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ORIENTATIONS TOWARD COMMUNITY AND PRIVATE SHELTER SYSTEMS

ONE IN A SERIES OF REPORTS ON AMERICANS'
VIEWS ABOUT CIVIL DEFENSE ISSUES

DAHC-20-67-C-0122

RESEARCH WORK UNIT 4812B

AUGUST 1967

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One in a series of reports on Americans'
views about Civil Defense issues

-- REPORT SUMMARY --

By

Robert H. Mast

For

OFFICE OF CIVIL DEFENSE
OFFICE OF THE SECRETARY OF THE ARMY

DAHC-20-67-C-0122

Research Work Unit 4812B

August 1967

OCD REVIEW NOTICE

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REPORT SUMMARY

This is one of a series of reports dealing with the impact of the cold war and civil defense in American society. An examination of the public's orientations toward alternative fallout shelter systems was undertaken by first reviewing items appearing in surveys in which favorable or unfavorable dispositions toward shelter systems were measured. Second, items dealing with the public's preferences for community or private shelter systems were reviewed. A search for attitudes on the favorability of community shelter systems revealed that three studies between April, 1960 and January, 1966 directed questionnaire items to this issue. From 1960 to 1966 the public's favorability to community shelters increased from about 82 percent to about 87 percent, indicating an obviously overwhelming support for the idea.

An attempt was made to locate social sectors of favorability or opposition to the idea of community shelters. Community shelter favorability appeared to be related to a series of civil defense-relevant attitudes. Demographically, the kinds of people holding these attitudes came from several social sectors. There appeared to be a small, hard-core of opposition to community shelters among a fairly well educated, professional group with strong ideological sentiments about issues of war and peace. This grouping appeared to live in the metropolitan centers and to be dominated by men. A social sector tending toward shelter favorability appeared to be those who were married, with a moderate number in their household including some younger children. This sector represented those who were more socially attached and had involvements with, and responsibilities for, others. Another social sector based on age was located in the data. It was found that as age increases, community shelter opposition increases.

A search for preferences for community or private shelters revealed that four studies between December, 1961 and July, 1963 directed questionnaire items to this problem. Three of these studies were national surveys and they revealed that 50 percent or more of the public preferred community shelters for protection while 30 to 40 percent preferred private shelters. An analysis was made of the characteristics of the two groups. It was found that those preferring private over community shelters perceived themselves to be in a higher state of self-protection. The self-protectors with private shelter preference attached a greater desirability to propositions which reflected upon the responsibility of American families to provide fallout shelters with or without financial help from the government.

The respondents who were private-oriented also were more attached to the primary group in that higher proportions were married and had younger children.

If respondents had no pre-existent protection, those who preferred community shelters seemed to find an authoritarian civil defense organization (near-military) more desirable. The community-oriented appeared to have more confidence in help coming from the environment. They also were less attached to the primary group. It was speculated that the community-oriented were more prone to dependency on secondary associations, though community-primary preferences revealed no differences in social class. Women were more prone to prefer community shelters and men to prefer private shelters. These respective preferences were enhanced under the condition that some self-initiated protection already existed.

Shelter preference distinctions did not reveal large social differences between those preferring community and those preferring private shelters. It appeared that special, small social sectors felt rather strongly about the relative merits of each shelter system, but these sectors did not constitute large numbers of people in absolute terms. These sectors were not necessarily based on strong ideological commitment, but reflected relatively unique aspects of the social order and group attachments.

Finally, an effort was made to compare the characteristics of groups favoring or opposing the idea of community shelters with those of groups preferring community or private shelters. Groups which were prone to favor the idea of community shelters while preferring private shelters were more likely to be composed of individuals with more primary group attachments (i. e., married; have some younger children). To favor community shelters while preferring private shelters is not incompatible; it suggests that these people favor protection, but since they have stronger primary group orientations, they prefer to be protected at home. This category of individuals may be more resilient, more adaptive and perhaps more cooperative with public agencies than other social categories.

Categories of respondents more likely to oppose the idea of community shelters but prefer such shelters for protection were more likely to be those who were unmarried, those with no smaller children and those perceiving themselves as not being in any state of self-initiated protection. Rather than direct opposition to shelters, per se, these categories may be manifesting greater alienation and lower social attachment. They also may be seen as less adaptive, less flexible and probably

less responsive and cooperative to programs of the public protection agencies.

The social category more prone to oppose the idea of community shelters while preferring private shelters was observed to be men. Men, more than women, may be thought of as less cooperative in the development and implementation of a public shelter program.

Women, more than men, were seen to favor the idea of community shelters while also preferring them. The higher community shelter orientation in women may have implications for the agencies of public protection. Ostensibly, here is a relatively untapped, yet potentially important, resource.

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TABLE OF CONTENTS

	Page
LIST OF TABLES	ii
 Chapter	
I. INTRODUCTION	1
II. PATTERNS OF ACCEPTANCE OF COMMUNITY SHELTERS .	5
A. The Nature of Civil Defense Acceptance	
B. Public Acceptance of the Community Shelter Idea	
C. An Analysis of the Acceptance of Community Shelters	
1. Social Rank	
2. Attitudes Toward Civil Defense and Protection	
3. Social Attachments	
4. Other Selected Social Identities	
D. Conclusions	
III. PATTERNS OF PREFERENCE FOR COMMUNITY OR PRIVATE SHELTERS	33
A. The Nature of the Protective Role in Society	
B. Public Preference for Community or Private Shelters	
C. Comparative Analysis of Groups Preferring Community or Private Shelters	
D. Conclusions	
IV. CONCLUSIONS	51

LIST OF TABLES

		Page
TABLE 1:	PUBLIC ACCEPTANCE OF THE CONCEPT OF COMMUNITY SHELTERS	8
TABLE 2:	COMMUNITY SHELTER ACCEPTANCE, BY EDUCATION (in percent)	11
TABLE 2A:	COMMUNITY SHELTER ACCEPTANCE (EXPANDED), BY EDUCATION (in percent)	12
TABLE 3:	COMMUNITY SHELTER ACCEPTANCE, BY EDUCATION AND OCCUPATION (in percent)	12
TABLE 4:	COMMUNITY SHELTER ACCEPTANCE, BY EDUCATION AND INCOME (in percent)	13
TABLE 5:	COMMUNITY SHELTER ACCEPTANCE, BY SELF-PERCEPTION OF SOCIAL CLASS (in percent)	14
TABLE 6:	COMMUNITY SHELTER ACCEPTANCE, BY ATTITUDE TOWARD CIVIL DEFENSE (in percent)	15
TABLE 7:	COMMUNITY SHELTER ACCEPTANCE, BY IDENTITY GROUP (in percent)	16
TABLE 8:	COMMUNITY SHELTER ACCEPTANCE, BY FAVORABILITY OF SELECTED GROUPS TOWARD CIVIL DEFENSE AS PERCEIVED BY RESPONDENTS (in percent)	17
TABLE 9:	COMMUNITY SHELTER ACCEPTANCE, BY ATTITUDE TOWARD NUCLEAR DEFENSE (in percent)	18
TABLE 10:	COMMUNITY SHELTER ACCEPTANCE, BY WORRY ABOUT NUCLEAR ATTACK (in percent)	19
TABLE 11:	COMMUNITY SHELTER ACCEPTANCE, BY WORRY DUE TO FALLOUT SHELTERS (in percent)	20
TABLE 12:	COMMUNITY SHELTER ACCEPTANCE, BY SELECTED ATTITUDES TOWARD CIVIL DEFENSE ISSUES (in percent)	22
TABLE 13:	COMMUNITY SHELTER ACCEPTANCE, BY LIKELIHOOD OF VOLUNTEERING FOR CIVIL DEFENSE (in percent)	23
TABLE 14:	COMMUNITY SHELTER ACCEPTANCE, BY THE INFLUENCE OF VIET NAM ON RESPONDENTS CONCERN FOR CIVIL DEFENSE, AND BY EDUCATION (in percent)	24

TABLE 15:	COMMUNITY SHELTER ACCEPTANCE, BY LIKELIHOOD OF VOLUNTEERING FOR CIVIL DEFENSE, AND BY SEX (in percent)	25
TABLE 16:	COMMUNITY SHELTER ACCEPTANCE, BY LIKELIHOOD OF VOLUNTEERING FOR CIVIL DEFENSE, AND BY TYPE OF COMMUNITY (in percent)	25
TABLE 17:	COMMUNITY SHELTER ACCEPTANCE, BY MARITAL STATUS (in percent)	26
TABLE 18:	COMMUNITY SHELTER ACCEPTANCE, BY NUMBER IN HOUSEHOLD (in percent)	27
TABLE 19:	COMMUNITY SHELTER ACCEPTANCE, BY EXISTENCE OF YOUNGER CHILDREN (in percent)	27
TABLE 20:	COMMUNITY SHELTER ACCEPTANCE, BY TYPE OF COMMUNITY (in percent)	28
TABLE 21:	COMMUNITY SHELTER ACCEPTANCE, BY AGE (in percent)	29
TABLE 22:	COMMUNITY SHELTER ACCEPTANCE, BY SEX (in percent).	30
TABLE 23:	PUBLIC PREFERENCES FOR COMMUNITY OR PRIVATE SHELTERS (in percent)	36
TABLE 24:	SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION (in percent)	37
TABLE 25:	SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION AND DESIRABILITY OF CIVIL DEFENSE FUTURES (in percent)	38
TABLE 26:	SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION AND DESIRABILITY OF CIVIL DEFENSE AS A NEAR-MILITARY ORGANIZATION (in percent)	40
TABLE 27:	SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION AND CONFIDENCE IN ENVIRONMENTAL HELP (in percent)	41
TABLE 28:	SHELTER PREFERENCE, BY MARITAL STATUS (in percent)	42
TABLE 29:	SHELTER PREFERENCE, BY EXISTENCE OF YOUNGER CHILDREN (in percent)	43
TABLE 30:	SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION AND EXISTENCE OF YOUNGER CHILDREN (in percent)	43

TABLE 31:	SHELTER PREFERENCE, BY SEX (in percent) . .	44
TABLE 32:	SHELTER PREFERENCE, BY EDUCATION AND SEX (in percent)	45
TABLE 33:	SHELTER PREFERENCE, BY SELF-INITIATED PRO- TECTION AND SEX (in percent)	45

I. INTRODUCTION

For over 15 years, social science investigators have conducted studies on issues of relevance to the programs of the Office of Civil Defense. Since the early 1960's, these investigations have expanded from periodic surveys of public opinion (characterizing the pre-1960 work) to analyses of specific problem areas within the interest and expertise of the investigator. Thus, while some investigators pursue national opinion studies, others are more interested in problems of communication and still others interested in community leadership. The research emphasized is principally a function of the program needs of OCD. These needs tend to change as public policy changes, and thus the emphasis or even the direction of research likewise changes.

