and if effective —and no less universal— use were made of effective means for avoiding conception. Of course, the reproductive intentions that are reflected in statements about desired family size form part of life plans that, as such, are affected by the demands and restrictions that the social environment imposes; as a result, the number of children desired is not immutable over the life cycle of individuals. Again, the discrepancies that are found between the average number of children that people wish to have and the number that they actually do have produce a picture of unwanted fertility.[24] This notion may be understood, in an essentially intuitive way, as the expression of unmet demand for the means to prevent fertility.

A. REPRODUCTIVE IDEALS

One of the most consistent findings of fertility surveys is that the levels of fertility observed in the countries of Latin America and the Caribbean tend to be in excess of the average number of children desired. Furthermore, these surveys have found that this average is fairly similar between countries; thus, the most recent data show that the reproductive preferences expressed by women range between a maximum of 3.6 children, in Guatemala and Paraguay, and a minimum of 2.3, in Brazil, a range of

[23] Of course, the information available does not enable us to determine how valid declarations about reproductive ideals are as indicators of the real wishes of women and couples. As in other areas of individual behaviour, there is the risk that responses to questions about reproductive aspirations may reflect a desire to justify eents with hindsiht, or merely the parameters that are considered "appropriate" by the dominant culture.

[24] Obviously, this conclusion is drawn when "desired fertility" is lower than the level actually observed.

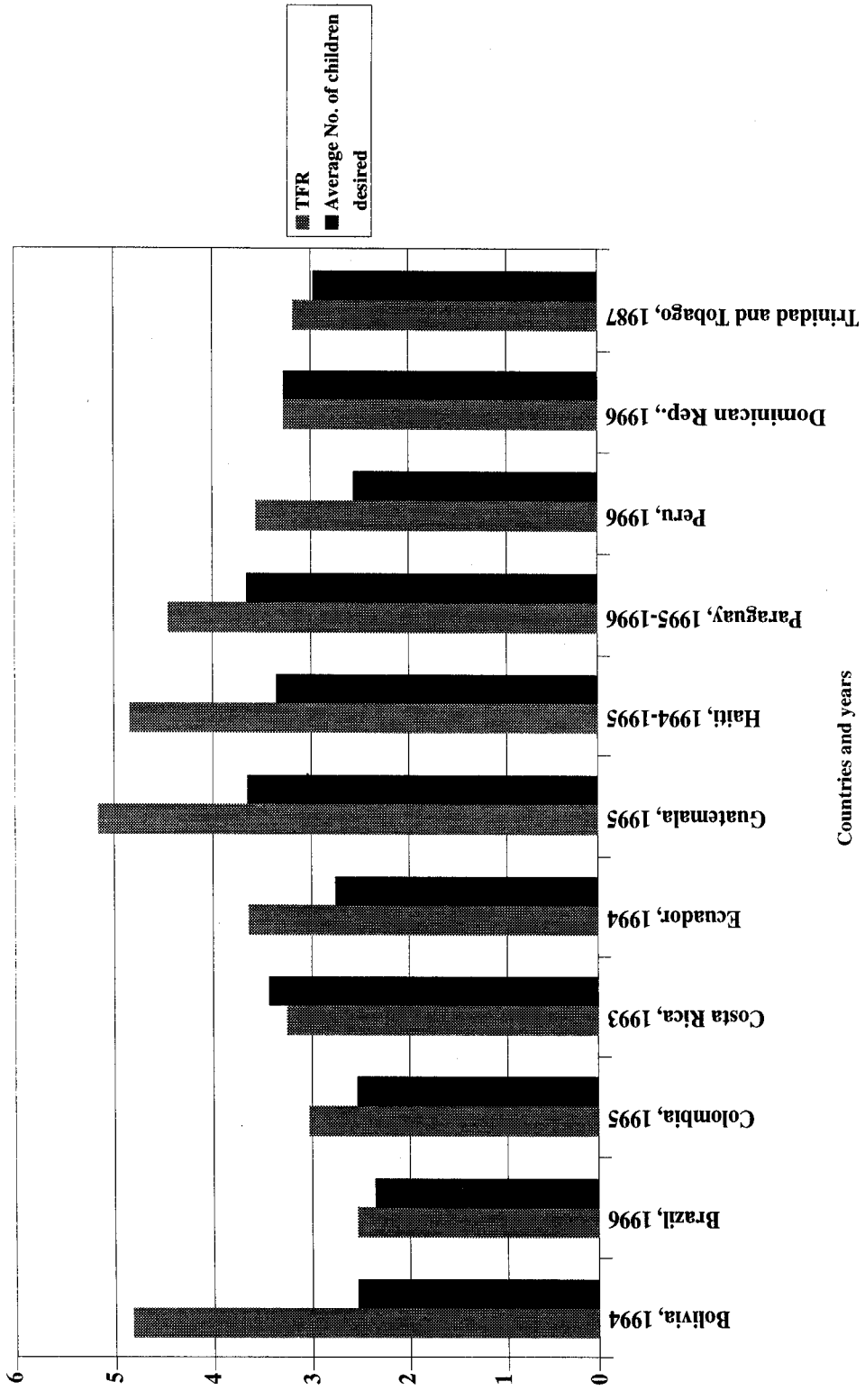
variation that is markedly lower than that displayed by the fertility rates actually observed, the values of which are between 5.1 children, in Guatemala, and 2.5, in Brazil.[25] This relative homogeneity in reproductive preferences has often been described as a sign of cultural convergence; however, if this supposition were correct, one would have to ask why this convergence does not show up in people's behaviour. In fact, the rate of fertility seen is clearly higher than the "desired" rate in eight of the ten countries for which comparable data are available (see figure 15 and table 11 of the appendix).

The discrepancy consistently found between the values for the total fertility rate and those for the average number of children that women state as being their ideal could be considered indicative of the inability of a large proportion of people to exercise their reproductive rights. To judge by the magnitude of the absolute and relative discrepancies between the two series of data, this inability appears to be particularly marked in those countries that have made less progress in the demographic transition process; this may be inferred from the data for Bolivia, Haiti, Guatemala and Peru. These discrepancies may also point to a lack of correspondence between cultural norms and standards, which are reflected in women's reproductive intentions, and the means needed to turn these into reality in everyday life.

Nonetheless, we must not overlook the differences in reproductive preferences between countries. For example, the average number of children desired is higher in Paraguay and Guatemala than in the other countries; this appears to be consistent with high total fertility rates that are due to the modest progress made in the demographic transition process in those countries. On the other hand, the observer is struck by the equally high average number of children desired in Costa Rica and the Dominican Republic, whose total fertility rates, due to their more advanced stage in the demographic transition process, are markedly lower than in the two cases just mentioned. No less surprising is the fact that in countries where the demographic transition process is just beginning or is at an early stage, such as Bolivia and Ecuador, the average numbers of children that people state as being their reproductive ideal are fairly low, and consequently are very different from the total fertility rates actually found. These apparently peculiar situations undoubtedly derive from the combined effects of a whole range of economic and sociocultural factors that manifest themselves in different ways in each country. These peculiarities are difficult to isolate in a general study, since they include not just the value put on children, including both economic and emotional costs and benefits, but also patterns of family organization, the role of father and mother figures, the messages sent out by the main social agents, the perception people have of their opportunities for self-realization, the prevailing expectations of social mobility, the networks that exist to support child-rearing, and explicit and implicit subsidies to procreation, among other things.

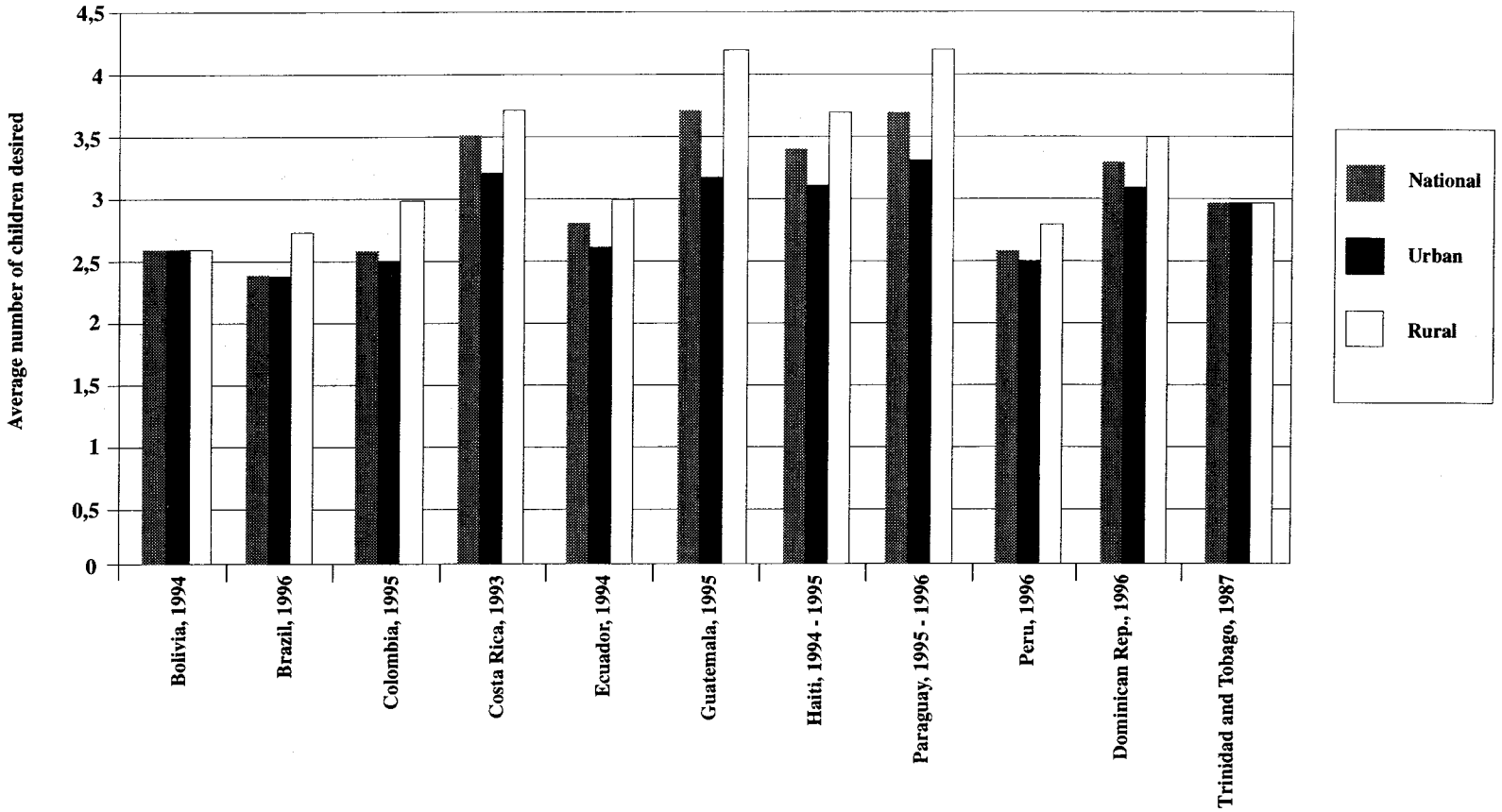
[25] The coefficients of variation between the data from eleven countries where demographic and health surveys have been carried out recently are 16% and 21% for the ideal number of children and the total fertility rate respectively.

Figure 15
LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATE AND AVERAGE NUMBER OF CHILDREN DESIRED, SELECTED COUNTRIES, AROUND 1995



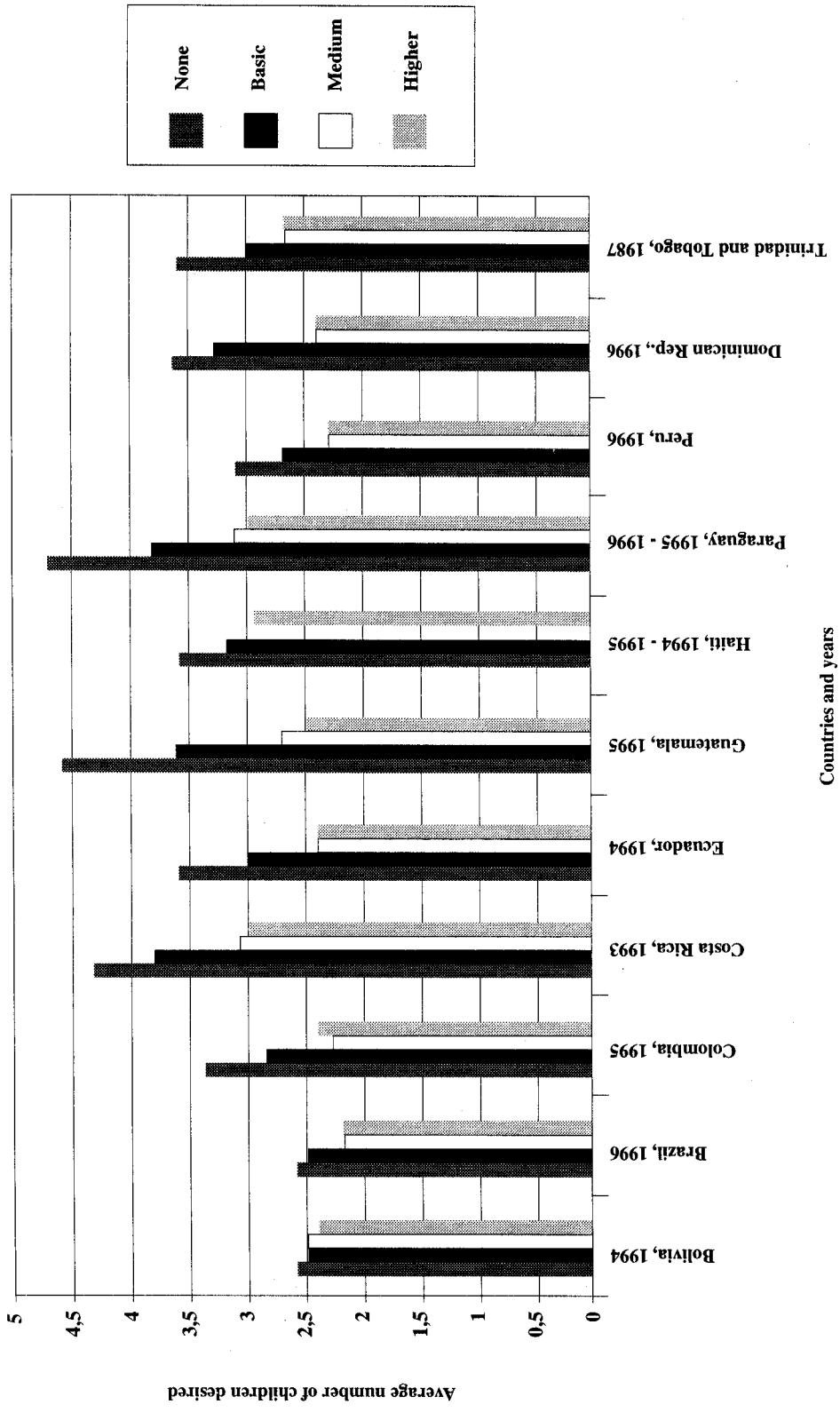
Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 16
LATIN AMERICA AND THE CARIBBEAN: AVERAGE NUMBER OF CHILDREN DESIRED BY AREA OF RESIDENCE AND NATIONAL TOTAL, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 17
LATIN AMERICA AND THE CARIBBEAN: AVERAGE NUMBER OF CHILDREN DESIRED BY LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

It is also possible, using the data provided by the demographic and health surveys, to identify the socio-economic segmentation that characterizes reproductive intentions (see figures 16 and 17 and table 12 of the appendix). The differences between the average number of children that women declare they want are, by and large, lower than the differences found when we examine variations in the total fertility rate. Thus, the largest discrepancy by area of residence is found between rural and urban areas in Guatemala and Paraguay, and even here it stands at only 32% and 28% respectively.[26] In most of the countries this difference does not exceed 20%, and in Bolivia it is nil, with urban and rural women expressing exactly the same reproductive aspirations. Greater disparities are found in the average number of children desired when these figures are examined in relation to women's level of education. Once again, Guatemala and Paraguay show the greatest differences between the ideal average number of children declared by women with higher education and those without schooling; these differences are 84% and 57% respectively, percentages which are markedly lower than those encountered when we look at total fertility rates in the two groups of women.[27]

From the information referred to, it can be deduced that the lowering of reproductive intentions has been an important factor in the rapid decline in fertility in the region; nonetheless, it seems to have been insufficient to ensure that this decline would take place in all the countries, several of which still show a wide gap between actual fertility rates and the reproductive ideals declared by women. This gap points to inadequacies in the availability and use of methods to enable fertility to be adjusted to the desired number of children. The information also reveals that reproductive intentions, although not identical between countries or between social groups within individual countries, vary much less than total fertility rates. The relative uniformity of preferences appears to be indicative of a generally held reproductive ideal, whose origins may be found both in the effects of structural changes in society and in the gradual consolidation of cultural ideas diffused by education and the mass communications media.

Finally, the reproductive preferences expressed by women in the groups that have lower fertility, and that supposedly act as role models for other social groups, may be regarded as evidence of the lower limits that fertility will eventually attain. Given that in all the countries for which comparable information is available the preferences of these women are higher than the population replacement level, being equivalent in most cases to 2.5 children or more, the subjective conditions for fertility to decline to levels similar to those now found in European countries do not seem to exist. It has also been found that the total fertility rate of urban women with higher education is lower than what these same women declare to be their ideal number of children. This inconsistency could be indicative of structural pressures, arising from the school system, the labour market and their lifestyles, among other sources, that are strong enough to result in their having an average number of children that is lower than they wish. Nonetheless, it cannot be denied that this inconsistency could also be attributed to a growing imbalance between people's cultural perceptions and their actual conditions of life, which could lead in future to reproductive ideals being revised.

One important aspect of the subject of reproductive preferences concerns gender specificities. To address this, demographic and health surveys in four countries included a questionnaire that invited men to express their preferences about the issue. The results show that the average numbers of children desired by men are only slightly —albeit consistently— higher than the numbers that women declare they

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[26] By contrast, the total fertility rate of rural women was double or more than double that of their rural counterparts in Nicaragua and Peru.

[27] With the exception of Costa Rica, women without schooling in all the countries show total fertility rates that are at least double those of women with higher education.

want; the largest difference was 13%, in Brazil (see figure 18 and table 13 of the appendix). From this relative similarity between the reproductive preferences of the two sexes it may be deduced that the links between the undervaluation —and subordinate position— of women in society and high birth rates need to be sought in the difficulties that women face in obtaining access to effective means for controlling reproduction. Of course, one such difficulty may be a reluctance on the part of men to accept that their partners are deliberately preventing pregnancy.

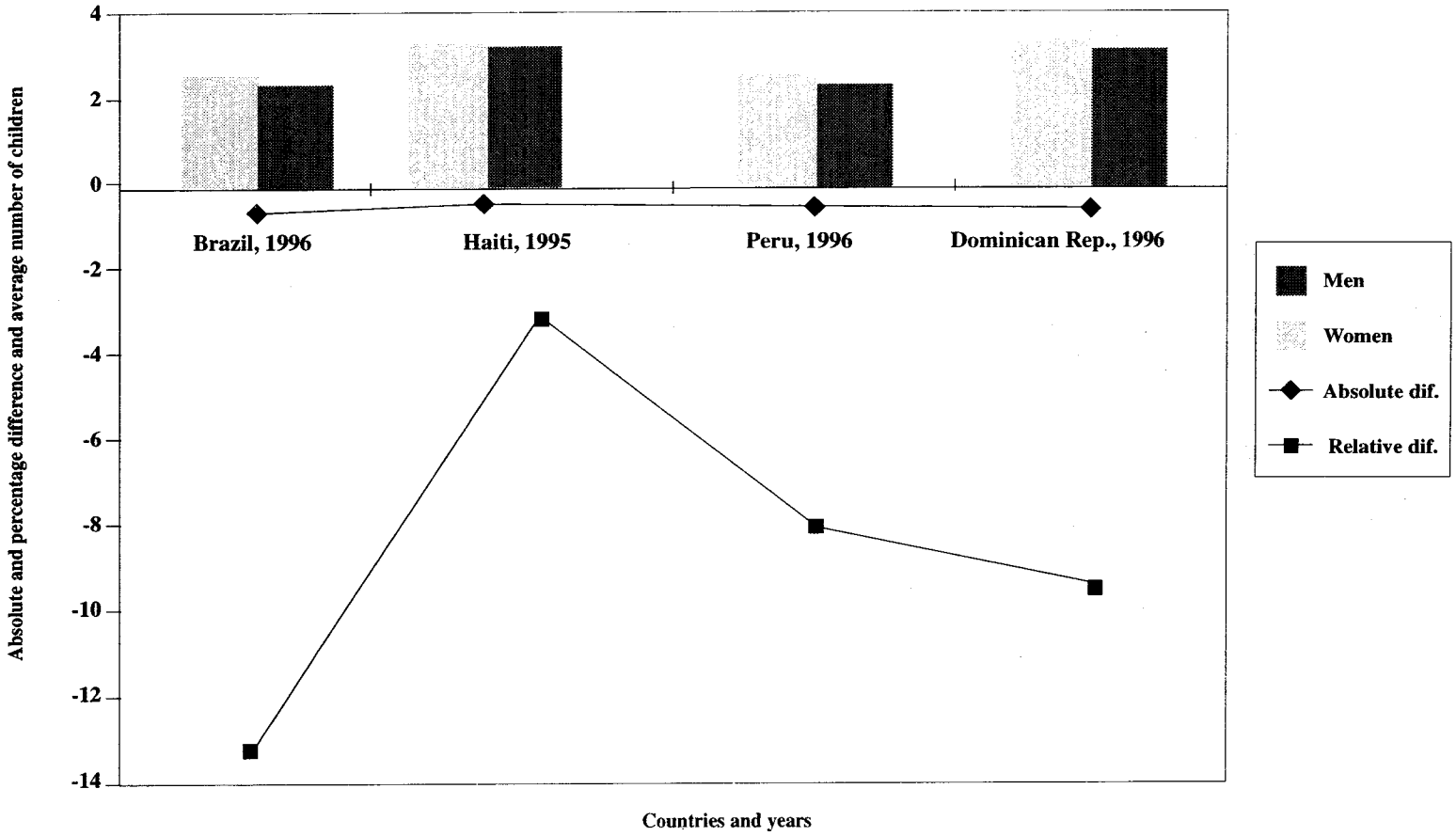
B. UNWANTED FERTILITY

In general terms, the concept of unwanted fertility refers to the discrepancy between the number of children desired and the actual level of fertility. The data provided by the demographic and health surveys can be used to obtain specific values for unwanted fertility, which refer to the effects of unwanted pregnancies. One indicator that is often used is derived from the declaration made as to whether the last pregnancy was planned or not; this may refer to a current pregnancy (as of the survey date) or to pregnancies leading to the birth of children during a reference period (normally five years before the survey). In general, each pregnancy is assigned to one of three categories: (i) wanted; (ii) wanted, but for a later date than when it actually occurred; (iii) unwanted.

Since systematic, empirical and internationally comparable research on reproductive behaviour began to be carried out, there has been growing realization of the high incidence of unwanted fertility in the countries of Latin America and the Caribbean. The same conclusion is suggested by the discrepancy already referred to between the reproductive preferences declared by women and the actual birth rate. A more detailed examination confirms the high percentages of unwanted fertility among the women interviewed in the different countries; the figures concerned range from 19% in Ecuador to 44% in Bolivia (see figure 19 and table 13 of the appendix). These results are striking, because they make plain the difficulties that are faced by a high proportion of Latin American and Caribbean couples in exercising a basic reproductive right, the right to implement decisions freely and responsibly taken about the number and spacing of their children.

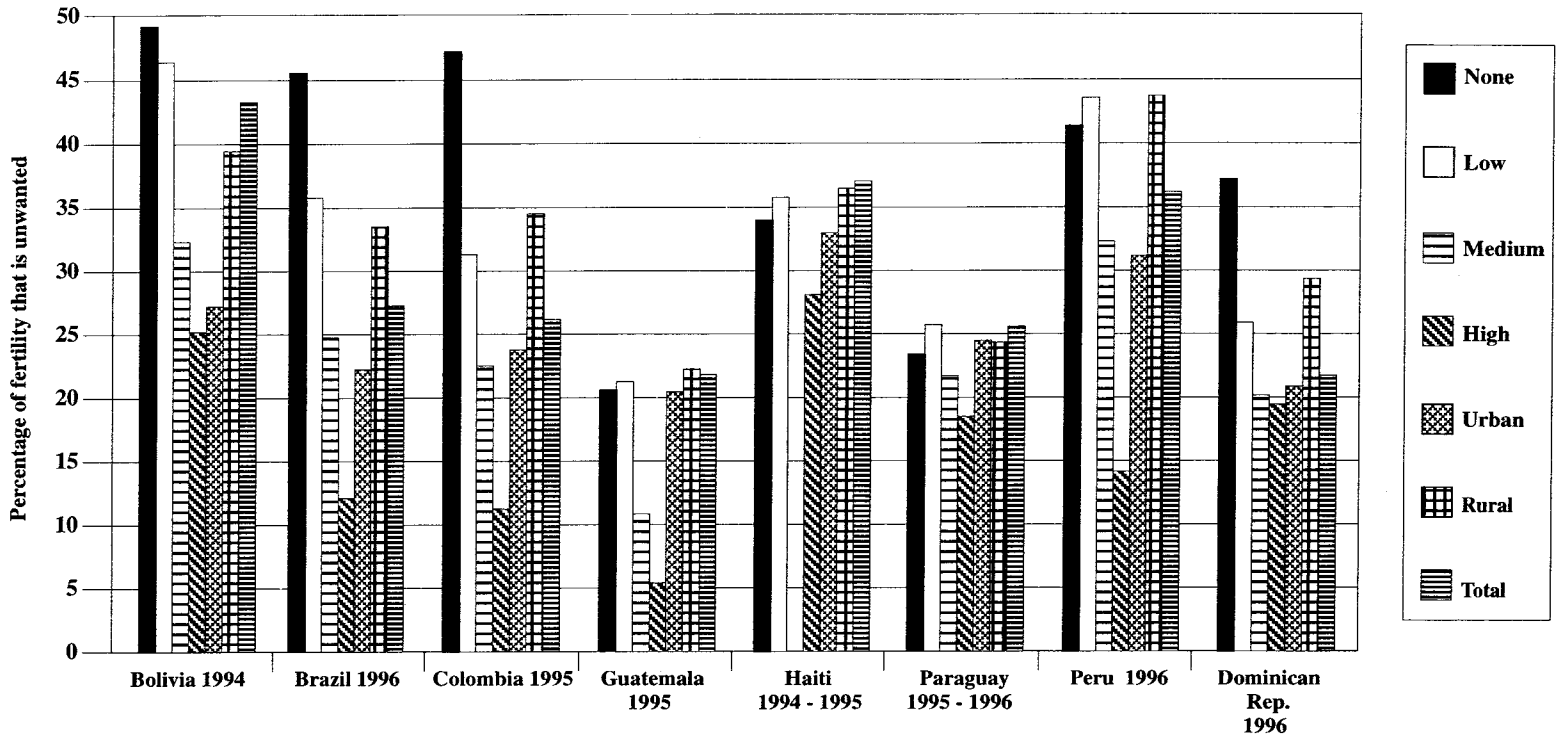
Examination of the distribution of unwanted fertility leads to a categorical conclusion: the most disadvantaged groups in society, and in particular those that live in conditions of acute and generalized poverty, show the highest percentages of unwanted fertility and the lowest indices of access to contraceptives. As was mentioned in previous sections, these same groups have the highest rates of total fertility and the largest proportions of adolescents with reproductive experience. The fact that these features are found side by side in the same social groups is one of the most telling and dramatic aspects of the circle whereby poverty is reproduced between generations. This finding might suggest that action aimed at bringing about a decline in fertility among the poorest groups in the population would be very well targeted, because in these groups discrepancy between actual and desired fertility is the norm. Nonetheless, it needs to be emphasized that this discrepancy, in itself, is not sufficiently strong to enable people to overcome all the obstacles that prevent the fundamental reproductive right mentioned above from being exercised. These obstacles include both barriers of a sociocultural type, which restrict not so much the perception of a desired number of children as acceptance of the idea that fertility should be deliberately controlled, and numerous impediments of a material nature that are faced daily by the most disadvantaged groups in society as they struggle to survive.

Figure 18
LATIN AMERICA AND THE CARIBBEAN: AVERAGE NUMBER OF CHILDREN DESIRED BY SEX AND ABSOLUTE AND RELATIVE DIFFERENCES BETWEEN THE REPRODUCTIVE ASPIRATIONS OF MEN AND WOMEN, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 19
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF FERTILITY THAT IS UNWANTED, IN TOTAL AND BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



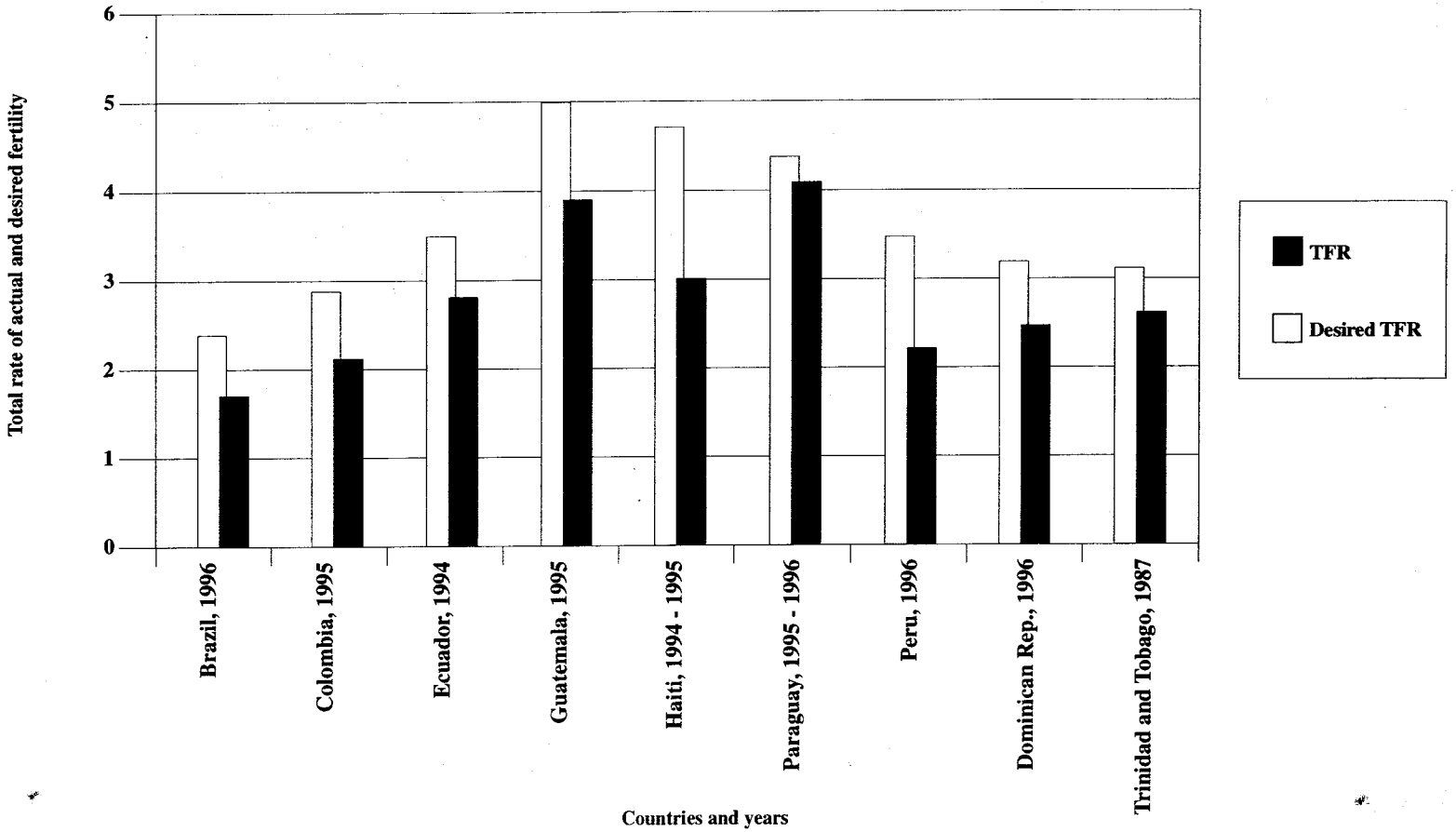
Source: CELADE, on the basis of demographic and health surveys (DHS).

Using the data collected by the surveys, it is possible to reach an estimate of the total rate of desired fertility, which expresses the number of children that a woman would have by the end of her reproductive life if she could avoid all unwanted births.[28] The composite indicator for that rate brings to light great variations between the countries of the region that call into question the apparent homogeneity of the reproductive ideals of the region's women; in other words, reality turns out to be more complex than the situation suggested by the mere expression of individual desires. The limits identified using the data available range from 1.8 children in Brazil to 4.1 children in Paraguay (see figures 20 and 21 and tables 14 and 15 of the appendix). Even still, the way the results are distributed among the countries tends to coincide with the ranking derived from reproductive preferences and from the percentages of unwanted fertility. The countries that show the greatest discrepancies between actual fertility and reproductive wishes are the very ones that have the highest differences between unwanted fertility and actual fertility. Similarly, within the countries, these discrepancies and differences are manifested most conspicuously among people residing in rural areas and among those lacking in schooling, who make up the poorest groups in the population.

All the aspects considered point to the conclusion that socio-economic inequities are clearly manifested in the area of reproduction. The evidence shows that the behaviour which distinguishes the poorer groups of the population is clearly at variance with the desires and aspirations of individuals and couples; due to the existence of obstacles of various kinds, these groups are unable to exercise the most fundamental of their reproductive rights. Given this clear manifestation of social inequality, reproduction policies directed at the least protected groups in society need to aim at weakening the forces that hinder convergence between desired and actual fertility. To achieve this, it is necessary to remove the sociocultural impediments that still restrict people's access to information, education and the means to realize their reproductive aspirations. What is also needed is an effort that is coordinated and integrated with other policies aimed at widening the social and economic opportunities of the most disadvantaged groups, in order to ensure that their basic needs are met and to help bring about a sustained improvement in their potential as human resources.

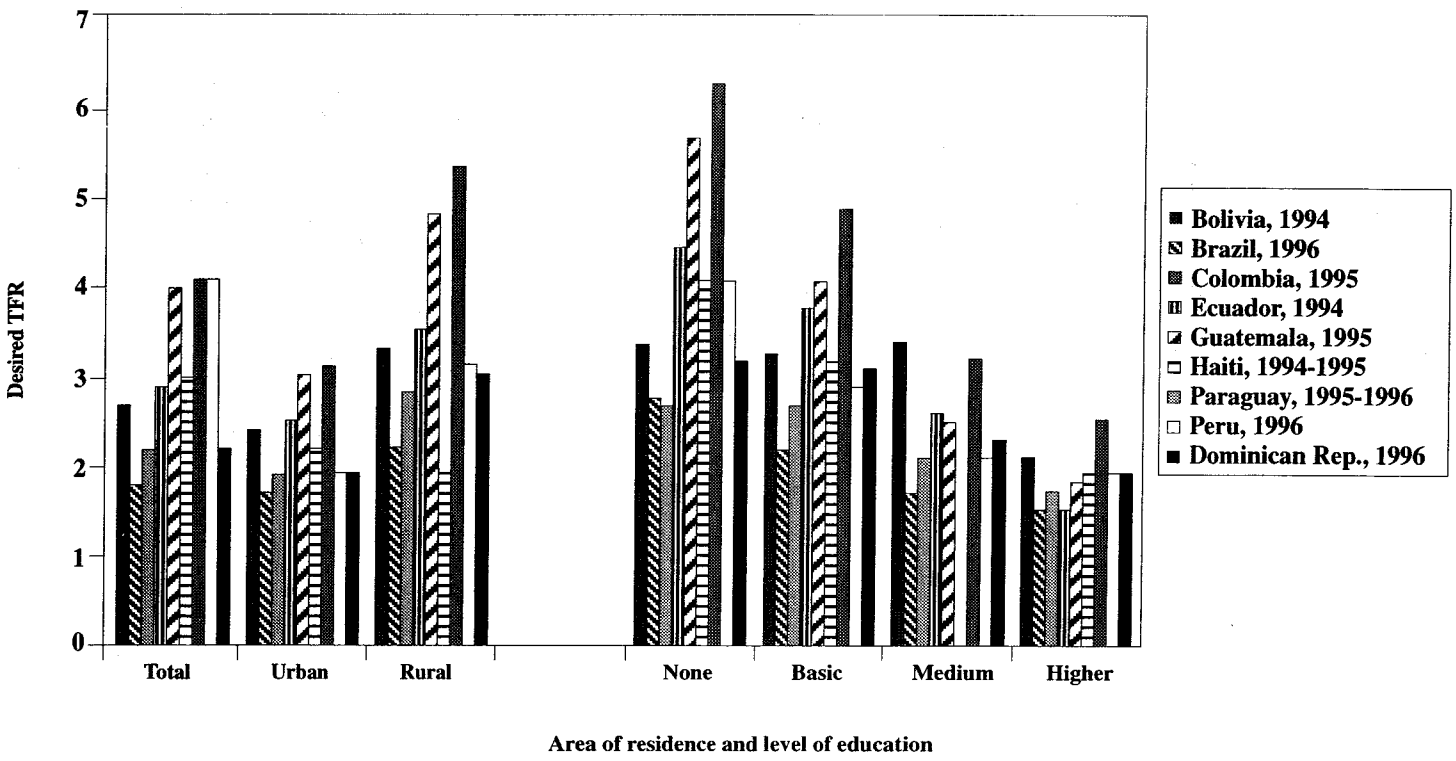
[28] A variety of procedures can be used to calculate this rate; the one most commonly used in national reports on the demographic and health surveys sets out from the assumption that a birth is desired when the number of children living at the time of pregnancy is lower than the number declared by the woman to be ideal (Lightbourne method).

