

✓ The Experience of Stress for Correction Officers

by

Frances E. Cheek, Ph.D. and Marie DiStefano Miller, M.A.

Paper presented at the Annual Meeting of the American Academy of Criminal
Justice Sciences, Cincinnati, Ohio, March 15, 1979.

Frances E. Cheek, Ph.D., Director
Behavior Modification Program

and

Marie DiStefano Miller, M.A.
County Training Supervisor

Correction Officers Training Academy
✓ New Jersey Department of Corrections
Whittlesey Road
Trenton, New Jersey 08628

67635
ember, 1979

The Experience of Stress for Correction Officers

by

Frances E. Cheek, Ph.D. and Marie DiStefano Miller, M.A.

ABSTRACT

This study investigated the experience of stress for 143 correction officers, including State and County, Long-Term and Short-Term, Blue Hats and White Hats. Each filled in a questionnaire eliciting information regarding their perceptions of stress in themselves and other officers, their situational and temporal experience of stress, the consequences of their stress in terms of physical health, emotional and interpersonal relations and job performance, their perceptions of the sources of their stress and the coping techniques utilized by them. The correction officers reported more stress-related physical illnesses than police officers. County officers appeared somewhat less stressed than State officers, self-esteem at work seemed to be a more important variable than length of service or job status. For all groups, role ambiguity was seen as an important source of stress.

The Experience of Stress for Correction Officers

by

Frances E. Cheek, Ph.D. and Marie DiStefano Miller, M.A.

Amidst a growing concern for the rights and needs of inmates a long-neglected but highly significant problem area is beginning to surface, namely the situation of correction officers - their needs, their problems, their frustrations.

For a long while it has been recognized, in practice at least, that the role of correction officer is a highly stressful one. However, to date, professional publications and research activities have primarily focused upon their more glamorous colleagues in law enforcement, to wit, police officers.

For police officers, studies have indicated high rates of suicide attempts, heart disease, circulatory and digestive problems, drug addiction and alcoholism, which have sometimes resulted in premature death (Kröes & Hurrell, 1975; Kirkham, 1976).

Although earlier studies may have suffered from inadequate comparisons with job stress in other occupations, Kelling and his associate (1977) have recently conducted a national survey of job stress for police officers in which comparison with studies of other workers was made. This survey has confirmed previous observations of higher rates of illnesses, somatic complaints and divorce in police officers.

Though in-depth research findings are not available, many observations suggest that stress for correction officers is similarly high, or indeed perhaps higher, than that for police officers. Of several states recently surveyed, the rate of heart attacks among correctional personnel was one of the highest among the various groups of state employees (Wynne, 1975). Time off for disability by the New York State Correctional Staff was three hundred percent (300%) higher than the State average, while problems of severe emotional stress involving the heart, alcoholism and other allied emotional disorders accounted for sixty percent (60%) of the disability leave (New York State, 1975).

On the surface of it; the exceptional stress of law enforcement personnel in general might be attributed to unique attributes of their roles. For instance, being a policeman sets the officer apart from the rest of the community and makes him subject to the prejudice, fear and sometimes open hostility of a large segment of society. In the case of the correction officer, his everyday activities subject him to even greater hostility and disrespect in a situation of isolation and confinement.

However, studies attempting to discover the causes of the special stress experienced by police officers have come up with quite different findings which interestingly conform to those of many studies of occupational stress in general. (Kahn, et al, 1964) For instance, Margolis, Kroes and Quinn, (1974) examining sources of stress in a number of occupations, including police officers, found across all occupations, non-participation in decisions affecting the worker to be the most salient source of stress and this was highly correlated with low self-esteem. In a later survey examining stress in police work specifically, Kroes (1974) and his associates found that it was not the life-threatening aspects of police work, but rather the continuous assault on the officers' self-esteem which provided most stress. The more recent study of Kelling, (1977) confirmed these findings of low self-esteem in police personnel. Finally, Aldag & Brief (1978) have found police role stress to be related to role ambiguity and role conflict, once again administrative rather than job-related sources.