Over the years, alternative public policies regarding civil defense are deliberated upon and accepted or rejected. Such decisions are bound to political, economic, and moral considerations, to the state of international relations, and to the feasibility of the alternative programs. In the early 1960's, national policy decisions mandated OCD to embark upon a program of surveying, marking and stocking existing shelter spaces. This program, of course, was merely one of several alternatives which could have been embarked upon if public policy had so mandated. With this program, OCD had specific knowledge needs that became the responsibility of its social science contractors.

Thus, responsibility involved, among other things, an assessment of the public's attitudes toward and information about the need for and feasibility of civilian defense as well as the desirability of alternative shelter systems and the readiness to cooperate or participate in such systems.

The pulse of the American public was felt through a number of attitude surveys during the first half of the 1960's and among a wide range of questionnaire items given at different times in different settings, one central area of inquiry involved the respondents' orientations to public versus private shelter systems. The intent of this inquiry was to determine the "leaning" of the public regarding a shelter system principally located in the home, toward a system of public shelters, or some combination of both. Further inquiries were directed at attitudes of the public toward various funding arrangements, alternative forms of civil defense organization and readiness to participate in the several shelter systems.

Clearly, knowledge of the public's attitudes toward the alternative shelter systems would be most helpful to the program needs of OCD. Yet such knowledge comprises only one dimension of

information needed by an operating agency. The reasons for such attitudes are equally important in that they are rooted in a wide range of personal and social characteristics.

Thus, explanations for attitudes toward shelter systems is an important area of information that can be utilized by OCD as a contribution to program decisions and policy implementation. Furthermore, when reasons are posited to explain different public attitudes towards OCD-relevant matters, the analyst is noting the sectors in the society that OCD may consider favorably or unfavorably disposed to its goals. This kind of analysis also attempts to pinpoint the kinds of people that may be considered centers of resistance or centers of support, whether active or passive. And such pinpointing may be done in terms of selected and somewhat specific characteristics of the population as determined by behavior, beliefs, attitudes and location in the social order.

In general, attitudes towards alternative shelter systems can be analyzed in two distinct, but related ways. First, people have favorable or unfavorable dispositions toward community shelters. Second, somewhat independent of their initial dispositions, people differ in their preferences for public and private shelters. It is possible that some people may favor the idea of building public shelters, but they would personally prefer to be in their private shelter in the event of nuclear attack. Likewise, some people both may favor public shelters and prefer to use them if an emergency arose. It does not follow that favoring the idea of public shelters automatically leads to preferring them for self protection. Indeed, the components of favorability and preference may be for some people, or for some categories of people, relatively independent of each other. The reasons why people select one or the other of the two dimensions under consideration is a function of the combination of personal characteristics which serve to orient them in somewhat predetermined ways.

The purpose of this paper is to investigate the American public's patterns of favorability toward community fallout shelters and the patterns of preference for community or private shelters. This will be a three-pronged approach: First, the effort will be made to delineate the degree of favorability-unfavorability of the public toward community shelters over a span of six years and to suggest reasons for such orientations in terms of selected characteristics of the American population. Second, patterns of preference for community or private shelters will be determined and explained in terms of these population characteristics. Third, an effort will be undertaken to reconcile any differences uncovered between the two sets of orientations and to discuss any similarities which are found.

Now, this effort is directed to specifying social characteristics and attitudes which are associated with alternative orientations towards the two shelter systems. Hopefully this will contribute toward further understanding of those sectors of the society which OCD might "count on" for support or cooperation or, on the other hand, those which might constitute a core of resistance to programs presently undertaken or anticipated. From this effort also may come a better understanding of the kinds of people who harbor latent or manifest tendencies toward one or the other of the two shelter systems.

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II. PATTERNS OF ACCEPTANCE OF THE COMMUNITY SHELTER IDEA

A. The Nature of Civil Defense Acceptance

A substantial body of information was accumulated during the 15 year period in which the views of Americans on issues of peace, war and civilian protection were investigated. We will present a set of summary statements intended to tie together some of the major findings.¹

The impact of the international environment has, in essence, sensitized Americans to the real possibilities of nuclear devastation. Studies have indicated that the public views with great apprehension such possibilities and appears to consider it highly probable that if war should come great devastation would be rendered to the cosmopolitan-industrial network of the United States. The public sees a high death toll resulting from nuclear attack, with low probabilities of survival in direct impact areas and a high casualty rate from fallout in adjacent areas.

¹These findings come principally from various publications by the Department of Sociology, University of Pittsburgh. Representative publications include: Jiri Nehnevajsa, Civil Defense and Cold War Attitudes: Data Book for the 1963 National Probability Sample Study, Department of Sociology, University of Pittsburgh, June, 1964; Jiri Nehnevajsa, et al., Civil Defense and Society, Department of Sociology, University of Pittsburgh, July, 1964; Jiri Nehnevajsa, et al., Some Public Views on Civil Defense Programs, Department of Sociology, University of Pittsburgh, December, 1964; Dorothy V. Brodie, Perceived Effectiveness of America's Defenses, Department of Sociology, University of Pittsburgh, March, 1965; Martha Willis Anderson, The 1964 Civil Defense Postures: Public Response, Department of Sociology, University of Pittsburgh, August, 1965; J. Elliot Seldin, Attitudes Toward Civil Defense, An Examination of the Attribution of Maximum Approval, Department of Sociology, University of Pittsburgh, October, 1965; Jiri Nehnevajsa, Americans' Views on Civil Defense in the Cold War Context: 1966, Department of Sociology, December, 1966; Dorothy B. Rosenberg, The Impact of Civil Defense Information I: An Examination of Information Levels, Department of Sociology, University of Pittsburgh, June, 1966.

In spite of these sets of perceptions, there is little evidence presented by national or local attitude studies that the public has responded with hardened pessimism. Instead, there is a strong belief that civil defense would be effective in saving lives. Indeed, there is considerable evidence that the vast majority of the American public finds any civil defense concept acceptable. To do something, the public seems to assert, is inherently better than to do nothing. Thus, people accept the proposition that being indoors rather than outdoors, will save a certain proportion of residents in an area subjected to fallout; being in a shelter designed to provide protection from fallout will raise the survival proportion; being in a fallout shelter which is stocked with enough provisions to outlast radiation effects will further raise the proportion of those who will survive; and being in a shelter designed to withstand the effects of blast and heat will save still more people. And when more active defense strategies, such as an anti-missile missile system, are coupled with the more passive defense propositions, the public believes that even more lives will be saved. What else can conceivably be expected from the public than this? Such acceptance of civil defense must be interpreted in light of the enormity of the problem posed to the public as well as its perceived inability to do anything about the forces generating such a set of propositions and, most important, in light of the eternal rightness of self-protection.

Yet, these findings must be also seen in terms of other findings relevant to civil defense issues. It has been determined that in spite of recognition of the goodness and necessity of civilian protection, few Americans have really done anything about it. Repeated questions in public surveys on the existence of home shelters reveal an infinitesimal number (at best, no more than 3.5 percent of respondents). Further inquiry into the state of self-initiated protection reveals that about 30 percent of the public claim to have designated a space in the home for nuclear protection. But this may represent no more than a decision on the part of the principals that a specific spot (probably the basement) would be the safest place to be in case of attack. Even during the Cuban missile crisis (the most tension-provoking event in recent years), no more than 14 percent of the American public began construction of a private shelter or even thought of doing so. However, and this is most significant, one in three Americans experienced a more favorable attitude toward civil defense as a result of the Cuban situation. Americans don't want to initiate self-protection measures or feel powerless to do so, but they find the concept of protection most appealing and are overwhelmingly in favor of it. Americans resoundingly support suggestions of expanded governmental responsibilities in civil defense and appear,

through the years, to agree to cooperate in new programs. Also, more than six in ten Americans say they would volunteer in a community civil defense program if a call went out. They have little notion of what the alternative defense systems would cost, if actualized, and tend to overestimate the amount being spent on civil defense programs which do exist. However, they do believe that more should be spent.

Another set of factors related to civil defense acceptance stems from the generalized view that our foreign policies and involvements are right. The public tends to believe that even though some commitments are quite risky, the risk is necessary because of the rightness of the goal. And accompanying this, the public presents a fairly optimistic, though guarded, view with respect to the future.

A variant of optimism appears continually in national surveys on the question of survival possibilities. Numerous items have tapped the public's views on the survival of our society, our system of values, modern civilization and mankind. Here, the level of abstraction is considerably higher than in other items which question the survival chances of individuals or blocks of individuals in selected regions. Still, queries into survivability of higher abstractions yield optimistic responses similar to lower levels of abstraction given the condition, of course, that certain levels of civil defense exist.

Americans, by and large, seem reasonably confident that the worst will not come but if it does our protective-defensive forces will cope with the situation. Some, and probably many, people will die, but the nation's leaders and the people themselves will make the best of the situation. Two in three Americans believe that people will help each other in case of emergency and not selfishly look out for themselves only.

In conclusion, study findings over the active life of civil defense show a public believing that a nuclear war would be highly devastating. Yet, if such a state of affairs should come, there is a high degree of confidence that things will work out reasonably well. The public wants to be protected, but, as individuals, are unwilling or unable to initiate self-protection, even in the face of highly explosive confrontations faced by our society and its adversaries. The public seems to expect that the state of protection it wants will occur, but it views itself as incapable of effecting necessary changes to raise the level of civil defense. Any means of defense thought feasible by decision makers is acceptable, accompanied by a highly permissive attitude toward the cost of such programs.

A generalized state of optimism pervades equally in regard to the future state of the world, the national efficacy, survivability and the inherent goodness of human beings. In view of this brief profile of attitudes relevant to civil defense, there is no wonder that the American public is highly accepting of the goals and program of civil defense. The responsibility of protection of civil life and property has been placed squarely in the hands of public officials. Such a delegation of responsibility tends to account for the seemingly high levels of public apathy, though such apathy may be interpreted not so much as disinterest, but as inefficacy.

An inquiry will now be undertaken to determine the nature of support and opposition regarding one civil defense program-- community fallout shelters. The findings to be presented below should be viewed in light of the Findings just presented.

B. Public Acceptance of the Community Shelters Idea

A review of studies done by OCD contractors was undertaken to locate items dealing with favorability or opposition to community shelters. No studies of direct relevance could be located that pre-dated 1960. Three studies were located that bear directly on the problem, the results of which follow in Table 1:

TABLE 1

PUBLIC ACCEPTANCE OF THE CONCEPT
OF COMMUNITY SHELTERS

<u>Study</u>	<u>Question</u>	<u>Favor</u>	<u>Oppose</u>	<u>Other</u>
AIPO 627 (April, 1960)	Would you favor or oppose a law which would require every community to build public bomb shelters?	1867 (74.1%)	412 (16.4%)	239 (9.5%)
CBIR (Oct., 1962)	How do you feel about the community fallout shelter?	302 (65.0%)	56 (12.1%)	105 (22.9%)
Pgh. T4 (Jan., 1966)	In general, how do you, yourself, feel about public fallout shelters?	1268 (84.4%)	195 (13.3%)	34 (2.3%)

In April, 1960, the national study by the American Institute of Public Opinion revealed that 74.1 percent favored a law requiring communities to build community shelters, while 16.4 percent opposed such a law. In October, 1962, C-E-I-R, Los Angeles Center, determined that 65.0 percent of the respondents in Livermore, California, favored community shelters whereas 12.1 percent opposed them and 22.9 percent were neutral or did not know. In January, 1966, the national study by the University of Pittsburgh found 84.4 percent favoring community shelters and 13.3 percent opposing them. There are two obvious findings of importance: First, the vast majority of respondents favor the idea of community shelters. Second, in the national studies, the proportion of those favoring such shelters increased over the six year period (74.1 percent to 84.4 percent).

