

DOCUMENT RESUME

ED 056 952

SO 002 084

AUTHOR Steinitz, Victoria
TITLE How Children Categorize Social Stimuli. Final Report.
INSTITUTION Joint Center for Urban Studies, Cambridge, Mass.
SPONS AGENCY National Center for Educational Research and Development (DHEW/CE), Washington, D.C.
BUREAU NO BR-8-A-022
PUB DATE Sep 71
GRANT OEG-1-8-0031-058
NOTE 82p.

EDRS PRICE MF-\$0.65 HC-\$3.29
DESCRIPTORS *Behavioral Science Research; *Childhood Attitudes; Classification; Cues; Housing; Jobs; *Role Perception; Social Class; Social Influences; *Socialization; Social Status; Social Structure; *Socioeconomic Status; Suburban Youth; Urban Youth
IDENTIFIERS Social Research; *Sociological Studies

ABSTRACT

This study investigated the kinds of dimensions that children use to compare and contrast two sets of social stimuli--houses and jobs. The research was based on the assumption that obtaining knowledge of how similarity structures are formed for social domains would be useful in explaining the development of personal preferences and conceptions of social status. Free sort and triad procedures, and preference and importance rank orders were used to explore the ways in which 120 fourth and seventh graders from urban and suburban areas categorized houses and jobs. The younger children grouped pairs of houses with similar details and pairs of jobs with similar functions. The older children used a greater variety of different criteria to group the stimuli and were more likely to sort the total array on the basis of a single attribute. Explicit social status categories were used infrequently by all children. Status was an important determinant of preferences and important ranks. Urban children liked more houses than did suburban children--perhaps reflecting an attempt to minimize their own distance from the top. Job preferences and importance rank orders resembled adult occupational prestige rankings. While social status knowledge increased with age, even the older children were more likely to select glamorous jobs as ideals than high status ones.

(Author/JLB)

BR 8-A-022

50

U.S. DEPARTMENT OF HEALTH, EDUCATION & WELFARE

OFFICE OF EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL OFFICE OF EDUCATION POSITION OR POLICY.

ED056'952

Final Report

Project No. 8A022
Grant No. OEG-1-8-0031-058

Victoria Steinitz
Harvard Graduate School of Education
Longfellow Hall, Appian Way
Cambridge, Massachusetts 02138

HOW CHILDREN CATEGORIZE SOCIAL STIMULI

September 1971

U.S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE

Office of Education

National Center for Educational Research
and Development
(Regional Research Program)

sp 002084



ABSTRACT

The study investigated the kinds of dimensions that children use to compare and contrast two sets of social stimuli -- houses and jobs. The research was based on the assumption that obtaining knowledge of how similarity structures are formed for social domains would be useful in explaining the development of personal preferences and conceptions of social status.

Free sort and triad procedures, and preference and importance rank orders were used to explore the ways in which 120 fourth and seventh graders from urban and suburban areas categorized houses and jobs. The patterns of free sort responses resembled those found in earlier studies of non-social domains. The younger children grouped pairs of houses with similar details and pairs of jobs with similar functions. The older children used a greater variety of different criteria to group the stimuli and were more likely to sort the total array on the basis of a single attribute. Explicit social status categories were used infrequently by all the children.

Status was an important determinant of preferences and importance ranks. Urban children liked more houses than did suburban children -- perhaps reflecting an attempt to minimize their own distance from the top. Job preferences and importance rank orders resembled adult occupational prestige rankings. While social status knowledge increased with age, even the older children were more likely to select glamorous jobs as ideals than high status ones.

Final Report

Project No. 8A022
Grant No. OEG-1-8-0031-058

HOW CHILDREN CATEGORIZE SOCIAL STIMULI

Victoria Steinitz

Joint Center for Urban Studies
Cambridge, Mass.

September 1971

The research reported herein was performed pursuant to a grant with the Office of Education, U. S. Department of Health, Education, and Welfare. Contractors undertaking such projects under Government sponsorship was encouraged to express freely their professional judgment in the conduct of the project. Points of view or opinions stated do not, therefore, necessarily represent official Office of Education position or policy.

U. S. DEPARTMENT OF
HEALTH, EDUCATION, AND WELFARE

Office of Education
National Center for Educational Research and Development

CONTENTS

	Page
Preface	1
Introduction	3
Aims of the Research	6
Methods	6
Sample	6
Stimuli	8
Procedures	11
Interviewing	14
Coding and Analysis of the Data	14
Findings and Analysis	15
House Free Sorts	16
House Triads	21
Job Free Sorts	24
Job Triads	26
Complexity of Sorts	28
House Preferences	33
Job Preferences	35
The Tendency to Like Rather than Dislike	39
Job Importance	40
Social Status Sensitivity	43
Free Association Jobs	45
Probable and Ideal Job Choices	46
The Children's Residential Experience	49
Conclusions	51
Summary of Findings and Analysis	51
Comments on Methods	54
Implications for Educational Practice	57
References	58
Appendix: The Interview Schedule	60

TABLES

	Page
1. Social Status Rankings of Job Titles	10
2. House Sort Criteria	18
3. Number of Different House Sort Criteria	19
4. House Triad Reasons	22
5. Job Sort Criteria	25
6. Job Triad Reasons	27
7. Nature of Free Sorts	29
8. Proportion of Sorts Containing More than Two Items	30
9. House Preference Ranks	34
10. Job Preference Ranks	37
11. Job Importance Ranks	41
12. Own Job Choices	47

FIGURES

1. House Photographs	9
2. Projected Developmental Sequence of House and Job Free Sort Behavior	32

PREFACE

I would like to thank Mr. Herbert Hamilton, Associate Superintendent, Mr. Frank Murphy, Principal of the Mackey School and Mr. Jeremiah Downey, Principal of the Abraham Lincoln School for their help in facilitating the research in the Boston Schools. I would like to thank Dr. Sayre Uhler, former Superintendent, Mr. Richard Ford, Principal of the Willard School, and Mr. Di Pasqual, former Guidance Counselor at Sanborn Junior High School for similar assistance in Concord.

I would also like to acknowledge Carl Corey and Charlene Morgan who did the major part of the interviewing and Terry Keister who coded the interviews.

INTRODUCTION

Societies differ in the kinds of things they choose to teach explicitly to their children. While children all over the world are taught how to deal with the physical properties of their environment -- how to find their way around their neighborhood, how to determine whether places are safe or dangerous, how to perform those tasks that are within their capabilities -- cultures vary in the extent to which they deliberately and uniformly instruct children about the ways in which the social system is ordered.

In the United States, information about the social order is typically transmitted indirectly. Thus, for example, children are told that they may play in certain areas but not in others. Sometimes, the justification for forbidding access to an area is obviously based upon a purely physical danger -- a deserted mine shaft or a traffic-filled street, but often the real reason for classifying an area as out-of-bounds is its social character -- gangs hang out there or Negroes are not permitted entry. Probably, these kinds of social categories are often not defined explicitly for children. Instead, they are masked behind apparent objective properties like "the neighborhood is dirty" which are then allowed to insinuate generous amounts of surplus social meaning. Perhaps, it is an indication of the uneasiness with which Americans handle the existence of social distinctions that so much social learning must take the form of incidental learning.

For the urban child, the task of learning social categories is further complicated by the disparity between the social homogeneity of his actual everyday experiences and the potential complexity to which he is exposed through secondary sources of information. In earlier times, in smaller places, children could have fairly direct experience with most parts of the whole environment. They could see for themselves how their towns and the people in them were socially structured.¹ But today, most children

¹Elmtown's Youth (Hollingshead, 1949) demonstrates how well small town youth understood social status distinctions thirty years ago.

live and spend their time within a relatively limited part of the whole social space. Typically the slum child lives in a house which is surrounded by other slum houses, attends a school within his neighborhood with children who are similar to himself in appearance, ideology and aspirations, and rarely ventures forth to other parts of the city.¹ For the suburban child, everyday experience may have a very different quality but its diversity -- in the sense of the opportunities it provides for contact with the different kinds of people and environments to be found in a metropolitan area -- is probably not much greater.²

From his direct experiences, a child might be tempted to derive a relatively narrow set of social categories. But then he is also exposed -- through the mass media, through some of his school experiences, and during occasional forays into the wider city -- to numerous instances of people and places with very different values, goals, and even total life styles. To develop a coherent picture of the social system, the child must somehow integrate the observations he has made under two very different kinds of circumstances -- during direct experience in his relatively homogeneous immediate environment and during vicarious exposure to the very complicated and heterogeneous larger social world.

If these assumptions about the nature of the situation in which social learning occurs are correct -- that instruction about the social system is mainly ambiguous, indirect, and based upon secondary sources -- then we must conclude that children face a complex and difficult learning task. From arrays of stimuli, composed of confusing and unspecified mixtures of objective and subjective elements, they must learn to extract those dimensions that permit them to behave in appropriate ways within their immediate situation, to hold relevant expectations about their future roles in the wider world, and in addition to abstract some general principles about the functioning of

¹For an autobiographical account of the powerful impact of a first trip "downtown" upon a child raised in Harlem, see Claude Brown's Manchild in the Promised Land. Gans, in The Urban Villagers, describes similar insulation from the wider metropolis in the Italian-Americans of Boston's West End before the area was taken for urban renewal.

²In a recent study, Miel and Kiester (1967) have documented the almost complete absence of contact with and knowledge about minority groups in elementary school children in one of the New York suburbs.

the social system. The ways in which this kind of social learning takes place and its products have rarely been studied in detail. Little is known about the kinds of differences that children are apt to notice or the kinds of meanings that they are likely to infer from these differences. Nor do we know how children integrate their immediate with their vicarious experiences or how they form general, summarizing categories on the basis of their observations and inferences.

Aims of the Research: The research described in this report investigates some products of social learning -- the types of classification schemes that children use when they try to describe and order elements in the social world. In particular, it examines the ways in which children categorize two common classes of social stimuli -- houses and jobs. These domains were selected for intensive study because they contain basic elements of the social environment that are repeatedly present in the everyday experience of children and that are important indicators of social status.

The ubiquitous presence of houses is fairly obvious. Everyone lives somewhere -- the child himself, his friends, his enemies, and the people he reads about in books or watches on television. To some extent the house a person lives in is seen as part of him -- a very visible and public part which conveys a mixture of information. In some cases, it says something about how a person chooses to live; in other instances it says something about how he is forced to live. In every case, a person's house provides some information about how he does live -- cues which children can use to build social categories about the nature and desirability of their environments.

Jobs are less tangible, less open to inspection -- particularly by children. While they learn at an early age that most men and some women work at jobs and while they are continually encountering instances of particular individuals who have specific jobs, children rarely have the opportunity to observe people at work and often know nothing about a job beyond its title. Some of the more important social meanings of jobs depend upon abstractions -- like the amount of power the job occupant wields or the extent of his responsibilities. There may be few visible or obvious means for locating jobs along these abstract dimensions. Yet somehow children do develop ways of categorizing jobs and, gradually, these schemes begin to approximate those used by the adult community. Two complementary, yet contrasting, classes of social stimuli were selected for study in order to obtain a richer and more general description of children's social categories.

Undoubtedly, one of the major ways in which children classify social stimuli is in terms of their own preferences and this evaluative aspect has been the subject of numerous investigations.¹ However, there has been virtually no research on other ways of categorizing social objects. We know very little about how children perceive, describe, discriminate among, group or order social stimuli when they are not doing so on the basis of their own liking for the objects. Nor for that matter do we know very much about the reasons underlying particular orders of preference.² A major aim of the research was to elicit the full range of similarities and differences that children perceive and utilize when they categorize social stimuli so as to gain more insight into how children come to understand social reality.

Most research on concept formation in children has focussed on non-social realms. Previous research has taken two directions: 1) studies of individual variations in the preference for different modes of sorting (e.g., Wright and Kagan, 1963) and 2) studies of the stages leading to the development of abstract, adult categories (e.g., Bruner, Olver, and Greenfield, 1966). In these investigations, children have typically been asked to group neutral objects and the primary orientation has been toward eliciting problem solving behavior. Underlying much of the earlier research is the notion that certain kinds of categories represent "superior" solutions to the sorting task. Superordinate categories have been assumed to be developmentally more advanced than thematic categories. Superordinate groupings are ones in which every instance in the array is sorted on the basis of a common attribute (e.g., color, size, function). Thematic groupings are ones in which items are grouped together on the basis of idiosyncratic or coincidental relationships (e.g., "Coat and man go together because men must wear coats when it is cold.") While analytic, superordinate concepts may be superior in that they make it possible to classify every instance in the array, they do not necessarily capture the richness of social meanings. If we are to gain an understanding of everyday thinking about

¹ See Shostak and Gomberg (1964) for some recent examples of the voluminous literature on children's occupational preferences.

² Gunn (1964) and Grunes (1957) have studied children's conceptions of the prestige of jobs.

the social world, thematic and relational concepts will have to be considered in their own right rather than merely as steps along the way to superordination. Thus, the current study is concerned with discovering the multiple ways in which children categorize socially meaningful content.

It was hoped that the research would represent a step toward bridging the gap between concept development and attitude formation theories. Since the ability to form superordinate categories has only been examined in non-social domains and since most of the research on the development of social attitudes has failed to take account of cognitive theory, work aimed toward understanding the emerging relations between similarity and preference structures is badly needed. The initial rationale for this study was derived from Kelly's personal construct theory. Kelly (1955) views perceptions of sameness and difference as the basic elements of cognitive structure. He suggests that if we map the cognitive structures in which social stimuli are embedded -- that is, if we discover the numbers and kinds of dimensions that are used to compare and contrast stimuli -- then we shall have a framework from which to derive preferences.

