

U. S. DEPARTMENT OF LABOR

JAMES J. DAVIS, Secretary

CHILDREN'S BUREAU

NINTH ANNUAL REPORT OF THE
CHIEF,
CHILDREN'S BUREAU
TO THE SECRETARY OF LABOR



FISCAL YEAR
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1921



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NINTH ANNUAL REPORT
OF THE
CHIEF, CHILDREN'S BUREAU.

UNITED STATES DEPARTMENT OF LABOR,
CHILDREN'S BUREAU,
Washington, August 18, 1921.

SIR: The following is the ninth annual report of the Children's Bureau, for the fiscal year July 1, 1920, to June 30, 1921. Its usual brief length has been further reduced in accordance with the directions to observe all possible economy in printing. It is believed, however, that the tabulations and the concise statements of the division directors show with clearness the trend of the bureau's development, the extent of the year's work, and the purposes for the ensuing annual period.

The law creating the Children's Bureau in 1912 set forth the duty of the bureau as follows: "To investigate and report upon all matters pertaining to the welfare of children and child life among all classes of our people." It also especially enumerated certain subjects covering the whole field of child welfare outside the technical processes of education.

It is the clear intent of the law to create an investigation or research bureau in the comprehensive social field of child welfare. Plainly the task of social study is progressive and can not be completed, and thus far the bureau has hardly made a beginning in performing the vast task assigned to it.

CORRELATION AND COOPERATION.

Many special sciences and their applications are directly essential to a program of child welfare, and Government work in certain of these sciences was established long before the Children's Bureau was created. Although not expressly so stated in the law, it is clear that coordinated work must have been intended, since the Bureaus of Labor Statistics, of the Census, and of Education, the Public Health Service, and the Department of Agriculture were all created before 1912, and the functions of all these are interrelated with social science research in the field of child welfare.

The great contribution which the establishment of the Children's Bureau made to child-welfare theory and practice was that a unified social, economic, and industrial approach to all problems in this field was, for the first time, made possible. Previous to that time there had been a constant growth of interest in the protection and care of childhood, and public and private organizations had been multiplying and multiplying. But no agency, State or private, had as yet developed a program embracing all the interests of childhood. The

soundness of the principle of unified approach has been borne out by the subsequent development of State bureaus and divisions with broad child-welfare programs, and especially by the State child welfare commission movement, which, for the first time, has reviewed the legislation relating to an entire section of the field of social service.

As a basis of its own studies, the bureau utilizes the material of other services—for example, the economic studies of the Bureau of Labor Statistics and the population figures of the Census. In determining new lines of inquiry, it has carefully avoided duplication of the work of other agencies—for example, its series of infant mortality studies dealing with the social, industrial, and economic conditions accompanying varying infant death rates was begun after consultation had shown that no similar work was under way or contemplated. The bureau has cooperated with other Government agencies whenever possible, as in the Delaware studies of mental defect and the study during the war of girl delinquents, which were made in cooperation with the Public Health Service.

It has also cooperated in every practicable manner with other public bodies and with voluntary agencies. Of this type of cooperation some indications will be found in the reports which follow showing the work of the bureau for the year, by divisions.

It is unquestionably true that the Federal Government is continually undertaking activities which have a direct social effect, although that may not be their immediate purpose; thus the laws aiding agriculture lead to an intimate and immediate approach to social and family welfare by the Department of Agriculture, through the teaching of boys and girls in clubs. The girls learn to raise garden fruits and vegetables and to can them for winter use, thus improving the family table throughout the year, while giving the most practical teaching in gardening and household economics. The boys' clubs likewise improve the boys' knowledge of stock raising and farm economics and of the relation of these matters to the living of the family.

The women county agents of the Department of Agriculture, who are chiefly responsible for the canning clubs, are in general important socializing agencies since their work includes holding conferences, addressing clubs of housekeepers, making practical demonstrations of the various household arts, and producing for free distribution popular literature on these subjects. The States Relations Service through its home economics section carries on scientific research as to the value and uses of various foods for adults and children. At the request of the Children's Bureau it has prepared a pamphlet of recipes for feeding young children, which has been widely circulated. A constant correspondence is maintained by the bureau with home demonstration agents, and bureau publications and exhibit material are furnished for their distribution and use. The good-roads act lessens the isolation of great rural areas and brings schools and hospitals, public health nurses, and the pleasures of the city itself within reach of a large public. All this stimulates and aids the services the Children's Bureau can offer.

The necessity for correlated and coordinated child-welfare work becomes constantly more evident and may be clearly seen in the field of education. The child belongs first of all in a family, cared for by

good and wise parents who can command wholesome living conditions. Under such circumstances the task of the teacher becomes simpler and more inspiring, since the child arrives at school in a better state of mind and body than when home conditions and surroundings are poor or bad. But the field of education can not ignore life outside the school. The new teaching earnestly and wisely strives to connect and apply its lessons to the activities growing out of the child's normal environment. On the other hand the influences affecting behavior, self-control, and self-direction are profoundly social, and the student of social aspects of child life is interested in the contribution made by education. The child's entrance into industry is of equal importance to both social science and education. The child of school age who for any reason needs care not afforded by home or school is of interest to the social student. Here cooperative work or at least coordinated work is imperative for reasons of economy, but more because such correlation is essential to the welfare of the child.

If the Bureau of Education and the Children's Bureau have joint interests, so have the Children's Bureau and the Public Health Service. The law requires the bureau to "investigate and report upon all matters pertaining to the welfare of children and child life." It specifies infant mortality and diseases affecting children. The bureau's primary concern is in the social implications of these matters, which are also of interest to the Public Health Service; and here again there must be coordinated and cooperative work. The new view of public health requires the social worker, just as applied social science in the field of health welfare requires the physician. A reasonable understanding must be reached in the interest of intelligent scientific work.

The State child welfare commission movement was not initiated by the bureau nor as a war activity, but has grown rapidly in the past few years. It is recognized by all social students as a significant indication of the increasing sense of public responsibility in the States and of the growing effort to secure equitable and substantially like standards in all States, whose study of each other's work has become a principal feature in the formulation of new codes. In half the States official commissions for the study and revision of child-welfare laws have been created. During the past year a number of these commissions completed their studies and made recommendations to the legislatures. In addition to those continuing their work, new commissions have been created in 1921 in North Dakota, Utah, Virginia, and West Virginia.

The bureau in various ways has assisted these commissions, mainly through making available to them analyses of child-welfare laws and supplying printed and other material. Acknowledgment of such assistance by the bureau is made in the published reports of the commissions that have been at work in Connecticut, Delaware, Nebraska, and South Dakota.

The most striking instance of cooperation with voluntary organizations was that of the year 1918-19, Children's Year, when special activities on behalf of a rounded child-welfare program enlisted the active participation of millions of women representing approximately all the women's organizations of the country. The work yielded good results—some permanent—and it is unfortunate that

it had to be abruptly halted at the close of Children's Year, because it had depended for support solely upon an allotment from the President's war fund. The care of children abroad as a war measure forced upon the attention of this country a new sense of public responsibility for child welfare, but methods of care must be continuously improved and developed, and the study of child welfare can never cease.

During the past year the bureau has cooperated in various ways with private organizations, both Nation-wide and local. An increasing correspondence with the directors of American Red Cross chapters and divisions, especially with the nursing service, is to be noted; the bureau publications are furnished for distribution and service of other kinds is rendered.

NEW SERVICES.

✓ The bureau has been organized in divisions for the past seven years. At present these divisions are: Industrial, child hygiene, social service (dealing with classes of children in need of special care), editorial, and statistical. Three new services are needed. First, a division of legal research. The law creating the bureau directs it to report upon legislation affecting children in the various States and Territories. While all the energy available has been given to this work, it is far from complete. The bureau was intended to act as a center of information on this subject, and a list of its publications and the reports of its current work by divisions show that it is able to accomplish something. But to follow and promptly report and analyze all the State statutes affecting children is a task far beyond the bureau's present resources; yet such a service is a matter of value and practical use to all officials and private organizations in the child-welfare field. Once a year, or once in two years, the State legislatures meet, and though an index of child-welfare laws is now under way, which will be an economy in keeping up to date the analyses of current legislation, its completion is not possible with the bureau's present force. This material is gathered nowhere else. If assembled here it will be valuable and accessible to the whole country. A division of legal research is recommended for 1922-23.