These findings seem consistent with the earlier discussion of American support for civil defense. In the civil defense context of low self-initiation, both the high overall proportion who favor public shelters and the increase of this proportion, seem to make sense. Over time the public may be interpreted as resolving the protection question in favor of the community level of action, rather than by self-initiation. At the same time, the increasing favorability toward community shelters may represent a kind of resignation or perhaps resolution of a dissonance created by a state of low protection at home. Finally, there is no reason to believe that increased "community orientation" is not partially due to increased media attention and heavier emphasis on the marking and stocking program. As the 1966 Pittsburgh study found, some 68 percent of the sample was able to identify the civil defense shelter sign as related to fallout shelters.

But we do not wish to belabor the moderately small change in the direction of favorableness that our data show. We think it of some importance. However, of significantly more importance is the gross difference between the number who favor shelters and those who oppose them.

Earlier, we attempted to provide preliminary insight into the state of the "public mind" as helping to explain the overwhelming acceptance of civil defense. This was a first approximation at a very general level of analysis. But the society may be viewed in ways other than a whole since it is composed of a variety of sub-cultures and social composites with peculiar identifying characteristics. The next section will attempt a comparative analysis of selected characteristics of individuals who strongly favor, moderately favor and

oppose community shelters.² This may yield a partial explanation for the existence of these shelter attitudes in our society.

C. An Analysis of the Acceptance of Community Shelters

From the point of view of the Office of Civil Defense, the one or two Americans in ten who oppose the idea of community shelters is probably of little overall consequence. The issue is clear: Americans overwhelmingly favor the idea. Yet, from a practical as well as theoretical point of view, the kinds of people who oppose or only moderately favor shelters may have some importance. The present objective is to determine what broad differences there are between the favorability groupings. The three studies shown earlier will be used in this analysis and identical respondent characteristics presented in each study in which they were measured.

1. Social Rank

Various indicators of rank are available (income, occupation, education, home location, life style), yet education, among all, may be most powerful as a criterion:

²The data presentation which follows primarily consists of a comparative analysis of three groupings of individuals who responded to the question asked in the 1966 Pittsburgh survey, "In general, how do you, yourself, feel about public fallout shelters?" Response categories to this question were (1) strongly favor, (2) somewhat favor, (3) oppose, (4) strongly oppose. For sub-group comparison, the oppose and strongly oppose responses were combined into "oppose" to achieve a more equally distributed sample. Most of the tables which follow are arranged according to the three categories of "strongly favor," "somewhat favor" and "oppose." It was believed that the attitudinal and demographic characteristics selected for comparison could thus be viewed according to changes in attitude toward community shelters. There are two exceptions to this format, and in both instances the responses were dichotomized into "favor" and "oppose." First, when two variables were cross tabulated with the community shelter attitude question, and second, when the Pittsburgh study findings were compared with other studies.

TABLE 2*

COMMUNITY SHELTER ACCEPTANCE, BY EDUCATION
(in percent)

<u>Study</u>	<u>Educational Level</u>	<u>Favor</u>	<u>Oppose</u>
AIPO 627, 1960		N=1867	N=412
	College	12.6	26.2
	High school	46.7	48.8
	Grade school	<u>40.7</u>	<u>25.0</u>
		100.0	100.0
CBIR, 1962		N=303	N=56
	College	23.4	50.0
	High school	32.5	23.2
	Grade school	<u>44.3</u>	<u>26.8</u>
		100.0	100.0
Pgh. T4, 1966		N=1267	N=194
	College	22.0	34.5
	High school	53.6	41.2
	Grade school	<u>24.4</u>	<u>24.3</u>
		100.0	100.0

* Interpretation of Table 2 and all succeeding tables, should be by horizontal, rather than vertical, inspection. That is, we have percentaged vertically, so comparisons should be made horizontally. Within the two shelter attitude sub-groups, respondents' levels of education have been broken into three parts: college, high school and grade school. This allows comparison of the educational differences between those who favor community shelters and those who oppose community shelters. This approach does not necessarily suggest that a certain educational level causes a shelter attitude. It is more reasonable to think that a certain shelter attitude has a certain relationship to educational level; or that an attitude "draws" a certain proportion of college, high school and grade school respondents from the survey sample.

In the three studies appearing in Table 2 it is evident that those who oppose community shelters are more highly educated than those who favor, and this relationship is most pronounced in the college category. For high school and grade school categories there is a fluctuation across the studies in the proportions who oppose and favor.³

³Fluctuations in educational categories in Table 2, which make difficult the pinning down of trends over time, may be a function of actual opinion change in specific education categories. However, we choose to think that such variance is a result of subtle differences in the wording of questionnaire items.

Let us break the "favor" group down into two categories and determine the relationship with education:

TABLE 2A

COMMUNITY SHELTER ACCEPTANCE (EXPANDED), BY EDUCATION
(in percent)

<u>Educational Level</u>	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
	N=709	N=558	N=194
College	17.6	27.6	34.5
High school	54.6	52.3	41.2
Grade school	<u>27.8</u>	<u>20.1</u>	<u>24.3</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

In Table 2A we see that as favorability increases, the proportion which is college educated becomes smaller, whereas the proportion which is high school educated becomes larger. Grade school respondents yield no conclusive change.

TABLE 3

COMMUNITY SHELTER ACCEPTANCE, BY EDUCATION AND OCCUPATION
(in percent)

<u>Occupation</u>	<u>College</u>		<u>High School</u>		<u>Grade School</u>	
	Favor	Oppose	Favor	Oppose	Favor	Oppose
	N=270	N=64	N=660	N=76	N=285	N=43
Professional	34.4	53.1	5.6	9.2	0.7	2.3
Managerial	21.1	20.3	8.6	18.4	5.6	4.7
Clerical, sales, craftsmen	30.0	21.9	40.2	35.6	26.1	28.1
Operatives, service, labor	9.7	3.2	38.7	34.2	54.0	46.6
Farmers and farm laborers	<u>4.8</u>	<u>1.5</u>	<u>6.9</u>	<u>2.6</u>	<u>13.6</u>	<u>18.6</u>
	100.0	100.0	100.0	100.0	100.0	100.0

Source: Pittsburgh T4

Table 3 joins occupation with education. It is seen among the high school and grade school educated that, with the exception of farmers and farm laborers, the proportion that favors shelters tends to rise as occupational level lowers. The favorability among the college educated tends to fluctuate slightly, with no similar pattern evident. Moreover, for those who oppose public shelters, among the high school and grade school educated a pattern much the same as that for favorability emerges: an increase in the proportion opposing shelters as occupational level declines. The greatest opposition to shelters among the college educated resides with the professional occupations.

TABLE 4

COMMUNITY SHELTER ACCEPTANCE, BY EDUCATION AND INCOME
(in percent)

<u>Income</u>	<u>College</u>		<u>High School</u>		<u>Grade School</u>	
	Favor	Oppose	Favor	Oppose	Favor	Oppose
	N=272	N=66	N=660	N=74	N=296	N=44
To \$4 999	15.4	16.7	35.5	33.8	65.9	70.5
\$5,000-\$9,999	44.1	40.9	46.7	37.8	29.1	27.3
\$10,000-above	<u>40.5</u>	<u>42.4</u>	<u>17.8</u>	<u>28.4</u>	<u>5.0</u>	<u>2.2</u>
	100.0	100.0	100.0	100.0	100.0	100.0

Source: Pittsburgh T4

Joining income with education in Table 4, an unusual finding is presented. We determined in Table 3 that college educated professionals tend to be more prevalent in the group that is opposed to shelters. It could be assumed that the income of this group would be high, yet Table 4 shows that the highest income category (\$10,000 and above) yields no essential difference in shelter acceptance. We must conclude, then, that the income of college educated professionals is distributed in such a way that no dominant locus is formed and thus income makes no difference in shelter acceptance. Perhaps a considerable number of respondents who oppose shelters are lower level professionals such as technicians or research assistants; enough, perhaps, to reduce substantially the proportion of higher level college trained professionals who indicate opposition to community shelters. The high school educated, however, show more differences. In this educational level those who favor

are more represented in the middle income range while those who oppose are proportionately higher in the upper income category.

Let us look at social rank in one final way--as respondents perceive their own social class.

TABLE 5

COMMUNITY SHELTER ACCEPTANCE, BY
SELF-PERCEPTION OF SOCIAL CLASS
(in percent)

<u>Social Class</u>	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
	N=665	N=532	N=180
Middle	44.5	47.6	55.0
Working-lower	<u>55.5</u>	<u>52.4</u>	<u>45.0</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

In Table 5 we see that as favorability increases, the proportion perceiving themselves as middle class lowers, while the proportion perceiving themselves as part of the working or lower classes rises.

The middle class, in contrast to the working and lower classes, would be expected to have higher education, occupations and income. We saw earlier that a dominant characteristic of those indicating opposition to shelters was higher education coupled with higher occupation. While we would expect that higher income would accompany this characteristic for those who oppose shelters, in fact we found that this was not true. Those opposing shelters were not differentiated from those who favor shelters by income level. This contradiction may be explained partially in terms of the theory of "status inconsistency." A consistent status would be one in which an individual, or an aggregate of individuals, would hold high, moderate or low status consistently within the three criteria of education, occupation and income. Since status consistency or inconsistency is generally considered relevant to the explanation of given attitudes and behaviors, it is possible that the civil defense attitudes of one small sector of the society, namely certain college educated professionals, may be partially understood in these terms. It would appear that this small sector, though of higher education and occupation, are not necessarily

high earners. This apparent inconsistency in statuses suggests a cause for the existence of an attitude toward shelters which is obviously quite contrary to the dominant belief patterns of the American public. Our data do not prove that college educated professionals oppose shelters because they are low earners, but only that income makes no difference in the proportions of those who oppose and those who favor. Yet, income should make a difference because of its close relationship to the other two criteria of social rank--education and occupation. We cannot provide a definitive solution to the problem, though we think the question is sufficiently interesting to merit additional future research.

2. Attitudes Towards Civil Defense and Protection

We have previously discussed certain characteristics of social rank which are related to community shelter acceptance. Now we will pursue an analysis of other civil defense-relevant attitudes held by sub-groups which favor or oppose community shelters.

TABLE 6

COMMUNITY SHELTER ACCEPTANCE, BY
ATTITUDE TOWARD CIVIL DEFENSE
(in percent)

How do you yourself feel about civil defense?	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
	N=698	N=555	N=194
Favor	97.1	86.3	53.6
Neutral	2.6	12.4	23.2
Opposed	<u>0.3</u>	<u>1.3</u>	<u>23.2</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

In Table 6 we see that as shelter favorability rises, considerably higher proportions of respondents are favorable to civil defense in general, whereas decreasingly lower proportions of respondents are neutral or opposed to civil defense. The meaning seems clear: sentiments of favorability or opposition to community

shelters are reflected also in similar sentiments towards the very concept of civil defense.

