

T
984

CHILD REARING PRACTICES
IN THE
S U D A N

By
Umar Siddik

A Thesis

Submitted in Partial Fulfillment of the
Requirements for the Degree of Master
of Arts in the Education Department
of the American University of
Beirut
1968

AMERICAN UNIVERSITY OF BEIRUT

Thesis Title:

Child Rearing Practices
In the
S U D A N

By

Umar Siddik
(Name of Student)

Approved:

Dr. Malik Bedri

M. Badri

Advisor

Dr. Gertrude Hildreth

Gertrude Hildreth

Member of Committee

Dr. Robert L. Young

Robert L. Young

Member of Committee

Date of Thesis Presentation: May, 1968

ABSTRACT

The purposes of this study are:

- A. To describe how three groups of Sudanese mothers - namely, rural, urban middle class, and urban lower class - rear their children with respect to the following child rearing practices: feeding, weaning, toilet training, discipline, maternal warmth, and sex training.
- B. To find out the similarities and differences among those three groups.
- C. To give cross-cultural comparison and pertinent suggestions.

In general Sudanese mothers prefer male children, but nonetheless they do not differentiate between boys and girls in maternal warmth and care. Having children is a central aim of marriage, and parents are happy about the event of pregnancy. Sudanese mothers breast-feed their children, use physical punishment as a disciplinary technique, and demand prompt obedience from them.

Considering the more conspicuous differences among the three groups, the study has shown that compared to urban mothers, Sudanese rural mothers use breast-feeding exclusively, and they do so for a longer period. They start toilet training earlier, but they complete the training process later. Though rural mothers are more decisive in weaning, more rural children suck their thumbs than do urban middle class children.

More urban middle class mothers reward their children for good behavior. Also, compared to the urban lower class and the rural children, more urban middle class children have feeding and toilet-training difficulties.

Sudanese mothers are similar to the Lebanese and Pakistanis in their happiness about the event of pregnancy, and warmth toward the child. The children differ from the Lebanese and resemble the Pakistanis in that more rural children practice thumb-sucking. Like the Lebanese, Sudanese mothers demand prompt obedience from the child. They are similar to the Iraqi mothers in the use of physical punishment to discipline the child. Compared to the Lebanese, fewer Sudanese children have toilet-training difficulties. Similar to the Lebanese and Pakistanis, Sudanese urban middle class mothers tend to prefer modern methods ~~tend to prefer modern methods of child rearing to older ones.~~

TABLE OF CONTENTS

	Page
Abstract	i
List of tables	iv
Chapters	
Part I Background of the Study	1
1. Meaning of child rearing	1
2. Importance of child rearing study	1
3. Purpose of the study	5
4. Obtaining the information	6
5. The country and the localities studies	8
Part II The Sample of Subjects	15
1. Number of subjects	15
2. Education of parents	15
3. Age of parents	16
4. Mother's employment	18
5. Household size	18
6. Sex ratios: boys and girls	20
Part III Child Rearing Practices	22
1. Mothers' reactions before child is born	22
2. Maternal wrath	31
3. Feeding	40
4. Weaning	50
5. Toilet training	61
6. Discipline	71
7. Sex differences in rearing practices	78
Part IV Conclusion	88
1. Summary	88
2. Limitations and suggestions	
Appendix	
I. English translation of interviewing schedule	92
II. Geographical location of the Sudan	100
Bibliography	101

LIST OF TABLES

	Page
1. Education of parents	15
2. Ages of parents	17
3. Average age of parents	17
4. Relatives living at home	19
5. Time of I's birth	25
6. Delay of I's coming	26
7. Picking up a crying child	32
8. What to do to a crying child	32
9. Time spent with the child	34
10. Following the mother around	35
11. Duration of breast feeding	40
12. Average time of breast feeding	41
13. Breast versus bottle feeding	41
14. Feeding schedule	45
15. Feeding problems	48
16. Weaning	55
17. Weaning problems	57
18. Thumb-sucking	59
19. Cleanliness training	65
20. Toilet training	66
21. Toilet training difficulties	68
22. Use of rewards	76
23. Disciplining the child	81
24. Methods of child rearing	84

PART I

BACKGROUND OF THE STUDY

1. MEANING OF CHILD REARING

child rearing is a broad subject which includes all the practices that influence the physical, physiological, and psychological development of the child. For example, feeding, weaning, swaddling, toilet training, discipline and sex training are a few of these practices. Other practices are expressions of love, annoyance, concern, and pride.

Sears mentioned that child rearing refers generally to all the interactions between parents and their children. These interactions include the parents expressions of attitudes, values, interests, and beliefs as well as their caretaking and training behavior. (43, p. 457)

Child rearing is a continuous process. Every moment of a child's life that he spends with his parents or other people has some effect on his development, and on both his present behavior and his potentialities for future action. (43, p. 466)

2. SIGNIFICANCE OF CHILD REARING STUDY

Social sciences such as sociology and psychology, clinical studies, and studies of child development all advocate the importance of the study of child rearing. Philosophers and educators like Plato, Locke, Rousseau, Dewey, and many others have looked to children in order to discover the true nature of man, and to the study of child rearing practices as a guide to building a better society.

Many psychologists and psychoanalysts believe in the continuity of behavior from childhood to adulthood. Sigmund Freud taught that all our relationships with other people, including the relationship of the mental patient with his doctor, are patterned by our early relationships with the people of our environment in infancy and childhood. Even the attitudes adopted toward political authorities may be modeled after the attitudes which the child is encouraged to adopt towards parents. (22, pp. 294, 136)

A number of conceptual systems have been offered to account for the continuity of behavior from childhood to adulthood and to relate the phenomena of the adult to experiences in early childhood. Two such systems are Kardiner's system, and the system of Mead and Sullivan.

Kardiner termed his system "The psychodynamic analysis". According to this system each child undergoes a certain set of experiences at the hands of significant adults. These experiences - child rearing practices - are the "primary institutions", which give rise to the "projective systems" of the child. The projective systems are the unconscious modes of thought or of interpreting the world which the child carries through life. These in turn give rise to the "secondary institutions" which are the adult belief systems particularly folklore and religion. (17, p. 4)

2 Mead and Sullivan's conceptual system is called the "Interpersonal theory." According to this theory each individual develops a concept of himself as a result of his early relationships. A concept with both verbal and preverbal components, and one which becomes increasingly difficult to change as more and more learning takes place. This concept gives continuity to a

given individual's behavior patterns, for it serves as a sort of reference point in his decisions. It is learned at the hands of significant other people, usually parents and other siblings. It leads to predictability within the family "since the self is a system of reflected appraisals". Therefore, personality develops within the matrix of the interpersonal experiences of an individual. He becomes in part what others expect of him and in part a compromise between their expectations and his own capacities. Since personality patterns are learned, and since the demands of different cultures are different - so are the personalities which emerge as responses to those demands. (17, p. 8)

Geoffrey Gorer, Margaret Mead, and others advocate that pleasurable early states, such as may be associated with warmth, hunger satiation, gentle handling, or rocking, encourage relatively positive feelings toward experience. These feelings endure, especially if they are reinforced by consistent subsequent experiences. They gradually crystallize into attitudes of confidence, mastery, adequacy, and security. "The positive world and self view, born of gratification, may be summed up in the formula: this is a predictable, friendly world that I can manage. "Persistent non-gratification, tension, or exposure to unpleasant experiences may encourage a negative world and self view, that can be summed up in the phrase: "this is a dangerous and unpredictable world that I cannot control." (22, p. 228)

According to Erikson, the bulk of the baby's early experiences are mediated through the mouth, gums and teeth, limbs, anurothra, and genitals. As each of these zones become involved in patterning, the child acquires certain modes of behavior. (22, p. 240)

Sears supports the idea that some personality characteristics appear to be extensions of the effects of early experiences. He said that this is "especially true of those qualities that involve personal relationships such as love, dependency, jealousy, and competition." (43, 4)

Generally, understanding child rearing practices has the following values:

- a. Shedding light on the general problems of child psychology. (38,19)
- b. Helping in understanding children's personalities.
- c. Providing parents with substance for comparison, and deeper insight in how other people rear their children.
- d. Helping prospective parents in their efforts to bring future happiness to their children.
- e. Giving basic information about family life, and throwing light on the society in which the child develops and grows up. (20)
- f. Leading to better understanding of the social life, the mores and customs of the people. (20)
- g. Furnishing a basis for understanding cultural differences and their meaning for human welfare and progress. (20)
- h. Usefulness to workers in the community agencies and development - such as social workers, anthropologists, psychiatrists, teachers, psychologists, doctors, etc.
- i. Aiding the teacher, especially that one who is interested in the education of the whole child, to build satisfactory relationships with his pupils. These relationships are basic to good instruction, and can be improved when the teacher becomes acquainted with the home backgrounds of his pupils, and how they were reared and brought up.

- j. Assisting the educator to formulate an enlightened school program suitable for both the child who is being educated, and the community in which he is growing up.
- k. Satisfying the need of many people, students and others, who are interested in the child, and who wish to read about him. (2)

3. PURPOSE OF THE STUDY

This is a study of selected child rearing practices in the Sudan. Its purposes are:

- a. To describe how three groups of Sudanese mothers - namely, rural lower class, urban middle class, and urban lower class - rear their children with respect to the following child rearing practices: feeding, weaning, toilet training, discipline, maternal warmth, and sex training.
- b. To find out the similarities and differences among the three groups of mothers.

According to Sears (13,8) there are three kinds of questions that can be asked about child rearing:

- a. How do parents rear their children?
- b. What effects do different kinds of training have on children?
- c. What leads a mother to use one method rather than another?

This study is limited, for practical reasons, to the first question, which is the key to answering the other two questions.

According to the survey of literature - in the Jafet and Education Libraries in A.U.B., and in the Office of the Sudanese Cultural Attache in Beirut - there has been no study of child rearing, or of any related aspect of child development in the Sudan. Except for Badris (2) application of the

Draw-a-man Test and the Draw-a-person Test to study the intellectual and personality development of Sudanese children.

b. OBTAINING THE INFORMATION

Information about child rearing practices was obtained by Dr. M. Badri (2) from Sudanese mothers with children five years of age. The mothers fell into three groups: rural lower class, urban middle class, and urban lower class. As will be seen later, the parent's occupation, education, and type of house were used to determine the class.

The information was collected by an interviewing schedule consisting of fifty-eight questions. The schedule was adapted from that of E.L. Prothro, which he used to study child rearing practices in Lebanon in 1961. Prothro evolved his schedule mainly from the interviewing schedule prepared by the staff of the Laboratory of Human Development in Harvard University. According to Prothro, the Harvard interviewing schedule explores most of the important aspects of child rearing practices as judged by contemporary psychologists. (34,26) Prothro's interviewing schedule is described in his book Child Rearing in the Lebanon (33), while the Harvard schedule is described in Sear's (et. al.) Patterns of Child Rearing. (43)

The fifty-eight questions of the interviewing schedule used by Badri cover a wide range of maternal behavior and child rearing practices. In order to delimit the study and to have a concrete reference, the questions focus around the five-year-old child in the family. This will also allow for cross-cultural comparisons. The study can be compared

with other studies that focus on the five-year-old child such as Sear's (43), Maccoby's, Prothro's (38), Minturn's studies in six different countries (33), and others. A span of five years is not too far away from early infancy for mothers to remember its happenings, and is not too short for obtaining adequate information.

The objective of the interviewing schedule is to collect information about child rearing practices; to find out what parents actually do, what sources of evidence do influence them, how they actually feel about their children and how they react in practice to all the situations which naturally arise in the handling of a child. The interview is a good way to obtain sufficient data on a broad subject such as child rearing practices, and it is specially suitable when the subjects are illiterate. (28,25)

There is good reason for examining the mother's behavior. Research such as that of Barker and Wright points out that the mother is the most common element in the child's early life, and that the interaction episodes between mother and child are at least three times as common as are those between child and father or any other family member. Moreover, the mother plays a much larger role in making child rearing decisions. (8, 37)

At the end of each interview with a mother, a sheet on "socioeconomic status evaluation" was filled out. This sheet called for information about the house, its location, shape, number of rooms, water and bathroom facilities, servants, furniture, and library. This information together with the information about the parents' occupation was used to make a general classification of the class status of the family.

5. THE COUNTRY AND THE LOCALITIES STUDIED

The Sudan is a vast country in the heart of Africa, lying between north latitudes 22° and 3° , and between east longitudes 22° and 38° . It has an area of about one million square miles, and a population estimated in 1963 to be 12,650,000. (5, p- 50)

The population is small in relation to the area; the population density is slightly more than 10 per square mile. About one third of the area is used only by migratory pastoralists, and the area containing a settled population accounts for less than a half of the total area.

"Apart from the large agglomeration of the three Towns (Khartoum, Khartoum North, Omdurman) and Port Sudan, the country is fairly described as rural and tribal although there are sizable market towns and administrative centres throughout." (5,506) Kortki said that while according to the 1955/56 census 8% of the population of the Sudan live in towns, only 4% or 5% live in towns which have full urban characteristics. (29,35)

The extent of migratory modes of living is remarkable. About 14% of the population is wholly nomadic. Tribal grouping is diverse; more than 570 tribes were registered at the 1966 census. (5,507)

The social strata has few people in the upper class and these are mostly business men; the middle class includes the government officials, professionals, merchants, and skilled labourers; the lower class includes the peasants and low income labourers who are usually illiterate. Nevertheless, the class distinctions in the Sudan are not sharp.