Figure 20
LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATE AND TOTAL RATE OF DESIRED FERTILITY, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 21
LATIN AMERICA AND THE CARIBBEAN: TOTAL RATE OF DESIRED FERTILITY, IN TOTAL AND BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Consequently, the elimination of unwanted fertility is a task of much greater complexity than simply extending the coverage of contraceptives. Although the figures available make it plain that the rate of unwanted fertility is higher among social groups which show lower indices of modern contraceptive use, it is no less certain that greater use of these cannot by itself guarantee a real reduction in the inequities that reproductive behaviour reflects. Of course, universal contraceptive coverage would not automatically ensure that the aim of matching actual fertility to desired fertility was fully achieved, since many people follow inappropriate practices that result in unplanned pregnancies. Perhaps more importantly, widening the supply of contraceptives to include the entire population exposed to the risk of procreation would not be sufficient to achieve the objective referred to either; more than general targets —which could interfere with the exercise of individual freedoms— it is necessary to devise a strategy to channel family planning services towards those groups in the population that can actually be seen to have unmet needs in this field.

Even so, there can be no doubt that contraception is a fundamental tool for people to be able to exercise their basic reproductive right to turn their aspirations and decisions about the number and spacing of their children into reality. Without in any way denying this, there is a need to strengthen the information and education components of reproductive health programmes to correct common errors and deficiencies in the way people use contraceptives.

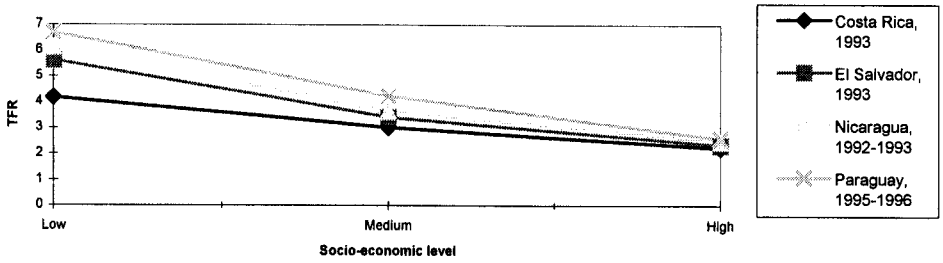
As has been pointed out repeatedly, the high fertility levels of groups that are in a situation of poverty are not consistent with the declarations they make about their reproductive preferences. Furthermore, it is probable that the high birth rates of these people, besides constituting an additional handicap in the way they function in society, compromise their ability to escape from poverty, particularly given the demands that bringing up and educating children entail. Nonetheless, we cannot conclude from this that reducing fertility is a sure or effective mechanism for eradicating poverty, since the causes of this lie in social processes of a range and depth that go beyond the confines of reproductive behaviour. Consequently, although reducing fertility to levels that are closer to what people say they want would be helpful in producing more favourable circumstances as regards the ability of individuals and families to escape from poverty, nonetheless, for these circumstances to translate into concrete forms of upward social mobility, or at least a sustained improvement in material living conditions, other policies will need to be implemented to address the dynamics of the labour market, the ability to train human resources, and social investment, among other areas.

Box 5

POVERTY AND REPRODUCTIVE BEHAVIOUR: FACTS AND CONTROVERSIES

We can conclude from the data available that poor groups in Latin America and the Caribbean are distinguished by a specific type of reproductive behaviour, which gives rise to a demographic pattern different to that obtaining in groups that do not suffer from poverty (see graph below). The main features of this behaviour are: (i) earlier nuptiality; (ii) less prevalent use of modern contraceptives; (iii) higher incidence of fertility among teenagers and young adolescents; (iv) higher fertility overall; (v) higher mortality among mothers and infants, which results in lower life expectancy. As can be deduced from these features, the demographic pattern of the poor is a faithful expression of their disadvantaged position in society. These same features may be held responsible for larger family sizes, which result in high indices of economic dependency, since a high level of fertility, commenced at an early age, produces a large quantity of births, some of them possibly unwanted. Within socio-economic contexts in which the essential needs of families cannot be met, there are obstacles to people obtaining in a timely and appropriate form the knowledge they need to participate more fully and productively in society. Consequently, the demographic pattern of poor groups contributes to ensuring that poverty is transmitted from one generation to the next. In other words, this demographic pattern exacerbates the effects of the economic, social and cultural forces that imposed the original conditions of exclusion and disadvantage on the poor in terms of their performance as producers and citizens. Addressing this issue, the Mexican National Population Programme for the five-year period 1995-2000 maintains that the high fertility of the poor "restricts investment in human capital while the family is growing, which makes it likely that the offspring, once they reach adulthood, will be trapped in the same situation of poverty" (CONAPO, 1995, p. 50).

TOTAL FERTILITY RATE BY SOCIO-ECONOMIC GROUP, SELECTED COUNTRIES OF LATIN AMERICA, AROUND 1995



Although there is general recognition that such a thing as the demographics of poverty exists, there is less consensus about the measures proposed to mitigate its negative effects. Of course, reducing fertility can be beneficial in terms of capital accumulation in families and the strengthening of society's human resources. The disagreements arise when the regulation of fertility, unaided by other measures of a more structural nature, is conceived of as a strategy for liberating the children of the poor from poverty; this conception is illusory, because "the ability to make investments in human 'capital' is not determined, or is determined only to a small degree, by the number of children and other demographic factors" (Boltvinik, 1996, p. 17). It would be ingenuous and inappropriate to suppose that fertility among the poor can be made a central axis of plans to break the cycle of poverty completely, since the factors that determine this are more complex than demographic behaviour alone. Nonetheless, when initiatives come to be devised with the aim of increasing the opportunities for the poor, or the children of the poor, to escape from that condition, it would be equally wrong to assume that their demographic characteristics are irrelevant. A study carried out in Mexico "led to consideration and empirical realization of the multidimensional nature of poverty"; nonetheless, "it is economic variables that more than anything else determine the likelihood..." of being poor. Particularly important variables of this type include income per wage-earner and employment position; the "other conditioning factor that plays an important role is the dependency rate, which derives from a combination of economic and demographic factors" (Cortés, 1997, p. 158). In short, although merely changing patterns of reproduction will not guarantee changes in the living conditions of the poor, or of their children, any action that is intended to reduce the incidence of poverty needs to consider these patterns as being among the areas where change will be needed.

Source: J. Boltvinik, "Pobreza y comportamiento demográfico: la importancia de la política social", *Demos. Carta demográfica sobre México*, No. 9, Mexico City, 1996; CONAPO (National Population Council), National Population Programme 1995-2000, Mexico, Mexico City, 1995; F. Cortés, "Determinantes de la pobreza de los hogares. México, 1992", *Revista mexicana de sociología*, vol. 59, No. 2, Mexico City, 1997.

V. AN OUTLINE OF THE STATE OF REPRODUCTIVE HEALTH AMONG THE POPULATION OF LATIN AMERICA AND THE CARIBBEAN

The **Latin American and Caribbean Regional Plan of Action on Population and Development**, adopted unanimously by the countries of the region as an instrument to support national activities in this field, incorporates the main features of the reproductive health approach adopted by the International Conference on Population and Development (Cairo, 1994). These features, which are grounded in an unconditional respect for people's freedom to decide upon their own reproductive behaviour, begin with recognition that "the right of every individual to make free, responsible and informed decisions with respect to the number and spacing of his or her children shall be respected, regardless of each country's objectives concerning population growth" (ECLAC, 1996, p. 12). The objectives and recommendations of the paragraph on reproductive rights and health, family planning and family welfare in this Regional Plan address the key components of reproductive health. These are: the provision of a range of contraceptive options that enable people to regulate their fertility effectively and without danger to their health; the establishment of safe motherhood services; extension of the coverage and quality of family planning programmes to reduce the incidence of abortion and the complications that derive from this; giving priority to care of the infant population by enhancing primary health-care and preventive services; the provision of education and information programmes that help bring about a better understanding of sexuality and encourage people to behave responsibly in this respect; reduction of the risks of disease, incapacitation or death associated with the exercise of sexuality and reproduction.

As the broad guidelines described should indicate, the approach taken to reproductive health derives from the objective of widening people's scope to exercise their rights in the areas of sexuality and reproduction. Although this approach is applicable to men as well as women, it is clear that such advances as may be achieved in the field of reproductive health will depend on a sustained improvement in the position of women in society and in the different groups within which they act. Furthermore, this approach, given that it is not confined to any one sector or discipline, embraces the essential components of family planning and mother and infant health, going beyond the somewhat narrow limits of traditional programmes in these areas. Of course, the finer details of this strategic conception of reproductive health are beyond the rather limited scope of this section, which contains some basic indicators that are helpful in providing an understanding of the state of reproductive health in those countries of the region that have data available from the most recent demographic and health surveys. It is unnecessary to add that improvements need to be made in the provision of data for the different countries, this being a prerequisite for achieving fuller knowledge of the different aspects that go to make up reproductive health.

In the light of the objective described, this section will review four aspects of reproductive health. The first concerns the beginning of people's sexual and reproductive life, since the characteristics of this stage have a direct bearing on the risks posed to people's health and personal development. A

second aspect is family planning, considered as a factor that has a decisive and immediate effect on people's ability to implement their decisions about procreation; study of this issue involves consideration of people's knowledge of and attitudes towards contraception, the practices associated with both the supply and use of contraceptives and the identification of unmet demand. The third aspect dealt with is the health of mothers and infants, the key issues here being medical services associated with childbirth, maternal mortality and the survival of children. Finally, reference will be made to AIDS/HIV as a serious sexual health problem. In relation to each of these aspects, an effort will be made to highlight the way in which inequalities of a socio-economic, cultural and ethnic nature affect the prospects for consolidating progress in the field of reproductive health. More systematic exploration of this issue would help to identify vulnerable or less protected social groups that, as such, are exposed to the most serious reproductive health risks.

A. COMMENCEMENT OF SEXUAL AND REPRODUCTIVE LIFE

The age at which sexual activity begins, as well as being a determining factor in fertility, is closely associated with the specific risks involved in pregnancies that occur at the stages of puberty and adolescence. Although this is an important aspect of reproductive health, study of the issue is impeded by the fact that traditionally "age at marriage has been regarded as marking the initiation of sexual activity and, therefore, the beginning of exposure to reproduction" (United Nations, 1997a, p. 4). The tendency to consider these two essentially different events as being one and the same is due both to practical reasons —since information about marriages and the constitution of families is generally available— and to the supposition that there is an identity between sexuality and nuptiality. This association is belied by the situation existing in societies where the exercise of sexuality is, at least in part, separated from the aims of procreating and of forming stable couples. This separation does not rule out the likelihood of pregnancy and childbirth in puberty and adolescence, with the resultant complications and disadvantages referred to in the previous section.

Although scanty, the amount of information of a comparative nature that is available is enough for it to be said that, in general, the age at which men state they became sexually active is lower than the age declared by women; likewise, among males the period elapsing between the time sexual activity begins and the time of marriage is longer, leaving room for the possibility of a larger number of sexual partners. In developed countries, in particular, "there is evidence of a fall in the age at sexual initiation" and "an increase in the overall proportion of young people who are sexually active", while "a greater proportion of adolescents are involved in cohabiting relations" (United Nations, 1997a, p. 11). In developing nations, on the other hand, the signals are less clear, both because information is lacking and because of cultural peculiarities that in some cases include historical patterns of early sexual initiation. A number of studies show that one of the developing regions where these patterns are found is Latin America and the Caribbean; recent data produced by the demographic and health surveys appear to confirm this assertion.

A common finding in countries for which the surveys referred to are available is that the average age at which women have their first sexual relationship is around 19, with slight variations, ranging from 18.2 in Paraguay and Nicaragua to 19.5 in Brazil. In all cases where the comparison can be made, this age is lower than that at which the first conjugal union is formed, the average for which is around 21 (see figures 22 and 23 and table 16 of the appendix). The time lag between the two occurrences varies from three months in Nicaragua to around three years in Paraguay. Therefore, the dissociation between sexual

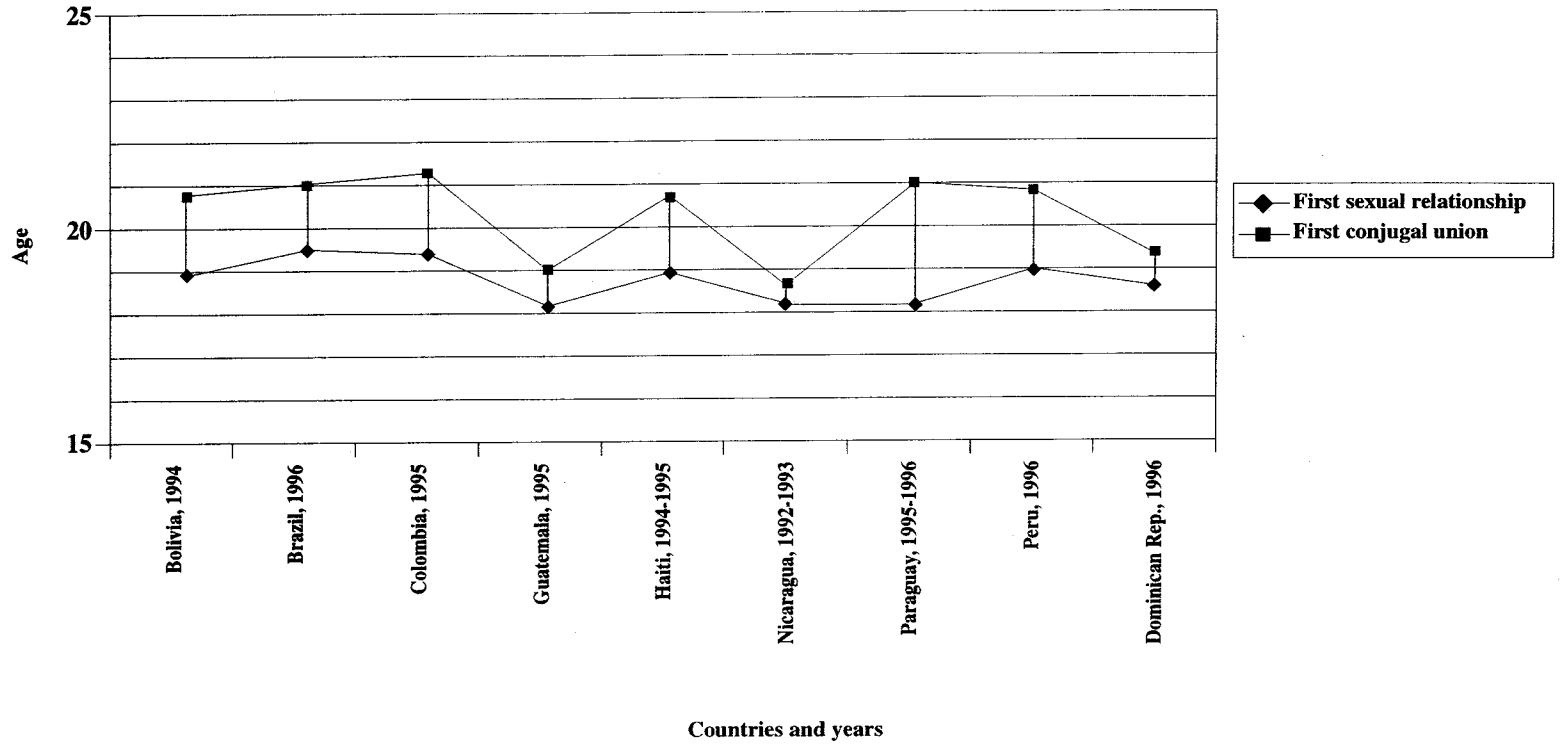
activity and the initial formation of couples is of frequent occurrence. Furthermore, with the age at which the first conjugal union is formed rising, their period of premarital sexual activity has grown longer, a trend which can be seen quite simply as a sign of greater sexual freedom. The information collected in Mexico illustrates this trend: only 8.3% of women born in the 1940s who formed conjugal unions before they were 25 had any sexual experience prior to marriage; among those born twenty years later that proportion is 19% (CONAPO, 1996). It has been observed that premarital sexual activity is more common among women who live in urban areas and among those with a higher level of schooling. This observation is consistent with the conceptual link between sexual freedom and modernity.

These findings signify a number of major challenges for reproductive health programmes and their sex education and family planning components. There can be no doubt that it will be necessary to attend to growing needs in a segment of society which, like adolescents, is exposed to serious risks of both a medical and a socio-economic nature. This task, however, will be made more difficult by sociocultural obstacles to the incorporation of teenagers and adolescents into family planning and responsible parenting programmes; these obstacles take the form of reluctance on the part of society and families to acknowledge that adolescents are sexually active, despite the proof that exists to show that sexual relationships are taking place before marriage to an ever increasing extent.

It should be added that the time lag referred to does have some gender specificities. In the countries of Latin America and the Caribbean, the ages that men give for their sexual initiation are considerably lower than those owned to by women. Among men, the average age given for the first sexual relationship is around 16, except in the case of Haiti, where it is a little over 18. For men, then, sexual activity begins on average two or three years earlier in life than it does for women. Perhaps more importantly, given that men also declare a higher age for their first conjugal union, the time lag between the date on which sexual activity begins and the date of the first conjugal union is some seven or eight years (see figure 23 and table 16 of the appendix). The greater length of time during which men have premarital sexual activity – something that presumably reflects differences in the way the role of gender is viewed as regards sexuality and reproduction – cannot but be an issue of concern for reproductive health. It is for this reason that the **Latin American and Caribbean Consensus on Population and Development** recommends that "...efforts must be made to promote the education of men in responsible fatherhood" (p. 18). The relevant programmes should emphasize the need for men to realize that sexuality is a responsibility they share with women. In short, it is necessary to "develop information, educational and communications strategies in order to achieve the egalitarian participation of men and women in decisions related to reproductive and sexual life and family planning" (ECLAC, 1996, p. 36).

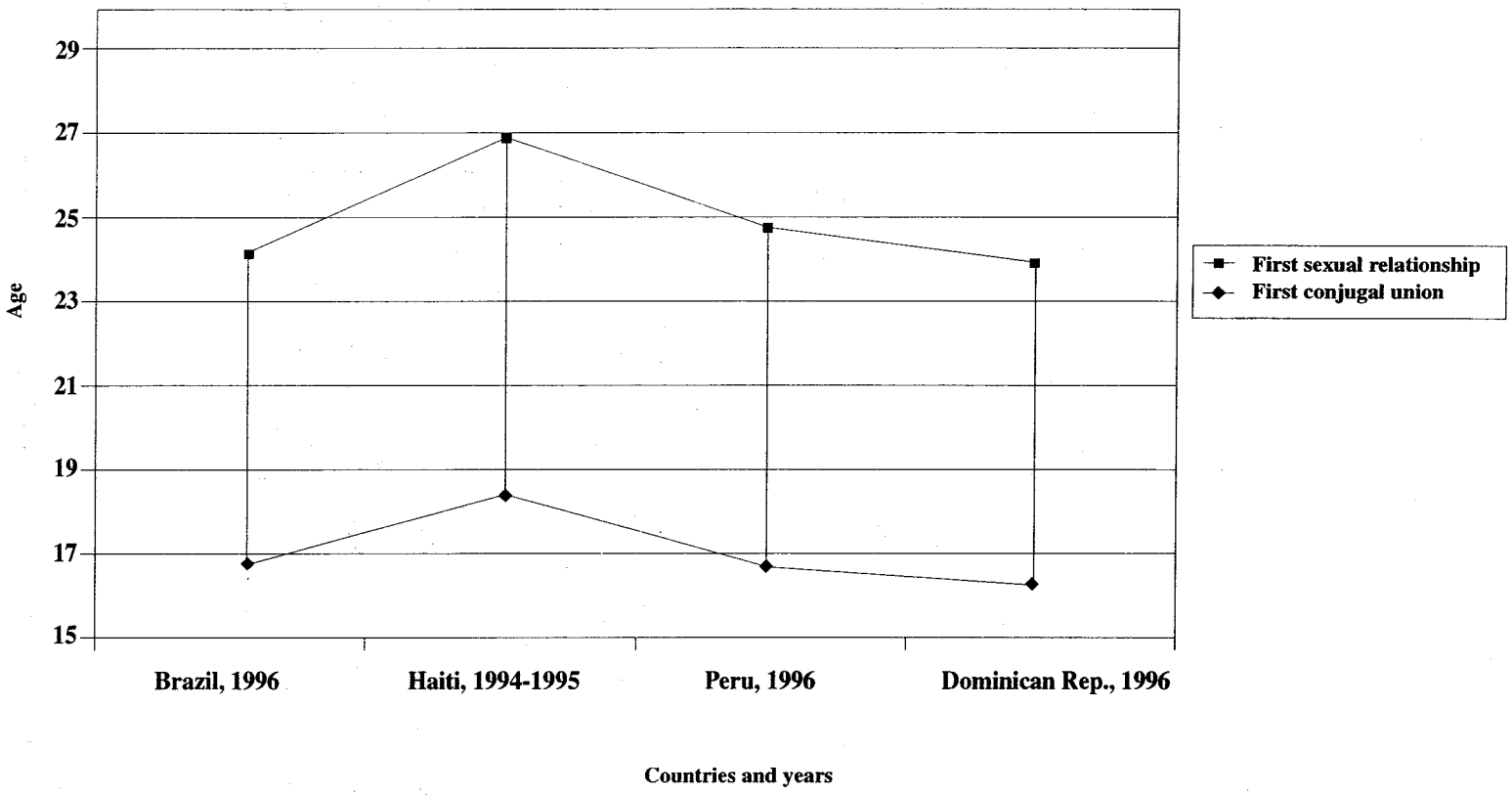
The social inequities that manifest themselves in reproductive behaviour in general can be discerned in patterns of sexual initiation and formation of conjugal unions. If the area of residence is considered, it is found that the age at which people have their first sexual relationship is consistently lower in rural areas, with an average of around 17; in the urban environment, this age is over 19. The discrepancies found when the comparison is by level of education are even more striking (see figure 24 and table 17 of the appendix). Thus, for example, the average age at which women without schooling in the Dominican Republic have their first sexual relationship is less than 16; by contrast, it is over 23 in the case of women in Peru who have secondary education or better. In general, the data from demographic and health surveys show that the proportion of young women who are sexually active is substantially higher among rural residents and among those who have no schooling. Differences as striking as those mentioned make it plain that, over and above the notion of "sexual freedom", which is taken to be an inseparable part of the modern urban environment, poverty and various forms of social exclusion are instrumental in the early initiation of sexual relationships. This means that there is an urgent need to

Figure 22
LATIN AMERICA AND THE CARIBBEAN: AVERAGE AGE AT TIME OF FIRST SEXUAL RELATIONSHIP AND FIRST CONJUGAL UNION, WOMEN AGED FROM 25-49, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 23
LATIN AMERICA AND THE CARIBBEAN: AVERAGE AGE AT TIME OF FIRST SEXUAL RELATIONSHIP AND FIRST CONJUGAL UNION, MEN AGED FROM 25-49, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

design a sex education policy that is aimed at the most disadvantaged social groups and to adopt initiatives aimed at preventing this pattern of behaviour from translating into early fertility.

Although sexual relations are beginning at earlier ages and, apparently, are more common among young people in social situations of greater economic disadvantage, this does not necessarily invalidate the thesis that there is greater "sexual freedom" in more urban and modern environments. In fact, the time lag between sexual initiation and the formation of conjugal unions is, in general, shorter in the more disadvantaged social groups that are exposed to poverty; in almost all the countries, women without schooling and those living in rural areas state that their first conjugal union was formed at an average age of less than 20, not long after they had had their first sexual relationship. In the case of women in the urban environment and those who have secondary or higher education, by contrast, the average age at which they form their first conjugal union is 22 or 24, more than a year after sexual activity first began. Consequently, the time period separating the two events, i.e. the first sexual relationship and conjugal union, tends to be higher in the case of women living in an urban environment, and in the case of women with a high level of education. This information suggests that in modern situations there is more extended, if not more frequent, sexual activity, probably due to the greater ease with which sexual relationships can be dissociated from procreation, something that, although it may be put down to favourable cultural conditions, is facilitated in practice by the availability of contraceptives.

The early sexual initiation found among women who belong to more vulnerable social groups should not be regarded, therefore, merely as a consequence of more permissive behaviour patterns; rather, it appears to be due to norms and traditions that favour early marriage as well. Given that one of the basic purposes of marriage is procreation, early marriage results in teenage or early adolescent fertility, whose effects for people in disadvantaged social groups have already been pointed out. According to information gathered by reproductive health surveys conducted among young adults during the 1980s, in the main cities of several countries in the region there is a close relationship between nuptiality in adolescence and the practice of premarital sex; in other words, sexual activity prior to formation of a conjugal union is more common among women who form these unions when they are still teenagers than among those who do so after the age of 20 (PRB/DHS/CDC, 1992).[29] Although this information is not sufficient for us to postulate a causal relationship between sexual activity and marriage during adolescence, it does suggest that both of these are manifestations of one and the same phenomenon, which results in a high probability of reproduction during the teenage years and early adolescence; notwithstanding the validity of the above, it is fairly common for pregnancy to predate conjugal union at these young ages. Consequently, initiatives aimed at modifying norms and traditions relating to sexual activity and the formation of conjugal unions at early ages could contribute to bringing down fertility at those ages. These initiatives would be particularly relevant for people who, being members of groups that live in conditions of marginalization and poverty, do not perceive that delaying marriage may be beneficial for them, especially in the case of women.[30]

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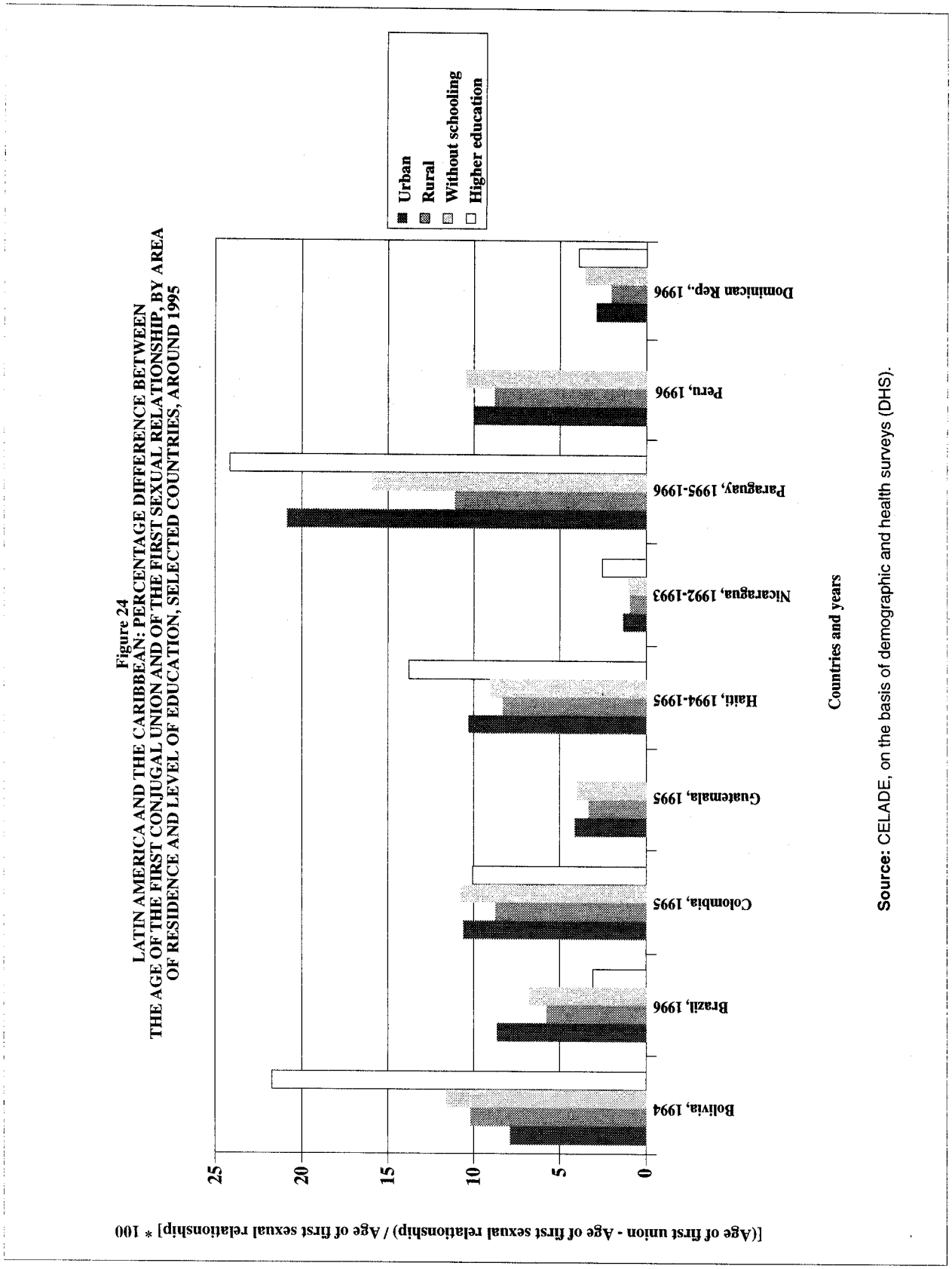
[29] The Young Adult Reproductive Health Surveys, YARHS, were coordinated by the Centers for Disease Control and Prevention (CDC).

[30] Because of their marginalization, these people are not subject to stimuli that are favourable to upward social mobility, such as educational and working demands, whose opportunity costs increase the benefits attached to delaying marriage until after the end of adolescence.

Figure 24
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE DIFFERENCE BETWEEN THE AGE OF THE FIRST CONJUGAL UNION AND OF THE FIRST SEXUAL RELATIONSHIP, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Box 6

THE ROLE OF WOMEN AND PATTERNS OF CONSENSUAL UNION IN VENEZUELA

Although in Venezuela no research has been carried out on the series of demographic and health surveys (DHS), and there are some gaps in the information available on reproductive health and behaviour, the data provided by a survey carried out in 1991 in the metropolitan area of Caracas suggest that there have been changes in patterns of nuptiality, and point to some factors that may lie behind these. The survey covered two groups of women, a "mature" group born between 1937 and 1946 and a "young" group born between 1962 and 1966, the objective being to compare the patterns of consensual union that prevailed before the decline in fertility with those existing after this decline had manifested itself clearly. A study based on the information collected by the survey (Parrado and Tienda, 1997) analyses the changes that have taken place in the social position of women and the effects of these on the timing and nature of the first conjugal union. The conclusions of the study are:

1) The main reason why women are waiting longer before entering into their first conjugal union is that their educational careers have lengthened. While they are at school, women perceive their role as students as being incompatible with the functions that have to be performed by a mother or wife. Among young women who have left school, the likelihood of their remaining single increases in line with the number of years of study they have passed through. Paradoxically, a more extended period of work, especially in low-skilled occupations, increases the likelihood of a conjugal union being established; this finding is due to the polarization that exists between women who out of necessity begin to work at an early age and those who do not enter the labour market. Although this model of labour force participation may have changed somewhat in the case of the younger age groups, as their representation in more highly skilled occupations is increasing, the effects of this have not been great enough to alter the way in which conjugal unions are formed.

2) When the ages at which women form their first conjugal union are compared in relation to the type of union, it transpires that it is women entering into legal unions who delay longest. By contrast, the rate of formation of consensual unions has remained constant among women aged up to 20, as may be deduced from the similarity between the patterns displayed by the two groups under consideration; after this age, however, the frequency with which consensual unions are formed in the "young" group is greater than it was in the "mature" group at the same ages.

3) The decision to "opt" for either a consensual union or a legal one depends not only on the individual characteristics of the woman concerned, but also on her family background, which in turn reflects the conditions under which the socialization process took place in her particular case. The factors most frequently associated with the formation of consensual unions are: a family with a low level of education, and rural origin. If the woman concerned has a higher level of education, this may be instrumental in reversing this structural relationship, since more highly educated women prefer legal matrimony. However, since improvements in the social position of women from lower socio-economic groups have been slow in coming, changes in nuptiality have not been pronounced; it is still most common for the first union to be of the consensual type.

4) Improvements in the social status of women and rapidly rising divorce rates have both contributed to bringing into being a different type of consensual union among women with a high level of education. The results of the study show that the recent increase in the proportion of consensual unions after the age of 20 is due mainly to the emergence of this "new" type of consensual union, entered into by more highly educated women, which is similar to the pattern of cohabitation found in more highly developed societies, this being defined as a trial marriage period or an alternative to remaining single. In this "modern" type of union, there is less personal commitment, greater instability and lower fertility than in the "traditional" forms of consensual union entered into by women of rural origin with less formal education and greater experience of working in low-skilled occupations. This "modern" type of cohabitation has contributed to the decline in fertility.

PROPORTION OF SINGLE WOMEN BETWEEN THE AGES OF 20 AND 25 WHO REMAIN SINGLE OR ENTER INTO LEGAL OR CONSENSUAL UNIONS, BY AGE GROUP AND LEVEL OF EDUCATION

Civil status	"Mature" group		"Young" group	
	Low educ. level [a]	High educ. level [b]	Low educ. level [a]	High educ. level [b]
Remain single	0.282	0.247[c]	0.371	0.475
Marry	0.365[c]	0.634[c]	0.239	0.312
Form consensual unions	0.354	0.118[c]	0.390	0.213

Source: E. Parrado and M. Tienda. "Women's roles and family formation in Venezuela: new forms of consensual unions", *Social Biology*, vol. 44, no. 1-2, 1997.

[a] Less than 7 years schooling.

[b] 7 years schooling and over.

[c] Difference in the proportion between groups, statistically significant to $p < 0.05$.

CUMULATIVE FERTILITY RATES BY DURATION OF THE UNION AND BY AGE GROUP, TYPE OF UNION AND LEVEL OF EDUCATION

Cumulative fertility rates among women with a low level of education [a b]					Cumulative fertility rates among women with a high level of education				
	"Mature" group		"Young" group			"Mature" group		"Young" group	
Duration of the union	Legal union	Consensual union	Legal union	Consensual union	Duration of the union	Legal union	Consensual union	Legal union	Consensual union
1-2	0.574	0.573	0.593	0.632	1-2	0.544	0.696	0.467	0.555
3-4	1.352	1.203	1.208	1.359	3-4	1.138	1.650	0.808	0.978
5-6	2.044	1.912	1.685	1.964	5-6	1.524	2.126	1.053	1.158
7-8	2.626	2.500	2.023	2.383	7-8	1.891	2.745	1.129	1.269
9-10	3.013	3.091	2.287	2.706	9-10	2.156	3.031	1.189	1.337

Source: E. Parrado and M. Tienda. "Women's roles and family formation in Venezuela: new forms of consensual unions", *Social Biology*, vol. 44, no. 1-2, 1997.

[a] Women aged up to 29 in unions lasting up to 10 years.

[b] The level of education was determined by taking the number of years of education in excess of or below the specific mean of the group, plus 1.5 standard deviations.

B. FAMILY PLANNING AND CONTRACEPTION

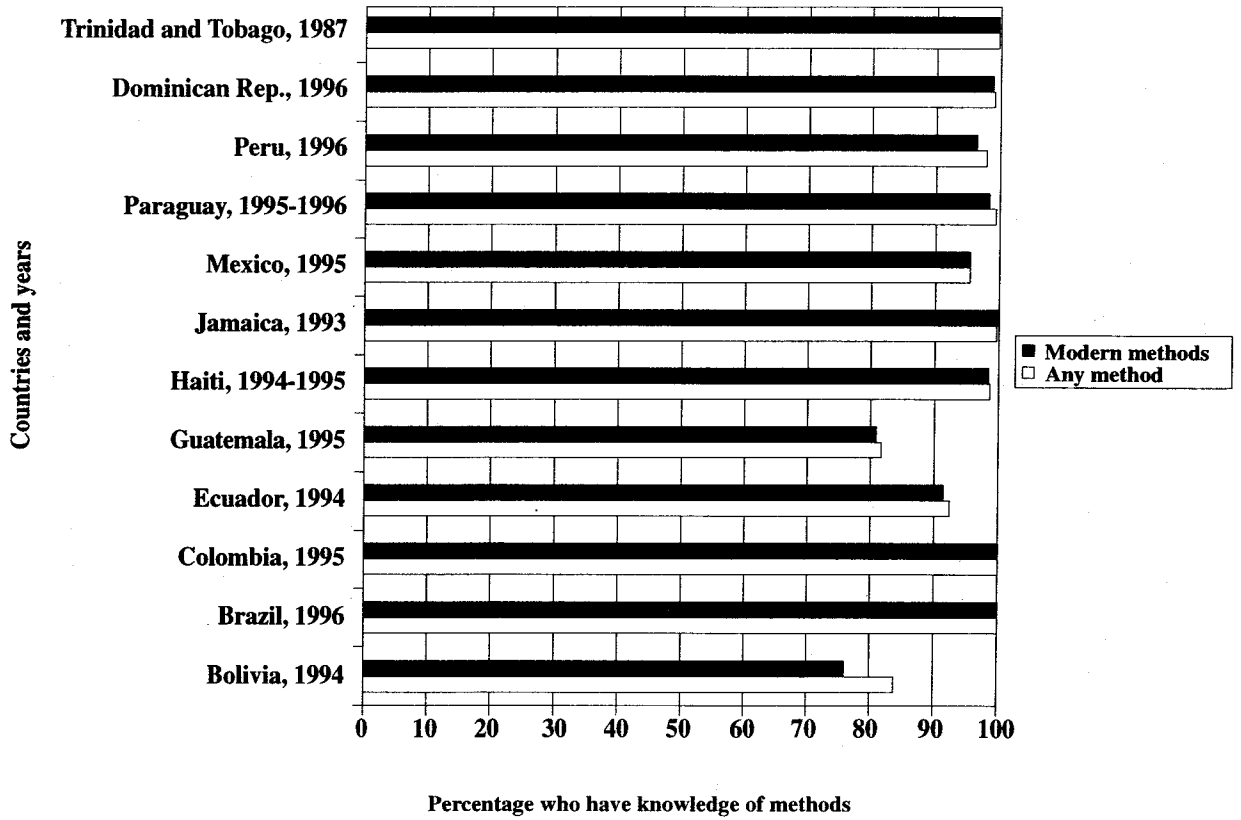
1. Knowledge and attitudes

The rapidity with which knowledge about contraceptive methods has spread has been one of the most dynamic processes seen in the recent history of the countries of Latin America and the Caribbean. Of course, this "knowledge" may be anything from basic information about the possibility of preventing a sexual relationship from leading to conception, to the ability to make precise use of the appropriate procedures. According to the data collected by demographic and health surveys in a number of countries in the region, the vast majority of the female population of child-bearing age can show some knowledge of the subject. Even in Guatemala, where this knowledge is less widespread, eight out of every ten women who had formed conjugal unions (82%) declared that they were aware of the existence of contraceptive methods; in Costa Rica, all women in this position said they had some knowledge about the subject. When asked whether this knowledge is about some modern method, the proportion of those who reply in the affirmative diminishes. Even still, the lowest percentage, which was found in Bolivia, shows that more than three quarters (77%) of women who had formed conjugal unions were able to name at least one of these methods (see figures 25 and 26 and table 19 of the appendix). Given the nature of the information collected through the surveys, it is worth specifying that the "knowledge" declared may be no more than the mere naming of a method, which does not mean that the person concerned has appropriate information about how to employ it.