With what significant social groups do our major groupings identify?

TABLE 7

COMMUNITY SHELTER ACCEPTANCE, BY IDENTITY GROUP
(in percent)

Which group's opinion on civil defense means most to you?	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
	N=677	N=527	N=180
U. S. Congress	24.1	19.7	17.2
Military leaders	33.5	34.9	30.0
Scientists	15.5	22.2	30.0
Mayor of your city	9.6	7.2	3.3
Local clergymen	4.3	7.2	8.4
	*	*	*

Source: Pittsburgh T4

* Figures do not equal 100%.

In Table 7 as favorability to shelters rises, increasingly higher proportions of respondents find the opinions of Congress and mayors more important on civil defense, whereas decreasingly smaller proportions find scientists' and clergymen's opinions more important. There is no significant trend for the military. The percentage differences in the three shelter opinion groups are not large, but sufficiently different in pattern, we think, to warrant further comment. To begin with, it is evident that the five identity groups in Table 7 are authority groups which construct, implement or critique public policy. The perceived importance of two groups (Congress and mayors) increases as favorability toward shelters rises. These groups, especially Congress, may be seen as being closely identified with and actually mirror going policies on civil defense. As favorability toward shelters rises, it makes sense that the opinion of Congress and mayors would be more meaningful. On the other hand, Table 7 shows that the perceived importance of scientists and clergymen rises as favorability toward shelters lowers. Scientists and clergymen, though authority groups, have a special kind of character which differentiates them from the former authority groups. Scientists and clergymen are more

intellectual and/or moralistic, and may attempt to change or at least question public policy, rather than being mirrors of such policy. The data in Table 7, though by no means conclusive, does hint at the possibility that lower favorability toward community shelters may be identified with social protest, while higher favorability is more identified with conformity with going public policy.

Next let us inquire into the relationship of respondent acceptance of shelters with their perceptions of how the identity groups view civil defense. Table 8 shows the relationship:

TABLE 8

COMMUNITY SHELTER ACCEPTANCE, BY FAVORABILITY
OF SELECTED GROUPS TOWARD CIVIL DEFENSE
AS PERCEIVED BY RESPONDENTS
(in percent)

How do various groups feel about civil defense?	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
Congress	N=674	N=517	N=182
Favor	89.9	86.1	78.6
Neutral	8.8	12.4	14.8
Opposed	<u>1.3</u>	<u>1.5</u>	<u>6.6</u>
	100.0	100.0	100.0
Military	N=682	N=534	N=182
Favor	95.9	93.1	83.5
Neutral	2.6	5.4	9.9
Opposed	<u>1.5</u>	<u>1.5</u>	<u>6.6</u>
	100.0	100.0	100.0
Scientists	N=660	N=519	N=174
Favor	91.5	86.3	65.7
Neutral	6.8	10.6	19.6
Opposed	<u>1.7</u>	<u>3.1</u>	<u>14.7</u>
	100.0	100.0	100.0
Clergymen	N=635	N=488	N=161
Favor	91.3	82.2	65.2
Neutral	7.4	15.6	22.4
Opposed	<u>1.3</u>	<u>2.2</u>	<u>12.4</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

With no exception, Table 8 shows that as respondent favorability toward shelters increases, increasingly higher proportions perceive the identity groups as being favorable to civil defense. However, as favorability toward shelters lowers, increasingly greater proportions of respondents perceive the identity groups as being neutral or opposed to civil defense. This pattern is most pronounced with regard to scientists and clergymen. What Table 8 tends to show is that people project their sentiments onto others. For example, those who are less favorable to community shelters see the identity groups as being less favorably disposed to civil defense than do those who are more favorable to shelters. It must be stressed that this represents only a tendency on the part of respondents, rather than any kind of strong belief that authority groups in the society are neutral or opposed to civil defense. Indeed, it can be seen that no fewer than 65 percent of respondents opposing shelters also view scientists and clergymen as favoring civil defense. Yet, in contrast, 91 percent of the respondents who strongly favor shelters also see scientists and clergymen as favoring civil defense. Clearly, all respondent categories strongly believe that major authority groups in the society favor civil defense. However, those tending to favor shelters, believe this even more strongly.

Let us now turn our attention to the relationship of shelter acceptance to additional civil defense-relevant attitudes.

TABLE 9

COMMUNITY SHELTER ACCEPTANCE, BY ATTITUDE
TOWARD NUCLEAR DEFENSE
(in percent)

There is no defense possible in the event of nuclear war.

	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
	N=667	N=524	N=185
Agree	14.0	19.7	46.5
Disagree	<u>86.0</u>	<u>80.3</u>	<u>53.5</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

As shelter favorability decreases, higher proportions of respondents agree that no defense is possible in the event of nuclear war. Thus, regarding nuclear defense, there is a tendency for greater optimism as shelter favorability increases, while pessimism is more strongly associated with shelter opposition.

TABLE 10

COMMUNITY SHELTER ACCEPTANCE, BY WORRY
ABOUT NUCLEAR ATTACK
(in percent)

How much do you worry about the possibility of a nuclear attack?	<u>Strongly Favor</u> N=709	<u>Somewhat Favor</u> N=558	<u>Oppose</u> N=194
Great deal or some	54.2	41.2	31.5
Little or none	<u>45.8</u>	<u>58.8</u>	<u>68.5</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

In Table 10 we see that as shelter favorability increases, higher proportions of respondents claim to be worried about the possibility of nuclear attack, while as shelter favorability decreases, proportionately more respondents claim to be worried little or none.

Respondents' beliefs about the effects of fallout shelters shows the following:

TABLE 11

COMMUNITY SHELTER ACCEPTANCE, BY WORRY
DUE TO FALLOUT SHELTERS
(in percent)

Do fallout shelters make people worry more or less about the possibilities of war?	Strongly Favor	Somewhat Favor	Oppose
	N=697	N=545	N=193
More	23.7	31.6	42.0
Less	33.0	17.4	13.0
No difference	<u>43.3</u>	<u>51.0</u>	<u>45.0</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

As shelter favorability increases, lower proportions believe shelters create more worry while higher proportions believe they cause less worry. Further, significant proportions of respondents in all categories believe the existence of shelters make no difference on the worry issue.

Let us investigate the relationship of shelter favorability to worry somewhat further. We have seen that an increase in shelter favorability is associated with an increase in personal worry over nuclear attack (Table 10), but a decrease in general worry that fallout shelters make war more possible (Table 11). The percentage differences are not great, but they are nevertheless adequate to show a trend. Our data show that people who are more favorably disposed to shelters are more likely to consider them not to be as anxiety provoking as do people who are opposed to them. It seems only natural that those with favorable shelter sentiments would tend to regard them somewhat favorably in their other aspects.

It makes sense, also, to think that those who oppose shelters and are more likely to believe that they make people worry more about the possibility of war are motivated by the belief that civil defense programs are provocative of war. This attitude pattern would appear to be independent of the finding that people who are more favorably disposed to shelters are more likely to worry about the possibility of a nuclear attack than are those who oppose shelters. It will be recalled that as shelter favorability increases, so does worry over the possibility

of a nuclear attack. Such an attitude pattern has many avenues of explanation. It may be based on an increasing belief that war is probable, a lack of confidence in the active defenses of the U. S., an acute sensitivity to the possibilities of nuclear war based on higher information levels or greater interest, etc. Those who oppose shelters while worrying little or not at all about a nuclear attack may embody a relatively unified belief pattern whose essence is that a shelter program is to be opposed because the possibilities of nuclear attack are of low probability.⁴ These comments, though highly speculative, further suggest that measured opinions are based on complex configurations of latent attitudes whose arrangement may not be readily visible. Unfortunately, our data do not permit an extended analysis.

⁴Looking at those who oppose shelters in comparison to those who strongly favor shelters (rather than in trend terms), there are only 132 respondents (68.5 percent) who are opposed to shelters and worry little about nuclear attack, whereas there are 319 respondents (45.8 percent) who strongly favor shelters and worry little. In gross numbers, then, many more Americans strongly favor shelters than oppose them (of those who worry little about nuclear attack). This fact is of considerable importance, in and of itself. At the same time, the tendency outlined above, namely that as shelter favorability rises so does the inclination to worry about nuclear attack, is also important.

TABLE 12

COMMUNITY SHELTER ACCEPTANCE, BY SELECTED ATTITUDES
TOWARD CIVIL DEFENSE ISSUES
(in percent)

<u>Questions:</u>	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
How good are survival chances in shelters, if nuclear war:	N=706	N=550	N=188
Good	29.2	32.0	28.2
50-50	15.6	10.9	8.5
Bad or no chance	<u>55.2</u>	<u>57.1</u>	<u>63.3</u>
	100.0	100.0	100.0
If war, would you try to use a shelter if one were available?	N=704	N=547	N=190
Would try	94.3	85.9	56.3
Would not try	<u>5.7</u>	<u>14.1</u>	<u>43.7</u>
	100.0	100.0	100.0
Would you go to a public shelter if an attack came while you were at home?	N=530	N=435	N=151
Decided not to go	6.6	10.8	17.9
Considered, but no decision	33.4	43.0	36.4
Decided to go	46.0	24.6	9.9
Never considered	<u>14.0</u>	<u>21.6</u>	<u>35.8</u>
	100.0	100.0	100.0
Do fallout shelters make war more likely?	N=695	N=553	N=194
More likely	5.0	8.0	16.4
Less likely	8.8	6.7	2.6
No difference	<u>86.2</u>	<u>85.3</u>	<u>81.0</u>
	100.0	100.0	100.0
Has Viet Nam made you more concerned about an improved civil defense program?	N=707	N=556	N=195
More concerned	52.6	30.8	16.4
Less concerned	1.8	2.0	3.6
No difference	<u>45.6</u>	<u>67.2</u>	<u>80.0</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

Table 12 shows the relationship of shelter acceptance to selected attitudes toward civil defense issues. We see that as shelter attitude varies from oppose to strongly favor, a rather small proportional increase occurs among respondents claiming shelters offer a 50-50 chance, while a small decrease occurs for those believing their chances are bad or non-existent. As shelter favorability increases, there is a considerably higher likelihood that people would try to use a shelter if such were available. As shelter favorability decreases, there is an increase in the proportion of respondents who have decided not to go to a public shelter if an attack came while they were at home, as well as an increase in the proportion who have not even considered what to do. However, with higher shelter favorability, there is a considerably higher proportion of respondents who have decided to go to a shelter if an attack came while they were at home. Lastly, as shelter favorability increases, considerably higher proportions of respondents claim that Viet Nam has made them more concerned about an improved civil defense program, while progressively lower proportions claim Viet Nam has made no difference.

The findings in Table 12 suggest that there is a reasonable likelihood that a specific shelter attitude (ranging from strongly favor to oppose) will directly relate to attitudes on other civil defense-relevant issues. There is, thus, a tendency for attitudes to be "hardened" over a variety of related, but substantively different, civil defense issues.