Expert service in the field of recreation is a needed development. A study from the social standpoint of suitable types of recreation to be provided by public funds or supervised by public authority and the degree of provision necessary, is especially timely since the amount of public expenditure for recreation in recent years is likely in the immediate future to be reduced rather than increased, and it is therefore needful to make the best possible use of the funds and equipment available. No one can doubt the vast increase in opportunity for innocent pleasure of a passive type and for valuable instruction which is already afforded by the moving picture. Within a few years millions of men, women, and children have been given an absolutely new opportunity to see, presented on the screen—at trifling cost and within an easy distance of their own doors—the most interesting events of current history and the most vivid tales of the great story tellers. It is beyond the power of anyone to measure the added interest to life given by the "movie." Like all good things, this can be badly used. Poor, coarse pictures can be shown; an appeal to low interests can be made. Study of the uses and effects of this greatest method of

passive recreation is greatly needed. How far is passive recreation valuable to the child? Undoubtedly, various forms of active play and recreation are more important. The whole subject of recreation is profoundly social, and few of its phases are individual or solitary. It is not necessary to point out that the question of recreation is equally important in town and in country. The effect of introducing the sports and recreational methods of continental United States into the island possessions is of great interest; a study of the experience of the Philippines would be particularly valuable.

The "exhibit method" of reporting scientific findings must grow. Little gray pamphlets filed away in orderly fashion do not answer the taxpayers' demand for effective service. The exhibit method requires inventiveness, alertness, a deep respect for the truth, and the ability to grasp every suitable means of expressing truth in various graphic ways without losing the sense of values. There are few exhibit experts at present. The bureau needs to add such an expert to its staff so that the results of its scientific studies may be presented in new exhibit forms as well as by the usual report.

CHILD-WELFARE STUDIES IN ISLAND POSSESSIONS.

The child-welfare study of Porto Rico, requested by the commissioner of education of the island and approved by the Governor and the Bureau of Insular Affairs, is under way. It is taking the form of a Children's Year demonstration, with plans for repeating the various features which proved effective here in 1918-19. For the sake of convenience the Porto Rican work opens with recreation—special emphasis being placed on athletics and active sports—in close cooperation with the teachers. Specially qualified experts will be sent to the island, and close cooperation is assured from the authorities and representative volunteer committees.

It is hoped that the bureau may be enabled to continue and develop this series of studies in the other island possessions as rapidly as the necessary cooperation is offered.

APPROPRIATIONS.

The appropriations for the Children's Bureau for the 10 years from July 1, 1912, to June 30, 1922, are given in Table 1:

TABLE 1.—*Appropriations for the Children's Bureau, by fiscal years.*

Year.	Total.	Salaries.	General expenses.	Child welfare.	Other.
1913.....	\$25,640	\$25,640	.....	.....	.....
1914.....	25,640	25,640	.....	.....	.....
1915.....	164,640	106,640	\$58,000	.....	.....
1916.....	164,640	106,640	58,000	.....	.....
1917.....	164,640	106,640	58,000	.....	.....
1918.....	423,760	106,640	95,000	\$72,120	\$150,000
1919.....	518,160	102,040	94,000	72,120	\$250,000
1920.....	280,040	106,040	94,000	80,000	.....
1921.....	271,040	106,040	85,000	80,000	.....
1922.....	271,040	106,040	85,000	80,000	.....

¹ Enforcement of Federal child-labor law.

² \$125,000 appropriated for the enforcement of the Federal child-labor act, subsequently declared unconstitutional, not included.

³ Reduction because bureau library consolidated with department library.

⁴ \$150,000 for Children's Year; \$100,000 for child-labor-contract clause—all from the President's fund.

⁵ Reduction because Chicago office discontinued.

It is seen from Table 1 that each year since 1919 the bureau has been operating under substantially the same appropriation, and that this has been almost \$150,000 less than was available during 1919—Children's Year—leaving out of consideration the fund assigned during that year for the enforcement of the child-labor clause in war contracts. The widening sphere of the bureau's influence and the increasing demands made upon it call for an expanding program. The value of child welfare becomes greater in times of financial depression. To carry on the work outlined in the reports of the existing divisions and provide for the new services recommended a total appropriation of \$642,860 is requested for the fiscal year ending July 1, 1923. This is substantially the same as the estimate submitted for the year 1922.

PRINTING FUND.

During the fiscal year ended June 30, 1921, the bureau had a total printing fund of \$56,000, including a deficiency fund of \$20,000. Of this fund slightly over \$22,000 was spent for reprints of the popular pamphlets addressed to individual mothers—Prenatal Care, Infant Care, and Child Care—the distribution of Infant Care amounting to over 250,000. Even with a distribution of over 250,000 copies, it was necessary to refuse or curtail many requests for quantities coming from public officials, the Red Cross, and such agencies as children's health centers, infant-welfare stations, and maternity hospitals.

The printing fund allotted for the present year—1922—is only \$36,000, an amount totally inadequate to cover reprints in the usual quantities and reports of average length. It will be necessary for the bureau to cut the distribution of Infant Care—its most popular bulletin—to two-fifths of that of last year. The length of each report and the size of the edition are being reduced to a minimum, and covers are being omitted from all reports in the hope that the saving thereby effected will make it possible to give to the public in condensed form the findings of the bureau's studies.

THE YEAR'S WORK, BY DIVISIONS.

Some idea of the general volume of the bureau's work may be gained from the fact that during the year over 86,000 letters were received and given due attention, while a total of 2,480,976 publications were distributed. Of these, 1,751,300 were dodgers and the balance reports, bulletins, and leaflets.

The tendency of the nine years' development has been to strengthen the specialized working power of the bureau by its division organization and at the same time to increase the effective teamwork between divisions. As the most direct method of showing the actual work of the bureau, the following reports by the division directors are submitted. They show the constant correlated work of the divisions and indicate also, in some degree, the ever-increasing cooperation with Government and other agencies outside the bureau.

HYGIENE DIVISION.

ANNA E. RUDE, M. D., *Director.*

The general purpose of the hygiene division is to promote the health of maternity, infancy, and childhood through advisory and

practical cooperative assistance to public and private child-welfare organizations; special studies and investigations; and the education of the public by means of reports and popular literature, health demonstrations, and an information service in matters pertaining to child hygiene. The division serves in an advisory capacity to the other bureau divisions in all problems relating to hygiene.

Cooperation.

Within the bureau during the past year the hygiene division has cooperated with the industrial division in the following undertakings:

(a) In connection with a survey of children working in the beet fields, a unit consisting of physician, nurse, and clerk made examinations to ascertain the physical condition of children employed in the beet fields of two counties of the northern sugar-beet district of Colorado. A total of 1,022 children of both sexes, from 4 to 17 years of age, were examined. Of these, 89.2 per cent were under 14 years of age and 68.5 per cent were under 12 years. The outstanding physical findings probably indicate the effect of excessive and unsuitable labor upon the immature bodies of prepubescent children. Postural deformities and malpositions apparently due to strain were found in a large percentage of the children examined.

(b) Children's health conferences were conducted in several mining towns of West Virginia in connection with the study of the children of the coal-mining camps. At the request of a county home-demonstration agent the health conference service was extended to the county fair in an adjoining county. Malnutrition was found in nearly 50 per cent of the children examined.

A news-letter to directors of State child-hygiene divisions has been issued four times during the year. This serves as a news exchange or clearing house for child-hygiene activities in the States. The division compiles and issues material sent in by the State directors, making available in concise form the latest information concerning methods, standards, and results of current child-hygiene work in all parts of the United States and affording State directors a means of intercommunication.

