REPORT OF THE
DEPARTMENTS OF HEALTH,
MENTAL HEALTH AND MENTAL RETARDATION,
AND SOCIAL SERVICES STUDYING

The Prevention of Infant Mortality with Emphasis on The Minority Population

TO THE GOVERNOR AND
THE GENERAL ASSEMBLY OF VIRGINIA

Senate Document No. 10

COMMONWEALTH OF VIRGINIA
RICHMOND
1985

COMMONWEALTH of VIRGINIA

Office of the Governor

Richmond 23219

Joseph L. Fisher
Secretary of Human Resources

January 8, 1985

TO: Members of the General Assembly

FROM: Joseph L. Fisher, Secretary of Human Resources

SUBJECT: Senate Joint Resolution 39 - A Study on the Prevention of Infant Mortality with Emphasis on the Minority Population

Pursuant to Senate Joint Resolution 39, the Departments of Health, Mental Health and Mental Retardation, and Social Services have completed a study on "The Prevention of Infant Mortality with Emphasis on the Minority Population." The executive summary of this study is being submitted to the 1985 session of the General Assembly. The full report of this study can be obtained from the Department of Social Services.

The report presents Virginia and national data related to infant mortality, Virginia data related to risk factors associated with infant mortality, summaries of written documents related to infant mortality as prepared by Virginia agencies and organizations, and summaries of national activities in the prevention of infant mortality. The report also presents data collected from a State agency survey on programs and services related to the prevention of infant mortality and data collected from public comment sessions across the State on the prevention of infant mortality. The report finally presents an Advocacy Register for the prevention of infant mortality.

The report concludes with nine recommendations that were developed from findings of the study. Some of the recommendations address actions that are either currently underway or will be implemented in the future and are included to ensure their recognition and support. Other recommendations require action. The recommendations are presented in three categories.

1. Increased Services to Clients/Consumers to Prevent Infant Mortality

   - Support the local health department's delivery of services
   - Promote implementation of locally appropriate prevention strategies
   - Strengthen Virginia's Early and Periodic Screening, Diagnosis and Treatment (EPSDT) Program
   - Ensure the comprehensive implementation of the Child Health Assurance Program (CHAP) provisions
   - Expand Preterm Birth Prevention Programs for statewide coverage
   - Strengthen Family Life Education in public schools

2. Administrative Changes that Lead to Prevention of Infant Mortality

   - Broaden representation of members of the Perinatal Services Advisory Council
   - Remain abreast of the Southern Regional Infant Mortality Task Force efforts

3. Further Study of the Infant Mortality Program in Virginia

   - Study the population/consumer of services in high risk areas.

Executive Summary

Senate Joint Resolution 39

A STUDY ON THE PREVENTION OF INFANT MORTALITY WITH EMPHASIS ON THE MINORITY POPULATION

Prepared by:

Virginia Department of Health
Virginia Department of Mental Health and Mental Retardation
Virginia Department of Social Services

with assistance from:

Division for Children
Virginia Perinatal Association

January, 1985

Purpose:

The Departments of Health, Mental Health and Mental Retardation, and Social Services were charged by Senate Joint Resolution 39 with the task of studying the prevention of infant mortality in Virginia, with emphasis on the minority population. Together with the Division for Children and the Virginia Perinatal Association, they devised a comprehensive plan for carrying out the study, given the time restrictions placed on the study.

Method:

The first task of the study was to compile available data and perspectives on infant mortality from Virginia, the southern states and the nation. This information documents the scope of the problem, associated risk factors and prevention strategies.

Second, information on approximately thirty State programs or services that contribute to the prevention of infant mortality was collected. This information included a description of each program or service, reported funding and expenditures, strengths and perceived limitations of the programs or services as they relate to infant mortality and future plans that may impact infant mortality. An estimation of clients served, particularly minorities, was also included.

Third, on the premise that consumer input might have a different focus than that of providers, or possibly reiterate the current emphasis placed on certain aspects of the problem, comments from consumers were solicited. The Virginia Council of Churches offered to assist with the study by arranging "public forums" in communities in which infant mortality rates, especially minority rates, were known to be high. The Department of Health participated through its Community Health Services by providing the local health director (a physician) or delegate to give a short presentation and show slides about the problem. The church leaders were given other materials to use as necessary.

The fourth task of the study was to compile a register of advocacy groups concerned with infant mortality. The Virginia Perinatal Association conducted the task and the register is available upon request from the Department of Social Services.

Finally, an advisory committee composed of representatives of State agencies and advocacy groups was convened to assist with the study. The advisory committee assisted by obtaining the public comment mentioned previously, by submitting information included in the advocacy register and by reviewing the draft of the study in order to assist in developing recommendations for prevention of infant mortality.

Following these five tasks, the agencies compiled a report on infant mortality in Virginia with emphasis on the minority population. Because the most sensitive indicator of the health status of a population is generally considered to be the infant mortality rate (the number of infants who die before their first birthday per thousand live births), this report is of particular importance. In Virginia, infant mortality merits attention because the rates are high, especially for the minority population, and the situation must be corrected. Because the future of the Commonwealth depends on the health and well-being of its next generation's citizens, Virginia's problem of infant mortality dictates the need for immediate preventive action.

Findings:

The outstanding facts that raise concern for Virginia's infant mortality problem are that not only do Virginia's rates rank considerably high in the country, but also that over the past two decades, the rates for non-whites have been approximately double that of the white race. In 1983, Virginia's infant mortality rate was 12.2 per thousand live births which was a decrease from 1982 when it was 12.9 per thousand live births. Although the overall rate decreased in one year, the minority rate increased and the disparity between the races remains significant. In 1982, the non-white infant mortality rate was 19.3 and the white rate was 10.7. In 1983, the non-white rate increased to 19.8 and the white rate decreased to 9.6.

Approximately 72.8 per cent of the infant deaths in 1982 occurred in infants under one month of age, and overall, the most frequent "cause of death" as recorded on the death certificate was perinatal conditions. These conditions reflect an unsuccessful process of pregnancy, labor and delivery, rather than a specific disease in the mother or the infant. Again, the disparity between the races is significant as the rate of infant mortality due to perinatal conditions for non-whites was more than twice as high than for whites: 12.4 per thousand live births to 5.4 per thousand live births, respectively.