Since the research is exploratory and involves an area in which very little work has been done it was not designed to test specific hypotheses. Rather, some general questions were framed at the outset and it was assumed that additional questions would emerge as significant in the course of the study. Some of the original questions are outlined below.

How are descriptive cues used in the formation of interpretive social categories -- What kinds of perceptual or descriptive cues are children most likely to notice? To what kinds of cues are they most likely to attribute social meanings? To what extent is categorization common across different content domains? Do children from different environments differ in the kinds of descriptive elements they choose as reasons for grouping or in the kinds of social distinctions they use as bases for comparison?

Does the existence of a shared preference structure have implications for other aspects of cognitive structure -- that is, do children who place the same values on social objects structure arrays in other ways that are similar? Do they perceive the same sets of stimuli as alike and different? Do they use the same kinds of categories to compare and contrast objects?

What is the effect of the child's own status upon the congruence between his preference and similarity structures? There is ample evidence that children from different social backgrounds evaluate social stimuli differently. For example, many investigations have found differences in occupational aspirations as a function of social class (e.g., Human, 1966; Turner, 1964; and Wilson, 1959). Are there parallel differences in similarity structures?

How important is adult consensual social status as a determinant of children's cognitive structures concerning social objects? How well can we predict which stimuli children will group as similar from a knowledge of adult rankings of the social status of these objects and do children perceive themselves as using social status as a basis for sorting? Which children are most aware of status distinctions and how does sensitivity to social status manifest itself?

METHODS

Sample: With the aim of gaining a preliminary understanding of the importance of place of residence and grade level in social concept formation, city and suburban, fourth and seventh graders were studied. The main sample consists of eighty white children -- twenty in each of four grade-residential area subgroups. Two groups of fourth graders were interviewed -- twenty children from an urban area and twenty from an outer suburb. Two corresponding groups of seventh graders were interviewed -- twenty from the urban area and twenty from the outer suburb.

Place of residence was chosen as a sampling variable because a subsidiary aim of the study was to gather information about the differences between urban and suburban children in their perceptions of and preferences for city and suburban dwellings. Since the urban area from which the sample was drawn was an impoverished area of the inner city and the outer-suburb was an upper middle class area, the urban and suburban samples also vary greatly in socioeconomic status. The correlation between place of residence and father's occupational status was .67.

¹The original intention had been to interview tenth graders as well but data collection proved much more complicated and time-consuming than had been anticipated and, as a result, the oldest groups had to be eliminated from the sample design.

It was not possible to match the residential groups for intelligence. The suburban children were selected from the average group in their schools, but the white urban samples were drawn from two inner-city public schools and were exhaustive of the white children in those schools who were at the appropriate grade level for their age.¹ The correlation between place of residence and intelligence was .53.

Given the confounding of residential difference with socio-economic status and intelligence differences, the findings which contrast the urban and suburban samples should of course not be interpreted as indicating that place of residence is responsible for the observed differences. The results must instead be viewed as descriptive of the ways in which children growing up in very different circumstances develop a conception of social reality.

Interviews were also conducted with two additional groups of seventh graders -- twenty white inner-suburban children² and twenty black urban children.³ Equal numbers

¹ In my initial interview with the principal of these schools I was told that approximately half the children in the schools were white. In fact only a small minority of the children were white.

² Initially, I had intended to interview fourth and seventh graders in the inner suburb. Interviewing was begun in the seventh grade after the project had been informally approved by the superintendent. While the interviewing was in progress, the School Committee decided not to approve any more university research in their town for the rest of the year. We were permitted to finish work in the junior high but were not allowed to interview elementary school students.

³ While planning the study, I had decided to limit the sample to white children because I was sympathetic to the position then being widely promulgated in the black community that white researchers had done sufficient "studies" of impoverished black children without pay-off for the children. Imagine my chagrin when I discovered that my decision not to "exploit" black children was being viewed as a decision to exclude blacks from the study. The interview sessions were seen by the children and teachers in the inner-city schools as a special treat and rumors began to circulate as to why white children alone were receiving this preferential treatment. When I realized that the black children not only did not regard the interview as an intrusion but actually wanted to be interviewed, I decided to add a group of black seventh graders to the sample. The addition of this group makes it possible to examine whether the findings for the white sample can be generalized beyond that group.

of boys and girls were also sampled in each of these groups. Thus, the total sample consists of 120 children. Most of the reported findings will be based upon the main sample but, where appropriate, comparisons will be made between the responses of the main and supplementary groups of seventh graders.

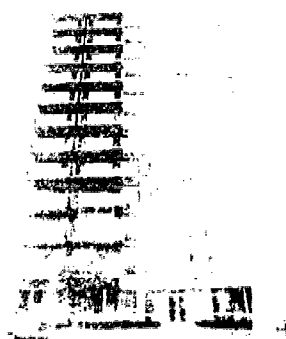
Stimuli: The children were asked to categorize social objects from two domains -- houses and jobs. The stimuli used to represent the first domain were visual -- photographs of houses; the stimuli used in the second domain were conceptual -- titles of jobs. The specific stimuli were selected on the basis of three criteria: 1) that they were comprehensible to the children; 2) that they provided many potential bases for different kinds of descriptive sorting and grouping; and 3) that they included examples of the full range of positions on the social status continuum.

The twenty house photographs used in the main study were selected from an initial set of approximately one hundred photos by "experts" from the Harvard Graduate School of Design. The experts were asked to sort the photos on a two-dimensional grid with house quality/social status representing one dimension and residential location representing the other dimension. The raters felt that they could only make accurate status distinctions among five levels and, thus, the photos were sorted into five status groups. Then, within each status group, the photos were ranged along an urban-suburban continuum. The final twenty photos were chosen so as to maximize the three raters' consensus on status placement. Fig. 1 contains the house photos. Each row represents a status level.

The job titles were selected on the basis of pretests which sought to determine how much children know about particular jobs and which job names they were most familiar with. After obtaining a set of familiar jobs, final choices were made on the basis of the adult occupational prestige rankings of the jobs. An attempt was made to select jobs which represented approximately equal prestige steps on the North-Hatt Occupational Prestige Scale (Hodge, et al., 1966). However, since the job titles were simplified (e.g., "physician" was changed to "doctor"), they do not correspond directly to the North-Hatt titles and the final rankings are an approximation. Table 1 lists for each job the social status ranking assigned for the purposes of this study, the best equivalent North-Hatt ranking, and the Turner classification scheme category (Turner, 1964).

FIGURE 1
House Photographs

Social
Status
Level



High-1



2



3



4



Low-5

TABLE 1.
Social Status Rankings of Job Titles

<u>Social Status</u> Rank	<u>Job Title</u>	<u>North-Hatt</u> <u>Prestige Ranking</u>	<u>Turner</u> <u>Categories</u> ¹
1	Doctor	2	8
2	Mayor	6	9
3	Scientist	8	8
4	Lawyer	18	8
5	Bank Manager	28	7
6	Army Captain	32	6
7	Teacher	36	8
8	Musician	30	6
9	Newspaper Reporter	48	6
10	Shoe Store Owner	49	5
11	Electrician	44	3
12	Policeman	55	3
13	Secretary		4
14	Garage Mechanic	61	3
15	Factory Worker	65	2
16	Grocery Store Clerk	67	4
17	Truck Driver	72	2
18	Night Watchman	82	1
19	Janitor	86	1
20	Street Cleaner	89	1

¹Turner's Classification of Occupations

- 1 - Unskilled Laborer
- 2 - Semi-skilled Laborer
- 3 - Skilled Laborer
- 4 - Lesser White-collar
- 5 - Small-business Owner, Manager and Salesman
- 6 - Semi-professional and Public Administrators
- 7 - Business Agent and Manager
- 8 - Professional
- 9 - Large-business Owner and Official

Procedures: This section of the report presents a general description of the procedures. The interview schedule (see Appendix A) contains the exact wording of the instructions and the order of presentation of the tasks.

A series of parallel techniques were designed for use with the house and the job stimuli. The interview began with similarity groupings. To elicit similarity structures, two procedures were used -- free sorting and the method of triads. In the free sort, children were presented with the total array of 20 stimuli -- photographs of the houses or index cards with the job titles written on them -- and they were asked to put together those that went together, the ones that they thought were alike in some way. Children approached this initial task in different ways. Some began by examining the total set before doing any grouping; others began by scanning the set for pairs. In those cases where children began by "picking pairs," they were told after the second pair that they could group as many stimuli together as they wished and that it was possible to form groups that included more than two stimuli. The children who picked pairs were asked to explain after each sort why the pair went together, that is, how the two items were alike. The children who sorted the total set were asked to explain their groupings after they had completed the total sort. Children tended to explain total sorts in terms of one superordinate dimension, but there were many mixed cases. Sometimes, children sorted all the stimuli into one or another group but then did not provide a superordinate to explain the sorts. Instead, they resorted to a variety of different kinds of explanations for group membership. On other occasions, children used a superordinate but did not fit every instance into one of the groups. In those cases where a child completed a total sort (whether or not it was based on a superordinate), he was asked to re-sort the items -- to think of other ways of grouping them. The children were urged to continue forming groups until the interviewer was reasonably certain that all available constructs had been elicited. Those children who had not used the total set approach and who had not included every item in at least one sort were presented with three specific items -- one at a time -- and asked if they could pick out any others that were similar to the provided one. The rationale behind this procedure was the notion that those children who had trouble focussing on instances because of the size and complexity of the array might be better able to handle the task if the initial step was taken for them.

The free sort and its variations were followed by a procedure based upon the method of triads. The

children were presented with three stimuli and were asked to select the two which they thought were more alike. Then they were asked to explain how the two were alike and how they differed from the third. The triads were selected with the intention of testing the salience of competing constructs. For example, one house triad contained two suburban single family houses -- an affluent contemporary house and an average traditional house -- and one urban luxury apartment house. The expectation was that if the child was very sensitive to socio-economic status distinctions, he would group the affluent suburban house and the luxury apartment building, but if the child was more attuned to urban-suburban differences, he would group the two houses. In practice, of course, the children discovered many additional reasons for grouping than those in the intended contrasts. Six sets of house triads and six sets of job triads were presented in an attempt to elicit a representative sample of behavior on this task. (See interview schedule in Appendix A for the specific combinations of items.)

Upon completion of the similarity tasks, a two-stage procedure was used to elicit preference orders. First, the stimuli were sorted into a set of predefined preference categories and then they were ordered within each category. Specifically, the children were asked to sort the houses and jobs into four "liking" groups, placing as many instances as they chose in each group. The first category was labeled "Like Very Much," the second "Like," the third "Dislike," and the fourth, "Dislike Very Much." Then, they were asked to consider each group in turn and to indicate which of those instances placed in the "Like Very Much" category they liked best of all, which they liked next best, and so on. They were also asked to explain why they liked their first and second choices and why they disliked their nineteenth and twentieth choices.

The two stage ranking procedure was adopted in order to obtain a better reflection of the children's actual intentions. Since the total array was large, there were a very great number of possible comparisons between items. It was thought that an initial gross sorting followed by a more refined within-group ranking would result in a more accurate order. The two-stage procedure also makes it possible by comparing the relative size of the piles to obtain some information about how children segment the scales. It enables us to distinguish, for example, between two children who gave similar rank orderings but differed in that one assigned equal numbers of items to each of the groups while the other placed the majority in the first group and made no assignments to the fourth group.

The job preference task was followed by a parallel procedure aimed at determining the social status or prestige that children attributed to the jobs. The method was identical to that used in the preference task. The children were asked to sort the jobs into four "importance" groups and then to rank order the jobs within each group. The groups were labeled "Very Important," "Pretty Important," "A Little Important," and "Not Important." After completing the rank order, the children were asked to explain their criteria by giving reasons for their first, second, nineteenth and twentieth choices.

The children's sensitivity to adult conceptions of social status was also measured by a second task -- the House-Job Match. For the matching game, the sets of houses and jobs were divided in half and two sub-sets of ten houses and ten jobs were composed. The first set consists of the odd-number ranked jobs (Doctor, Scientist, Bank Manager, etc.) and houses (A, C, E, etc.). The second set consists of the even-number ranked jobs (Mayor, Lawyer, Army Captain, etc.) and houses (B, D, F, etc.). Each child was presented with one of the sub-sets and asked to place each job into a house by imagining a man who might have that job and the house that he might live in. The sets were alternated from interview to interview.

Finally, the interview contained questions designed to gather information about the children's perspective on their own location in social space. They were asked to describe their own house and to place it in reference to the houses used in the study. They were asked about other places that they had lived in and about trips out of their neighborhood -- where, how often, and for what purposes they went into the city and out to the suburbs. They were asked to name the first ten jobs they could think of and then to name some jobs that people they knew had. They were asked to think of some "really great" jobs and then to explain why they were so great. And, they were asked about their own job expectations and aspirations -- what kind of work they thought they would probably do when they grew up, and what kind of job they would most like to have if they could do anything they wanted.

The set of job questions which asked the children to give their own job titles preceded the similarity and preference procedures which used a standard group of job titles. In pre-tests attempts were made to design sorting procedures using the job titles produced by the children, but the attempts were abandoned when it proved impossible to devise techniques for comparing the responses of different children.