In October, 1920, a round table for directors of State child-hygiene divisions was conducted at the meeting of the American Child Hygiene Association in St. Louis. Organization charts of many of the State and municipal child-hygiene divisions were prepared by the bureau and served as an exhibit at this meeting and at the annual meeting of the American Public Health Association. Smaller copies of these charts were later circulated among the State directors.

Cooperation was given the bureau of child hygiene and public-health nursing of the Alabama State Board of Health by detailing a public-health nurse, expert in matters of policy and administration in the nursing field, to confer with the director and assist in the organization of the work of the bureau. A similar service was rendered the bureau of child hygiene and public-health nursing of the Michigan State Board of Health.

The division cooperated with the child-hygiene division of the Kansas State Board of Health by detailing a physician to examine children as part of the experiment in applied eugenics initiated at a State fair.

At the request of the Kentucky State Board of Health the "Child Welfare Special," with its staff, cooperated in an intensive piece of work with the county health unit and the county board of education in Daviess County. The "Child-Welfare Special" is a large motor truck equipped to demonstrate children's health conferences in the more remote rural communities. In this county an attempt was made to reach as many children in the county as possible in the allotted time, and children of the towns as well as those of the cross-roads were examined—1,990 in all. The numerous cases of malnutrition found among the children of well-to-do farmers bore evidence to the fact that among other factors normal nutrition is dependent upon a wise selection, as well as a sufficient amount, of food. Personal instructions were given to mothers and teachers in the proper feeding and general hygienic care of the children, and efforts were made to see that cases needing medical care were followed up and that a permanent active interest was established.

For five months the "Child-Welfare Special" and staff have been in Arkansas, working in cooperation with the State board of health. Though floods, bad roads, and steep mountain climbs have been serious obstacles in reaching many remote districts the car has visited 6 counties, and 1,228 children have been examined. Several communities are undertaking follow-up work, and there are other evidences of an established interest in the health of children.

Cooperation with national public and private organizations has been effected by active representation on committees, by attendance at conferences, and in an advisory capacity through correspondence. Members of the division staff have served on national committees dealing with foods and nutrition, health education of school children, standards of heights and weights, physical standards of children in industry, and laws relating to the health of children.

Upon invitation of the public-welfare department of the North Carolina State University, the division cooperated in an experimental short course in community child health. The staff physician assigned to this work gave lectures in child hygiene in the State university and practical demonstrations by means of children's health conferences, in the conduct of which the students took active part. In conjunction with this work conferences were held with various State agencies and local welfare organizations.

A considerable demand is constantly made upon the division for information on subjects related to child hygiene. Much correspondence has been conducted with mothers on practical problems of prenatal, infant, and child care; with public-health nurses and doctors in regard to the establishment of health conferences and other activities; with women's clubs desiring to study child welfare; with individuals who are writing papers and theses on subjects related to child hygiene; with State directors of child-hygiene divisions and other public-health officials and public and private organizations concerning methods of work. While most of these letters have come from individuals and organizations in this country, there have been inquiries from Canada, Europe, Asia, and South America.

Special studies and investigations.

Aside from the children's health conferences, surveys and studies have been made by other methods. A questionnaire survey, which

is nearing completion, has been undertaken to determine the adequacy of facilities for maternity and infant care in the United States in communities of less than 200,000 population. Questionnaires were sent to hospitals to determine the number of beds available for maternity cases and the number of confinements during the year 1920; and to all State child-hygiene directors or State health officers to determine the number of births in their respective States during 1920, the number of health centers, and the numbers of prenatal, infant, and preschool-age cases cared for by these centers.

Information concerning municipal child-hygiene divisions in the United States was obtained by a questionnaire. Of the 601 cities which had 10,000 or more population in 1910, it was found that only 45 had child-hygiene divisions incorporated in their municipal governments, although in a much larger number some phase of child hygiene is being carried on by public and private funds.

In response to public demand, the compilation of a directory of local child-health agencies in the United States was started in June. The purpose of this directory is to make available for public use information concerning local child-health agencies, as well as additional information concerning the care of health during maternity, infancy, and the preschool age in our country. Publications descriptive of national child-welfare organizations and lists of agencies caring for the sick are obtainable; but, except for a limited number of local directories, there is little information concerning local agencies. The directory includes agencies serving States, counties, and urban areas of 10,000 or more inhabitants, according to the 1920 census. The material is being compiled by means of questionnaires. A preliminary mimeographed edition will be issued in October, 1921; later in the year, as additional information is supplied, the directory may be printed in more complete form. In addition to a brief description of each agency, classified by State, area served, and source of support, the directory will contain a list of agencies grouped according to type of activity.

The hygiene division maintains a reference file of current literature relating to the health of maternity, infancy, and childhood. This file is increasingly valuable in meeting the many and varied demands of the division's information service and, in addition, furnishes a monthly bibliography on current child-hygiene literature.

Reports and publications.

Great need exists throughout the country for the encouragement of the maternal nursing of infants. Surveys in this country and abroad have shown that breast feeding is probably the most important single factor in the reduction of infant mortality. In response to requests from pediatric societies and from individuals the division has begun a campaign showing the importance of breast feeding. The first step has been the writing and publication of the bulletin entitled "Breast Feeding" for the use of physicians and nurses in the instruction of mothers. Owing to lack of funds the distribution of this bulletin has been sadly curtailed, so that it is reaching only a few of the many thousands for whom it was intended.

The popular bulletin, "Infant Care," has been revised, and the sections on Feeding and the Sick Child rewritten.

The report on the physical findings in the study of the Colorado beet-working children has been written, and also a report on a nutritional study made in Kentucky previous to this fiscal year.

Assistance was given by one of the public-health nurses of the division in the preparation of the report on office administration for organizations supervising the health of mothers, infants, and children of preschool age.

All reports or publications of the bureau relating to infant mortality, growth, nutrition, and the health of mothers and children have been read and criticized from a medical standpoint in this division.

Advisory committee to the hygiene division.

This committee, consisting of Dr. Richard M. Smith, representing the American Pediatric Society, Dr. Julius Hess, representing the pediatric section of the American Medical Association, and Dr. Howard Childs Carpenter, representing the American Child-Hygiene Association, serves in an advisory capacity to the division. During the past year the committee has given valuable assistance in preparing the revised edition of *Infant Care* and the new bulletin *Breast Feeding*.

Future plans.

Many demands are made upon the resources of the division which for financial reasons it has been unable to meet. In a forward-looking program for greater usefulness it is hoped that the breast-feeding campaign may be continued to the extent of making it possible for the bulletin *Breast Feeding* to reach all physicians and nurses in the United States. It is also hoped that from this pamphlet a popular leaflet may be adapted to be sent to the mothers of all newborn babies. In order to carry out this campaign and to meet the demand for the popular bulletins—*Prenatal Care*, *Infant Care*, *Child Care*—and the child-welfare dodgers, an increased printing fund is necessary. The bureau's exhibit material on subjects pertaining to the division's work should be increased. Child-health demonstration units, performing services somewhat similar to those rendered by the "Child-Welfare Special" and sufficient in number to meet the many requests for this type of help, would be of unquestionable educational value and tend to increase State and local responsibility.

If the division is to render more effective and far-reaching service, it is essential that it have a sufficient staff of pediatricians, obstetricians, public-health nurses, and other specialists to undertake much-needed research in this field, to meet the requests for cooperative assistance from State and municipal child-hygiene divisions, nursing organizations, and other child-health organizations, and to supply demonstration and lecture service to educational institutions.

With child-hygiene divisions now established in 38 States, the present demands and requests are for standardization of work, and the hygiene-division staff should include expert consultants in child hygiene who could be sent upon request to assist directors of State child-hygiene bureaus in the development of their plans. The news letter now puts at their service a brief summary of current activities in the field. An annual conference under the auspices of the bureau where directors could meet to discuss with each other and with the

best authorities available in this and other countries their special plans and problems, and to formulate standards, would be of inestimable value.

INDUSTRIAL DIVISION.