One of the most important factors associated with infant mortality is low birth weight. Infants weighing 5 lbs. 8 oz. (2500 grams) or less at birth have a greater chance of dying than normal weight infants. Once more, data for Virginia indicate that the non-white low birth weight rates continue to be more than double the white rates. Data from 1982 for Virginia indicate that 12.1 percent of non-white infants were low birth weight as compared with 5.7 percent of white infants. Furthermore, the percentage of low birth weight in the United States in 1981 was 11.4 for non-whites and 5.7 for whites. Other data indicate that the perinatal conditions are contributing to the infant's ill health and not the lack of hospital care for infants under one month of age.

In addition to the difference in rates between non-white and white populations, differences in rates occur throughout the State. All areas of the State do not share equally the problems of infant mortality and low birth weight. This finding is an important one in that the reasons for the variance in rates probably differ also. Thus, intervention strategies should be highly specific to individual areas. Because many eligible persons of prechildbearing and childbearing age either do not currently utilize or underutilize perinatal education and health care services, attention must be given to the barriers in high risk areas. These barriers may exist as a result of a combination of diverse socioeconomic, cultural and geographical characteristics within a locality. The State agency surveys revealed certain perceived program limitations, which are discussed later in this summary. These reported limitations together with the overall study findings suggest that intervention strategies address the barriers that face consumers of the system and that they be highly specific to individual localities. Common systematic barriers may exist, i.e., transportation problems in rural areas or conflicts with work schedules due to limited clinic hours. However, other barriers may be less common and more difficult to overcome. For instance, cultural traditions may dictate ignorance and/or mistrust of technological medical systems, or certain groups may regard the mother (or mother figure) as a source of information concerning pregnancy and health more often than a doctor or nurse.

Furthermore, other factors of social significance have been associated with maternal and infant health. They include the age and education level of the mother, marital status/legitimacy, and prenatal care, which are obtained from birth certificates. Because the chance of an infant death or low birth weight baby is neither uniformly nor simplistically affected by these demographic factors obtained from the birth and death certificates, the stereotype of the high risk mother as "teenage, non-white, uneducated and unmarried" may have serious programmatic limitations. For instance, this study revealed that while teenage mothers in both races are at high risk, it is the non-white female age 20-34 who is at much higher risk than her white counterpart. Also, in the non-white population, the 20-34 age group accounts for more than two-thirds of the deaths (as is true in the white population). Also, the current data suggest that with increased education, the non-white infant mortality rate does not decrease greatly, and that the college educated non-white mothers experience a higher infant mortality rate than white mothers with elementary education. In addition to age and education, legitimacy is also obtained from the birth certificate and is defined for statistical purposes as the circumstance in which the mother is married to the father of the infant at the time of birth or at any time during the previous ten months. Legitimacy has been associated with a decreased risk of low birth weight and infant mortality for both races. This phenomenon in Virginia is substantiated nationwide in recent large studies. Prenatal care is another data item recorded on birth certificates that is associated with infant mortality; however, the data on the number and timing of prenatal visits are subject to the mother's memory and accurate recording. This data item has been used to look at statewide trends, and these show a tendency for non-whites to begin care after the first trimester somewhat more often than whites. The information in the report suggests that these sociodemographic factors are influential determinants of infant mortality. It is clear that these factors require ongoing analysis, especially for the minority population, if prevention measures are to be based on the findings.

Similarly, socioeconomic information, e.g., poverty, family structure, unemployment and possesion of health insurance, is considered to be related to infant mortality; however, data for specific indicators are currently not directly linked to the population of mothers experiencing high rates of infant mortality. The association between poverty and infant mortality merits further study in Virginia as connections have been made in Maine. Children's Deaths in Maine: 1976-1980, Final Report is a study of childhood deaths in Maine within these five years, conducted by the Maine Department of Human Services. Part of the study, which looks at the deaths from the perspective of their distribution by cause and age in the low income population, reveals that the death rate for children in low income families was more than three times higher than the rate for children in other populations. Another factor that probably contributes to a sizeable share of infant deaths and low birth weight infants is unplanned births to high risk mothers. Although there is detailed information for certain providers of family planning services, no comprehensive information is available to document utilization by all women in need of services in Virginia.

After identification of the determinants of infant mortality, the work group examined current state efforts, including Virginia and the southern states, to prevent infant mortality. One of the study tasks was to review existing Virginia documents that the five agencies felt most germane to the issue in Senate Joint Resolution 39. Although the six documents that the agencies submitted do not specifically address infant mortality with minority emphasis, they contribute to

the background knowledge of the issue. National activities also offer some insight into the background for prevention initiatives. Some examples of pertinent issues that are addressed on a federal level are: improvement of data collection related to infant mortality; expansion of Medicaid eligibility to include all children and pregnant women at or below poverty level; and enhancement of education on prenatal and infant care. An important regional effort currently underway is the Southern Regional Infant Mortality Task Force, created July 1984 by the Southern Governor's Association in response to a resolution sponsored by Governor Robb. The purpose of the Task Force is to promote initiatives to narrow the infant mortality gap between the South and the rest of the country, and to reduce the incidence of infant mortality and low birth weight throughout the region..."

The information on states' programs is limited due to a variety of reasons, but chiefly because the country is at a very early state of the art, and data on the success of new initiatives are not yet available. Brief summaries of seven southern and fifteen non-southern states' initiatives designed to reduce infant mortality and low birth rate weights are included in the study. Generally, the issues that are addressed include: preterm birth prevention, adolescent pregnancy, outreach to encourage utilization of perinatal services, elimination of barriers to perinatal services, in-service education programs for nurses and physicians, and coordination of other services with well-baby care. Overall, the programs attempt to locate and provide services to high risk populations in order to prevent infant mortality. The Preterm Birth Prevention Program in Virginia is one such initiative that is a carefully monitored and nationally backed pilot program designed to reduce the number of preterm births. This program is modeled after the program by Dr. Robert Creasy at the University of California, San Francisco, in which preterm delivery was reduced from 6.75 percent to 2.4 percent. Serving those who attend prenatal clinics at Virginia's three medical schools and at local health departments in those same areas, the program provides for identification of mothers at risk, weekly prenatal visits, patient education, and treatment with tocolytic agents for women in early labor.