The present study of stress for correction officers grew out of a perceived need for information in this area in connection with a special course in "Stress Awareness and Coping Techniques" being developed by the authors at the New Jersey Correction Officers Training Academy. To obtain this information, in a pilot study, 24 county correction officers in training at the Academy were surveyed in order to examine their experience of stress in terms of perceptions of its presence, nature, causes and consequences, as well as coping techniques utilized. The findings, while preliminary, supported those in the area of stress for police officers as well as previous

research by the senior author (1967) in the area of tension. Major perceived areas of stress were: lack of clearly defined job descriptions, inadequate equipment and lack of training. Thus, as with police officers, the most important sources of stress appeared to lie in the administrative aspects of the job rather than in anything inherent in the role itself, such as inmate-officer relations and/or the threat of physical harm.

In view of the absence of systematic research data in this area and also because of the suggestiveness of the preliminary findings it was decided to further examine in the present study the experience of stress for correction officers, its nature and consequences, on a larger and more varied sample.

Also, the effects of two types of variables were now examined: socialization (length of time in the system) and position (rank in the system). For comparison, both State and County officers were studied. The dependent variables were: officer perceptions of stress, characteristics of and situational aspects in the experience of stress, consequences in terms of physical and emotional status, perceived causes of stress, and coping techniques utilized.

Method of Procedure

The Setting

The New Jersey Correction Officers Training Academy is located in the Trenton Central Office Complex of the New Jersey Department of Corrections, and is the only training agency for State and County correctional personnel. Ten State Adult and Youth Correctional Institutions and fifty-one County Correctional and Juvenile Detention facilities route officers on a non-mandatory basis into the training programs. Programs include four weeks of basic training, week-long advanced training as well as seminars in management, custody, and human relations. To date, more than 8,000 staff personnel have participated in the training programs offered.

How the Questionnaire was Administered

The officer students participating in the study were volunteers taking part in the regular on-going programs of the Academy from mid-December, 1978 (1 State Basic, 2 County Basic, 1 State and County Advanced and 8 specialized courses).

The questionnaire was self-administered in group sessions supervised by either or both of the researchers during regular class time. Respondents were motivated by being told that they would be participating in a pioneering effort, and that the information was needed to better structure the Academy's Stress Management programs. Candidness and anonymity were stressed. The questionnaire required from 55 minutes to one hour and forty-five minutes to complete, the average time spent was approximately 1½ hours. No class member refused to participate.

The Sample

Two hundred and four correctional personnel from 12 classes filled in the questionnaire. Twenty-seven questionnaires were discarded because the respondents were not officers but other staff correctional persons, and 15 were rejected for incomplete information.

Originally, it was hoped to obtain 25 questionnaires in each of six categories:

- | | |
|--------|---|
| State | Less than 2 years in the system (Short-Term), lower rank than sergeant (Blue Hat) |
| | More than 2 years in the system (Long-Term), lower rank than sergeant (Blue Hat) |
| | More than 2 years in the system (Long-Term), sergeant or higher (White Hat) |
| County | Less than 2 years in the system (Short-Term), lower rank than sergeant (Blue Hat) |
| | More than 2 years in the system (Long-Term), lower rank than sergeant (Blue Hat) |
| | More than 2 years in the system (Long-Term), sergeant or higher (White Hat) |

However, it proved easier to fill the quota in some categories than others. Therefore, 19 were not used from two categories (State Long-Term Blue Hat and County

Short-Term Blue Hat) while in two categories not enough were obtained (State Short-Term Blue Hat and State Long-Term White Hat). The final sample included:

State	Short-Term Blue Hat	22
	Long-Term Blue Hat	25
	Long-Term White Hat	18
County	Short-Term Blue Hat	28
	Long-Term Blue Hat	25
	Long-Term White Hat	25

Thus, the final sample consisted of 143 officers of whom 65 (45%) were State Correction Officers and 78 (55%) were County Officers. Fifty (35%), (22 State, 28 County) had less than 2 years experience (Short-Term) in corrections, 93 (56%) (50 State, 43 County) had more than 2 years service (Long-Term) in corrections. Eighteen (28%) of the State Officers held the rank of Sergeant or higher (White Hat), 25 (32%) of the County group were of similar rank.