ELLEN NATHALIE MATTHEWS, *Director.*

During the past year this division completed four field studies of child welfare as affected by industrial and economic conditions, with special reference to child labor. Two experimental studies of child welfare in typical rural localities were made, one in selected sugar-beet-raising areas of Colorado and Michigan, the other in a cotton-growing section of Texas. A third survey dealt with the conditions affecting the welfare of children who live in bituminous coal-mining communities in West Virginia. In addition, a brief inquiry was made regarding the opportunities for minors in metal-manufacturing industries in Michigan. Two other studies have been partially completed, relating to child labor and child welfare in truck-farming areas, and to children on inland-waterway canal boats.

Legal studies completed during the year include an analysis and arrangement in chart form of the child-labor and compulsory-education laws of the various States, in effect January, 1921. Analyses were also made of laws and methods of enforcement relating to the physical examinations of working children and to the employment of children in street trades.

A brief summary follows of some of the findings in the studies made by the division during the year.

Children working in sugar-beet fields.

With the rapid growth of the sugar-beet industry in this country during recent years the number of workers in the beet fields has steadily increased. Many of these workers are children, for beet raising requires much hand labor which even young children can do.

The Children's Bureau study—which covered parts of two counties in Colorado and three in Michigan—included 2,500 children between 6 and 16 years of age, 72 per cent of whom worked, and 1,400 additional children under the age of 6 years, whose mothers or whose older brothers or sisters worked in the beet fields.

Some of the beet growers, both farm owners and renters, plant a relatively small acreage of beets and depend upon their own families to do the necessary handwork. The great majority hire contract laborers for the handwork. In the area studied in Colorado four-fifths of the laborers were resident and were engaged by the farmers themselves. They lived in towns near the beet fields, moving out to the country in the spring and returning to their homes after the harvest. About two-thirds of them were Russian-Germans, many of whom, by dint of hard work on the part of every member of the family, will eventually become renters or owners. One-fifth were Mexicans who came in for beet work during the season only. Only 7 per cent of the laborers were native-born Americans. In these laborers' families, which do the great bulk of the beet work, 43 per cent of the workers were under 16 years of age.

In Michigan, about two-thirds of the laborers were transient, recruited by the sugar companies from industrial centers, from De-

troit and Chicago to the mining towns of West Virginia, and assigned to the various growers according to their need. They were chiefly of Slavic origin, though because of the scarcity of labor in 1920 recruiting was done in Texas and on the Mexican border, and several trainloads of Mexicans were brought from San Antonio and Mexico City.

Laborers' families in both Colorado and Michigan lived in any kind of shelter that was available for temporary use—abandoned farm dwellings, rude frame or tar-paper shacks, tents, or caravan wagons—though some of the sugar companies in Michigan had provided one- or two-room portable cottages for their laborers. In many cases serious overcrowding existed; sanitation was poor; houses were in bad repair and the furnishings meager, often not including the bare necessities. The owners' and renters' families, while working very hard, lived under more normal conditions and worked under much less pressure.

Children worked at very early ages. More than half the child workers included in the bureau study were between the ages of 9 and 12 years, inclusive, and the average age was 11 years. They thinned out the small plants in the spring, hoed, pulled up the beets when grown, and "topped" or cut off the beet tops. "Pulling" requires considerable physical effort, for the matured beets weigh from 2 to 8 or 9 pounds; in "topping" a certain amount of danger is involved, especially for the younger children, as the work is done with a long, sharp knife hooked at the end. Cuts on the legs or knees are not infrequent, and occasionally a child cuts off a finger. Physically, however, the most harmful feature of the work probably lies in the long hours. From 64 to 85 per cent of the children (the proportion varying with the different processes) worked 9 hours or more per day, the working-day running sometimes to 13 or 14 hours, exclusive of mealtimes. The average working-day, however, was usually between 9 and 10 hours. The continued stooping in kneeling and crouching positions when "thinning" and the lifting and handling of heavy weights in "pulling" and "topping" affects, it is believed, the posture and outline of the growing child's body. Seventy per cent of more than 1,000 beet-working children who, in connection with this study, were examined by the hygiene division of the bureau had postural deformities and malpositions apparently due to strain, as shown in the report of that division.

One of the most serious effects of beet work on children is its interference with their education. Comparison of the children so employed with children who were not engaged in beet work based upon school records in 1920¹ showed that the percentage of retarded children was 20 to 30 per cent higher among the employed than among the nonemployed children. Among the children employed in beet work the lowest percentage of retardation was found among the children of resident owners and the highest among the children of transient laborers. The high proportion of retarded children among the beet workers is due to the prolonged absence of the beet-working children during the spring and fall beet seasons. In transient laborers' families children are likely to be withdrawn from school for the

¹ These records covered several thousand children.

exodus to the beet fields in March, April, or May, not to return until November or December, and sometimes even January. The resident children lose less time, but school records in 1920 showed that they were absent from 30 to 60 per cent of the school days up to November 15, while children who did not work in the beet fields were absent only 5 to 14 per cent of this period. The attempt to substitute a summer session for beet workers—while it has improved the attendance—has not yet succeeded in enabling the children to make the same progress that can be made in the ordinary, uninterrupted term. For children in laborers' families who continuously work in the beet fields year after year there is little chance of obtaining the amount of education which a normal child should acquire between the ages of 6 and 14 or 16.

Child welfare in cotton-growing areas of Texas.

A survey of rural child welfare in Texas included parts of two typical rural counties in the cotton-growing section of the State—Hill County in the rich "black belt," where the proportion of Negroes is low and the proportion of farm tenants is high, and Rusk County in east Texas, where these conditions are reversed.

Most of the field work done by the children was in connection with the cotton crop. In the cotton fields at the picking season the whole family can usually be found at work—father, mother, and children of all ages. In the spring children work at hoeing and chopping the cotton and, although not so extensively, at plowing, harrowing, cultivating, and other kinds of field work.

Practically every child 10 years of age or over—girls as well as boys—had worked in the fields at some time during the year covered by the study, though most of them for only a month or two. More than half worked in the fields 10 hours or more a day, on an average, and many reported an average working-day of 12 hours or even longer.

The extent to which field work interfered with education was difficult to measure in full, since school terms in rural districts are often shortened to accommodate work in the fields. For the schools which began in September or October many teachers reported that a half or third of the children who should have been in school did not register until November or later. Many of these children will, in mature life, be handicapped by illiteracy. In 7 per cent of the white families visited in Rusk County, and in 9 per cent of those in Hill County, one or both parents were illiterate; in about one-third of the colored families illiteracy of one or both parents was reported.

It was customary for mothers to work in the field, either taking their babies with them or leaving them at home in the care of children too young to work. Between 50 and 60 per cent of all white mothers visited had done field work at some time during the year, between 30 and 40 per cent of them working in the fields 10 hours or more a day. Almost three-tenths of the mothers in Hill County and almost half those in Rusk County reported a day's work of 14 hours or more, including their necessary housework in addition to the field work. The proportion of mothers who worked was higher among Negro families, and the hours in field work averaged longer.

Overcrowding in the homes was common. Although the surroundings of the children of farm owners were more favorable than those in which tenants' children lived, about 15 per cent of all the white families in Rusk County and 24 per cent of those in Hill County were living in houses with two persons or more per room. Negro families were even less favorably housed.

Child welfare in bituminous coal-mining camps.

A study of conditions affecting child welfare in an anthracite coal-mining area was described in the last annual report. To obtain information of a similar character regarding children in bituminous mining districts, a second study of child welfare in mining communities was undertaken during the past year.

A part of a county in West Virginia was chosen, believed to be representative of the bituminous coal-mining districts of the Appalachians, which extend through seven States. The population in the mining communities of these regions, unlike that of the anthracite area studied, is predominantly native; three-fifths of the families covered by the Children's Bureau study were native white, and one-fourth were Negro.