Interviewing: Each child was interviewed individually during the school day. In an attempt to interfere minimally with the school schedule, the interview was conducted in two parts -- usually on successive days. The interview always began with the section on houses and usually that section was completed during the first session. The job section generally took longer to complete and, in some cases, a third session had to be scheduled in order to complete the entire interview. The total length of the interviews varied from one hour to two-and-a-half hours; the average interview lasted for an hour and a half. Most of the children seemed to find the interview sessions an intriguing break from the normal school routine. In most cases it was relatively easy to establish rapport and the children readily accepted the explanation that the interviews were being conducted because we were interested in finding out how children thought about houses and jobs and not because we wanted to test them in any way. In a few cases, children resisted this explanation, were obviously worried about the adequacy of their performance and remained tense and anxious throughout the interview. The interviewers more frequently sensed that they had not "reached" the children in the urban interviews; the suburban children rarely seemed threatened by the interview -- although in a few instances they seemed to be searching for "right" answers and some of the children responded impatiently and were obviously eager to return to an interesting classroom activity that had been interrupted by the interview session. The majority of the interviews were conducted by two interviewers -- a male MAT student at the Harvard Graduate School of Education and a female ex-MAT student. Both interviewers completed a series of training interviews before the main study began. They were assigned subjects randomly and interviewed approximately equal numbers of boys and girls. Toward the end of the school year (in a desperate attempt to complete the sample before school closed), two other interviewers -- the author and a female MAT student -- conducted small numbers of interviews in the outer-suburb.

Coding and Analysis of the Data: The interview schedule generated a great number and variety of responses. Some of these responses could be analyzed directly, others had to be coded qualitatively and still others had to be translated into quantitative indices. The over-all coding and data reduction schemes were devised by the author. The actual coding was done by a Master's student at the Harvard Graduate School of Education who was an experienced coder. She had not been involved in the study prior to undertaking the coding job and she coded

the interviews blind. That is, she was not aware of the sub-group membership of a child while she was coding his interview. The final coding scheme was based upon discussions between the author and the coder of ambiguities in the original scheme. The first five interviews were coded twice -- by the author and by the coder. Analysis of coding disagreements was aimed at eliminating ambiguous categories and arriving at a common understanding concerning the interpretation of responses. As a result of this initial reliability check, the coding scheme was revised and simplified. Then a second attempt to establish reliability was made. Using the revised scheme, another set of five interviews were coded twice. Coding differences were again discussed and some minor modifications were made in the coding scheme as a result of this analysis. At this point, the coder proceeded to code the remaining interviews.

It is difficult to provide an estimate of coding reliability. In some cases -- such as complex index scores -- there was 100% reliability for every score was double-checked in order to catch computational errors. In other cases, between-coder reliability was very low for consensus was never reached about the distinction between two codes within a category system. These situations were handled by collapsing the two codes into a single one which was then used in the analysis. Specific details and problems of the coding scheme will be discussed in conjunction with the presentation of results for the several measures.

When the coding was complete, the data were punched onto IBM cards and subjected to computer analysis using the DATA-TEXT program.

FINDINGS AND ANALYSIS

This section presents the major findings of the study and discusses possible explanations and interpretations of the pattern of results. It begins with an analysis of the responses to the house and job similarity sort procedures. The contents of the reasons the children gave for groupings are presented first. Then, the degree of complexity of their performance on the sorting tasks is analyzed. Differences within the sample in the content and complexity of sorting responses are related to age, residence, and intelligence differences. A developmental sequence of sorting behavior is proposed to account for the observed differences.

Responses to the house and job preference tasks are presented next. The most and least favored houses and jobs are discussed as are the reasons for liking and disliking. Differences in preference responses are related to age, residence and intelligence. In addition, correlates of the general disposition to like rather than dislike are analyzed as are sex differences in job preferences.

The analysis of the preference responses is followed by a discussion of the children's conceptions of the importance of jobs. Jobs perceived as most and least important are enumerated as are the reasons for attributing importance. Differences within the sample in sensitivity to adult conceptions of social status are explored by comparing the children's job importance rank orders to standard adult prestige rankings and by examining the accuracy of their house-job matches.

Finally, the section concludes with an analysis of the free association job responses, the probable and ideal job choices and the residential experiences of the subgroups in the sample.

House Free Sorts: What kinds of criteria did the children use to group the stimuli? In sorting the houses, the children most often used physical details of the houses (e.g., "slanty roofs," "rounded fronts") as a basis for similarity. They also frequently used size, surrounding details (e.g., "lots of trees," "garbage in front"), age, and location as criteria for sorting. Explicit social status categories such as house style (e.g., "fancy," "colonial"), house quality (e.g., "run-down," "comfortable") and neighborhood socio-economic status (e.g., "wealthy suburb," "slum") were used least often.

Table 2 presents information about the use of the various house sort criteria by the grade-residence groups in the main sample. In order to minimize the effects of differences in the total number of sorts upon the content analysis, presence or absence of a criterion was noted rather than frequency of use. Thus, the percents in each cell represent the proportion of the subgroup who gave the kind of similarity as a reason for sorting at least once. The total set of reasons given for all the free

and provided sorts comprised the data base for this analysis.

Table 2 clearly illustrates the pre-eminence of physical details as a basis for grouping houses. Almost all of the children used this criterion at least once. Further analysis of the frequency of use of details provides additional support for their primacy -- more than half the children gave similarity of details as a reason for three or more sorts. Granting the ubiquity of details, there is evidence that their importance begins to decline as children discover other bases for similarity. The urban fourth graders who used the smallest number of different bases for sorting relied most heavily on house details. In contrast, the suburban seventh graders who had available the largest number of different sorting criteria used details least often. Table 3 presents the number of different house sorting criteria used by the four grade-residence groups. There were significant differences between the numbers of dimensions used by older and younger children ($\chi^2 = 12.1$; $p < .002$) and by suburban and city children ($\chi^2 = 10.1$; $p < .007$).

The second most common criterion, size, was also used frequently by every group. Responses categorized as size almost always referred to groupings of houses or apartments. The children formed more apartment house groups than one-family house groups, but they also were more likely to form contrasting groups on this dimension than on other dimensional criteria (such as age or location). In other words, while one end of the dimension -- large numbers of families living together in one building -- stood out, the dimension, itself, was salient for many children.

The original coding of reasons involved two stages. First, reasons were coded into one of the general categories and then, within each category, sub-categories were coded. For the dimensional criteria, the sub-codes indicate whether all a child's responses within a category referred to a single position on the dimension (and if so, which position) or whether they involved more than one position. For example, locational reasons were subdivided into 1) city only, 2) suburb or country only, and 3) both city and suburb; surrounding details were subdivided into 1) negative only, 2) positive only, 3) neutral only, and 4) combinations of negative, positive and neutral. The results discussion includes a few findings based on sub-category analysis. These should however only be viewed as suggestive since sub-category coding reliability was low.

TABLE 2.
House Sort Criteria Used by Grade-Residence Groups

Grade-Residence Group	House Details	Size	Surrounding Details	Age	Location	House Style	House Quality	Building Type	Socio-Economic Status	
	City (20)	100% ^a	60	65	35	35	20	10	15	5
4th grade	Suburb (20)	90	65	25	60	15	40	35	40	25
	City (20)	90	60	75	35	60	25	25	50	30
7th grade	Suburb (20)	75	90	60	70	80	80	70	30	45
	(N)	(80)	(71)	(55)	(40)	(38)	(33)	(28)	(27)	(21)

^aThe total set of reasons given for all the free and provided sorts comprised the content of this analysis. The percents in each cell represent the proportion of the subgroup who used the kind of similarity as a criterion for sorting at least once.

TABLE 3

Number of Different House Sort Criteria
Used by Grade-Residence Groups

<u>Grade-Residence</u> <u>Group</u>		<u>Total Number of Criteria</u>			
		<u>0-3</u>	<u>4-5</u>	<u>6+</u>	<u>(N)</u>
4th Grade	City	50%	45	5	(20)
	Suburb	50	35	15	(20)
7th Grade	City	25	45	30	(20)
	Suburb	5	45	50	(20)
	(N)	<u>(26)</u>	<u>(34)</u>	<u>(20)</u>	<u>(80)</u>

Without further probing, it is impossible to know whether physical details and house size were intended to convey social meaning. While these categories were in almost every child's response repertoire, undoubtedly the children varied in extent of awareness of their social connotations. In contrast, other criteria which are more directly related to social distinctions -- house style, house quality and neighborhood socio-economic status -- were only used by a minority of the children. Both of the suburban groups were more sensitive to these social status dimensions than were either of the urban groups (House style: $X^2 = 10.1$; $p < .001$; House quality: $X^2 = 9.3$, $p < .002$). The most extreme contrast was between the older suburban sample where a majority of the children grouped on the basis of social status, and the younger urban sample where only two children used house quality and just one child referred to the socio-economic status of the neighborhood as a reason for putting houses together.

Assuming that differential awareness of social meanings accounts for some of the variations, what other explanations might there be for subgroup differences in the use of the several criteria? There is some evidence in support of the inference that novelty and familiarity are related to choice of sorting criteria. For example, urban children were more likely to use surrounding details as a basis for grouping ($X^2 = 5.1$, $p < .02$). They grouped houses because they had trees in front or lawns or included lots of space to play or were set back from the street. Presumably all of these are novel and positive characteristics for children raised in the inner city. (Negative surrounding details such as garbage were infrequently mentioned by all groups as a reason for similarity.) In contrast, the suburban fourth graders were particularly oblivious to the surround and we may infer that they take these positive features of their own environment so much for granted that it had not yet occurred to them that they were noteworthy. Urban-suburban location was also rarely used by the younger suburban group and we might speculate that this too reflects immersion in their own location and a resulting failure to differentiate this construct.

1 Parenthetically, it should be noted that location was even more strikingly absent in the responses of the inner-suburban seventh graders -- one of the supplementary samples. Only 10% of these children used residential location as a reason for groupings while the corresponding percents for the urban and outer-suburban seventh graders were 60% and 80%. Do the inner suburban children fail to group houses on the basis of location because they are confused about their own residential identity?

Suburban children were more attuned to the age of houses than were urban children and particularly to "old age" ($X^2 = 6.1$; $p < .01$). Perhaps, old houses stand out for suburban children because of their novelty while they are less often singled out by urban children who live in their midst.

A last bit of data on novelty and familiarity -- while seven urban children identified the housing "project" photo, only one suburban child did. On the other hand, many of the suburban children formed "non-house" groups -- that is, they put together photos and identified them as schools, factories, office buildings, etc. (The project and "non-house" groups were coded under the "building type" category.) Clearly, the suburban children have a more limited definition of what constitutes a place where people may live than do the urban children and this difference too presumably reflects their own experiences.

Finally, some of the differences in frequency of use of the criteria were a function of intelligence. High intelligence was related to frequent use of age ($r = .30$, $p < .01$), house quality ($r = .22$, $p < .05$) and neighborhood socio-economic status ($r = .22$, $p < .05$); low intelligence was associated with frequent use of house details ($r = .21$, $p < .05$).

House Triads: Analysis of the reasons given in the house triad task substantiates in the main the free sort findings although there are some interesting differences. In the triad task, the children were presented with three house photographs and asked to select the two which were more alike and to explain how they were alike. The content of the triad reasons were classified into the same categories as the free sort criteria. Table 4 contains the percent of house triad reasons in each category for the grade-residence groups. House details again emerge as a frequent basis for similarity in all groups (except the older suburban sample) but when the total sample of responses is considered, size assumes the status of the most frequent reason. The house-apartment dimension seems to be particularly salient when children are asked to differentiate among a small set of photos. The suburban children were extremely sensitive to the number of families living in a dwelling. Both the fourth and seventh grade suburbanites gave this reason for triad choices more than twice as often as did the corresponding

TABLE 4

House Triad Reasons of Grade-Residence Groups

Grade-Residence Group (N) ^a	House Details	Size	Surrounding Details	Age	Location	House Style	House Quality	Socio-Economic Status	Building Type	
4th Grade	City (118)	35.6 ^b	18.9	22.9	6.8	12.7	---	.8	1.7	.8
	Suburb(119)	24.4	40.3	5.9	6.7	11.8	2.5	.8	1.7	.8
7th Grade	City (118)	30.5	16.1	11.9	8.5	16.9	5.1	5.9	4.2	5.9
	Suburb(118)	5.0	37.3	7.5	4.2	13.6	6.7	9.3	11.0	5.1
	(N)	(113)	(133)	(57)	(31)	(65)	(17)	(20)	(22)	(15)

^a(N) equals the sum of all the triad reasons given by a subgroup. The numbers are less than 120 because not every child gave a reason for every triad.

^bThe percents represent the proportion of the total set of triad reasons given by a subgroup (6 triads x 20 subjects) which were classified in that category.

groups of urban children.¹ As in the free sorts, surrounding details were more salient to urban children than to suburban children and the social status dimensions occurred infrequently in all groups except the older suburban sample.

Examination of the pattern of responses to specific triads revealed a relationship between triad composition and the relative frequency of use of the dimensions. Size was the modal reason for all triads which included a high rise apartment building. Other criteria became more salient when this dominant descriptive cue was not present. For example, house quality and neighborhood socio-economic status, while still infrequent, were used most often as reasons in response to the triads containing Houses B, G, and I and K, R, and S (See Fig. 1). B, G, and I are all middle class single family houses. The differences among these houses in social status are probably smaller than among any other triad. Yet, the children used social status as a reason for making choices within this triad but failed to use status as a reason for triads where there were gross status differences. Clearly, children who can make fine distinctions along the social status dimension must be capable of making gross distinctions. Thus, the infrequency of use of social status criteria does not necessarily reflect a lack of awareness of social meanings. Probably, most of the older children "knew" that the houses could be differentiated on the basis of status but preferred to use other criteria when the differences were gross. These data seem to indicate that while children are learning how to discriminate on the basis of social status, at the very same time they may also be learning that it is not appropriate to talk about social distinctions under certain circumstances.