ECONOMY

Sudan's economy depends almost wholly upon agricultural and pastoral products. 81% of the population depend on the products of the land and water as 66% depend on agricultural cultivation for their livelihood, and 15% on animal wealth. (29,32) The main agricultural products are cotton, gum arabic, millet, peanuts, sesame, and dates. Camels, cattle, sheep, and goats are abundant.

Few industries have been established, as industrial development is still in its infancy.

RELIGION AND LANGUAGE

About three quarters of the population, who live between north latitudes 10° and 22°, are Muslims and Arabic-speaking. About one quarter of the population, who live between north latitudes 3° and 10°, are mostly pagan and partly christianized; they have many local dialects.

Muslims in the Sudan are subject to Shari'ah - religious law of Islam, - in questions of inheritance, marriage, divorce, family relationships and charitable trusts.

FAMILY AND MARRIAGE

In the Muslim north, the family is the basic unit of the social structure. It is patriarchal; the wife and other younger members are subordinate to the husband and father, or to another male member of the family. Any member is loyal to the family, and is ready to sacrifice in order to support his poor relatives. It is the duty of the family to

accommodate the aged, the sick, and the unemployed. Members of the family who live separately or in other places remain linked to their families and come back on such occasions as religious feasts, marriages, and death.

Marriage is accepted by everyone as the natural state for male and female. The proportion of both males and females who are married is among the highest in the world; according to the 1965 census, 88% of the females and 68% of the males were found to be or have been married. The discrepancy is due to polygamous marriages. (29,36)

Marriage is a happy event for the whole family. Often the parents choose the mates for their off springs. The family backgrounds of the bride and groom are more important than their own worth and compatibility of temperament. However, the educated new generations tend to free themselves from some of these customs.

There is great adherence to the moral idea of the virginity of girls, and successful marriage depends on the virginity of the bride. A woman should be a virgin before marriage, and should behave after marriage as a chaste and reproachless female.

In a house there is usually a wall or a fence that separates the men's quarters from the women's. There are few chances for the sexes to mix. Coeducation does not exist except in universities and institutes of higher education.

Girls are expected to be modest, physically unaggressive, yielding and sympathetic to people. On the other hand, boys are expected to be the strong, capable, and dominating sex. Any "loose" conduct, that might be ignored in the case of a man, is always condemned in the case of

a woman.

The male has commanding authority on almost all the family matters, and this requires the subordination of the wife to her husband. There is a division of labour along sexual lines; generally the man works to earn the bread, while the woman does the house work and caretaking of the children.

HEALTH

The Sudanese child is usually born at home and delivered by a trained midwife in the cities and towns, and by an old woman in villages and nomadic camps. Recently, in the big towns mothers have increasingly gone into hospitals to have their babies delivered.

Excluding the small territories of Brunei and Guam, the Sudan has the highest birth rate in the world. In 1955, 530,000 babies were born which gives a birth rate of 52 per 1000 population. (29,43) The infant mortality is also high, but much lower than in many countries. In 1955, 9½ babies aged less than one year were reported as having died per 1000 babies born in the same period. (29, 45)

In the Muslim north, a traditional belief still widely held is the "evil eye", a power which is supposed to come to certain people whether or not they are aware of it. When such a person sees someone, specially a child, whom they admire or envy, a look from their eye, without mentioning the name of God, causes the child to become ill or die.

EDUCATION

In the Muslim north, boys have long been instructed in religious subjects according to traditional methods.

In 1898 modern primary education began in the Sudan, and secondary education commenced in 1911. Post secondary schools in arts and science, agriculture, veterinary science, engineering and law were established between 1938 and 1941. In 1951 these schools became the University College of Khartoum, which in 1956 became the University of Khartoum. (5,512)

Illiteracy is high; according to the 1956 census, 12% of the adult population claim to have been to school, and 18% of the children of school going ages claim to be attending school or having been to school. (29, 28)

THE LOCALITIES STUDIED

The sample of subjects in the study was drawn from the Maslin Arabic - speaking north; specifically from the capital of the country and its suburbs, and from the Gezira, a fertile area lying between the Blue and White Niles south of Khartoum.

The capital is an aggregate of three towns: Khartoum, Khartoum North, and Omdurman. They are joined by bridges over the Nile, Blue Nile, and White Nile.

Khartoum is the political and commercial capital of the country. It is a cosmopolitan city with a population of 82,673 (1956 census). Khartoum North is an industrial town with a population about 60,000. Omdurman is a native town with a population of 125,300 (1956 census).-It is the centre of Sudanese cultural, political, and religious life. To Maki Abbas, quoted in Fabunmi (12,4), "Omdurman is the most interesting town in the Sudan. The population is almost a hundred per cent Sudanese, and a visitor from any part of the Northern Sudan can find relatives to

accommodate him^o It is famous for its bazaars of native handicrafts of gold, silver, ivory, and leather.

The Gezira is a fertile area where cotton is grown. Cotton is the backbone of the Sudan's economy. The Gezira is one of the most densely populated areas in the Sudan with a population density of about 200 per square mile (1956 census). Almost all the inhabitants are settled, and there are big towns, and marketing and administrative centres.

The climate in the Sudan is generally very hot. High temperatures, which usually precede the rains, occur in July in the extreme north, and in May - June in Khartoum and the Gezira. In the Capital and Gezira areas, most of the rain occurs in the three summer months of July, August and September.

Geography influences child rearing practices. The geographic conditions, for example, determine the type of food and hence the feeding habits of the people.

SUMMARY

Child rearing includes all the practices that influence the physical, physiological, and psychological development of the child.

A number of conceptual systems, such as Kardiner's system and the system of Mead and Sullivan, have been offered to account for the continuity of behavior from childhood to adulthood and to relate the phenomena of the adult to experiences in early childhood.

Besides shedding light on the general problems of child psychology and the society in which the child develops and grows, understanding child rearing practices has many values.

This study aims to describe how Sudanese mothers - selected from rural lower class, and urban middle and lower classes - rear their children with respect to certain child rearing practices, and to find out the similarities and differences among the three classes. This will be done by analysing the information about child rearing practices gathered by Badri (2) through an interviewing schedule.

The Sudan is a vast country in the heart of Africa, with a predominantly Muslim and Arabic - speaking population.

PART II

THE SAMPLE AND SUBJECTS

Number of Subjects

The sample used in this study included 151 Sudanese mothers with children five years of age. Mothers of children who were twins, who had noticeable physical or mental defects, who had not been born and reared in the Sudan, who came from broken homes (through death or divorce), and who came from polygamous marriages were excluded.

Out of the 151 mothers, 72 were urban middle class, 38 urban lower class, and 41 rural lower class.

EDUCATION OF PARENTS

At the end of the interview, each mother was asked about the education she and her husband received. The information obtained is presented in Table I

Table I. EDUCATION OF PARENTS

<u>Years of Schooling</u>	<u>0</u>	<u>1-4</u>	<u>5-8</u>	<u>9-12</u>	<u>13-16</u>
Urban middle class Fathers	5	15	16	24	12
Mothers	25	33	14	0	0
Urban lower class Fathers	29	9	0	0	0
Mothers	34	4	0	0	0
Rural lower class Fathers	35	5	1	0	0
Mothers	38	3	0	0	0

The information reveals a clear class difference in the educational status of the parents. 82 per cent of the urban and rural lower class are illiterate, and except for one father, none of them had more than four years of formal education. Only 5 urban middle class fathers - about 7 per cent - were illiterate against 25 illiterate mothers - about 34 per cent. Urban middle class fathers had an average of 9 years of formal education, and the mothers had an average of 3 years.

There is also a marked difference between the sexes in education. In general, there are more illiterate mothers than fathers regardless of social class, and in both urban and rural lower class only 7 mothers - about 8 per cent - went to school for a period of one to four years.

AGE OF PARENTS

Table 2 summarizes the ages of parents as reported by the mothers. In a few cases the ages given were approximations. Three mothers in the lower class could not give an approximation of either their ages or their husbands' ages.

Table II **NUMBER OF FATHERS AND MOTHERS**
IN
EACH DECADE

<u>Years</u>		<u>Below 20</u>	<u>20-29</u>	<u>30-39</u>	<u>40-49</u>	<u>50-59</u>	<u>60-69</u>
Urban Middle class	Fathers	0	3	24	27	15	3
	Mothers	4	21	42	5	0	0
Urban lower class	Fathers	0	11	18	4	0	0
	Mothers	1	18	14	1	0	0
Rural lower class	Fathers	0	6	9	11	2	0
	Mothers	3	9	7	0	3	0

Table III **AVERAGE AGE OF PARENTS**
IN
YEARS

	<u>Fathers</u>	<u>Mothers</u>
The whole sample	40.0	31.3
Urban middle class	42.0	31.7
Urban lower class	39.3	31.2
Rural lower class	38.4	31.0

According to these results, there is an age difference between the fathers and mothers. The mothers are generally younger than the fathers by 8.7 years. The difference is 10.3 years for the urban middle class, 8.1 years for the urban lower class, and 7.4 years

for the rural lower class.

The big difference between the ages of urban middle class fathers and mothers may be due to the fact that middle class men marry after spending some years in schools, and after becoming well established economically. So they marry late, and tend to choose girls at a comparatively younger age. On the contrary lower class males marry earlier, since they begin to earn their living at a quite early age.

MOTHERS' EMPLOYMENT

It was revealed that mothers do not work outside their homes. 9 middle class mothers- about one eighth- were working: 6 elementary and intermediate school teachers, 2 dress-makers and one sales girls in a shop. 5 urban lower class mothers worked as house servants and 2 made native caps. Of the rural lower class mothers, 4 made native caps, and 12 helped their husbands on the farm.

HOUSEHOLD SIZE

The average number of persons per family is 7.1 for the whole sample, 8.7 for the urban middle class, 6.8 for the urban lower class, and 7.6 for the rural lower class. The average number of children per family is 5.5 for the whole sample, 6.5 for the urban middle class, 4.7 for the urban lower class, and 4.5 for the rural lower class.

The larger number of children in the urban middle class is due probably to better health facilities for infants and not to the number of births.

51 per cent of all the families have relatives living with them. The details of this percentage are: 56 per cent of the urban middle class families, 32 per cent of the urban lower class, and 51 per cent of the rural lower class.

Generally, the families tend to have with them the parents' mothers and fathers. Three families had the wife and children of the fathers' brother living with them. Table 4, gives the information about the relatives living with the families of the sample.

Table IV RELATIVES LIVING AT HOME

	<u>NO</u>	<u>MM</u>	<u>FM</u>	<u>MF</u>	<u>FF</u>	<u>MB</u>	<u>FB</u>	<u>MS</u>	<u>FS</u>	<u>FC</u>	<u>FN</u>	<u>MN</u>	<u>FBW</u>
Urban middle class	32	7	6	3	3	2	3	4	2	3	1	2	2
Urban lower class	26	2	3	0	1	0	1	0	1	0	2	0	1
Rural lower class	19	4	6	0	2	1	2	1	0	2	1	0	0

NO - No relatives
 MM - Mother's mother
 FM - Father's mother
 MF - Mother's Father
 FF - Father's Father
 MB - Mother's Brother
 FB - Father's brother

MS - Mother's sister
 FS - Father's sister
 FC - Father's cousin
 FN - Father's niece
 MN - Mother's niece
 FBW - Father's brother's wife

SEX RATIO : Boys and Girls

The sample of five - year - old children included 78 boys and 73 girls; statistically there is no difference between the two numbers at the .01 level of significance. Considering the total number of children in the families, there were 406 boys and 427 girls, giving no significant statistical difference. In details, the urban middle class families had 235 boys and 233 girls, the urban lower class had 89 boys and 92 girls, The rural lower class had 82 boys and 102 girls.

Although there is no statistical difference between the number of boys and that of girls, the number of girls is slightly larger than the number of boys. The 1955/56 census revealed that there were more men in the Sudan than women, but predicted that the scarcity of women would change to abundance. (29,20)

S U M M A R Y

The sample used in the study included 151 mothers of five-year-old children. The total number of children in families is 833: 406 boys and 427 girls. The sample of five-year-old children included 78 boys and 73 girls.

There is a clear class difference in the educational status of the parents. 82 per cent of the urban and rural lower class are illiterate against 7 per cent of the middle class. In general, there are more illiterate mothers than fathers regardless of social class.

There is an age difference between the fathers and mothers in all classes. The mothers are generally younger than the fathers by about 8.7 years.

The mothers, in general, do not work outside their homes. The average number of persons per family is 7.1, and the families usually have relatives living with them, specially the parents' mothers and fathers.

Part III

CHILD REARING PRACTICES

1. MOTHER'S REACTIONS BEFORE CHILD IS BORN

One may wonder when to begin describing the rearing of a child. The obvious time would appear to be at the moment of birth or the instant at which the mother first sees her baby. But a great deal has already gone on before this; the mother has become pregnant and continued thus for about nine months, the parents have made preparations and developed expectations, and they have begun to live a different life of anticipation.

Honigsmann and others believe that the role of the future child may be reflected throughout the mother's pregnancy. (22,239) The customs, avoidances, and other habits practiced by the pregnant woman will reflect ambivalent, fearful, or hygienic attitudes towards reproduction that may be continued in the later handling of the baby.

Mead, quoted in Honigsmann (22,239), says, "It is probable that in different societies, by the attribution of more or less autonomy of movement to the baby, by enjoining upon the mother active or placid behavior, the process of learning may begin within the womb"

So it is sound to begin the study of child rearing from the time at which the mother first realized she was pregnant and was to become a mother. Questions 49,50 and 51 in the interviewing

schedule asked about the feeling of the mother before her child was born.

The first of these questions runs as follows: How do you feel about being a mother?

- a. What was your feeling when you discovered that you were pregnant with (x)?