Because it is so widespread, variations in the extent of knowledge about methods of contraception are small compared to the great differences found in relation to other aspects of reproductive behaviour and health. In several countries there is virtually no variation at all, since even among the most disadvantaged groups the proportion of the population that claims to be aware of the existence of modern methods of contraception is high. This is the case, for example, with more than 97% of women in conjugal unions living in rural areas in Paraguay and the Dominican Republic. Nonetheless, inequities manifest themselves very clearly in other countries. As an illustration of this, in rural areas in Bolivia this knowledge is possessed by only just over half (55%) of all women in conjugal unions and an even smaller proportion (45%) of those who do not have any formal schooling; these proportions are in contrast to the almost universal knowledge about contraceptive methods among women with medium or higher education and residents of urban districts.

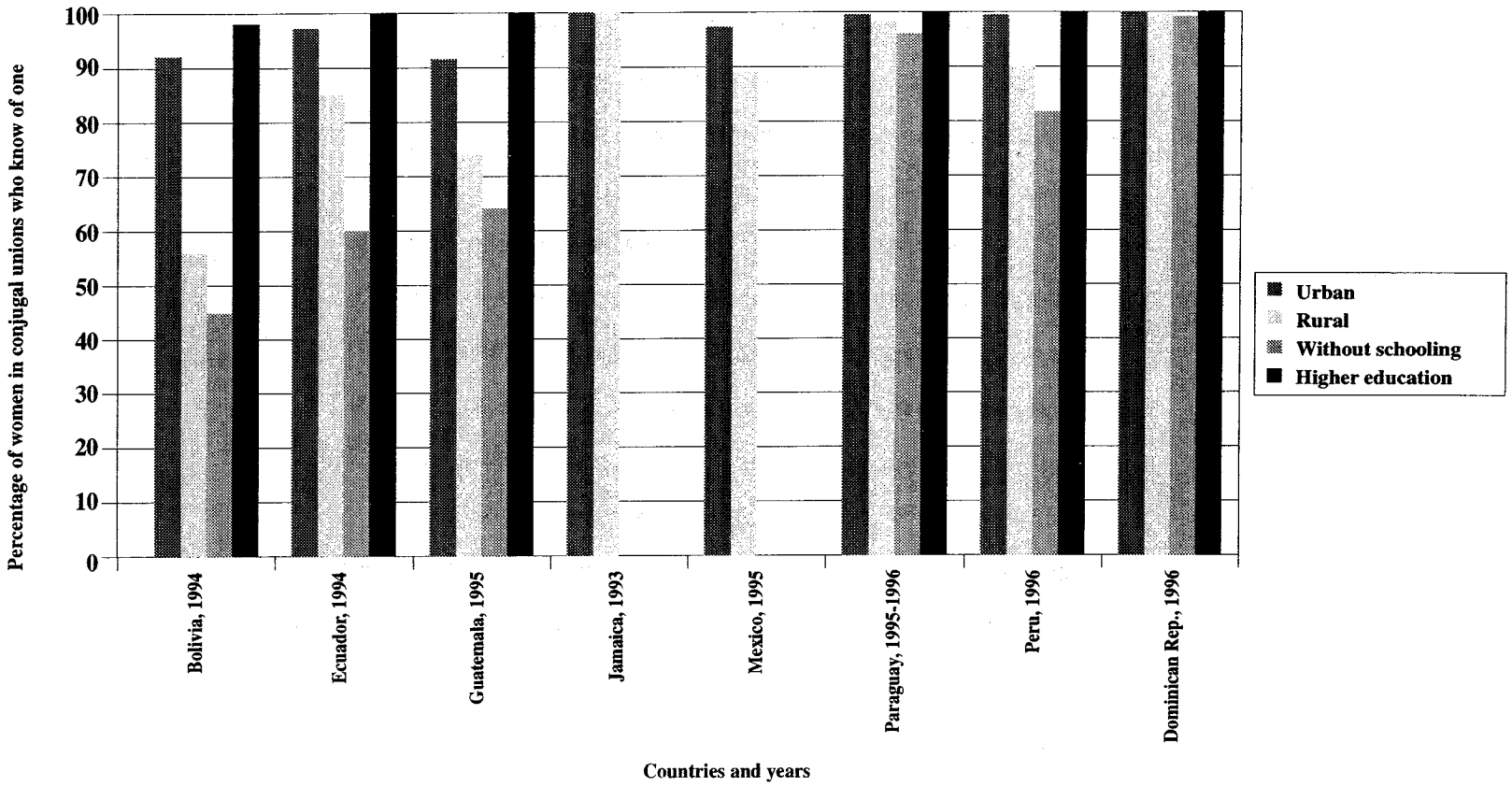
It appears that considerable progress has been made in the region in spreading basic information and knowledge about the means available to ensure that motherhood is voluntary. Nonetheless, failings persist. Some of these failings are clearly revealed by the ignorance that exists in marginalized social segments living in poverty; examples of this type of situation are to be found among Bolivian, Ecuadorian and Guatemalan women without schooling. Other failings relate to the fullness of people's knowledge about contraceptive methods. Although the survey figures show that a substantial proportion of the population has some knowledge, there is no certainty that this extends to an understanding of the procedures that are currently in use or the scope for choosing between different options. Furthermore, a number of research projects have concluded that there is a high degree of ignorance about important aspects of sexuality and human reproduction, such as safeguarding health, the fertility cycle of women, the risks of sexually transmitted diseases (including AIDS/HIV), the biological conditions of gestation

Figure 25
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE WHO HAVE KNOWLEDGE OF CONTRACEPTIVE METHODS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 26
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN IN CONJUGAL UNIONS WHO KNOW OF SOME MODERN CONTRACEPTIVE METHOD, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



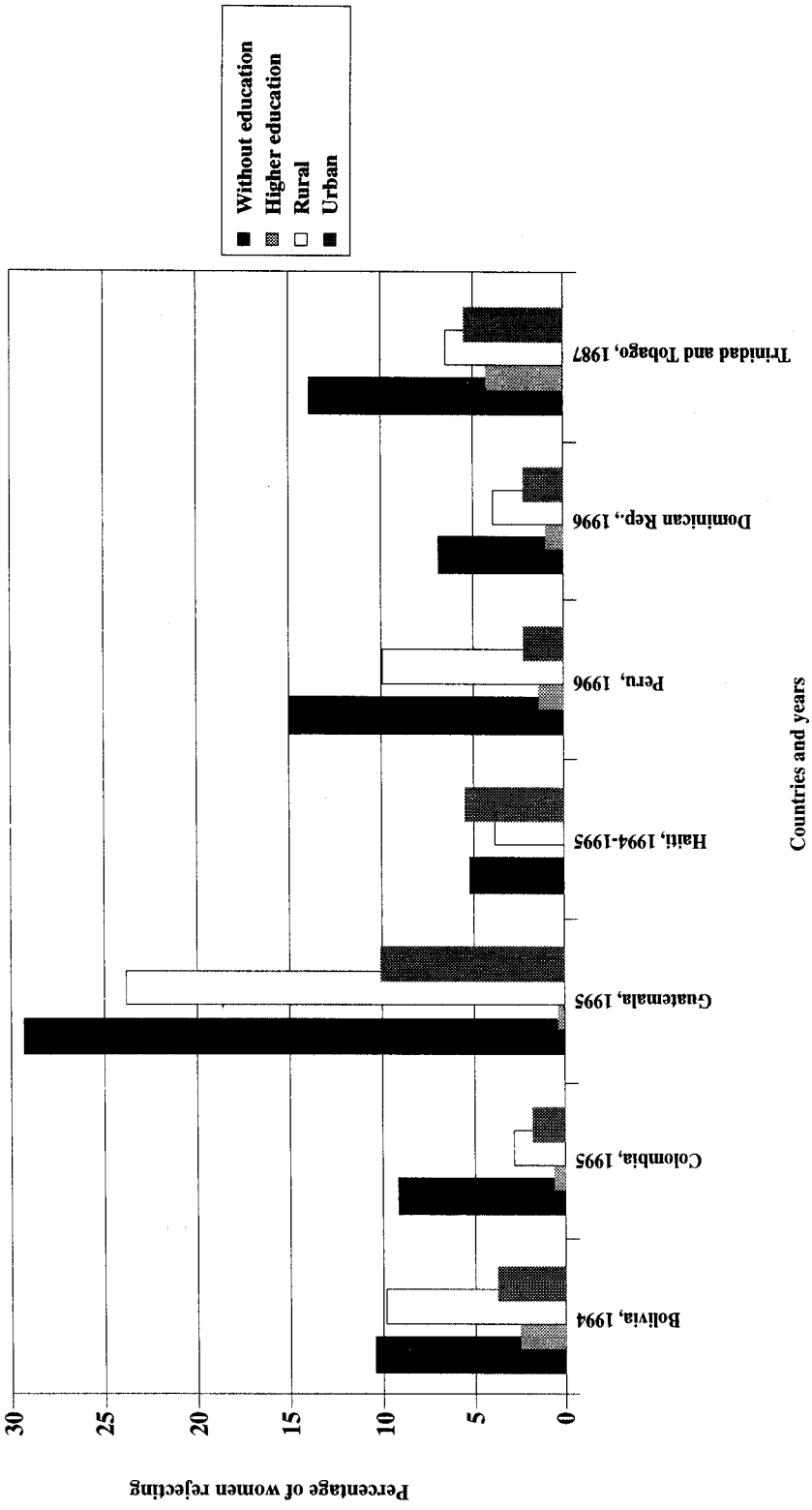
Source: CELADE, on the basis of demographic and health surveys (DHS).

and puerperium, and the physiology of the reproductive organs. These deficiencies have been found even in countries where information about contraception is widely held and has been incorporated into the reproductive culture of couples (CELADE, 1996).

Another particularly important feature of the information collected by the demographic and health surveys is the knowledge that men claim to have about contraceptive methods. Given that sexuality and reproduction are spheres in which responsibility is shared between men and women, this information may be of use in helping to ensure that this responsibility is actually lived up to in people's day-to-day behaviour. The figures available suggest that knowledge about methods of contraception is sufficiently widespread among men for there to be no major differences between them and women in this respect. There appears, therefore, to be a common basis of knowledge that couples can draw upon when taking decisions about family planning. This, however, does not mean that these decisions are not affected by gender differences, arising from values, attitudes and family power relationships rather than from any supposed ignorance about contraceptive methods on the part of men.

One aspect related to the issues discussed above is that of attitudes towards family planning. Although they do not address this matter in all its complexity, demographic and health surveys do obtain reactions from those interviewed in relation to: messages about family planning, current contraceptive use and decision-making regarding the regulation of fertility within the family. According to the data collected, the idea of family planning is widely accepted in the countries of Latin America and the Caribbean, since the messages promoting it are rejected by only a small proportion of the population, this being highest in Guatemala, at one in ten women. The rate of rejection is consistently higher among women with little or no formal schooling and among the residents of rural areas; for example, a third of Guatemalan women with no schooling (30%) and of those belonging to indigenous groups (32%) manifested their opposition to these messages (see figure 27 and table 20 of the appendix). These results are indicative of the difficulties that family planning programmes encounter in those groups, even though they are the very ones that show high levels of unwanted fertility. The attitudes of this particularly poor segment of society appear to come down to a failure properly to grasp one of the prerequisites for achieving a sustained reduction in marital fertility, a syndrome that is described in an article by Coale (1977) now considered a classic. Apparently, users of family planning are still exposed to the risk of social opprobrium.

Figure 27
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN WHO REJECT MESSAGES ABOUT AND USE OF CONTRACEPTIVES, BY LEVEL OF EDUCATION AND AREA OF RESIDENCE, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

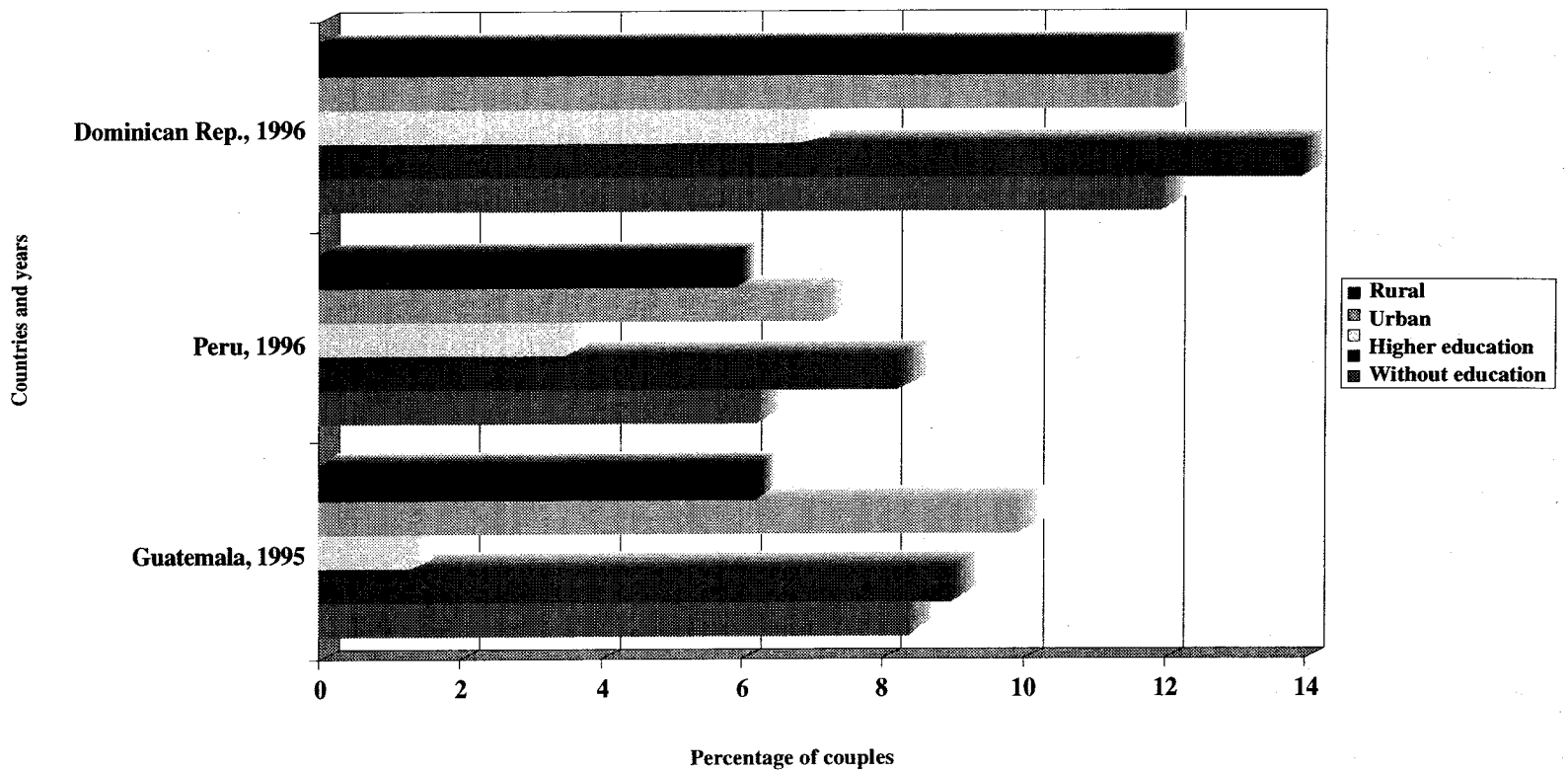
It should be added that the level of opposition to messages promoting family planning does not differ markedly by gender. Only in the Dominican Republic was greater resistance shown by men, with 7% declaring themselves to be opposed to these messages, while only 3% of women said the same. This information seems to suggest that, as in the case of knowledge about contraceptive methods, the virtually identical reactions of men and women to the spread of family planning may contribute, at least in part, to greater gender equity in the decision-making process. Nonetheless, such uniformity of attitudes as exists in this area is not an influential enough factor to enable other obstacles of a cultural nature that restrict the equity horizon in family life to be overcome. Even so, deliberately promoting the sharing of responsibility in the area of reproductive behaviour could help to weaken the prevailing stereotypes of the social roles of the two genders.

Given that there are no very great discrepancies between men and women as regards either knowledge about or the acceptability of messages associated with contraception, it would be useful to carry out a more detailed study on a couple-by-couple basis. The scantiness of the data available means that no hard and fast conclusions can be drawn. Although it is true that in most couples the two people involved approve of family planning, where there are disagreements about the current use of contraceptive methods, it is often the woman who approves and her husband or partner who disapproves. The country with the highest proportion (12%) of couples who disagree over this issue is the Dominican Republic, and this is consistent with gender differences regarding acceptance of material promoting family planning. A no less important result that emerges from the surveys is that, quite plainly, disagreements between the sexes are more frequent among the poorer social groups; in Peru for example, the frequency with which this dilemma arises among women without schooling (8.4%) is more than double what it is among those with higher education (3.5%) (see figure 28 and table 21 of the appendix). In the light of this evidence, fragmentary though it is, it may be maintained that family planning is widely accepted by both women and men, but among a relatively small —though not negligible— proportion of couples conflicts arise about this very sensitive issue, and the way these are resolved generally goes against the wishes of the woman; furthermore, we should not lose sight of the fact that these conflicts are more common among the groups that suffer most from poverty.

2. Contraceptive practices

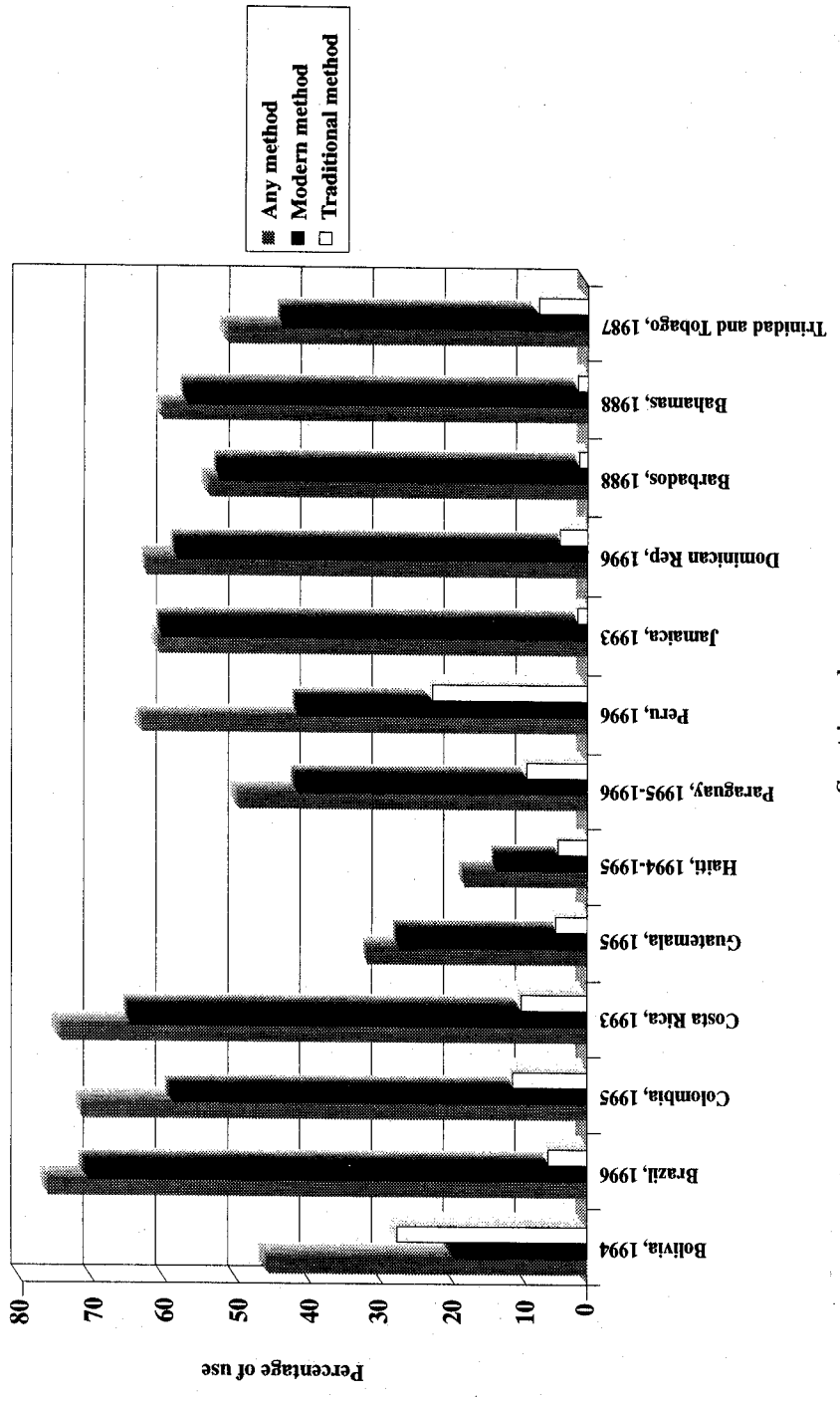
It is estimated that 57% of Latin American and Caribbean couples of reproductive age use some method of contraception, mostly (49%) of a modern type. Although the dramatic decline in fertility in the countries of the region has been closely associated with the expansion in the supply and use of these methods, the comparative figures on the prevalence of contraceptive use place the region very close to the world average (United Nations, 1997a). Of course, on either side of the regional average there are large variations between countries. If we consider only women in conjugal unions, the proportion of these who use some type of method ranges from a minimum of 18% in Haiti to a maximum of 77% in Brazil; if we exclude the case of Haiti, the index of prevalence is less than 50% in only three of the countries (Nicaragua, Bolivia and Guatemala) for which information is available (see figure 29 and table 22 of the appendix). If this comparison is limited to women in conjugal unions who are users of modern methods, the proportions drop and, perhaps more importantly, the extent to which Haiti, Bolivia and Guatemala lag behind becomes manifest, since less than 30% of women in conjugal unions in these countries are users of those methods.

Figure 28
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF COUPLES IN WHICH THE WOMAN APPROVES AND HER PARTNER DISAPPROVES OF FAMILY PLANNING, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE. on the basis of demographic and health surveys (DHS).

Figure 29
LATIN AMERICA AND THE CARIBBEAN: WOMEN CURRENTLY IN CONJUGAL UNIONS, BY USE OF CONTRACEPTIVE METHODS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

The figures for *current use of modern contraceptives* also draw attention to the fact that, although it is recognized that the coverage of family planning services has increased, there are still large shortfalls in terms of access to effective forms of contraception. In several countries in the region, users of modern contraceptive methods account for less than half of all women in conjugal unions. Even in those countries whose indices of prevalence are higher, people's ability to choose freely between methods may be restricted by the limited range of options available. Given these circumstances, it is important that we examine the arguments put forward by potential users to explain why they do not employ these methods. A proportion of women state that they are in situations where the use of contraceptives would be irrelevant, for example because they are trying to become pregnant, or their sex life is virtually nil. If to this proportion, which can be significant in absolute terms, are added women suffering from temporary or permanent infertility conditions, we arrive at a set of women who do not represent any effective demand for contraceptives. In addition to these reasons for not using methods of contraception, we find others being given that may be put down to the effects of distorted information or sociocultural backwardness, examples being comments made about: the supposed adverse effects of contraceptives on health, ignorance of methods, and reluctance to accept them.[31] Neither cost factors nor factors related to knowledge about the source of supply (or the remoteness of this) appear to play an important role in decisions not to use or to stop using contraceptive methods, as these are hardly mentioned.

Of course, the reasons put forward by women for not using contraceptive methods could be grouped by the rationality of their declarations. The only rational responses would be those that are consistent with the factors that define the set of women who do not represent any real demand for contraceptives (trying to become pregnant, infertile or not having sexual relations); the other responses would be classified as irrational, since it would appear that they mask situations of unmet demand. Although this type of grouping is not absent from the literature on the subject, its employment is controversial, and its usefulness as a criterion for measuring the gaps in family planning is therefore questionable. These gaps need to be detected by identifying women who do not use contraceptives and who are exposed to the risk of unwanted pregnancies; if we proceed in this way, we can arrive at a quantitative estimate of *unmet demand for family planning.*[32]

By comparing actual fertility with reproductive preferences, we can deduce that the unmet need for family planning is fairly high in a number of countries in the region, a finding that is consistent with the figures for unwanted fertility. In four countries this unmet need extends to more than a quarter of all women of child-bearing age who are in conjugal unions and, as might be expected, it is highest in Haiti, where it affects around half (48%) of all women (see figure 30 and table 23 of the appendix). Less than 10% of women in this category in Brazil, Colombia and Ecuador have unmet needs of this type; these

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[31] The main reasons put forward by women in conjugal unions aged under 30 for not using contraceptives vary between countries: in Colombia and Brazil the infrequency of sexual relations, the menopause and infertility are the most common; in Bolivia, ignorance of methods predominates; in Peru, concern for the damaging effects on health; in Haiti and the Dominican Republic, the desire to have more children; in Guatemala, ideological opposition to family planning. It is important to add that ignorance of contraceptive methods is acknowledged by a high percentage —between 13% and 25%— of Haitian, Guatemalan and Bolivian women.

[32] In demographic and health surveys, the women who are considered to have unmet family planning needs are those who at the time of the survey were fertile, were not using contraceptive methods and were in one of the following situations: i) they did not wish to have more children; ii) they were pregnant or not menstruating, and their last pregnancy had been unwanted; iii) they were pregnant or not menstruating, their last pregnancy was wanted, but they would have preferred to have had it at a later date; iv) they want more children, but prefer to wait at least two years before having them. Situations i) and ii) indicate unmet need for means to *limit* the number of offspring, and the other two —iii) and iv)— unmet need for means to *space out* their offspring.

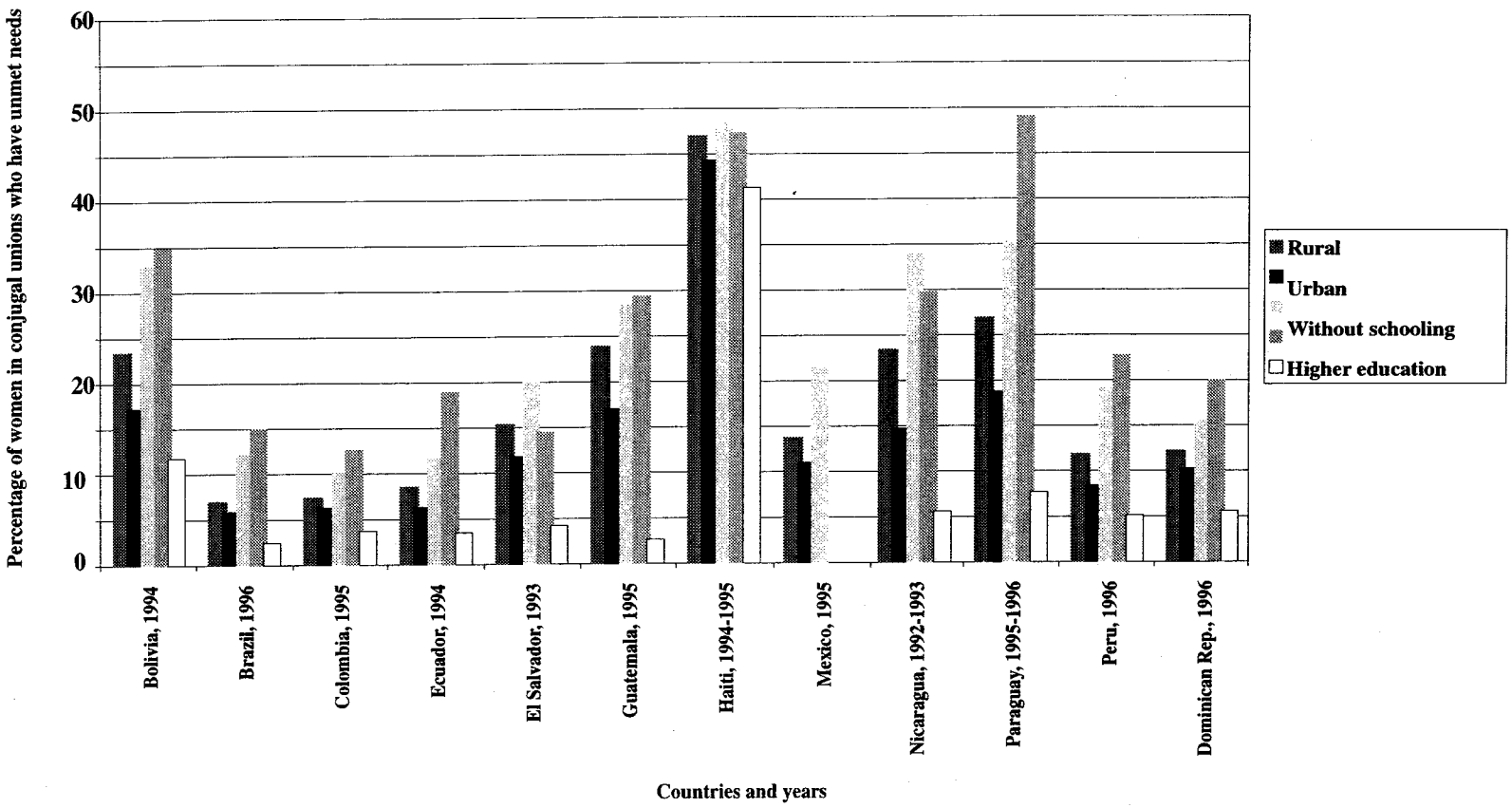
relatively low figures for unmet need can be explained by the high proportion of women currently using modern methods of contraception in the first two of these countries, and by the apparent success of the approach taken by family planning programmes in Ecuador.

As in other areas of reproductive health, differences in the incidence of unmet family planning needs are associated with socio-economic inequities. It is found again and again in the different countries that these needs are more acute in rural sectors and among women with a lower level of formal education. This situation appears to be extremely widespread in Haiti, something that is consistent with the high proportion of women whose family planning needs are unmet (48%). In rural areas in the other countries the proportion of women in conjugal unions whose needs are thus unmet ranges from some 11% in Colombia to 34% in Nicaragua. By contrast, the figures for urban women range from 6% in Brazil to 18% in Bolivia. More pronounced differences are found when women's level of education is considered; the unmet needs of those who have passed through higher education are as low as 3% in Brazil, while the figure for women without schooling in Bolivia is 36%.

The above differences, both between countries and within them, match the inequalities found in respect of access to contraceptives; in general, the lower the proportion of women in conjugal unions who use modern contraceptives, the higher the incidence of unmet family planning needs. Nonetheless, this relationship is not absolute, since family planning needs depend not so much on the prevalence of current contraceptive use as on the planning of pregnancies. This distinction enables us to understand why unmet family planning needs are greater in the Dominican Republic than in Ecuador, even though the index of current contraceptive use is clearly lower in the second country.[33] Of course, this distinction does not alter the fact that the effects of socio-economic inequities can be clearly discerned in current use of modern contraceptive methods. With the exception of El Salvador, where the most obvious disparity is seen between urban and rural areas, the starkest contrasts are found when we compare groups at either end of the educational spectrum. For example, the prevalence of modern contraceptive use is as low as 3% of women in conjugal unions without schooling in Bolivia; among Haitian and Guatemalan women in conjugal unions the proportions are 8% and 13% respectively. In Ecuador, a country for which breakdowns of data by social group are available, current use of contraceptive methods among women in the highest group (57.2%) is double that found among women in the lowest group (29.2%).

[33] At present, methods of contraception are used by 59% of Dominican women in conjugal unions and 46% of Ecuadorian women in this same situation; unmet needs on the other hand are experienced by 13% of the former and only 9% of the latter.

Figure 30
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN IN CONJUGAL UNIONS WITH UNMET FAMILY PLANNING NEEDS BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Box 7

CHANGES IN FAMILY PLANNING IN MEXICO

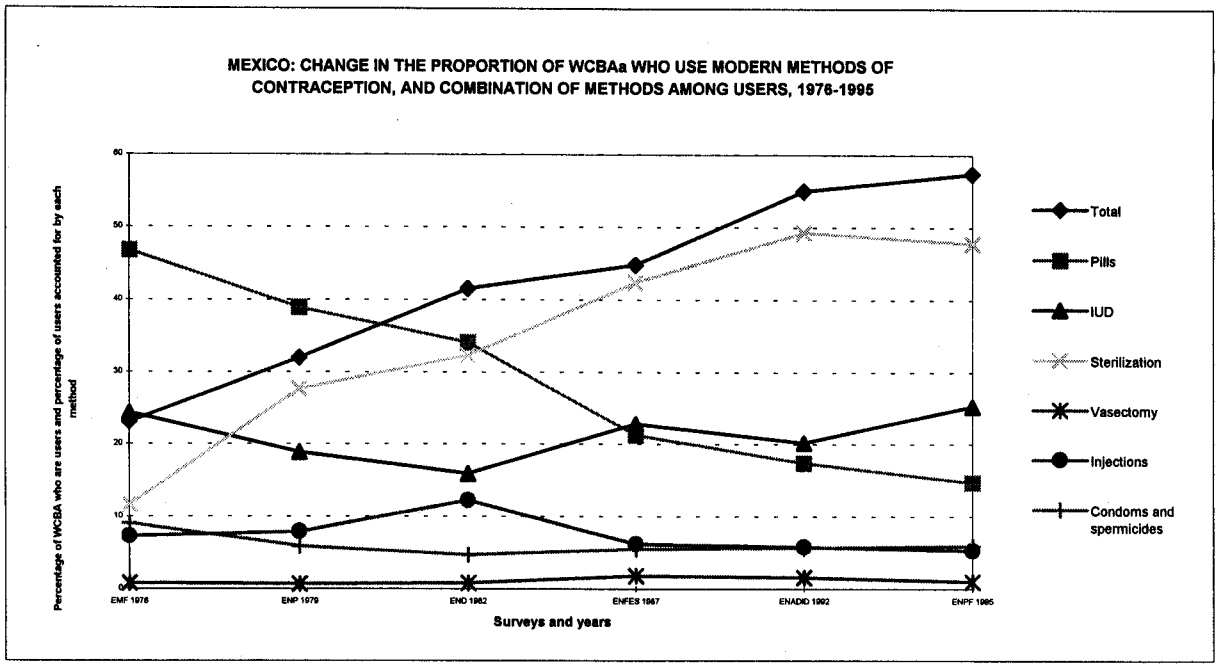
In 1965, the total fertility rate in Mexico was estimated to be 7.1 children per woman, a figure which is characteristic of populations where contraceptive use is very low or is nil. Eleven years later, between 21% and 23% of women of child-bearing age were using some form of contraception. In 1977, the National Family Planning Programme was launched; the initial phase of this (1977-1982) began with the design of the bases for the programme. These bases were revised by the staff responsible for taking future decisions about the issue, and family planning matters were coordinated within the sector in each federal body. Thanks to the structure of the programme and to the work of professional staff who were very well qualified to run it, at the end of this first phase the results were even better than planned: the proportion of women of child-bearing age who had formed conjugal unions and were users of modern methods of contraception increased from 23.1% in 1976, according to the Mexican Fertility Survey (EMF), to 41.5% in 1982, according to the National Demographic Survey (END). As a result, the natural growth rate of the population fell from 3.2% in 1976 to 2.4% in 1982. The next assessment of the coverage of the National Family Planning Programme drew on the results of the National Fertility and Health Survey (ENFES) of 1987. Between 1982 and 1987, the use of modern contraceptives increased by only 8% (see chart) and the natural rate of population growth in 1988 was put at 2.3%, which represents a decrease of a bare one tenth of a point over the previous five years. Why did this change occur in a programme that had been so successful up until 1982? Four possibilities may be suggested: (i) the disappearance in 1980 of the Family Planning Programme National Coordination body, whose staff were incorporated into the Mexican Social Security Institute (IMSS); (ii) the replacement in 1980 of the experts in charge of running the Ministry of Health and Welfare (SSA) programme by staff who were not familiar with this work; (iii) as a result of the above, the only institution in the official sector that increased its coverage was the IMSS; (iv) because of the severe economic crisis in the period, the activities carried out by private doctors in the area of contraceptive use did not progress from the results that had been obtained by 1982, and contraceptive sales in pharmacies declined. The third phase, from 1987 to 1992, ended with the National Survey of Demographic Trends (ENADID). Although the results achieved were not as spectacular as those seen up until 1982, the coverage of the Programme did reflect the activities of the health-care professionals involved in the provision of modern contraceptives, the coverage of which increased by some 23% in the period. Finally, in 1995 the National Family Planning Survey (ENPF) showed some slight progress (of 4.36%) in the coverage of modern contraceptives (see chart).