¹The group for whom size was most salient was the inner-suburban seventh graders. They gave this reason for half of their triad choices. As in the free sorts, the inner-suburban children rarely referred to location -- in fact, urban-suburban location was used only once by the inner-suburban sample as a reason for a triad choice. Assuming that relative frequency of use of the reasons reflects in some way the children's own situation, we may infer that the salient positive feature of inner-suburban living is the attainment of a "house of one's own" (or at least, half-a-house). On the other hand, children who live in an inner-suburb may be uncertain as to whether they have really attained suburban status and thus "avoid" thinking about this dimension.

Job Free Sorts: In sorting the jobs, the children grouped most frequently on the basis of function. A majority of the functional groupings referred to similarity of function (e.g., "both fix things," "both teach") but other of the functional groupings were thematic -- relational -- that is, they were based upon an idiosyncratic relationship between job functions rather than upon a general functional attribute that was common to the several jobs. Many of the thematic groupings were explained in terms of interdependent functions. For example, one child gave as a reason why factory worker, truck driver and shoe store owner went together: "The factory worker makes shoes; the truck driver brings them from the factory to the shoe store; and the shoe store owner sells them." Other thematic groupings were based upon analagous functions (e.g., "A doctor and a janitor are alike because the doctor takes people apart and has to remember where all the parts came from so that he can put them back in the right place and a janitor takes apart things like sinks and has to be able to put them back together.") and authority relations (e.g., "Bank manager and secretary go together because the bank manager tells the secretary what to do.").

Other frequently used criteria for grouping jobs were surface features such as time, place, or dress of work (e.g., "work nights," "wear uniforms") and the authority or responsibility associated with the jobs (e.g., "both tell others what to do," "both work for someone else"). References to legal or governmental responsibilities and ownership were coded in the authority category. The children also often used non-specific quality criteria for sorting (e.g., "good jobs," "dirty jobs") and sometimes they grouped on the basis of attributes of the people holding the jobs (e.g., "brainy," "strong"). As with the houses, specific social status categories such as the pre-requisites necessary for attaining the job or the amount of money or prestige associated with the jobs were rarely given as bases for sorting.

Table 5 describes use of the job sort criteria by the grade-residence groups. As in the house free sort analysis, presence of a criterion was recorded. Thus, the percents represent the proportion of the group who gave the kind of similarity as a reason at least once during the total set of free and provided sorts. The largest difference among the groups was in the frequency of use of functional thematic reasons. The younger children were more apt to give these kinds of reasons than were the older children ($r = .28, p < .01$). Other

TABLE 5
Job Sort Criteria Used by Grade Residence Groups

Grade Residence Group (N)	Thematic		Similarities			Person Quality	Pre-requisites	Result: (salary prestige)
	Functional	Other	Surface Features	Auth- ority	Job Quality			
4th Grade								
City (20)	80% ^a	50	75	55	30	10	5	--
Suburb (20)	70	35	50	80	55	10	15	10
7th Grade								
City (20)	50	35	70	75	55	25	15	5
Suburb (20)	30	35	80	60	45	45	20	30
(N)	(56)	(31)	(55)	(54)	(37)	(18)	(11)	(9)

^aThe total set of reasons given for all the free and provided sorts comprised the content for this analysis. The percents in each cell represent the proportion of the subgroup who used the kind of similarity as a criterion for sorting at least once.

differences among the groups in criteria use were minimal. Every group relied heavily on similarity of function, visible working conditions of the jobs and the authority or responsibility associated with the jobs as bases for grouping. While many of the children were sensitive to one social status related dimension -- the power and authority conferred by the jobs -- only a few children were attuned to other status related dimensions such as the amount of education or training prerequisite to the job or the salary and prestige associated with the jobs. While these categories were infrequently mentioned by all groups, they did occur most often in the responses of the suburban seventh graders, the group which was most sensitive to social status dimensions in the house sorts.

Many of the reasons given in the job free sorts were very difficult to categorize. The vague criteria, "job quality" and "person quality" were created in an attempt to classify reasons which seemed to imply some kind of evaluation but which were not very explicit. Since these categories were vague, coding reliability was low. They have been maintained in the discussion only because they seem to illustrate an intermediary point in children's acquisition of the social meanings of jobs. Children made groups for which they gave reasons like "dirty jobs," jobs that required "lots of hard work," jobs where you have to "worry a lot" and jobs which involved "solving hard problems." Undoubtedly, many of the children already knew something about the relative social acceptability of "dirty jobs" and those where one has to "solve hard problems"; these kinds of groupings may be the precursors of more explicit social status categories.

Job Triads: Table 6 presents the distribution of job triad reasons for the grade-residence groups. The triads were designed with the aim of testing the strength of competing constructs. For example, the triad consisting of shoe store owner, factory worker and grocery clerk was formed in order to pit a surface similarity in place of work (shoe store owner and grocery clerk both work in stores) against a status-related responsibility dimension (factory worker and grocery clerk are both workers rather than owners). Unfortunately, the job triad task proved to be more difficult than had been anticipated and most of the children relied heavily on functions. Thus, the intended contrasts did not emerge. Not surprisingly, the fourth-graders were more stymied by the job triads than were the seventh graders. Approximately one-third of the fourth grade responses were thematic. Observing their mode of responding, one often felt that they really

TABLE 6
Job Triad Reasons of Grade-Residence Groups

Grade-Residence Group	Thematic Functional	Similarities			Person Quality	Pre-requisites	Results (salary, prestige)			
		Functional	Surface features	Authority						
4th Grade	City (114)	36.0 ^b	4.4	14.9	9.6	16.7	7.0	4.4	.9	.9
	Suburb(116)	26.7	2.6	31.0	10.3	12.1	12.1	1.7	.9	--
7th Grade	City (114)	18.4	4.4	32.5	9.6	20.2	7.0	2.6	3.5	1.8
	Suburb(116)	4.3	2.6	22.4	18.1	17.2	2.6	13.8	3.4	14.7
	(N)	(98)	(16)	(116)	(55)	(76)	(33)	(26)	(10)	(20)

^a(N) equals the sum of all the triad reasons given by a subgroup. The numbers are less than 120 because not every child gave a reason for every triad.

^bThe percents represent the proportion of the total set of triad reasons given by a subgroup (6 triads x 20 subjects) which were classified in that category.



didn't think any of the three were alike but that they came up with a choice and a creative way of linking the pair because the interviewer clearly expected a response. In contrast, the suburban seventh-graders seemed comfortable with the task. They rarely resorted to thematic reasons and they used a wide range of kinds of similarities.

Complexity of Sorts: In addition to analyzing the content of the reasons for the sorts, an attempt was made to describe the level of complexity of behavior on the sorting tasks. Four quantitative indices were devised to characterize the way in which the free sorting task was approached -- the total number of sorts, the largest number of items in a single sort, the proportion of the total number of sorts that contained more than two items and the nature of the sorts. These measures were obtained for both the house and job free sorts. Essentially, the indices distinguish between those who treated each sort as a separate entity and those who made connections between sorts. More than half the subjects tackled the sorting task with a discrete ("pair-picking") strategy -- that is, they made each sort independently of every other sort. They proceeded by finding two (in rare instances -- three or four) items that were alike, removing them from the array, giving an explanation of why they were alike and then replacing them in the array. Then, they began again -- picking another pair, identifying the criterion, etc. The remaining subjects tried to make connections between their sorts. Only a small minority succeeded in completing a total sort -- that is, in using one superordinate category as a basis for sorting the entire array of items. The rest of the subjects made some contrasts between sorts but did not succeed in assigning every instance to a group.

Tables 7 and 8 compare the complexity of performance of the grade-residence groups in the main sample on the house and job free sorting tasks. Three major points emerge from inspection of Table 7. First barring one exception, the only strategy used by the majority of children in each of the groups was "pair-picking." The sole exception to this generalization was the suburban seventh grade sample -- almost all of whom managed to make some contrasts between groupings in the house sorting task. Second, most children gave more complex responses in the house free sort than in the job free sort. Third, suburban children gave more complex responses than urban children (suburban vs. urban -- house sorts: $X^2 = 7.5$, $p < .005$; job sorts: $X^2 = 7.5$, $p < .02$). Table 8 confirms the patterns found in the analysis above. Only a small minority of children included more than two instances in a majority of their

TABLE 7

Nature of Free Sorts of Grade-Residence Groups

House Free Sorts

Grade-Residence Group		Pairs Only	Partial Contrasts	One or More Total Sorts	(N)
4th Grade	City	70%	30	--	(20)
	Suburb	50	20	30	(20)
7th Grade	City	80	15	5	(20)
	Suburb	10	65	25	(20)
(N)		(42)	(26)	(12)	(80)

Job Free Sorts

Grade-Residence Group		Pairs Only	Partial Contrasts	One or More Total Sorts	(N)
4th Grade	City	74%	26	--	(19)
	Suburb	80	15	5	(20)
7th Grade	City	70	30	--	(20)
	Suburb	60	15	25	(20)
(N)		(56)	(17)	(6)	(79)

TABLE 8

Proportion of Sorts Containing More Than
Two Items by Grade-Residence Groups

Proportion of 2+ House Free Sorts

Grade Group	Residence	None	Less than Half	More than Half	(N)
4th Grade	City	75%	32	--	(20)
	Suburb	40	25	35	(20)
7th Grade	City	70	20	10	(20)
	Suburb	5	45	50	(20)
	(N)	(38)	(23)	(19)	(80)

Proportion of 2+ Job Free Sorts

Grade Group	Residence	None	Less than Half	More than Half	(N)
4th Grade	City	68%	32	--	(19)
	Suburb	45	55	--	(20)
7th Grade	City	75	20	5	(20)
	Suburb	30	40	30	(20)
	(N)	(43)	(29)	(7)	(79)

sorts; house sorts contained more items on the average than job sorts; and, suburban children included more items in their sorts than did urban children. (Suburban vs. urban -- House sorts: $r = .50$, $p < .01$; Job sorts: $r = .34$, $p < .01$). The relationship between urban-suburban status and sort complexity was mediated by differences in intelligence. IQ was highly correlated with urban-suburban status ($r = .53$, $p < .01$) and the more intelligent the child, the more likely he was to have completed a total house sort ($r = .39$, $p < .01$) and a total job sort ($r = .29$, $p < .01$).

There were significant relationships between response complexity across the two content domains. Children who gave more complex responses to the house sorts also tended to give more complex responses to the job sorts. (The correlation between the nature of house sorts and the nature of job sorts was $.33$, $p < .01$; the correlation between the proportion of house sorts with more than two items and the proportion of job sorts with more than two items was $.44$, $p < .01$). The complexity indicators were also related to use of the content categories. Children who used many different content dimensions in the house free sort were more likely to complete total house sorts ($r = .38$, $p < .01$). Those who rarely sorted more than two items at a time used house details more frequently ($r = .36$, $p < .01$) while completion of a total sort was related to house quality ($r = .37$, $p < .01$) and neighborhood socio-economic status ($r = .29$, $p < .01$). Interestingly, use of neighborhood socio-economic status was also significantly related to completion of a total job sort ($r = .27$, $p < .01$).

Thus, we see that there are clusters among the measures derived from the sorting task responses. The response patterns suggest the tentative sketch of a developmental sequence outlined in Figure 2.¹ The stages in the scheme are intended to represent points along a developmental continuum -- not discrete stages. Most of the children in the sample exhibited a mixture of Stage 1 and 2 behavior -- sometimes focussing on pairs of items and selecting details and functions as bases for sorting, at other times encompassing a larger portion of the array and using vague, general evaluative categories or

¹The projected sequence closely resembles those derived in earlier developmental studies of equivalence grouping in non-social domains (Olver & Hornsby, 1966 and Kagan, Moss and Sigel, 1963).

FIGURE 2
 Projected Developmental Sequence of House and Job Free Sort Behavior

Stage	Treatment of Array	Modal Grouping Strategies	Content
1	Discrete pairs; no contrasts between sorts	Relational, part descriptive	Thematic job functions, house details, working conditions
2	Focus on portion of array; partial contrasts between sorts	Wholistic -- descriptive and inferential	Residential location, size, person quality, job quality
3	Total array is sorted on basis of superordinate	Analytic -- descriptive and inferential superordinates	House quality, neighborhood SES, job results

wholistic descriptions as reasons for grouping. Some children seemed to be approaching Stage 3 -- they used a superordinate attribute at least once to sort all the instances in the house array and they gave status-related content explanations of their sorts. Only a very small minority of the children seemed capable of Stage 3 behavior in both the house and job tasks.

House Preferences: What kinds of houses would the children most like to live in and why would they like to live there? What kinds of houses would they like least and what were their reasons for disliking them? The children sorted the houses into four "liking" groups labeled "Like Very Much," "Like," "Dislike," and "Dislike Very Much." They also rank ordered the choices within each group and gave reasons why they liked their first and second choices and disliked their nineteenth and twentieth choices.