For the total sample, 121 (87%) were men, 22 (13%) women; 108 (76%) were white, 28 (20%) were black, 3 (2%) Hispanic and 4 (2%) other (Oriental, American Indian, etc.); 58 (40.6%) were 19 to 30 years old, 38 (26.6%) were 31 to 40, 27 (18.9%) were 41 to 50 and 20 (13.9%) were 50 plus. The mean length of time in corrections was 5 years 11 months, the range was from 1 month to 20 years. Thirty-eight (27%) were never married, 72 (50%) remarried, 10 (7%) divorced, 6 (4%) separated; 50 (35%) had high school graduation or less, 83 (58%) some college or technical school, 10 (7%) a college degree and/or other graduate work.

The demographic characteristics of the six groups separately are shown on Table 1.

(Insert Table 1 about here)

The County officers tended to be somewhat younger than the State officers, fewer were married, and they were not as well educated as the State officers. The County officers also on the average had fewer years of service than the State officers.

Description of the Questionnaire

The questionnaire utilized was primarily an elaboration of an instrument developed by the senior author (1967) for a study of the experience of tension in alcoholics,

A literature search on stress in police officers, plus discussions with correctional colleagues yielded further items. Finally, the questionnaire utilized by Kelling and his associates (1977), in their studies of police officers stress was an invaluable source.¹ Many questions were replicated so that comparable data could be obtained.

The questionnaire utilized consisted of thirty-one pages with eight sections as follows:

1. Demographic data - age, sex, etc.
2. Occupational data - institutional data, employment history, attitudes towards job, etc.
3. Physical Health - physical symptoms and illnesses experienced on and off duty, use of medication, alcohol, cigarettes, etc.; perceived illnesses in colleagues at work, etc.
4. Perceptions of Stress - perception of degree of stress in self and others, perception of negative effects of stress on physical and emotional health, etc.
5. The Experience of Stress - amount of stress experienced with various categories of individuals (inmates, supervisors, etc.) amount of stress experienced in various places in the correctional facility, amount of stress experienced in various situations (escape, meal breaks, etc.), degree of liking and disliking of various situations, amount of stress at various times of day, physical concomitants of stress, emotional concomitants of stress, behavioral concomitants of stress.
6. The Consequences of Stress - physical and emotional health problems, interpersonal problems, common distress reactions to stress at four levels in terms of severity.
7. The Causes of Stress - shift work, lack of training, getting conflicting orders, etc.
8. Techniques of Coping with Stress - extent to which subject already had explored techniques of coping with stress, ways of coping with stress such as doing calisthenics, sex, cursing, etc., perceptions of the importance of learning how to cope with stress.

For some questions, respondents were asked to utilize a five or six point rating scale. For instance, they were asked to indicate to what extent they felt crisis situations were likely to contribute to stress on their jobs on a six point scale from "very unlikely" to "very likely".

Analysis of the Data

For each item frequency counts were obtained for respondents in each of the six categories. Percentage and/or average ratings were calculated. Thus, it was possible to rank order the significance of each item on any question. Subsequently, the ranks in each of the six groups were added so that the rank order of items for the total group could be examined on any question.

RESULTS

I. Perception of Stress

The officers were asked to indicate their awareness of stress as correctional personnel in terms of characterizing their own general level of stress as opposed to most people, the emotions usually experienced on the job, the level of stress of others working with them, and the extent to which they saw their jobs in corrections as being stressful compared with other jobs in general. They were also asked to what extent they felt their job stress had a negative effect on their physical health, emotional health, on family relations and job performance.

The group as a whole did not feel themselves to be specially tense as opposed to most people. On a six point scale from "much more tense" than other, they rated themselves on the average, about half-way between "slightly more relaxed" and "slightly more tense" (3.4 average). Indeed, the County Long-Term Blue Hats who were lowest of the groups in this regard saw themselves as between "slightly relaxed" and "moderately more relaxed" (2.6 average), than others. These perceptions of their own degree of stress corresponded with responses to another question which explored the emotions the officers experienced while on the job in which the officers reported being calm and cheerful on the job more often than being angry or depressed.

A different picture, however, began to emerge when the correction officers were asked about the amount of stress experienced by those who worked with them. On the whole the six groups tended to see their co-workers as slightly more tense than themselves (3.8 average). Both State (4.2 average) and County (4.1 average) White

Hats were higher than the others in this regard. This situation was again depicted when the correction officers were asked to what extent they saw their job in corrections as stressful compared with other jobs in general. All six groups saw more stress, averaging "moderately more stressful" (4.9).