We find a similar trend in another civil defense dimension appearing in the following table:

TABLE 13

COMMUNITY SHELTER ACCEPTANCE, BY LIKELIHOOD OF
VOLUNTEERING FOR CIVIL DEFENSE
(in percent)

If a call went out, would you be likely to volunteer for a civil defense program?	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
	N=650	N=504	N=182
Likely to volunteer	80.0	62.3	47.3
Not likely to volunteer	<u>20.0</u>	<u>37.7</u>	<u>52.7</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

As shelter favorability increases in Table 13, so does the likelihood of volunteering for civil defense. The behavioral level implicit in the notion of volunteering adds another dimension to civil defense orientations. The relationship of shelter favorability to likelihood of volunteering is consistent with the relationships at the attitudinal level found in the preceding data. Thus, as shelter favorability increases, the likelihood is greater that people will be more favorable to related civil defense issues as well as more inclined toward active participation in civil defense programs.

The civil defense relevant attitudes and behaviors displayed in Tables six through 13 were analyzed according to variations in educational level. In general, education made little difference in the direction of a civil defense attitude, however, the intensity of the attitude varied somewhat as education changed. Table 14 shows this:

TABLE 14

COMMUNITY SHELTER ACCEPTANCE, BY THE INFLUENCE OF
VIET NAM ON RESPONDENTS CONCERN FOR
CIVIL DEFENSE, AND BY EDUCATION
(in percent)

Viet Nam's Impact on Concern for Civil Defense	<u>College</u>		<u>High School</u>		<u>Grade School</u>	
	Favor	Oppose	Favor	Oppose	Favor	Oppose
	N=278	N=67	N=677	N=80	N=307	N=47
More concern	26.6	4.5	45.2	22.5	52.8	23.4
Less concern	1.5	4.5	1.6	5.0	2.9	0.0
No difference	<u>71.9</u>	<u>91.0</u>	<u>53.2</u>	<u>72.5</u>	<u>44.3</u>	<u>76.6</u>
	100.0	100.0	100.0	100.0	100.0	100.0

Source: Pittsburgh T4

The civil defense-relevant attitudes also were analyzed according to additional variables, on the hunch that the attitudes may be influenced by other individual characteristics. Generally, these individual characteristics did not make much of a difference in the direction of the attitudes, but in some instances, as in education (Table 14), the intensity was affected. Table 15 gives a further illustration:

TABLE 15

COMMUNITY SHELTER ACCEPTANCE, BY LIKELIHOOD OF VOLUNTEERING
FOR CIVIL DEFENSE, AND BY SEX
(in percent)

Likelihood of Volunteering for Civil Defense	<u>Male</u>		<u>Female</u>	
	Favor	Oppose	Favor	Oppose
	N=597	N=110	N=670	N=84
Likely to volunteer	72.9	46.4	59.6	40.5
Not likely to volunteer	<u>27.1</u>	<u>53.6</u>	<u>40.4</u>	<u>59.5</u>
	100.0	100.0	100.0	100.0

Source: Pittsburgh T4

It is clear in Table 16 that the direction of the attitude toward volunteering is determined to a great extent by attitude to shelters, but that men seem to hold their attitude toward volunteering more strongly than women.

Likewise, the kind of community in which respondents live does not greatly influence the direction of their civil defense attitudes:

TABLE 16

COMMUNITY SHELTER ACCEPTANCE, BY LIKELIHOOD OF VOLUNTEERING
FOR CIVIL DEFENSE, AND BY TYPE OF COMMUNITY
(in percent)

Likelihood of Vol- unteering for Civil Defense	<u>Large City</u>		<u>Smaller City</u>		<u>Non-City</u>	
	Favor	Oppose	Favor	Oppose	Favor	Oppose
	N=269	N=59	N=524	N=76	N=473	N=59
Likely to volunteer	63.9	40.7	67.4	39.5	65.3	52.5
Not likely to volunteer	<u>36.1</u>	<u>59.3</u>	<u>32.6</u>	<u>60.5</u>	<u>34.7</u>	<u>47.5</u>
	100.0	100.0	100.0	100.0	100.0	100.0

Source: Pittsburgh T4

Our tentative conclusion at this point is that once a civil defense attitude is set, it tends to override the influence of other individual characteristics. Further, a general orientation tends to become implanted which for some people influences other, related attitudes. For example, using the University of Pittsburgh T4 data, an analysis was made of those opposing community shelters to determine the proportion of respondents who had consistent negative attitudes towards three civil defense issues. Of the 188 respondents who opposed community shelters, 83.5 percent (157) said that they were less concerned or indifferent toward civil defense as a result of Viet Nam. Of those who felt less concern or no difference, 60.5 percent said they would not volunteer for civil defense or were undecided. Of this latter group, 51.0 percent said they would not try to use a shelter in case of nuclear war. It is important to point out that the remaining group represents only one-quarter (some 47 respondents) of the original group which opposed shelters. Yet, this is a hard core of opposition to civil defense issues whose attitudes appear to be consistently negative.

Given the facts just outlined, let us briefly look at several non-attitudinal respondent characteristics to see if relationships with community shelter acceptance can be found.

3. Social Attachments

The extent to which people are tied into social relationships often greatly influences their orientations toward the world. We will look at several common social attachments to determine how these bear upon community shelter attitudes.

TABLE 17

COMMUNITY SHELTER ACCEPTANCE, BY MARITAL STATUS
(in percent)

<u>Study</u>	<u>Marital Status</u>	<u>Favor</u>	<u>Oppose</u>
C-E-I-R, 1962		N=303	N=56
	Single	3.6	7.1
	Married	91.7	83.9
	Other	<u>4.7</u>	<u>9.0</u>
		100.0	100.0
Pittsburgh T4, 1966		N=1268	N=195
	Single	7.3	6.1
	Married	80.8	74.4
	Other	<u>11.9</u>	<u>19.5</u>
		100.0	100.0

Those who favor shelters have a slightly higher likelihood of being married. At the same time, those opposing shelters are proportionately higher in the "other" marital category (divorced, widowed and separated).

TABLE 18

COMMUNITY SHELTER ACCEPTANCE, BY NUMBER IN HOUSEHOLD
(in percent)

<u>Number in Household</u>	<u>Strongly Favor</u>	<u>Somewhat Favor</u>	<u>Oppose</u>
	N=708	N=558	N=194
One to two members	31.2	35.7	46.4
Three to five members	52.4	51.1	36.1
Above five members	<u>16.4</u>	<u>13.2</u>	<u>17.5</u>
	100.0	100.0	100.0

Source: Pittsburgh T4

In Table 18 we see that as favorability toward shelters increases, lower proportions of household have one or two members, whereas increasingly higher proportions of households have three to five members. There is no association between shelter favorability and households above five members. Now it is probable that a considerable number of households with only one or two members consist of those whose members are divorced, widowed or separated or whose members may be older citizens. These types of people may be considered to have fewer social attachments.

TABLE 19

COMMUNITY SHELTER ACCEPTANCE, BY EXISTENCE OF YOUNGER CHILDREN
(in percent)

<u>Study</u>	<u>Younger Children</u>	<u>Favor</u>	<u>Oppose</u>
C-E-I-R, 1962		N=303	N=56
	Some	72.3	55.4
	None	<u>27.7</u>	<u>44.6</u>
		100.0	100.0
Pittsburgh T4, 1966		N=1268	N=195
	Some	45.7	35.9
	None	<u>54.3</u>	<u>64.1</u>
		100.0	100.0

The two studies in Table 19 are consistent in that those who favor shelters are proportionately higher in the existence of younger children than are those who oppose community shelters.

In summary, social attachments have certain relationships to community shelter acceptance. Increased social attachments may not necessarily cause people to be more favorably disposed to shelters, but we think they bear upon such an attitude. Being married, having a moderate size household and having some younger children consistently tend to be related to a more favorable shelter stance. These characteristics, of course, represent a more established and stable set of circumstances in the American family. It is interesting, in contrast, that those who oppose shelters are proportionately higher in the divorced, widowed or separated category. These individuals may be viewed as having severed significant social ties, the result being, conceivably, a lesser state of normative integration with the society and a more negative orientation toward issues which officials of the society define as important. Having no younger children is related to this idea, yet in a somewhat different way. Those without younger children have lesser protective responsibilities, so that the issue of public shelters, though of saliency to the individuals themselves, becomes of less immediate concern. We think, then, that a possible locus of shelter opposition consists of the unattached, the detached, perhaps the alienated; those who, for various reasons, take the normative prescriptions of the society less seriously than do those with higher levels of social attachments.

4. Other Selected Social Identities

We will now investigate several additional social characteristics that often serve to differentiate people.

TABLE 20

COMMUNITY SHELTER ACCEPTANCE, BY TYPE OF COMMUNITY
(in percent)

<u>Type of Community</u>	<u>Favor</u>	<u>Oppose</u>
	N=1268	N=195
Standard metropolitan (large city)	21.2	30.8
Other metropolitan (smaller city)	40.5	38.5
Non-city	<u>38.3</u>	<u>30.7</u>
	100.0	100.0

Source: Pittsburgh T4

Of those who favor shelters, a smaller proportion live in the large cities than those who oppose shelters. This finding may not necessarily be interpreted as reflecting a basic "big city" characteristic. It may be more sensible to think of the difference as simply reflecting the location where more people live who oppose shelters. Our earlier findings suggested the existence of certain sectors of opposition to community shelters, namely, a certain proportion of higher educated professionals, a group with possible social protest traits, a group with civil defense attitudes that may be negatively "hardened" and a group possibly with alienated tendencies. It is reasonable to think that individuals from these groups live in the nation's largest cities rather than large cities themselves being responsible for shelter unfavorability. This latter idea defies logic because of the high probability of these locations being target areas.

TABLE 21

COMMUNITY SHELTER ACCEPTANCE, BY AGE
(in percent)

<u>Study</u>	<u>Age</u>	<u>Favor</u>	<u>Oppose</u>
AIPO 627, 1960		N=1857	N=410
	To 29	18.5	14.1
	30 to 49	50.0	41.7
	50 and above	<u>31.5</u>	<u>44.2</u>
		100.0	100.0
Pittsburgh T4, 1966		N=1263	N=194
	To 29	23.3	13.4
	30 to 49	40.5	40.8
	50 and above	<u>36.2</u>	<u>45.8</u>
		100.0	100.0

In Table 21 proportionately more who favor shelters are younger and middle age than those who oppose shelters. Proportionately more who oppose are older than those who favor community shelters. This pattern seems to hold over time. Younger people (here we are dealing with those over age 20) and, to a great extent, those in the middle years may be viewed as being more in touch with the society and its goals. They therefore may be more prone to take on the societal prescriptions to a greater extent than older people. This should apply, logically, to the prescriptions pertaining to civil defense.