Table 9 contains the house liking rank orders of the grade-residence groups. Four of the five most liked houses were single family suburban houses (B, C, H, and K). The fifth (F) was a low-rise apartment house of contemporary design which happened to be located in an inner-suburb but which might have been found in any of a range of residential settings. In general, the children's rank orders were fairly closely related to the design experts' status level rankings. The only major difference was in the rating of high quality urban housing. The children liked medium quality suburban single family houses better than high quality urban multi-family housing. The luxury apartment building (A) was the only urban high rise in the top-half of the preference rank orders. The Beacon Hill town house (D) and the well-maintained middle class apartment building (E) were in the bottom half of the rank orders. Interestingly, the children's favorite house (H) was identified by many adults as the one most closely resembling the standard suburban tract home depicted in the typical television family drama. It would seem that the media have been successful in selling the developer's vision of the "American dream house." The children disliked all the houses placed by the design experts in low status levels 4 and 5. There were no significant differences in the rank orders given by urban and suburban or older and younger children.

Three kinds of reasons were frequently given for liking and for disliking houses -- house details and style,¹

¹ Both wholistic (style) and part (details) descriptive reasons were coded in the same category in the content analysis of the reasons for liking and disliking houses.

TABLE 9
House Preference Ranks of Grade-Residence Groups

<u>Preference Rank</u>		<u>Grade-Residence Group</u>			
House	(Status Level)	4th Grade		7th Grade	
		City	Suburb	City	Suburb
A	(1)	7.5	7	3	8
B	(1)	7.5	5	1	1
C	(1)	6	1	7	2
D	(1)	11.5	12	14	11

E	(2)	10	11	10	13
F	(2)	3	3	4.5	6
G	(2)	2	6	8	3
H	(2)	4	2	2	4

I	(3)	5	9	4.5	7
J	(3)	9	10	9	10
K	(3)	1	4	6	5
L	(3)	11.5	8	11	9

M	(4)	13	15	13	14
N	(4)	14	13	12	12
O	(4)	16	16	16	16
P	(4)	18	18	17	17

Q	(5)	15	14	15	.5
R	(5)	17	20	18	18
S	(5)	19.5	17	19	19.5
T	(5)	19.5	19	20	19.5

(N)		(20)	(20)	(20)	(20)

house quality, and surrounding details. Detailing or style was most often mentioned as a reason for liking a house; quality was most often cited as a reason for disliking. This reversal in the order of frequency of use of descriptive vs. evaluative criteria seems to point up the differential role of evaluation at the positive and negative ends of the continuum. When asked to discriminate among a set of items representing a wide range of quality, children seem to make the first cut on the basis of quality. Then, within the high quality groups, they discriminate preferences further on the basis of descriptive stylistic features. But for negative instances, poor quality stands out as sufficient reason for dislike. Physical details (e.g. "doorways without doors") are given as substantiation of the low quality rather than as a basis for finer preference distinctions.

The vast majority of liking and disliking reasons focussed on the houses themselves and their immediate surrounds. Only a small minority of the children mentioned features of the neighborhood in explanation of their preferences. Older children were more likely to make these kinds of references than were younger children. Thirty percent of the older children but only 10% of the younger children cited residential location as a reason for liking a house. (In every instance, the children liked the suburban location of the house.) High neighborhood quality (socio-economic status) was mentioned as a reason for liking by seven older children (18%) but not by any of the younger children. Ten older children (25%) and three younger ones (8%) referred to the poor quality of the neighborhood in the explanation of why they disliked a house.

Comparing the reasons for similarity groupings of the houses and the reasons for preferences, the most striking difference is in the frequency of use of the house quality category. The earlier suspicion that many more children were capable of making social evaluations of the houses than did so in the sorting tasks is strongly supported by the frequency with which social quality indicators were used to explain preferences.

Job Preferences: The procedures for determining job preferences paralleled the house liking procedures. The children sorted the jobs into four "liking" groups according to how much they would like having the jobs and then rank ordered the choices within each group. They also explained why they would like to have the jobs ranked 1 and 2 and why they would dislike having the jobs ranked 19 and 20.

Table 10 contains the job liking rank orders of the grade-residence groups. The best liked job was that of teacher. (This finding raises suspicions about the role of acquiescence! Unfortunately, there is no way of determining to what extent the high ranking of teacher represents compliance within the school setting in which the interviews took place as opposed to a valid indication of the children's actual preferences.) Doctor was also ranked in the top quarter by all four groups in the main sample. Four additional jobs -- scientist, bank manager, musician and policeman -- were in the top half of the rank orders of all four sub-samples. At the other end of the continuum, the least liked jobs were janitor, street cleaner, factory worker and garage mechanic. (All were ranked in the bottom quarter by all groups.) Other generally disliked jobs were night watchman and truck driver (in the bottom half of all rank orders.)

There were no significant differences in preference rankings between the urban and suburban samples, but there were some differences between the fourth and seventh grade samples. The younger children ranked night watchman significantly lower than the older children. Probably, these differences are attributable in part to differences in familiarity with the jobs and, in part, to varying degrees of concern about protection and safety. The younger children under-used "lawyer," "bank-manager" and "newspaper reporter" throughout the similarity sorting tasks -- perhaps an indication that the jobs were not as salient for them. When they did refer to these jobs, they tended to place them in a criminal context -- e.g., "lawyers help people in trouble with the law"; "bank managers may be robbed"; and "newspaper reporters write about crimes." Probably, these kinds of associations carried with them a certain amount of anxiety. Consistent with this interpretation of the younger children's greater concern with protection is their more favorable view of the night watchman who keeps people from breaking into your house.

The most striking differences in job preferences were between boys and girls. The boys gave significantly higher liking rankings to army captain, electrician, garage mechanic, truck driver and night watchman while the girls ranked secretary, teacher, musician and shoe store owner significantly higher. These findings provide yet another demonstration of the early learning and ubiquitous presence of sex role stereotyping in occupational choices.

It was very difficult to classify many of the children's reasons for liking jobs -- mainly because they were so general and vague. It was difficult to separate

TABLE 10
Job Preference Ranks of Grade-Residence Groups

Preference Rank	Job (Status/Rank)	Grade-Residence Group			
		4th Grade		7th Grade	
		City	Suburb	City	Suburb
	Doctor (1)	3	3.5	2	4
	Mayor (2)	1	10.5	8	5
	Scientist (3)	4.5	2	3	9
	Lawyer (4)	12	13.5	4	1
	Bank Manager (5)	7	7	6	3
	Army Captain (6)	7	12	15	11
	Teacher (7)	4.5	1	1	2
	Musician (8)	9	3.5	10	10
	Newspaper Reporter (9)	13	6	5	6
	Shoe Store Owner (10)	10	9	12	7.5
	Electrician (11)	7	10.5	13	14
	Policeman (12)	2	8	7	7.5
	Secretary (13)	14	5	10	13
	Garage Mechanic (14)	15	17	17	17
	Factory Worker (15)	16	16	16	15
	Grocery Store Clerk (16)	17	15	10	12
	Truck Driver (17)	18	19	14	18
	Night Watchman (18)	11	13.5	18	16
	Janitor (19)	19	18	19	19
	Street Cleaner (20)	20	20	20	20
	(N)	(20)	(20)	(20)	(20)

out responses which reflected intrinsic liking for a job from those which really meant that the child had never thought about the question. For example, if a child said, "I want to be a teacher because I like to teach," he might have meant just that but, on the other hand, he might have been giving an obvious answer to a question he had not considered before. In these instances, the interviewers tried to probe for more detail but in most cases they were not successful in eliciting a more specific reason. Thus, the majority of reasons were coded into a "general liking" category. (Attempts to reliably distinguish between vague statements such as "I just like it" and references to specific job functions such as "I like scientists because I like to do experiments" were not successful and, in the final analysis, these categories were combined. Also included in this category were their own aspirations -- e.g., "I like doctors because that's what I want to be.") In addition to the omnibus liking category, there were four minor categories of reasons -- authority, excitement, service, and pay -- which were used by small numbers of children (i.e., 15% or more of the sample). Twenty percent of the children would like to have jobs which they perceived as allowing them to be the boss and to tell others what to do. A few additional children cited the opposite end of the authority dimension -- that is, they would like to have a job because it did not require the exercise of authority. Children also liked jobs which were exciting and interesting and gave them a chance "to find out what's going on." Helping others (service to the community) and helping oneself (by being well-paid) were other reasons for liking jobs.

The urban children, both younger and older, gave more different kinds of reasons for liking jobs than did the suburban children. This difference in response complexity is noteworthy for it is in the opposite direction from other complexity differences (e.g., the free sort -- where suburban children used more dimensions and gave more complete sorts than did urban children). Perhaps, the suburban children's failure to use many reasons other than general liking can be explained by the fact that they have potential access to a wider range of jobs and thus experience less press to differentiate selection criteria beyond their own personal preferences.

In explaining why they would not want a job, the children also relied heavily on general statements of dislike and dislike for specific functions involved in the job, but they also mentioned a larger number of other kinds of reasons. After the omnibus "dislike" category, the most frequently mentioned reasons for disliking jobs

were "dirt" and "danger." Approximately one-quarter of the children gave each of these reasons. All kinds of "dirty work" were disliked. Janitor, street cleaner, factory worker, and garage mechanic were all classed together as dirty jobs and were almost universally rejected. The children did not seem to consider skill differentiations among the blue-collar jobs as important as working conditions. Danger was especially salient to the younger urban sample -- who did not want jobs which they perceived as dangerous. This finding further supports the interpretation of the differences in preference ranks being a function of the younger children's greater worries about personal safety. Other reasons for disliking jobs mentioned by small numbers of children were that they were dull, low paying, and not appropriate for someone of the child's sex.

The tendency to like rather than dislike: Were there differences among the children in the relative proportions of liked and disliked houses and jobs? Since the children began the preference procedures by placing as many of the items into each of the four piles as they wished, it was possible to look at the general disposition to like items. Total liking scores were devised by assigning weights of 4, 3, 2, and 1 to the four liking groups and then obtaining a weighted sum of the number in each pile.¹ The higher the score, the greater the child's tendency to like items.

Looking first at the total house liking scores, we find that the urban children had much higher scores than the suburban children ($X^2 = 11.2, p < .001$). The major contributor to this difference was the Dislike Very Much category. Suburban children strongly disliked many more houses than did urban children. The urban-suburban differences were significant for both the fourth and seventh grade. Total house liking scores were also correlated with intelligence. The more intelligent children had lower total house liking scores than the less intelligent children ($r = .23, p < .05$). Since, as was noted previously, the suburban sample was more intelligent than the urban sample, the findings are confounded. Although there are not sufficient data to separate out the effects of these variables, one can

¹ For example, let's assume a child placed 8 houses in the Like Very Much pile, 2 in the Like pile, 5 in the Dislike pile and 5 in the Dislike Very Much pile: his Total House Liking Score would be $(4 \times 8) + (3 \times 2) + (2 \times 5) + (1 \times 5) = 53$.

speculate about alternative interpretations. Two different kinds of explanations can be advanced to explain these findings -- the first stresses cognitive factors; the second emphasizes social determinants.

A high liking score may reflect a child's inability to differentiate among items. Discriminatory ability, a cognitive skill, may underlie the intelligence and the urban-suburban differences. On the other hand, a high liking score may represent a child's attempt to cope with his own low social status. If the house that he lives in is near the bottom of the status continuum, then one way to decrease his distance from the top is to make the positive groups very large. Suburban children, according to the status-maximization interpretation, would tend to make the liked group as small as possible -- thereby preserving the exclusive nature of their own position. On the other hand, children may not be actively concerned with maximizing their own status; they may simply prefer houses which are socially equal to or better than their own. The higher urban house liking scores then would reflect the social reality that many more of the houses in the array were in fact superior to the urban sample's residences than to the suburban sample's. Probably both cognitive and social factors were operating and interacting in determining the distribution of preferences.

Children who liked many houses also tended to like many jobs. Total house liking scores and total job liking scores were significantly correlated ($r = .33, p < .01$). Total job liking was not, however, related to any of the background variables -- age, IQ, sex or residential location.

Job Importance: What kinds of jobs did the children consider important and what were their reasons for perceiving them to be important? The procedure for investigating conceptions of the importance of jobs was identical to the house and job preference method. The children first placed the jobs into one of four "importance" groups. The groups were labelled "Very Important," "Pretty Important," "A Little Important," and "Not Important." Then, they ranked the jobs within each pile and gave reasons for their first, second, nineteenth and twentieth choices.

Table 11 presents the job importance rank orders of the grade-residence groups. Doctor was ranked as the most important job by all four groups. Policeman was ranked second by three of the four groups. Mayor and

TABLE 11

Job Importance Ranks of Grade-Residence Groups

Importance Rank	Job (Status/Rank)	Grade-Residence Group			
		4th Grade		7th Grade	
		City	Suburb	City	Suburb
	Doctor (1)	1	1	1	1
	Mayor (2)	3	4	3	2
	Scientist (3)	5	3	5	5
	Lawyer (4)	4	7	6	4
	Bank Manager (5)	6	8.5	9	8
	Army Captain (6)	10	8.5	7	7
	Teacher (7)	9	5	4	6
	Musician (8)	19.5	19	19	19
	Newspaper				
	Reporter (9)	11	10	10	11
	Shoe Store Owner (10)	15	16	13	16
	Electrician (11)	7.5	6	8	9
	Policeman (12)	2	2	2	3
	Secretary (13)	12	15	12	10
	Garage Mechanic (14)	13.5	12	14	15
	Factory Worker (15)	19.5	13	16	13
	Grocery Store				
	Clerk (16)	13.5	14	15	14
	Truck Driver (17)	18	20	17	18
	Night Watchman (18)	7.5	11	11	12
	Janitor (19)	17	18	20	17
	Street Cleaner (20)	16	17	18	20
	(N)	(20)	(20)	(20)	(20)

scientist were also in the top quarter of all four rank orders. At the other end of the scale, the jobs perceived as least important were musician, truck driver, janitor and street cleaner. These four jobs were in the bottom quarter of all the sub-group rank orders. Thus, there was high consensus among the children in ranking the comparative importance of jobs. There were no significant differences among the subgroups.