Very happy; happy; slightly happy; sometimes happy and sometimes unhappy. unhappy most of the times; unhappy.

- b. How did your husband feel when he knew that you were pregnant with (x)?

Very happy; happy, slightly happy; sometimes happy and sometimes unhappy; unhappy most of the times; unhappy.

In answer to this question, 121 mothers, about 80 per cent, said that they were either very happy or happy when they discovered that they were pregnant. None reported that they were unhappy. 12 urban middle class mothers - 16 per cent, 4 urban lower class mothers - 10 per cent, and 3 mothers of the rural lower class - 7 percent-reported that they were sometimes happy and sometimes unhappy. 4 mothers of the urban middle class answered that they were unhappy most of the time. 2 middle class mothers said they were happy, but they were annoyed when thinking of the future pains of delivery.

Concerning the other part of the question, all mothers reported that their husbands were very happy or happy when they knew they were going to be fathers. So in general, fathers and mothers were happy about the event of pregnancy regardless of social class.

In the Sudan, having children is a central purpose of marriage. Failure to have children is a matter of grave concern not only to the husband and wife, but also to relatives and friends. Because it is a common belief, especially among the lay people, that the woman is usually the one to blame for not having children, this problem is considered one of the main reasons for divorce and polygamy. It is a great insult for a woman to be referred to as "abarrren woman". In cases of a man having more than one wife and only one of them having children, the husband usually confers special privileges on the latter.

This attitude toward having children may explain the reported general tendency of feeling happy about the event of pregnancy.

The second question in the series runs as follows: considering your financial situation and the ages of the children, do you feel that the birth of (X) was at a suitable time? Yes; I don't know; no, it was not at a suitable time. Table 5 represents the answers in percentage form.

Table V Mothers' Reactions to the Questions:

Was (X)'s birth at a suitable time: The figures are percentages

	<u>Yes, it was</u>	<u>No, it wasn't</u>	<u>I don't know</u>
Urban Middle class	73	21	6
Urban lower class	75	13	12
Rural lower class	78	9	13

These answers reveal that as far as financial situations are concerned, about three quarters of the mothers felt that the birth of their children was at suitable times, 3 urban middle class mothers, 2 urban lower class mothers, and 7 of the rural lower class added to the above response "It is God's will", and two of the middle class mothers added "this is something eternally determined". Although the idea of "God's will" was mentioned by only a few mothers, the writer assumes that it was the belief of most - if not all- mothers.

In the third question, each mother was asked: looking back on the matter, do you think it would have been better for you, if (x) had been delayed a little? Yes ; I don't know; no, Table 6 summarizes the answers in percent form.

Table VI Mothers' Answers to the Questions:
Would it have been better if (x) had been delayed?
The figures are percentages

	<u>Yes, it would</u>	<u>No, it wouldn't</u>	<u>I don't know</u>
Urban middle class	54	23	23
Urban Lower Class	51	11	38
Rural lower class	13	70	17

About half of the urban middle and lower classes mothers felt it would have been better if their pregnancies were delayed; only 13 per cent of the rural mothers thought so. This difference is statistically significant at the .01 level. 70 per cent of the rural mothers said that the delay would not have been better in contrast to 23 per cent of the urban middle class mothers and 11 per cent of the urban lower class.

Therefore, there is no clear difference between the urban middle and lower classes concerning the delay of pregnancy. But a significant difference exists between the urban mothers and the rural ones. The urban mothers generally thought that the delay of pregnancy might have been better for them while the rural mothers thought the contrary. This difference may be due to the difference between the comparatively cheap living in the village and the costly living in the city. Urban mothers might have thought that the delay of pregnancy would have given the family a chance

to establish themselves better economically, and would have given them more free time for leisure.

Prothro, in his study of child rearing in Lebanon, found no significant difference - in attitudes toward pregnancy - among the three groups he studied. In general, Lebanese fathers and mothers were happy about the event of pregnancy regardless of class, religion or place of residence. Most of the mothers felt that the pregnancy was suitable in light of finances and timing of pregnancies. (38,53 and 57)

On the basis of these findings, it can be said that there are no differences between Sudanese and Lebanese mothers in attitudes toward pregnancy and its time. The Lebanese attitude toward childless wives is also similar to that of the Sudanese. According to Prothro, in Lebanon, a wife without children is pitied by her friends and, among Moslems in particular, threatened by divorce. (38,54)

Also, according to Khan (28,34), Pakistani mothers were generally happy about the event of pregnancy. On the other hand Sears found in the comparable American study that although a majority of mothers reported that they had been happy about the event of pregnancy, 31 per cent had said that they had some reservations and mixed feelings, or that they were displeased. (43,32)

PREGNANCY AND DELIVERY

Pregnancy is apparently not an all-together pleasurable condition for a Sudanese woman; it is usually accompanied by nausea, cravings and aversions. A pregnant woman may long for foods which she has not previously liked. Such whims of pregnant women are actually part of a set of beliefs, superstitions and folklore legends. Specially among the uneducated, what the pregnant woman likes or dislikes, or anything to which she attaches strong feelings may have some effect on the fetus. Even the fathers are involved in this. It is not uncommon to hear of a man who killed a deer, and his child was born dead or with a distinct scar around its neck; or one may hear of a man who cut the claw of a bird and his child was born lacking a finger.

In Sudan, medical care for pregnant women is not adequate. Although more and more urban women go to seek medical care in hospitals and special centres, such arrangements are not found in the rural areas.

Delivery usually takes place at home at the hands of a trained midwife in cities and towns, and with an old woman attending in the rural areas. Recently in the city, mothers increasingly have gone into hospitals to have their babies delivered.

Here is a typical picture of the event of delivery. The pregnant woman feels pains of labour, her mother, other relatives

of her husband and herself, and the neighbours are called. Someone goes to call the midwife. The pregnant woman is encouraged to walk about the house to ease the delivery. Only women who have children are allowed to stay in the room with the delivering woman. For obvious reasons, men and children are kept away. Because of the common belief that their presence may unduly slow down the process of delivery, childless wives and unmarried women are also kept out. After delivery, the mother, husband and relatives are congratulated, and God is thanked that the mother was delivered safely. The birth of a boy is declared by certain shrieks uttered by the women.

Delivery is a painful event particularly for the Sudanese mother. The custom known in the Sudan as 'Pharaonic female circumcision' adds to the agony of child birth, because it necessitates the use of more elaborate surgical means. Further more women have no source of information or enlightenment about pregnancy and delivery. Wives have no opportunity of witnessing the birth of a child before they themselves deliver. What they come to know about this event, by way of casual conversation, is not always reassuring. The phrase "delivery is death" is well known to men and women alike.

Nevertheless, delivery of a child is a happy occurrence for the family. Feasts and ceremonies are held. Relatives, neighbours and friends come to congratulate the family and to share in the celebration of the happy event.

S U M M A R Y

Generally, wives and husbands felt happy when they knew they were going to become parents. Taking the financial situation into consideration, about three quarters of the mothers felt that the birth of their children occurred at suitable times. The urban mothers thought that delay of pregnancy might have been better for them, while the rural mothers thought the contrary. This difference between the urban and rural mothers is statistically significant. Urban mothers might have thought that delay of pregnancy would have given them a chance to establish themselves better economically.

Although pregnancy and delivery are stressful conditions for a Sudanese mother, the event of having a baby is a happy occurrence for the family, relatives, neighbours and friends.

According to Prothro's study of child rearing in Lebanon (38) and Khan's study of child rearing in Pakistan (28), it can be said that Sudanese mothers are similar to Lebanese and Pakistani mothers in being happy about the event of pregnancy.

2. MATERNAL WARMTH

So far we have discussed the attitude of the mothers toward their pregnancies and potential children. Now we will consider their feelings about the child as a member of the family, specifically, the warmth of the mother toward the child.

In order to accomplish this aim four questions were asked. The first of these questions is: Going back to the time when (x) was an infant, who took care of him most of the time? 89 per cent of the urban middle class mothers, 90 percent of the urban lower class and 91 per cent of the rural mothers answered that they themselves took care of their children most of the time. Many of them responded to the question by "of course, I did". Other people who were mentioned to have taken care of the child most of the time were: the grandmother of the child, his aunt, his sister, and the parent's niece. One urban middle class mother reported that the nurse took care of the child most of the time. So we can say that the mothers themselves took care of their children most of the time regardless of social class.

The second question asked first about ideal behavior, and second about what the mother had actually done. The question ran like this; some mothers believe the child should be picked up when he cries, while other mother let the child cry lest it gets used to being picked up. a) what is your opinion about this?

b) What did you actually do when (x) used to cry?

Table 7 and 8 represent the responses of the mothers.

Table 7 Mothers' Opinions about whether or not to pick up a crying Child.

The figures are percentages.

	<u>Always pick up</u>	<u>Pick up when valid reasons e.g. illness</u>	<u>let him cry</u>
Urban Middle Class	48	33	19
Urban lower class	56	18	26
Rural lower class	73	16	11

Table 8 Mothers' Answers to the Question: What did you do when (x) used to cry? The figures are percentages.

	<u>Always pick up</u>	<u>pick up valid reasons</u>	<u>feed him</u>	<u>let him cry</u>
Urban middle class	82	03	14	01
Urban lower class	95	0	05	0
Rural lower class	89	0	11	0

There is not great difference between both urban classes concerning their opinion about the ideal behavior toward a crying child. While about half of each of the urban classes thought that a crying child should be picked up, about three quarters of the

rural mothers thought so. 19 per cent, 26 per cent, and 11 per cent of the urban middle class, the urban lower class, and the rural lower class mothers, respectively, thought the child should be left to cry lest he gets used to being picked up.

But the answers to the other part of the question revealed that 82 per cent of the urban middle class mothers, 95 per cent of the urban lower class, and 89 per cent of the village mothers actually picked up the child when he cried. 14 per cent of the urban middle class mothers, 5 per cent of the urban lower class mothers, and 11 per cent of the village mothers fed the child when he cried. With the exception of one middle class mother, none of the mothers left the child to cry. So, there is no difference among the classes in the actual behavior of the mothers towards a crying child, since nearly all of them either picked up or fed the child when he cried.

The third question asked: Did you have time to spend with (x) other than the time spent in taking care of him such as feeding him or bathing him? Table 9 summarizes the answers of the mothers.

Table 9 Time Spent with the child

The figures are percentages

	<u>Always had time</u>	<u>Sometimes had time</u>	<u>rarely had time</u>	<u>Had no time</u>
Urban middle class	53	41	6	0
Urban lower class	54	28	7	11
rural lower class	31	61	8	0

These results show no significant difference between the two urban classes. However, they show a difference between the urban mothers as a whole and the village mothers. About half of the urban mothers always had time to spend with the child other than the time of caretaking, while only about a third of the village mothers had such time. None of the urban middle class and the rural lower class mothers reported that they had no time at all to spend with the child in contrast to four urban lower class mothers. The mothers spent the time singing to the child, cuddling, or fondling him.

In the fourth question in this series, each mother was asked: how do you feel when (x) follows you around continuously? The responses are shown in table 10.

Table 10 Mothers' feelings about their children always following them around .

The figures are percentages

	<u>Always nervous</u>	<u>Sometimes nervous</u>	<u>Always happy</u>
Urban middle class	37	43	20
Urban lower class	47	35	18
Rural lower class	39	44	17

There is no significant difference among the classes about how the mothers felt when their children followed them around continuously. About 40 per cent didn't like being followed around continuously by the child.

Anyhow, we can conclude that most of the mothers took care of their children by themselves most of the time, picked up the child when he cried, and had some time to spend, with the child other than the caretaking time. About four tenths of the mothers did not like to be followed around continuously by the child.

It has already been mentioned that the Sudanese are fond of children, and that having children is a central aim of marriage. This might be the reason for the lack of significant differences among the classes in the matters of maternal wrath and infant indulgence.

Sudanese mothers are similar to Lebanese mothers in maternal warmth. Prothro stated that the new born in Lebanon is generally received with warmth and treated with indulgence. (38,154)

Lebanese middle class mothers are significantly warmer than lower class mothers. (38,69) Although Sudanese urban middle class mothers are warmer than the rural lower class mothers, the difference is statistically, not significant. Sudanese mothers are probably more similar to Pakistani mothers who, according to Khan (23,42), showed no class difference in respect to maternal warmth.

Infant indulgence, maternal warmth, and infant neglect have great impact on the future personality of the child. Honigsmann ended his study on the Kaska Indian children with some important conclusions. He reported that the early maternal warmth received by the Kaska infant contrasts with his later experiences, at three years, old, when the maternal warmth is withdrawn. In defense he tries to suppress all feeling hoping thus to obliterate the anxiety produced. The defense operates in a large variety of situations, but it incapacitates the individual in relations with a spouse and interferes with sexual and other marital satisfactions. (22,44)

The studies carried out by Margret Read, Ribble, Spits,

wolf, and others pointed to the importance of maternal warmth to the welfare of the child. They reported that absence of "mothering" - for example, rocking, cuddling, fondling, cradling, stroking, etc., - is associated with constipation, rigidity and screaming. When the lack of maternal warmth continues, the infant drifts into a stupor. Such cases of infant trauma are not uncommon in orphanages with inadequate staff or wherever mother and child are separated for relatively long periods. In such cases the babies cried frequently, lost weight, suffered from insomnia, and remained retarded in development. These signs continued for the first three months of separation then a sort of "frozen rigidity" appeared, and interpersonal contact with the children became difficult, (22,23) Spitz, refers to the wasting away of the body as marasmus, and to the acute lack of responsiveness to environmental stimulation as anaclitic depression.