TABLE 22

COMMUNITY SHELTER ACCEPTANCE, BY SEX
(in percent)

<u>Study</u>	<u>Sex</u>	<u>Favor</u>	<u>Oppose</u>
AIPO 627, 1960		N=1867	N=412
	Male	47.7	62.1
	Female	<u>52.3</u>	<u>37.9</u>
		100.0	100.0
C-E-I-R, 1962		N=303	N=56
	Male	50.5	53.6
	Female	<u>49.5</u>	<u>46.4</u>
		100.0	100.0
Pittsburgh T4, 1966		N=1267	N=194
	Male	47.1	56.7
	Female	<u>52.9</u>	<u>43.3</u>
		100.0	100.0

Table 22 indicates that the favor sub-groups have consistently higher proportions of females over time than do the oppose sub-groups. In attempting to interpret this finding, one could speculate that many social issues draw opposition sentiments from more men than women due to the culturally defined male role. Perhaps this is partially due to the expectation that engagement in "healthy" debate as well as opposition to the status quo or public policy is a masculine "trait."

In summary, the three social characteristics analyzed in this section show interesting patterns relevant to community shelter acceptance. We believe that where one lives and one's sex, in themselves, are not highly responsible for civil defense attitudes. Instead, these characteristics tend to accompany, in interesting and unique ways, a pre-existing attitude. Age, on the other hand, may have certain causal properties on its own behalf and thus may be somewhat responsible for the very existence of an attitude.

D. Conclusions

The data presented in this section suggest several conclusions. Though there are some correlations between shelter attitudes and standard demographic variables, we think these take on less

importance than the more "basic" civil defense attitudes. Favoring or opposing the idea of community shelters appears to be related to other civil defense-relevant attitudes. The kinds of people, demographically speaking, who hold these attitudes come from several social sectors. First, we think that there is a small hard-core of fairly well educated, professional people who have strong ideological sentiments about issues of war and peace. Our data do not permit more than speculation on the existence of this ideologically committed group. Still, we saw that a hard core resistance to civil defense issues was manifested by a fairly large proportion of the oppose sub-group. This grouping may live in the larger metropolitan centers and may be dominated by men. Further, negative or positive sentiments on several civil defense issues were reasonably closely associated.

We found that higher proportions of those who favor shelters are married, have a moderate number in their households and have some younger children. Higher proportions of those who oppose shelters are divorced, widowed or separated or have small households (one or two people) or have no younger children. The former clearly represent people who are more socially attached and have involvements with and responsibilities for others, while the latter is less committed to other people. A more favorable orientation to the protective possibilities of civil defense is positively associated with responsibility for others.

Lastly, a sector of shelter opposition based on age was located in the data. A higher proportion of those who were older were opposed to shelters, while a higher proportion of those who were younger were in favor of shelters. We think that opposition based on age reflects a process of withdrawal from the social order which is more characteristic of older people than younger.

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III. PATTERNS OF PREFERENCE FOR COMMUNITY OR PRIVATE SHELTERS

The preceding section investigated the patterns of public favorability or opposition to the idea of community fallout shelters. Now we will approach the public's orientations to shelters in a different way. We will inquire into patterns of preference for either community or private shelters and attempt to submit reasons for such preferences in terms of individual characteristics of the respondents.

A. The Nature of the Protective Role in Society

To lay a foundation for understanding the data presentation which follows, a brief review of the nature of the protective role in society is appropriate. We will attempt to summarize information about the types of people who are more responsive and less responsive to threatening situations.⁵

Research conducted to explain general anxiety about war and the cold war reveals that people with higher economic status tend to worry less about war than do those with lower economic status. However, people with higher education and information tend to worry more. The young worry more than the aged, the married more than the non-married, women more than men, Catholics more than Protestants, and those with high religious commitment more than those with low commitment.⁶

Research designed to understand the nature of response to crisis shows that people make appropriate and less random responses if they possess higher education and information, have more exposure to past crises, hold statuses which are consistent with each other, belong to cohesive groups with which there is strong identification, have family ties, are younger, more optimistic,

⁵A fairly comprehensive review of the crisis and disaster literature appears in Robert H. Mast, The Sociology of Adaptation to Threat, Ph.D. Dissertation, Department of Sociology, University of Pittsburgh, 1967.

⁶See "General Anxiety and War Anxiety," Working Paper No. 6, in Gene N. Levine and John Modell, The Threat of War and American Public Opinion, Bureau of Applied Social Research, Columbia University, September, 1964, pp. 1-11.

more efficacious, more action oriented and more prone to take steps to protect themselves.⁷

Research conducted to explain why some people take more active steps in adjusting to or combating various health threats shows that such people have higher incomes, higher prestige, are prone to higher participation in organizations, have consistent statuses and greater civic pride.⁸

Studies which analyzed those who build fallout shelters show that such people are better educated, are somewhat authoritarian and socially conservative, are future-oriented, are younger, are parents, live in larger households, have had military experience, are homeowners and are more aggressive.⁹

From extant research on war anxiety, crisis response, health threat response and shelter builders comes the following general

⁷See, Hadley Cantril, The Invasion from Mars (Princeton: Princeton University Press, 1940); Enrico Quarantelli, "Images of Withdrawal Behavior in Disasters: Some Basic Misconceptions," Social Problems, Vol. 8 (Summer, 1960), p. 72; George and Patricia Nash, Attitudes During the Blackout, Bureau of Applied Social Research, Columbia University (December, 1965); Leonard J. Pinto, Social and Cultural Determinants of Anxiety in a Crisis Situation, Ph.D. Dissertation, Department of Sociology, University of Chicago, (March, 1965), pp. 15-16.

⁸See, Arnold Simmel, "A Signpost for Research on Fluoridation Conflicts: The Concept of Relative Deprivation," Journal of Social Issues, Vol. XVII (1961), pp. 26-36; Nahum Medalia, Community Perception of Air Quality: An Opinion Survey in Clarkson, Washington, Division of Air Pollution, Public Health Service, U. S. Department of Health, Education and Welfare (June, 1965), p. ix.

⁹See, Stephen Withey, The U.S. and the U.S.S.R., Survey Research Center, Institute for Social Research, University of Michigan (March, 1962), pp. 13-14; John Y. Lu, Leo G. Reeder and Robert J. Wolfson, Community Attitudes and Action on the Fallout Shelter Issue, C-E-I-R, Los Angeles Center, Beverly Hills, California (no date), pp. v-vi; Gerald E. Klomglan, George M. Beal and Joe M. Bohlen, Family Adoption of Public Fallout Shelters, Iowa Agricultural and Home Economics Experiment Station, Iowa State University (1964); Peter I. Rose, "Citizen's Opinions on Civil Defense," Council for Correspondence Newsletter, No. 24 (March, 1963), p. 27; Gene N. Levine and John Modell, The Threat of War and American Public Opinion, Bureau of Applied Social Research, Columbia University (November, 1964); Robert H. Mast, Impact of the Cuban Missile Crisis: Patterns of Public Response, Department of Sociology, University of Pittsburgh, (February, 1966).

profile of characteristics of the more active and responsive performer of the protective role in society:

"Individuals with stronger social identity, attachments, skills, resources, integration and experience more actively search for threat resolution in the performance of their protective-adaptive role. We also have seen that certain personality or attitudinal characteristics or states appear to accompany the more active performers. These include tendencies toward higher aggressiveness, higher optimism, higher personal efficacy and lower anxiety. Finally, it makes sense to conceive of those who actually do engage in more active threat behavior to be exhibiting a greater need for protection."¹⁰

What are the implications of the above profile for civil defense protective orientations? Clearly, we could predict that individuals with characteristics closely approximating those of the profile would tend to take more active steps in protecting self and family, whether the shelter system were community or private. This would assume, of course, that no choice between the two systems was available. The individual might choose either direction since the expectation of the protective role requires some protective decision rather than no decision. But what if a choice were to be made by performers of the protective role? Would those who conform more closely to the profile tend to prefer community or private shelters?

We note that, among other characteristics, a dominant mode appears to be that of primary group centeredness. This is seen in one of the main characteristics of the profile--stronger attachments, which include more cohesive family groups, more parents, more homeowners and more households with greater than two members. We will now turn to a review of survey data which delineates the patterns of preference for alternative shelter systems.

B. Public Preference for Community or Private Shelters

A review of surveys tapping opinion on community or private preferences revealed four studies. Responses appear in Table 23:

¹⁰Mast, op. cit., pp. 61-62.

TABLE 23

**PUBLIC PREFERENCES FOR COMMUNITY OR PRIVATE SHELTERS
(in percent)**

<u>Study</u>	<u>Question</u>	<u>Community</u>	<u>Private</u>	<u>Neither</u>	<u>Other Responses</u>	<u>Total Respondents</u>
Michigan Dec., 1961	When you think about having a satisfactory shelter that is at least worth going to, what kind of a place do you think of?	50.0	30.0	3.0	17.0	1474
AIPO 652 Nov., 1961	Should more emphasis be placed on building home fallout shelters or more emphasis on building community fallout shelters?	58.0	21.8	7.6	12.6	2741
BASR Jan., 1963	In case of nuclear attack, would you rather be in your private shelter or in a community shelter?	39.0	38.0	9.0	14.0	1379
Pgh. T1 July, 1963	In case of nuclear attack, would you rather be in your private shelter or in a community shelter?	49.7	40.9	2.2	7.2	1424

Data in Table 23 show one overriding fact: Americans' orientations favor community more than private shelters. It is to be noted that the question wording in the Michigan and AIPO studies is different from the BASR and Pittsburgh studies. All four studies tap preferences, but where wording differs, a slightly different response pattern can be expected. The BASR and Pittsburgh questions are identical, yet we see different response patterns, especially in the proportion of respondents who prefer community shelters. Part of this difference may result from the different sampling frames. BASR sampled in nine eastern communities, whereas Pittsburgh employed a national probability sample. Because of these differences (wording and sampling), it is not possible to comment on attitude changes over time. Generally, it is safe to conclude that, from the several approaches to the issue, half or more of the national population prefers community shelters over other possible shelter arrangements.

C. Comparative Analysis of Groups Preferring Community or Private Shelters

We will consider as one group all those respondents indicating a community shelter preference, and those indicating private shelter preference as another group. All other response categories will be dropped. Our objective is to locate differences in the two groupings as partial explanations for such preferences.

Let us begin this analysis with a look at self-initiated protection:

TABLE 24

SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION
(in percent)

<u>Study</u>	<u>Question</u>	<u>Community</u>	<u>Private</u>
AIPO 652 Nov., 1961	Do you plan any changes in your home for protection in case of nuclear attack?	N=1557	N=572
	Yes	11.3	20.5
	No	88.7	79.5
		<u>100.0</u>	<u>100.0</u>
Pgh. T1 July, 1963	Even though you haven't set up a shelter, are you and your family protected in any way in case of nuclear attack?	N=678	N=544
	Yes	21.7	29.2
	No	78.3	70.8
		<u>100.0</u>	<u>100.0</u>

Table 24 shows that in the 1961 study proportionately more who prefer private shelters intend to take active protective steps, while the 1963 study shows that proportionately more preferring private shelters claim to have taken active steps. The proportion differences are similar. Let us pursue further the relationship of self-initiated protection and shelter preference by observing their interaction with several other variables.