The children were better able to provide specific explanations for their importance rankings of jobs than they had been for their preference ranks and similarity sorts. They used three principal criteria in their explanations of why jobs were very important -- utility of function, service to others and authority. Each of these kinds of reasons was mentioned by approximately half of the sample. There were no subgroup differences in the relative frequency of use of the criteria. The useful functions and service categories are closely related. Reasons were coded as "useful functions" if they referred to the utility of a specific function performed by the job occupant -- e.g., "An electrician is important because he fixes live wires." The "service to others" category was coded if the reason referred to the effects of the job on others -- e.g., "A doctor is important because he makes sick people better." Both categories involve a definition of the importance of jobs in terms of the services they provide to the community. The predominance of service criteria confirms Gunn's (1964) finding that service to the community was the central criterion used by fourth through seventh graders in ranking the "standing of jobs in the community."¹

¹Gunn investigated the criteria for ranking jobs used by 1st through 12th graders. She found that 1st and 2nd graders ranked jobs high if they thought they were dangerous or if they had personal implications for the child. Third graders were beginning to rank jobs in terms of their importance to the community, and, by the 4th grade, service was firmly entrenched as the prime criterion. Community service remained predominant through the seventh grade. Eighth and ninth graders were beginning to use multiple criteria -- service, money, attributes of the job, psychological rewards, education and power. The responses of 10th, 11th, and 12th graders were indistinguishable from adult occupational prestige criteria.

The children thought that most jobs had some degree of importance. For the main sample, the mean number of jobs placed in the fourth "Not Important" group was only 2.5. Unimportant seemed almost synonymous with unnecessary. Sixty percent of the children gave as their explanation of why a job was not important the fact that the job was not essential, that "we could get along without it." Musician was by far the job most frequently labelled unnecessary. The children also used variants on the necessity theme -- some explained that a job was not important because it was "not really work." Others thought that jobs were unimportant if they could readily be replaced by substitutes. For example, truck drivers and shoe store owners were seen as relatively unimportant because "if you didn't have a truck, you could move the things by car" or "you could get shoes somewhere else." Along the same lines, many children thought that janitors and street cleaners were not important because if they did not exist, people could clean up by themselves. An electrician in contrast was seen as relatively important because he can do things that others can't -- "If you have trouble with your wires, he can fix it." It is interesting that the children hardly ever referred explicitly to the level of skill, training or education involved in a job, but their use of a non-essential criterion for unimportance resulted in their in practice equating unimportant with unskilled. There was one major exception -- musicians clearly have unique talents; yet, they were not seen as necessary. They seem to have been viewed as an expendable luxury, not really a functional part of the social fabric.

Social Status Sensitivity: Two discrepancy measures were devised to permit further exploration of differences within the sample in sensitivity to adult conceptions of social status. The first measure, the Job Status Discrepancy Score, was derived from the children's job importance rank orders and provides an indication of the extent to which a child's job importance ranks deviate from standard adult prestige rankings.

To compute the job status discrepancy scores, the twenty jobs were divided into five prestige levels on the basis of the North-Hatt Occupational Prestige rankings (Table 1). The jobs were assigned to levels as follows: Level 1) doctor, mayor, scientist and lawyer; Level 2) bank manager, army captain, teacher, musician; Level 3) newspaper reporter, shoe store owner, electrician, policeman; Level 4) secretary, garage mechanic, factory worker, grocery store clerk; and Level 5) truck driver, night watchman, janitor and street cleaner. Each child's actual rank order was also divided into fifths. Then, the deviations between the standard levels assigned to each job and the child's levels were summed. The discrepancy score equals the absolute sum of the deviations. (The directions of the differences were ignored.)

The second measure, the House-Job Discrepancy Score, was derived from the final procedure of the interview, the House-Job Matching Game. In this task, each child was presented with a sub-set of ten houses and ten jobs. He was asked to match each job with a house by imagining a person who might have that job and the house that he might live in. The house-job discrepancy score measures the extent to which a child's house-job pairings deviate from equivalent status level matches.¹ The higher the score, the larger the difference between the child's matches and equivalent status level matches. Thus, as in the job status measure, a low score indicates high sensitivity.

In considering the validity of the two status sensitivity indicators, the first point to note is that the discrepancy measures were related to each other. There was a significant correlation between scores on the job status discrepancy measure and scores on the house-job discrepancy measure ($r = .26, p < .01$). A second point in support of the validity of the measures is that they were related to some of the sorting task responses which seemed to imply social knowledge. For example, children with low house-job discrepancy scores more frequently mentioned house quality as a criterion for similarity ($r = -.21, p < .05$) used more dimensions in the house similarity sorts ($r = -.26, p < .01$), and were more likely to complete a total sort ($r = -.23, p < .05$) than did children with high house-job discrepancy scores. Similarly, children with low job-status discrepancy scores used larger numbers of dimensions in the house sorting task ($r = -.21, p < .05$) and were more likely to complete a total house sort ($r = -.26, p < .01$) than were children with high job status discrepancy scores.

¹To derive the house-job discrepancy scores, the twenty houses were divided into five status levels on the basis of expert ratings by staff of the Harvard Graduate School of Design. The houses were assigned to levels as follows: Level 1) Houses A, B, C, D; Level 2) Houses E, F, G, H; Level 3) Houses I, J, K, L; Level 4) Houses M, N, O, P; and, Level 5) Houses Q, R, S, T. The jobs were divided into the same five prestige levels used in the job status discrepancy measure. Then, to compute the discrepancy between matches based on status and the actual house-job matches, the deviations between the status levels of each matched house and job were summed. The discrepancy score equals the absolute sum of the deviations.

Which children were more sensitive to adult conceptions of social status? Age was the background variable most closely related to status sensitivity. The seventh graders had significantly lower house-job discrepancy scores than the fourth graders ($X^2 = 8.67$, $p = .01$); the seventh grade job status discrepancy scores were also lower than the fourth graders, but this difference was not significant. The other key background variables, urban-suburban residence, intelligence and sex, were not related to status sensitivity as measured by the discrepancy scores.

Free Association Jobs: The job section of the interview began with a free association task. Before the children were introduced to the set of job titles used throughout the study, they were asked to name the first ten jobs that came to mind. This procedure was included in order to "tune in" the children to the job domain. But I was also interested in differences among the children in the ease with which they could produce job names and in the kinds of jobs they mentioned. I thought that the kinds of jobs mentioned spontaneously might provide another indication of the children's sensitivity to social status.

The children were given as much time as they wished to come up with the ten titles. There were large individual differences in the style of responding. Some children rattled off ten titles and clearly could have come up with many more; others thought of three or four relatively easily and then struggled to think of others. A majority of the children (65% of the 80 in the main sample) managed to think of ten job names; only 12% of the sample produced five or less. There were no significant differences among the sub-groups in the number of jobs mentioned.

The scheme which was devised to classify the kinds of jobs first differentiated between everyday jobs and glamorous or fantasy jobs. Everyday jobs were further categorized as: professional, semi-professional, white collar or working class. Glamorous jobs were broken down into athletes, entertainers and adventurers (e.g., astronauts, F.B.I. agents, forest rangers). Summary indices were devised to reflect the distribution of the ten jobs among the categories.

Salience of professional jobs was significantly related to a number of the status sensitivity measures. Children who mentioned many professional jobs had lower job-status discrepancy scores ($r = -.32$, $p < .01$), lower house-job discrepancy scores ($r = -.25$, $p < .01$), lower total house liking scores ($r = -.29$, $p < .01$), and used

more dimensions in the house sorts ($r = .24, p < .01$) than did children who failed to mention professional jobs or named only child-related professionals (e.g., doctor, teacher).

Professional jobs were mentioned spontaneously significantly more often by older children, suburban children and boys. At one extreme were the suburban seventh graders, 85% of whom included many professional jobs in their free association list. At the other extreme were the urban fourth graders -- only 30% of this group thought of any professional jobs other than child related ones. Intelligence was not related to frequency of mention of professional jobs.

The absence of relationships between intelligence and the discrepancy scores and the salience of professional jobs is surprising, particularly in light of the strong relationships between intelligence and other measures which seemed to reflect social knowledge. The evidence seems to point toward two concurrent but somewhat independent developmental trends -- 1) an increasing ability to use multiple criteria and superordinates to discriminate among social stimuli and 2) an increasing sensitivity to status as a prime criterion. However, since the research was exploratory and all the social knowledge measures newly created, replication and extension of the study is essential before we can gain a more definitive understanding of the pattern of results. In an exploratory study, especially one where the contributions of measurement unreliability are unknown, one runs a risk of over-interpreting negative results.

Probable and Ideal Job Choices: At the beginning of the job section of the interview, the children were also asked: "What kind of work do you think you'll probably do when you grow up?" and "If you could do any kind of work you wanted, what kind of job would you most like to have?" Responses to these questions were classified according to the same scheme used to categorize the free association jobs. Table 12 presents a summary of the probable and ideal job choices of the six sub-samples -- the four groups in the main sample plus the two supplementary samples. The "ordinary-non-professional" summary category includes blue collar, white collar, and semi-professional workers (Turner's Categories 1-6). The "ordinary-professional" category includes managers, professionals and owners (Turner's Categories 7-9). The "glamorous" category includes athletes, entertainers and adventurers.

TABLE 12
Own Job Choices of Sub-Samples

Sample	Probable Jobs		Glamorous (N)	
	Ordinary Non-prof.	Professional		
<u>4th Grade</u>				
City	2	7	8	(17)
Suburb	6	7	4	(17)
<u>7th Grade</u>				
City-White	10	3	6	(19)
City-Black	6	1	9	(16)
Inner Suburb	6	10	3	(19)
Outer Suburb	6	6	2	(14)
<u>All</u>	<u>36</u>	<u>34</u>	<u>32</u>	<u>(102)</u>

Sample	Ideal Jobs		Glamorous (N)	
	Ordinary Non-prof.	Professional		
<u>4th Grade</u>				
City	3	4	12	(19)
Suburb	6	7	3	(16)
<u>7th Grade</u>				
City-White	3	6	11	(20)
City-Black	5	2	12	(19)
Inner Suburb	6	3	11	(20)
Outer Suburb	4	6	6	(16)
<u>All</u>	<u>27</u>	<u>28</u>	<u>55</u>	<u>(110)</u>

What kinds of jobs did the children expect to have? One-sixth of the sample did not answer the question. Some of those who did not respond said that they had never really thought about the question; others said that they had a number of jobs in mind, but had not decided on one. In addition to those who gave no response, many of the children who did name a job hastened to add that they were by no means firm about that choice. Thus, the first point to note is that occupational choice was not particularly salient to the children. Looking at the pattern of choices of those who did respond, we find that the children's expectations were not very realistic. If we use family socio-economic status as a basis for judging the degree of realism, we find large discrepancies between current and expected occupational status. Twice as many of the fathers of the children in the sample had non-professional jobs (67%) as had professional jobs (33%); yet, equal numbers of children expected both kinds of jobs. One-third of the children who responded thought they would probably be professionals and one-third were planning on ordinary non-professional jobs. The remaining third of the children made glamorous job choices -- another indication that the choices bore little relation to reality.

How did the sub-groups differ in their probable job choices? The largest variations in choice patterns were among the urban samples. The younger city children were very unrealistic -- only two of the fourth graders thought they'd be working at ordinary non-professional jobs when they grew up. The remainder were evenly divided between professional and glamorous choices. In contrast, the white seventh-graders were most realistic -- half of them thought they would probably end up in non-professional jobs. The black seventh grade urban sample was composed of dreamers and realists. Of all the sub-samples, they made the largest proportion of glamorous choices, but the smallest proportion of professional choices. The suburban children made fewer glamorous choices -- they were much more likely to stay within the realm of ordinary jobs than were the urban children. The inner-suburban seventh graders had the highest aspirations of the sample -- half of these children expected to be professionals.

How did the children's ideal job choices compare with their probable ones? The most striking finding is the increase in the number of glamorous choices. Half of the children who responded to the ideal job question selected a glamorous job. Examination of individual shifts in probable and ideal jobs further substantiates

the appeal of glamorous jobs. Five-sixths of the total sample responded to both job questions. Half (48 out of 100) of these children gave the same answer both questions. Of those who changed choices, the modal shift was from an ordinary probable job to a glamorous ideal job -- 46% (24 out of 52) of the changes were of this type. Mobility aspirations, as indicated by wishing for a higher status job than one expected, were much less prevalent -- only 17% (9 out of 52) of those who changed, shifted from a lower status probable choice to a higher status ideal choice. (The remaining shifts were scattered among a number of categories -- e.g., both ordinary jobs at same status level but different jobs; both glamorous jobs, but different jobs, etc.).

Thus, we find that status sensitivity does not appear to have played a major role in determining the children's own job choices. While it is true that the children were more apt to select high status jobs than would have been predicted on the basis of their current status, by far more prominent was their tendency to be attracted to glamorous jobs.