According to the surveys carried out, the most significant change in family planning between 1979 and 1995 was the work done by the public sector in distributing modern contraceptives, with coverage increasing by 153%; in this sector, the coverage of the IMSS grew by 183% and that of the SSA by 103%. The increase in coverage by the private sector was just 2.68%, with the share of pharmacies dropping while that of private doctors rose (see chart). The shape of the family planning programme between 1976 and 1995, in terms of coverage and the type of modern contraceptive methods used, is shown in the table that follows.

PERCENTAGE OF WOMEN USING MODERN CONTRACEPTIVE METHODS AND DISTRIBUTION OF ACTIVE USERS, BY METHOD USED, 1976-1995

	EMF 1976	ENP 1979	END 1982	ENFES 1987	ENADID 1992	ENPF 1995
Use by women in conjugal unions	23.1	32	41.5	44.8	55	57.4
Pills	46.8	38.9	34.1	21.3	17.4	14.7
IUD	24.4	18.9	15.9	22.8	20.2	25.3
Sterilization	11.6	27.7	32.3	42.4	49.3	47.8
Vasectomy	0.8	0.7	0.8	1.8	1.6	1
Injections	7.3	7.9	12.2	6.2	5.8	5.3
Condoms and spermicides	9.1	5.9	4.7	5.5	5.7	5.9

Of the population initiatives undertaken over the 19-year period between 1976 and 1995, the most effective has been the distribution of modern contraceptives by the public and private sectors. The 1977 National Plan for Family Planning, which is the only one to have been approved by the Federal Executive, is still operating and producing results after 20 years. Its contribution to the reduction of fertility and the population growth rate has been very substantial, despite the change it underwent when it passed from being a highly successful programme both nationally and internationally to being one which is now not much spoken of. Even so, the family planning programme is the only one that has not been reinvented and that is still striving to fulfil its original purpose.



Source: J. Martínez, "Cambios en planificación familiar", *Demos. Carta demográfica de México*, No. 10, Mexico City, 1997.

As regards the type of contraceptive method used, the countries of Latin America and the Caribbean are showing a growing incidence of *sterilization*, which is the most widely used method in the world as a whole, and is especially common in developing countries (United Nations, 1997a). One of the reasons that explain this widespread use of sterilization is that it is a highly effective method of contraception, since it fails in less than 1% of cases; another reason is that this appears to be the method preferred by a high proportion of women.[34] Nonetheless, it is an invasive procedure that is difficult to reverse and that, like other surgical operations, carries certain risks (PAHO, 1992, p. 271). Again, we cannot ignore the fact that sterilization has not always been carried out under conditions that guarantee the free exercise of reproductive rights, like timely provision of adequate information about the characteristics of the method; it has even been carried out at the time of childbirth, in circumstances where it cannot be ensured that the woman is fully consenting. For these reasons, the **Latin American**

[34] According to a PAHO study (1992), the reasons put forward by women who prefer sterilization to other methods of contraception are varied. Some consider it the most convenient option because once sterilized they no longer need even consider the risk of pregnancy; others choose sterilization because it is offered to them free of charge and so they do not have to incur additional family planning costs. A third group of women claim they prefer sterilization because it is carried out by mobile units, which means they do not have to travel in search of other methods of contraception. Finally, some of the women who have religious objections against family planning declare that they have opted for sterilization because they feel it is a "onetime sin" (p. 275).

and Caribbean Regional Plan of Action on Population and Development speaks of the need "...to reinforce the advisory mechanisms which inform potential users of sterilization about the existence of other contraceptive methods and about the consequences of opting for a permanent method" (ECLAC, 1996, p. 34).

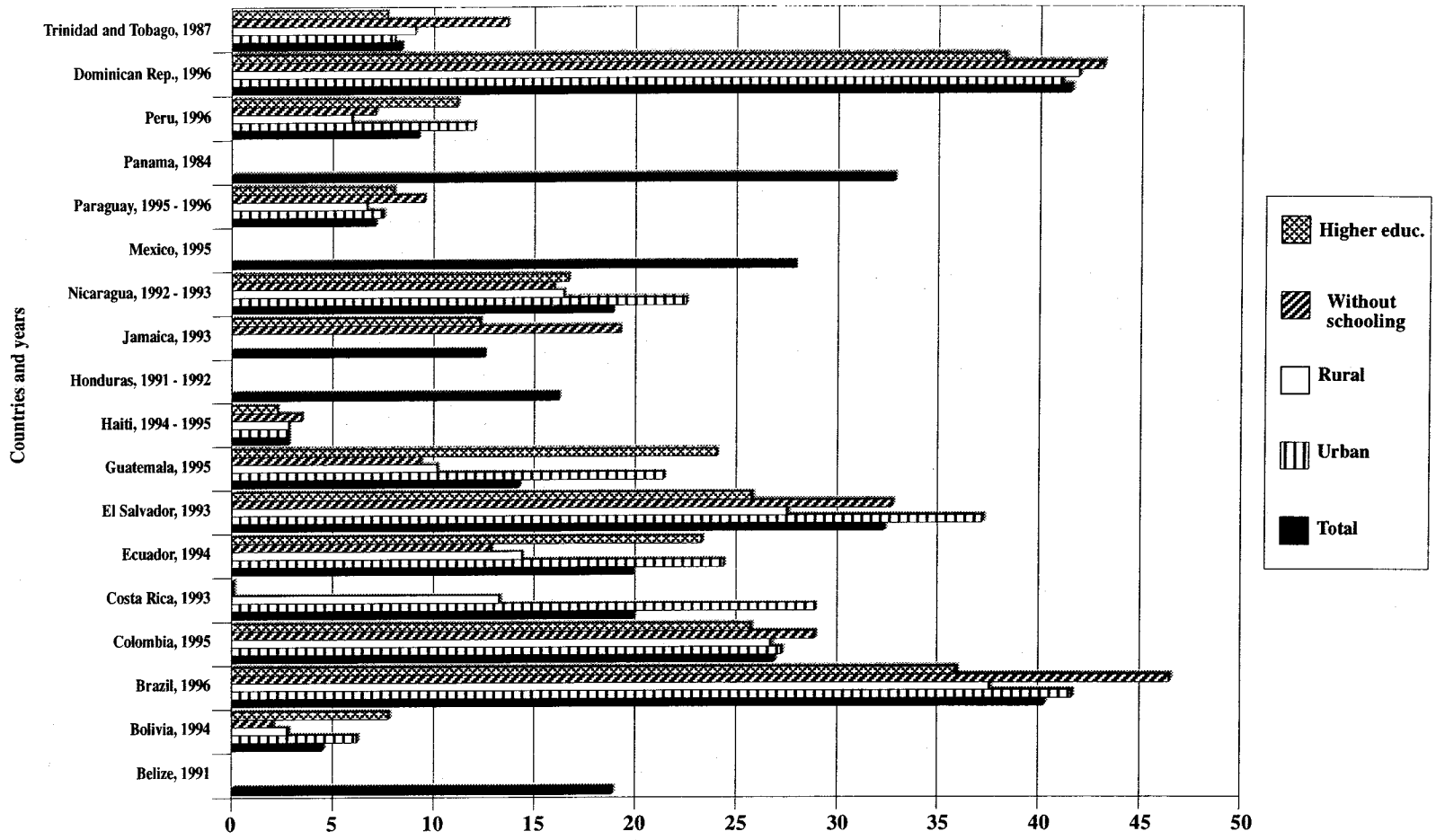
Throughout history, sterilization has had a gender bias, since this contraceptive procedure has been used primarily by women. Although vasectomy has become more widespread in certain countries, in the world as a whole five women are sterilized for every man who has a vasectomy. In Latin America and the Caribbean, with the exception of Puerto Rico, this bias is even more pronounced: the ratio is twenty women sterilized for every man who has a vasectomy (Prada, 1992). A number of case studies carried out in the region have revealed a vast range of male prejudices against and objections to vasectomy. Even though some programmes were promoted in the 1980s, vasectomy is still of only marginal importance as a contraceptive method in the countries of the region. The case of female sterilization is diametrically opposite, as in a number of countries it is the most frequently used method of contraception and the one that has the greatest relative importance out of the whole range of options that exist. Of course, there are differences between the countries: in Haiti, only 3% or so of women in conjugal unions have been sterilized, whereas in Brazil and the Dominican Republic the figure is 40%.

Since the above figures are influenced by the prevalence of current use of modern contraceptives, the proportion of Haitian women who have been sterilized should not surprise us. Nonetheless, examination of the figures for other countries enables us to conclude that the relative importance of sterilization is high both in nations with low fertility and a high prevalence of contraception and in those with high fertility and a low prevalence of contraception. Brazil and the Dominican Republic are examples of the former and Guatemala, El Salvador and Nicaragua of the latter (see figure 31 and table 24 of the appendix). The countries where sterilization plays a less important role are Bolivia, Paraguay and Peru; statistics from the ministries of health suggest that the incidence of sterilization is lower still in Argentina, Chile and Uruguay. It has been claimed that the geographical patterns into which the prevalence of sterilization falls are related to the policies and activities of public and non-governmental organizations; this "institutionalist" hypothesis presupposes the existence of energetic programmes to promote and carry out sterilization[35]. This theory is inadequate, however, because it does not explain why some sterilization programmes, both public and private, achieve their objectives in terms of coverage while others do not. In reality, the factors that lie behind the unequal advance of this contraceptive procedure —making it the "first choice" for a high proportion of women and giving it comparative advantages— are complex and are probably to be sought in the cultural, institutional, political and economic spheres.

[35] Although in many of the region's countries contraceptives are supplied mainly by the private sector, although not always on a commercial basis, female sterilization, except in Colombia and the Dominican Republic, is generally carried out under public sector programmes. Official backing, combined with the lower financial costs of having this carried out, would appear to confer competitive advantages upon sterilization in relation to the other methods of contraception available.

Figure 31

LATIN AMERICA AND THE CARIBBEAN: PREVALENCE OF STERILIZATION AMONG WOMEN IN CONJUGAL UNIONS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

It is a common claim that the practice of sterilization has socio-economic biases, especially since the first government programmes were directed at poor groups with high birth rates that were showing signs of changing their reproductive preferences. Given the characteristics of those populations at which programmes were aimed, doubts arose about the willingness of the women involved to be sterilized. Nonetheless, examination of the current prevalence of sterilization by social group does not reveal any clear trends one way or the other. In a number of countries sterilization is more widespread among women in urban areas and those with a higher level of education, as is illustrated by the data from Bolivia, Ecuador, Guatemala and Peru; in others, this practice is more common among rural women and those without schooling, as is exemplified by the Dominican Republic and Trinidad and Tobago. Finally, the figures for the prevalence of sterilization in Brazil do not differ between areas of residence or between levels of education, and in Colombia greater prevalence in the urban environment is accompanied by a high index among women without schooling.

If the comparison between countries is based on the relative importance of sterilization within the range of modern contraceptive methods available, this heterogeneity is still found, but certain differentiating features are accentuated. It is found that in most of the countries sterilization comes more to the forefront in rural areas, a fact which can be explained by the use of mobile units to service thinly populated areas. Even more striking is the differentiation by level of education, since the share of sterilization becomes preponderant among women without schooling, with proportions that frequently exceed 70% of total contraceptive use; by contrast, it is only in the Dominican Republic that sterilization is found to account for more than 50% of the methods used by women with a high level of education (see figure 32 and table 25 of the appendix). The scenario that emerges from this comparison appears to be consistent with the charge that sterilization has a socio-economic bias, although it also highlights how restricted the range of contraceptive options available to poorer groups is. This restriction reduces the scope for free choice and may entail some undue pressure on women who wish to regulate their fertility; whence the importance of the recommendation in the **Regional Plan of Action** about "...broadening the spectrum of contraceptive options appropriate to individuals' and couples' age, parity and family-size preference, and information about their characteristics and possible side effects, to meet the changing health needs over the life cycle..." (ECLAC, 1996, p. 33). The experience of Brazil illustrates what happens when, for a variety of reasons, forces that weigh in favour of a reduction in the number of offspring are unleashed, and methods of contraception are not widely and readily available.

Box 8

DECLINING FERTILITY IN BRAZIL: A CHANGE THAT WAS NOT EXPRESSLY PLANNED FOR

The rapid decline in fertility in Brazil took place during a period of swift social change that included periods of both economic expansion and recession. The modernization process fostered by the government, which began in the 1950s and picked up speed in the 1960s, changed the geographical focus of economic activity, accelerated the migration from countryside to city, encouraged the development of a consumer society and increased the importance of the communications media, whose influence helped to bring about a change towards attitudes more favourable to smaller family sizes. As a result of these changes, the costs of bringing up children rose and preferred family sizes fall rapidly.

Now, many of the institutional changes introduced during the 1970s, by a military regime that was seeking to modernize the country rapidly, had collateral effects both on the reasons for people to control their fertility and on their ability to do so; in general, these effects intensified social pressure for smaller families. A combination of actions by a number of social agents tended to limit the spread of and access to modern methods of contraception, and consequently the means most widely used to control fertility were abortion and sterilization.

The influence of specific fertility reduction policies has been marginal by comparison with the unplanned effects of a range of public and private initiatives; in fact, the Government of Brazil has never adopted an explicit policy to bring about a reduction in population growth. The case of Brazil provides a number of lessons for anyone carrying out a critical review of research and policies relating to control of the birth rate. On the one hand, it clearly shows that large-scale family planning programmes are not necessarily a prerequisite for a dramatic fall in fertility to take place. On the other hand, it suggests that reductions in fertility that do not have official support or are "based on the market", leading women to use any method available, may have negative repercussions on women's health, due to increasing rates of abortion and sterilization.

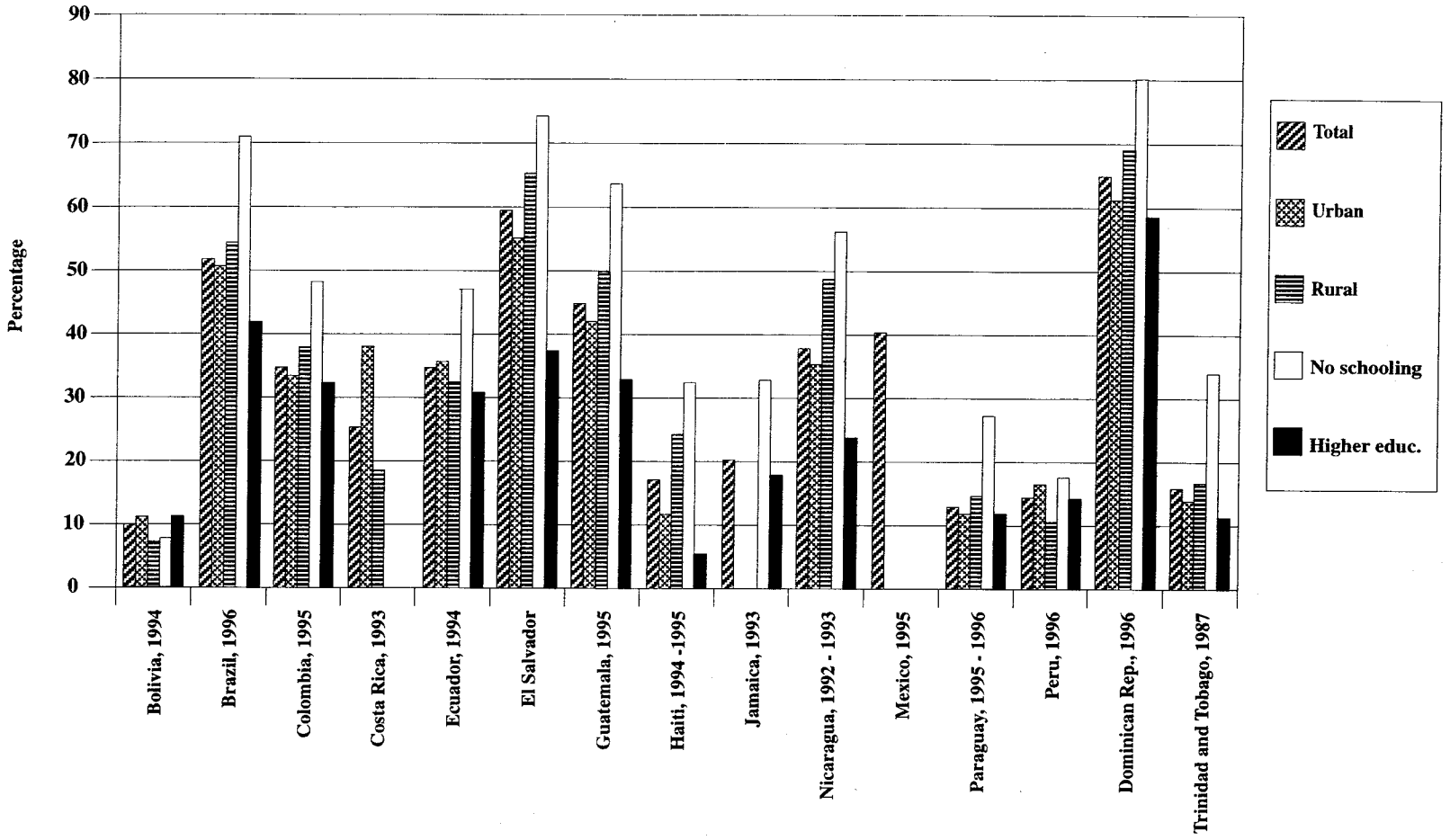
Source: G. Martine, "Brazil's fertility decline, 1965-95: a fresh look at key factors", *Population and Development Review*, vol. 22, No. 1, New York, March 1996.

C. MOTHER AND INFANT HEALTH

Appropriate access to health services, including effective support for women throughout their child-bearing years, is a factor that has a significant influence on reproductive and sexual health. A basic right in this respect is for women to be able to regulate their fertility without thereby exposing themselves to health risks. By regulation of fertility is meant the ability to choose whether or not to be a mother, to have safe pregnancies and childbirths, and to give birth to healthy children. Although they are not studied in this document, preventive care, diagnostics and infertility treatment also enter into the regulation of fertility.

The above considerations highlight how important it is for women to receive appropriate care, from qualified staff and in suitable surroundings, during the periods of pregnancy, birth and puerperium. Given that the effects of such care make themselves felt not only on the health of the woman but also on that of her children during the early stages of life, its quality and availability are vital factors in mother and infant health. With a view to exploring the situation that exists in the countries of Latin America and the Caribbean, this section will look firstly at prenatal monitoring and then at the care women receive at the time of delivery; maternal and infant mortality will be dealt with further on. The subject will be treated in a way that highlights the socio-economic differences revealed by the information from the most recent demographic and health surveys available for various countries in the region.

Figure 32
LATIN AMERICA AND THE CARIBBEAN: USE OF STERILIZATION AS A PERCENTAGE OF ALL CONTRACEPTIVE METHODS EMPLOYED, IN TOTAL AND BY AREA OF RESIDENCE AND TOP AND BOTTOM EDUCATIONAL GROUPS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Box 9

WOMEN'S HEALTH DURING THEIR REPRODUCTIVE YEARS: GENDER EQUITY AND SPECIFICITY

Generally speaking, preventive medicine programmes designed for women have concentrated on prenatal care, with the aim of producing healthy babies and children, and have ignored other important aspects of female health. During the 1950s, in the face of a threatened "demographic explosion", family planning services rose to prominence as a preventive health activity, and attention was focused on women with the objective of reducing the birth rate. Subsequently, in the 1970s, when the importance of mother's milk for the healthy development of children was realized, the interest of the sector turned once again towards women. Initiatives centring upon infant survival in the 1980s were directed at mothers, who were left with the responsibility of implementing strategies to protect the health of children, without mechanisms being put in place at the same time to support and aid them in this task. More recently, AIDS prevention campaigns, which for years ignored the female population, have begun to include women; this new orientation however has manifested itself more in concern about their role as potential transmitters of the disease to unborn children and to their sexual partners than in attention to the health-care needs of the women themselves.

One exception to the instrumentalist treatment thus given by the health-care sector to women is the so-called "safe motherhood" initiative, which came into being at the end of the 1980s with the objective of reducing maternal mortality in developing countries. This movement has fostered health-care programmes directed at women in their own right and has helped to raise awareness of the fact that persistently high levels of maternal mortality reflect the disadvantaged position that women occupy in society. Although this initiative has played a pioneering role in the field of female health care, however, it includes only women who are mothers, and this is not helping to correct the prevalent belief about the central importance of women's reproductive biological role; in fact, the concentration of scientific interest on maternal mortality tends to reinforce the belief that the biological processes involved in procreation represent the most significant risk to the health of women in developing countries, which diverts attention away from other important threats, such as dietary deficiencies; women's double or triple workload (domestic, reproductive and community work); female cancer and other chronic diseases; sexually transmitted diseases; domestic violence; and the inferior conditions in which the majority of women have to operate as regards work and social benefits. The concept of equity, with particular reference to the differences between the two sexes as regards access to and control over medical resources, is based on the notion of "necessity", which means that health services and resources should be distributed not on the basis of criteria of an egalitarian type or of identical quotas for individuals or groups, but on the basis of the particular needs that these individuals or groups actually have. An important manifestation of inequity in respect of health are avoidable cases of sickness, incapacitation and death. To achieve gender equity, the health sector needs to identify and respond to the particular needs and risks that derive both from biological factors peculiar to the female sex and from the situation of social disadvantage in which women as a group are placed in terms of the level of access they have to the resources needed to protect their own and others' health, and of control over these.

Once the problems common to children of both sexes have been overcome, the aim of achieving equity between them in health matters ceases to centre on improving the access of women to the same resources as are provided for the maintenance of the health and quality of life of males; instead, the aim should be to recognize the specific needs, risks and roles of men and women, and on this basis to ensure that programmes of action are designed in a way that is also gender-specific, and investment decisions taken accordingly. Attention needs to be drawn to the way in which the impact of certain causal factors that affect the survival chances and quality of life of adolescents differs by sex: (i) the commencement of sexual activity, which is linked to premature pregnancies, complications during pregnancy and childbirth, abortion and sexually transmitted diseases; (ii) nutritional problems deriving mainly from young women's greater need for iron due to menstruation; (iii) high-risk behaviour patterns related to mental health that affect young people's self-esteem and the process whereby they identify with gender stereotypes. For young women in early adulthood, the enjoyment of health has a particular and close relationship with the exercise of their reproductive rights, i.e. the right to make decisions about their sexuality and about motherhood, and with their right to preserve their life and health in the process of reproducing the species. In terms of the impact that the regulation of fertility has on women's health, the following are risks to the health and the very survival of both

mother and child: (i) very numerous pregnancies, something that is becoming less common among the region's population due to the decline in fertility; (ii) pregnancies at either end of the child-bearing years, since obstetric complications are common for those aged under 18 or over 34 (for girls aged under 15, the likelihood of dying during pregnancy and childbirth is five to seven times higher than it is for women aged between 20 and 24); (iii) pregnancies that are very close together, as these can lead to maternal exhaustion syndrome, due to the fact that the body needs two or three years to recover fully from a pregnancy, prepare itself for the next and suckle the newborn child, without the additional strain of a new pregnancy at either end of the reproductive cycle. This risk is multiplied by the deficiencies in nutrition and services suffered by people who live in poverty; furthermore, the problems caused by these pregnancies go beyond the medical and demographic spheres, since they have repercussions for people's quality of life and their scope for educational and social development.

Source: E. Gómez, "Health and women in Latin America and the Caribbean: old issues and new approaches", Mujer y desarrollo series, No. 17 (LC/L.990), Santiago, Chile, Economic Commission for Latin America and the Caribbean (ECLAC), September 1997, pp. 6 to 21.

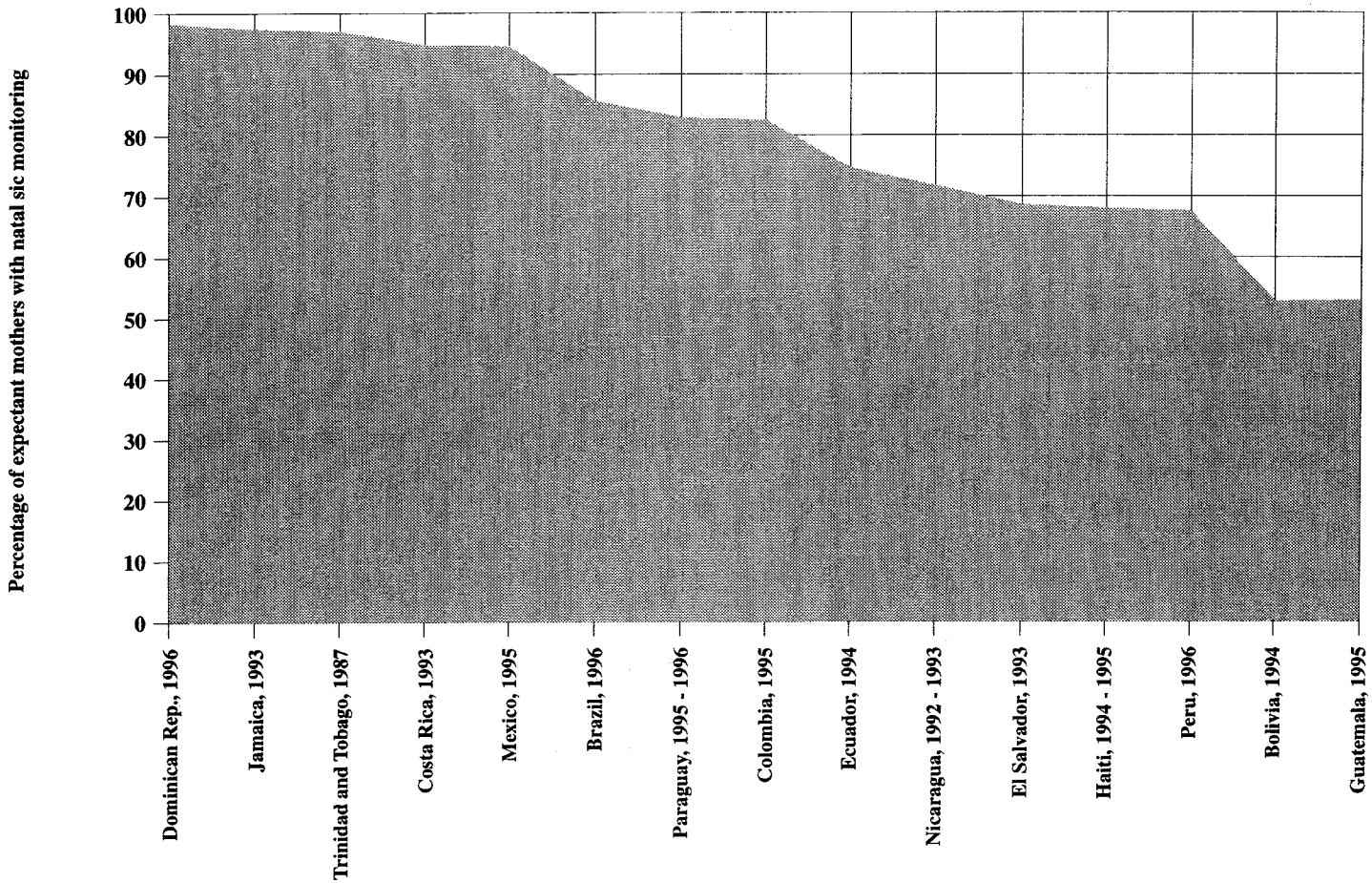
1. Prenatal care

Although reproductive activity does not in itself entail any pathological state, it is recognized that pregnant women are among the groups that are most vulnerable to sickness and death. This vulnerability is derived from the special conditions that arise during pregnancy and childbirth, these being related both to biological processes and to socio-economic factors. The severest effects of these conditions can be mitigated if women have access to health services of an adequate quality. There can be no doubt that timely and regular monitoring of the progress of a pregnancy is not only helpful in ensuring that the care given during childbirth is appropriate, but contributes to reducing the risks associated with maternity and to improving the child's prospects of survival. A number of studies have brought to light the vital role played by prenatal medical care, and by monitoring of women during the entire gestation period, in helping to reduce the risks of sickness and death for both mother and infant, as well as the incidence of premature delivery and perinatal mortality.[36]

Given that timely prenatal care can forestall the consequences of abnormal pregnancies and significantly reduce the number of miscarriages, one of the targets of the third evaluation of the "health for all by the year 2000" strategies is for pregnant women in the Americas region to receive prenatal care from trained staff (PAHO, 1997). The information provided by the demographic and health surveys, which covers births occurring during the five-year period prior to the time these were conducted, shows that the situation of the different countries varies as far as the monitoring of pregnancy is concerned. Although it was found that in eight of the fifteen countries for which comparable information is available prenatal care is provided for more than 80% of pregnant women, in the remaining seven the proportions are below this figure, and in two cases they barely exceed 50% (see figure 33 and table 25 of the appendix). This information shows that great efforts still need to be made in some countries if health services are to attain universal coverage; nonetheless, the fact that this target has virtually been met in others gives cause for hope. Furthermore, as is also the case with other areas of the health sector, another prerequisite for consolidating access to prenatal monitoring services is better education so that people can become involved in looking after their own health. It should be added that in almost all the countries

[36] In a research project using data from the demographic and health survey for the North-East region of Brazil, it was found that the risk of mortality was 48% higher for children born prematurely than it was for children born at term; likewise, it was found that the children of mothers who had more than four prenatal consultations had a 60% higher chance of survival than those whose mothers had less than three consultations (Simões and Leite, 1991).

Figure 33
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF EXPECTANT MOTHERS WITH PRENATAL MONITORING, SELECTED COUNTRIES, AROUND 1995

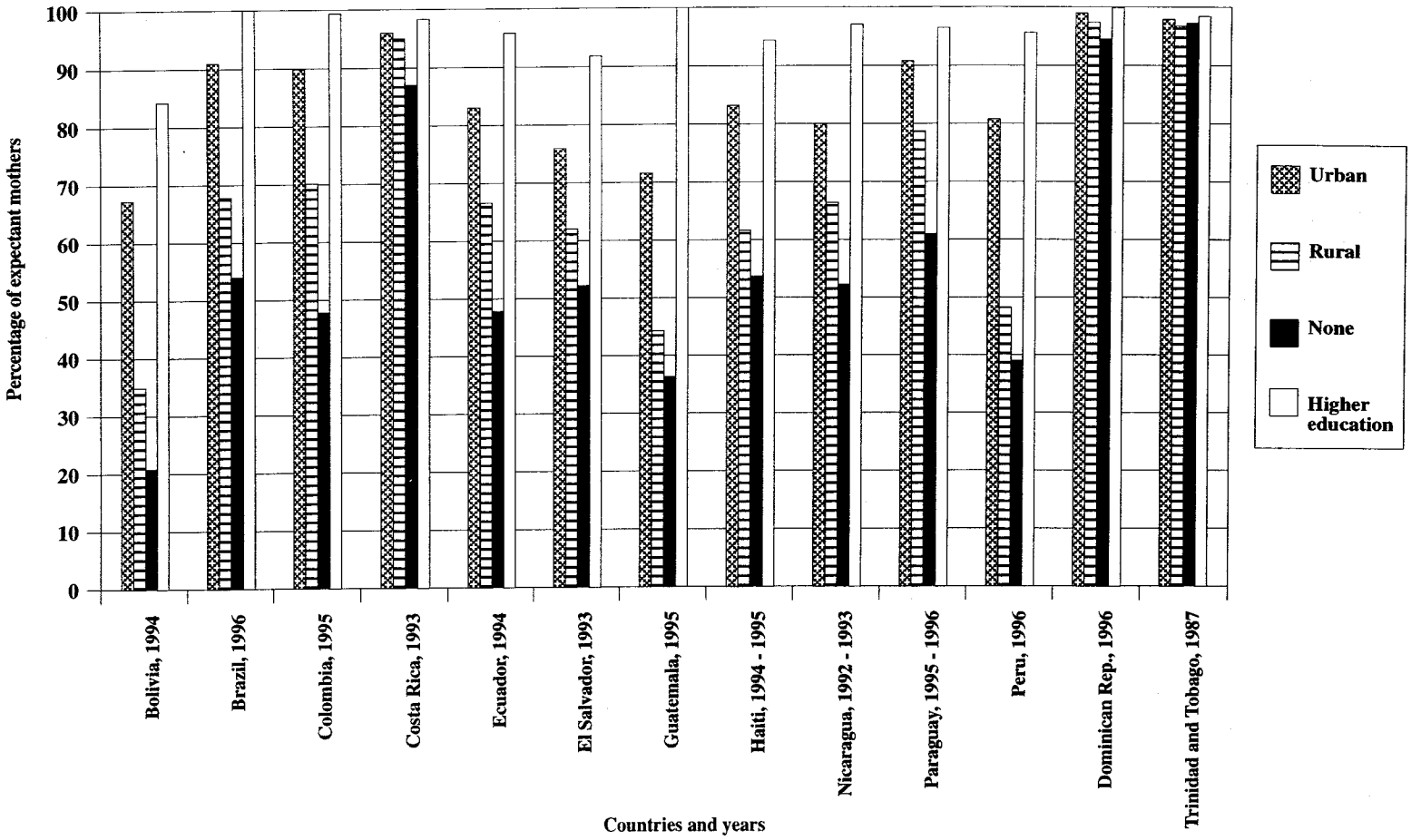


Source: CELADE, on the basis of demographic and health surveys (DHS).

Even more significant than the differences between countries in respect of prenatal care are those found within countries, these being yet another indicator of the repercussions that the marked socio-economic inequality which prevails has on reproductive health. One manifestation of this inequality is found when we compare the situation of women by area of residence (see figure 34 and table 25 of the appendix). With the exception of Trinidad and Tobago, it is found that pregnant women in rural areas in all the countries are in a position of disadvantage in relation to those living in an urban environment. In ten countries, less than 80% of rural women have any monitoring of their pregnancy prior to delivery, and in three countries this proportion is below 50%. The relative gaps between urban and rural areas are fairly marked everywhere, but are widest in Bolivia, Peru and Guatemala. Even in Mexico, which has achieved high coverage with mother and infant services, the proportion of pregnant women without prenatal monitoring in rural areas (13.5%) is more than double that seen in urban areas (5.2%).

Although the differences between town and countryside are flagrant, people's level of schooling is a direct and even more powerful factor in access to prenatal care (see figure 34 and table 25 of the appendix). Although in four countries (Costa Rica, Jamaica, Dominican Republic and Trinidad and Tobago) the absolute differences are small, in a number of other countries they can be enormous. Of particular concern is the low incidence of monitoring among expectant mothers who are illiterate or semi-literate, since these are women who live in adverse socio-economic conditions, and whose higher levels of fertility expose them to much greater risks than those faced by their counterparts with some formal education. In Peru, for example, where almost a third of all pregnancies (32.7%) are not monitored by qualified personnel, the proportion of expectant mothers without prenatal monitoring stands at around two thirds (61.5%) among women without schooling. Even in Colombia, where prenatal care is provided for 83% of expectant mothers, more than half (52.9%) of those who have remained outside the educational system do not receive any care at all; as a sample of the social inequity that exists, in that same country 98% of expectant mothers with higher education have access to at least one monitoring session before delivery. Of course, indigenous groups also show lower indices of access to basic mother and infant health and reproductive health services.

Figure 34
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF EXPECTANT MOTHERS WITH PRENATAL MONITORING, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Box 10

REPRODUCTIVE HEALTH AND ETHNIC GROUPS. FIGURES AND PROSPECTS

The demographic and health surveys carried out in Guatemala (1995), Bolivia (1994) and Trinidad and Tobago (1987) provide an up-to-date picture of reproductive health conditions by ethnic group. The Guatemala survey gives some figures for indigenous groups, the Paraguay survey identifies the language spoken in the home, and the Trinidad and Tobago survey contains information on the situation of Africans and people from the Indian subcontinent in that country.

As was to be expected, the average age at which people have their first sexual relationship is lower among the indigenous groups, this being associated in Guatemala and Paraguay with cultural practices that favour early conjugal union. In Trinidad and Tobago, it is found that first unions are formed earlier in groups of African origin than in those whose roots are in the Indian subcontinent. In general, indigenous peoples know less about methods of contraception than the rest of the population; in Guatemala, only 62% of indigenous women are aware of contraceptive methods whereas among non-indigenous people this figure borders on 90%; the contrast between indigenous and non-indigenous peoples is even more marked where the use of methods of contraception is concerned, since just 7% of indigenous women in conjugal unions use them, while this figure stands at 38% among non-indigenous people. In Trinidad and Tobago, small differences can be detected between African groups and the rest as regards the use of contraceptives (Africans 41%, Indians 47% and mixed race 43%). In Guatemala, 32% of indigenous women in conjugal unions have unmet family planning needs (as against 20% of non-indigenous women). In Paraguay, some 23% of the births to indigenous mothers that occurred during the 5 years prior to the survey were unplanned, while among women from Spanish-speaking homes the figure was 19%.

As regards health care, it is clear that indigenous people are one of the most poorly served groups; in Guatemala only 12% or so of births to indigenous women were attended by a doctor or nurse, by contrast with a figure of 52% for the rest of the population. In Paraguay, the majority of births to indigenous women do not take place in institutions, and 47% of births are attended by a midwife; this contrasts with births to women from Spanish-speaking homes, 86% of which take place in institutions. As regards infant mortality, only the information for Guatemala enables us to distinguish between indigenous and non-indigenous groups (64 per thousand in the former and 53 per thousand in the latter). Finally, again in Guatemala, only 36% of the indigenous population is aware of the existence of AIDS, and this is a worrying figure when it is considered that indigenous people account for a third of the country's population.