In order to study the importance of mothering, H.F. Harlow conducted a number of experiments on infant monkeys. He gave them "mother machines" to love instead of the real mothers. These infants gave the usual infant-to-mother reactions even though the mothers were synthetic. In times of stress, the baby monkeys ran and clung to their substitute mothers just as monkeys do to their real mothers. The most acceptable mother substitute, for the

monkeys, was a block of wood surrounded by sponge rubber, sheathed in terry cloth, and had an electric bulb inside to provide warmth. This was more effective than a wire-mesh substitute which in spite of the fact that it provided milk and warmth, it lacked softness and cuddliness. (34,282) One may conclude from this that infant monkeys, and perhaps human infants as well, need soft cuddly contacts.

Many psychologists and pediatricians recognized the high rate of infant mortality even in the best run orphan houses; this is presumably, at least partly, because the busy staff cannot help each infant satisfy "survival linked" demands for mothering. (22,236)

S U M M A R Y

There are no significant differences among the classes studied concerning maternal warmth and infant indulgence as measured by the four questions posed. Generally, most of the mothers, regardless of social class, took care of their children most of the time themselves, picked up or fed the child when he cried, and had some time to spend with him other than the time spent in taking care of him. However, about two fifths of the mothers did not like being followed around continuously by the child, two fifths liked it sometimes, and one fifth liked it all of the time.

These findings are similar, to some extent, to Prothro's (38) and Khan's (28) findings on Lebanese and Pakistani mothers respectively.

The studies of Mead, Ribble, Spitz, Wolf, Harlow, Honigsmann and others revealed the effect of maternal wrath on the future personality and welfare of the child.

F E E D I N G

We concluded in the last section that Sudanese mothers are generally warm toward their children. The degree of maternal warmth is usually manifested in infant feeding. Dar and Smitter stated that the mother's love and warmth are depicted by the way she feeds, nurses and toilet trains her child. (28,46)

In order to study infant feeding in the Sudan, each subject was asked two questions. The first question is: Will you please tell me something about your way of feeding (X) when he was an infant?

a) Did you suckle him? For how long? If not, how did you decide to use the feeding bottle? For how long did (X) use it?

The answers to this question are summarized in tables 11, 12 and 13.

Table 11

DURATION OF BREAST FEEDING IN MONTHS

<u>Months</u>	<u>5</u>	<u>6-8</u>	<u>9</u>	<u>12</u>	<u>15</u>	<u>18</u>	<u>24</u>	<u>36</u>
Urban middle class mothers	0	3	34	7	5	11	5	0
Urban lower class mothers	0	7	11	5	4	2	8	0
Rural lower class mothers	0	3	11	10	2	5	6	4

Table 12 AVERAGE TIME OF BREAST FEEDING
IN MONTHS

The whole sample	14.0
Urban Middle Class	13.4
Urban Lower class	13.3
Rural lower class	15.5

Table 13 BREAST FEEDING VERSUS BOTTLE FEEDING

THE FIGURES ARE PERCENTAGES

	<u>Bottle only</u>	<u>Breast & Bottle</u>	<u>Breast only</u>
Urban Middle Class	9	37	54
Urban Lower Class	2	12	86
Rural Lower Class	0	0	100

The information obtained reveals that Sudanese mothers generally breast-fed their children for a maximum of 36 month and a minimum of 5 months, and on the average for about 14 months. Concerning this matter, there is no significant difference between the urban middle and lower classes, but a significant difference, at the .05 level, exists between the rural mothers and the urban mothers as a whole. Rural mothers tend to breast-feed their children for a longer period.

A significant urban - rural difference, at the .01 level, appears in the method of feeding the child. While 9 per cent urban middle class mothers, and 2 per cent urban lower class mothers used bottle feeding exclusively, none of the rural mothers used this method. As for the use of breast-feeding supplemented by bottle-feeding, there seems to be both class and urban-rural differences, statistically significant at the .01 level. While 37 per cent of the urban middle class mothers and 12 per cent of the urban lower class mothers used breast feeding and bottle-feeding simultaneously, none of the rural mothers applied this technique.

Some of the urban middle class mothers, who used bottle-feeding, mentioned that they did so because of early pregnancy, lack of milk, poor health, and medical advice. Lack of milk caused one rural mother to have her sister breast-feed her child for her, another not so mentioned that her neighbour did so for her baby.

The fact that urban middle class mothers breast-fed their children for a comparatively shorter period, may be due to contact with pediatricians, and to the influence of westernization that made them view prolonged breast-feeding as an unwelcome burden.

Besides the fact that they did not adopt modern practices of infant feeding, rural mothers may find financial and technical difficulties in securing the materials needed to prepare hygienic milk for artificial feeding.

According to Newson (36,156) once bottle feeding becomes feasible at all in a society, one might well expect that any trend towards this method would start at the upper end of the social class scale and spread gradually downwards, so that at any given time, bottle feeding would be most popular among those women who enjoy the highest material standard of living.

Purely on economic grounds bottle feeding is something of a luxury, since its cost includes not only the price of the bottle and milk but also the provision of nipples and their replacement.

The cost can, of course, be considerably higher if one includes such refinements as the thermometers, funnels, and disinfectants. Apart from the question of expense, middle class mothers are more likely to have refrigerators and extra saucepans which make the preparation of the food less difficult.

Also, being more conscious of a desire for greater freedom and emancipation from the purely domestic role, middle class women would tend to resort to artificial feeding almost as a matter of principle." (36,165)

The findings on Sudanese mothers' breast feeding are similar to the findings on the Lebanese (38,41), Iraqi (1,39), and Pakistani (28,47) mothers, as all of these generally breast-feed their children. On the other hand Sudanese mothers are different

from American mothers in this respect, since, according to Sears (43,71) only 40 per cent of the American mothers breast-fed their children.

Sudanese mothers are more similar to Pakistani mothers in that, while a few urban mothers used bottle feeding, none of the rural mothers used it (28,47)

Concerning the duration of breast feeding, Sudanese mothers are similar to Iraqi mothers who breast-fed their children for about 16 months (1,39). But they are different from the Americans, who breast-fed for less than 3 months (43,71), and the Lebanese who breast-fed for just under a year (30,72). The tendency of the Sudanese middle class mothers to prefer a comparatively shorter breast-feeding period is similar to that of the Iraqi middle class mothers (1,39-40).

The second question, for obtaining information about infant feeding in the Sudan, ran like this: when (X) was one year old, did you feed him on a schedule or when he felt hungry?

Table 14 represents a summary of the answers.

Table 14

FEEDING SCHEDULE

The figures are percentages.

	Degree of scheduling		
	<u>None</u>	<u>Partial</u>	<u>Regular</u>
Urban middle class	65	19	16
Urban lower class	92	4	4
Rural lower class	98	2	0

It can be said that, generally, the lower urban and rural class used no feeding schedule, in contrast to 35 per cent of the urban middle class mothers who used either regular or partial scheduling. This difference is statistically significant at the .01 level. Another point is that while 4 per cent of the urban lower class mothers used regular schedules, none of the rural mothers used them.

The fact that more urban middle class mothers used feeding schedules is, probably, due to the effect of westernization, and contact with pediatricians and mass media. The few urban lower class mothers, who used scheduling were, probably, affected by their contact with the middle class mothers.

Although a comparatively smaller number of ^Sudanese mothers used feeding schedules, they are similar to the Lebanese (38,75) and Pakistani (28,49) mothers in that the middle class mothers tend to use scheduling more than the lower class regardless of place of residence. This trend is in the same direction in the case of the American mothers. According to Sears, there is no significant difference between the American social classes with respect to scheduling, but there is a slight tendency for the middle class mothers to schedule feeding more rigidly than the lower class mothers. (42,427)

Feeding schedules developed after the studies, on how a baby's digestive system works, showed that an ample feeding would last a baby for about 4 hours. A widely used 4-hour schedule sets the feeding time at 6a.m., 10a.m., 2p.m., 6p.m., 10p.m., and 2a.m. (45,55)

The main purposes of any feeding schedule is to do right by the baby, and to enable the parents to care for him in a way that will conserve their strength and spirits. This usually means getting down to a reasonable number of feedings at predictable hours, and omitting the night feeding as soon as the baby is ready.

Before 1942 the trend was in the direction of strict regularity in feeding schedules, which worked well with a majority of babies.

But in that year, Dr. Preston - with a group of medical doctors, psychologists and new mothers - carried out an experiment to find out what kind of schedule a baby would establish if he were fed whenever he seemed hungry. A baby wakes rather frequently the first few days. Then in the second half of the first week when the mammary glands begin to secrete sufficient milk, he wakes about 10 times a day. But by the age of 2 weeks he settles down to 6 or 7 feedings a day, at rather irregular intervals. By 10 weeks he arrives at approximately a 4 hour schedule. This experiment is well known by the name "The experiment in self-demand feeding." Since the accomplishment of this experiment, there has been a general relaxation in infant feeding schedules, which has had a wholesome effect on babies and parents. (45,53)

FEEDING PROBLEMS

In order to examine the problem of feeding difficulties each mother was asked: during the last two years, did you have any difficulty in getting (X) to eat the types of food he needs?

Table 15 represents a summary of the mothers' answers.

Table 15

FEEDING PROBLEMS

The figures are percentages

	<u>No difficulty</u>	<u>Slight difficulty</u>	<u>great difficulty</u>
Urban middle Class	53	29	18
Urban Lower Class	61	28	11
Rural lower class	43	50	7

This reveals that about 88 per cent of the Sudanese mothers declared that their children manifested either slight or no feeding problems during childhood. Eighteen per cent of the urban middle class children had feeding problems against 7 per cent of the rural lower class children. This difference is significant at the .01 level.

Sudanese children are similar to the Lebanese (38,83), the Pakistani (28,52) and the Iraqi (1,54) children in tending generally to manifest no feeding problems. On the other hand, they are different from the Americans, where a majority of the mothers reported feeding problems. (43,93)

Prothro suggested that the absence of feeding problems may be due to the mother's casual attitude toward the child's feeding, and their little concern about the balance of diet, the amount of vitamins and minerals. (38,83)

S U M M A R Y

The mother's love and warmth toward her child is depicted by the way she feeds, weans and toilet trains him.

Sudanese mothers, generally, breast-fed their children for about 1½ months. There was a significant difference between the urban middle class mothers and the rural lower class mothers; the rural mothers tended to breast-feed their children for a comparatively longer period. While a few urban middle class mothers used exclusive bottle feeding, none of the rural mothers did so. Probably, the effect of westernisation and the better financial situation of the middle class mothers accounted for their use of artificial feeding.

In general, the urban and rural lower class used no feeding schedule, while about 35 per cent of the urban middle class mothers scheduled completely or partially the infants feeding.

There was a significant class difference between the urban middle class and the rural lower class children in respect to feeding problems; more urban middle class children had feeding problems.

Sudanese mothers are different from the American mothers, and similar to the Lebanese and Pakistani mothers, who generally breast-fed their children. Concerning the duration of breast-feeding, Sudanese mother's are different from both the American and Pakistani mothers, and similar to the Lebanese and Iraqi mothers.

They are also similar to the Lebanese and Pakistani mothers in that the middle class mothers tend to use scheduling in child feeding more than the lower class mothers.

WEANING

THE PSYCHOLOGY OF FEEDING AND WEANING

Since the infant is dependent on his mother for feeding, the eating situation may serve as the basis of much social learning. Infant feeding can be handled in several ways. The mother can feed her child on a rigid schedule every three or four hours without "giving in" when the infant cries. On the other hand, she can use a flexible feeding schedule, which means feeding a little earlier than the assigned time if the baby insists on crying. A third method is demand feeding, which means feeding the child whenever he cries or asks for food. (45,49-56)
(1,5)

Many psychologists connect certain variables of early feeding like the use of the breast or the bottle, schedules or unscheduled nursing - to particular attributes of personality. According to Watson and the behaviorists, schedule feeding is desirable to condition the child to have food at certain hours of the day, thus establishing good habits of regularity and punctuality. Freud contradicts this view by asserting that the child should be

breast - fed on demand. (18,107)

Freud divided human development into several stages, and called the first stage the oral stage. One may be fixed at the oral stage as a result of oral indulgence or frustration. This may manifest itself later in an "oral character", characterized by pessimism, dissatisfaction, suspiciousness, impatience, passivity as well as strong demands for sympathy and support. An oral character is believed to emphasize oral activities such as eating drinking and smoking. (18,108-109)

Dollard and Miller interpreted the feeding and nursing situation in a direction similar to Freud's. According to them, when a child is fed without frustration he attaches feelings of relaxation and well being to the mother, who represents the world at large for him. Later, these feelings produce optimism and sociability in him. But if the child is frustrated in the feeding situation - by not feeding him when he is hungry or stuffing him with food when he is not hungry - he will be low on sociability later on. (1,7)

According to Sears (43,243) the nursing situation reveals to the child the emotional emphases of people to him as well as the culture as a whole. The general pattern of infant feeding bears a systematic relationship to the cultural configuration and the social set up. For example, the decline of breast feeding in

in the United States is due, in the first place, to the fact that births take place in hospitals where a doctor sometimes recommends bottle feeding, especially the 2a.m. feeding may be by bottle in order to give the mother complete rest. In the second place, the American mothers culturally learned motivations toward feeding and nursing influence their attitude toward breast feeding. Some American mothers fear that breast feeding may impair their figures, some are anxious about their capacity to satisfy the baby's hunger through breast feeding, and for others, breast feeding interferes with their employment or other community affairs. (22,24-25)

While the infant's dependence on his mother for feeding is highly efficient from a purely biological point of view, it poses a problem in socialisation, since sucking can not go on for ever. The social and emotional implications of weaning are many and have far reaching effects on both the child and his mother. For example, the shift from creeping to walking appears to have some of the emotional agonies of weaning. (43,64)

Warten and the behaviorists favour abrupt and early weaning. According to Honigsmann, early or abrupt removal from the breast may be associated with an image of the mother as a frustrating object. (22,28) To Freud, long nursing and gradual weaning ensure optimal oral experiences. He also believed that fixation at the

"Oral stage" of development, and that may happen due to frustration over weaning or not having enough nursing experiences, would produce later an "oral character". (18,107-111)

Many psychologists and psychoanalysts have views more or less similar to Freud's ideas concerning infant feeding and weaning. Orlansky, Newton and Sewell concluded that, to many psychoanalysts, generous suckling and later weaning are related to generosity, optimism, and cooperative peaceful behavior; whereas ungenerous suckling and early weaning coincide with arrogance, aggression, impatience, a tendency to sulk and hoard food, competitiveness, loss of property and suspicion. (22,243)

Thumb - sucking is usually connected with infant feeding and weaning. According to Spock (45,207), a baby sucks his thumb, because he hasn't had enough sucking at the breast or bottle to satisfy his sucking need. Few babies begin thumb-sucking in the delivery room. Generally, the sucking need is strongest in the first 3 or 4 months, and from then on, it tapers off gradually. On the basis of Levy's experiments to investigate the problem of thumb-sucking, it can be said that a breast-fed baby is less apt to be a thumb-sucker. With the average bottle-fed child, Thumb sucking is most likely to begin at about the time he begins to finish his bottle in 10 minutes instead of in 20. (45,207-209-)

Prothro (38,79) has two hypotheses concerning thumb-sucking. The first hypothesis is that greater weaning disturbance or frustration would produce more thumb sucking. The second one is that sucking habits grow stronger with practice, so that a child weaned later would show more thumb-sucking.