The Children's Residential Experience: To obtain some indication of how the children in the sample perceived and felt about their own houses, they were asked to select the house photo which most closely resembled their own house and to explain how their house was like the one in the photo. Then they were asked to say anything else about their own house they felt like adding to their initial response. The children's choices of houses similar to their own were reality-based. The outer suburban children named Houses H, G, and C most often; House I was the modal choice of the inner suburban children; and the urban children chose House S most frequently. Q, the housing project, was the modal choice of the black, seventh grade urban sample.

A majority of the children talked about their houses solely in descriptive terms. They pointed out physical similarities between their house and the one selected as most similar and then went on to describe the appearance of their own house in more detail. Looking at the minority of responses which included evaluative statements, we find that suburban children made almost twice as many positive evaluative comments as negative ones. (Thirteen suburban children referred to positive features of their houses; seven mentioned negative ones. Included in these totals are the responses of four children who made both positive and negative comments.) Urban children gave equal numbers of positive and negative evaluations of

the houses they lived in. (Ten children made positive and ten, negative comments about their residences; these totals include three children who made both positive and negative comments.) The difference between urban and suburban children in the proportion of positive to negative evaluations was not significant.

The children were also asked about their residential history. Only one-quarter of the children had lived in the same house all their life. One-half of the children had moved at least three times. The younger children had moved as often as the older ones. One-quarter of the children had moved within the last two years. While the urban children had changed residences as frequently as the suburban children, they tended to have moved within a smaller geographic radius. The urban children tended to move around within the same community; the inner suburban children were more likely to have moved from a neighboring town and the outer suburban children from another state. One can infer from these mobility patterns that the urban and inner-suburban moves were more often motivated by a desire to improve housing quality while the outer suburban moves were more likely to have been a consequence of job changes. Originally, I had hoped to be able to obtain a social mobility measure from the history of moves in order to check on a hypothesis that children who belonged to socially mobile families would develop sensitivity to social status earlier than those who belonged to stable families. Unfortunately, in all but a few cases, the residential histories provided by the children were not precise enough to permit accurate judgments of social mobility (defined in terms of the difference in status of the pre- and post-move communities). Thus, the effects of social mobility upon the level of status sensitivity could not be examined.

The children were also asked about their visiting experiences outside their immediate neighborhood -- how often they left their neighborhood, where they went, and what they did there. Again, the children did not provide very specific answers to this series of questions, and, thus all the responses were combined into one summary categorization of the intensity of experience outside the child's own residential location. The urban sample's experience outside the city was categorized as: 1) none or very limited, 2) some (i.e., two or three non-urban places visited occasionally), or 3) extensive (i.e., numerous non-urban places visited on a regular or frequent basis). Parallel categories were devised for classifying the amount of urban exposure of the suburban samples -- 1) none or very limited experience

in the city (e.g., a ball game at Fenway Park and/or a visit to the Prudential Center), 2) some experience in the city, and 3) extensive city experience (i.e., frequent visits to a number of urban places; mention of names of areas or sections of the city; evidence that the child had been out and around in the city rather than simply attending events there). Assuming that the urban and suburban experience scales are comparable, we may conclude that while very few of the children spent much time outside their community, urban children had slightly more experience in the suburbs than the suburban children had in the city. More than one-quarter of the urban white children had made extensive visits to places outside the city while none of the younger suburban children and only two of the older ones had visited the city extensively. The inner suburban children spent as little time in the city as did the outer suburban ones; their closer proximity to the city was not reflected in their experience. The urban black sample had less suburban experience than the urban white samples; only one urban black child had spent a good deal of time outside the city.

Questions about time spent outside the child's neighborhood were included because I expected that the greater a child's experience in a diversity of areas, the more sophisticated and knowledgeable he would be about social distinctions. Since so few children had had extensive experience in areas other than the one they lived in, it was not possible to explore the effects of diverse experience.

CONCLUSIONS

Summary of Findings and Analysis: The study attempted to discover the kinds of dimensions that children use to compare and contrast two sets of social stimuli -- houses and jobs. The research was based on the assumption that obtaining knowledge of how similarity structures are formed for social domains would be useful in explaining the development of personal preferences and conceptions of social status.

Free sort and triad procedures were used to explore the ways in which the children -- fourth and seventh graders from urban and suburban residential areas -- categorized houses and jobs. The patterns of free sort responses closely resembled those found in earlier developmental studies of similarity grouping in non-social domains. Younger children, urban children and

less intelligent children were unlikely to sort the total array on the basis of a single attribute. Instead, they grouped pairs of items on the basis of similarity of physical details in the house sorts and similarity of function or perceptible working conditions in the job sorts. Some of the younger children made thematic and/or complexive groupings in the job sorts -- that is, rather than identifying a common attribute, they explained their sort by citing a relationship between the jobs.

Older children, suburban children and more intelligent children more frequently made contrasts between sorts. While the size and complexity of the arrays prevented all but a minority of the children from completing a total sort, older children used a greater variety of different criteria to group the stimuli. They often sorted the houses on the basis of descriptive cues such as size, surrounding details and house style. Age and residential location were the more frequently used inferential categories. The inferential categories that were more directly related to social status -- house quality and neighborhood socio-economic status -- were used least often.

In general, the children had more difficulty with the job array. They were less likely to complete a total sort and they used fewer criteria to group the jobs. Functions and visible working conditions predominated for older and younger children. The authority, power or responsibility associated with the jobs was the next most salient category. Some children based sorts upon vague evaluations of the quality of the jobs or the people who performed them. Status related categories such as the education or training prerequisites or the income or prestige derived from the jobs were rarely used as bases for sorting.

The inability of the majority of the children to compare and contrast large numbers of stimuli and their reliance upon extrinsic features as bases for grouping limit the relevance of the similarity responses to the understanding of social concept formation. Only a few children grouped equal status items in the sorting tasks; yet, many of the children were capable of judging equivalence of status (as evidenced by their preference and importance rank orders and reasons).

The children's favorite houses were single family suburban homes. They tended to rank high quality urban housing lower than medium quality suburban housing. Aside from this minor divergence, their preference rank orders were similar to the status groupings of the design

experts. House quality was frequently cited in explanation of preferences. Poor quality seemed to be sufficient cause for disliking a house. Within the high quality houses, however, the children made finer discriminations on the basis of descriptive stylistic features.

The urban children had higher total house liking scores than the suburban children. The difference was principally attributable to the fact that the suburban children placed large numbers of houses in the Dislike Very Much group. Differences between the subgroups may reflect attempts by the children to maximize their own status. According to this interpretation, a child whose own house is at the bottom end of the status continuum would tend to enlarge the size of the positive groups -- thereby decreasing his own distance from the top. On the other hand, a child whose house is at the top end of the continuum would be more apt to keep the "Liked" groups small -- thus preserving the exclusive nature of his own position.

The best liked jobs were teacher and doctor. Janitor, streetcleaner, factory worker and garage mechanic were the least liked jobs. For the most part, the children's preference rank orders resembled the standard adult occupational prestige rankings. There were some differences -- the children, especially the younger ones, tended to like jobs which were concerned with protection (e.g., policeman, night watchman) more than would have been anticipated from the adult ranking. Sex-role stereotyping also played a role in determining preferences. The boys tended to like "masculine" jobs (e.g., army captain, electrician), while the girls were more apt to prefer "feminine" jobs (e.g., secretary, teacher). Many of the children could not give very specific reasons for their preferences.

In ranking the importance of jobs, there was high consensus within the sample. Doctor, policeman, mayor and scientist were rated high; musician, truck driver, janitor and street cleaner were rated low by all the subgroups. The children's importance rank orders closely approximated adult prestige rankings. The major exceptions were policeman which was ranked much higher and musician which was ranked much lower by the children than by adults. The children thought that important jobs were either those which provided service to the community or those which involved authority or responsibility for others. Almost all jobs were seen as being of some importance -- only those jobs which were viewed as unnecessary or expendable were placed in the "not important" category.

Individual sensitivity to social status was measured by two discrepancy indices -- the Job Status Discrepancy score (which measured the extent to which a child's job importance ranks deviated from standard adult prestige rankings) and the House-Job Discrepancy score (which measured the extent to which a child's house-job pairings deviated from equivalent status level matches). The status sensitivity indices were related to a number of other measures -- the number of dimensions used in the house sorts, completion of total sorts, and frequency of mention of professional jobs in the free association task. Sensitivity to status increased with age but was unrelated to intelligence. This pattern suggests two concurrent, but somewhat independent development trends -- 1) an increasing cognitive ability to use multiple criteria and superordinate attributes to discriminate among stimuli; and, 2) an increasing social sensitivity to status as a prime criterion used by the community to evaluate social stimuli.

Status considerations did not play a major role in the children's job preferences when they were permitted to name their own choices. Looking at the probable and ideal job choices of the total sample, we find that while the children were somewhat more likely to aspire to high status jobs than would have been predicted on the basis of their current status, more dominant was the tendency to be attracted to glamorous jobs. Thus, while most of the children, particularly the older ones, were sensitive to job status (sensitivity being defined as accurate knowledge of how adults allocate status), many of them did not use status considerations as a basis for their own job choices. This leads me to conclude that children may learn some principles about the functioning of the social system before they are "willing" or able to construe their own futures in social system terms.

Comments on Methods: The study used a variety of methods -- free sorts, re-sorts, forced sorts, rank orders, matching, probing for explanations of sorts and reasons for rankings, etc. The general strategy of the research was to begin with open-ended approaches and to follow these with more structured tasks which explored the children's thinking about specific dimensions. The initial assumption was that a free sort technique which included a broad array of items would be the best way to elicit those dimensions which were salient and personally meaningful to the children and that it was important to present this task before any specific dimensions had been introduced which would "contaminate" the responses. Analysis of the

children's behavior on the various tasks has led us to seriously question the initial methodological assumptions. In addition, it has suggested some interesting non-obvious ways in which methods interact with individual differences, content domains, and characteristics of arrays.

First, a free sort does not necessarily elicit personally meaningful constructs. Even though the children were asked to put together the items that they thought were alike, the instruction did not preclude the adoption of objective problem solving strategies. For instance, many of the children construed the house sorting task as asking for the grouping of houses that looked alike (that shared physical details). Given the salience of perceptible features to children in this age range, this interpretation is not surprising. Observing the children's great dependence upon visible cues in the sorting task, one might be misled into concluding that they were not capable of sorting in other ways. Such a conclusion would seriously underestimate their actual repertoire of constructs for they did use inferential and evaluative criteria in response to more structured tasks.

Second, complicated arrays -- those which contain many stimuli and many potential grouping attributes -- do not necessarily elicit richer, more complex responses. Children who are on the verge of attaining the ability to group on the basis of superordinates may not be able to demonstrate their evolving skills if the array overtaxes their information processing capacity. Differences within the sample in developmental level and differences between content domains in level of difficulty are sometimes masked in the responses to demanding arrays. Examination of the relative performance in the house triads and free sorts as compared with the corresponding job tasks illustrates the complexity of the phenomenon. In general, the children found the house triads easier to cope with than the house free sorts. The total house array contained a great number of photographs and many children relied heavily on similarity of superficial details in pairs of items. The house triads, by reducing the size and complexity of the total array and by highlighting specific contrasts, made other dimensions more salient and thus elicited a greater number of different sorting criteria. The job triads, in contrast, appeared unnatural and contrived to those children who had had difficulty in grouping the jobs in the free sort. Since the job title cards conveyed no additional meanings, reduction in the size of the array did not facilitate concept formation. Instead, inferring from the frequent use of thematic groupings, one may conclude that the

triad task was perceived as even more arbitrary and difficult than the free sort.

Third, including a broad range of examples along a dimension does not necessarily increase the frequency with which the dimension is used. In fact, if the dimension involves social distinctions, there is some evidence that children are more likely to mention it when they are asked to discriminate among a narrow range of examples. For instance, in the triad task, when quality differences among the houses were gross, the children rarely referred to quality; but when the differences were minimal -- as in the triad where all three houses were high quality, single family suburban dwellings -- social status criteria were more apt to be used. The children seemed to know more about social distinctions than they volunteered. Perhaps they have learned the social convention that it is not "polite" to talk about gross inequalities.

Fourth, one must not assume that constructs which are uni-dimensional for adults are also uni-dimensional for children. It is important to anchor and explore both ends of dimensions. In this study, negative choices and the explanations for these choices could not always have been predicted on the basis of a knowledge of the criteria underlying positive choices. For instance, in explaining why jobs were important, the children emphasized service to the community and authority or responsibility. Unimportant jobs, however, were not defined in terms of service and responsibility. Instead, unimportant was equated with unnecessary and thus, musician -- job which was liked but which also was seen as providing expendable luxury -- was ranked at the bottom of the importance order. If the study had been limited to positive choices, it probably would have overestimated the correlations among preferences, importance rankings and status.

Finally, standard sets of stimuli may not adequately sample children's current preoccupations. Since I was interested in exploring what children know about social status, I selected houses and jobs which varied along the status dimension. When asked to rank the standard set of jobs -- a set composed almost entirely of ordinary, everyday jobs -- in terms of preferences, the children tended to prefer higher status jobs. However, when given free rein to choose any job, status receded in importance as a criterion for liking and glamorous jobs were the most preferred.