By processing the database for Bolivia, it was possible to produce a comparative table which confirms the disadvantaged position of indigenous ethnic groups, and illustrates the differences between them.

BOLIVIA: VARIOUS INDICATORS OF REPRODUCTIVE HEALTH, BY ETHNIC GROUP, 1994

Percentage of women who	Spanish	Aymara	Quechua
had prenatal monitoring by trained personnel	65.3	19.3	34.6
were attended at delivery by trained personnel	62.3	7.7	25.1
had their first child before they were 18	25.4	24.7	22.6
had six or more children	12.9	27.3	28.0
did not want their last child	31.2	52.4	48.1
wanted their last child later	22.0	10.7	13.9
know some modern method of contraception	89.2	33.6	48.8
have at some time used a modern method	29.1	2.3	4.7
currently use a modern method	15.5	1.0	2.6
approve of family planning	84.1	57.9	64.1
have unmet family planning needs	19.5	35.0	34.6

Source: CELADE, on the basis of the 1994 demographic and health survey.

To sum up, it is evident that where the countries of the region are concerned the objective proposed in the **Programme of Action** adopted by the **International Conference on Population and Development** is wholly appropriate: "To ensure that indigenous people receive population- and development-related services that they deem socially, culturally and ecologically appropriate" (United Nations, 1995, p. 28); as is the one set by the **Latin American and Caribbean Regional Plan of Action on Population and Development**: "To give special attention to the situation of indigenous populations and other ethnic groups when considering the spatial impact of development strategies" (ECLAC, 1996, p. 36).

Source: ECLAC, Follow-up report on the Latin American and Caribbean Regional Plan of Action on Population and Development. Note by the Secretariat (LC/G.1905(SES.26/10)), Santiago, Chile, document presented at the Twenty-sixth Session of the Commission, San José, Costa Rica, 15 to 20 April 1996.

Notwithstanding that four periodical check-ups prior to delivery are regarded as the minimum for the health of mothers and children to be properly monitored, mothers without schooling and those living in rural areas, who generally have high birth rates, are rarely given more than one. Furthermore, a high proportion of these expectant mothers have their prenatal check-up at a late stage, between the fourth and sixth or the seventh and final months of pregnancy, which reduces the scope for forestalling risks[37]. Prenatal monitoring is, therefore, less common, sustained and timely among expectant mothers living in rural areas and among those who have no education; in other words, women from the lower socio-economic groups of many countries do not receive appropriate protection during pregnancy. Another fact which emerges from the information available, and which is a cause for concern, is that the proportion of expectant mothers who are not attended during delivery is higher among women whose pregnancies are more prone to complications (those aged under 20 and over 35) and those who have had a large number of children.

2. Care during delivery

The epidemiology of maternal health reveals that complications in pregnancy become more acute around the time of delivery. This makes it essential for births to be attended by trained personnel in hygienic conditions. If medical and hospital resources are not available, and if the care given is of low quality, the prospects for controlling processes that are harmful to the health of the mother and the newborn child are drastically reduced. Naturally, the kind of care that a woman receives during delivery and the likelihood of this being provided by professional staff depend to a very great extent on where childbirth takes place. Both variables are closely associated with the risks of infant mortality. Births that take place in the home are more likely to be attended, if they are attended at all, by amateur midwives, while those that take place in medical establishments are normally attended by people who have medical training. Of course, the place where this care is given is related to the coverage of mother and infant services available to pregnant women.

Out of the fifteen countries for which comparable information is available, it transpires that in seven of them it is more or less the norm for childbirth to be attended by qualified personnel, with trained doctors or nurses being on hand in more than 80% of cases. In the other eight countries the proportions are considerably lower, and in four of these (Bolivia, Ecuador, Guatemala and Haiti) only half of all births or less are thus attended (see figure 35 and table 26 of the appendix). Data from the demographic

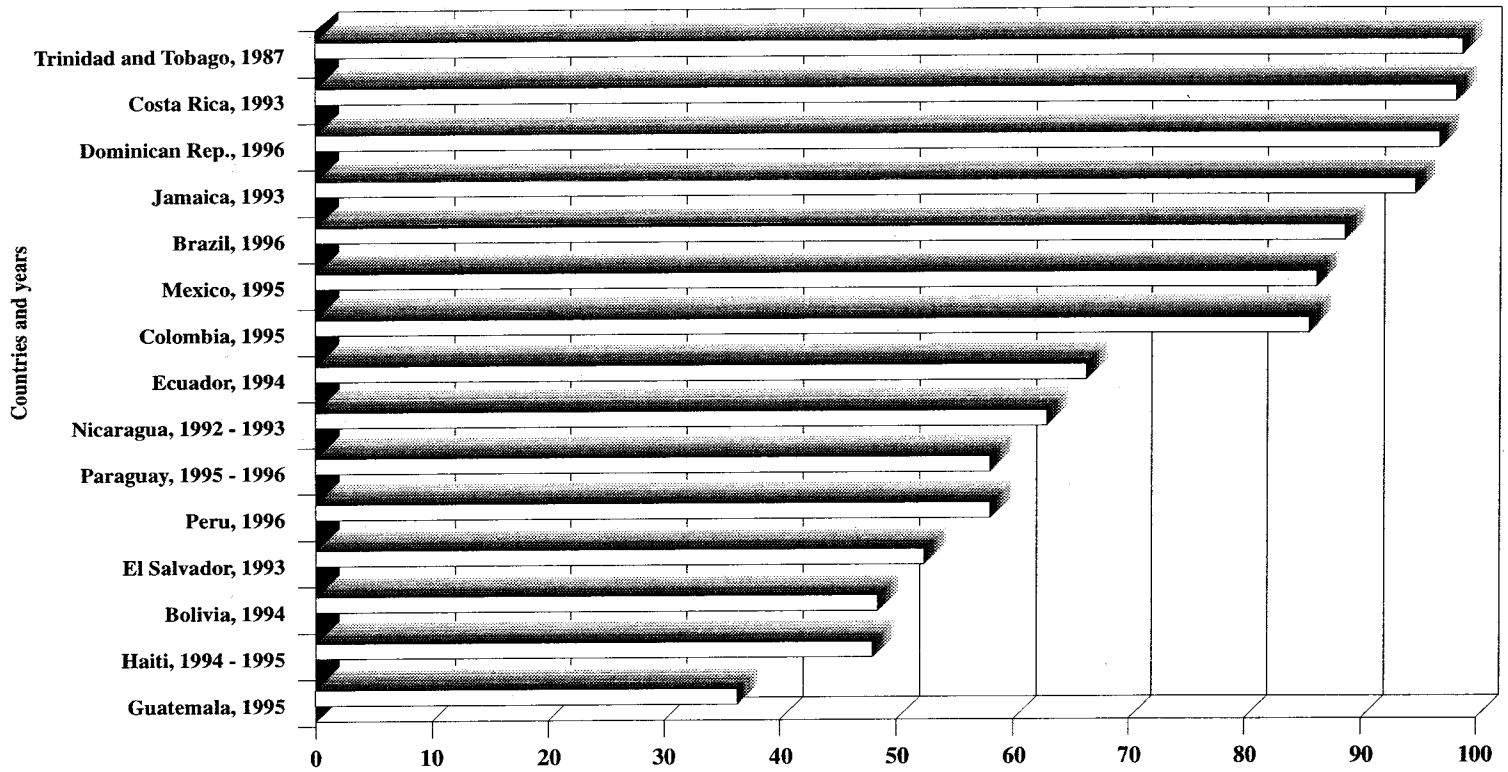
[37] In Nicaragua, for example, only 37% of expectant mothers had any prenatal check-up during the first three months of pregnancy. In Haiti, more than 40% of women have no check-up at all or have it after the sixth month of pregnancy.

and health surveys show that the proportions of births attended by qualified personnel tend to be even lower than the proportion of pregnancies monitored, especially in countries where the coverage of services of both types is lower (Ecuador, El Salvador, Guatemala, Haiti, Nicaragua, Paraguay and Peru). As a result, the aim of providing universal care by trained staff during childbirth is somewhat further from realization than is the objective of universal prenatal monitoring. Given how crucial it is for such care to be available at the time of birth, the lack of it, which reflects the limited availability of medical and hospital resources, may translate directly into health problems and, in extreme cases, death among mothers and infants. In their eagerness to correct shortfalls in coverage, a number of countries have tried to compensate for the lack of traditional institutions by using alternative models, such as homes for mothers where care is provided during childbirth.

Since the place where birth is attended, and whether or not it is attended by qualified personnel, are matters that depend on the accessibility of medical establishments, it is not surprising that in all the countries mothers living in the countryside are found to be less protected (see figures 36 and 37 and table 26 of the appendix). Nonetheless, the discrepancies found between town and countryside as regards the percentage of women receiving appropriate care at the time of childbirth are considerably less pronounced in the countries where services have better coverage (Costa Rica, Jamaica, Dominican Republic and Trinidad and Tobago). The situation is very different in those nations that are affected by large shortcomings in this area, as is illustrated by the case of Bolivia, where barely a fifth (20.9%) of births to rural women take place in hospital establishments, and three out of every four (73.8%) of these births are attended by family members or midwives, or are not attended at all. In Haiti, scarcely one in ten births (9.1%) to rural women are attended by doctors, nurses or health workers; a further two out of those ten births are attended by midwives.

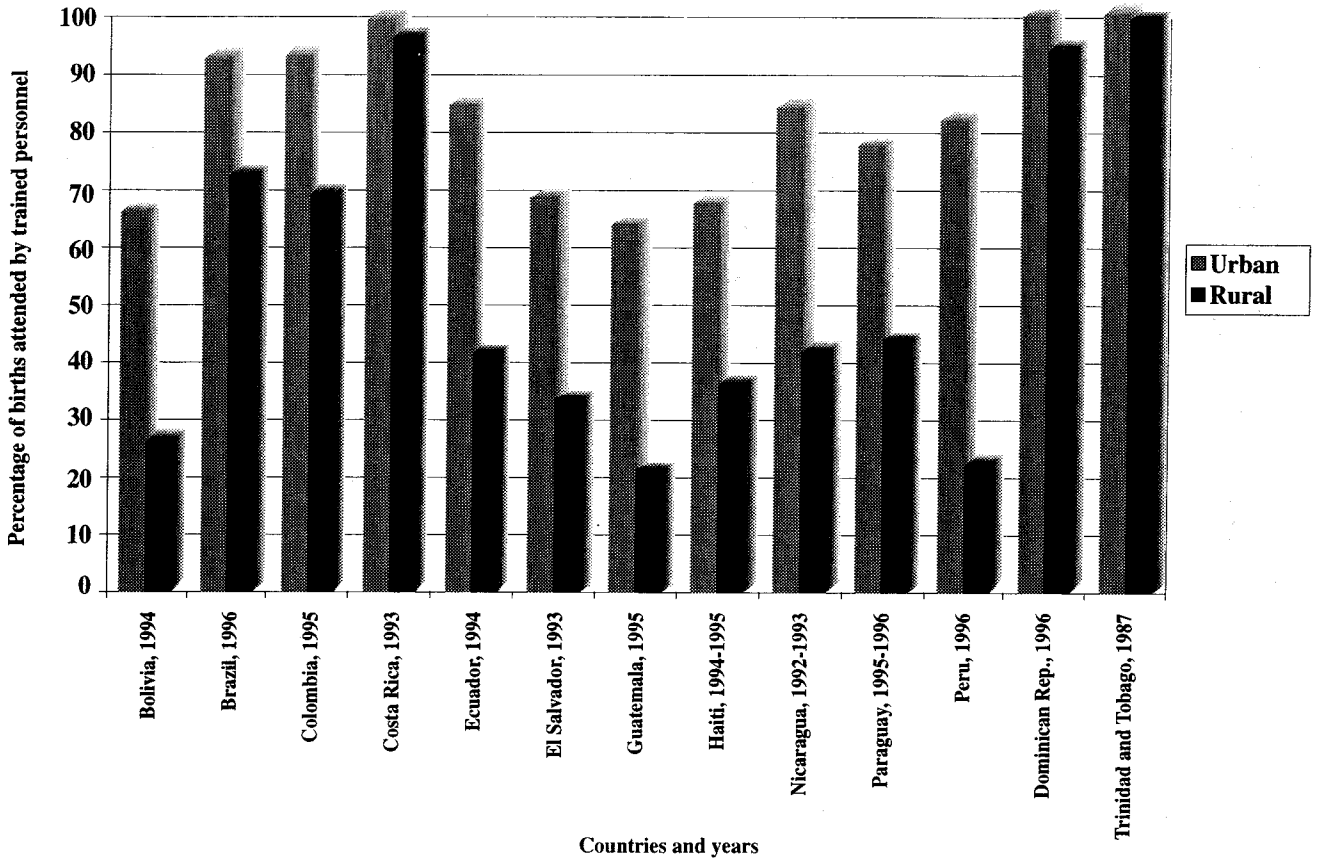
As was mentioned in relation to the monitoring of pregnancies, the likelihood of a childbirth being attended by trained personnel varies directly with the mother's level of education. If we take the top and bottom categories of this variable, we find that the disparity is much greater than that observed between rural and urban areas. The relative differences are small only in the cases of Costa Rica, Jamaica and Trinidad and Tobago. By contrast, in eight countries the percentage of women with higher education who have access to appropriate care at the time of childbirth is more than double the percentage for those who are without schooling. The information available once again demonstrates that the mother's level of education is an important factor in social exclusion. The greatest proportions of births for which no medical attention is available are to illiterate or semi-literate women. Thus, in Guatemala, more than eight out of ten (84.9%) mothers without schooling give birth in a place other than a medical establishment and a similar proportion do not receive care from trained staff during the birth; by contrast, more than nine out of ten (96.7%) mothers with higher education are attended by a doctor or nurse. Again, in Colombia, the greatest contrasts as regards the place where birth takes place are associated with the woman's level of education: almost two thirds (59.5%) of women without schooling give birth at home, by contrast with a bare one in a hundred (0.8%) of those with higher education.

Figure 35
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF BIRTHS ATTENDED BY TRAINED PERSONNEL DURING THE FIVE YEARS PRIOR TO THE SURVEY, SELECTED COUNTRIES, AROUND 1995



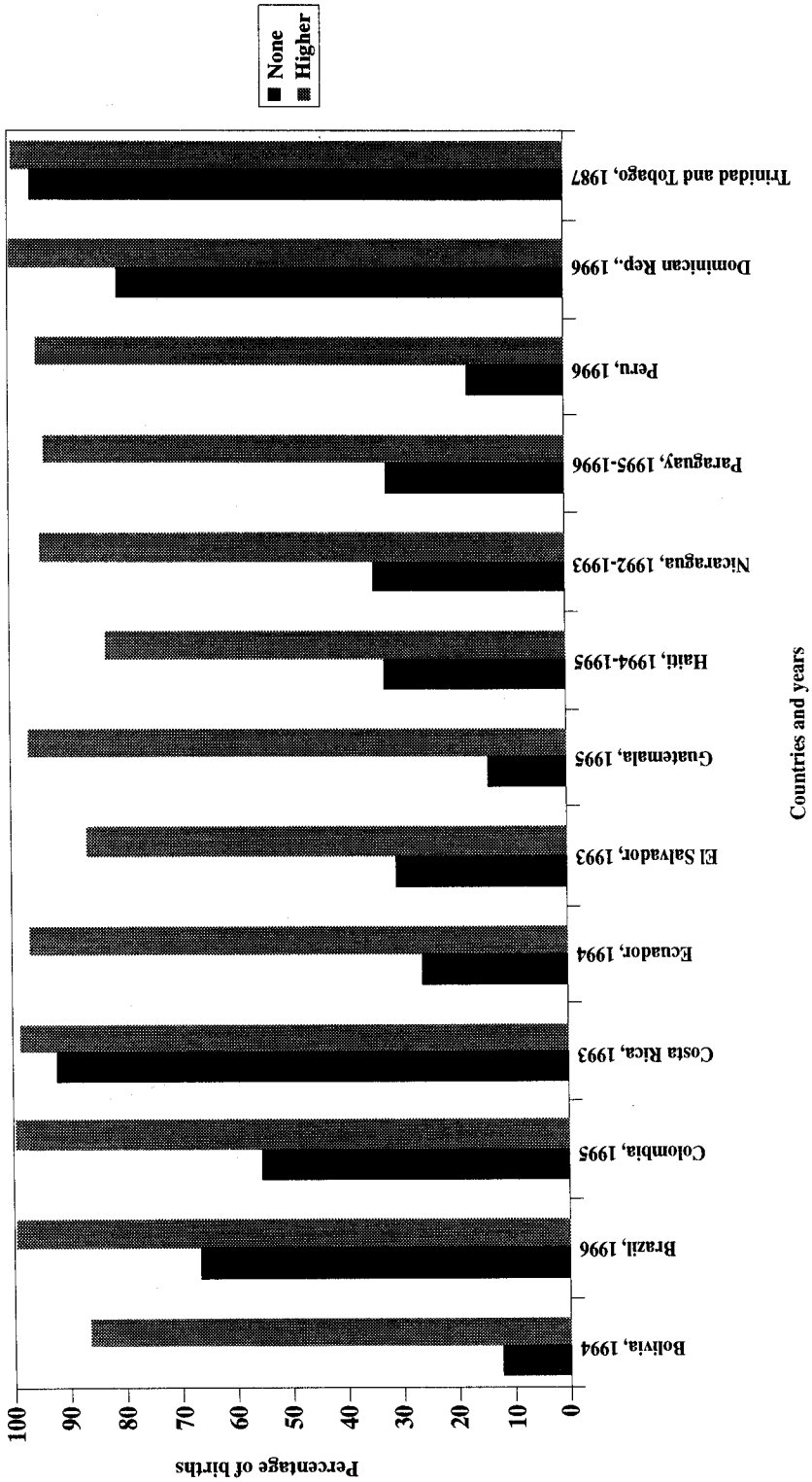
Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 36
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF BIRTHS ATTENDED BY TRAINED PERSONNEL DURING THE FIVE YEARS PRIOR TO THE SURVEY, BY MOTHER'S AREA OF RESIDENCE, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 37
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF BIRTHS ATTENDED BY TRAINED PERSONNEL DURING THE FIVE YEARS PRIOR TO THE SURVEY, BY MOTHER'S LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

3. Maternal mortality

Maternal mortality is a direct expression of the extreme harm suffered by women during their child-bearing years and is a result of problems related to pregnancy, childbirth and puerperium.[38] We know that the great majority of deaths deriving from the risks that these reproductive events entail could be avoided by means of what are generally simple and low cost measures. It may be said in all accuracy that maternal mortality is a social and health problem, since it attains the highest levels when there are restrictions on access to health services in a context of unfavourable social and economic conditions that result in unsatisfactory nutrition and social exclusion. It is also recognized that there are risks inherent in reproductive behaviour such as early or late pregnancies, short intervals between pregnancies, high levels of fertility and unwanted pregnancies, which contribute towards maternal mortality. The main causes of maternal mortality are: eclampsia, haemorrhage during pregnancy and at birth, miscarriage and abortion, puerperal sepsis, hypertension and obstructed delivery.[39]

Given that virtually all the causes of death which account for the current high rate of maternal mortality could be eliminated, one of the targets of the Programme of Action of the World Health Organization is to reduce this by 50% by the year 2000. In 1987, with a view to achieving this target, the international campaign for safe motherhood was initiated, and this has focused attention on the unacceptably high rates of maternal mortality in less developed countries (WHO, 1990). In 1990, to further this campaign, a plan was approved to reduce maternal mortality in the Americas, the aim of this being to reduce the rate by 50% by the year 2000 (PAHO, 1991). Of course, this is one of the objectives of the **Programme of Action** approved by the International Conference on Population and Development.[40] Similar objectives are set by the **Latin American and Caribbean Regional Plan of Action on Population and Development** which aims, among its targets for the year 2000, "to reduce maternal death rates by at least 50% with respect to the 1990 value, and by a further one half by 2015" (ECLAC, 1997, p. 34).[41] This target is the same as one of those established by the third evaluation of the "health for all by the year 2000" strategies within the Americas region (PAHO, 1997).

Given the consensual and sustained character of the campaign to reduce maternal mortality, and the fact that the targets established are quantitative ones, it is very important to understand the extent of this scourge in the countries of Latin America and the Caribbean. The information available, however, is incomplete and untrustworthy, with reliable data on the true magnitude of this problem being notoriously

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[38] Maternal mortality is technically defined as death occasioned by causes related to or aggravated by pregnancy or the maintenance of pregnancy —and not by accidental or incidental causes— and occurring during the period extending from the onset of pregnancy until 42 days after it has ended.

[39] Since sepsis and haemorrhage are not common in gynaecological and obstetric services, it is probable that a large proportion of the deaths reported from these causes are due to complications arising during abortion.

[40] The objective concerned reads as follows: To promote women's health and safe motherhood; to achieve a rapid and substantial reduction in maternal morbidity and mortality and reduce the differences observed between developing and developed countries and within countries. On the basis of a commitment to women's health and well-being, to reduce greatly the number of deaths and morbidity from unsafe abortion" (United Nations, 1995, p. 43).

[41] One of the objectives of the Regional Plan is to "offer access to safe motherhood services, particularly those related to sex education, care during pregnancy, childbirth and puerperium, and family planning. Those services should offer high quality, integral attention, taking into account the sociocultural identity of the users and assigning priority to the most vulnerable population groups" (ECLAC, 1996, p. 33).

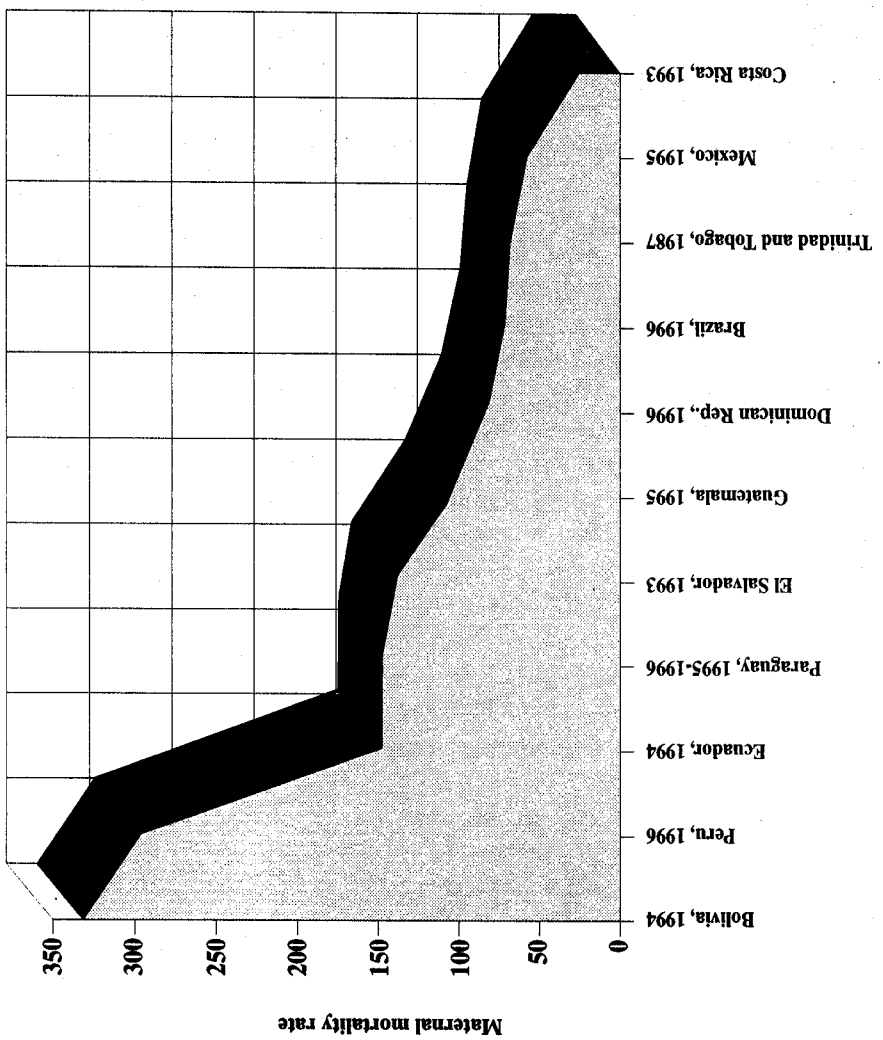
lacking.[42] Many women, especially among those living in rural areas, give birth and die in their homes, and these deaths at home are often not included in vital statistics. In Ecuador for example, data collected by the demographic and health survey conducted in 1994 show that around half of all maternal fatalities occur outside of medical institutions. Most of the maternal fatalities reported take place in hospitals, which means that valid data for the entire population are not available. The difficulties involved in determining the true frequency of maternal deaths are aggravated because the particular shortcomings of mortality records are often compounded by failure to mention the pregnancy when the cause of death is certified (Gómez, 1997).

Of course, for maternal mortality to be reduced it is essential to bring down the rate of maternal morbidity or prevent afflictions from worsening to the point where they bring about the death of the woman. Unfortunately, there is a lack of suitable and comparable information about maternal morbidity among the populations of the region. The importance of having information on maternal morbidity derives both from the direct relationship between this and maternal mortality and from the role that it plays in foetal and neonatal morbidity and mortality. This ignorance about the incidence of maternal fatalities and morbidity may perhaps be one of the reasons why, until a short time ago, the issue was not given due importance in the region. To help fill in this gap, the demographic and health surveys have included questions, about the survival of sisters for example, that serve to produce information which can be used to arrive at approximate estimates by means of direct or indirect procedures. Nonetheless, these estimates are little more than conjectures at present, since the number of maternal fatalities ascertained has generally been low.

Although estimates for maternal mortality are available only for a few countries and cover rather different periods, it would appear that the incidence of this is particularly high in Bolivia and Peru, with between 250 and 400 deaths occurring each year out of every 100,000 births (see figure 38 and table 27 of the appendix). The figure declared for the Dominican Republic, which covers the mid-1980s, is just slightly lower (229 maternal fatalities each year for every 100,000 births). The estimates for Brazil, Ecuador, El Salvador, Guatemala and Paraguay place them in an intermediate situation, with an annual average for these countries of between 150 and 200 maternal fatalities per 100,000 births. Finally, the lowest estimate is for Mexico, since the proportion there appears to stand at 58 maternal fatalities each year for every 100,000 births. A recent report provides figures for maternal mortality in other countries of the region, the highest proportion given being for Haiti (FNUAP, 1997).

[42] In Ecuador, for example, the data from the 1994 demographic and health survey showed a mortality rate (160 mothers for every hundred thousand live births) that was 25% higher than the figure derived from the vital statistics compiled by the National Institute of Statistics and Censuses (INEC). In Guatemala, the maternal mortality rate calculated for the period 1990-1995 using data from the demographic and health survey was 190 mothers per hundred thousand live births, a rate similar to that estimated in 1988 by the Ministry of Public Health and Social Assistance; now, this similarity is due to the fact that the latter assumed under-recording of vital statistics of the order of 44%.

Figure 38
LATIN AMERICA AND THE CARIBBEAN: MATERNAL MORTALITY RATE PER 100,000 BIRTHS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

In the few cases for which a breakdown of maternal mortality data is available, it is clear that this reaches its highest levels among the least protected groups in society. Thus, a recent study carried out in Mexico shows that the highest levels of maternal mortality are consistently found where the degree of marginalization is highest; for example, the maternal mortality rate in the state of Oaxaca is eight times higher than in Nuevo León (CONAPO, 1996). In Bolivia, it has been estimated that during the ten-year period 1984-1994 the maternal mortality rate in rural areas was almost four times what it was in urban areas; these same estimates show that the incidence of maternal mortality in the rural areas of the Altiplano was six times higher than in the plains (INE/Macro International Inc., 1994, p. 125). Again, it has been found that in countries where fertility rates are high but following a downward trend, the mortality rate tends to fall along with the rate of reproduction. This tendency would suggest that the likelihood of a woman dying because of a pregnancy or childbirth during her child-bearing years falls as the number of pregnancies diminishes, even if the obstetric risk remains constant[43]. Obviously, the tendency of the maternal mortality rate to fall will be accentuated as the incidence of pregnancy (and maternity) at the ages of highest risk diminishes. These findings are also consistent with the association between a high rate of maternal mortality and disadvantaged socio-economic conditions, since fertility is consistently higher among poorer groups.

As an approximate indicator of the distribution of the mortality risk during the period between conception and puerperium, the latest demographic and health survey in Bolivia enabled estimates to be arrived at for distribution by the time of death. According to these estimates, 62% of deaths occurred during pregnancy and another 23% at the time of birth. This distribution might suggest that a high proportion of deaths are associated with the practice of abortion and with a lack of care by trained personnel. The information available appears to show that maternal mortality is even more closely related to the coverage of health services than is infant mortality; this contrast enables us to understand why the latter has fallen steadily over recent decades, whereas, according to the estimates arrived at using data from demographic and health surveys, maternal mortality has tended to fall more slowly (Gómez, 1997).

By comparison with infant mortality, "maternal mortality is of rare occurrence, even in countries where rates are as high as in Bolivia", where the figure for the period 1989-1994 amounted to an annual average of 390 maternal fatalities per hundred thousand births (INE/Macro International Inc., 1994, p. 121). On the basis of the information about surviving sisters, the latest demographic and health survey carried out in that country indicated that deaths attributable to causes associated with maternity account for around one quarter (24.3%) of all female deaths after the age of 15. The same source puts the maternal mortality rate for the five-year period 1989-1994 at 59.9 deaths annually per hundred thousand women of child-bearing age; out of the total population of women aged from 15 to 49 estimated for 1995, this rate signifies 1,074 deaths. This scale of mortality represents less than one sixth (15.7%) of all female deaths within that age group in that year. Nonetheless, the fact that the level of maternal mortality is relatively low is no excuse for delay in adopting measures to prevent causes of death which, as the experience of developed countries shows, are avoidable almost in their entirety. A fundamental principle of gender equity constitutes an additional reason for introducing measures of this type.

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[43] According to the demographic and health survey conducted in Paraguay in 1995-1996, although the risk of the mother dying because of any one birth did not fall during the fourteen years prior to this, the maternal mortality rate dropped in line with the rate of reduction in fertility.

Box 11

ABORTION AS A SOCIAL AND HEALTH PROBLEM

A. International agreements relating to abortion

The Programme of Action adopted by the International Conference on Population and Development states that "In no case should abortion be promoted as a method of family planning... Prevention of unwanted pregnancies must always be given the highest priority, and every attempt should be made to eliminate the need for abortion" (United Nations, 1995, p. 44).

The Latin American and Caribbean Consensus on Population and Development says: "Considering that abortion is a major public health issue in the countries of the region and that, while various views are held in this regard, none of them accepts abortion as a method of regulating fertility, generally speaking, it is recommended that Governments devote greater attention to the study and follow-up of this issue, with a view to evaluating how prevalent abortion really is and its impact on the health of women and their families; Governments should also promote universal access to proper guidance on how to prevent unwanted pregnancies" (ECLAC, 1993, p. 12).

The Latin American and Caribbean Regional Plan of Action on Population and Development refers to the need to: "Lower the incidence of abortions and attendant complications by increasing the coverage and quality of family planning, reproductive health and sex education programmes. Provide access to quality services for the management of complications arising from abortion" (ECLAC, 1996, p. 33).

B. Abortion and women's health

Efforts to determine how many deaths are caused by abortion are hampered by under-recording on a greater scale than with other causes of maternal mortality, due to the fact that this procedure is illegal in most of the countries of the Americas. Despite this under-recording, the official figures for abortion show that it is the biggest cause of maternal mortality in nine out of 25 countries analysed, and the second biggest in a further nine. It accounts for more than 30% of all maternal deaths in five countries (Argentina, Costa Rica, Chile, Puerto Rico and Surinam), while the proportion is between 20% and 30% in eight (Colombia, Cuba, Guyana, Jamaica, Nicaragua, Paraguay, Trinidad and Tobago and Venezuela) and is below 20% in Guatemala, Honduras and Uruguay. Apart from being a major cause of maternal mortality, abortion is also linked to severe chronic ailments, sterility and increased risk of death during subsequent pregnancies.

The extent of recourse to abortion and the severity of its consequences vary with women's social class. Less educated women are less likely to be familiar with contraceptive techniques or know how to use them properly, to be covered by health and family planning services, or to have geographic and economic access to contraceptives. Consequently, they are more likely to have unwanted pregnancies and to die as a result of abortions performed under unsanitary conditions by untrained personnel. In contrast, women from the upper socio-economic strata, when confronted by unwanted pregnancies due to failures of contraceptive technology or some other reason, can afford professional services which, though illegal, allow them care under technically better and more hygienic conditions, with less risk of complications. On simple preventive grounds, and aside from any ethical considerations for or against legalization, the undeniable significance of abortion as a public health problem demands a dispassionate, objective study of the factors that are leading an ever-increasing number of women to resort to such a measure, even at the risk of their health and their lives. Abortion represents not so much an option as a lack of options. The urgency of the problem demands, furthermore, that health-care mechanisms be designed and implemented in the near future to put an end to the fatal and crippling consequences that this practice is leading to (Gómez, 1997, pp. 27 and 28).

C. Abortion in Mexico

Estimates of the incidence of abortion in Mexico are unreliable, and the indirect estimates carried out have produced very divergent results. Data from socio-demographic surveys show that in 1987 around 22.7% of women aged between 15 and 49 who had at some time been pregnant had had an abortion or a miscarriage; this proportion fell to 19.8% in 1992 and to 17.8% in 1995. The same source has yielded an estimate of approximately 230 thousand abortions a year for the period 1985-1987, 220 thousand for 1990-1992 and 200 thousand for 1993-1995. Although these figures may be underestimating the magnitude of the situation, they do appear to confirm that there is a downward trend in the incidence of abortion. The average number of abortions per woman's child-bearing life (abortion rate) has dropped even more rapidly in Mexico over the last 20 years than has fertility; while the total fertility rate fell by half between 1976 and 1995 (from 5.64 to 2.81), the abortion rate fell by almost seven eighths over the same period (from 1.16 to 0.15). This decline in abortion has coincided with rapidly increasing use of family planning methods in this period. On the basis of these figures, it can be estimated that in 1995 the approximate number of abortions in the country was 110 thousand (CONAPO, 1996, p. 30).

Sources: For the subject of international agreements relating to abortion: United Nations, Programme of Action adopted at the International Conference on Population and Development, Cairo, 5 to 13 September 1994 (ST/ESA/SER.A/149), Población y desarrollo series, vol. 1, New York, 1995, United Nations Publication, Sales No.: S.95.XIII.7; ECLAC, "Latin American and Caribbean Consensus on Population and Development" in Final Report of the Latin American and Caribbean Regional Conference on Population and Development (Mexico City, 29 April to 4 May 1993) (LC/G.1762(Conf.83/4); LC/DEM/G.134), Santiago, Chile, 1993; ECLAC Follow-up Report on the Latin American and Caribbean Regional Plan of Action on Population and Development. Note by the Secretariat (LC/G.1905(SES.26/10)), Santiago, Chile, document presented at the Twenty-sixth Session of the Commission, San José, Costa Rica, 15 to 20 April 1996. For the subject of abortion and women's health: E. Gómez, "Health and women in Latin America and the Caribbean: old issues and new approaches", Mujer y desarrollo series, No. 17 (LC/L.990), Santiago, Chile, Economic Commission for Latin America and the Caribbean (ECLAC), September 1997. For the subject of abortion in Mexico: CONAPO (National Population Council) "Indicadores básicos de salud reproductiva y planificación familiar", Mexico City, 1996.

4. Infant mortality

Mortality during the first year of life has, throughout history, aroused the concern of governments, civil societies, families and individuals. The persistence of this concern, which is motivated by the desire to preserve life, is due to the fact that the mortality rate tends to be especially high in the first months of individual existence, since in this period human beings are highly dependent and are particularly exposed to biological and social risks of various kinds. This vulnerability in early childhood is especially acute in situations where the degree of economic and social development is low; by contrast, advances in medicine and health care and improvements in the material conditions of life are associated with drastic reductions in infant mortality. Because of its sensitivity, infant mortality has been widely used as an indicator of social progress; this practice, however, has been questioned, since experience has also shown that it is possible to contain such mortality by means of specific health programmes, which are not always accompanied by other advances of the kind that genuine socio-economic development entails. Even so, it is clear that infant mortality is a traumatic event that is sufficiently widespread to have become an issue of the highest importance for health policies, especially in developing countries. Reflecting the pre-eminence of the issue, the **Latin American and Caribbean Regional Plan of Action on Population and Development** recommends "giving priority to child care, reinforcing prevention and primary health care services" (ECLAC, 1996, p. 33).

For the five-year period 1995-2000 the infant mortality rate for the world as a whole is put at 57 per thousand live births. Behind this average lies a stark contrast between developed regions, where this indicator is as low as 9 per thousand, and developing regions, which have an average of 63 per thousand, with the rate exceeding 100 per thousand in certain countries (United Nations, 1995). With few exceptions, infant mortality in Latin America and the Caribbean stood at very high levels until the beginning of the 1970s, even though low-cost medical procedures and technologies capable of preventing a substantial proportion of deaths among infants in their first year were already known. As special programmes have been designed and resources allocated to implement these, advances in the field of health and nutrition have contributed to a substantial decline in infant mortality in all the countries of the region over the last two decades. This decline, which has been facilitated in part by the fall in the number of high-risk births —i.e., those to very young women or to women in the final stages of their fertile life, and those that are very close together in time— combined with further advances in the process known as the epidemiological transition, has led in several countries to infant mortality rates losing prominence in society and ceasing to be the almost exclusive focus of health policies. Nonetheless, mortality rates remain stubbornly high in certain countries and in certain regions within countries, and this cannot pass unnoticed.