The correction officers were also asked to indicate to what extent the stress experienced on their jobs had a negative effect on their physical health, emotional health, family relations and job performance, by rating these effects on a six point scale from "no negative effect" to "very great effect". For the group as a whole, the effects perceived in all areas averaged (3.1) "little negative effect". However, the State officers (average 3.5) saw more negative effects than the County officers (average 3.0). Both State and County White Hats were highest in their groups in this regard, then Long-Term Blue Hats, and Short-Term Blue Hats last. For the total group, job performance was seen as least likely to suffer (average 2.8), family relations (average 3.2) came next, then physical health (average 3.4). Most likely to suffer was emotional health (average 3.5).

Thus, while officers did not perceive themselves as greatly stressed, they saw their fellow officers as more stressed than themselves and working in corrections as moderately stressful. With regard to negative effects perceived, the State officers saw more than County officers, for both State and County, White Hats more than Blue Hats, Long-Term more than Short-Term. Emotional health was seen as most likely to suffer, job performance as least likely to suffer.

II. The Experience of Stress

The officers were asked to identify the situational and experiential aspects of their stress experience. When asked how often they tended to experience stress with various role set members, such as inmates, other correction officers, supervisors, etc., the group as a whole found their interaction with inmates most tension arousing.

However, the average was only 3.2 "occasionally" to "sometimes" on a six point scale from "never" to "very often". Next stressful were their interactions with those they supervised, then other correction officers, their own supervisors, social workers, immediate family, visitors of inmates, other relatives, friends (other than correctional personnel), and finally, facility inspectors from other agencies. An exception to this social distance ranking appeared for both the State and County White Hats, in that they rated interactions with other correctional personnel as more stressful than interactions with inmates. County White Hats also differed from the other groups in experiencing much higher stress with governmental inspectors.

Asked how often stress was experienced in 15 different places in the correctional facility such as the church, the inmates' dining room, etc., the groups reported most stress in situations associated with continuous surveillance of inmate interactions such as the housing tiers, the inmates' dining room, the corridors, etc. Intermediate were disciplinary activities, visiting areas, and staff meetings. Least stressful were religious and educational sections of the prison and the staff dining room. Differences of note among the groups were that the State Short-Term Blue Hats were the only ones to rank the inmates' dining room as a low stress area, while County Long-Term Blue Hats and White Hats were alone in ranking staff meetings within the top third as stressful situations.

Asked how likely, on a six point scale from "very unlikely" to "very likely", they were to feel stress in 27 typical situations in the facility such as meal breaks, taking counts, disturbances, etc., the groups found most stressful those situations involving violence such as stabbings (5.0) and inmate disturbances. Personnel matters and special security procedures were mid-point on the stress scale. Least stressful were routine paperwork and duties.

The officers were also asked on a six-point scale to indicate their degree of liking or disliking of the situations previously rated in terms of stress. In general the same patterns as those perceived in terms of stress were upheld with situations involving violence being most disliked, and routine activities liked most, but now

personnel problems involving competence level of fellow workers began to assume more annoying proportions.

Again, there was general uniformity in the responses of the different officer groups. However, it is interesting to note that the ratings of the State Short-Term Blue Hats officers placed inmate confrontations fifth, whereas, the other groups placed that category around 20. A similar discrepancy occurred with regard to the category of mentally disturbed inmates which for the County Long-Term Blue Hats was number two. For the others it was considerably lower.

The temporal aspects of tension were also examined. In general, although the differences were not large, the average tension experienced by second shift officers (usually 2:20 through 10:20 p.m.) was higher than that experienced by the third shift (usually 10:20 p.m. through 6:20 a.m.). Tension on the first shift (usually 6:20 a.m. through 2:20 p.m.) was worst.

In general, during the third shift, the correctional staff is at a maximum complement. At this time, the inmates are primarily in structured activities such as: school, shop, etc., so tension might be expected to be low. The second shift is generally referred to as the "action shift". During this period problems with inmates would be more likely to occur and produce tension because officers are more directly involved with the individual activities of the inmates. During the third shift, even though the inmates are primarily retired, tension might be high because night-time is a high point of inmate tension (Cheek, 1967). Also, officers could be suffering from a source of stress common to shift workers, interruption of diurnal rhythms (Selye, 1976).