The information on Virginia's State agency programs and services obtained from the State agency surveys suggests a need for continuation of action to prevent infant mortality. Although the purpose of accumulating information on State agency programs and services was to understand how and to what extent infant mortality was already being addressed in the State, and no conclusions per se can be drawn concerning the effectiveness of the programs in this capacity, the information certainly offers a basis on which to direct future plans to prevent infant mortality. The majority of the reported perceived limitations were funding and staff related and included such problems as limited clinic hours, limited availability of resources, and inability to implement programs in some areas. Also, some survey respondents reported that poor linkages contributed to problems of low visibility within the community. The recommendations of the report include means by which services to the populations at high risk can be assured.

In addition, the majority of the responses solicited during the public forums reiterated the need to expand services to the public regarding, for example, enhanced Family Life Education. Currently, Family Life Education, which is administered by the Department of Education, provides preventive education and training, such as nutrition, child and substance abuse, mental health and family relationships, to students from kindergarten through grade ten. This curriculum

places relatively greater emphasis on the development of self-respect and self-control than on birth control methods. The participants in the public forums cited motivation and attitudes of young people as elusive factors contributing to unwanted pregnancy, and considered expansion of such services related to maternal and infant health to be a responsibility primarily of the community, schools and churches.

Quite often existing programs that affect infant mortality have proved to be cost effective. For instance, a study of WIC (Special Supplemental Feeding Program for Women, Infants and Children) found that treating low birth weight after birth is three times more expensive than preventing it through WIC. Also, a review of a report on EPSDT (Early and Periodic Screening, Diagnosis and Treatment) in Virginia included in the "Written Documents" section of the study revealed that certain administrative changes would further increase the effectiveness of the program, as it relates to infant health, while maintaining cost efficiency. Study of EPSDT by other states found that full utilization of EPSDT resulted in substantial savings to Medicaid, as children screened and treated through the program had significantly lower costs for later EPSDT services than children who had not participated in the program. Similarly, the recommendations developed and submitted with the report are considered to be cost effective because their successful implementation will allow the State to avoid the high costs of neonatal intensive care and rehospitalization costs for infants born at risk.

To dismiss the problem of infant mortality in Virginia would be to deny the importance of healthy and productive future generations. Although, infant mortality rates may decrease aggregately, the non-white rates continue to increase. It is certainly crucial to devise strategies for prevention.

Recommendations:

Nine recommendations were developed based on the study on infant mortality by the three agencies, the Division for Children, the Virginia Perinatal Association, and the Advisory Committee. The five recommendations designated by asterisk are those the Advisory Committee felt to be of highest priority. Four of the recommendations address actions that are either currently underway or will be implemented in the future and are included to ensure their recognition and support. Overall, the findings drawn from this study reveal certain immediate prevention measures. The recommendations specify exactly where and how the measures should be implemented in order to efficiently ensure quality services for prevention of infant mortality. The recommendations are presented in three categories:

1) Increased Services to Clients/Consumers to Prevent Infant Mortality

- Support the local health departments' delivery of services
- Promote implementation of locally appropriate prevention strategies
- Strengthen Virginia's Early and Periodic Screening, Diagnosis and Treatment (EPSDT) Program
- Ensure the comprehensive implementation of the Child Health Assurance Program (CHAP) provisions
- Expand Preterm Birth Prevention Programs for statewide coverage
- Strengthen Family Life Education in public schools

2) Administrative Changes That Lead to Prevention of Infant Mortality

- Broaden representation of members of the Perinatal Services Advisory Council
- Remain abreast of the Southern Regional Infant Mortality Task Force efforts

3) Further Study of the Infant Mortality Problem in Virginia

- Study the population/consumers of services in high risk areas.

*1. Recommendation:

Provide interdisciplinary preventive health services to mothers and infants in more of the State's high risk localities by providing extra funding to certain local health departments.

Rationale:

The study demonstrated Virginia's unique situation of striking regional variability in maternal and infant health status indicators, particularly in the minority population. Additionally, a similar situation exists with socioeconomic status. Since 1982, the Bureau of Maternal and Child Health has identified geographical focus areas for prevention activities. In 1983 and 1984, thirteen districts chosen on a basis of a low birth weight rate significantly higher than the rest of the State were awarded funds to augment their services. In areas where information is available, there has been a decrease in the infant mortality and low birth weight rates in the health departments where such extra funds were provided.

Recently, a Relative Risk Tool was developed to locate counties within districts that are high risk on the basis not only of health indicators, but also sociodemographic and socioeconomic factors. This method will assist in determining where augmentation of local efforts is needed.

On the following pages are maps showing the risk areas and the Perinatal Projects funded by the Bureau of Maternal and Child Health (with Federal Maternal and Child Health Services Block Grant money). The new areas that will be targeted are:

Planning District 3 (Smyth, Wythe, Washington, Bland)
Planning District 1 (Lenowisco)
Planning District 4 (Giles)
Planning District 21 (Newport News/Peninsula)
Planning District 17 (Northern Neck)
Planning District 18 (Middle Peninsula)
Planning District 15 (Goochland)

"Altering the economic, cultural and behavioral factors which are associated with low weight births (e.g., unmarried mothers, inadequate diet, smoking, inappropriate age for childbearing, insufficient prenatal care) is a task which goes well beyond the scope and capabilities of the medical care system. Based on present medical knowledge, the high rate of low weight births must be approached as a multi-faceted societal problem, not simply a medical care problem if substantial progress is to be made in reducing the low birth weight rate." (Virginia State Health Plan)

Because local health departments are primary providers to many of Virginia's high risk women, it is appropriate that they have professional staffing which reflects the admixture of services with potential to prevent these problems. These are:

Public Health Nurses:
Provide the crucial link between an individual mother and infant and all the services she may need for optimum health care. The nurse is often the first contact and remains responsive to any follow-up needed. Enter the home of many high risk mothers to ensure the appropriateness of measures prescribed and gain understanding to pass on to the other service providers.