Although declining infant mortality has been a common characteristic of the countries in the region over recent decades, differing rates of decline have given rise to a scenario that is perhaps more heterogeneous than in the past. Broadly speaking, with the situation as it stands in the second half of the 1990s, the countries can be divided into four groups. In the first group are those that have achieved the greatest advances in reducing infant mortality, with rates now below 15 per thousand (Barbados, Chile, Costa Rica, Cuba, Guadeloupe, Jamaica, Martinique, Puerto Rico and other countries in the Caribbean). These are followed by other nations that have also made substantial progress, with infant mortality levels now ranging from 15 to 30 per thousand (Argentina, Bahamas, Belize, Dutch West Indies, Panama, Surinam, Trinidad and Tobago, Uruguay and Venezuela). A third set consists of countries that have recently succeeded in speeding up the decline in infant mortality, with rates ranging from 30 per thousand to 60 per thousand (Brazil, Colombia, Ecuador, El Salvador, Guatemala, Guyana, Honduras, Mexico, Nicaragua, Paraguay and Peru). Finally, Bolivia and Haiti, which had extremely high rates of infant mortality up until the beginning of the 1980s, have achieved levels of between 60 and 80 per thousand.

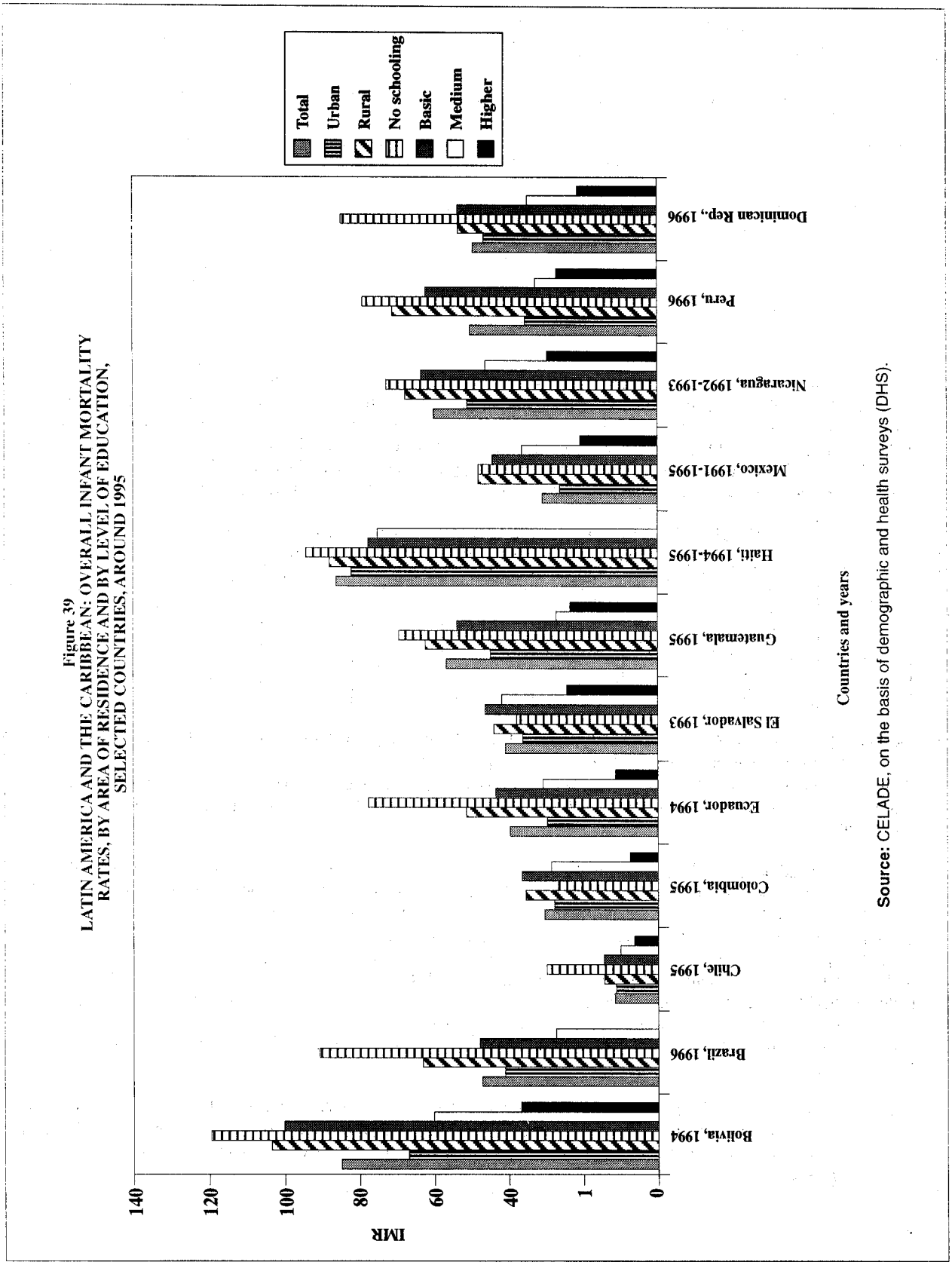
A study carried out in three of the countries that have made the most progress in controlling infant mortality in the region (Chile, Costa Rica and Cuba) identifies certain factors that, operating in conjunction, appear to have contributed to hastening the process of decline. The first factor is the political will to set in train, and the perseverance to continue with, infant health programmes that include primary care components with wide coverage nationally and initiatives directed especially at the most vulnerable sectors of the population. The second factor is consolidation of mother and infant health strategies, with a strong emphasis on monitoring and tracking individuals and applying preventive medicine measures. A third factor, which is peculiar to the area of reproductive health, is that these programmes and strategies were applied within the context of a steady decline in fertility and in the number of high-risk births. Finally, the whole process of reducing infant mortality has taken place in a context of rising educational levels among the population at large, increasingly widespread knowledge about how people can protect and safeguard their own health, substantial improvements in the coverage of environmental sanitation services and enhanced communications and transport networks (CELADE/IDB, 1996).

Looking beyond national averages, it has been demonstrated by numerous research projects based on information collected through censuses and surveys conducted from the 1970s onwards that there are enormous social and spatial inequalities in the distribution of infant mortality (Behm, 1992). It has been possible to show that, in some cases, these inequalities are as large as or larger than those found between the countries of the region. All the data consistently demonstrate that it is in the social and ethnic groups that are most disadvantaged in terms of their ability to meet their basic needs that the highest levels of mortality among children less than one year old are experienced. Although the disparities between different social groups tend, when expressed in absolute terms, to be smaller in nations that have made the most progress in controlling this kind of mortality, the relative differences are still of considerable importance (see figure 39 and table 28 of the appendix). For example, although it is true that the national rates found in Cuba and Chile are fairly similar, and are among the lowest in the region, the variations that occur around the average values are different. Given that social inequities in Cuba are fairly small, it comes as no surprise to find that there are only minimal differences between mortality rates in different sectors of the population. In Chile, on the other hand, the differences are more marked and are manifested in persistent pockets of high infant mortality, exemplified by a rate in rural areas that is 23% higher than that calculated for urban areas. Again, the differences that are discerned in some countries with a high level of infant mortality can be small; in others, again, social inequities leave a stronger mark. In Haiti, the rates are high everywhere, regardless of the level of education possessed by mothers; in countries with moderately high mortality, such as Ecuador and the Dominican Republic, the disparities are acute and reveal that reductions in infant mortality have broadly followed the lines of social stratification.

A distinctive manifestation of inequity, which has begun to emerge in recent studies, is found in the urban environment, especially in the large cities of Latin America and the Caribbean, where a large proportion of the region's population resides.[44] Studies show that there is a significant degree of socio-spatial heterogeneity within cities, which is consistent with the social inequities seen at the national level. These disparities are reflected in highly variable rates of infant mortality and have become a real challenge for health policies, including those pertaining to reproductive health. Certain spaces within cities, with quite clearly defined boundaries, house concentrations of population living in poverty and, consequently, of risk factors for children that could be dealt with by direct measures.

[44] For example, in 1995 there were 141 million people living in the 42 cities of Latin America and the Caribbean that had more than a million inhabitants; in other words, the inhabitants of these cities outnumbered the total rural population of the region by some 15%.

Figure 39
LATIN AMERICA AND THE CARIBBEAN: OVERALL INFANT MORTALITY RATES, BY AREA OF RESIDENCE AND BY LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Box 12

INFANT MORTALITY AND SOCIAL SEGMENTATION IN THE URBAN SPACE

Socio-economic differences between the different administrative units that make up large cities are reflected in demographic indicators and, with particular clarity, in the indices of infant mortality. These differences have long existed in the countries and metropolises of the region; for example, in 1950 the infant mortality rate in the Federal District of Mexico City was 40% lower than it was in poorer urban municipalities like Tultitlán and Nezahualcoyotl. These disparities still persist, although the indices of infant mortality in all social groups living in cities have fallen, and in a number of cities geographical differences have increased due to the growing territorial polarization of social strata. According to a survey conducted at the beginning of the 1990s, in Lima the infant mortality rate in the period 1986-1990 ranged from 18 per thousand live births among mothers with higher education to 73 per thousand among those with uncompleted basic education or less. In Santiago in Chile, the infant mortality rate in the commune where the highest income groups live (Vitacura) stood at 5.8 per thousand in 1995, while in the commune with the highest indices of poverty (La Pintana) it was 13.5 per thousand.

Perhaps one of the cases that has been studied most is that of the central municipality of Sao Paulo. At the beginning of the 1990s, areas in which less than 30% of the population was poor had an infant mortality rate of around 20 per thousand, while in areas where more than 50% of the population was poor the rates recorded were over 60 per thousand. A project that divided all the districts and sub-districts of the municipality of Sao Paulo into four categories showed that the disparities in mortality rates among children aged under 5 were attributable to the higher risk of mortality from preventable causes of death (respiratory illnesses and infections) faced in poor areas (see the table below).

MORTALITY RATES BY SPECIFIC CAUSE (/10,000) AND BY AREAS FOR THE 0-4 AGE GROUP, MUNICIPALITY OF SÃO PAULO, 1992

		Circulatory causes		Respiratory causes		Infectious causes		External causes	
Areas [a]	Population	Deaths	Rates	Deaths	Rates	Deaths	Rates	Deaths	Rates
1	463125	37	0.80	693	14.96	405	8.74	110	2.38
2	310246	29	0.93	258	8.32	110	3.55	51	1.64
3	116492	8	0.69	102	8.76	56	4.81	12	1.03
4	87059	5	0.57	34	3.91	14	1.61	18	2.07

Source: M. Akerman, P. Campanario and P. Borlina Maia, "Saúde e meio ambiente: análise de diferenciais intra-urbanos", *Revista de saúde pública*, vol. 30, No. 4, São Paulo, 1996, p. 376.

[a] The areas are ranked in such a way that number 1 represents the poorest (basically districts and sub-districts on the outskirts of the Municipality of São Paulo) and 4 the richest (basically districts and sub-districts in the centre of the Municipality of SãoPaulo).

It should be emphasized that the higher infant mortality rate in the poorer sectors of the region's cities is due to a whole range of factors. Of course, the level of household income has a direct influence due to the consequences it entails for nutrition, access to regular and rigorous health checks, and the treatment options available for various kinds of diseases. The distribution of health sector resources also has an influence, as there tend to be few of these available for the needs existing in poor areas. Finally, environmental factors in the home, such as the availability of basic sanitation services, and in the vicinity, such as contamination from waste or in the atmosphere, also tend to contribute to the greater risks posed to children's health in the poorer areas of cities. As may be deduced from this account, strategies for reducing inequities in infant mortality within cities need to be many-faceted and operate simultaneously on families (income level, health education), local areas (basic services and harmful environmental situations) and the health sector (territorial and social focusing of resources).

Sources: M. Akerman, P. Campanario and P. Borlina Maia, "Saúde e meio ambiente: análise de diferenciais intra-urbanos", *Revista de saúde pública*, vol. 30, No. 4, Sao Pãulo, 1996; J. Rodríguez and M. Villa, "Dinámica sociodemográfica de las metrópolis latinoamericanas durante la segunda mitad del siglo XX", *Notas de población*, No. 65, June 1997 (at press).

D. A SERIOUS SEXUAL HEALTH PROBLEM: THE AIDS/HIV EPIDEMIC

Sexually transmitted diseases are one of the fundamental issues of reproductive health, mainly due to the risks they entail both for the exercise of sexuality and procreation and for people's ability to lead their lives in a good state of health. It is well known that if these diseases are not diagnosed and treated quickly and effectively, they can have serious effects, including infertility in men; their impact on the health of women, who are more vulnerable than men to diseases of this type, is even more serious, since they are associated with complications during pregnancy, miscarriages, infertility, cervical cancer and congenital infections. Although information about the incidence of sexually transmitted diseases in the countries of the region is fragmentary and often not comparable, the World Health Organization estimates that in the middle of the 1990s some 36 million people were affected by them (FNUAP, 1997b). This figure is worrying, since it represents 7.5% of the region's total population.

Traditionally, sexually transmitted diseases were regarded as being of relatively minor importance in the field of health; however, the exponential growth in the number of people infected with the human immunodeficiency virus (HIV) —and the direct link between this and the onset of acquired immunodeficiency syndrome (AIDS), a systemic and highly lethal affliction for which there is no effective treatment— has alerted the public to the need to safeguard their sexual health and to the dangers of irresponsible sexual behaviour. There is known to be a synergistic relationship between sexually transmitted diseases and HIV infection. Sexual promiscuity by men and women and initiation of sexual relations at an early age, without the necessary safeguards, are risk factors commonly associated with AIDS/HIV infection, to which may be added blood transfusions without proper controls, the reuse of hypodermic syringes, and perinatal transmission. In a report on the situation around the world from the origins of the pandemic up until the end of 1993, the World Health Organization calculated that around 14 million adults had been infected with HIV; of that total, 1.5 million were to be found in Latin America and the Caribbean (WHO, 1994). Using data from various sources, it is estimated that in 1997 the total number of people in the region who were seropositive was around 2 million (FNUAP, 1997b). Although the epidemic has spread through the whole region, its incidence appears to be highest in the Caribbean, Central America and Brazil (Gómez, 1997).[45] The consequences of this epidemic for the demographic situation of the countries in the region have not been examined in detail,[46] it is clear however that its immediate effects are being felt in the form of mortality among adults, particularly in the younger age groups, and of course in the orphaning of children whose mothers have died from AIDS (United Nations, 1995).

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[45] In Haiti the first manifestations of AIDS date from the end of the 1970s, since when this has become one of the most serious public health problems in the country. According to a survey on the knowledge, attitudes and practices of young people in relation to AIDS carried out by the Haitian Institute for Childhood (IHE) in 1995, the rate of HIV infection among the sexually active population in the towns is estimated at between 7% and 10%, and in the countryside at between 3% and 5% (IHE, 1995).

[46] A recent study, however, estimates that fatalities from AIDS in Latin America will reach 217 thousand in the year 2005, which would mean deaths attributable to AIDS rising from 3.3% of the total in 1995 to 6.2% in 2005 (Bongaarts, 1996, p. 35).

Box 13
AIDS: TRENDS AND PROSPECTS

If there is controversy over estimates of the numbers infected by and suffering from human immunodeficiency virus (HIV), due to the fact that in many regions of the world there is no systematic recording of those infected, the uncertainty about the trend in infection by acquired immunodeficiency syndrome (AIDS) is much greater. A review of recent studies shows that, for sub-Saharan Africa, the projections for annual AIDS deaths in the first five years of the next century range from 1 million to 2.2 million. Whatever may be the case, one generalization can be made about the general course of AIDS mortality over the coming decades: the number of deaths caused by this disease will continue to rise rapidly in Asia, Africa and Latin America, while the rate of growth in the number of people infected will remain positive in all these regions, and will even remain high in certain areas within them.

Now, the future course of the epidemic will basically depend on three factors: (i) the way people infected respond in their behaviour; (ii) the determination with which public health measures are taken to reduce transmission of the virus; and (iii) whether new medical technology can be successfully developed. In the worst case scenario, with a lack of progress in all three areas, the epidemic will continue to expand towards all vulnerable groups (i.e., those in which the rate of reproduction of the infection *R* —which represents the average number of infections caused by an infected individual over his or her lifetime— is 1 or over), and the frequency of HIV in the developing world will reach levels much higher than those seen at present. This scenario can be combated to a great extent by putting in place vigorous public health measures, such as control of sexually transmitted diseases and checking of donated blood, and by acting determinedly to change people's sexual behaviour, seeking to make it less risky. Initiatives of this kind have proved successful in cases such as Thailand and among high-risk groups in the United States.

Thanks to the efforts made to find therapies that are effective against HIV, substantial progress has been made, and in particular the average life expectancy of patients with the disease has increased significantly, but there is still no treatment that can guarantee a cure. If one were found, this could be the end of the epidemic, but the possibility that any such treatment would be very expensive means that it could be out of the reach of poorer segments of the population in Africa, Asia and Latin America; thus, AIDS could become to an even greater extent a disease of the third world.

Source: J. Bongaarts, "Global trends in AIDS mortality", *Population and Development Review*, vol. 22, No. 1, New York, March 1996.

Although in its initial stages AIDS/HIV mainly affected men, as time has passed the male-female ratio has fallen rapidly, particularly among young people. The rapid increase in AIDS transmission among women is linked to the higher susceptibility of the female organ to infection by exposure, due to biological factors; this susceptibility is particularly high in the case of young women. "In social terms, as previously noted, the power imbalance that is determined by gender and shaped by social status, age and culture, prevents a large number of women from protecting themselves against the sexual transmission of AIDS, whether it be by avoiding intercourse with infected males or insisting on mutual fidelity and on the use of a condom by their partners" (Gómez, 1997, p. 30). In recent studies it has been noted that although it is most common for AIDS/HIV to be transmitted sexually, with heterosexual activity featuring ever more prominently, it can be transmitted from mothers to children by breast-feeding. Over and above demographic considerations, the economic and social repercussions of AIDS/HIV are very substantial, manifesting themselves in the loss of people at productive ages, the stigmatization and virtual isolation of carriers, heavy demands on the resources of families, who have to meet the high costs of medical treatment, and the establishment of costly special programmes, requiring specialist personnel and suitable equipment, by the public health sector.

Reflecting the concern of governments from countries in every region of the world, several chapters of the **Programme of Action** adopted by the International Conference on Population and Development refer to AIDS/HIV. One of the sections in the chapter on reproductive rights and reproductive health deals with sexually transmitted diseases and with methods of preventing infection by the human immunodeficiency virus (HIV); its sole objective is "to prevent, reduce the incidence of, and provide treatment for, sexually transmitted diseases, including HIV/AIDS, and the complications of sexually transmitted diseases such as infertility, with special attention to girls and women" (United Nations, 1995a, p. 35). It is insisted that these diseases need to be included in reproductive health programmes, in particular at the primary health care level: "Information, education and counselling for responsible sexual behaviour and effective prevention of sexually transmitted diseases, including HIV, should become integral components of all reproductive and sexual health services" (United Nations, 1995a, p. 35). Likewise, in the chapter on health, morbidity and mortality of the **Programme of Action** there is a section on AIDS/HIV that speaks of the need: "to prevent, reduce the spread of and minimize the impact of HIV infection; to increase awareness of the disastrous consequences of HIV infection and AIDS and associated fatal diseases, at the individual, community and national levels, and of the ways of preventing it; to address the social, economic, gender and racial inequities that increase vulnerability to the disease" (United Nations, 1995a, p. 44).

In accordance with the above, the **Latin American and Caribbean Consensus on Population and Development** maintains: "Bearing in mind that acquired immunodeficiency syndrome (AIDS) is a source of growing concern in the countries of the region and that existing projections suggest a significant increase in its incidence in the coming years, and considering also that this syndrome is related to sexual and reproductive behaviour, Governments are urged to incorporate measures into reproductive health, population education and family planning programmes as a matter of priority with the aim of preventing its spread and ensuring that patients receive adequate medical care and non-discriminatory treatment" (p. 15). Likewise, in its recommendations, the **Latin American and Caribbean Regional Plan on Population and Development** speaks of the need to: "Incorporate into reproductive health care services, population education and family planning programmes, measures which will help prevent sexually transmitted diseases and HIV/AIDS; and to ensure adequate medical attention and non-discriminatory treatment for the ill. To study the impact of the increase of HIV/AIDS and of the measures for combating it on death rates and the sexual and reproductive behaviour of the population" (ECLAC, 1996, p. 33).

Among the major challenges faced by reproductive health programmes in the region are a lack of knowledge about the complications and sequels of AIDS/HIV and the opposition of certain social agents to the provision of full information about ways of preventing it. The demographic and health surveys provide information about the current state of knowledge on this matter in seven countries. Of course, this information is sufficient only for a tentative exploration, and does not provide a sufficient basis for really representative conclusions to be obtained. The first aspect is the perception that people have of AIDS; given the way in which the question dealing with this is formulated, however, some responses could reflect only the most elementary level of knowledge: the person has merely heard of this disease, which does not imply any awareness of how it is contracted or how it can be prevented.[47] Even so, the lack of "awareness" could reveal an absolute ignorance of the matter. The results obtained vary between the countries (see figure 40 and table 29 of the appendix). In Colombia, the Dominican Republic, Haiti,

[47] The vast majority of women interviewed stated that they had obtained their information about AIDS from the communications media, chiefly radio and television.

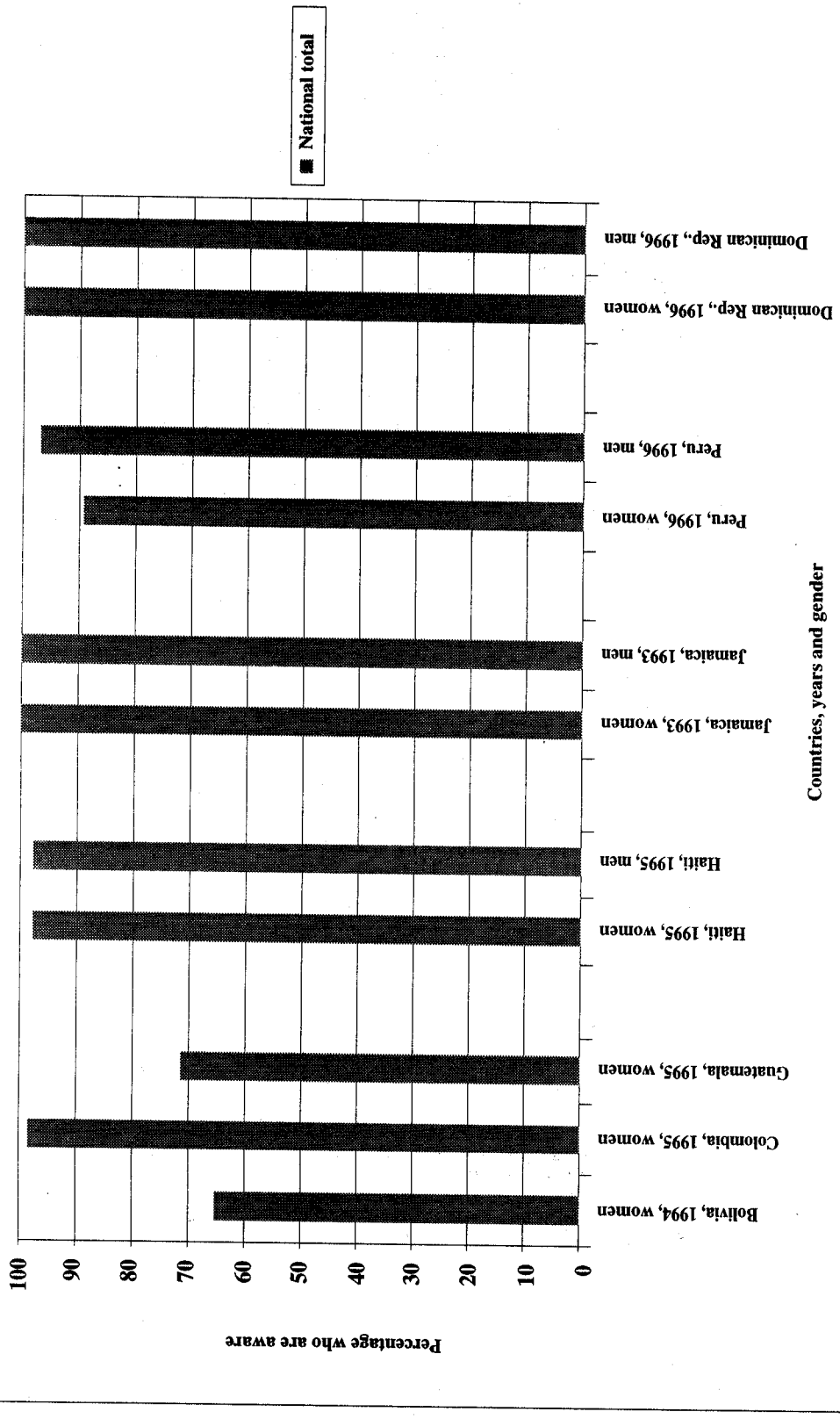
Jamaica and Peru, almost everybody claims to be "aware" of the existence of AIDS; although by and large the statements made do not differ greatly by gender, it is noteworthy that in Peru the proportion of women (11%) who claim ignorance is more than double that of men (5%). By contrast with these countries, around a third of the women interviewed in Bolivia (34%) and Guatemala (29%) say they know nothing about AIDS.[48]

"Awareness" of AIDS is consistently lower in rural areas than in urban ones. However, in those countries where this "awareness" is apparently most widespread, the magnitude of the differences is very small; likewise, in these cases it is found that the discrepancies between men and women by area of residence do not differ from those found nationally (see figure 41 and table 29 of the appendix). By contrast, where this "awareness" is less widespread, the differences between town and countryside are large, as is revealed by the fact that half or more of all rural women in Bolivia (67%) and Guatemala (44%) declare that they know nothing about AIDS. This difference is also substantial in Peru: more than a third (35%) of rural women, by comparison with a tiny proportion (2%) of urban women, state that they know nothing about AIDS; this marked inequality between the two areas of residence appears to be a distinctive attribute of the Peruvian situation within the context of the region. Again, the figures for rural areas in Guatemala appear to be influenced by the pattern of distribution of the indigenous population, two thirds of whom state that they are ignorant of AIDS, a proportion which contrasts with widespread "awareness" (88%) amongst non-Indians. These figures once again illustrate the high level of social inequity that exists in this as in other areas of reproductive health. These effects are even more pronounced if the information is broken down by people's level of education. In Bolivia, Guatemala and Peru, more than half of all women without schooling declare themselves ignorant of AIDS; by contrast, in all the countries "awareness" is virtually universal among people with secondary or higher education. The discrepancies are most marked in Bolivia, where eight out of ten women without schooling (80%) declare that they are unaware of the existence of this disease, and more than nine out of ten (96%) of those with higher education state that they are aware of it.

Another question included in the demographic and health surveys in five countries (Bolivia, Colombia, the Dominican Republic, Guatemala and Peru) deals with AIDS prevention. In general, a high proportion of women —and of men in the two countries (the Dominican Republic and Peru) for which data are available by gender— realized that it was possible to prevent the disease (see figure 42 and table 30 of the appendix); in the answers given about this possibility, there are no great differences between urban and rural areas, although the numbers who are aware of this in rural areas are lower in all cases. A major exception is Bolivia, where half of all women were not aware that AIDS could be prevented. When this question was supplemented by another one asking how the disease could be prevented, half or more of all rural women in Guatemala (52%) and Peru stated that they did not know what to do; even in rural areas in Colombia a fifth (21%) of women expressed ignorance. If the responses to this question are sorted by level of education —for which information is available in only four countries— it is found that this ignorance is owned to by around two thirds of women without schooling in Guatemala (66%) and Peru (62%), and more than a third in Colombia (39%); by contrast, women with a high level of education mentioned a number of valid options (using a condom, abstaining from promiscuity, maintaining conjugal fidelity and avoiding transfusions). It is worrying that a large proportion of the women interviewed admitted that they did not know if AIDS could be prevented, or how this could be done, as

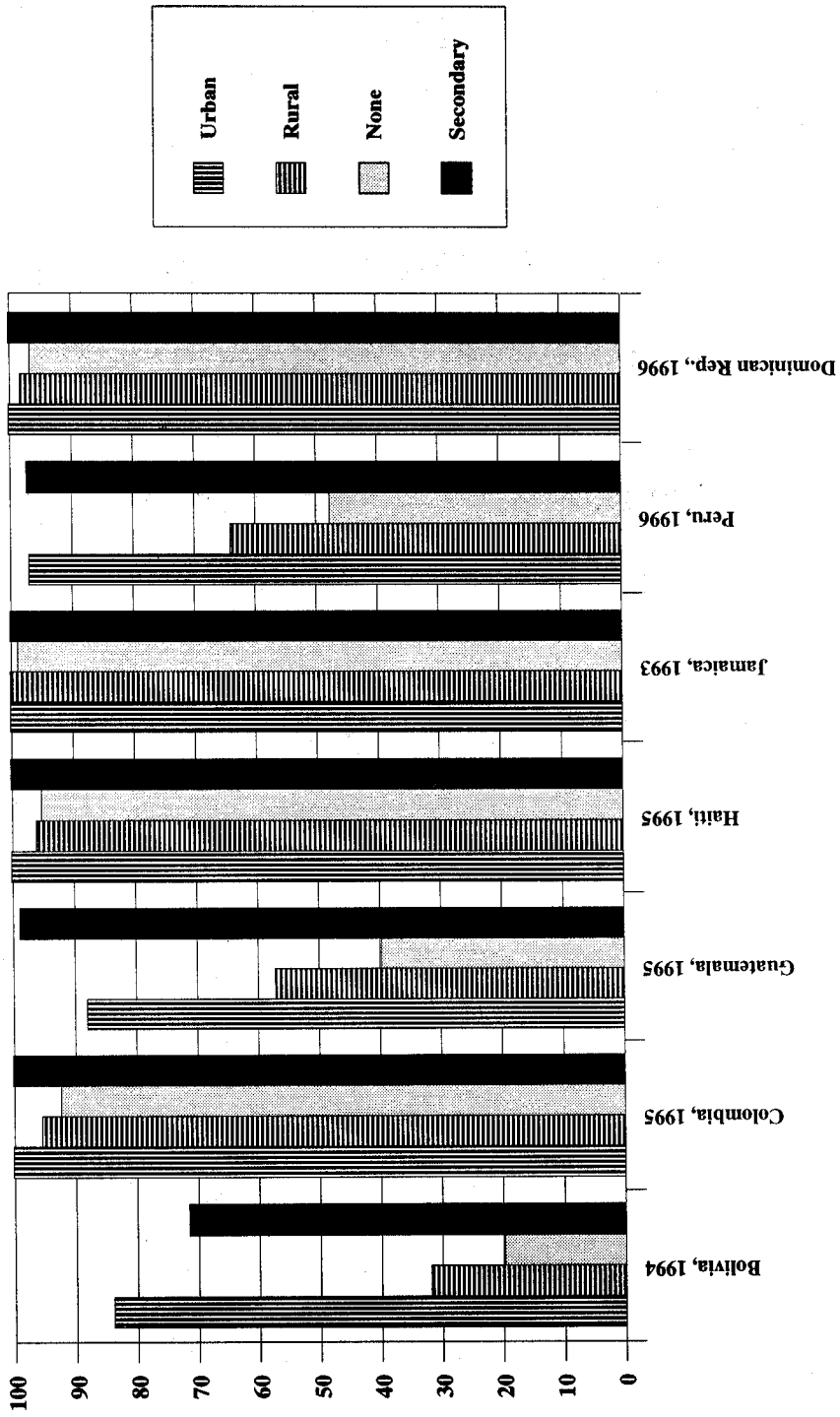
[48] The responses are broken down by gender in the surveys of only four countries (the Dominican Republic, Haiti, Jamaica and Peru); in the other three countries where questions were asked about AIDS (Bolivia, Colombia and Guatemala), the figures are exclusively for the women interviewed.

Figure 40
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF PEOPLE WHO ARE AWARE OF AIDS BY GENDER, SELECTED COUNTRIES, AROUND 1995



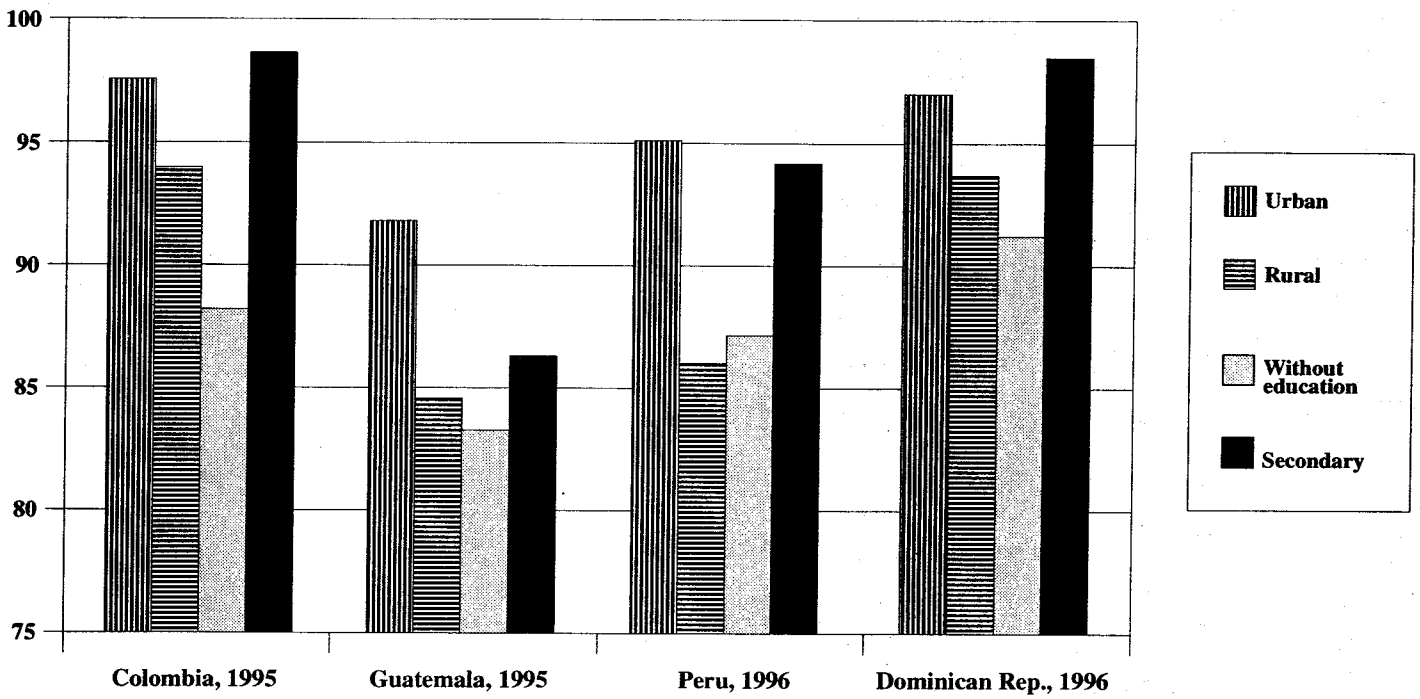
Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 41
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN OF CHILD-BEARING AGE WHO ARE AWARE OF AIDS BY AREA OF RESIDENCE AND LEVEL OF SCHOOLING, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

Figure 42
LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN OF CHILD-BEARING AGE WHO STATE THAT THEY HAVE KNOWLEDGE OF HOW TO PREVENT AIDS, SELECTED COUNTRIES, AROUND 1995



Source: CELADE, on the basis of demographic and health surveys (DHS).

this implies that there is a seriously high level of exposure to the risk of contracting the disease.[49] It should be noted that almost all the women in this category are without schooling or live in rural areas and belong to the most disadvantaged groups in their respective countries. To deal with this situation, in the words of the **Programme of Action**, it is necessary "to address the social, economic, gender and racial inequities that increase vulnerability" (United Nations, 1995a, p. 44).

Finally, in five countries (Colombia, the Dominican Republic, Guatemala, Haiti and Peru) the women interviewed were asked whether they had changed their sexual behaviour after finding out about AIDS and realizing that it was possible to prevent it. Negative responses were clearly in the ascendant in all the countries, with the proportion of these ranging from 82% among Colombian women to 58% among Dominican women. Generally speaking, the higher the level of education, the more likely women are to change their behaviour; in Guatemala, for example, half of all women with secondary education declared that they had changed their behaviour in some respect. It transpired however that, according to the answers given, a greater proportion of men had changed their behaviour (the proportions being 85% of Dominican men, 68% of Haitians, and 65% of Peruvians), particularly men with a higher level of education.[50] These results, differentiated by sex and by social position, appear to give an indication of the difficulties faced by women from the most disadvantaged groups in society in terms of protecting themselves against sexual transmission of AIDS by coming to an agreement with their partners.

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[49] The proportions of women without schooling who identified condom use as a means of protection are tiny in Guatemala (10%) and Peru (5%); furthermore, this method was mentioned only by a minority of rural women in Bolivia (24%) and Guatemala (17%).

[50] For example, 23% of Dominicans began to use condoms; the frequency of use is as high as 31% among men who are more highly educated. In Haiti, use of this protective method stood at 18% of all men and 37% of those with secondary or higher education.

Box 14

REPRODUCTIVE HEALTH PROGRAMME APPROACHES IN SITUATIONS OF ADVANCED DEMOGRAPHIC TRANSITION: NOTES ON THE CASE OF ARGENTINA

A diagnostic study carried out by specialists from a non-governmental body in Argentina has brought to light the need to design specific programmes to deal with the problems of reproductive health that arise even in countries where the demographic transition has made progress in all social and territorial areas. The study identifies three types of problems related to: (i) the accessibility of services; (ii) the quality of medical care; (iii) the information available.