First, a look at several civil defense-relevant attitudes reveals the following:

TABLE 25

SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION
AND DESIRABILITY OF CIVIL DEFENSE FUTURES
(in percent)

<u>Civil Defense Future</u>	<u>Have Protection</u>		<u>Have No Protection</u>	
	Community	Private	Community	Private
Most Americans will provide themselves with fallout shelters at their own expense.				
Respondents' Desirability: N=150	N=156		N=517	N=385
Not Desirable	28.0	21.2	30.2	21.8
Neutral	22.0	19.2	21.3	21.8
Desirable	<u>50.0</u>	<u>59.6</u>	<u>48.5</u>	<u>56.4</u>
	100.0	100.0	100.0	100.0
Respondents' Perception of Neighbors' Desirability:				
N=142	N=155		N=522	N=378
Not Desirable	47.9	34.2	49.1	42.6
Neutral	21.1	23.2	20.1	20.4
Desirable	<u>31.0</u>	<u>42.6</u>	<u>30.8</u>	<u>37.0</u>
	100.0	100.0	100.0	100.0
Most American families will have family fallout shelters with financial help from the government.				
Respondents' Desirability: N=150	N=156		N=518	N=385
Not Desirable	19.3	21.8	19.3	21.0
Neutral	18.0	9.6	14.3	13.6
Desirable	<u>62.7</u>	<u>68.8</u>	<u>66.4</u>	<u>65.4</u>
	100.0	100.0	100.0	100.0

TABLE 25 (Cont'd.)

Respondents Perception of Neighbors' Desirability:	N=142	N=154	N=510	N=378
Not Desirable	25.4	19.5	21.2	18.2
Neutral	15.5	13.0	18.8	14.3
Desirable	<u>59.1</u>	<u>67.5</u>	<u>60.0</u>	<u>67.5</u>
	100.0	100.0	100.0	100.0

Source: Pittsburgh T1

The desirability attributions to the two civil defense futures in Table 25 reveal negligible differences between those who have protection and those who do not. But there are some differences between groups with different shelter preferences, as these are viewed in relation to whether or not they are protected. Though the tendency is not strong, respondents who have protection seem to more strongly prefer one over the other shelter type when responding to the desirability of civil defense futures. Yet, this should not detract from another tendency in Table 25, namely, that shelter preference seems to influence the desirability of civil defense futures. Those preferring community shelters tend to find less desirable the idea of Americans providing their own shelters than do those who are more committed to private shelters. Interestingly, when posed with the idea of the government helping financially, the community-private distinction, as well as the state of protection, seems to have little bearing on respondents' beliefs. It seems clear that the existence of an attitude toward either community or private shelters has a bearing on other civil defense attitudes. For a portion of the American public, it appears that a sense of self-responsibility pervades the shelter question. It is here assumed that certain people manifest their protective responsibility by being more home shelter oriented. These people, then, tend more to accept civil defense propositions bearing upon their self-responsibility, even to the extent of finding it more desirable to assume the necessary expenses. This attitude seems to be slightly enhanced if the condition exists where these people have already made some efforts at protecting themselves. For further amplification of these tentative conclusions let us look at other attitudinal characteristics.

The Pittsburgh T1 (July, 1963) study was reviewed for other differences in civil defense attitudes between those preferring community and private shelters, as related to protection. For example, regardless of being or not being protected, there was no difference in the two shelter preference groups' attitudes towards the proposition: "People shouldn't take seriously all

the talk about being protected by fallout shelters." Also, there was no difference in the two groups' perceptions about how "married people with children" feel about civil defense. There was a moderate difference in sentiments as to how civil defense should be organized.

TABLE 26

SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION AND DESIRABILITY OF CIVIL DEFENSE AS A NEAR-MILITARY ORGANIZATION
(in percent)

Desirability of Civil Defense as a Near-Military Organization.	<u>Have Protection</u>		<u>Have No Protection</u>	
	Community	Private	Community	Private
	N=150	N=157	N=522	N=382
Not desirable	16.1	19.7	15.6	23.8
Neutral	12.7	7.8	7.8	11.3
Desirable	<u>71.2</u>	<u>72.5</u>	<u>76.6</u>	<u>64.9</u>
	100.0	100.0	100.0	100.0

Source: Pittsburgh T1

Table 26 shows that those having protection do not differ according to their community-private preferences, except slightly in the neutrality area. However, those having no protection, but preferring community shelters, find the concept of a near-military organization somewhat more desirable than their counterparts who prefer private shelters. Perhaps an additional glimmer of difference in the community vs. private distinction is here revealed. Since community shelter preference is somewhat related to desirability of a near-military organization under the conditions of no protection, it might be suggested that a sector of those preferring community shelters could be cast as a dependency type. This, of course, is speculative.

Pursuing the relationship of shelter preference and state of protection, let us observe the interaction with another variable in Table 27:

TABLE 27

SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION
AND CONFIDENCE IN ENVIRONMENTAL HELP
(in percent)

In the event of a nuclear attack, do you think that people in this neighborhood would tend to help each other out or would they just look out for themselves?

	<u>Have Protection</u>		<u>Have No Protection</u>	
	<u>Community</u>	<u>Private</u>	<u>Community</u>	<u>Private</u>
	N=146	N=148	N=506	N=373
Help each other out	71.2	64.2	72.1	61.9
Look out for themselves	<u>28.8</u>	<u>35.8</u>	<u>27.9</u>	<u>38.1</u>
	100.0	100.0	100.0	100.0

Source: Pittsburgh T1

Whether protected or not, those with a community shelter preference believe more strongly than those with a private shelter preference that neighborhood people would help in the event of a nuclear attack. The interpretation of this finding might take several directions.

First, it is conceivable that a sector of the society is "other-directed." That is to say, a sector may be characterized as embracing a personality type which seeks the company of others and is relatively comfortable in that company. This type may be "other-directed" in a variety of institutional arrangements, including that of shelter systems. If such is the case, there may be reason to think that this sector would prefer the community shelter concept, rather than private, and have confidence that people would help each other.

It is also possible that dependency, rather than "other-directed," is a more feasible explanation. There are different kinds of dependency in the complex structures of American society. The most obvious kind is that created by low social status, involving low levels of educational, occupational and income resources. Such low status reduces individual flexibility, mobility, independence and efficacy. However, data from both AIPO 652

(November, 1962) and Pittsburgh T1 (July, 1963) revealed that educational level and self-perception of social class made virtually no difference in shelter preference. Indeed, the interaction of social class and education showed no difference whatsoever. At the same time, when respondents believed others would help in an emergency, those of moderate and lower education, but not those of higher education, tended to prefer community shelters. We would assert, therefore, that only within specific conditions is a dependency interpretation feasible. In the present instance, those in a lower social status who believe others will help in an emergency are more prone to a community shelter orientation.

Let us view dependency according to the social attachments of people. We might hypothesize: the fewer the social attachments, the greater the dependency. Further, the greater the dependency, the greater the preference for community shelters. Let us look at other shelter preference data to test these hypotheses:

TABLE 28

SHELTER PREFERENCE, BY MARITAL STATUS
(in percent)

<u>Marital Status</u>	<u>Community</u>	<u>Private</u>
	N=707	N=583
Single	9.3	6.9
Married	74.7	85.9
Other	<u>16.0</u>	<u>7.2</u>
	100.0	100.0

Source: Pittsburgh T1

Those preferring private shelters are proportionately higher in the "married" category, but lower in the "single" and "other" marital categories. Married people are more socially attached, by definition, but whether they are more dependent than those in other marital statuses is another matter. Married people are more dependent within the primary family group, but not necessarily more dependent upon secondary group relationships. There is no immediate reason to think that a non-married status will always be associated with external dependency relationships.

Indeed, for many it is probable that isolation will be the case. Yet, it does seem sensible to think that the tendency for the non-married to prefer community shelters has much to do with having fewer built-in social attachments. Let us look at social attachments in another way:

TABLE 29

SHELTER PREFERENCE, BY EXISTENCE OF YOUNGER CHILDREN
(in percent)

<u>Younger Children</u>	<u>Community</u>	<u>Private</u>
	N=706	N=582
Some children	46.6	52.2
No children	<u>53.4</u>	<u>47.8</u>
	100.0	100.0

Source: Pittsburgh T1

In Table 29, those preferring private shelters show a slightly higher tendency to have some children. Pursuing further the influence of children, let us impose again the condition of being protected or not.

TABLE 30

SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION
AND EXISTENCE OF YOUNGER CHILDREN
(in percent)

<u>Younger Children</u>	<u>Have Protection</u>		<u>Have No Protection</u>	
	<u>Community</u>	<u>Private</u>	<u>Community</u>	<u>Private</u>
	N=151	N=157	N=525	N=385
Some children	45.7	59.9	46.9	49.6
No children	<u>54.3</u>	<u>40.1</u>	<u>53.1</u>	<u>50.4</u>
	100.0	100.0	100.0	100.0

Source: Pittsburgh T1

We note in Table 30 that having protection and having children is associated with a stronger preference for private shelters. Little difference in shelter preference is seen for those having no protection, regardless of children. We can now say with some certainty that membership in the primary family group is associated with a private shelter preference if some steps already have been taken to protect the group.

It can be noted in passing that further data from Pittsburgh T1 shows that proportionately more people prefer private shelters if they own their own home and live in single family dwelling units. This can be partially accounted for by a kind of attachment to physical property.

We believe that the primary group attachment makes a difference in shelter preferences. Primary groups, however, are composed of both men and women. Let us see what difference sex makes on shelter preference.

TABLE 31

SHELTER PREFERENCE, BY SEX
(in percent)

<u>Study</u>	<u>Sex</u>	<u>Community</u>	<u>Private</u>
AIPO 652 Nov., 1961		N=1590	N=596
	Male	46.2	53.7
	Female	<u>53.8</u>	<u>46.3</u>
		100.0	100.0
Pgh., T1 July, 1963		N=709	N=583
	Male	40.3	51.1
	Female	<u>59.7</u>	<u>48.9</u>
		100.0	100.0

The higher preference for community shelters by women in AIPO 652 is born out, and even accentuated in Pittsburgh T1. Are there inherent differences in the sexes that are sufficiently strong to explain the differences in shelter preferences? Perhaps differences in education would wash out this shelter preference difference:

TABLE 32

SHELTER PREFERENCE, BY EDUCATION AND SEX
(in percent)

<u>Sex</u>	<u>College</u>		<u>High School</u>		<u>Grade School</u>	
	Community	Private	Community	Private	Community	Private
	N=165	N=160	N=392	N=298	N=150	N=124
Male	46.1	52.5	34.4	48.3	49.3	57.3
Female	<u>53.9</u>	<u>47.5</u>	<u>65.6</u>	<u>51.7</u>	<u>50.7</u>	<u>42.7</u>
	100.0	100.0	100.0	100.0	100.0	100.0

Source: Pittsburgh T1

Adding the variable of education in Table 32 does not destroy the direction of shelter preference by sex, only the intensity. Women still prefer community shelters proportionately more than men. But the preferences are stronger for the middle educated for both sexes.