Public Health Nutritionists:
Visit local health departments on a regular basis to accept referrals of high risk women in order to provide individual nutritional assessment and counseling. Provide consultation and in-service education to the staff.

Social Workers:
Are knowledgeable about internal (family) and external (community) resources available to a high risk mother to help her adapt to her situation; this professional may provide individual client services or advise a health department staff about ongoing programs suitable for many patients.

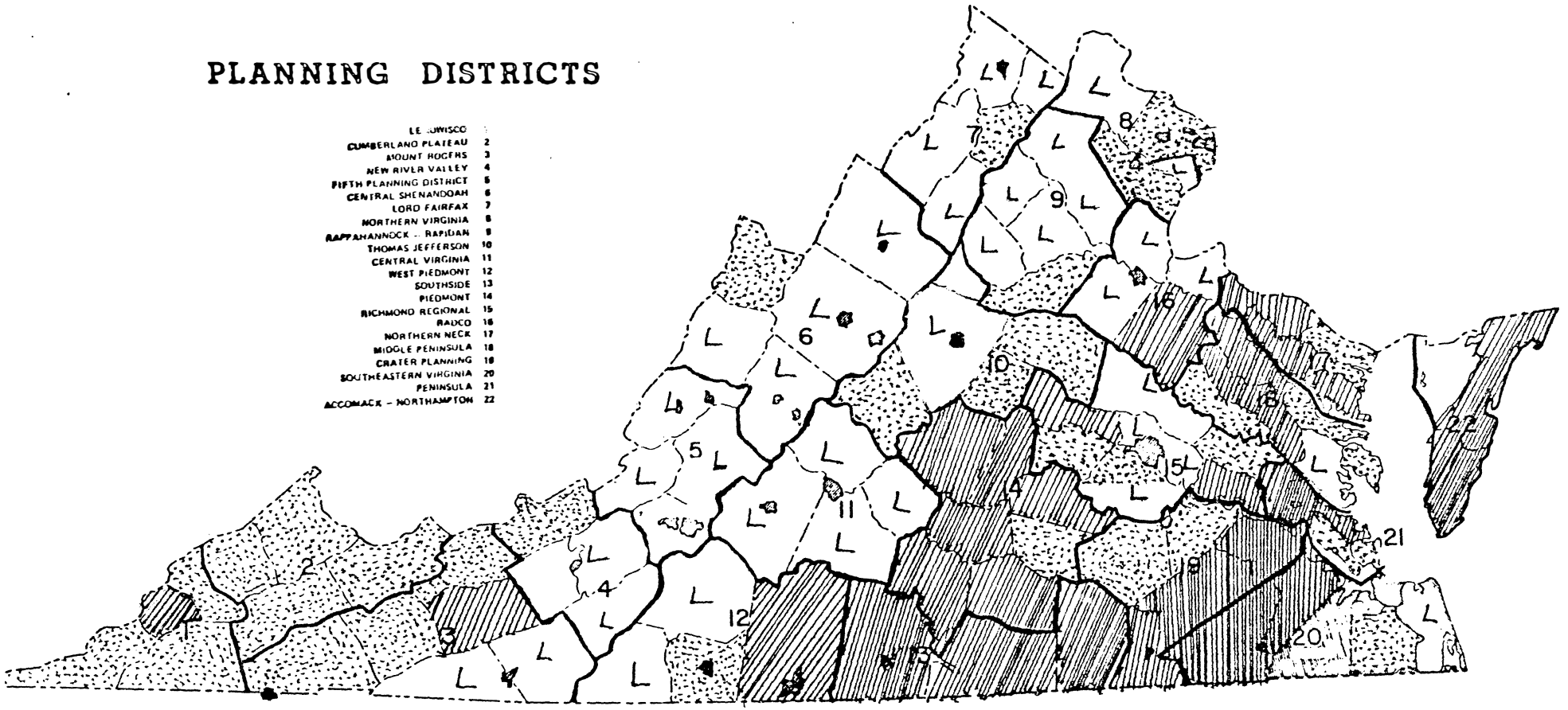
Health Educators:
Are knowledgeable about health promotion and disease prevention and the most effective way to instill knowledge and change behaviors; the educator may work on an individual basis with high risk mothers, but is more likely to provide program planning for group teaching sessions and community outreach and education.

"Outreach", which includes a variety of activities aimed primarily at those in the community that are not currently utilizing services, is an important component of the perinatal projects. Outreach is conducted with locally appropriate techniques, and its activities may vary from public awareness campaigns via the media to door-to-door informing of potential clients about services.

Plan:

For FY 1985, the Federal Maternal and Child Health Services Block Grant to Virginia was increased. Use these funds to enhance interdisciplinary and outreach activities at local health departments not currently receiving extra funds which are located in geographic areas known to have either indicators of poor outcomes of pregnancy or potential for such problems.