These methodological comments were presented in order to point up the limitations of relying on general

assumptions about the efficacy of techniques. It is essential to design methods which are sensitive to potential interactions among domain content, array characteristics, and the developmental level of the sample.

Implications for Educational Practice: Before beginning this research, I anticipated that gaining a better understanding of the growth of social awareness in children would facilitate the development of curriculum "aimed at making children more aware of social diversity and better able to understand and tolerate a large variety of social forms." (quoted from my initial proposal). The research process and findings have led me to seriously question the naivete of my original conception. Why should toleration of social diversity be a curriculum objective -- particularly when diversity is a euphemism for status inequality? The urban children in the sample clearly preferred suburban living. They wanted to climb trees, to play ball on a lawn and, most of all, to live in a house of their own. They disliked the dirt and dilapidation of the city and they worried about its dangers. The suburban children also preferred the suburbs. They tended to take the positive features of their own surroundings for granted and they displayed little interest in the city. What ends are served by materials which promote appreciation for a variety of kinds of environments? Can we convince suburban children that cities should be valued and, more important, should we teach urban children that cities can be wondrous places once they have been fully explored and understood. Perhaps, it is more useful to acknowledge the children's preferences and to support their growing conviction that some settings are intolerable.

The children in this study knew more about social distinctions than one would have guessed from an examination of their sorting behavior. They have learned how to differentiate on the basis of status while simultaneously discovering that one does not make social comparisons in public. Their failure to mention large social differences combined with their ability to make fine discriminations among high status alternatives suggests that they do not know how to deal with gross inequalities. Educators must not avoid this issue. They must help students confront one of the central dilemmas of American society -- the existence of widespread inequality which belies our commitment to fairness and equality, core values in the American creed.

REFERENCES

- Brown, C. Manchild in the promised land. New York: Macmillan, 1965.
- Brown, R. Social Psychology. New York: The Free Press, 1965.
- Gans, H. J. The urban villagers. New York: The Free Press, 1962.
- Grunes, W. Looking at occupations. J. abnorm. soc. Psychol., 1957, 54, 86-92.
- Gunn, B. Children's conceptions of occupational prestige. Personn. Guid. J., 1964, 42, 558-563.
- Hodge, R. W., Siegel, P. M. and Rossi, P. H. Occupational prestige in the United States: 1925-1963. In R. Bendix and S. M. Lipset (Eds.). Class, status and power (2nd Ed.). New York: The Free Press, 1966, 322-334.
- Hollingshead, A. Elmtown's youth. New York: John Wiley, 1949.
- Hyman, H. H. The value systems of different classes. In R. Bendix and S. M. Lipset (Eds.). Class, status and power (2nd Ed.). New York: The Free Press, 1966, 488-499.
- Kagan, J. Psychological significance of styles of conceptualization. In J. C. Wright and J. Kagan (Eds.). Basic cognitive processes in children. Monogr. Soc. Res. Child Dev., 1963, 28, 73-124.
- Kelly, G. The psychology of personal constructs. New York: Norton, 1955.
- Miel, A. and Kiester, E. The shortchanged children of suburbia. New York: Inst. Hum. Rel. Press, American Jewish Committee, 1967.
- Olver, R. and Hornsby, J. On equivalence. In Bruner, J. S., Olver, R. R., Greenfield, P. M. et al. Studies in cognitive growth. New York: John Wiley, 1966.
- Shostak, A. B. and Gomberg, W. (Eds.). Blue collar world: studies of the American worker. Englewood Cliffs, N. J.: Prentice-Hall, 1964.

Turner, R. The social context of ambition. San Francisco:
Chandler, 1964.

U. S. Bureau of the Census, Census of Housing: 1960, Boston,
Mass. Washington, D. C.: Govt. Printing Office, 1961.

Wilson, A. B. Residential segregation of social classes
and aspirations of high school boys. Amer. Sociol.
Rev., 1959, 24, 836-845.

APPENDIX:
The Interview Schedule

H-1

ID _____

NAME _____ SEX: B G DATE _____

SCHOOL _____ GRADE _____ AGE _____

I'm trying to find out what children (teenagers) think about when they look at different kinds of houses. If you tell me some of your ideas it will help me a great deal.

I. FREE SORT

Here are some pictures of houses that were taken in and around Boston. Can you pick out some houses that go together -- that you think are alike in some way?

Why do these go together -- how are they alike?

(If first two sorts are pairs state that any number of pictures may be grouped together.)

HOUSES

WAY ALIKE

1.	
2.	
3.	
4.	
5.	
6.	
7.	

APPROACH: _____ One sort at a time
 _____ Total sort

TIME: _____ First sort time
 _____ Total sort time

66

ID _____

II. RESORT (If total set approach has been used.)

a. Can you sort the houses in some other way -- are there other ways in which the houses are alike?

RE-SORT -- HOUSES

WAY ALIKE

1.	
2.	
3.	
4.	
5.	

II. b. SECOND RESORT

Can you sort the houses in any other way -- are there any other ways in which the houses are alike?

RE-SORT #2 -- HOUSES

WAY ALIKE

1.	
2.	
3.	
4.	
5.	

ID _____

- II. c. PROVIDED HOUSE (If total set approach has NOT been used)
 (Select 3 houses that have not been included in any of the free sorts.)
 What about this house - can you pick out some houses that are
 similar to (like) this one?

How are they alike?

GIVEN	OTHER HOUSES	WAY ALIKE
1.		
2.		
3.		

III. TRIADS

Now I'm going to show you the house pictures three at a time. Think about the three houses for a minute, decide which two of the three are more alike and then tell me how they are alike and how they differ from the third. Here are the first three. Which two do you think are more alike?

How are they alike? How do they differ from the third?

TRIAD (circle 2 alike)	WAY ALIKE
1. A C O	
2. K R S	
3. F L N	
4. M Q T	
5. E H P	
6. B G I	

ID _____

IV. OWN HOUSE

1. Which of the pictures look like houses in your neighborhood?

2. Which of the pictures is most like the house that you live in? _____

3. How is your house like this one?

4. Can you tell me some more about your house?

(After free responses, probe for non-mentioned specifics:
(circle answers)

5. No. of families -- 1 2 3 4 or more

6. No. of floors -- 1 2 3 4 or more

7. No. of rooms -- 3 Or less 4 5 6 7 or more

8. Age -- new in between old
(60's) (post WWII) (Pre WWII)

9. How long have you lived in this house? _____

10. Have you ever lived anywhere else? _____

(If YES)

11. Where did you live before you moved here? _____

(Town or city name)

12. Which of the pictures looks most like the house you used to live in? _____

13. Can you tell me something about that house?

14. Where else have you lived?
(Towns or cities)

ID _____

V. CITY-SUBURB EXPERIENCE

1. When you go out of your neighborhood, where do you usually go?

What do you do there?

Where?

What for?

Where?	What for?

2. How often do you go out of your neighborhood? (Check frequency)

_____ A. Once a week or more

_____ B. 2-3 times a month

_____ C. Once a month

_____ D. 3-4 times a year

_____ E. Once a year or less

3. What parts of Boston have you visited?

Where?

What for?

Where?	What for?

4. Which cities and towns around Boston have you visited?

Where?

What for?

Where?	What for?

ID _____

VI. PREFERENCE RANK ORDER

Let's go back to the whole set of pictures. Sort the houses into 4 piles according to how much you would like living in them. In the first pile, put all the houses that you would very much like to live in; in the second pile, put all those that you would like a little; in the third pile, put all those that you would dislike a little; in the fourth pile, put all the houses that you would very much dislike living in.

(Place heading cards on the table and ask the child to pile below the appropriate heading.) Which of the houses in the first pile is your favorite -- which would you most like to live in? Which is second? Third? etc. (Ask for complete rank order.)

VERY MUCH LIKE		LIKE A LITTLE		DISLIKE A LITTLE		DISLIKE VERY MUCH	
Rank	House	Rank	House	Rank	House	Rank	House

Why would you like living in #1 best?

And why do you like #2?

Why would you dislike living in #2?

Why do you dislike #1?

JOBS

I'm trying to find out what children (teenagers) think about different kinds of work that grown-ups do. If you tell me some of your ideas about jobs, it will help me a great deal.

I. ASSOCIATIVE PREPARATION

1. Free-thought Jobs

Let's start by thinking of the names of some jobs. What are some jobs that you can think of? (Elicit 10 job names.)

- | | |
|----|-----|
| 1) | 5) |
| 2) | 6) |
| 3) | 7) |
| 4) | 8) |
| 5) | 10) |

2. Okay, that's fine. Now, what are some jobs that people you know do? (Elicit 3 jobs. If father's job is not mentioned and child has a father living at home, ask about father's work.)

JOB TITLE	WHO?
1)	
2)	
3)	

3. Can you think of some really great jobs -- ones that are very important and exciting? (Elicit 3)

Why do you think that's a great job?

JOB TITLE	WHY GREAT?
1)	
2)	
3)	

4. What kind of work do you think you'll probably do when you grow up?

5. If you could do any kind of work you wanted, what kind of job would you most like to have?

Why would you want that job?

(If discrepancy between expected and ideal jobs, probe for explanation.)

Now, I'd like to ask you about some specific jobs. Here's a pile of cards. Each one has the name of a job written on it. First, let's try reading all the cards. (Make sure the child understands the job titles. Make note of unknown jobs and provide brief explanation.)

II. FREE SORTS

(Spread all the cards out on the table.) Can you pick out some jobs that go together -- that are alike in some way?

Why do these go together -- how are they alike?

(If first two sorts are pairs state that any number of pictures may be grouped together)

JOBS	WAY ALIKE
1.	
2.	
3.	
4.	
5.	
6.	
7.	

APPROACH: _____ One sort at a time
 _____ Total sort

TIME: _____ First sort time
 _____ Total sort time

III. a. RE-SORT (If total set approach has been used.)

Can you sort the jobs in some other way -- are there other ways in which the jobs are alike?

RE-SORT -- JOB TITLES	WAY ALIKE
1.	
2.	
3.	
4.	
5.	

III. b. SECOND RE -SORT

Can you sort the jobs in any other way -- are there any other ways in which the jobs are alike?

RE-SORT #2 -- JOBS	WAY ALIKE
1.	
2.	
3.	
4.	
5.	

III.c. PROVIDED JOB (If total set approach has NOT been used)

(Select 3 jobs that have not been included in any of the free sorts.)

What about this job -- can you pick out some jobs that are similar to (like) this one?

How are they alike?

GIVEN	OTHER JOB TITLES	WAY ALIKE
1.		
2.		
3.		

IV. TRIADS

Now I'm going to show you the job cards three at a time. Think about the three jobs for a minute, decide which two of the three are more alike and then tell me how they are alike and how they differ from the third. Here are the first three. Which two do you think are more alike?

How are they alike? How do they differ from the third?

TRIADS (circle 2 chosen)	WAY ALIKE
1. secretary teacher bank manager	
2. lawyer electrician truck driver	
3. doctor policeman janitor	
4. mayor army captain newspaper reporter	
5. scientist musician garage mechanic	
6. shoe store owner factory worker grocery clerk	

V. PREFERENCE RANK ORDER

1. Let's go back to the whole set of cards. Sort the jobs into 4 piles, according to how much you would like having the jobs. In the first pile, put all the jobs you would very much like to have; in the second pile, put all those that you would like a little; in the third, put those you would dislike a little; and, in the fourth pile, put all the jobs that you would very much dislike having.

(Place heading cards on the table and ask the child to pile below the appropriate heading.)

Which of the jobs in the first pile is your favorite -- which would you most like to have?

Which is second? Third? etc. (Ask for complete rank order.)

VERY MUCH LIKE		LIKE A LITTLE		DISLIKE A LITTLE		DISLIKE VERY MUCH	
RANK	JOB	RANK	JOB	RANK	JOB	RANK	JOB

2. Why would you like being # 1 best?

3. And why would you like being #2?

4. Why would you dislike being #20?

5. And why would you dislike being #19?



VI. IMPORTANCE RANK ORDER

1. Now, sort the jobs into 4 piles according to how important you think they are. In the first pile, put all the jobs that are very important; in the second, put the ones that are pretty important; in the third, put the ones that are a little important; and in the fourth pile put the jobs that are not important at all. (Place heading cards on the table and ask the child to pile below the appropriate heading.)

Which of the jobs in the first pile do you think is the most important? Which is second most? Third? etc. (ask for complete rank order.)

VERY IMPORTANT		PRETTY IMPORTANT		A LITTLE IMPORTANT		NOT IMPORTANT	
Rank	Job	Rank	Job	Rank	Job	Rank	Job

- 2. Why is #1 an important job?
- 3. Why is #2 important?
- 4. Why isn't # 20 an important job?
- 5. Why isn't # 19 important?



ID _____

MATCHING JOBS AND HOUSES

1. For your last job, let's play a matching game. Here are some of the jobs cards and some of the house pictures. Can you match them up? Put each job into a house by imagining a man who might have that job and the house that he might live in.

Set: 1 2 (Circle one)

JOB TITLE	HOUSE
1.	
2.	
3.	
4.	
5.	
6.	
7.	
8.	
9.	
10.	

Which of the questions did you find more interesting -- the ones about the houses or the ones about the jobs? Why?

INTERVIEWER COMMENTS**1. GENERAL TONE**

(interested? bored? tense? correct answer oriented? comfortable? freeflowing?
attention span? etc.)

2. JOBS VERSUS HOUSES

(Attitudes, attention, performance differences, etc.)

3. SPECIFIC EXPLANATIONS, INTERPRETATIONS, ETC.