As regards the accessibility of services, the most serious problems affect women living in poverty, who are distinguished by: lower indices of contraceptive use; later and less frequent prenatal controls; higher rates of fertility among adolescents; higher risks of cervical cancer and maternal mortality. It is also noted that, in general, young people face difficulties in obtaining access to methods of contraception and to medical care during pregnancy.

As regards the quality of medical care, particular reference is made to the existence of: limitations on the decision-making capabilities of services; various difficulties in referral and counter-referral procedures; inadequate training of health workers; insensitivity of medical teams towards the socio-cultural and gender conditions that characterize the reproductive health of women (especially in the case of hospital care for complications arising from abortion and the monitoring of patients with positive cervical cytology).

As regards the difficulties of using information, problems of quality, coverage and timeliness are identified. For example, there are no reliable and up-to-date statistics, for all the regions of the country and by age groups, on the incidence of genitomammary cancer or on the frequency of use of contraceptive methods. Another problem is under-recording of maternal mortality.

From this study it is possible to identify a range of important objectives that could be used as reference points for an integral reproductive health programme, as follows: (i) going beyond the traditional focus of mother and infant care and channelling resources towards the specific needs of women; (ii) promoting participation by the community, and women in particular, in the planning and execution of policies and programmes; (iii) educating and training medical staff to give them an understanding of gender aspects; (iv) improving the coverage of prenatal check-ups and the coordination of referral networks, particularly as regards women living in poverty; (v) ensuring that men and women have access to contraceptives; (vi) using sex education and the provision of contraceptives to increase the knowledge of adolescents, whether at school or not, and their ability to prevent unwanted pregnancies; (vii) improving the decision-making capabilities of health services so that maternal deaths can be avoided and emergency situations coped with; (viii) promoting measures to prevent genitomammary cancer by means of supply and demand assessments and appropriate campaigns; (ix) improving existing information databases and compiling new information that can be used to obtain indicators for monitoring and produce local diagnoses; (x) carrying out specific studies to generate detailed information from which reproductive health indicators can be derived and which can serve as the basis for operational research to evaluate the effectiveness of programmes.

Source: M. Gogna, S. Ramos and M. Romero "La salud reproductiva en la Argentina: estado de situación y problemas críticos", Buenos Aires, Centro de Estudios de Estado y Sociedad (CEDES), document presented at the Fourth Argentinian Conference on Population, Resistencia, 17-19 September 1997.

BIBLIOGRAPHY

Akerman, M., P. Campanario and P. Borlina Maia (1996), "Saúde e meio ambiente: análise de diferenciais intra-urbanos", Revista de saúde pública, vol. 30, No. 4, São Paulo.

Arriagada, I. (1997), "Políticas sociales, familia y trabajo en la América Latina de fin de siglo", Políticas sociales series, No. 21 (LC/L.1058), Santiago, Chile, ECLAC.

Bajraj, R. and J. Chackiel (1996), "La población en América Latina y el Caribe: tendencias y percepciones", Pensamiento Iberoamericano, No. 28 and Notas de Población, No. 62, Madrid, Spanish Centre for Latin American Studies (CEDEAL) and Latin American Demographic Centre (CELADE).

Behm, H. (1992), Las desigualdades sociales ante la muerte en América Latina, Santiago, Chile, Latin American Demographic Centre (CELADE) and Netherlands Organization for International Cooperation in Higher Education.

Boltvinik J. (1996), "Pobreza y comportamiento demográfico: la importancia de la política social", Demos. Carta demográfica sobre México, No. 9, Mexico City.

Bongaarts, J. (1996), "Global trends in AIDS mortality", Population and Development Review, vol. 22, No. 1, New York, March.

Boland, B. (1997), Dinámica de la población y desarrollo en el Caribe: con especial énfasis en la fecundidad de adolescentes, la migración internacional, las políticas de población y la planificación del desarrollo, Cuadernos de la CEPAL series, No. 76 (LC/G.1879-P; LC/DEM/G.171), Santiago, Chile. United Nations publication, Sales No. S.97.II.G.10.

Caballero, R., A. Villaseñor and A. Hidalgo (1997), "Fuentes de información y su relación con el grado de conocimientos sobre el SIDA en adolescentes de México", Revista de saúde pública, vol. 31, No. 4, São Paulo.

Carrasco, S., J. Martínez and C. Vial (1997), Población y necesidades básicas en Chile: un acercamiento sociodemográfico al período 1982-1994, Santiago, Chile, Ministry of Planning and Cooperation/United Nations Population Fund (MIDEPLAN/UNFPA).

CELADE (Latin American Demographic Centre) (1996), "Fecundidad, planificación familiar y salud reproductiva en el Perú", Serie OI, No. 107 (LC/DEM/R.243), Santiago, Chile.

——— (1994), "Dinámica demográfica de la pobreza: documentos seleccionados", Serie A, No. 287, (LC/DEM/R.206), Santiago, Chile.

CELADE/IDB (Latin American Demographic Centre/Inter-American Development Bank) (1996), "Impacto de las tendencias demográficas sobre los sectores sociales en América Latina: contribución al diseño de políticas y programas", Serie E, No. 45 (LC/DEM/G.161), Santiago, Chile.

CELADE/DHS (Latin American Demographic Centre/ Demographic and Health Survey) (1992), "La necesidad insatisfecha y la demanda total de planificación familiar en Colombia", Serie OI, No. 88, (LC/DEM/R.194), Santiago, Chile, 1990.

Chackiel, J. and S. Schkolnik (1997), "América Latina: la transición demográfica en sectores rezagados" (LC/R.286), Serie B, No. 124, document presented at the XXIII General Population Conference of the International Union for the Scientific Study of Population, (Beijing, 11 to 17 October), Santiago, Chile, CELADE.

CICRED/UNFPA/French Ministry of Cooperation (Committe for International Cooperation in National Research in Demography/United Nations Population Fund/French Ministry of Cooperation (1996), Demographic Evaluation of Health Programmes, Paris.

Coale, A. (1977), "La transición demográfica", Serie D, No. 86, Santiago, Chile, Latin American Demographic Centre (CELADE), May.

CONAPO (National Population Council) (1997), "La situación demográfica de México", Mexico City.

——— (1996), "Indicadores básicos de salud reproductiva y planificación familiar", Mexico City.

——— (1995), "Programa Nacional de Población 1995-2000, México", Mexico City.

CORSAPS (Corporación de Salud y Políticas Sociales), "Comportamiento reproductivo de hombres y mujeres en Chile", Santiago, Chile.

Cortés, F. (1997), "Determinantes de la pobreza de los hogares. México, 1992", Revista mexicana de sociología, vol. 59, No. 2, Mexico City.

ECLAC (Economic Commission for Latin America and the Caribbean) (1997a), Sustainable development, poverty and gender in Latin America and the Caribbean: working towards the year 2000, (LC/L.1064(CRM.7/5)) document prepared for the Seventh Session of the Regional Conference on the Integration of Women into the Economic and Social Development of Latin America and the Caribbean, Santiago, Chile, 19 to 21 November.

(1997b), Report of the First Regional Conference in Follow-up to the World Summit for Social Development (LC/G.1972(CONF.86/4)), Santiago, Chile.

——— (1997c), The equity gap: Latin America, the Caribbean and the Social Summit (LC/G.1954(CONF.86/3)), document prepared for the First Regional Conference in Follow-up to the World Summit for Social Development (São Paulo, 6 to 9 April), Santiago, Chile.

——— (1996), Follow-up report on the Latin American and Caribbean Regional Plan of Action on Population and Development. Note by the secretariat (LC/G.1905(SES.26/10)), document presented at the Twenty-sixth Session of the Commission (San José, Costa Rica, 15 to 20 April), Santiago, Chile.

——— (1995), América Latina y el Caribe: dinámica de la población y desarrollo (LC/G.1862-P; (LC/DEM/G.156)), Cuadernos de la CEPAL series, No. 74, Santiago, Chile.

—(1994), "Latin American and Caribbean Consensus on Population and Development" in Final Report of the Latin American and Caribbean Regional Conference on Population and Development (Mexico City, 29 April - 4 May 1993) (LC/G.1762(Conf.83/4); LC/DEM/G.134), Santiago, Chile.

ECLAC/CELADE (Economic Commission for Latin America and the Caribbean/Latin American Demographic Centre) (1996), Latin American and Caribbean Regional Plan of Action on Population and Development (LC/G.1920; LC/DEM/G.159), Santiago, Chile, February.

—— (1993), Population, social equity and changing production patterns (LC/G.1758/Rev.1-P; LC/DEM/G.131/Rev.1), Santiago, Chile. United Nations publication, Sales No. S.93.II.G.8.

ECLAC/CELADE/UNICEF (Economic Commission for Latin America and the Caribbean/Latin American Demographic Centre/United Nations Children's Fund) (1995), "América Latina: mortalidad en la niñez: una base de datos actualizada en 1995", Santiago, Chile.

Figueroa, J. (1997), "Elementos para definir una agenda de docencia, investigación y análisis de política en el ámbito de la salud reproductiva", Población y desarrollo: una perspectiva latinoamericana después de El Cairo-94, C. Welti (ed.), Mexico City, Latin American Programme of Population Activities (PROLAP) and Institute of Social Research of the National Autonomous University of Mexico.

Freedman, R. (1997), "Do family planning programs affects fertility preferences?", Studies in Family Planning, vol. 28, No. 1.

Geldstein, R. and G. Infesta (1997), "Las dos caras de la moneda: la salud reproductiva de las adolescentes en las miradas de las madres y las hijas", document presented at the Cuartas Jornadas Argentinas de la Población (Resistencia, 17 to 19 September), Buenos Aires, Centre for Population Studies (CENEP).

Gogna, M., S. Ramos and M. Romero (1997), "La salud reproductiva en la Argentina: estado de situación y problemas críticos", document presented at the Cuartas Jornadas Argentinas de la Población (Resistencia, 17 to 19 September) Buenos Aires, Centre for Studies on the State and Society (CEDES).

Gómez, E. (1997), " Health and women in Latin America and the Caribbean: old issues and new approaches", Mujer y desarrollo series, No. 17 (LC/L.990), Santiago, Chile, Economic Commission for Latin America and the Caribbean (ECLAC), September.

National Institute of Statistics (INE)/Macro International, Inc (1994), Bolivia. Encuesta nacional de demografía y salud, 1994, La Paz.

IHE (Institut Haïtien de l'Enfance) (1995), Enquête sur les connaissances, attitudes et pratiques de jeunes vis-à-vis du SIDA; evaluation de base pour le projet PREKOMAS, Pétionville.

IPPF (International Planned Parenthood Federation) (1997), Pobreza y salud reproductiva, London.

Kirk, D. (1996), "Demographic transition theory", Population Studies, vol. 50, No. 3, London, November.

Leighton, C. (1994), "Background Discussion Paper on the Economic Benefits of Family Planning and Reproductive Health Investment in the Latin America and Caribbean Region", Abt Associates Inc., Washington, D.C.

López, E. (1997), Anticoncepción y aborto. Su papel y sentido en la vida reproductiva, Buenos Aires, University of Buenos Aires.

Martine, G. (1996), "Brazil's fertility decline, 1965-95: a fresh look at key factors", Population and Development Review, vol. 22, No. 1, New York, March.

Martínez, J. (1997), "Cambios en planificación familiar", Demos. Carta demográfica de México, No. 10, Mexico City.

Muñiz, P. and R. Rubalcava (1996), "La reproducción de la pobreza", Demos. Carta demográfica sobre México, No. 9, Mexico City.

PAHO/WHO (Pan American Health Organization/World Health Organization) (1997), "Metas de la tercera evaluación de las estrategias de salud para todos en el año 2000, región de las Américas", Boletín epidemiológico, vol. 18, No. 4.

——— (1992), Reproductive health in the Americas, Washington, D.C.

PAHO (Pan American Health Organization) (1991), "Plan de acción para la reducción de la mortalidad materna en las Américas", Boletín de la Oficina Sanitaria Panamericana, No. 110.

Pantelides, E. (1996), "Adolescentes, sexualidad y salud reproductiva", Salud reproductiva, nuevos desafíos, Lima, Universidad Peruana Cayetano Heredia, Instituto de Estudios de Población (IEPO), Programa de Salud Reproductiva (PROSAR), March.

Parrado, E. and M. Tienda (1997), "Women's roles and family formation in Venezuela: new forms of consensual unions", Social Biology, vol. 44, No. 1-2.

Prada, E. (1992), La planificación familiar en América latina (DDR/7), document presented at the Meeting of Government Experts on Population and Development in Latin America and the Caribbean, (Santa Lucia, 6 to 9 October), Santiago, Chile, Latin American Demographic Centre (CELADE)/Economic Commission for Latin America and the Caribbean (ECLAC)/United Nations Population Fund (UNFPA).

PRB/DHS/CDC (Population Reference Bureau/Demographic and Health Survey/Centers for Disease Control and Prevention) (1992), Adolescent Sexual Activity and Childbearing in Latin America and the Caribbean: Risks and Consequences, Washington, D.C.

Rodríguez, J. and M. Villa (1997), "Dinámica sociodemográfica de las metrópolis latinoamericanas durante la segunda mitad del siglo XX", Notas de población, No. 65, June (forthcoming).

Roos J. and W. Parker Mauldin (1996), "Family planning programs: efforts and results, 1972-94", Studies in Family Planning, vol. 27, No. 3, May/June.

Seligman, B. and others (1997), Reproductive Health and Human Capital. A Framework for Expanding Policy Dialogue, Washington D.C., The POLICY Project, U.S. Agency for International Development (USAID), April.

Sen, G., A. Germain and L.C. Chen (1994), Population Policies Reconsidered. Health, Empowerment and Rights, Boston, Harvard School of Public Health.

Simões, C. and I. Leite (1991), "Padrão reprodutivo de saúde e mortalidades infantil, Nordeste, 1991", Fecundidade, anticoncepçâo e mortalidade infantil: Pesquisa sobre saúde familiar no Nordeste, 1991, Rio de Janeiro, Sociedade Civil Ben-Estar Familiar no Brasil (BENFAM) and Programme of Demographic and Health Survey (DHS).

Tejeda, R. (1995), "La juventud dominicana: ¿divino tesoro o infernal problema?", Revista Población y desarrollo, No. 5, Santo Domingo, Association for Family Welfare (PROFAMILIA).

UNFPA (United Nations Population Fund) (1997a), Estado de la población mundial, 1997. El derecho a optar: derechos de la procreación y salud de la reproducción, New York.

——— (1997b), "Pobreza e inequidad de género: salud y derechos sexuales y reproductivos en América Latina y el Caribe", document prepared for the Seventh Session of the Regional Conference on the Integration of Women into the Economic and Social Development of Latin America and the Caribbean, Santiago, Chile, 19 to 21 November.

——— (1997c), "Evaluation Report. Support to Traditional Birth Attendants", Technical Reports, No. 12, New York.

——— (1996), "Community Participation in Designing and Monitoring Reproductive Health Programmes", Technical Reports, No. 36, New York.

United Nations (1998), World Population Monitoring, 1996. Selected Aspects of Reproductive Rights and Reproductive Health (ST/ESA/SER.A/156), New York. United Nations publication, Sales No. E.97.XIII.5.

—— (1997a), Reproductive Rights and Reproductive Health: a Concise Report (ST/ESA/SER.A/157), New York. United Nations publication, Sales No. S.96.XIII.11.

———— (1997b), Family-building and family planning evaluation (ST/ESA/SER.R/148), New York.

——— (1996), Family Planning, Health and Family Well-Being (ST/ESA/SER.R/131), New York. United Nations publication, Sales No. 96.XIII.12.

———— (1995a), Programme of action adopted at the International Conference on Population and Development, Cairo, 5-13 September 1994 (ST/ESA/SER.A/149), Población y desarrollo series, vol. 1, New York. United Nations publication, Sales No. S.95.XIII.7.

———— (1995b), World population prospects, the 1994 revision (ST/ESA/SER.A/145), New York. United Nations publication, Sales No. E.95.XIII.16.

Van de Kaa, D. (1996), "Anchored narratives: story and findings of half a century of research into the determinants of fertility", Population Studies, vol. 50, No. 3, November.

Vilela, W. and R. Barbosa (1996), "Opções contraceptivas e vivências de sexualidades: comparação entre mulheres esterilizadas e não esterilizadas em região metropolitana do Sudeste do Brasil", Revista de saúde pública, vol. 30, No. 5.

Villa, M. (1997), "Dinámica de población", Diálogo iberoamericano, año 1, vol. 3, New York, Grupo Parlamentario Interamericano sobre Población y Desarrollo (GPI).

Villareal, M. (1996), "Colombia: cuatro décadas de población y desarrollo", Documentos técnicos series, Santiago, Chile, United Nations Population Fund (UNFPA), Technical Support Team.

WHO (World Health Organization) (1997), Monitoring Reproductive Health: Selecting a Short List of National and Global Indicators. Final Draft, (WHO/RHT/97.26), Geneva.

———— (1994), "The Current Global Situation on HIV/AIDS Pandemic", Geneva, World Health Organization, Global Programme on AIDS.

——— (1990), Maternal Health and Safe Motherhood Programme: Progress Report, 1987-1990, Geneva, World Health Organization (WHO/MCH/90.11).

———— (1981), "Global Strategy for Health for All by the Year 2000", Health for all series No. 3, Geneva, World Health Organization.

SOURCES:

The series of demographic and health surveys, including those known by the acronym DGH in English, forms part of a long-term world-wide project financed mainly by the United States Agency for International Development (USAID). The purpose of this project is to provide information to executive bodies in developing countries that work in the fields of population and health, and in particular to those responsible for mother and infant and family planning programmes. The surveys are planned and executed with the direct participation of governmental and private institutions in the countries concerned. These institutions have been supported by technical assistance from, among others, the Institute for Resource Development (IRD), a subsidiary of the Westinghouse Electric Corporation; the Reproductive Health Division of the Centers for Disease Control and Prevention (CDC), Atlanta, Georgia, United States; and Macro International, Incl, Claverton, Maryland, United States.

Demographic and Health Survey (DHS)

BEMFAM/DHS (Sociedade Civil Bem-Estar Familiar no Brasil/Demographic and Health Survey) (1997), Brasil. Pesquisa nacional sobre demografía e saúde 1996, Rio de Janeiro.

CESDEM/PROFAMILIA/ONAPLAN/DHS (Centro de Estudios Sociales y Demográficos/Association for Family Welfare/ National Planning Office/Demographic and Health Survey) (1997), República Dominicana. Encuesta demográfica y de salud 1996, Santo Domingo.

Family Planning Association of Trinidad and Tobago/DHS (Demographic and Health Survey) (1988), Trinidad and Tobago: Demographic and Health Survey, 1987, Port Spain, Trinidad and Tobago.

INE/DHS (National Institute of Statistics/Demographic and Health Survey) (1996), Guatemala: Encuesta Nacional de Salud Materno Infantil, 1995, Guatemala City.

INE/DHS (National Institute of Statistics/Demographic and Health Survey) (1994), Bolivia. Encuesta Nacional de Demografía y Salud, 1994, La Paz.

INEI/DHS (National Institute of Statistics and Informatics/Demographic and Health Survey) (1997), Perú: Encuesta demográfica y de salud familiar 1996. Informe principal, Lima.

Institut Haïtien de l'Enfance/DHS (Demographic and Health Survey) (1995), Enquête mortalité, morbidité et utilisation des services (EMMUS-II): Haïti 1994/95, Pétionville.

PROFAMILIA/DHS (Association for Family Welfare/Demographic and Health Survey) (1995) Colombia: Encuesta Nacional de Demografía y Salud 1995, Bogotá.

Centers for Disease Control and Prevention (CDC)

CCSS (Costa Rican Social Security Fund) (1994), Fecundidad y formación de la familia: Encuesta Nacional de Salud Reproductiva de 1993, San José.

CEPAR/CDC (Centre for Studies on Population and Responsible Parenthood/Centers for Disease Control and Prevention) (1995), Ecuador: Encuesta Demográfica y de Salud Materna e Infantil ENDEMAIN-94. Informe general, Quito.

CEPEP/USAID/CDC (Centro Paraguayo de Estudios de Población/United States Agency for International Development/Centers for Disease Control and Prevention) (1997), Paraguay: encuesta nacional de demografía y salud reproductiva, 1995 - 1996, Asunción.

National Family Planning Board/CDC (Centers for Disease Control and Prevention) (1994), Contraceptive prevalence survey. Jamaica 1993, Atlanta (4 volumes).

PROFAMILIA/CDC (Asociación Pro-Bienestar de la Familia Nicaraguense/Centers for Disease Control and Prevention) (1993) Encuesta sobre salud familiar Nicaragua 1992-93. Informe preliminar, Managua.

Salvadorian Demographic Association/CDC (Centers for Disease Control and Prevention) (1994), Encuesta Nacional de Salud Familiar: FESAL-93, San Salvador.

Other surveys

CEE (State Statistical Committee) (1991), Encuesta Nacional de Fecundidad, 1987, La Habana.

Other sources

CONAPO (National Population Council) (1996), Indicadores básicos de salud reproductiva y planificación familiar, Mexico City.

INE (National Institute of Statistics) (1996), Anuario de demografía, 1995, Santiago, Chile.

ANNEX

Table 1

LATIN AMERICA AND THE CARIBBEAN: ESTIMATED TOTAL FERTILITY RATE BY COUNTRIES, 1952, 1972 AND 1997

	Estimated total fertility rate		
Countries		**Years**	
	1952	1972	1997
Latin America	**5.90**	**5.03**	**2.66**
Argentina	3.15	3.15	2.62
Bolivia	6.75	6.50	4.36
Brazil	6.15	4.72	2.18
Chile	4.95	3.63	2.44
Colombia	6.76	4.67	2.69
Costa Rica	6.72	4.34	2.95
Cuba	4.10	3.55	1.55
Ecuador	6.70	6.00	3.10
El Salvador	6.46	6.10	3.09
Guatemala	7.09	6.45	4.90
Haiti	6.30	5.76	4.60
Honduras	7.50	7.05	4.30
Mexico	6.87	6.52	2.75
Nicaragua	7.33	6.79	3.85
Panama	5.68	4.94	2.63
Paraguay	6.50	5.65	4.17
Peru	6.85	6.00	2.98
Dominican Republic	7.40	5.63	2.80
Uruguay	2.73	3.00	2.25
Venezuela	6.46	4.94	2.98
Jamaica	4.22	5.78	2.10
Netherlands Antilles	5.65	2.65	2.10
Bahamas	4.22	3.30	2.00
Trinidad and Tobago	5.30	3.79	2.25
Barbados	4.67	3.45	1.83
Guadeloupe	5.61	4.49	2.22
Coefficient of variation (%)	22	26	31

Source: CELADE, current population estimates and forecasts; United Nations, *World population prospects: the 1994 revision* (ST/ESA/SER.A/145), New York, 1995. United Nations publication, Sales No. E.95.XIII.16.

Table 2

LATIN AMERICA AND THE CARIBBEAN: ESTIMATED AND PROJECTED (AVERAGE OF FORECASTS) FERTILITY RATE BY COUNTRY, 1950-2050

AVERAGE OF FORECASTS																			
Countries	Estimated total fertility rate									Projected total fertility rate									
	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	2025-2030	2030-2035	2035-2040	2045-2050
Latin America	5.9	6.0	6.0	5.6	5.0	4.5	3.8	3.4	3.0	2.7	2.5	2.4	2.3	2.2	2.2	2.2	2.1	2.1	2.1
Argentina	3.2	3.1	3.1	3.0	3.1	3.4	3.2	3.0	2.8	2.6	2.4	2.3	2.2	2.1	2.1	2.1	2.1	2.1	2.1
Bolivia	6.8	6.8	6.6	6.6	6.5	5.8	5.3	5.0	4.8	4.4	3.9	3.5	3.1	2.8	2.5	2.3	2.1	2.1	2.1
Brazil	6.2	6.2	6.2	5.4	4.7	4.3	3.6	3.0	2.4	2.2	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1
Chile	5.0	5.3	5.3	4.4	3.6	3.0	2.7	2.7	2.5	2.4	2.4	2.3	2.2	2.2	2.1	2.1	2.1	2.1	2.1
Colombia	6.8	6.8	6.8	6.3	4.7	4.1	3.4	3.2	2.9	2.7	2.5	2.4	2.3	2.2	2.1	2.1	2.1	2.1	2.1
Costa Rica	6.7	7.1	6.9	5.8	4.3	3.9	3.5	3.4	3.1	2.9	2.8	2.6	2.5	2.4	2.3	2.2	2.1	2.1	2.1
Cuba	4.1	3.7	4.7	4.3	3.5	2.1	1.8	1.8	1.6	1.6	1.6	1.6	1.7	1.8	1.8	1.9	2.0	2.0	2.1
Ecuador	6.7	6.7	6.7	6.5	6.0	5.4	4.7	4.0	3.5	3.1	2.8	2.5	2.3	2.2	2.1	2.1	2.1	2.1	2.1
El Salvador	6.5	6.8	6.8	6.6	6.1	5.7	4.4	4.0	3.5	3.1	2.8	2.5	2.4	2.2	2.2	2.1	2.1	2.1	2.1
Guatemala	7.1	6.9	6.8	6.6	6.5	6.4	6.1	5.8	5.4	4.9	4.4	3.9	3.4	3.0	2.7	2.4	2.2	2.1	2.1
Haiti	6.3	6.3	6.3	6.0	5.8	5.4	5.2	5.0	4.8	4.6	4.4	4.2	4.0	3.8	3.7	3.3	2.9	2.5	2.1
Honduras	7.5	7.5	7.4	7.4	7.1	6.6	6.0	5.4	4.9	4.3	3.7	3.2	2.9	2.6	2.4	2.2	2.1	2.1	2.1
Mexico	6.9	7.0	6.8	6.8	6.5	5.3	4.2	3.6	3.1	2.8	2.5	2.3	2.2	2.1	2.1	2.1	2.1	2.1	2.1
Nicaragua	7.3	7.3	7.3	7.1	6.8	6.4	6.0	5.0	4.4	3.9	3.4	2.9	2.6	2.4	2.3	2.2	2.1	2.1	2.1
Panama	5.7	5.9	5.9	5.6	4.9	4.1	3.5	3.2	2.9	2.6	2.4	2.3	2.2	2.1	2.1	2.1	2.1	2.1	2.1
Paraguay	6.5	6.5	6.6	6.3	5.7	5.2	5.3	4.9	4.6	4.2	3.8	3.5	3.2	3.0	2.8	2.5	2.3	2.1	2.1
Peru	6.9	6.9	6.9	6.6	6.0	5.4	4.6	4.0	3.4	3.0	2.6	2.4	2.3	2.2	2.1	2.1	2.1	2.1	2.1
Dominican Republic	7.4	7.4	7.3	6.7	5.6	4.7	3.9	3.5	3.1	2.8	2.6	2.4	2.3	2.2	2.1	2.1	2.1	2.1	2.1
Uruguay	2.7	2.8	2.9	2.8	3.0	2.9	2.6	2.4	2.3	2.3	2.2	2.2	2.1	2.1	2.1	2.1	2.1	2.1	2.1
Venezuela	6.5	6.5	6.7	5.9	4.9	4.5	4.0	3.6	3.3	3.0	2.7	2.5	2.3	2.2	2.1	2.1	2.1	2.1	2.1
Netherlands Antilles	5.7	5.2	4.4	3.3	2.7	2.5	2.3	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1
Bahamas	4.2	3.7	3.9	3.3	3.0	2.8	2.8	2.3	2.0	2.0	2.0	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1
Barbados	4.7	4.7	4.3	3.5	2.7	2.2	1.9	1.6	1.8	1.8	1.8	1.9	2.0	2.0	2.1	2.1	2.1	2.1	2.1
Guadeloupe	5.6	5.6	5.6	5.2	4.5	3.1	2.6	2.5	2.3	2.2	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1
Jamaica	4.2	5.1	5.6	5.8	5.0	4.0	3.6	2.6	2.4	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1
Trinidad and Tobago	5.3	5.3	5.0	3.8	3.5	3.4	3.2	2.8	2.4	2.3	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1

Source: CELADE, current population estimates and forecasts; United Nations, *World population prospects: the 1994 revision* (ST/ESA/SER.A/145), New York, 1995. United Nations publication, Sales No. E.95.XIII.16.

Table 3

LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATE BY AREA OF RESIDENCE AND PERCENTAGE DIFFERENCE BETWEEN AREAS OF RESIDENCE (RURAL AND URBAN), SELECTED COUNTRIES, AROUND 1995

Year of survey	Country	Reference period	Urban	Rural	National	Percentage difference between rural and urban TFR
1994	Bolivia	1991-1994	3.8	6.3	4.8	65.8
1996	Brazil	1993-1996	2.3	3.5	2.5	52.2
1995	Colombia	1992-1995	2.5	4.3	3.0	72.0
1993	Costa Rica [a]	1990-1993	2.7	3.7	3.2	34.8
1994	Ecuador	1989-1994	3.0	4.6	3.6	55.6
1993	El Salvador [b]	1988-1993	2.7	5.0	3.9	84.4
1995	Guatemala	1992-1995	3.8	6.2	5.1	63.2
1994-1995	Haiti	1992-1995	3.3	5.9	4.8	78.8
1994	Mexico	1994	2.6	3.8	-	46.2
1992-1993	Nicaragua [c]	1987-1993	3.2	6.4	4.6	100.6
1995-1996	Paraguay	1990-1996	3.3	5.7	4.4	73.4
1996	Peru	1993-1996	2.8	5.6	3.5	100.0
1996	Dominican Rep.	1993-1996	2.8	4.0	3.2	42.9
1987	Trinidad and Tobago	1984-1987	3.0	3.2	3.1	6.7

Source: CELADE, on the basis of demographic and health surveys.

[a] The urban area of residence is the Metropolitan Area of San José.
[b] The urban area of residence is the Metropolitan Area of San Salvador.
[c] The urban area of residence is the Metropolitan Area of Managua.

Table 4

LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATE BY LEVEL OF EDUCATION AND PERCENTAGE DIFFERENCE BETWEEN THE VALUES FOR WOMEN WITHOUT SCHOOLING AND THOSE WITH HIGHER EDUCATION, SELECTED COUNTRIES, AROUND 1995

			LEVEL OF EDUCATION			
Year of survey	Country	% difference between TRFs of top and bottom educational groups	Without schooling	Primary	Secondary	Higher
1994	Bolivia	140.7	6.5	6.0	4.9	2.7
1996	Brazil	233.3	5.0	3.4	2.1	1.5
1995	Colombia	177.8	5.0	3.8	2.6	1.8
1993	Costa Rica	49.1	4.0	3.6	-	2.7
1994	Ecuador	193.0	6.2	4.8	2.9	2.1
1993	El Salvador	129.5	5.4	4.8	3.5	2.3
1995	Guatemala	294.4	7.1	5.1	2.7	1.8
1994-1995	Haiti	144.0	6.1	4.8	-	2.5
1994	Mexico	70.8	4.1	3.8	3.1	2.4
1992-1993	Nicaragua	191.2	6.9	4.9	3.4	2.4
1995-1996	Paraguay	183.1	6.9	5.2	3.4	2.4
1996	Peru	228.6	6.9	5.0	3.0	2.1
1996	Dominican Rep.	163.2	5.0	3.9	2.6	1.9
1987	Trinidad and Tobago	73.9	4.0	3.6	3.1	2.3

Source: CELADE, on the basis of demographic and health surveys.

Note: The categories for the level of education are not the same in all the surveys. The meanings of each category for the different countries are given below. These definitions apply to all tables where the level of education is used as a variable.

Bolivia: Without schooling: Without schooling; Primary: Basic; Secondary: Intermediate; Higher: Medium or above.

Brazil: Without schooling: No years of education; Primary: weighted average of the figures for the categories 1-3 years of education and 4 years of education; Secondary: weighted average of the figures for the categories 5-8 years of education and 9-11 years of education; Higher: 12 years of education or more.

Colombia: Without schooling: Without education; Primary: Primary; Secondary: Secondary; Higher: Higher.

Costa Rica: Without schooling: Primary education uncompleted; Primary: Primary education completed; Secondary: No applicable category identified; Higher: Secondary or over.

Ecuador: Without schooling: No schooling; Primary: weighted average of the figures for the primary uncompleted and primary completed categories; Secondary: weighted average of the figures for the secondary uncompleted and secondary completed categories; Higher: Higher.

El Salvador: Without schooling: No years of education; Primary: 1-3 years of education; Secondary: weighted average of the figures for the categories 4-6 years of education and 7-9 years of education; Higher: 10 years of education or more.

Guatemala: Without schooling: Without education; Primary: Primary; Secondary: Secondary; Higher: Higher.

Haiti: Without schooling: No schooling; Primary: Literacy teaching or primary; Secondary: No applicable category identified; Higher: Secondary or more.

Mexico: Without schooling; Primary uncompleted; Primary completed; Secondary or over.

Nicaragua: Without schooling: No schooling; Primary: weighted average of the figures for the primary uncompleted and primary completed categories; Secondary: Secondary uncompleted; Higher: Completed secondary or over.

Paraguay: Without schooling: 0-2 years of study; Primary: weighted average of the figures for the categories 3-5 years of schooling and 6 years of schooling; Secondary: 7-11 years of schooling; Higher: 12 years of education or over.

Peru: Without schooling: Without education; Primary: Primary; Secondary: Secondary; Higher: Higher.

Dominican Republic: Without schooling: Without education; Primary: weighted average of the figures for the categories 1-4 years and 5-8 years; Secondary: Secondary; Higher: Higher.

Trinidad and Tobago: Primary uncompleted; primary complete; Some level of education secondary; Secondary completed and at least one level of higher education.

Table 5

LATIN AMERICA AND THE CARIBBEAN: SPECIFIC FERTILITY RATES AND STRUCTURES OF FERTILITY, 1950-1955, 1995-2000 and 2045-2050

Five-year periods	Five-year age groups						
	15-19	20-24	25-29	30-34	35-39	40-44	45-49
				Rates			
1950-1955	0.1000	0.2639	0.2892	0.2407	0.1726	0.0842	0.0300
1995-2000	0.0733	0.1521	0.1372	0.0926	0.0527	0.0194	0.0038
2045-2050	0.0603	0.1262	0.1095	0.0705	0.0380	0.0130	0.0023
	15-19	20-24	25-29	30-34	35-39	40-44	45-49
				Structure in percentages			
1950-1955	8.4688	22.3531	24.4967	20.3880	14.6218	7.1328	2.5389
1995-2000	13.8069	28.6409	25.8318	17.4369	9.9194	3.6486	0.7156
2045-2050	14.3634	30.0695	26.0941	16.7954	9.0487	3.0865	0.5425

Source: CELADE, on the basis of current population estimates and forecasts.

Table 6

LATIN AMERICA AND THE CARIBBEAN: CHANGES IN SPECIFIC TEENAGE FERTILITY RATES, 15 TO 19 AGE GROUP, SELECTED COUNTRIES, 1950-1995

Five-year periods	Countries									
	Cuba	Honduras	Brazil	Mexico	Argentina	Paraguay	Barbados	Jamaica	Saint Lucia	Trinidad and Tobago
1950-1955	0.0668	0.1605	0.0825	0.1173	0.0624	0.097	-	-	-	-
1960-1965	0.1197	0.1587	0.0825	0.1182	0.0611	0.0989	-	-	-	-
1970-1975	0.1407	0.1508	0.0683	0.1163	0.0683	0.0958	0.0943	0.1289	0.1593	0.0885
1980-1985	0.0848	0.1400	0.0665	0.0948	0.0742	0.0936	0.0707	-	0.1468	0.0840
1990-1995	0.0672	0.1265	0.0734	0.0766	0.0697	0.0867	0.0444	0.1000	0.0864	0.0516

Source: CELADE, on the basis of current population estimates and forecasts; B. Boland, *Dinámica de la población y desarrollo en el Caribe: con especial énfasis en la fecundidad de adolescentes, la migración internacional, las políticas de población y la planificación del desarrollo,* Cuadernos de la CEPAL, series No. 76 (LC/G.1879-P; LC/DEM/G.171), Santiago, Chile, 1997. United Nations publication, Sales No. S.97.II.G.10.

Table 7

LATIN AMERICA AND THE CARIBBEAN: ESTIMATES OF TEENAGE FERTILITY RATES AND PERCENTAGES OF ALL BIRTHS ACCOUNTED FOR BY BIRTHS TO TEENAGE MOTHERS, BY COUNTRIES RANKED IN ACCORDANCE WITH THEIR STAGE IN THE DEMOGRAPHIC TRANSITION PROCESS, 1960-1965 AND 1990-1995

Countries grouped by stage in the demographic transition	f (15-19)	f (15-19)	Percentage difference between the f (15-19) rates	Percentage of all births accounted for by births to teenage mothers		Percentage difference between the share of births of teenage mothers within total births
	1960-1965	1995-2000	1960-1965/1990-1995	1960-1965	1990-1995	1960-1965/1990-1995
Group I[a]						
Bolivia	97.2	79.2	-18.5	10.4	12.3	18.7
Haiti	76.8	53.1	-30.9	9.0	8.0	-10.8
Group II[b]						
El Salvador	165.4	95.2	-42.4	12.1	19.2	58.3
Guatemala	161.4	119.3	-26.1	11.8	18.1	53.1
Honduras	158.7	114.6	-27.8	15.2	18.7	23.0
Nicaragua	168.0	134.8	-19.8	15.9	23.3	46.6
Paraguay	98.9	76.0	-23.2	11.7	12.5	7.2
Group III[c]						
Brazil	82.5	70.8	-14.2	9.6	18.6	93.5
Colombia	128.0	74.5	-41.8	14.4	15.6	8.2
Costa Rica	114.8	89.3	-22.2	11.3	17.8	57.5
Ecuador	135.6	71.9	-47.0	14.2	14.8	4.1
Mexico	118.2	69.5	-41.2	12.9	15.0	16.4
Panama	144.8	82.0	-43.4	18.4	17.3	-5.8
Peru	129.9	62.8	-51.7	13.5	12.4	-8.1
Dominican Rep.	164.2	90.5	-44.9	16.7	17.4	4.1
Venezuela	133.0	98.2	-26.2	14.4	19.9	38.2
Group IV[d]						
Argentina	61.1	64.8	6.1	11.0	14.9	35.4
Chile	85.3	49.0	-42.6	11.0	11.5	4.4
Cuba	119.7	65.4	-45.4	16.7	16.8	0.5
Uruguay	63.2	59.6	-5.7	12.3	14.4	16.7

Source: CELADE, on the basis of current population forecasts.