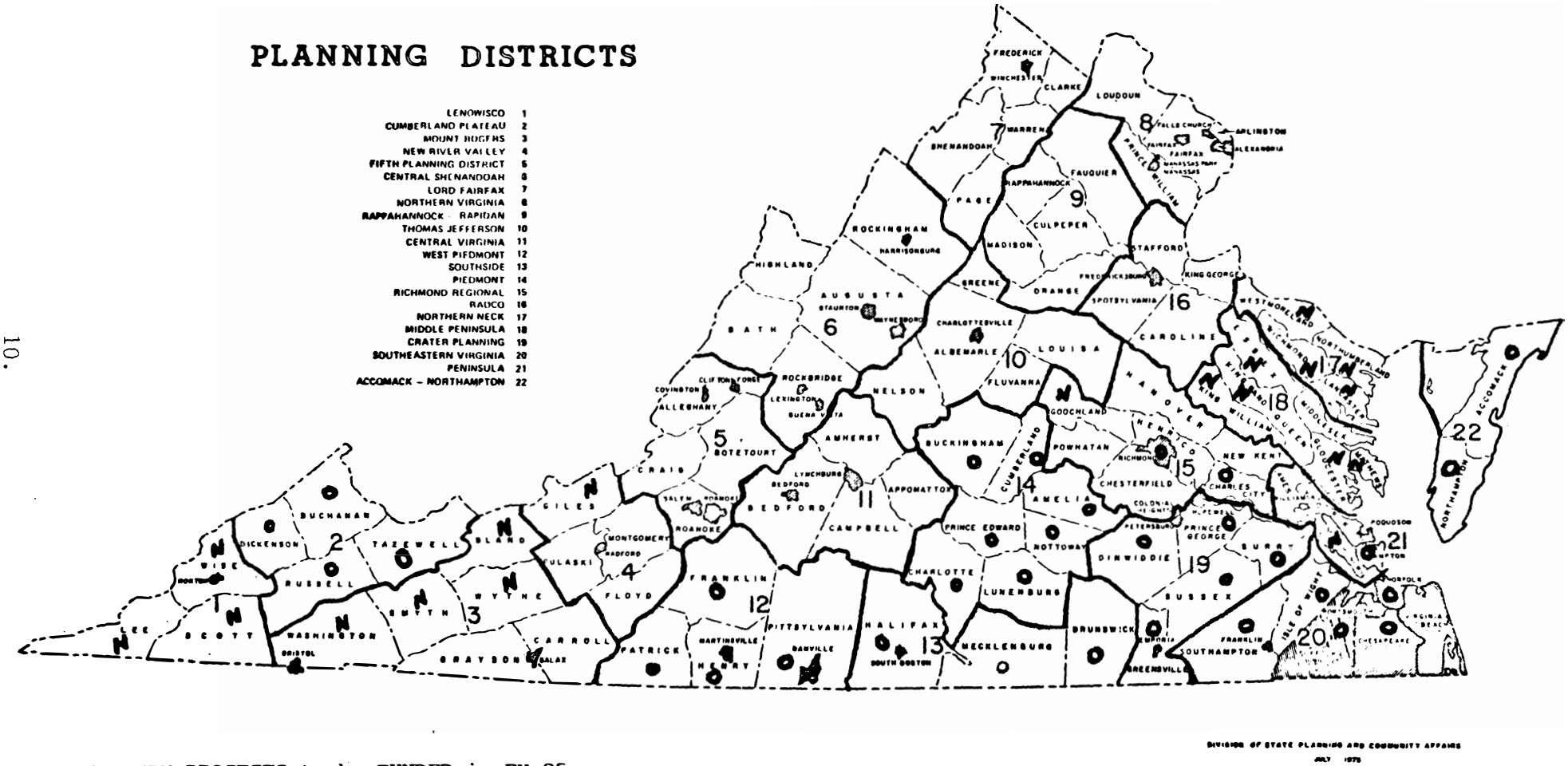
PLANNING DISTRICTS



L = LOW RISK AREA

= MODERATE RISK AREA

= HIGH RISK AREA



N = NEW PROJECTS to be FUNDED in FY-85

O = FUNDED PRIOR to FY-85

*2. Recommendation:

Promote implementation of locally appropriate prevention strategies in areas that are at high risk for high infant mortality. Agencies and organizations with experience and interest will be coordinated by the Department of Mental Health and Mental Retardation to initiate efforts to prevent unwanted pregnancies, low birth weights and infant deaths.

Rationale:

This study, particularly through the State agency survey, found a wide variation in health status indicators in infants and mothers. In addition to ongoing health related activities, outreach to the at-risk population in areas experiencing high infant mortality is imperative. A locally-based interdisciplinary effort would identify the at-risk populations, document the reasons why people are not obtaining services, and develop and implement strategies based on the need to assist persons in receiving adequate care.

Plan:

The Department of Mental Health and Mental Retardation is requesting $500,000 to be used for infant mortality prevention; $35,000 of this amount would be retained in Central Office for staff and administrative costs related to the management of the proposed projects and $465,000 would be used for contracts to high risk localities (between 3 and 10 areas). The recommendation is contingent upon the availability of funds.

Using the Department of Health's assessment of infant mortality high risk areas, an RFP will be sent to appropriate agencies displaying experience and interest in infant mortality. The proposals must include:

1. an agreement signed by the local community services board, health department, social services department and other appropriate agencies (Virginia Perinatal Association Chapter, Better Beginnings Coalitions, private health care providers, etc.) stating their support and specifying the ways in which they will be participating in the project.

2. a method of identifying the high risk mothers and infants.

3. a method for assessment of service gaps, unmet needs, consumer utilization, barriers to use, attitudinal issues and provider concerns.

4. a procedure for development and implementation of strategies and activities, based on local needs, to increase positive health practices and service utilization prior to and during pregnancy.

5. an evaluation component addressing the population identified, the assessment tools used in identifying local problem areas (as listed in #2), and materials and products used to accomplish the goals and objectives of the grant.

*3. Recommendation:

Strengthen Virginia's Early and Periodic Screening, Diagnosis and Treatment (EPSDT) Program by funding two State-level coordinators at the Departments of Health and Social Services and by increasing the number of infants and adolescents screened and treated by EPSDT.

Rationale:

Review of EPSDT, included in the "State Agency Survey" section of this report, led the work group to develop this recommendation. The EPSDT program is a mandated service of Virginia's Medicaid program and provides Medicaid-enrolled children with a health examination and treatment for any problems identified. To reduce infant mortality and incidence of low birth weight, EPSDT provides a means both for screening and referral of newborns (initially in the hospital and in follow-up visits during the first year of life) and for reaching the adolescent population (at risk for poor pregnancy outcomes) by improving their access to and utilization of a wide range of preventive health services. For the poorest of the poor children in Medicaid-eligible families, EPSDT can be a critical link to early identification, diagnosis and treatment of chronic disease or handicapping conditions.

In Virginia, EPSDT is jointly administered by the Departments of Health and Social Services. (Effective March 1985 the Department of Medical Assistance Services will assume the Department of Health's responsibility for ESPDT.) Although important efforts to strengthen EPSDT by coordinating with other programs have been initiated over the past year, the EPSDT program in Virginia continues to lack adequate manpower and resources to implement this important preventive health program comprehensively. Both Departments employ a designated staff person as an EPSDT Coordinator; however, in both Departments the staff person has many other responsibilities and is not able to work exclusively on EPSDT. A similar manpower problem exists at the local level.