Interestingly, State and County variations appeared. On the whole, the State officers tended to find the first shift least tense. Thus, State Short-Term Blue Hats and White Hats indicated the second shift as most tense, while the Long-Term Blue Hats rated the third shift most tense. For the County officers, the Short-Term Blue Hats said the second shift was most tense, the Long-Term Blue Hats found the first shift most tense, whereas the White Hats ranked the third shift as most tense.

The groups were also asked what kinds of physical, emotional and behavioral effects were likely to be associated with their experiences of stress. For the group as a whole, on a six point scale from "very unlikely" to "very likely", the ten most frequently reported, of 27 physical effects listed, were, in order: tense neck muscles, eye strain, tense forehead, butterflies in the solar plexus, general sweating, dry mouth, sweating of hands and feet only, irregular shallow breathing and gritted teeth. Interestingly, of 19 listed emotional effects, those reported by the officers as most frequently experienced with tension were positive. They saw themselves as first, lively when tense, then energetic, anxious, cheerful, irritable, worried, apprehensive, fatigued, depressed, resentful and hopeless. Least common, in order, were: suicidal, murderous, terrified, out of contact with reality, apathetic, destructive, and elated. These findings correspond with those of the Cheek study of the experience of tension of various diagnostic groups in which the most frequently experienced emotional concomitants of tension for the normal comparison group were feeling good, lively and energetic.

With regard to the 13 behavioral effects listed, respondents found themselves most frequently experiencing the following, in order: loud voice, quiet voice, nervous hand or foot movements, excessive eye contact, rapid speech, physical moving forward and rigid posture. Least associated with tension were, in order: incoherent speech, slurred speech, failure of eye contact, slumped posture, and physical moving back. Thus, in general, respondents reported aggressive or over assertive rather than under-assertive behavioral responses to tension.

III. Consequences of Stress

In an earlier question the officers were asked to report their perceptions of stress-related problems in various areas such as physical and emotional health, marital relations, job performance, etc. They were also asked to report factual data regarding their functioning in the areas of marital relations, emotional and interpersonal problems, physical health and job performance.

A. Marital Relations

While, as noted earlier, the correction officers did not report much negative effect per se on family relations as a result of their job stress, an examination of the divorce rates of the various groups did not confirm this perception. Thus, the divorce rate for the group as a whole was 20.9%, slightly lower than that for police officers (22.6%) as reported by Kelling (1977), but twice as high as the average rate (10.2%) for blue and white collar workers which Kelling quotes. Within the group, the County officers (28.3%) showed higher rates than the State officers (13.4%), even though the County Short-Term Blue Hats (probably as a result of being younger) had a lower divorce rate (15.3%). The State White Hats, however, were lowest of all the groups, (7.1%) in this regard.

B. Emotional and Interpersonal Problems

The subjects were asked to indicate on a six point scale from "never" to "very often" how frequently they experienced various emotional and interpersonal symptoms or problems as a consequence of the stress experienced in their correctional jobs. On the average, emotional symptoms were more frequently reported (average 2.1), than interpersonal symptoms (average 1.9). This ties in with their report that emotional problems were those most likely to occur as a consequence of their job stress.

Of the 19 emotional symptoms listed, most frequently reported in order, (average 2.4 to 2.9) were job dissatisfaction, feeling let down, defensive reactions, anxiety, nervousness, brooding over injustice and restlessness, sadness, loneliness, fear, and loss of self-confidence. Least experienced (average 1.4 to 1.7) were, in order: excessive worrying, inability to cope, loss of inhibitions, dissatisfaction with life and apathy.

Of the 12 interpersonal symptoms listed, most frequently reported (average 2.2 to 2.6) were in order: negative feelings toward inmates, letting out tensions in the wrong places, tightening of discipline and desire to spend time away from family on their

days off. Least experienced (average 1.3 to 1.6) in order, were: divorce, sex problems, child problems, and seeking out danger to confront it directly.

C. Physical Health

When asked to note how good their health had been over the past six months on a six point scale from "very bad" through "very good", the average response of the officers was 5.2 (between "moderately good" and "very good"). This corresponded to responses in Kelling's study (average 4.9 for ICPA sample, 5.3 for the NIOSH sample).

The County officers tended to report better health than the State officers. Short-Term Blue Hats tended to be healthier than Long-Term Blue Hat officers with the exception of the County White Hats who responded with high scores. The State White Hats were notably lowest of the groups.