WEANING IN THE SUDAN

Weaning denotes relinquishing the habit of securing food by sucking and adopting a new mode of feeding. It involves five main points. The child must learn to do away with sucking, to like to drink the same food he formerly got by sucking, to accept skills required for eating the food such as chewing, drinking from a glass or cup, and using the fingers and utensils, and finally he must learn to do without being held while he is eating. (43,69)

To study weaning and its problems in the Sudan, each mother was asked four questions. The first question was: when did you begin to wean (I)?

The average time for weaning is 14.0 months for the whole sample, 13.4 months for the urban middle class, 13.3 months for the urban lower class (table 12).

There is a significant difference between the rural mothers and the urban mothers as a whole; the urban mothers tend to

wean their children after a shorter period of breast feeding. However, about 30 per cent of the urban middle class mothers mentioned that they weaned the child from the breast but gave him the bottle. One mother reported that her child, 5 years old still used the bottle sometimes. When it is time to wean the Sudanese child, he is, most probably, already taking solid foods and drinking from a cup.

Concerning the time of weaning, the Sudanese mothers are more similar to the Iraqi mothers (1,46) than to the Lebanese mothers (38,74) as Chinese mothers, wean at about the age of 14 months, Iraqi mothers at about the age of 16 months, and Lebanese mothers at about a year. Sudanese mothers are different from the Americans who wean at a much younger age (43,71) and Pakistani mothers who wean at a much later age (28,48).

The other question dealing with the problem of weaning ran like this: How long did it take (X) to stop suckling completely?

Table 16 summarizes the answers to this question.

Table 16 HOW LONG DID I+ TAKE (X) TO STOP

SUCKLING COMPLETELY ?

The figures are percentages

<u>DAYS</u>	<u>1</u>	<u>2</u>	<u>3</u>	<u>5</u>	<u>7</u>	<u>10</u>	<u>14</u>	<u>21</u>	<u>30</u>
Urban Middle Class	21	3	14	10	33	2	2	6	9
Urban Lower Class	9	30	9	44	7	1	0	0	0
Rural Lower class	5	21	7	41	26	0	0	0	0

Sears, Whiting, Prethro and others call the mother who weans abruptly in less than 3 days a "decisive weaner", and the one who weans in more than 3 days an "indecisive weaner". According to this, Sudanese mothers are generally "indecisive weaners". For the lower urban and rural classes, the statistical mode for weaning falls at 5 days, whereas it falls at 7 days for the urban middle class. The class difference is significant, at the .05 level, between the middle and lower class as a whole; the urban middle class mothers tend to be more indecisive in weaning than the lower urban and rural classes.

Concerning the severity of weaning, it seems that Sudanese mothers are more similar to the Iraqi (1,48) and Pakistani mothers (28,50) than to the Lebanese mothers (38,77) who are decisive abrupt weaners.

METHOD OF WEANING

Actually, there are several varied ways of weaning, rural and lower class mothers generally dab the breast with coloured, sour, or bitter substances. Red pepper, salt, fermented millet flour paste, and coffee are some of the substances put on the breast. One mother reported that she dabbed her breast with quinine.

Many urban middle class mothers wean the child from the breast, but substitute the bottle instead. To wean the child from the bottle,

mothers follow different techniques. Two common methods of weaning from the bottle are: Putting salt and water in the bottle instead of milk; hiding the bottle.

Some mothers separate the child from them and send him to stay for some time with his grandmother or aunt.

These methods of weaning used by the Yiddish mothers are similar to those of the Iraqi mothers as described by Al-Qasr(1,47)

WEANING PROBLEMS

In order to study weaning problems, each mother was asked; How did the weaning affect (X)? The mothers' responses to this question are summarized in table 17.

Table 17

WEANING PROBLEMS PERCENT OF CHILDREN HAVING WEANING PROBLEMS

	<u>No effect</u>	<u>Little effect</u>	<u>Great effect</u>
Urban Middle class	62	35	3
Urban lower class	59	17	24
rural lower class	42	44	14

There is a significant class difference at the .01 level, in respect to weaning difficulties, between the urban middle class and the lower class children. While 2½ per cent of the urban lower class children, and 1½ per cent of the rural lower class children had great weaning difficulties, only 3 per cent of the urban middle class children were reported to have experienced such difficulties. So, on the whole less urban middle class children have weaning problems. This may be due to the fact that urban middle class mothers, as has been mentioned previously, are more indecisive weaners than the lower class mothers, and that they tend to wean their children gradually. Some psychologists, like Freud, preached that abrupt weaning is more likely to cause upset than gradual weaning. The concept of decisiveness and indecisiveness in weaning is itself vague. Horigan, for example, mentioned that in order to determine decisiveness or indecisiveness, the emphasis should be placed on the mother's attitudes accompanying it and not on the number of weaning days (22,248)

More Lebanese (38,77) and Pakistani (28,53) children have weaning difficulties when compared to Sudanese Children. In this respect, Sudanese children are similar to Iraqi children (1,48) where weaning had no effect at all on more than half of them.

THUMB - SUCKING

Psychologists and psychoanalysts have often related thumb-sucking to weaning problems and weaning age. To collect information about thumb-sucking, each mother was asked: Did(X) suck his thumb when he was an infant? Table 18 represents a summary of the mothers' answers to this question.

Table 18 DID (X) SUCK HIS THUMB?

	The Figures are Percentages			
	<u>often</u>	<u>Sometimes</u>	<u>rarely</u>	<u>never</u>
Urban Middle Class	4	12	31	53
Urban lower class	0	11	8	81
Rural lower Class	24	34	11	31

While 4 per cent of the urban middle class children, and none of the urban lower class children often practiced thumb-sucking, 24 per cent of the rural children did. So the difference, which is significant at the .01 level, is between the urban and the rural children; more rural infants sucked their thumbs. It might be that the urban middle class mothers knew the psychological implications of thumb-sucking, and therefore they tended to report that their children did not practice thumb-sucking.

Concerning thumb sucking, Sudanese children are more similar to the Pakistani children (28,53) than to the Lebanese children (38,79) Lebanese children practice more thumb-sucking than do the Sudanese children. It may be that the Sudanese are less conscious about thumb-

sucking than the Lebanese. Our findings seem to agree with Prothro's hypotheses that frustration over weaning would produce more thumb-sucking, and that thumb-sucking grew stronger with practice, so that a child weaned later would show more thumb-sucking. Compared to the Sudanese urban middle class mothers, Sudanese rural mothers are more decisive in weaning, but they wean at a later age. Moreover, rural children practice thumb-sucking more than the urban middle class children. So it can be said that thumb-sucking is related to late weaning as Prothro suggested, and that the severe weaning methods used by the rural mothers lead to anxiety and frustration, which causes thumb-sucking.

S U M M A R Y

Generally, a Sudanese mother weans her child at about the age of 14 months. There is a significant difference between the rural mothers and the urban mothers in the age at which weaning takes place. The rural mothers tend to wean the child at an older age. In this respect, Sudanese are similar to the Iraqi mothers and different from the American.

Sudanese mothers are generally indecisive weaners, and the urban middle class mothers tend to be more indecisive than the urban and rural lower class. So, they are more similar to Iraqi and Pakistani mothers than to the Lebanese.

Less Urban middle class children had weaning difficulties when compared to the urban and rural lower class.

Concerning thumb-sucking, more rural infants sucked their thumb than did the urban children. Here, Sudanese children are more similar to the Pakistani than to the Lebanese children.

Many psychologists and psychoanalysts connect certain variables of early feeding to particular attributes of personality. They hold different views and hypotheses about this matter.

TOILET TRAINING

TOILET TRAINING IN THE PSYCHOLOGICAL LITERATURE

According to Freud, toilet training represents a conflict between three main factors which are the child's ego, his "instinctual cathexis" (the wish to defecate) and an external barrier or the requirement of the outside world. (18,112) Because expulsion of the waste materials relieves the individual by removing the source of tension, the child associates "pleasurable tension reduction", with elimination. So according to Freud, toilet training imposes problems due to the conflict among the three mentioned factors, and due to the association of pleasure with it. A person naturally resists having a pleasurable activity interfered with and regulated. If the interference is very strict and punitive in any way,

If the child may retaliate by intentionally soiling himself. As he grows older such a child will develop a messy, irresponsible, disorderly, wasteful and extravagant character. Strict toilet training procedures may cause fixation at the "anal stage" of development. Having extreme pleasure in controlling elimination may also cause fixation at the anal stage. Fixation at this stage results later in an anal character" characterized by meticulous neatness, orderliness, obstinacy, strict budgeting of time and money, and other overcontrolled behavior (18,111-114)

Freud went further to say that if a mother praises the child extravagantly when he succeeds in having a bowel movement, the child may come to regard the product he has made as being of great value. If too much emphasis is placed upon the value of feces, the child may feel that he has lost something valuable when he defecates. He will try to prevent future loss by refusing to give up his feces. Guilt feelings may cause a reaction against retention in the child. and later such a person will feel impelled to give away his possessions and money in a heedless manner or lose them by making foolish investments or by reckless gambling (18,11.)

According to Dollar and Miller, upset over toilet training is due to the child's inability to have voluntary control of his elimination since he is still immature biologically. Severe procedures, even when the child is mature, may result in generalising

the feeling of pain and discomfort ^{to} elimination. This will make the child retain the waste products. As long retention increases the tension, there is a possibility for loss of control to take place. This is likely to make toilet training more difficult. Moreover, severe measures which generate anxiety and frustration may cause these feelings to be attached to the mother and to the world at large. Punitive measures may cause timidity and conformity, because the child may feel that the less responses he makes the better for fear of being punished. Another consequence of severe toilet training measures stems from the child's inability to differentiate between the mother's dislike of his waste products and of himself. Hence, he will develop feelings of unworthiness, insignificance and singleness (1,16)

Speck and other pediatricians criticized the idea that the only way a baby becomes trained is by the parent's strenuous efforts. Toilet training is easier than that, since babies gradually gain control of their bowels and bladders as they grow and the concerned muscles mature. From 18 to 24 months of age, most children begin to give their mothers some definite signal of an approaching bowel movement. In a few children this occurs before 18 months, in others not till after 2 years (45,245-256)

Bladder training is more difficult or at least slower than bowel training. It is easier for a person of any age to control a bowel movement than to control urine. Whereas most children have

complete control of their bowels by about 2 years, many of two and a half-year-olds still wet fairly often in the daytime or at night. Anyhow, most children become dry between 2 and 3 years of age, a smaller number between 1 and 2, a few not till after 3. Boys tend to be later than girls in achieving dryness. "Sometimes slowness in becoming dry seems to be a family trait" (15,256-260)

DISCUSSION OF FINDINGS ON TOILET TRAINING

When fecal material accumulates in the colon, it exerts pressure upon the walls of the colon, the walls of the rectum, and upon the anal valvelike sphincter muscles. When the pressure reaches a certain level, the sphincters open and the waste products are expelled by the act of defecation. The pressure of the urine collecting in the bladder causes the ring muscle of the urethra to open and get rid of the urinary material. So expulsion of the feces and urine brings relief to the individual by removing a source of tension. According to Freud, toilet training is the first crucial experience with discipline and external authority for the child. (16,112)

To study how Sudanese mothers toilet-train their children, each mother was asked five questions. The first of these questions is: Did you use diapers for (X)? For how long?

All the mothers replied that they used diapers. The urban middle class mothers used them for an average of 6 months. Generally, urban lower class mothers and rural mothers use strips of old cloths as diapers for the infant. In this respect sudanese lower class mothers are similar to the poorer Lebanese (38,85) and Pakistani (28,55) mothers.

After the response to the first question, each mother was asked the following question: When did you start training (X) in bladder control?

Many mothers responded to this question by giving the time at which they began training the child in bowel control. The answers are summarized in table 19.