Several studies document that use of EPSDT services results in both short and long term savings. A Texas study concluded that for each state dollar spent on preventive health screening, more than $8.00 was saved in long term costs and income loss avoided. Most recently, several states have determined that EPSDT has resulted specifically in savings in Medicaid expenditures, as children screened and treated by EPSDT were found to have significantly lower Medicaid funded services than children who did not participate. Michigan has estimated that EPSDT saves their state $3.7 million in Medicaid costs annually. North Carolina and Ohio project savings of 2 - 16 million dollars annually.

Plan:

1. State-level EPSDT Coordinators at both the Department of Medical Assistance Services and the Department of Social Services should be assigned full-time responsibility for EPSDT.

2. State-level Coordinators should be assigned to develop a joint plan and objectives for EPSDT, to include addressing need to increase referrals at the local level, and identifying and implementing strategies to increase EPSDT activity in targeted, low utilization localities.

3. With assistance from the Division for Children, State EPSDT Coordinators should be assigned to conduct a study of Virginia's EPSDT/Medicaid expenditures (using methodology already developed by Michigan, Ohio, and North Carolina) to determine whether or not Virginia can recognize significant savings in overall Medicaid costs.

4. Recommendation:

Ensure that Child Health Assurance Program (CHAP) provisions are comprehensively implemented in Virginia by publicizing benefits to newly eligible children and pregnant women, and by identifying the impact of other options for prenatal care coverage.

Rationale:

A discussion of the Medicaid eligibility requirements included in the "National Activities in Prevention of Infant Deaths, with Minority Emphasis" section of the study led the work group to develop this recommendation. Due to recent changes in Medicaid eligibility requirements approved by Congress in the Deficit Reduction Act of 1984, some new groups of children and pregnant women became eligible for assistance through the Medicaid program, effective October 1, 1984. These new Medicaid changes are frequently referred to as the Child Health Assurance Program provisions. Although Medicaid continues to be available only to families with extremely low incomes,[1] these changes require states to extend Medicaid eligibility to:

1. single or separated pregnant women who have no dependent children living with them;

2. pregnant women in two-parent families where the breadwinner is unemployed and meets complex Unemployed Parent (UP)[2] requirements; and

3. young children under age 5 born after September 30, 1983, in all families whose incomes are low enough to qualify.

In addition to mandating that Medicaid eligibility be extended regardless of family size to the pregnant women and young children described above, CHAP gives states the option of obtaining Federal matching funds through Medicaid to provide health care to all pregnant women in families with Medicaid level incomes. Because prenatal care has been found to be cost effective in preventing low birth weight and certain complications in pregnancy, new CHAP options which could improve utilization of prenatal care should be analyzed. For example, although complex criteria associated with the UP provisions (Group 2, above) limit Medicaid eligibility of pregnant women to only certain families with unemployed heads of households, infants born to any family with Medicaid level income become eligible for Medicaid upon birth (Group 3, above). Some studies suggest that babies whose mothers fail to obtain adequate prenatal care are more likely to have longer post-delivery stays in the hospital and to be low birth weight, with the attendant increased risk of having a handicapping condition.

Plan:

1. Identify and implement strategies to publicize Medicaid benefits to new eligibles.

2. Identify the impact of extending Medicaid eligibility to pregnant women in all families whose incomes are low enough to qualify.

[1]For a family of 4, monthly income may not exceed $298 to $379, depending upon where they live.

[2]The Unemployed Parent criteria determine deprivation due to the unemployment of the principal wage earner. This process is only one part of the determination of eligibility for Medicaid. The following criteria are paraphrased from the policy. The principal wage earner must:

1. be unemployed for thirty days,

2. be currently registered for the Employment Services Program,

3. have filed for unemployment and agreed to accept benefits if eligible,

4. not have been disqualified from receiving unemployment, and

5. not have refused employment or training within thirty days before application for Medicaid.

5. Recommendation:

Prevent infant mortality by providing case-finding and specialized services to those women at highest risk of premature birth, by effecting necessary expansion to three additional Preterm Birth Prevention Programs.

Rationale:

The Preterm Birth Prevention Programs are carefully monitored and nationally backed prevention efforts aimed to reduce premature (and therefore, low birth weight) births. This program is modeled after the program by Dr. Robert Creasy at the University of California, San Francisco, in which preterm delivery was reduced from 6.75 percent to 2.4 percent.

In Preterm Birth Prevention Programs, a scoring system based on socioeconomic factors, obstetrical history, and medical findings of newly pregnant women is used to predict preterm labor so that preventive measures can be taken. Although minority-specific factors are not used to predict risk, these programs serve minority populations because of other risk factors. The intervention includes teaching patients to recognize signs of preterm labor, ensuring more frequent prenatal visits, intensive staff education, and aggressive tocolytic (labor-stopping) drug therapy when appropriate.