With regards to a comparison of their existing health with their health when they first entered corrections, the average response of the correction officer was 3.9 (close to the same). Again, in general, County officers were higher than State officers, Short-Term were higher than Long-Term officers in each group and White Hats were lowest in each group, indicating worse health.

To provide comparison with the police study, the officers were asked to report the presence on and off duty of 15 physical symptoms during the past month. Their responses to these questions compared with the ICPA and NIOSH samples are shown in Tables 2 and 3. On duty, the correction officers were highest in headaches, then being fidgety and tense, being nervous and shaky inside and loss of appetite, in order. (Insert Tables 2 & 3 about here) Off duty, the symptoms most reported were headaches, trouble falling or staying asleep, being fidgety and tense, and loss of appetite. The correction officer sample was close in order of frequency to the ICPA and NIOSH samples but lower on all items (except for a few very low frequency items).

However, the actual illnesses experienced by the officers during the past six

months presented a rather different picture. Table 4 shows the frequency of reported
(Insert Table 4 about here)
serious illnesses during the past six months compared with the patrol officer sample and the occupational sample. For the correction officers, colds, hypertension, hay fever, trouble with teeth, arthritis and migraines were most frequently reported. While the correction officers were lower than the patrol sample and occupational groups on many illnesses, they were higher on hypertension, hay fever, ulcers, heart disease, diabetes, gout, gall bladder, hypoglycemia. (The incidence of cancer, etc. was too small to receive comment).

Table 5 shows the percent of illnesses judged to be caused or made worse by the
(Insert Table 5 about here)
job, comparing the correction officers and the total patrol officer sample. For the correction officers the illnesses perceived as most caused or aggravated by the job were in order: hypertension, then migraine or severe headaches, trouble in the gastrointestinal tract, paralysis, tremor or shaking, hernia, gall bladder and diabetes. The correction officer sample was higher than the patrol sample in attribution in the case of heart disease, migraine, diabetes and trouble with hearing.

The study utilized another method of looking at the physical consequences of job stress for the officers. Selye (1976) has designated four levels of physical reactions to stress, moving from the mild to the serious. The officers were now asked to rate how frequently symptoms on the four levels appeared in their lives on a scale from 1 through 6, ("never" to "very often").

Most frequently reported were symptoms at Level 1 (average 2.4, "rarely" to "occasionally"), then Level 2 (average 1.9, "rarely"), then Level 3 (average 1.1, "close to never"), Level 4 (average 1.0, "never"). Considering all four levels of symptoms, the County officers showed fewer (6.6) in general than the State (7.6). Within both the County and State groups, Short-Term Blue Hats tended to be slightly lower than Long-Term Blue Hats. The County White Hats (7.2) were much higher than County Blue Hats (6.6), but there was a reversal in the State data. State White Hats (7.1) were lower than State Blue Hats (7.9). However, State and County White Hats

ACA

were close (7.1 and 7.2).

Thus, the officers did not report themselves to be in bad physical health as a result of job stress nor were the symptoms experienced as frequent as those of the patrol sample, though actual illnesses in many cases were present in greater number. They were also asked about the physical health and problems of the officers in their department and here a picture similar to the actual situation emerged. For instance, of the sample, 14.6% knew one colleague who had attempted to or successfully committed suicide, while 2.7% persons knew two such co-workers. Forty-one percent knew 1 or 2 colleagues who had had heart attacks, 23% knew 3-5 who had had heart attacks, and 8% knew of 6 or more co-workers who had had heart attacks. Asked how many knew individuals in their department who had had heart attacks while on regular duty, 38% knew 1 or 2 officers for whom this had occurred, 38% knew 3-5 officers, and 3% knew 6 or more officers who had had heart attacks on regular duty.

The officers were also asked to report how many of the five people in the department with whom they worked most closely had had serious problems with alcohol, marriage, children, health, finances, drugs, and neighbors. The results were similarly suggestive. Table 6 shows the results for the correction sample and for the patrol officer sample. (Insert Table 6 about here)

The correction officers reported most problems in their five co-workers with finances, then health, alcohol, family, children, neighbors, and drugs. For alcohol they were higher than the patrol officers, and in all the others they were lower. However, while the officers were lower in this regard than the patrol officers the results are still striking and suggestive.