Table 19

START OF CLEANLINESS TRAINING

	Months
Urban middle class	6.4
Urban Lower class	2.0
Rural lower class	1.7

These results show a significant class difference, at the .01 level, between the urban middle class and both the urban and rural lower classes. The lower class mothers begin bladder control training earlier than the middle class mothers. It seems that rural mothers

gave approximations of the age at which they started the child toilet training.

Concerning the start of bladder-control training, it seems that Sudanese mothers are more similar to the Iraqi mothers(1,52) than to the Lebanese (38,86) and Pakistani (28,56) mothers.

The third question in the series was: How long did it take to toilet-train (X) completely?

Table 20 represents a summary of the mothers' answers to this question.

Table 20
TOILET TRAINING
AVERAGE TIME FOR COMPLETION
OF TRAINING

	Months
The Whole sample	13.5
Urban middle class	15.6
Urban lower class	15.3
Rural lower class	24.3

There is significant difference between the urban mothers as a whole and the rural mothers concerning the time of toilet-training completion. The rural mothers take a longer time to complete the process. So, we can say that rural mothers, generally, start toilet-training earlier than the urban mothers, but complete the training

process later than they do.

The average time for completion of toilet training is 18.5 months for the Sudanese, 21 months for the Lebanese (38,87), and 15 months for Pakistanis (28,56). Thus, it seems that the Sudanese are different from both the Lebanese and Pakistanis in the time of toilet training completion.

The fourth question, about cleanliness in general, was: What do you expect of (x) regarding cleanliness and bathing?

Ninety-six per cent of the mothers replied that they cleaned and bathed the baby themselves. Eighty-six per cent of the urban middle class mothers express their great concern about the child cleanliness. On the other hand only 32 per cent of the urban lower class, and 27 per cent of the rural lower class mothers expressed such concern. Actually, 21 per cent of the rural lower class mothers said explicitly that they didn't care about the cleanliness of the child.

Therefore, although there is no class difference in the matter of who cleaned and bathed the child, a significant class difference, at the .01 level, exists between the middle class and the lower class in regard to concern about the child's cleanliness; the middle class mothers expressed more concern than the lower class mothers. The attitude of the urban middle class mothers toward cleanliness of the child may be due to the effect of education, mass media, contact with pediatricians, the accessibility of water and bathroom facilities

they have.

The last question posed read as follows: Was (X) easily taught to control his bowels and bladder?

Table 21 gives a summary of the mothers' answers to this question.

Table 21 DID (X) HAVE DIFFICULTY IN TOILET TRAINING?

The figures are percentages

	Had difficulty	no difficulty
Urban middle class	22	78
Urban lower class	5	95
Rural lower class	7	93

Although it can be said that, generally, Swahili children had no difficulties during toilet training, a significant class difference exists between the middle class and the lower class; more urban middle class children experienced difficulties during toilet training than did the urban and rural lower class children

This difference may be due to the greater concern of the urban middle class mothers about the general cleanliness of the child. Such a concern may drive a mother to demand more than the child can afford to accomplish in respect to cleanliness. But one would expect urban middle class mothers to know that certain maturation of the sphincter and the bladder ring muscles, and the myelination of the motor nerves are prerequisite to any kind of toilet training.

While about 17 per cent of the Sudanese children had difficulties during toilet training, 30 per cent of the Lebanese children were reported to have been upset over toilet training. (38,87)

On the other hand, our findings concerning the class difference, in the difficulties of training, contradict the findings of Al-Mar in Iraq. According to her, Iraqi lower class children were more likely than the middle class children to become upset over cleanliness training (1,55).

METHOD OF TOILET TRAINING

Rural mothers begin the child's toilet training soon after birth. They put the child on their feet, when he starts eliminating, to defecate on the ground. A special grunt is repeated by the mother during the process of bowel movement. This continues until the child learns to signal his need by using the same special grunt which he

associates with defecation.

Some urban middle class mothers use this same way in toilet training of the child, but most of them use a special pet for this purpose. Nevertheless, they use the special grunt and keep repeating it during the process of the bowel movement until the child learns to use it to signal his need of defecation.

SUMMARY

Toilet training is the first experience with discipline and external authority for the child.

Sudanese rural mothers are similar to the poor Lebanese and Pakistani mothers in using strips of old clothes as diapers for the infant.

Generally, rural mothers start toilet-training earlier than the urban mothers, but complete the training process later than them. The middle class mothers expressed more concern about the child's cleanliness than did the lower class mothers. This may be due to the effect of education, mass media and contact with pediatricians.

More urban middle class children were reported as having had difficulty during toilet training. Compared to the Lebanese children, less Sudanese children had toilet-training difficulties.

According to Freud, Toilet training poses problems as a result of the external interference to regulate a pleasurable activity. Strict toilet training measures may cause fixation at the anal stage, that results later in an "Anal character" characterized by neatness,

orderliness, and strict budgeting of time and money.

Dallas and Miller attribute upset over toilet training to the child's inability to have voluntary control over his elimination due to his physiological immaturity.

Pediatricians say that toilet training should be an easy process, since babies gradually gain control of their bowels and bladders as they grow.

D I S C I P L I N E

DISCIPLINE IN THE PSYCHOLOGICAL LITERATURE

Kardiner classified the techniques of discipline into negative and positive techniques. Negative discipline blocks or interferes with needs, urges, and capacities of the person (22,214). It includes tangible controls like beating and spanking, and intangible techniques such as deprivation of privileges, withdrawal of love, and negative modeling.

According to Sears, deprivation of privileges refers to making an unpleasant situation for the child by withdrawing something he values, such as a toy, dinner dessert, contact with playmates, and going out to the park (43,337)

Withdrawal of love takes many forms as: looking coldly at the child, turning one's back, refusing to listen to him, putting him in a separate room and telling him that he cannot be accepted in the

family circle until he stops his a behavior, telling him "I don't love you", saying that he is hurting his mother's feeling, or he is making her want to cry-with the implication that only by being good can he restore the loving relationship between them(43,341)

Negative modeling refers to pointing to an example of behavior of what the child should not do. So the child is not directed to what the adults want him to do, but he knows what he should not do (43,347).

Positive techniques of discipline, according to Kardiner, encourage or foster curiosity, enterprise, and activity which the individual accepts or follows eagerly (22,214). They include tangible measures and positive modeling.

Rewards or giving material objects to the child is an example of tangible positive techniques. Encouraging words, showing expressions of love and delight are some examples of intangible positive techniques of discipline (43,319)

In positive modeling, the mother points to an example of the kind of behavior she wants the child to acquire. The tendency of the child, to copy people he especially admires and wants to be like, is taken advantage of. The model may be an older brother or sister, a neighbouring child, a fictional hero, or the parents themselves(43,347)

According to Speck, a child needs to feel that his mother and father, however agreeable, have their own rights, know how to be firm,

won't let him be unreasonable or rude. He likes them better that way. It trains him from the beginning to get along reasonably with other people. The spoiled child is not a happy creature even in his own home. And when he gets out into the world, he will meet disappointing shocks. He finds that nobody is willing to bear him; in fact, everybody dislikes him for his selfishness. Either he must go through life being unpopular, or he must learn the hard way how to be agreeable. On the other hand, some parents are always turning harshly on the child. Neither of these stages are really necessary. If parents have a healthy self-respect, they can stand up for themselves while they are still feeling friendly. What Speck means is that parents can be both firm and friendly with the child (45,326).

To answer the question "is punishment necessary?" Speck states that the best test of a form of punishment is whether it accomplishes what the parents are after, without having other serious effect. If it makes the child furious, defiant, and worse-behaved than before, then it is not recommended. If it seems "to break the child's heart," then it is probably too strong for him. So it appears that, according to Speck, the whole matter depends upon the parent's discretion (45,333).

A child, like an adult, feels guilty because of his naughtiness or rudeness even when his parents close their eyes to it. He would like to be stopped. But if he is not corrected, he is likely to behave worse and worse. It is as if he were saying, "How bad do I

have to be before somebody stops me? " (45,325)

A child is happier as well as better-behaved if his parents insist on reasonably good behavior. But at the same time it helps a child to realize that his parents know that he has angry feelings and that his parents are not enraged at him or alienated from him on account of them. So parents are advised to let the child know that his angry feelings are normal. This helps the child get over his anger and keeps him from feeling too guilty or frightened because of it (54,327).

THE FINDINGS OF DISCIPLINE

Discipline refers to training to act in accordance with rules, principles, standards and norms. In culture and personality literature, the concept of discipline is used to refer to the manifest attitude taken with reference to particular instances of behavior (22,214).

In order to study the question of discipline, each mother was asked a number of questions. The first two questions were:

(1) What do you do when (X) intentionally disobeys you? (2) Do you beat (X) sometimes?

In response to the first question about 63 per cent of the mothers said they beat the children, others threatened to beat them or reasoned with them. 43 per cent of the urban middle class mothers discussed and reasoned with the child, while only 19 per cent of the

urban lower class mothers, and 17 per cent of the rural lower class mothers did so. This class difference between the urban middle class and the lower class is significant at the .01 level. The difference may be due to the comparatively greater influence of modern literature on child psychology to which the urban middle class mothers may be subjected.

In this respect, Sudanese mothers resemble Iraqi mothers (1,67) where middle class mothers were more likely than the lower class mothers to reason with the child. In spite of lack of information, it can be assumed that this is a universal tendency.

The answers to the second question revealed that 92 per cent of the mothers used physical punishment. Twelve urban middle class, 5 urban lower class, and 9 rural lower class mothers reported that they did not beat the child.

So, we can conclude that Sudanese mothers use physical punishment as a disciplinary technique irrespective of social class. In that they are similar to the Lebanese (38,108) and Iraqi mothers (1,65).

After discussing physical punishment, the following question was posed to the mother: Do you have a special arrangement to reward (X) when he behaves well?

Table 21 gives a summary of the mothers' answers.

Table 22. PER CENT USE OF REWARDS

	Reward	Occasional	No
Urban middle class	33-	59	8
Urban lower class	27	38	35
Rural lower class	30	21	49

On the basis of these results, it can be said that most of the Sudanese mothers had a system of rewarding the child. However, a significant class difference exists between the urban middle class mothers and the lower class mothers both urban and rural. Generally, more urban middle class mothers gave rewards. In this respect, Sudanese mothers are probably similar to the Lebanese mothers (33,103)

Some mothers volunteered to say that the rewards were: encouraging words, thanks, expressions of love, food, presents and expressions of pride. One rural mother said that she rewarded the child by putting some money in his saving box.

After discussing rewards each mother was asked: Some parents require a child to obey immediately (for example, when told to stop making noise), others do not care much about this. What is your opinion on this?

Except for two urban middle class mothers, all the mothers demanded prompt obedience from the child. Many mothers answered the

the question by saying that a child must always obey elder people. The writer assumes that most - if not all - of the Sudanese mothers believe that a child should obey promptly any elder person regardless of his social class or relation to the family.

It seems that Sudanese mothers are similar to Lebanese mothers in their demand for immediate obedience from the child. Prethro termed the Lebanese mothers non-permissive in their expectations regarding the child's obedience (38,99).

S U M M A R Y

Almost all of the Sudanese mothers used physical punishment to discipline the child. In this respect they are similar to the Lebanese and Iraqi mothers.

Although most of the mothers used rewards as a disciplinary technique, more urban middle class mothers reported that they rewarded their children on good behavior. Almost all the mothers demanded prompt obedience from the child. Hence they are similar to the Lebanese mothers in Prethro's study.

According to Kardiner disciplinary techniques are negative - like beating and withdrawal of love - and positive like rewards and encouraging words and expressions.

Speck advises that parents should be both firm and friendly with the child, and that they should let the child know that his angry feelings are normal.

SEX DIFFERENCES IN REARING PRACTICES

REVIEW OF LITERATURE ON SEX AND SEX ROLES

Freud's three stages of development, the oral, anal, and phallic, are called the "pregenital period." This period occupies the first five years of life. The outstanding characteristic of the sexual instinct during this period is the "primary narcissism", characterized by sensual feelings that arise from self-stimulation connected with body pleasure. It is exemplified by thumb - sucking, the expelling or retaining of the feces, and masturbation.

The sexual instinct during the "pregenital period" is not directed toward reproduction. The child "cathects" his own body as a source of pleasure, and his parents. The mother's breasts are the chief source of oral pleasure, and caresses, kisses and fondling of the baby are sensually satisfying (18,118)

Freud said that a boy at this stage loves his mother and identifies with his father. When the sexual urge increases, the boy becomes jealous of his rival, the father; hence the emergence of the "Oedipus complex." The boy begins to fear that his father will remove his offending sex organ. This fear is called the "castration anxiety."

On the other hand, when the young girl discovers that she does not possess a noticeable external genital, she feels castrated. She blames her mother for this, and begins to prefer the father. The girl's love for the father is mixed with envy, because he possesses something she does not have. Freud termed this feminine counterpart of the boy's castration anxiety - the "penis envy". Both conditions are called the "castration complex." (13, 116)

Roughly between the ages of five and twelve, the "castration complex" subdues the sexual and aggressive impulses, and the child is said to be in the "latency period." He emerges from this period at puberty to enter the second stage called "the genital stage" in which the sexual instinct starts to develop in the direction of the biological aim of reproduction.

Freud also assumes that every person is bisexual, which means he inherits the tendencies of the opposite sex as well as those of his own sex. The relative strength and success of the child's early identifications determines his degree of masculinity and femininity later in life, and hence his character, his attachments and his antagonisms (13, 114-119)

Hendigson stated that training for sex roles begins in infancy as nonverbal communication proceeds subtly - consciously or unconsciously from the mother to the child while he is nursing. Almost everywhere a girl baby is given to understand that she will repeat the mother's role.