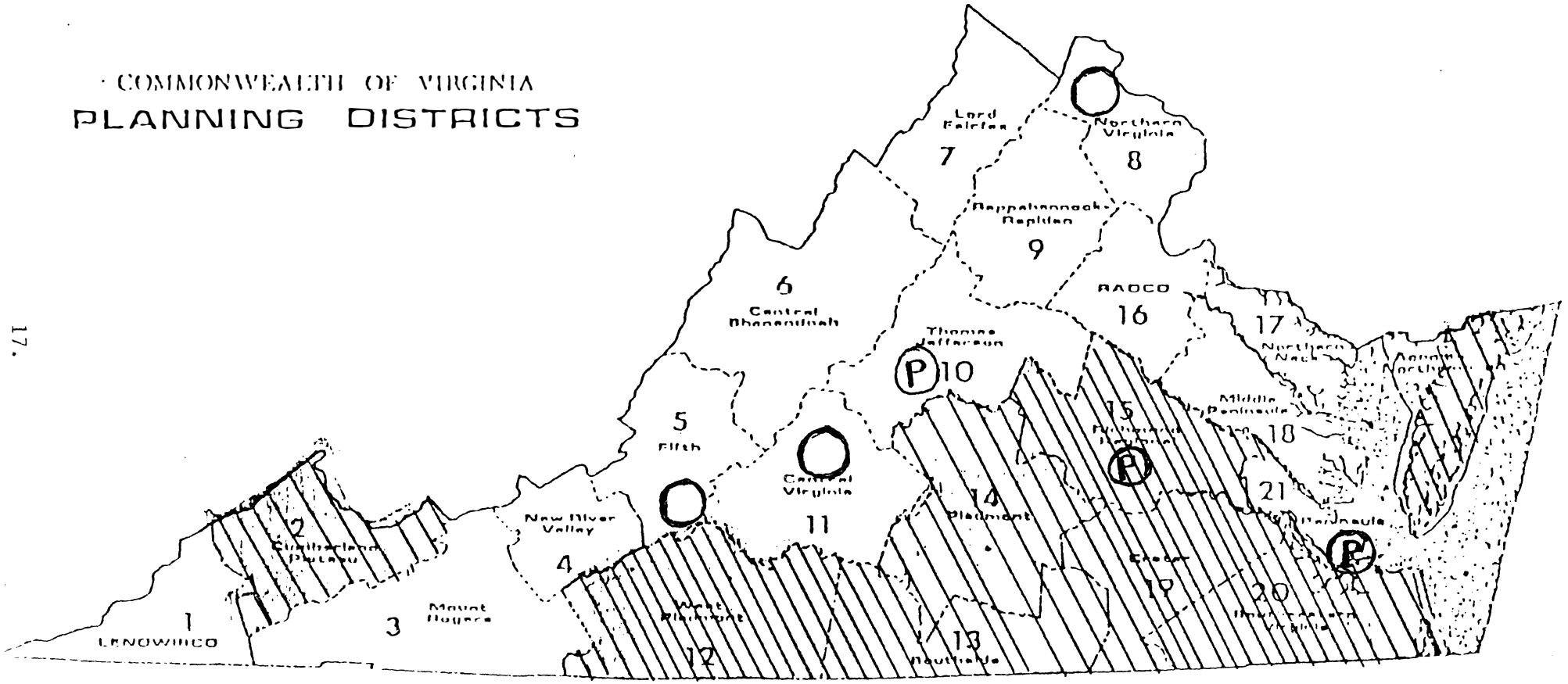
The Programs are located at three of the Perinatal Regional Centers, Medical College of Virginia, Eastern Virginia Medical Authority, and University of Virginia, and are coordinating services with the health departments for case-finding. The Perinatal Centers are the appropriate locations for both provision of continuing education to local providers and referral for high risk women. They have been funded by the Maternal and Child Health Services Block Grant, and should they demonstrate a reduction in preterm birth, they will be expanded through education to their respective perinatal regions.

The women at risk for preterm birth across the State, while not always living in the community where the centers are located, are ultimately served by those centers. The only inhibition to expanding Virginia's involvement to the remaining three designated perinatal centers has been funding. This expansion would provide a network for referral to highly specific preventive programs across the state. Another important focus of expansion is the provider education that ensues. On the following page is a map demonstrating the relationship of the network to high risk areas based on low birth weight rates; however, even areas with slightly lower rates may have many more numbers of high risk mothers due to population density.

Plan:

For FY 1985, the Federal Maternal and Child Health Services Block Grant to Virginia was increased. Using these funds, add Preterm Birth Prevention Programs at Roanoke Memorial Hospital, Virginia Baptist Hospital and the Fairfax Hospital so as to allow an increase from three to six programs, located at the perinatal centers.

COMMONWEALTH OF VIRGINIA
PLANNING DISTRICTS



PLANNING DISTRICTS WITH
LOW BIRTH WEIGHT RATE SIGNIFICANTLY HIGHER THAN THE STATE RATE

(P) = EXISTING PRETERM BIRTH PREVENTIONS PROGRAMS

( ) = PLANNED SITES FOR PRETERM BIRTH PREVENTION PROGRAMS

6. Recommendation:

Achieve reduction of unwanted births, low birth weight births and infant deaths by providing school age children the necessary learning tools for decision making that would have an impact on these problems by facilitation of Family Life Education.

Rationale:

A finding from this study was that professional and public comments voiced the need for such specific education in many areas of the State. Additionally, motivation and attitudes of young people were cited as elusive factors contributing to unwanted pregnancy. The Virginia Family Life Curriculum places relatively greater emphasis on the development of self-respect and self-control than on birth control methods.

Currently, Health Education is not mandated beyond tenth grade. In high schools, only two units/credits of Health Education are required for graduation. In 9th and 10th grade the amount of comprehensive Health Education per se that is provided may range from 40 percent to 90 percent of those two units, with the remainder being Physical Education. Standards of Learning Objectives for Health in Virginia contain Parenthood and Family Relationships only at the tenth grade level.

The Virginia State Health Plan provides the information that at a time when 40 percent of elementary school teachers were reporting including family life education in their instruction, only 4 percent were using the Family Life Education Curriculum Guidelines. Also, the following recommendation is in the Plan:

> (HE 1.1A) p. 152
> "The SHCC should support efforts by the State Department of Education and Health Systems Agencies to encourage local school divisions to adopt the State Health Education Curriculum Guide and Family Life Education Guidelines."

While provision of Family Life Education as a separate curriculum will remain a local school board option, there are facilitating steps that can be taken to achieve the State Health Plan objectives of reducing disease risks and improving health through health education and meet the concerns of public and professional comment.

Plan:
(Subject to technical advice from the Department of Education)

1. Increase the number of units/credits mandated for Comprehensive Health Education to 4 for students in grades 9-12, with an emphasis on content outlined in the Family Life Education Curriculum Guidelines.

2. Expand the Comprehensive Health Education Curriculum in grades K through 12 to incorporate the teaching objectives as outlined in the Family Life Education Curriculum Guidelines and develop Standards of Learning Objectives for those topic areas.

3. Provide in-service training to teachers in the Family Life Education Curriculum.

*7. Recommendation:

Broaden the representation of the members of the Perinatal Services Advisory Council, to plan more comprehensively for improvements in perinatal health care in Virginia, and to emphasize preventive health care by changing the composition of the Perinatal Services Advisory Council.