Owing to the physical conditions under which bituminous coal is mined, and to the fact that the life of any one mine is comparatively short, the miners and their families live in "camps" or communities owned and controlled by the mining companies and having many of the unfavorable characteristics—sanitary and cultural—of temporary settlements. Many of the children know no other type of environment, though they suffer the disadvantage of frequent removals from camp to camp. Only 8 per cent of all the families in the study had been 10 years or more in the community in which they were then living, and only 1 per cent owned their houses, 93.5 per cent living in houses owned by the mining companies.

The mountain mining camp is an isolated, one-industry community. Almost nine-tenths of the chief wage earners in the families to which the children belonged were employed by mining companies. Practically all the others were in domestic service or worked on the local railroads. Three-fourths of all the heads of households were engaged in underground occupations.

The problem of child employment is not an important one numerically—as it was in the anthracite area studied by the bureau—for there is practically nothing for the boy except to enter the mines, which he can not legally do until he is 16, and for the girl there is nothing but domestic service, the demand for which is negligible. Only one-fifth of the boys 13 to 16 years of age, inclusive, had started regular work, as compared with three-fifths in the anthracite area studied; and only 4 per cent of the girls of this age had worked regularly, as compared with 29 per cent of the girls in the anthracite communities.

Little opportunity for work might have meant increased opportunity for education. But, though 85 per cent of all the children under 16 years of age were in school, it is doubtful whether during their most formative years they were not learning habits of idleness and indifference on the one hand or of discouragement and failure

on the other, which would prove a lifelong handicap. Seven-tenths of all the children in school were from one to six years below the normal grade for their age, considerably over a fourth of them being retarded three years or more. A large proportion of these children could not hope to reach more than the fourth or fifth grade before the end of the compulsory school period. In fact, over one-half of all the children who had gone to work had completed at best only the fourth grade and less than one-tenth of them had finished the entire elementary course. In the absence of industries to tempt children into wage earning at an early age lay an unusual opportunity for the school to give constructive training. But the schools were in no way fitted to follow up their advantage—school terms were short; teachers young, untrained, and inexperienced; and school equipment inadequate.

Nor could the homes of the children supply what was required for proper development. One-eighth of all the mothers, and more than one-eighth of the fathers or other chief wage earners, were illiterate. Nearly two-thirds of the families lived in houses containing four rooms or less, and in nearly one-tenth of the families from four to nine persons slept in one bedroom. Considerably more than three-fifths of the heads of households earned less than \$1,850 a year, and over two-fifths earned less than \$1,450, though many of them had large families; whereas the cost of maintaining, in health and reasonable comfort, a bituminous miner's family consisting of parents and three children was estimated in 1919 by Prof. William F. Ogburn as approximately \$2,140;¹ and the average cost of mere subsistence for a family in that year, based on a number of studies of cost of living, was estimated at more than, \$1,750.²

Physical standards for working children.

A preliminary report has been issued of the findings of the committee appointed by the bureau last year to formulate standards of normal development and sound health for the use of physicians examining children entering employment and children at work. It is the intention of this committee, of which the director of the industrial division has acted as secretary, to revise from time to time its recommendations in the light of further scientific research and practical experience. The preliminary report calls attention to the urgent need for a thorough, scientific study of the occupations into which young persons go and the effects of particular occupations upon their health and strength, especially if laws providing that children shall be physically fit for the occupations in which they expect to engage are to be administered justly and effectively.

Cooperation with other divisions of the bureau and with outside agencies.

The close relation between the industrial and economic factors affecting the life of the child and his physical and social well-being makes not only desirable but imperative a considerable amount of

¹ Ogburn, Wm. F., "Budget for Bituminous Coal Mine Workers," in *Studies of the Cost of Maintaining a Family at a Level of Health and Reasonable Comfort*, compiled by W. Jett Lauck, 1920, p. 34.

² Lauck, W. Jett: *What a Living Wage Should Be*. Before the U. S. Railroad Board, 1921, p. 5.

cooperation between the industrial division and the other research divisions of the bureau, as well as with other Federal bureaus and with outside agencies. During the past year this division has had the cooperation of the hygiene division in several projects, as has been indicated in the report of that division.

In all the projects undertaken by this division advice and cooperation are sought of such Federal, State, and local agencies as may be concerned with the purpose of the bureau's inquiry. For example, an informal conference of Government agencies engaged in social investigation and demonstration in the rural field was held at the call of the bureau on March 14 last at the office of the Director of the States' Relations Service of the Department of Agriculture, for the purpose of explaining the aim and scope of the rural studies conducted by this division, securing the advice of the experts attached to these agencies with reference to the items of inquiry to be covered, and preventing any possible duplication of work already under way in other departments. At this conference representatives of the following bureaus and services were present: States Relations Service and Office of Farm Management, Department of Agriculture; Bureau of Education, Department of the Interior; Home Economics Education Service, Federal Board for Vocational Education; and Women's and Children's Bureaus, Department of Labor.

Growth of the work of the industrial division.

During the past few years—especially since the Children's Year campaign, which, through its Back-to-School and Stay-in-School drives greatly extended and stimulated popular interest in the relation of industry to child life—requests made of the Children's Bureau for both technical data and popular literature with reference to child labor and the means for its regulation have increased greatly. Because of lack of sufficient funds the bureau has been obliged to refuse numerous requests for local and State-wide surveys of child-labor conditions and the means for its regulation and has been unable to undertake many other studies which are urgently desired as a basis for the improvement of legislative and administrative standards.

Proposed work for 1922-23.

So far as the appropriation will permit, the plans for the division for the fiscal years 1922 and 1923 include further field and research studies, as follows:

1. A continuation of the studies of the economic, social, physical, and working conditions affecting the rural child laborer.
2. A comprehensive inquiry into the conditions under which children are prepared for and directed into industrial life, and a continuation of studies relative to the requirements made and opportunities offered the young wage earner by various lines of industrial or other employment.
3. Study of the effect of certain occupations upon the health and physical development of the growing child.
4. Study of the employment of children in hazardous trades and of industrial accidents among children.
5. Continuation and extension of research, especially with reference to laws affecting child labor and their administration.

SOCIAL SERVICE DIVISION.

EMMA O. LUNDBERG, *Director*.

The social service division during the past year has placed its main emphasis upon studies of juvenile courts and the compilation and analyses of legislation for the protection of children in need of special care. The scope of the division's interest is broad, and the limited staff has made it necessary to select each year certain subjects for special consideration, keeping always in mind a general, inclusive program. The first work undertaken related to the care of mentally defective children, and several studies have been made of the social aspects of mental defect, three of them in collaboration with the United States Public Health Service. During the past year there has been no field study on this subject, but the division has compiled data in regard to the purposes, methods, and findings of approximately 400 investigations made under various auspices, which are suggestive of the social significance of mental defect. This material is now being prepared for publication.

For three or four years past the division has given special attention to certain phases of child dependency, especially the dependency problem that results from illegitimacy and the need for better legal protection of children born out of wedlock. A third report of the series on illegitimacy as a child-welfare problem is practically ready for the press; this deals with the care of infants under two years of age by agencies and institutions, and represents a cooperative piece of work between the Children's Bureau and the agencies concerned in this problem in Boston, Philadelphia, and Milwaukee, 18 rural counties in New York State, and one large agency in New York City. Most significant in connection with efforts to improve the condition of children born out of wedlock is the report of the committee on status and protection of illegitimate children appointed by the National Conference of Commissioners on Uniform State Laws at the request of the Children's Bureau. This committee has used as a basis for its work the bureau's published reports on the legislative and social aspects of the problem, especially the conclusions of the two regional conferences which early in 1920 discussed standards for the legal protection of children born out of wedlock. The committee has issued a preliminary report including a tentative draft of a "uniform illegitimacy act," which will be submitted to the annual meeting of the national conference in August, 1921.

Dependent children.