A boy is directed to understand that he faces the task of "differentiating himself from the maternal object of identification." Mead believes that the male drive toward self-assertion arises from this early understanding (22,275).

Mead stresses the non-verbal character of this early learning. She said that messages to the child, for example, are conveyed in his mother's smile, the slight coquettishness or perhaps aggressive tightening in her arms, or in the way she yields her breast. The fact that weaning is subtly a different experience for a boy, who parts finally from the breast, and a girl, who will suckle babies as enthusiastically or as distastefully as her mother suckled her, adds another element to the earliest learning of sex roles (22,275-276).

The writer has great interest in the question: what does a preference for one sex in the child mean for the personality development of the child? Anyhow, according to Honigsmann (22,276), the information on this subject is meager.

SEX DIFFERENCES IN REARING PRACTICES IN
THE SUDAN

Sex-typing refers to the child's development of those interests, attitudes, and other personality qualities that are appropriate to his or her own sex. What is appropriate may differ somewhat from one culture to another, but there is no culture that does not make some distinction; one kind of behavior is expected of men, another of women (43,394).

The first question posed to the mothers was: In case both you and your husband are present and (X) misbehaves, who disciplines him?

Table 23 represents a summary of the answers.

Table 21

WHO DISCIPLINED THE CHILD

The figures are percentages

	Mother	Father	Both
Urban Middle class	38	19	43
Urban lower class	54	17	29
Rural lower class	45	22	33

According to these results, it seems that mothers are more likely than fathers to discipline the child at this age. This is true for all classes. However, more urban middle class mother reported that both parents disciplined the misbehaving child.

These findings are similar to Prothro's findings on Lebanese mothers (38,121) and Khan's findings on Pakistani mothers (28,64) in the general trend of the mothers being responsible for disciplining the child till the age of five. But our findings contradict Prothro's (38,122) and Khan's (28,64) results that a higher percentage of rural mothers were responsible for disciplining the children. However, our results seem to agree with Prothro's (38,122) and Khans (28,64) in that most of the fathers who were reported to have disciplined the child did so in case of boys. This is true for all the mothers responding irrespective of social class. The writer is of the opinion expressed by Prothro (38,122) that the father most probably acts as a final authority in some cases, dealing out punishment only when the mother's efforts have failed.

After discussing who disciplined the misbehaving child, each mother was given the following question: Do you think that (X) resembles his father more than he resembles you in his movements, his way of speaking, and his way of walking?

Eighty-one mothers said that the child resembled his father. Out of these 74 were boys. 70 mothers reported that the child resembled his mother, and out of these 66 were girls. Accordingly, we can conclude that boys generally resembled their fathers, while girls generally resembled their mothers. These results agree with Prothro's findings on Lebanese children (38,123) and Khan's findings in Pakistan (28,65)

However, Fretzke has a reservation about his findings in relation to the child's identification. He said that it may be that Lebanese mothers believed in sex-typing and read it into the children (38,124)

A third question dealing with sex differences in the rearing practices ran like this: In some families the father decides matters concerning the children, but in other families the mother is responsible for everything concerning the children. Could you tell me who is responsible in your family?

With the exception of 4 urban middle class mothers, all the mothers replied that the father was responsible. The 4 urban middle class mothers said that both parents were responsible for such decisions. So it can be said that generally Sudanese fathers are responsible for making decisions concerning the children. It seems that, in this respect, Sudanese are different from the Lebanese (38,128) and the Pakistanis (28,69) where decisions affecting the children were mostly made by the mothers.

After discussing the matter of decisions concerning the child, the mother was asked: Is the method you are using now in rearing (X) like the method your mother used in rearing you? If different, which method is better?

Table 24 summarizes the answers to the first part of the question.

Table 24

IS YOUR METHOD SIMILAR TO YOUR
MOTHER'S METHOD OF REARING?

The figures are percentages.

	Similar	Differ a bit	Different
Urban Middle Class	4	18	78
Urban lower class	12	21	67
Rural lower class	37	21	42

The results show a significant class difference between the urban middle class and the lower class mothers in the city and the village. The methods used by the urban middle class mothers are more likely than the lower class methods to be different than the methods of rearing used by the grandmothers. This difference is statistically significant at the .01 level.

In reply to the second part of the question, 69 per cent of the urban middle class mothers, 16 per cent of the Urban lower class, and 21 per cent of the rural lower class mothers preferred their own new methods of child rearing to the older methods. Thus most of the urban middle class mothers changed their attitude toward the methods of child rearing. This may be due to influence of westernization and contact with mass media and other sources of information. Similarly, Lebanese middle class mothers (38,131) and Pakistani middle class mother (28,71)

generally preferred new methods to old methods of child rearing.

COMMENTS ON SEX DIFFERENCES

IN

THE SUDAN

Males are the core of social life in the Sudan. Generally, they are the bread winners, while the females stay in the house to manage its affairs and look after the children. It has been mentioned that boys are preferred to girls, although they are treated equally in matters of maternal warmth and parental love.

Like her mother, the girl's place is in the house. From about the age of 7, she is not expected to go out much, even with other girls, and never with boys. The girl is expected to be a mother substitute to her younger siblings, caring for them and attending their wants. From a young age, she learns to cook, and in the rural areas, to help on the farm. By the age of 13 she carries a considerable portion of her mother's burden.

Such a situation would require that parents have different expectations for boys and girls, and that they make a differentiation between the two sex roles. Girls are expected to be modest, yielding and sympathetic, while boys are expected to be strong, capable and physically aggressive.

Young girls are given toys in the form of dolls to play with and act the role of a mother. In the villages such toys are usually made for the female child by the mother or an elder sister. Generally boys are dressed in white or one-colour garments, while girls are dressed

in brightly, differently-colored clothes. Especially in the villages, young boys can go around naked or only in short pants, while young girls are not allowed to do this. Girls are not expected to be physically aggressive, but boys are encouraged to be so. Rural females have great physical strength because they work in the house, bring water from the well and help on the farm, but still they are expected to be physically unaggressive.

S U M M A R Y

Like the Lebanese and Pakistanis, Sudanese mothers are more likely than fathers to discipline the child until the age of five.

However, more urban middle class mothers reported that both parents disciplined the child.

Also similar to the Lebanese and Pakistanis, the 5-year-old Sudanese identified with the parent of the same sex. This agrees with the views of child psychologists.

While Sudanese fathers were found to be responsible for making decisions concerning the children, it was found in the other comparable studies that Lebanese mothers and also Pakistani mothers were responsible for such decisions.

Similar to the Lebanese and Pakistanis, Sudanese urban middle class mothers tend to prefer the new methods of child rearing to the old ones.

Sudanese girls are expected to be modest, yielding and sympathetic while boys are expected to be strong, capable, and physically aggressive.

According to Freud, Mead and Hoenigmann, training for sex roles begins in infancy through nonverbal communication between child and parent.

CONCLUSION

I. Summary

The purposes of this study are:

- A. To describe how three groups of Sudanese mothers - namely, rural lower class, Urban middle class, and urban lower class - rear their children with respect to the following child rearing practices: feeding weaning, toilet, training, discipline, maternal warmth, and sex training.
- B. To find out the similarities and differences among the three groups.
- C. To give cross-cultural comparisons and pertinent suggestions.

The sample of subjects included 151 mothers with children five years of age. The information about child rearing practices was obtained by Sadri through an interviewing schedule adapted from Prothro's schedule, which he used to study child rearing practices in Lebanon.

The study revealed that Sudanese wives and husbands, like the Lebanese and Pakistanis, felt happy when they know they were going to become parents. Also, similar to the Lebanese and Pakistanis, Sudanese mothers generally picked up or fed the child when he cried.

There are significant differences concerning feeding. While some urban middle class mothers used bottle feeding, exclusively, none of the rural mothers did so. Lower urban and rural class mothers used no feeding scheduling, while about a third of the urban middle class mothers

scheduled the feeding partially or completely. Generally urban mothers breast-fed their children for a longer period than the rural mothers. Urban middle class children experienced more feeding problems than did the lower class children.

The mothers weaned their children at about the age of 14 months, but generally the rural mothers weaned theirs at an older age. The rural mothers, however, were found to be more decisive in weaning than the urban middle class mothers. At the same time, more rural children practiced thumb-sucking and experienced weaning difficulties. In this respect Sudanese children are similar to the Pakistani children.

Rural mothers started toilet training earlier than the urban mothers, but completed the process later than they did. The urban middle class mothers expressed more concern about the child's cleanliness. More urban middle class children were reported as having had difficulties during toilet training. Compared to the Lebanese, fewer Sudanese children had toilet training problems.

Almost all Sudanese mothers used physical punishment to discipline the child. Compared to the lower class as a whole, more urban middle class mothers rewarded the child on good behavior. Similar to the Lebanese, Sudanese mothers demanded prompt obedience from the child.

Like the Lebanese and Pakistanis, Sudanese mothers disciplined the child until the age of five. Most urban middle class mothers reported that both parents were responsible for disciplining the child. Also similar to the Lebanese and Pakistanis, the 5-years old Sudanese identified

with the parent of the same sex. But unlike the Lebanese and Pakistanis, The Sudanese fathers and not the mothers were found to be responsible for making decisions concerning the child. On the other hand, Sudanese urban middle class mothers, like the Lebanese and Pakistanis, tended to prefer the new methods of child rearing to the old ones.

2. Limitations and Suggestions

It is clear that such a study has obvious limitations such as:

1. It cannot give a thorough description of all the child rearing practices.
2. It cannot describe the child rearing practices for all age levels.
3. We cannot say that some of the small samples, collected from some areas, do represent the communities from which they were taken.
4. Because our sample is rather small, it may be doubtful as to whether the answers, given to the questions, are honest ones, or whether they are idealized answers that reflect the cultural values rather than the mothers' actual behavior.

Further evidence may be obtained by increasing the size of the sample.

Nevertheless, it is hoped that this study will arouse other investigators to consider other aspects of child rearing, and to conduct more complete studies.

An interesting area that can be explored is the relationship of child rearing practices to certain aspects of a child's personality, for example, are breast and bottle feeding related to different covert personality traits? Is upset over weaning related to age at weaning, degree of scheduling, breast and bottle feeding, decisiveness or indecisiveness in weaning, feeding problems, and upset over toilet training? What is the effect of using a pacifier - and how does it relate to thumb-sucking? What does a preference for one sex in the child mean for the personality development of the preferred child and the child of the other sex?

A P P E N D I X I

English translation of the interviewing schedule (adapted from Prothro)

Age of child

Sex of child

1. To begin with, I would like to get a general picture of your family.
 - a. How many boys and how many girls do you have?
 - b. How old are the boys? the girls? What is the order of the five-year old child(x)? Oldest, youngest, middle, or only child?
 - c. When you were pregnant with(x), did you wish to have a boy or girls?
 - d. People usually prefer boys to girls, what is your point of view about this?
 - e. If you prefer boys to girls, what are your reasons?
 - f. Does any relative live with you in the house? For example, mother's father, father's father, mother's mother, father's mother, father's brother, father's sister, mother's brother, mother's sister.
 - g. Does any one else live with you in the house? For example, servant, son of one of your relatives or friends.
2. Let us go back to the time when (x) was an infant. who took care of him most of the time?
 - a. Did your husband help in taking care of him?
 - b. Did anyone else help in taking care of him?

3. Some mothers believe it is necessary to pick up a child when he cries, while other mothers let the child cry lest he get used to being picked up.
 - a. What is your opinion about this?
 - b. What did you do when (x) was an infant?
 - c. What did you do when (x) cried at night?
4. Did you have time to spend with (x) other than the time spent in taking care of him, such as nursing and bathing?
 - a. (If the answer is yes) tell me, what did you do during that time?
Did you fondle him or sing for him, or something like that?
5. Do you believe that children are more pleasing in infancy or when they are older? at what age is the child most pleasing?
6. Now tell me something about your way of feeding him when he was an infant.
 - a. Did you suckle him? For how long? (If not) How did you decide to use the feeding bottle? For how long?
 - b. Tell me about the method of weaning him (from the breast or the bottle). When did you begin to wean him?
 - c. How did weaning affect him? How long did it take him to stop de..Suckling completely?
7. Now tell me something about his feeding when he was about one year old?
 - a. Did you feed him on schedule or when he felt hungry?
 - b. How many times a day was he fed?

8. In the last two years, did you have any difficulty in getting him to eat the quantity or types of food he needs?
9. Suppose he does something which you do not like. What do you do?
10. Did you use diapers for him? *or how long?
11. When did you start training him in bladder control?
 - a. Was he easily taught?
 - b. How long did it take to train him completely?
12. You know children sometimes like to go around without their clothes on. How do you feel about this?
 - a. (if negative) what did you do to teach (x) that this is not approved of?
 - b. When did you start teaching him this?
13. What did you do when you found (x) playing with his genitals?
 - a. Is it advisable to prevent children from doing this?
14. Does he have any idea about how children are born?
 - a. (if yes) where did he get this information?
15. Now let us discuss the topic of cleanliness and tidiness. What do you expect of (x) regarding cleanliness and bathing? What would you do to help him keep clean?
16. Do you let him play sometimes by jumping over furniture or writing on the wall or anything like that?
 - a. (if negative) what would you do to stop him from such behavior?
17. Should children as old as (x) be requested to perform certain duties at home?
 - a. Does (x) have certain duties at home?