Returning again to the question of whether respondents have protection, we find the following interesting relationships:

TABLE 33

SHELTER PREFERENCE, BY SELF-INITIATED PROTECTION AND SEX
(in percent)

<u>Sex</u>	<u>Have Protection</u>		<u>Have No Protection</u>	
	Community	Private	Community	Private
	N=151	N=157	N=525	N=386
Male	39.7	58.6	40.2	49.2
Female	<u>60.3</u>	<u>41.4</u>	<u>59.8</u>	<u>50.8</u>
	100.0	100.0	100.0	100.0

Source: Pittsburgh T1

Table 33 provides us with the strongest relationships found thus far in our shelter preference data. The table shows the interaction of a behavioral variable (self-initiated protection) with an attitudinal variable (shelter preference) and finally with a demographic variable (sex). It is evident that female preference for community shelters is enhanced by pre-existent protective conditions, while for men, such conditions produce a stronger preference for private shelters.

The last three tables have demonstrated that sex makes a difference in shelter preference. Table 31 showed that shelter preference and sex are somewhat related (where about 10 percent of the overall shelter preference variance is accounted for by sex). By imposing specific conditions, however, we can account for more difference. For example, Table 32 demonstrated that about 15 percent of shelter preference variance can be accounted for by the condition of medium education, rather than higher or lower education. Finally, Table 33 showed that about a 20 percent variance in female preference for community shelters can be accounted for by a pre-existing state of protection.

Though not highly dramatic, these percentage differences are significant enough for speculation as to their meaning. The higher tendency for women to prefer community shelters and men to prefer private shelters may defy, at first glance, common sense. Does this finding run counter to the myth of the "nesting instinct" attributed to females? Indeed, it may. We think that some of the explanation comes from changing sex roles in modern America. Women are participating more in extra-family activities and becoming more integrated in the "community." However, this would merely suggest that women have greater flexibility in non-family affairs and are able to perform non-traditional roles more easily. It would not totally account for the tendency to prefer community shelters. If we add to this, however, the idea of the protective role, sexual differences in shelter preference may be better understood. Men have traditionally performed the protective role in the family institution and new generations of males, subtly or overtly are socialized into acceptance of the expectations accompanying the protective role. When posed with questions about shelter preference, men could be expected to lean toward private preference since, in the context of the home and family, it is a cultural expectation. Whether men literally prefer to be protected in private quarters is not answered by the data at hand.

The tendency of women to prefer community protection is much more difficult to interpret, notwithstanding their changing community roles. It seems evident that women would respond to the shelter preference question partially as a function of

their perceptions of male responses. In this way women would be interpreting the way they think men would respond and would use such interpretations as a partial basis for their own shelter preference decision. In effect, women would be taking normative role expectations into account. On the other hand, women's shelter preferences could be seen as reflecting another possible intrinsic characteristic--greater sociability. At least in the folk wisdom, women are seen as being more outgoing; more gregarious. To the extent to which this is true, it may account for some of their community preference. A further explanatory factor for some women may be a latent repugnance at spending money and energy in the home on items that offer few immediate rewards in conspicuous consumption. Home shelter construction probably offers few tangible rewards within the value system of middle class females. If women perceive a community protection system as an alternative, they may thus prefer it. Lastly, a supplementary and highly speculative explanation may be found in the area of female perception of male efficacy. It is conceivable that some women may tend to find the community shelter concept more preferable because they simply lack confidence in men's ability to provide adequate home protection.

D. Conclusions

To begin a summary of the findings presented in this section, let us return to the patterns of community-private preference shown in Table 23. We saw that about half of the respondents in three national surveys conducted at different times indicated a community preference, while between 30 percent and 40 percent preferred private shelters. This division of the American public shows a preferential tendency toward community protection, ostensibly because of factors such as cost, motivation, information, and similar issues which seem to cast the basic responsibility for nuclear protection heavily on the shoulders of the agencies of public protection. Though the dominant tendency is in the direction of community protection, there is a significant sub-group in the society which perceives its protective responsibility to be more individualistic; namely, to make protective provisions closer to home. Such an orientation, of course, does not necessarily suggest that the community-oriented, by definition, are oblivious to protective responsibilities. It only suggests that the two sub-groups orient themselves differently in terms of the mode of protection. Now the reasons why one sector of individuals are more community oriented and the other is more private oriented must be thought of as a function of selected social-structural and attitudinal characteristics.

In a brief review of pertinent research literature it was noted that the capability of adapting to various threatening situations

is related to distinct social-structural identities, some of which come from the individual's position in the social order and others from his degree of attachment to social groups. We thought it feasible that social attachments, especially in the primary group, would be strongly associated with a preference for private shelters simply because there is a logical compatibility between the two. In the succeeding data presentations it was seen that those believing themselves to be protected by self-initiation (principally at home) do indeed prefer private shelters to a greater extent than those without protection. Further, the self-protectors with private preferences find propositions more desirable which reflect upon the responsibility of American families to provide fallout shelters with or without financial help from the government. Indeed, as was predicted, the private oriented are more attached to the primary group in that higher proportions are married and have younger children.

Other interesting characteristics of the sub-groups emerged. We found that the community-oriented tend to prefer a more authoritarian civil defense organization under the specific condition that they perceive themselves as having no pre-existent protection. The community-oriented revealed themselves as appearing to have more confidence in help coming from the environment than did those preferring private shelter protection, and this tendency prevailed without regard to pre-existent protection. We speculated, then, that the community oriented may represent, in part, a dependency type. But a further look at dependency from the point of social status revealed no immediate associations. Rather, the meaning of dependency in terms of shelter preference seemed to be more associated with social attachments. Those socially attached have more primary group dependency while those less socially attached are more dependent on secondary associations. The logic of these associations causes us to think that shelter preferences are an integral part of group attachments.

Finally, the influence of sex was found to be rather strongly associated with shelter preference. Whether women are more prone to community shelters because of their changing social roles, their gregariousness, or their "distrust" of the protective role efficacy of men, it remains that their influence on community-private preferences is important.

In conclusion, it is important to note that very few strong associations were located. In general, no more than 10 percent variance between community and private preferences was found when other variables were added. This is not a large difference. It is interesting to note that with several exceptions, the 10 percent difference prevailed in most of the relationships in which there was a difference. A variety of cross-tabulations

between two and three variables did not raise the difference significantly. It is our conclusion, then, that special, small social sectors feel more strongly about the relative merits of community vs. private shelter systems, but these sectors do not constitute large numbers of people in absolute terms. These special social sectors are not necessarily based on strong ideological commitment, but, instead, reflect certain relatively unique aspects of the social order and group attachments. Only about 10 percent of the women prefer community over private shelters, but about 20 percent of them prefer the community shelters if they exist in the condition of feeling already protected in some way. We have not located strong pockets of preference in our society, but have revealed, to a limited extent, a truism in social science: peoples' behavioral and attitudinal orientations are related to a complex of delicately balanced conditions. This is true in the area of civil defense, as in any other social-institutional arrangement. The difficult task of the social scientist is to specify the nature of these conditions.

IV. CONCLUSIONS AND IMPLICATIONS

Now let us try to compare findings in the two major sections of this report. It will be recalled that when we investigated favorability or opposition to the idea of community shelters we concluded that several sectors emerged. One sector opposing community shelters appeared to have a fairly strong ideological opposition toward civil defense in general, and this opposition extended to the shelter question. Another significant social sector consisted of those who tended to favor more strongly the idea of community shelters and also were more attached to the primary group. In the section just concluded we determined that those more strongly preferring private shelters were more primary group oriented.

At first sight, there appears to be a contradiction between the two sets of findings--those who are primary group oriented to a greater degree favor the idea of community shelters but more strongly prefer private shelters. Specifically, this is true for the married and for those who have some smaller children. But we don't think the findings are contradictory. Favoring the idea of community shelters may be seen as favoring the idea of being protected; and those who have been determined to perform the protective role most appropriately are those who have others to protect. Since the central elements of the primary group are togetherness and unity within the conditions of family privacy, it is not illogical that a private protective system would be a more desirable one if a decision on alternatives must be made. This suggests that those with primary group protective responsibilities may be more resilient, more adaptive, and probably more cooperative with public agencies than would be other social categories.

Pursuing this, we find that the categories of respondents who tend more to oppose the idea of community shelters, but prefer such shelters for protection are the single, divorced, widowed and separated, those with no smaller children, those perceiving themselves not to be in any state of self-initiated protection and those residing in the larger cities. The non-married and those with no smaller children are less socially attached to the primary group. It is possible that community shelter opposition is not so much direct opposition to shelters per se, but more of a generalized alienation to the world. The less socially attached thus may be seen as less adaptive, less flexible and probably less responsive and cooperative to programs of agencies such as the Office of Civil Defense.

The social category more prone to oppose the idea of community shelters while preferring private shelters was observed to be men. Men, for purposes of this analysis, are centers of

resistance to civil defense public shelter programs more than women. It is highly possible that men who oppose the idea of community shelters on principle may be entirely different individuals from those who prefer private shelters due to perceived role expectations. It must be understood that data for the community shelter acceptance analysis was drawn from a different sample than that for the community vs. private analysis. Unfortunately, no comparison between the two is possible beyond the present effort. However, the interesting fact remains that men, compared to women, are more problematical with regard to community shelter orientations.

Lastly, the category favoring the idea of community shelters while also preferring community shelters is more prone to be women. The tendency in women to be more community shelter oriented than men is a most interesting finding. It undoubtedly reflects much of interest in a rapidly changing society and may have important predictive implications. But for the more relevant present purposes, the greater community orientation of women may have direct implication for the agencies of public protection.

Finally, it is to be noted that the nature and characteristics of social sectors which favor or oppose civil defense activities and which have certain preferences for alternative systems of protection is an area of social science research which requires considerable further attention. The present study sought to uncover social sectors which embraced alternative orientations. Some small success was achieved. But it is believed that not only is creative and imaginative analysis of existing data necessary, but additional data must be generated to feed into present gaps. Both these efforts are required to advance knowledge of American society as related to civil defense issues. Some of the traditional means of grading, classifying and organizing societies may be of less relevance today than at a former time. At least, some of the traditional means seem to produce little difference in selected civil defense attitudes. A more intense effort is needed to dig more deeply into the subtle differences of individuals and groups. Here, it is believed, lie some of the explanations for many attitudinal and behavioral tendencies.

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13. ABSTRACT
This paper investigates the American public's patterns of favorability toward community fallout shelters and the patterns of preference for community or private shelters. National opinion studies between 1960 and 1966 revealed overwhelming support for the idea of community shelters. National studies between 1961 and 1963 showed about half of the public preferring community shelters while 30 to 40 per cent preferred private shelters. In general, those opposed to civil defense are opposed to its specific programs. Those groups favoring the idea of community shelters while preferring private were more likely to be strongly oriented to the family group. Those opposing the idea of community shelters but preferring them over private shelters for protection were more likely to be the socially unattached and the unprotected. Men, more than women, tend to oppose the idea of community shelters while preferring private shelters for protection. Women, more than men, tend to favor community shelters and also prefer them for protection.

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