A beginning has been made in the study of children placed out in family homes through an inquiry now under way in the District of Columbia. A report relating to children deprived of parental care and taken under the custody of Delaware agencies was issued during the year. This study emphasizes the need for preventive and constructive social work with families, and also for other forms of aid that may reduce the number of children removed from their homes for causes associated with poverty. More than 50 per cent of the children included in this study had both parents known to be living, only 3 per cent were known to be full orphans, and 31 per

cent were half orphans. Twelve per cent of the children were dependent because of birth out of wedlock. One-third of the children removed from their parental homes came from families of which the mother was the economic head. In the families of at least 73 per cent of the children unfavorable physical, mental, or social characteristics were reported for one or more members of the family group. Forty-three per cent of the children studied were removed from their homes because they were delinquent and the parents were presumably unable to control them, 25 per cent because the parents were delinquent or the home unfit, 23 per cent because the parents were unable to continue care for the children, 7 per cent because of the death of one or both parents, and 2 per cent for other reasons. The need for extension of the policy of providing family homes for children who are deprived of the care of their own families was indicated by the fact that 83 per cent of these children were cared for in institutions, while only 17 per cent were placed in family homes.

Closely allied to the question of the removal of children from their homes is the administration of mothers' pensions, designed primarily to prevent child dependency. Forty States now have laws providing for some form of special assistance to children who are in need of such aid, because of the death, disability, incarceration, or desertion of the father. There is great diversity in administration; in many States the amounts available for such aid are inadequate, or other conditions render the laws practically inoperative. Studies are now under way to determine the present status of mothers' pension administration and to secure information with regard to the adequacy of aid and the special measures that are taken to promote the welfare of the children. In June, 1921, the family section of the National Conference of Social Work appointed a committee consisting of representatives of agencies administering mothers' pensions to cooperate with the Children's Bureau. The studies now in progress are designed especially to form a basis for the working out of improved standards of administration.

Juvenile courts.

The field work of the study of the organization and methods of 10 juvenile courts has been completed. The courts included were located in the following cities: Boston, Buffalo, Denver, Los Angeles, Minneapolis, New Orleans, St. Louis, San Francisco, Seattle, and Washington, D. C. A great diversity in jurisdiction, procedure, organization, and methods was found to exist. As a result of the problems encountered in the course of this study, and the interest of the judges and probation officers in the methods employed in other localities and in the possibilities of raising the standards of work, arrangements were made for a conference to be participated in by those having intimate knowledge of the work of the courts. This conference on juvenile courts was held in Milwaukee, June 21-22, 1921, under the joint auspices of the Children's Bureau and the National Probation Association. The topics included the contribution of the juvenile court to the child-welfare movement, the fundamental principles of the juvenile court, study of the individual child as a preliminary to treatment, definition of the field of the juvenile

court, the place at which the responsibility of the court should begin, the extent to which court procedure can be socialized without impairing individual rights, application of the program to rural communities, and adjusting treatment to individual needs.

The Chief of the Children's Bureau has asked the following, nominated for the purpose by the conference, to act as an advisory committee to the bureau to consider what is possible at this time in the way of the formulation of certain common standards of juvenile-court organization and practice:

Judge Charles W. Hoffman, court of domestic relations, Cincinnati.

Judge Kathryn Sellers, juvenile court of the District of Columbia.

Judge Henry S. Hulbert, juvenile division of probate court, Detroit.

Dr. Miriam Van Waters, referee, juvenile court of Los Angeles.

Bernard Fagan, chief probation officer, children's court, New York.

Joseph L. Moss, chief probation officer, juvenile court, Chicago.

Herbert C. Parsons, secretary, Massachusetts Commission on Probation.

Charles L. Chute, secretary, National Probation Association.

Dr. William Healy, director, Judge Baker Foundation, Boston.

Dr. V. V. Anderson, associate medical director, National Committee for Mental Hygiene.

Henry W. Thurston, New York School of Social Work.

Ralph S. Barrow, State superintendent, Alabama Children's Aid Society.

Secretary: Emma O. Lundberg, Children's Bureau, United States Department of Labor.

The topics to be considered by the advisory committee on juvenile court standards will be grouped under: (1) Jurisdiction and procedure. (2) Process before hearing. (3) Preliminary study of the child. (4) Methods of probation.

Three special monographs relating to juvenile-court work have been prepared for the bureau: Probation in Children's Courts, by Charles L. Chute, secretary of the National Probation Association; The Practical Value of Scientific Study of Juvenile Delinquents, by Dr. William Healy, director of the Judge Baker Foundation, Boston; Legal Aspect of the Juvenile Court, by Bernard Flexner. The first of these was published during the past year, the second is in press, and the third is being completed.

Juvenile offenders against Federal laws.

A field study has been completed during the year of children under 18 years of age who have violated the laws of the United States. The attention of the bureau had been called to this problem by several persons in different parts of the country. The inquiry concerned children violating Federal laws in 1918 and 1919, their ages, the types of offenses committed, the methods of procedure, and the dispositions made. The Department of Justice and the Post Office Department were most helpful in making available the data upon which the inquiry was based. Throughout the United States during the 2-year period 1,145 children under 18 years of age were arrested for violations of postal laws and regulations, for 1,108 of whom there were records in the Post Office Department. From the

eight districts and the three institutions visited records were secured of 211 children arrested during the same period for other Federal offenses. If complete data were available for the entire country, the total number of children under 18 years of age violating Federal laws each year would probably be found to be at least 1,000.

Of the 1,108 juvenile postal offenders 38 were under the age of 10 years and 70 were 10 and 11 years; a total of 258, or almost one-fourth of all, were less than 14 years of age. Of the children violating postal laws 15 per cent were employed in the Postal Service; 33 of the children so employed were under 16 years of age. Next in frequency to violations of postal laws were violations of interstate commerce laws—usually the breaking into and larceny from freight cars in interstate shipment. The data indicated that the offenses committed by children against Federal laws, for which they are tried and sentenced by United States courts, are in general no more serious than offenses against State laws which are within the jurisdiction of juvenile courts. Of the cases studied 61 per cent were tried by United States courts or by the Supreme Court of the District of Columbia; 30 per cent were taken before juvenile or other State courts on "preferred" charges which brought them under State laws; in the remaining cases no court action was taken or court action was not reported.

The study deals especially with the lack of adaptation for handling children's cases, inherent in the usual Federal procedure. Many Federal officials recognized the need for other types of treatment than were possible under Federal procedure and resorted to various expedients, the most common, as has been shown, being reference to a juvenile court on preferred charges. Other expedients included short-term jail sentences; informal reporting to the United States attorney, the case not being pressed during the child's good behavior; and nominal punishments, such as a small fine or a sentence of one day in the custody of the United States marshal. These are most unsatisfactory substitutes for the suspended sentence and probation. The Federal authorities have no facilities for ascertaining social facts about the child and his environment, nor have they the means for the intensive supervision and reconstructive work which are the basis of good juvenile-court work. A bill providing for a Federal probation system is now pending in Congress.

Legislation relating to children in need of special care.

The demand for analyses and summaries of laws relating to the care and protection of dependent, defective, and delinquent children has been especially great during the year, and efforts have been made to supply this material so far as the limitations of the division's staff would permit, either through printed reports, mimeographed material, or loans of manuscripts and charts. Addenda have been prepared in mimeographed form to reports previously issued on State commissions for the study and revision of child-welfare laws and on mothers' pension laws. Summaries and charts of legislation are now being prepared for distribution. These include a comparative chart showing mothers' pension laws in all the States, topical summaries of juvenile-court laws, and analyses of the laws relating to State and other public boards dealing with dependent children.

Plans for the coming year.

Arrangements have been made for the preparation of a report on county organization for child welfare, through the cooperation of seven men and women who have worked out county organization in various States. The importance and interest of this subject was made increasingly evident by laws passed this year in Arizona, Arkansas, Missouri, Ohio, and Wisconsin, and in efforts to secure legislative approval for county organization in other States.

Considerable work has been done in analyzing the laws relating to State boards charged with the care or protection of dependent children, and a part of the current work of the division consists in compiling data relating to the work of State departments and bureaus dealing with children in need of special care. It is hoped that it may be possible to undertake a first-hand study of the organization and work of a certain number of State departments, with special reference to their activities relating to dependent children. At this date approximately 30 of the States have separate bureaus or special divisions for child welfare in the State boards dealing with charities and corrections.