[a] Incipient transition (high birth and death rates).
[b] Moderate transition (high birth rate and moderate death rate).
[c] In full transition (moderate birth rate and low or moderate death rate).
[d] Advanced transition (moderate or low birth and death rates).

Table 8

LATIN AMERICA AND THE CARIBBEAN: DIFFERENCES BETWEEN URBAN AN RURAL AREAS IN SPECIFIC TEENAGE FERTILITY RATES AMONG 15 TO 19-YEAR-OLDS AND PROPORTION OF TOTAL FERTILITY ACCOUNTED FOR BY THESE, SELECTED COUNTRIES, AROUND 1995

Countries and years	Specific rate of teenage fertility (national)	Specific rate of teenage fertility (rural)	Specific rate of teenage fertility (urban)	Percentage difference between teenage fertility rates in rural and urban areas	Percentage of the total accounted for by teenage fertility (rural area)	Percentage of the total accounted for by teenage fertility (urban area)	Percentage difference between the proportions of total fertility accounted for by teenage fertility in rural and urban areas
Bolivia, 1994	94	119	80	48.8	9.5	10.5	-9.5
Brazil, 1996	86	132	78	56.4	17.4	16.8	3.9
Colombia, 1995	89	127	74	85.1	15.9	15.0	5.9
Costa Rica, 1993	87	113	73	54.8	15.4	13.4	14.8
Ecuador, 1994	91	112	76	47.4	12.2	12.9	-5.0
El Salvador, 1993	124	158	101	56.4	15.9	18.8	-15.5
Guatemala, 1995	126	148	99	49.5	12.0	13.0	-7.5
Haiti, 1994-1995	76	92	58	58.6	7.8	8.8	-10.8
Nicaragua, 1992-1993	158	205	135	51.9	16.0	21.1	-24.3
Paraguay, 1995-1996	107	38	82	68.3	12.0	12.4	-3.1
Peru, 1996	75	39	55	152.7	12.5	9.8	26.8
Dominican Republic, 1996	112	60	87	83.9	20.0	15.8	26.3

Source: CELADE, on the basis of demographic and health surveys.

[a] The proportions of total fertility accounted for by the fertility rates of the 15 to 19 age group in the two areas of residence are compared using the following algorithm: [(proportion in rural area - proportion in urban area) / proportion in urban area] * 100. With the algorithm employed, a negative value means that teenage fertility accounts for a higher proportion of the total in urban areas than it does in rural areas. By way of example, the -15.5% figure for El Salvador means that the proportion of the rural TFR accounted for by teenagers is 15.5% lower than the proportion of the urban TFR accounted for by teenagers.

Table 9

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF TEENAGERS WITH REPRODUCTIVE EXPERIENCE [a] AT THE TIME OF THE SURVEY BY AREA OF RESIDENCE, AND DIFFERENCE BETWEEN AREAS, SELECTED COUNTRIES, AROUND 1995

Country and year	Total	Urban area	Rural area	Difference between urban area and rural area (%)
Bolivia, 1994	17.5	14.9	22.2	49
Brazil, 1996	18.0	16.6	24.2	46
Colombia, 1995	17.4	14.6	25.5	75
Ecuador, 1994	17.5	14.6	21.3	46
Guatemala, 1995	21.1	14.7	26.1	78
Haiti, 1994-1995	14.5	12.3	16.4	33
Nicaragua, 1992-1993	31.5	25.2	40.7	35
Peru, 1996	13.4	9.3	25.5	174
Dominican Republic, 1996	22.7	18.4	30.6	66

Source: CELADE, on the basis of demographic and health surveys.

[a] Refers to women who were mothers or were pregnant at the time of the survey.

Table 10

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF TEENAGERS WITH REPRODUCTIVE EXPERIENCE AT THE TIME OF THE SURVEY BY LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

	LEVEL OF EDUCATION			
Country and year	**Without schooling**	**With schooling**	**With higher education**	**Percentage difference between women with and without schooling**
Bolivia, 1994	37.6	16.9	9.4	122.5
Brazil, 1996	54.4	17.7	6.4	207.3
Colombia, 1995 [a]	29.9	12.2	6.5	145.1
Ecuador, 1994 [b]	39.2	15.6	12.4	151.3
Guatemala, 1995	37.4	18.4	11.2	103.3
Haiti, 1995	25.6	12.8	7.8	100.0
Nicaragua, 1992	59.0	27.7	14.8	113.0
Peru, 1996	55.5	12.9	2.6	330.2
Dominican Republic, 1996	58.3	21.2	11.4	175.0

Source: CELADE, on the basis of demographic and health surveys.

[a] "Without schooling" includes women with primary education.
[b] "Without schooling" includes women who have not completed primary education.

Table 11

LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATE AND AVERAGE NUMBER OF CHILDREN DESIRED BY WOMEN, ABSOLUTE AND RELATIVE DIFFERENCES, SELECTED COUNTRIES, AROUND 1995

	TFR	**Average number of children desired**	**Absolute difference**	**Percentage difference**
Country and year	(1)	(2)	(1)-(2)	[(1)-(2)]/(2)*100
Bolivia, 1994	4.8	2.5	2.3	92.0
Brazil, 1996	2.5	2.3	0.2	8.7
Colombia, 1995	3	2.5	0.5	20.0
Costa Rica, 1993	3.2	3.4	-0.2	-5.9
Ecuador, 1994	3.6	2.7	0.9	33.3
Guatemala, 1995	5.1	3.6	1.5	41.7
Haiti, 1994-1995	4.8	3.3	1.5	45.5
Paraguay, 1995-1996	4.4	3.6	0.8	22.2
Peru, 1996	3.5	2.5	1	40.0
Dominican Rep., 1996	3.2	3.2	0	0.0
Trinidad and Tobago 1987	3.1	2.9	0.2	6.9

Source: CELADE, on the basis of demographic and health surveys.

Table 12

LATIN AMERICA AND THE CARIBBEAN: AVERAGE NUMBER OF CHILDREN DESIRED BY WOMEN, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, AND ABSOLUTE AND RELATIVE DIFFERENCES BETWEEN SOCIO-ECONOMIC GROUPS, SELECTED COUNTRIES, AROUND 1995

		Average number of children desired by women									
Country and year	Total	Area of residence				Level of education					
		Urban	Rural	Absolute [a] difference	Relative [a] difference	None	Basic	Medium	Higher	Absolute [b] difference	Relative [b] difference
Bolivia, 1994	2.5	2.5	2.5	0.0	0.0	2.7	2.5	2.5	2.4	0.3	12.5
Brazil, 1996	2.3	2.3	2.6	0.3	13.0	2.7	2.5	2.2	2.2	0.5	22.7
Colombia, 1995	2.5	2.4	2.9	0.5	20.8	3.3	2.8	2.3	2.4	0.9	37.5
Costa Rica, 1994	3.4	3.1	3.6	0.5	16.1	4.3	3.9	3.1	3	1.3	43.3
Ecuador, 1994	2.7	2.5	2.9	0.4	16.0	3.6	3	2.4	2.4	1.2	50.0
Guatemala, 1995	3.6	3.1	4.1	1.0	32.3	4.6	3.6	2.7	2.5	2.1	84.0
Haiti, 1994-1995	3.3	3	3.6	0.6	20.0	3.6	3.2	-	2.9	0.7	24.1
Paraguay, 1995-1996	3.6	3.2	4.1	0.9	28.1	4.7	3.8	3.1	3	1.7	56.7
Peru, 1996	2.5	2.4	2.7	0.3	12.5	3.1	2.7	2.3	2.3	0.8	34.8
Dominican Republic, 1996	3.2	3	3.4	0.4	13.3	3.7	3.3	2.9	2.9	0.8	27.6
Trinidad and Tobago, 1987	2.9	2.9	2.9	0.0	0.0	3.6	3.1	2.7	2.7	0.9	33.3

Source: CELADE, on the basis of demographic and health surveys.

[a] Between rural and urban values.
[b] Between values for women without schooling and women with higher education.

Table 13

LATIN AMERICA AND THE CARIBBEAN: AVERAGE NUMBER OF CHILDREN DESIRED BY MEN AND ABSOLUTE AND RELATIVE DIFFERENCES BETWEEN THIS AND THE NUMBER DESIRED BY WOMEN, FOUR COUNTRIES, AROUND 1995

Country and year	Average number of children desired by men	Absolute difference between men and women	Percentage difference between men and women
Brazil, 1996	2.6	0.3	13.0
Haiti, 1994-1995	3.4	0.1	3.0
Peru, 1996	2.7	0.2	8.0
Dominican Rep., 1996	3.5	0.3	9.4

Source: CELADE, on the basis of demographic and health surveys.

Table 14

LATIN AMERICA AND THE CARIBBEAN: TOTAL FERTILITY RATE, DESIRED TOTAL FERTILITY RATE AND ABSOLUTE AND RELATIVE DIFFERENCES BETWEEN THEM, SELECTED COUNTRIES, AROUND 1995

	TFR	Desired TFR	Absolute difference [a]	Percentage difference [a]
Country and year				
Bolivia, 1994	4.8	2.7	2.1	77.8
Brazil, 1996	2.5	1.8	0.7	38.9
Colombia, 1995	3	2.2	0.8	36.4
Ecuador, 1994	3.6	2.9	0.7	24.1
Guatemala, 1995	5.1	4	1.1	27.5
Haiti, 1994-1995	4.8	3	1.8	60.0
Paraguay, 1995-1996	4.4	4.1	0.3	7.3
Peru, 1996	3.5	2.2	1.3	59.1
Dominican Republic, 1996	3.2	2.5	0.7	28.0
Trinidad and Tobago, 1987	3.1	2.6	0.5	19.2

Source: CELADE, on the basis of demographic and health surveys.

[a] Actual TFR and desired TFR.

Table 15

LATIN AMERICA AND THE CARIBBEAN: DESIRED TOTAL FERTILITY RATE OVERALL, BY AREA OF RESIDENCE AND BY LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

	Total	Area of residence		Level of education			
		Urban	Rural	None	Basic	Medium	Higher
Bolivia, 1994	2.7	2.4	3.3	3.3	3	3.3	2
Brazil, 1996	1.8	1.7	2.2	2.7	2	1.6	1.4
Colombia, 1995	2.2	1.9	2.8	2.6	3	2	1.6
Ecuador, 1994	2.9	2.5	3.5	4.4	4	2.5	1.4
Guatemala, 1995	4	3	4.8	5.6	4	2.4	1.7
Haiti, 1995	3	2.3	3.7	4	3		1.8
Paraguay, 1995	4.1	3.1	5.3	6.2	5	3.1	2.4
Peru, 1996	2.2	1.9	3.1	4	3	2	1.8
Dominican Rep., 1996	2.5	2.2	3	3.1	3	2.2	1.8

Source: CELADE, on the basis of demographic and health surveys.

Table 16

LATIN AMERICA AND THE CARIBBEAN: AVERAGE AGE AT TIME OF FIRST SEXUAL RELATIONSHIP AND FIRST UNION BY SEX, AND ABSOLUTE AND RELATIVE DIFFERENCES BETWEEN THESE AGES, SELECTED COUNTRIES, AROUND 1995

Country and year	**Age at time of first sexual relationship**	**Age at time of first union**	**Absolute difference**	**Percentage difference**
Women	(1)	(2)	(2)-(1)	[(2)-(1)]/(1)*100
Bolivia, 1994	18.9	20.6	1.7	9.0
Brazil, 1996	19.5	21.1	1.6	8.2
Colombia, 1995	19.4	21.4	2	10.3
Guatemala, 1995	18.3	19	0.7	3.8
Haiti, 1994-1995	19	20.8	1.8	9.5
Nicaragua, 1992-1993	18.2	18.6	0.4	2.2
Paraguay, 1995-1996	18.2	21	2.8	15.4
Peru, 1996	19.1	20.9	1.8	9.4
Dominican Rep., 1996	18.7	19.3	0.6	3.2
Men				
Brazil, 1996	16.7	24.1	7.4	44.3
Haiti, 1994-1995	18.3	26.9	8.6	47.0
Peru, 1996	16.8	24.7	7.9	47.0
Dominican Rep., 1996	16.1	24.1	8	49.7

Source: CELADE, on the basis of demographic and health surveys.

Table 17

LATIN AMERICA AND THE CARIBBEAN: AVERAGE AGE AT TIME OF FIRST SEXUAL RELATIONSHIP AND FIRST UNION AND PERCENTAGE DIFFERENCE BETWEEN THE TWO AGES BY AREA OF RESIDENCE AND FOR TOP AND BOTTOM EDUCATIONAL GROUPS, SELECTED COUNTRIES, AROUND 1995

Countries and years	Age at time of first sexual relationship				Age at time of first union				Percentage difference between age at time of first union and age at time of first sexual relationship by area of residence and level of education			
	Area of residence		Level of schooling		Area of residence		Level of schooling					
	Urban	Rural	Without schooling	With higher education	Urban	Rural	Without schooling	With higher education	Urban	Rural	Without schooling	With higher education
Bolivia, 1994	19.2	18.5	18.1	18.4	20.7	20.4	20.2	22.4	7.8	10.3	11.6	21.7
Brazil, 1996	19.6	19.1	17.6	22.4	21.3	20.2	18.8	23.1	8.7	5.8	6.8	3.1
Colombia, 1995	19.8	18.4	16.7	19.9	21.9	20.0	18.5	21.9	10.6	8.7	10.8	10.1
Guatemala, 1995	19.2	17.6	17.0	-	20.0	18.2	17.7	-	4.2	3.4	4.1	-
Haiti, 1994-1995	19.5	18.8	18.4	21.0	21.5	20.4	20.1	23.9	10.3	8.5	9.2	13.8
Nicaragua, 1992-1993	18.5	17.5	16.6	21.6	18.8	17.7	16.8	22.2	1.6	1.1	1.2	2.8
Paraguay, 1995-1996	18.2	17.8	16.1	19.8	22	19.8	18.7	24.6	20.9	11.2	16.1	24.2
Peru, 1996	19.8	17.7	16.9	23.3	21.8	19.3	18.7	-	10.1	9.0	10.7	-
Dominican Rep., 1996	19.4	17.6	15.7	23.8	20	18	16.3	24.8	3.1	2.3	3.8	4.2

Source: CELADE, on the basis of demographic and health surveys.

Table 18

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN OF CHILD-BEARING AGE WHO HAD SEXUAL RELATIONS IN THE PREVIOUS FOUR WEEKS, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

Country	Year of survey	Total	Urban area	Rural area	Without schooling	Primary	Secondary	Higher
Bolivia [a]	1993-1994	59.0	59.6	57.9	58.6	56.9	59.7	61.6
Brazil [b]	1996	62.3	61.6	65.0	70.0	63.7	55.2	66.3
Colombia	1995	53.9	52.0	59.2	62.2	59.7	48.8	54.6
El Salvador [c]	1993	71.7	74.3	68.5	66.8	72.3	73.4	75.8
Guatemala	1995	50.9	48.0	53.1	59.9	51.3	38.2	49.4
Haiti [d]	1994-1995	42.7	35.8	48.1	56.0	38.5	29.6	-
Peru	1996	50.8	48.5	57.0	57.4	62.5	45.3	43.9
Dominican Republic [e]	1996	54.7	49.9	64.3	73.5	59.7	44.7	49.1

Source: CELADE, on the basis of demographic and health surveys.

[a] Women who have had sexual relations at some time; higher education = medium or over.

[b] Primary: 1-3 years 67.8 %, 4 years 69.9 %, 5-8 years 58.5%.

[c] Women who have had sexual relations at some time; 1-3 years of schooling 71.7 %, 4-6 years 72.9 %.

[d] Primary category includes women who know how to read and write.

[e] Women with 1-4 years of schooling 66.6 %, with 5-8 years 55.7 %.

Table 19

LATIN AMERICA AND THE CARIBBEAN: KNOWLEDGE OF CONTRACEPTIVE METHODS, IN TOTAL AND FOR MODERN METHODS, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, WOMEN IN CONJUGAL UNIONS, SELECTED COUNTRIES, AROUND 1995

Country	Year of survey	Know some method	Know modern method								
			Total	Urban	Rural	Without schooling	Primary uncomp.	Primary complete	Secondary uncomp.	Secondary complete	Higher
Bolivia [a]	1994	84.5	76.7	91.7	54.9	44.7		71.9		82.9	98.4
Brazil	1996	99.9	99.9								
Colombia	1995	99.9	99.9								
Costa Rica [b]	1993	100.0									
Ecuador	1994	92.6	91.8	97.4	84.2	59.7	85.1	93.1	97.3	98.5	99.3
Guatemala	1995	81.8	81.2	91.9	74.2	64.7		86.5		99.8	100.0
Haiti	1994-1995	98.9	98.8								
Jamaica [c]	1993	99.7	99.7	99.7	99.7	99.6	99.4	100.0	99.8		
Mexico	1995	95.4	95.4	97.4	89.6	81.7	94.6	96.1	98.2		
Paraguay	1995-1996	99.4	98.4	99.4	97.5	96.0		99.2			99.6 [b]
Peru [d]	1996	97.8	96.2	99.2	89.7	82.3		94.4		99.5	100.0
Trinidad and Tobago	1987	99.0	98.9	-	-	-	-	-	-	-	-
Dominican Republic	1996	99.7	99.7	100.0	99.3	98.2	99.6	99.9		100.0	100.0

Source: CELADE, on the basis of demographic and health surveys.

[a] Primary complete = Basic; Secondary complete = Intermediate; Higher = Medium or more.

[b] Costa Rica has percentages for every individual method.

[c] Jamaica has information for all women aged from 15 to 49.

[d] Without schooling = 0 - 2 years; Higher = Secondary or over.

Table 20

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN WHO CONSIDER THAT FAMILY PLANNING IS NOT ACCEPTABLE, BY LEVEL OF EDUCATION AND AREA OF RESIDENCE, SELECTED COUNTRIES, AROUND 1995

Country	Year of survey	Without education	Primary	Secondary	Higher	Rural area	Urban area	Total women	Total men
Bolivia	1994	10.3	7.3	7.3	2.7	9.9	3.6	6.0	-
Colombia	1995	8.6	2.6	0.9	0.3	2.9	1.4	1.8	-
Guatemala	1995	29.4	17.0	5.0	0.2	23.3	9.7	17.4	-
Haiti	1994-1995	4.9	5.0	3.0	-	3.6	5.2	4.5	4.4
Peru	1996	15.0	6.9	2.0	1.3	9.7	2.1	4.1	3.7
Dominican Republic [a]	1996	6.7	3.6	1.3	1.0	3.8	2.2	2.8	7.4
Trinidad and Tobago	1987	13.8	6.2	4.8	4.3	6.4	5.5	6.0	[b]

Source: CELADE, on the basis of demographic and health surveys.

[a] In the Dominican Republic there is information available on men by level of education, and a clear difference emerges from this: while the rejection rate is 10.6% among men without education, it is no more than 2% among those with secondary education or above.

[b] 100% approve.

Table 21

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF COUPLES IN WHICH BOTH PARTNERS APPROVE OF FAMILY PLANNING AND PERCENTAGE IN WHICH THE WOMAN APPROVES AND THE MAN DISAPPROVES, BY LEVEL OF EDUCATION AND AREA OF RESIDENCE, SELECTED COUNTRIES, AROUND 1995

Percentage of cases where both approves of family planning						
Country	Without schooling	Primary	Secondary	Higher	Rural area	Urban area
Guatemala	32.0	52.5	83.2	96.8	42.2	68.1
Haiti [a]	79.9	87.6	-	-	-	-
Peru	58.0	77.9	89.3	92.9	73.8	87.1
Dominican Republic [b]	30.5	40.8	44.4	49.8	42.1	41.8
Percentage of cases where the woman approves of family planning and her partner disapproves						
Country	Without schooling	Primary	Secondary	Higher	Rural area	Urban area
Guatemala	9.1	10.3	3.1	1.3	10.0	6.2
Haiti [a]	8.6	3.8	-	-	-	-
Peru	8.4	7.8	5.6	3.5	7.2	5.9
Dominican Republic [b]	14.0	13.6	10.7	6.8	12.1	12.0

Source: CELADE, on the basis of demographic and health surveys.

[a] Without education: neither the man nor the woman had any schooling; primary: both had some schooling.

[b] The low figures for joint approval in the Dominican Republic are due to the fact that almost a third of the women interviewed did not answer the question. Although they are not given in the table, which seeks only to compare two family situations, the percentage figures for couples in which the woman disapproves and the man approves are: 1.6% in the Dominican Republic; 2.6% in Guatemala; 0.8% in Peru and 6.1% in Haiti.

Table 22

LATIN AMERICA AND THE CARIBBEAN: CURRENT USE OF CONTRACEPTIVE METHODS IN TOTAL, FOR MODERN AND TRADITIONAL METHODS, AND BY MARITAL STATUS OF WOMEN, SELECTED COUNTRIES, AROUND 1995

	Survey year	All women			Women currently in unions			Not in unions but active		
Country		Any method	Modern method	Traditional method	Any method	Modern method	Traditional method	Any method	Modern method	Traditional method
Bolivia	1994	30.1	11.9	18.3	45.3	17.7	27.6	-	-	-
Brazil	1996	55.4	51.0	4.2	76.7	70.3	6.1	-	-	-
Colombia	1995	48.1	39.5	7.6	72.2	59.3	11.1	74.9	56.8	17.6
Costa Rica	1993	-	-	-	75.0	65.0	10.0	-	-	-
Ecuador	1994	35.3	-	-	56.8	-	-	-	-	-
El Salvador	1993	33.8	-	-	53.3	-	-	-	-	-
Guatemala	1995	21.4	18.4	2.9	31.4	26.9	4.5	41.7	35.4	6.2
Haiti	1994-1995	12.3	8.9	3.2	18.0	13.2	4.4	28.1	13.8	14.3
Nicaragua [a]	1992-1993	33.8	-	-	48.7	-	-			
Paraguay	1995-1996	36.8	29.6	7.2	50.7	41.3	9.5	-	-	-
Peru	1996	40.9	26.4	14.6	64.2	41.3	22.9	76.6	46.0	30.6
Jamaica [b]	1993	48.3	47.8	0.5	61.9	61.2	0.7	60.7	60.2	0.5
Barbados	1988				55.0	53.3	1.7			
Bahamas	1988				61.7	58.8	2.9			
Dominican Rep.	1996	44.6	41.3	3.0	63.7	59.2	4.0	63.2	51.8	11.3
Trinidad and Tobago	1987	37.4	31.5	-	52.7	44.4	8.3	-	-	-

Source: CELADE, on the basis of demographic and health surveys.

[a] Has figures broken down by civil status and type of method.

[b] Has figures for opinions on the efficacy of methods.

[c] Gives information for women aged 15 to 19 only.

Table 23

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN IN CONJUGAL UNIONS WHOSE FAMILY PLANNING NEEDS WERE UNMET, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

		Area of residence			Level of education			
Country	**Year of survey**	**Total**	**Urban**	**Rural**	**Without schooling**	**Primary completed**	**Secondary completed**	**Higher**
Bolivia	1994	24.3	17.7	33.8	35.8	29.1	21.5	12.1
Brazil	1996	7.3	6.0	12.5	15.4	7.7	4.6	2.6
Colombia	1995	7.7	6.5	10.5	13.1	9.2	6.5	3.8
Ecuador	1994	8.8	6.5	12.1	19.3	11.8	5.8	3.6
El Salvador [a]	1993	15.8	12.1	20.5	14.9	10.8	5.9	4.3
Guatemala	1995	24.3	17.4	28.9	29.8	25.8	10.9	2.7
Haiti [b]	1994-1995	47.8	45.1	49.4	48.2	49.4	-	42.2
Mexico	1995	14.1	11.3	21.9	-	-	-	-
Nicaragua [a,b]	1992-1993	23.9	15.1	34.4	30.5	18.3	9.4	5.5
Paraguay	1995-1996	27.4	19.1	36.0	49.9	40.0	18.5	80
Peru	1996	12.1	8.6	19.6	23.3	15.1	9.8	5.2
Dominican Rep.	1996	12.5	10.4	15.7	20.4	12.9	11.6	5.8

Source: CELADE, on the basis of demographic and health surveys.

[a] Higher = Secondary and over.

[b] Information on the level of education is given for all women. Primary uncompleted = 21.3, Primary completed = 12.5.

Table 24

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN IN CONJUGAL UNIONS WHO ARE STERILIZED, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

	Area of residence			Level of education	
Country and year	**Total**	**Urban**	**Rural**	**Without schooling**	**Higher education**
Belize, 1991	18.7				
Bolivia, 1994	4.6	6.2	2.3	1.9	7.4
Brazil, 1996	40.1	40.6	38.0	45.7	35.7
Colombia, 1995	25.7	25.8	25.6	28.6	25.2
Costa Rica, 1993	19.7	29.0	13.0	-	-
Ecuador, 1994	19.8	23.8	14.4	12.3	23.0
El Salvador, 1993	31.9	36.9	28.2	32.4	25.2
Guatemala, 1995	14.3	20.9	9.9	9.0	23.9
Haiti, 1994-1995	3.1	3.1	3.1	3.7	1.7
Honduras, 1991-1992	15.6				
Jamaica, 1993	12.5			19.3	11.8
Nicaragua, 1992-1993	18.5	22.3	16.3	16.1	16.4
Mexico, 1995	27.0				
Paraguay, 1995-1996	6.8	7.0	6.5	8.9	7.7
Panama, 1984	32.8				
Peru, 1996	9.5	11.3	5.4	6.7	10.4
Dominican Rep., 1996	40.9	40.7	41.2	42.6	38.2
Trinidad and Tobago, 1987	8.2	7.8	8.6	13.9	7.4

Source: CELADE, on the basis of demographic and health surveys.

Table 25

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF ALL CONTRACEPTIVE METHODS USED BY WOMEN IN CONJUGAL UNIONS THAT IS ACCOUNTED FOR BY STERILIZATION, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

Country and year		Area of residence		Level of education	
	Total	Urban	Rural	Without schooling	With higher education
Bolivia, 1994	10.2	11.3	7.3	8.4	11.2
Brazil, 1996	52.3	51.6	54.9	71.3	42.6
Colombia, 1995	35.6	34.7	38.2	49.3	32.7
Costa Rica, 1993	26.3	37.7	18.6	-	-
Ecuador, 1994	34.9	36.1	32.7	47.3	31.0
El Salvador, 1993	59.8	55.6	65.9	74.7	37.3
Guatemala, 1995	45.5	42.7	50.0	63.8	33.1
Haiti, 1994-1995	17.2	11.7	24.2	32.7	5.0
Jamaica, 1993	20.2	-	-	32.9	17.6
Nicaragua, 1992-1993	38.0	35.6	49.1	56.5	23.7
Mexico, 1995	40.6	0.0	0.0	-	-
Paraguay, 1995-1996	13.4	12.5	14.4	27.3	12.0
Peru, 1996	14.8	16.1	10.5	17.5	13.8
Dominican Rep., 1996	64.2	61.3	69.2	80.2	58.6
Trinidad and Tobago	15.6	14.5	16.6	34.0	10.9

Source: CELADE, on the basis of demographic and health surveys.

Table 26

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF PREGNANT WOMEN WHO HAVE PRENATAL MONITORING, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

Countries		Area of residence		Level of education			
	Total	Urban	Rural	None	Primary	Secondary	Higher
Bolivia	52.5	67.9	35.5	21.1	41.8	69.5	84.6
Brazil	85.6	91.4	67.8	54.6	86.3	97.1	100.0
Colombia	82.6	89.6	69.8	47.1	74.9	93.3	99.1
Costa Rica	95.0	95.5	95.0	87.0	96.0	96.0	98.0
Ecuador	74.7	82.9	66.1	47.1	66.9	87.3	94.8
El Salvador	68.7	76.1	61.2	51.9	66.2	84.5	91.5
Guatemala	52.5	70.8	43.7	35.2	88.0	93.5	99.8
Haiti	67.7	82.5	60.6	52.8	80.6	94.3	94.3
Jamaica	97.8	97.4	98.9	-	98.2	98.4	100.0
Mexico	95.0	94.8	86.5	-	-	-	-
Nicaragua	71.5	78.9	64.8	50.9	71.0	89.3	96.1
Paraguay	83.0	90.8	77.3	60.0	85.1	98.4	95.0
Peru	67.3	81.4	46.8	38.5	55.1	82.5	95.0
Dominican Rep.	98.3	99.0	97.2	92.4	98.6	99.7	100.0
Trinidad and Tobago	97.6	96.6	98.4	98.5	97.8	97.1	98.8

Source: CELADE, on the basis of demographic and health surveys.

Table 27

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF BIRTHS IN THE 5 YEARS PRIOR TO THE SURVEY THAT WERE ATTENDED BY TRAINED PERSONNEL (DOCTOR/NURSE/MEDICAL ORDERLY/HEALTH WORKER), BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

Countries		Area of residence		Level of education			
	Total	Urban	Rural	None	Primary	Secondary	Higher
Bolivia [a]	47.2	66.2	26.2	12.2	33.1	61.4	86.5
Brazil	87.6	92.3	73.3	66.0	87.0	95.6	99.7
Colombia	84.6	92.8	69.7	55.6	75.1	95.0	99.6
Costa Rica [b]	97.0	99.0	96.0	93.0	96.0	98.0	98.0
Ecuador	64.8	84.3	41.9	25.8	98.1	99.2	96.5
El Salvador [c]	51.0	68.3	33.6	30.7	44.7	74.1	85.5
Guatemala	34.8	63.4	21.1	15.0	36.3	88.8	96.7
Haiti	46.3	66.9	36.4	32.3	53.4	73.4	81.7
Jamaica	93.4	94.8	92.8	-	90.1	96.0	97.3
Mexico [d]	85.1	94.0	66.0	-	-	-	-
Nicaragua	61.0	83.7	41.9	33.3	59.4	85.8	91.3
Paraguay	56.8	76.1	42.6	29.7	99.3	99.2	90.9
Peru	56.4	80.6	21.5	17.0	33.6	78.9	93.1
Dominican Rep.	95.5	97.8	92.2	80.7	95.4	98.0	99.6
Trinidad and Tobago	97.7	98.3	97.2	95.5	97.5	97.8	99.5

Source: CELADE, on the basis of demographic and health surveys.

[a] Three years prior to the survey.

[b] Latest child born alive during the last five years.

[c] Births that took place in hospitals.

[d] Doctors only, excludes nurses/midwives.

Table 28
LATIN AMERICA AND THE CARIBBEAN: MATERNAL MORTALITY, SELECTED COUNTRIES, AROUND 1995

Countries	Maternal mortality rate (per hundred thousand births
Bolivia	332
Brazil	72
Costa Rica	26
Ecuador	150
El Salvador	140
Guatemala	106
Mexico	58
Paraguay	150
Peru	298
Dominican Republic	84
Trinidad and Tobago	68

Source: CELADE, direct estimates on the basis of the series of demographic and health surveys for the following countries and years: Bolivia, 1989-1994; Brazil, 1983-1986; Ecuador, 1988-1994; El Salvador, 1983-1993; Guatemala, 1990-1995; Paraguay, 1989-1995; Peru, 1989-1996. The data for the Dominican Republic were obtained indirectly, being drawn from the demographic and health surveys for the period 1989-1996. In the case of Mexico, use was made of the estimates of the National Population Council (CONAPO) based on recorded deaths.

Table 29

LATIN AMERICA AND THE CARIBBEAN: INFANT MORTALITY RATE IN TOTAL, BY AREA OF RESIDENCE AND BY LEVEL OF EDUCATION, AND RELATIVE DIFFERENCES BETWEEN URBAN AND RURAL AREAS AND BETWEEN TOP AND BOTTOM EDUCATIONAL GROUPS, SELECTED COUNTRIES, AROUND 1995

Country and year	Total	Urban	Rural	No schooling	Basic	Medium	Higher	Rural / urban gap	Gap between higher education and no schooling
Bolivia, 1994[a]	87.0	69.0	106.0	122.0	103.0	62.0	38.0	34.9	221.1
Brazil, 1996[b]	48.0	42.0	65.0	93.0	48.8	28.0	-	35.4	232.1
Chile, 1995	11.7	11.2	14.6	30.3	14.4	10.0	5.9	23.3	413.6
Colombia, 1995	31.0	28.0	36.0	27.0	37.0	29.0	7.0	22.2	285.7
Ecuador , 1994[c]	40.0	30.0	52.0	79.0	44.0	31.0	11.0	42.3	618.2
El Salvador , 1993[d]	41.0	36.4	44.0	38.0	46.4	42.0	24.0	17.3	58.3
Guatemala, 1995	57.0	45.0	63.0	70.0	54.0	27.0	23.0	28.6	204.3
Haiti , 1994-1995[e]	87.1	83.2	88.9	95.2	78.4	75.6	-	6.4	-
Mexico, 1991-1995	30.5	26	48	48.0	44.0	36.0	20.0	45.8	140.0
Nicaragua, 1992-1993[f]	60.0	51.0	68.0	73.0	63.5	46.0	29.0	25.0	151.7
Peru, 1996	50.0	35.0	71.0	79.0	62.0	32.0	26.0	50.7	203.8
Dominican Rep., 1996[g]	49.0	46.0	53.0	85.0	53.5	34.0	20.0	13.2	325.0

Source: CELADE, on the basis of demographic and health surveys. For Chile: CELADE, on the basis of National Institute of Statistics (INE), *Anuario de Demografía*, 1995. For Mexico: CONAPO, *La situación demográfica de México*, Mexico City, 1997.

[a] Medium: intermediate; Higher: medium or over.
[b] Medium: 9 to 11 years old; Higher: not calculated as based on less than 500 cases; Basic: a weighted average was calculated for the 1 to 3 years group (70), 4 (42) and 5 to 8 years (38). Births in the last 5 years were considered.
[c] High: 27; Medium: 38; Low: 56.
[d] Metropolitan area: 38; Other urban: 35; Basic: 1 to 3 years (53) and 4 to 6 years (39); Medium: 7 to 9 years; Higher: 10 and over.
[e] Medium and over.
[f] Secondary uncompleted; Higher: secondary and over; Primary uncompleted: 70; Primary completed: 46.
[g] Same structure as Brazil (1 to 4 years: 66, 5 to 8 years: 46).

Table 30

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGES OF MEN AND WOMEN WHO KNOW ABOUT AIDS, BY AREA OF RESIDENCE AND LEVEL OF EDUCATION, SELECTED COUNTRIES, AROUND 1995

Country	Sex	Total	Area of residence		Level of education			
			Urban	Rural	None	Primary	Secondary	Higher
Bolivia	Women	65.6	85.3	32.7	20.1	47.2	72.3	95.7
Colombia	Women	98.8	99.6	96.5	93.6	97.6	99.9	-
Guatemala	Women	71.0	88.9	57.4	40.8	74.8	98.8	-
Haiti	Women	98.1	99.6	96.9	96.1	98.8	99.9	-
	Men	97.6	99.9	96.3	93.0	98.7	100.0	-
Jamaica	Women	99.6	99.7	99.5	99.3	99.5	99.8	99.8
	Men	99.8	100.0	99.6	99.7	99.8	99.9	99.6
Peru	Women	89.2	97.9	65.1	47.1	77.0	98.2	99.9
	Men	95.5	-	-	-	-	-	-
Dominican Rep.	Women	99.7	99.9	99.2	96.9	99.9	100.0	-
	Men	99.7	100.0	99.4	98.6	100.0	99.9	100.0

Source: CELADE, on the basis of demographic and health surveys.

Table 31

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN WHO CLAIMED TO KNOW THAT AIDS WAS PREVENTABLE, BY AREA OF RESIDENCE AND LEVEL OF SCHOOLING, SELECTED COUNTRIES, AROUND 1995

Country	Area of residence		Level of schooling		
	Urban	Rural	Without education	Primary	Secondary
Bolivia	76.8	50.3	-	-	-
Colombia	97.7	94.0	88.3	94.2	98.8
Guatemala	92.0	84.6	83.2	85.1	86.3
Peru	95.1	85.8	87.2	88.2	94.0
Dominican Rep.	96.8	93.7	91.1	95.0	98.3

Source: CELADE, on the basis of demographic and health surveys.

Table 32

LATIN AMERICA AND THE CARIBBEAN: PERCENTAGE OF WOMEN WHO SAID THEY DID NOT KNOW HOW TO PREVENT AIDS, BY AREA OF RESIDENCE AND LEVEL OF SCHOOLING, SELECTED COUNTRIES, AROUND 1995

Country	Area of residence		Level of schooling		
	Urban	Rural	Without education	Primary	Secondary
Colombia	6.1	20.5	38.6	18.2	2.9
Guatemala	24.5	51.5	65.8	46.1	9.6
Peru	15.1	50.0	61.5	43.8	16.9
Dominican Rep.	2.3	6.0	12.0	3.4	0.7

Source: CELADE, on the basis of demographic and health surveys.