Rationale:

The Perinatal Services Advisory Council, in addition to serving as the advisory experts to the Governor and State Agencies, is authorized by the Code of Virginia (Chapter 4, Article 5, Sections 32.1-122.1) to review implementation of and make desirable revisions in the State's Perinatal Plan. Although this recommendation as such was not derived from the study, broadening the Advisory Council would be in keeping with legislation concerning the Council's purpose. Because this study does indicate that the task of reducing infant mortality extends beyond the medical care system, and that there is a perceived need for cooperative activity across disciplines, broadening the composition of the Advisory Council would make it more representative of those groups involved in preventive health care. To include a consumer or an advocate unaffiliated with the medical care system would be to ensure attention to peripheral issues, such as socioeconomic and sociodemographic factors that may affect pregnancy outcomes and maternal and infant health in general.

Plan:

The State Perinatal Services Advisory Council consists of representatives from twelve groups who are hospital oriented medical providers with expertise and knowledge in perinatal health matters, and five at-large appointments, for a total of 17 members. One of the physician groups should be changed to include a public health physician representing the Virginia Association of Local Health Directors. The Virginia Nurses' Association representative should be a practicing public health nurse who works with perinatal clients. The at-large appointments should be changed to include:

1. a practicing nutritionist representing the Virginia Dietetic Association who works with perinatal clients.

2. a health care consumer with interest and knowledge in perinatal care issues or a non-partisan advocate with similar interest and knowledge representing such groups as the League of Women Voters, the Junior League, the Coalition of 100 Black Women, the March of Dimes, the Virginia Poverty Law Center or others.

This plan then allows three at-large appointments. The new appointments would be phased in as the present at-large appointees' terms expire. Also, representatives from the Departments of Health, Social Services, Medical Assistance, Mental Health and Mental Retardation, Education, and the Division for Children should be included as ex-offico members. The Department of Health is currently responsible for providing support services to the Council such as reimbursing the Council's expenditures.

8. Recommendation:

Remain abreast of the issues, studies, reports, and activities of the Southern Regional Infant Mortality Task Force.

Rationale:

A review of the Southern Regional Infant Mortality Task Force included in the "National Activities in Prevention of Infant Deaths, with Minority Emphasis" section of the study led the work group to develop this recommendation. Because regional infant mortality rates for the South have consistently exceeded the national average, southern policymakers have begun to focus on infant mortality as a special concern for this region. Both the Southern Legislators Conference on Children and Youth and the Southern Governors' Association have, in the past year, agreed to make infant mortality a higher priority in their states. In response to a resolution sponsored by Governor Robb, the Southern Governors' Association approved a resolution in July 1984 to create a Southern Regional Infant Mortality Task Force consisting of governors, legislators, and public health officials across the region. The purpose of the Task Force is to "promote initiatives to narrow the infant mortality gap between the South and the rest of the country and to reduce the incidence of infant mortality and low birth weight throughout the region by:

- documenting the scope of infant mortality and factors related to its prevalence through the south;

- raising the level of public awareness of the problem;

- monitoring the progress of individual southern states in reducing their infant mortality and low birth weight rates; and

- highlighting and transferring ideas and experiences of successful state programs, with a view toward the development of regional prototypes."3

Plan:

The Departments of Health, Mental Health and Mental Retardation, and Social Services should support the Division for Children in fulfilling this activity. Maintaining contact with staff from the Southern Regional Task Force on Infant Mortality and coordinating dissemination of information to appropriate agencies are viewed as primary responsibilities.

3Policy Position adopted by the Southern Governors' Association at the 1984 Annual Meeting, July 11, 1984, Williamsburg, VA.

*9. Recommendation:

In areas of high risk of infant mortality, determine the populations who are not utilizing the human services system and consumers who are underutilizing the human services system. Place particular emphasis on those who have actually experienced infant mortality. Also place emphasis on the minority population. Identify characteristics and barriers that discourage or prohibit these populations/consumers from properly utilizing the system. Specify intervention strategies to encourage and increase utilization of the system while ensuring quality services in the system. These tasks should be accomplished by conducting a study that would include epidemiological techniques and marketing surveys.

Rationale:

Infant mortality rates vary considerably throughout the State. Both the causal reasons and the reasons for their variance are many, diverse and at this time not understood well enough to launch effective intervention measures. Therefore, further study of specific high risk areas is necessary before a thorough, pervasive and aggressive effort can be conducted to prevent infant mortality in Virginia.

Because many eligible persons of prechildbearing and childbearing age either do not currently utilize or underutilize perinatal education and health care services, this study must disclose who they are and why they do not practice preventive health care. Also, because Virginia's demographics vary geographically, culturally, and economically, the areas determined to be at high risk for experiencing infant mortality must be studied individually with attention to these demographic characteristics. Common systematic barriers may exist, i.e., transportation problems in rural areas or conflicts with work schedules due to limited clinic hours. However, other barriers may be less common and more difficult to overcome. For instance, cultural traditions may dictate ignorance and/or mistrust of technological medical systems, or certain groups may regard the mother (or mother figure) as a source of information concerning pregnancy and health more often than a doctor or nurse. Most likely, a combination of barriers exists, thus it is even more important to study each area individually. Once understanding has been gained as to who the unserviced groups are and why they are not serviced, possible means for prevention should emerge.

Plan:

An appropriate group of professionals, for example, a school of public health, should use current, available data to focus on the areas in Virginia at high risk for experiencing infant mortality. Within each of these areas a marketing/epidemiological study should be conducted to discover who is either not currently utilizing services, or underutilizing them, and to reveal the barriers, with attention to the specific geographic, cultural, and economic characteristics of that area. The study should also include an examination of poverty and how it relates to infant mortality. A possibility would be to replicate the Maine study on childhood deaths mentioned in the "Background Information" section of the report. Appropriate plans should be devised for action to encourage these people to practice preventive health care before, during, and after pregnancy. Prevention measures

should be sensitive and specific to each area. Such information needed to assess who does not utilize the system and why not, and who underutilizes the system, cannot be obtained by analyzing vital statistics and service data alone; careful examination of each high risk area and its specific characteristics must ensue. The cost to contract with a group for such work and other incurred expenditures would be approximately $250,000. The Departments of Health, Mental Health and Mental Retardation, and Social Services need to be involved in this study, as well as other appropriate agencies. The recommendation is contingent upon the availability of funds.