In two States that are predominantly rural, investigations are being started on child dependency and delinquency and the organization of juvenile courts in rural communities. In the studies of child dependency, the reasons for the removal of the child from his home and the possibilities of keeping the family together will receive special attention.

In connection with the studies of children before the courts, the bureau has been urged to make a study of courts of domestic relations, or family courts, in their relation to children. Plans for such an inquiry have been made, but it has been impossible to undertake the work. It is proposed to include in such a study the interrelationship between children's cases and family cases and other types of problems that come before the courts of a community. It is also hoped that a special study may be undertaken in typical communities of the methods of dealing with adults who contribute to the delinquency of children.

STATISTICAL DIVISION.

ROBERT M. WOODBURY, PH. D., *Director.*

The functions of this division are twofold—independent research and the writing of special reports, and service to other divisions of the bureau in the preparation and tabulation of statistical material and in statistical advice and criticism in regard to plans for studies and the preparation of reports containing statistical data. During the past year three reports have been written—*Infant Mortality in Pittsburgh*, *Statures and Weights of Children under Six Years of Age*, and *Infant Mortality and Preventive Work in New Zealand*. The first of these has been issued, the second is in press, and the third is being prepared for press. Progress is being made upon a report summarizing the result of the Children's Bureau's studies of infant mortality in eight cities; the principal summary tables have been used in previous annual reports, and the progress of analysis has not yet advanced sufficiently to produce any additional correlation of interest.

Statures and weights of children.

During Children's Year, April, 1918, to April, 1919, several million children under 6 years of age were weighed and measured as a feature of the year's popular child-welfare campaign. Although in some cases the methods of weighing and measuring fell short of scientific accuracy, this did not destroy the value of the demonstrations of comparative measurements of individual children and the acquaintance of the public with accepted standards. Moreover, in certain localities the work was done under excellent conditions, and it was plain that new and valuable data were included in the vast number of records. After consultation between the directors of the statistical and hygiene divisions, pediatricists, and anthropological and statistical authorities, standards of selection were agreed upon by which 172,000 records were chosen and the material tabulated.

The main tabulations were completed early in September, and the report is now in press. It contains tables showing average heights and weights of boys and girls for each month of age from birth to 6 years, and average weights of boys and girls for each inch in height from 20 to 27 inches. Separate tables were made for certain nationality groups and for certain States in which a sufficiently large number of children were weighed and measured to permit satisfactory averages.

It appeared that the heights of the children of Iowa averaged substantially the same as those of all children included in the tabulations, but that, on the one hand, the children of New York City averaged half an inch less than all children included, while on the other the children of California averaged half an inch more than the average for all children. The California children weighed on the average about three-fourths of a pound more than children in the country as a whole. Among the nationality groups the children of Italian parentage were smallest, averaging about an inch shorter and a pound lighter than all children. The children of German parentage were slightly above, and the children of Scandinavian parentage considerably above, average height and weight. Children of native parentage had average heights and weights substantially the same as those for all white children. Comparison between average heights and weights of city and country children showed that the country children were very slightly taller and heavier than the city children.

A study was made of heights and weights of children in California and New York City, who were given medical examinations by physicians and were found to have certain defects. It appears that rachitis and malnutrition are markedly correlated with deficiency in weight, the amount of deficiency in proportion to weight being greatest for children of the youngest ages. Children with adenoids and diseased or enlarged tonsils showed a slight deficiency in weight, the amount of deficiency being greater for children 3 and 4 years of age than for children under 3 years of age. In the whole group of children in these areas, approximately 7 per cent were reported as having adenoids and 20 per cent as having diseased or enlarged tonsils. In the case of most of the defects tabulated the proportion of children with defects increased markedly with age.

A brief summary of the report has been printed in leaflet form. It contains the two basic tables, one showing average heights and

weights of boys and girls by months and the other showing weight for height by sex.

Infant mortality and preventive work in New Zealand.

The report on Infant Mortality and Preventive Work in New Zealand is based upon an analysis of statistical material available. Since about 1905, New Zealand has reduced its infant mortality from gastric and intestinal diseases four-fifths, a result which can be ascribed in large part to the infant-welfare work carried on by the New Zealand Society for the Health of Women and Children. A striking decrease has also been secured in the mortality from respiratory diseases, the rate from this group of causes of death being reduced by about one-half during the same period. A slight reduction appears to have taken place in the mortality from diseases of early infancy. Besides the work of the New Zealand Society for the Health of Women and Children, the work of the Department of Health and of the Department of Education has been influential in lessening infant mortality. The work of the former department includes particularly the regulation of midwives, the training of nurses, the establishment of St. Helen's maternity hospitals for the training of maternity nurses, and the subsidizing of the work of the New Zealand society already mentioned; the work of the Department of Education has consisted in the protection of infants boarded out apart from their mothers by means of the licensing and inspection of boarding homes and supervision by trained nurses.

Infant mortality in Pittsburgh.

Figures for 1919 and preliminary figures for 1920 indicated that Pittsburgh had the highest infant mortality rate of any of the cities of 250,000 population or over in the birth-registration area. To throw light on the causes of this high mortality a study was made of the death certificates; the infant mortality rate was analyzed by cause of death, and by wards. Recommendations were made in line with the experience of other cities in efforts to lessen their infant mortality rates.

Progress on other studies.

The statistical division has completed tabulations for the industrial division on the studies of child welfare in a West Virginia mining town and the work of children in beet-growing communities in Michigan and Colorado; it is now engaged in completing the tabulations for a study of the work of children in a cotton-growing area in Texas and has commenced the statistical work on a study which was made in truck-farming areas of Virginia and Maryland. The Baltimore infant mortality report is now in the hands of the editorial division; the principal conclusions have already been presented in previous annual reports. Final tables on the Gary study of children of preschool age were completed during the year. The report on infant mortality in Gary, which is practically ready for press, confirms the conclusions of previous studies with regard to the relation between fathers' earnings and infant mortality.

Plans for the coming year.

Work planned for the coming year includes the completion of the summary report on infant mortality, the writing of the report of a

study of maternal and infant welfare in Georgia, the preparation of a report on infant mortality and preventive work in Australia, continued cooperation with other divisions of the bureau in the planning, tabulation, and preparation of statistical studies, and such additional independent studies as the resources of the division will permit.

EDITORIAL DIVISION.

KATHARINE F. LENROOT, *Director.*

The editorial division is responsible for editing and verifying reports and preparing them for publication, for editing articles and papers prepared by members of the bureau staff, and for preparing press releases and special articles. It conducts general current research of interest to all divisions of the bureau and prepares in mimeographed form a weekly news summary containing items of interest in the child-welfare field. The preparation of exhibit material and the small collection of traveling exhibits owned by the bureau are under the jurisdiction of this division.

Reports issued.

The number of new publications issued each year since the establishment of the bureau gives some indication of the growth in its work.

Year.	Number issued.	Total pages.	Year.	Number issued.	Total pages.
First year, 1913.....	2	25	Sixth year, 1918.....	34	1,144
Second year, 1914.....	7	384	Seventh year, 1919.....	31	1,710
Third year, 1915.....	6	307	Eighth year, 1920.....	16	1,214
Fourth year, 1916.....	6	1,142	Ninth year, 1921.....	32	1,329
Fifth year, 1917.....	12	820			

During the past year 32 publications, including reports, leaflets, dodgers, and charts, were issued, as follows:

Eighth Annual Report of the Chief, 1920.
 Administration of Child-Labor Laws: Part 4, The Employment-Certificate System, Wisconsin, by Ethel E. Hanks.
 Administration of the First Federal Child-Labor Law.
 Average Heights and Weights of Children under Six Years of Age.
 Breast Feeding.
 Children Deprived of Parental Care: A study of children taken under care by Delaware agencies and institutions, by Ethel M. Springer.
 Effect of War on Working Children in Germany. (Reprint from Monthly Labor Review, July, 1921.)
 Health of the Child is the Power of the Nation (Spanish). Chart Series No. 3.
 Illegitimacy as a Child-Welfare Problem, Part 2: A study of original records in the city of Boston and in the State of Massachusetts, by Emma O. Lundberg and Katharine F. Lenroot.
 Infant Mortality: Results of a Field Study in Akron, Ohio, by Theresa S. Haley.
 Infant Mortality: Results of a Field Study in New Bedford, Massachusetts, by Jessamine S. Whitney.
 Infant Mortality in Pittsburgh: An analysis of records for 1920 with six charts, by Glenn Steele.
 Infant-Welfare Work in Europe: An account of recent experiences in Great Britain, Austria, Belgium, France, Germany, and Italy, by Nettie McGill.