18. Some parents require a child to obey immediately (when told to stop making noise, for example) Others do not attach much importance to how quickly a child obeys. What is your opinion about this?
19. Suppose (x) was asked to do a certain job, and he did it immediately, what would you do or say to him?
20. What do you think is better: to watch him always, or leave him alone?
21. Does (x) seem to want to be with you most of the time? For example, does he follow you around and stay close to you?
(If not now, did he pass through a period of which he did this?)
a. How do you feel when he follows you around?
22. What does (x) usually do, when you go out of the house and leave him with another person?
23. Was he separated from you at any time, of his life? (if yes) for how long?
24. Has he been separated from the father at any time of his life? (for how long?)
25. Could you tell me more about your life with X? What are the things about him which please you and those which do not please you?
a. Do you have time to spend with X for more amusement? Tell me about that.
26. What level of education do you want him to reach in school?
27. (In case mother has other children) could you tell me something about X's relations with his brothers and sisters?
28. What about his relations with the neighbours' children?

29. Some people feel it important that the child should not learn to fight with other children, while others feel the contrary. What is your opinion?
- a. Did you encourage X to fight back in case another child quarrelled with him?
30. What do you do when he is intentionally disobedient?
31. Now I would like to have an idea about X when he is naughty (I know we have spoken a lot about bad behavior, but this does not mean that X is always thus. Most children misbehave sometimes and we wish to get this information in detail)
- a. For example, if in your absence he intentionally does something wrong, what does he do when you return?
- b. Does he tell you about it without questioning?
- c. When he does not confess what he has done, and you are sure of it, what do you do?
32. Do you have a special arrangement to reward X when he behaves well?
33. Some parents praise their children so as to encourage them to behave well. Others consider that good behavior is simply to be expected. What is your opinion?
34. Do you beat him sometimes?
- a. Does his father beat him sometimes?
- b. For example, how many times was he beaten in the last two weeks?

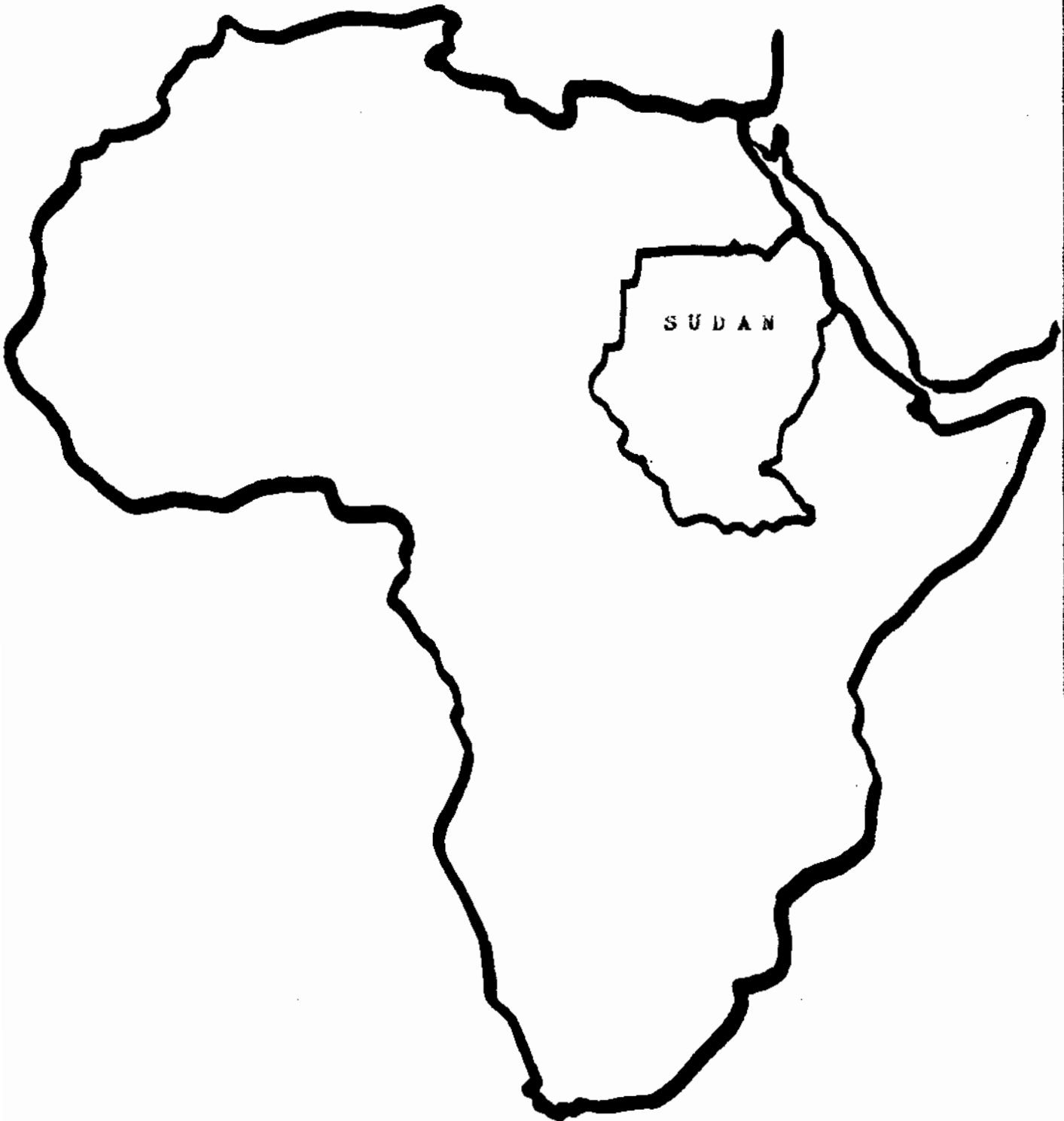
35. Do you think that beating is useful?
36. Do you often threaten him, and then do nothing for some reason or another?
- a. What are the reasons that make you fail to follow through?
37. Did X suck his thumb when he was an infant?
- a. When did he start to suck his thumb?
- b. When did he stop to suck his thumb?
38. I would like to know your opinion about certain activities, some of which may be agreeable to you and some of which may not.
- a. For example, would like him to try new things without your help? At what age should a child start this?
- b. Would you like him to compete successfully with other children and try to be first in games, lessons, and sports? At what age?
39. What is your husband's attitude toward X? Does he often show his affection (kisses and embraces him, for example), or is he reserved?
40. Who disciplines X when he needs it and both you and your husband are present?
- a. Is your husband very severe in his treatment of X?
- b. Do you approve of the way your husband disciplines him?
41. Does your husband believe that you are too severe or reasonable in disciplining X?
42. In some families the father decides matters concerning the children but in other families the mother is responsible for that. Could you tell us who is responsible in your family?
- a. For example, who is responsible to give him permission to go to the places he likes to visit?

- b. In case of illness of X, who is responsible for calling a doctor?
- c. Who determines the amount of help which X should give the parents at home?
- 43. Who makes family decisions which do not concern the children?
 - a. Regarding money?
 - b. Regarding expenditures and accounts?
- 44. In some families the household tasks are divided between the parents. The woman, for example, cooks and the husband repairs things. In some cases the couple work together on every task. What is the situation in your family?
- 45. Do you think that X resembles his father rather than you in his movements, and his way of talking and walking?
- 46. Does X behave better with you or with his father?
- 47. People differ on the meaning of "good child." In your opinion, what is a good boy or girl who is five or six years of age?
- 48. In general what type of person would you like X to be when he grows up?
- 49. We have just about to come to the end of our discussion. One thing I would like to know: How do you feel about being a mother?
 - a. What was your feeling when you discovered that you were pregnant with X?
 - b. How did your husband feel about it?
- 50. From the viewpoint of expenses, ages of the children, do you think X's coming was suitable?
- 51. If you think back on the matter, do you think if X had been delayed a little it would have been better for you?
- 52. Did you have any job before you married and became a mother?
 - a. (If yes) what type of job?
 - b. How did you feel when you quit your work?

53. If you compare the method your mother used in rearing you and the method you use in rearing X, how much are they alike?
a. (If differ) which method is better?
54. What does your husband do for a living? (is there another income, do you work?)
55. Did your husband go to school?
a. What level of education did he reach?
56. How old is your husband?
57. Did you go to school?
a. What level of education did you reach?
58. How old are you?
59. (Fill out as soon as possible after leaving, specially E)
- a. House made of
 - b. Number of rooms and size
 - c. Running water?
 - d. Bathroom?
 - e. Radio or other electrical appliances
 - f. Amount and kind of furniture.
 - g. Books? magazines? art works?
 - h. General appearance of home
 - i. Servants?
 - j. Location in town
 - k. over - all impression of socio-economic status (occupation and education).

APPENDIX II

GEOGRAPHICAL LOCATION OF SUDAN



B I B L I O G R A P H Y

1. Al-Qasr, Nassrine, The Effect of Social Class On Child Rearing In Iraq, Thesis, A.U.B., 1966
2. (Eadri, Malid: Professor Education, A.U.B.)^{*}
3. Bartlett, F.H., Infants and Children, Farrar, Inc., New York, 1944
4. Baruch, Dorothy, Understanding Young Children, Bureau of Publications, New York, 1953.
5. Berry, L., "Sudan, Republic of the," Encyclopaedia Britannica, Vo., 21, W. Benton Publisher, London, 1965, pp. 504-513.
6. Bingham, J., Do Babies have Worries, Heath Publication, New York 1951.
7. Bowlby, John, Maternal Care, WHO Report, New York, 1963.
8. Brin, Orville, Education for Child Rearing, R. Sage, New York, 1959.
9. Cabas, H.D., Child Rearing in Greece, M.A. Thesis, A.U.B. 1963.
10. DelSolar, C., Parents and Teachers View the Child, Bureau of Publication, New York, 1949.
11. El-Barawy, R., Egypt, Britain And the Sudan, Renaissance Publishers, Cairo, 1952.
12. Fabunmi, L.A., The Sudan In Anglo-Egyptian Relations. Longman, London, 1951.
13. Frampton, M.E. "Child Care", Encyclopedia of Modern Education, Huber and Company, New York, 1913.
14. Gessel, Arnold, Infant and Child in the Culture of Today, Harper, New York, 1913.
15. Granqvist, Hilma, Birth and Childhood among the Arabs, Soderstrom & Co., Helsingfors, 1947
16. Groves, E.R., The Family and its Social Functions, Lippincott Company, New York, 1940
17. Guthrie, G., and Jacobs, P., Child Rearing and Personality Development in the Philippines, University Press, London, 1966.

16. Hall, C.S., A Primer of Freudian Psychology, World Publishing, Cleveland, 1954.
19. Havighurst, R.J., and Davis, W., Father of the Man, Houghton Mifflin, Boston, 1947.
20. (Hildreth, Gertrude: Professor of education, A.U.B.)*
21. Hodgkin, R.A., Sudan Geography, Longmans, London, 1951.
22. Honigmann, Joh, Culture and Personality, Harper Publisher, New York, 1954
23. Hurley, J.R., "Maternal Attitudes and Children's Intelligence", Journal of Clinical Psychology, Vol. 15 (July, 1954), pp. 291-293
24. Harlock, Elizabeth. Child Development, McGraw-Hill, New York, 1956.
25. Iscoe, Ira, and Stevenson, H., editors, Personality Development in Children, University Press, Austin, 1960
26. Jackson, H.C., Behind the Modern Sudan, MacMillan and Company, London, 1955.
27. Jersild, A.T., et, al., Jobs and Problems of Child Rearing, Bureau of Publication, New York, 1949.
28. Khan, Rehana, Child Rearing Practices in Pakistan, M.A. Thesis, A.U.B. 1/65
29. Krotki, Karol, 21 Facts about the Sudanese (1955/56 census), R. Kiesel Publisher, Salzburg, 1958.
30. Landy, Davis, Tropical Childhood, Van Noes Press, New York, 1959.
31. Langley, Michael, No Woman's coun ry, travels in the Anglo-Egyptian Sudan, Jarrolds Publisher, London, 1950
32. Miller, D.R., and Swanson, G.E., The Changing American Parent, John Wiley & Sons, New York, 1958.
33. Minturn, Leigh, et. al., Mothers of Six cultures, John Wiley & Sons, New York, 1964.
34. Munn, Norman, Psychology, Houghton Mifflin Co., Boston, 1961.
35. Newcomb, T., and Hartley, E., editors, Readings in Social Psychology, H.H. Company, New York, 1947.
36. Newson, John and Elizabeth, Infant Care in An Urban Community, G. Allen & Company, London, 1963.

37. Peck, Leigh, Child Psychology, DeHeath & Co., Boston, 1953.
38. Prothro, Edwin Terry, Child Rearing in the Lebanon, Harvard University Press Cambridge, 1961.
39. Reeves, Katherine, Children: Their Ways and Wants, The Educational Publishing corporation, Darlen, 1959.
40. Righels, Sophie, Children's Behavior, Beckman Associates, New York, 1959
41. Russel, J.F., An Introduction to Research Procedures in Education, Harper Publishers, New York, 1958.
42. Sa'id, Bashir Mohammed, The Sudan, The Bodley Head Publishers, London, 1965.
43. Sears, Robert R., et.al., Patterns of Child Rearing, Row and Company, New York, 1957.
44. Shney, Rebekah, et.al., Learning About Children, J.B. Lippincott Co., New York, 1964.
45. Spock, Benjamin, The Common Sense Book of Baby and Child care, Duell and Sloan Publishers, New York, 1957.
46. UNICEF, Children of the Developing Countries, The World Publishing Co., New York, 1963.
47. Valentine, C.W., The Normal Child, Cox and Wyman, London, 1964.
48. Watson, John B., Psychological Care of Infant And Child, W.W. Norton & Co., New York, 1928.
49. Young, Hugh, Statistical Treatment of Experimental Data, McGraw-Hill New York, 1962.
50. (Young, Robert L.: Professor of Education, A.U.B.)*

* Directly consulted