- Is Your Child's Birth Recorded? (revised), Dodger No. 3.
Legal Requirements for Physical Examinations of Children Going to Work.
Chart Series No. 4.
Physical Standards for Working Children: Preliminary report of the committee appointed by the Children's Bureau of the U. S. Department of Labor to formulate standards of normal development and sound health for the use of physicians in examining children entering employment and children at work.
Probation in Children's Courts: Monograph prepared for the Children's Bureau, by Charles L. Chute, Secretary, New York State Probation Association and National Probation Association.
Save the Youngest (revised).
Standards of Legal Protection for Children Born Out of Wedlock: A report of regional conferences held under the auspices of the United States Children's Bureau and the Inter-City Conference on Illegitimacy.
State Child-Labor Standards, January 1, 1921. Chart Series No. 1.
State Compulsory School-Attendance Standards Affecting the Employment of Minors, January 1, 1921. Chart Series No. 2.
The Administration of the Aid-to-Mothers Law in Illinois, by Edith Abbott and Sophonisba P. Breckinridge.
The Employment-Certificate System: A safeguard for the working child (revised).
The Working Children of Boston. (Reprint from Monthly Labor Review, January, 1921.)
The Trend of Child Labor in the United States, 1913-1920. (Reprint from Monthly Labor Review, April, 1921.)
Chart Series No. 5. Maternal Mortality Rates.
Chart Series No. 6. Infant Mortality Thermometer.
Chart Series No. 7. Deaths Under One Year of Age, by Monthly Age Groups.
Chart Series No. 8. Deaths Under One Year of Age, Grouped by Causes.
Chart Series No. 9. Summer Peak of Infant Deaths.
Chart Series No. 10. Comparison of Infant Deaths in 1910 and 1918.
Chart Series No. 11. Infant Mortality Rates, According to Fathers' Earnings.

A list of publications of the Children's Bureau, revised to November 1, 1920, was also issued.

Reports in press.

The following publications are in press:

- Child Care and Child Welfare. (Prepared for the Federal Board for Vocational Education; to be issued by that office as Bulletin 65. Home Economics Series 5.)
Child Labor and the Work of Mothers in the Shrimp and Oyster Canning Industries on the Gulf Coast, by Viola I. Paradise.
Industrial Homework of Children in Providence, Pawtucket, and Central Falls, Rhode Island.
Infant care (revised).
Maternity and Child Care in Selected Rural Areas of Mississippi, by Helen M. Dart.
Office Administration for Organizations Supervising the Health of Mothers, Infants, and Children of Preschool Age, by Estelle B. Hunter.
Statures and Weights of Children Under Six Years of Age, by Robert Morse Woodbury, Ph. D.
The Practical Value of Scientific Study of Juvenile Delinquents, by William Healy, M. D., Judge Baker Foundation, Boston.
The Working Children of Boston: A study of child labor under a modern system of regulation, by Helen Sumner Woodbury, Ph. D.

Reports in preparation.

The following reports are in preparation:

- Administration of Aid to Mothers with Dependent Children.
A study of Industrial Conditions Affecting Children in an Anthracite Coal-Mining Area.

Child Care: Part 2. The School Age.
 Children in Coal-Mining Communities (West Virginia).
 Children of Wage-Earning Mothers: A study of a selected group in Chicago.
 Child Welfare in Cotton-Growing Areas in Texas.
 Child Welfare in Representative Beet-Growing Communities in Michigan and Colorado.
 County Organization for Child Care and Protection.
 Directory of Child-Health Agencies.
 Illegitimacy as a Child-Welfare Problem, Part 3. Methods of Care in Selected Urban and Rural Communities.
 Infant Mortality and Preventive Work in Australia.
 Infant Mortality and Preventive Work in New Zealand.
 Infant Mortality in Eight Cities.
 Infant Mortality: Results of a Field Study in Baltimore, Maryland.
 Infant Mortality: Results of a Field Study in Gary, Indiana.
 Juvenile-Court Organization and Methods: A comparative study of ten representative courts.
 Kentucky Nutritional Survey.
 Legal Aspect of the Juvenile Court.
 Maternal Care: Results of a Field Study in Baltimore, Maryland, based on births in one year.
 Maternity and Infant Care in a Rural County in Georgia.
 Opportunities for Minors in Metal-Manufacturing Industries in Michigan.
 Proceedings of the Conference on Juvenile-Court Standards Held under the Joint Auspices of the U. S. Children's Bureau and the National Probation Association, June 20-22, 1921.
 Report on the Study of the Preschool Child, Gary, Indiana.
 Social Significance of Feeble-Mindedness: A Bibliography of Published Reports of Investigations in the United States with Abstracts of Findings and Conclusions.
 Standards of Aid to Mothers with Dependent Children.
 Standards of Child-Labor-Law Administration.
 State Employment-Certificate Laws.
 The Chicago Juvenile Court.
 The Federal Court and the Delinquent Child: A study of the methods of dealing with children who have violated Federal Laws.

Magazine and newspaper publicity.

The act creating the Children's Bureau directed it to report "upon all matters pertaining to the welfare of children and child life." In its popular bulletins the bureau has attempted to reach the individual mothers of the country, but limited printing funds make it impossible to bring the information gathered by the bureau within reach of more than a small fraction of those who would gladly make use of it. Newspaper and magazine publicity offers an invaluable means of making available to the general public the results of the bureau's researches.

During the past year articles by members of the bureau staff or relating to the work of the bureau were published in 556 magazines, pamphlets, and bulletins, exclusive of the bureau's own reports. The great majority of these were in magazines, ranging from popular periodicals to medical, legal, and other technical journals.

Publications of the following foreign countries used press material prepared by the bureau or contained articles relating to its work: Argentine Republic, Belgium, Canada, England, Germany, Italy, New Zealand, Serbia, Switzerland, and Uruguay.

The bureau endeavors to furnish about once each week short press stories for newspaper use; these are usually based upon publications issued, though they are also employed to present news of special interest relating to the work of the bureau—for instance, the forma-

tion of an advisory committee on standards. While the clipping service is incomplete, returns on articles furnished indicate many thousand issues of Children's Bureau material. Returns were received from every State in the Union and from the District of Columbia and Hawaii.

One of the problems encountered by the bureau has been that of reaching the large group in our population who can not read English but who are nevertheless in need of and entitled to information concerning the best methods of child care. The bureau has no means of approach save in English, and yet the last census figures available (1910) showed nearly 3,000,000 foreign born 10 years of age and over—more than one-fifth of the white population in that group—who could not speak English; other millions can not read it.

As a partial solution of the difficulty, the bureau has been fortunate in being able to utilize a foreign-language press service which has put its resources at the disposal of a number of Government bureaus, adapting, translating, and distributing material received. On the average, articles prepared by the bureau have been used by 12 foreign-language papers each month, a total of 1,106 returns being received during the year from papers printed in 15 different languages.

Exhibits.

As one method of "reporting," the bureau has built up a small collection of exhibit material which is loaned for short periods to organizations desiring to make use of it in connection with annual meetings, special exhibits, county fairs, health conferences, and child-welfare activities of various types. The division answers a large number of requests for information concerning exhibit methods and exhibit material and is developing a card index of data concerning motion pictures, slides, and charts which may be rented, bought, or borrowed from other agencies.

Hon. JAMES J. DAVIS,
Secretary of Labor.

JULIA C. LATHROP, *Chief.*