Thus, while the officers did not report many problems of physical health for themselves as a consequence of job stress, the actual incidence of many illnesses was higher than for the patrol sample. Also they saw high suicide and heart attack rates for those in their department and reported many family, health, etc. problems for their colleagues at work.

D. Job Satisfaction

To examine the effects of stress on their job performance, the attitudes of the officers towards working in corrections, towards their present job and towards various aspects of their work in corrections were explored.

The attitudes of the group as a whole towards working in corrections were quite positive. The average rating was (5.0, moderately) on a six point scale from "not at all" to "very much". The County officers were more enthusiastic than the State officers (average 5.1 vs. average 4.8). In each case, the White Hats were more positive than the Blue Hats and Long-Term more than Short-Term officers.

These results were replicated to some extent when the officers were asked how they liked their present jobs. The average liking for the whole group were slightly lower (4.7 vs. 5.0). But once again County was higher than State. However, now the White Hat vs. Blue Hat differences disappeared. On the other hand, the Long-Term officers were more positive than the Short-Term officers, particularly in the case of the State Blue Hats.

These findings correspond with recent studies in this area. An Illinois study (Jacobs, 1978) found that 90% of correction officers surveyed were either very or somewhat happy in their jobs. The 1968 Joint Commission on Correctional Manpower and Training report found 92% of the correctional officers were almost always or usually satisfied with their jobs. Positive association of job satisfaction with occupational status and organization rank have been confirmed in previous studies (Katz and Kahn, 1952), Gurin et. al., 1960 and Inkeles, 1960), however, our results are equivocal in this regard.

The officers were also asked to rate their attitudes towards 21 aspects of their jobs in corrections such as job security, salary, disciplinary system, etc. on a six point scale from "very dissatisfied" to "very satisfied". For the total group, the seven highest rated aspects were, in order: job security, excitement, immediate supervisor, amount of overtime, overtime pay, academy training and fellow officers.

Job satisfaction was further explored in questions as to whether the officers as a result of their correctional experiences would again take a job in corrections, knowing what they know now, or recommend a friend to work in corrections. On a six point scale from "very unlikely" to "very likely" the average group rating was 4.2 (somewhat likely) in terms of the officers again taking a job in corrections. The State White Hats were notably least likely of the groups (average 3.3) to do so, though for both State and County, White Hats were lower than Blue Hats.

Asked to rate the likelihood of their advising a friend to take a job in corrections on a six point scale from "very unlikely" to "very likely" the groups as a whole were less enthusiastic, averaging 3.2 (close to somewhat likely). However, surprisingly, in view of their responses to the previous questions, White Hats were more likely than the others to recommend this move, the State Blue Hats were especially low in this regard (average 2.8).

The self-image of the officers in relation to their work was explored by asking them to rate on a seven point scale the degree to which they were "not successful" vs. "successful" at work, "sad at work" vs. "happy at work", "not important at work" vs. "important at work" and "not doing their best" vs. "doing their best". The officers as a whole saw themselves very positively in their occupational roles. Success at work was rated, on the average, 6.0, degree of effort 5.8, importance 5.6, and happiness 5.3.

Within the groups, the County officers scored higher than State officers on success, importance and doing their best at work. There was no marked difference for County and State on happiness at work. The County Long-Term Blue Hats were highest of the six groups in three out of four categories - success, happiness and importance, whereas the State Short-Term Blue Hats were the lowest of the groups in these areas. With regard to personal effort, the County Short-Term Blue Hats were highest in performing their best (6.6). The State Long-Term Blue Hats markedly felt (3.2) they were not performing their best. Interestingly, the County White Hats were lowest of the County groups on feeling important at work, though the State White Hats were highest of the

State groups in this regard.

Compared with one another, the County Short-Term Blue Hats were high on doing their best, importance at work and success but not as happy as some of the other groups. The County Long-Term Blue Hats were high on all four, doing their best, success, importance at work, and happiness at work. The County White Hats were also high on doing their best and success but did not see themselves as being as important at work as the other County officers and not as happy at work. The State Short-Term Blue Hats were somewhat low in terms of doing their best, but quite low in terms of success at their work. Also, they tended to see themselves sadder at work and much less important at their work than the others. The State Long-Term Blue Hats saw themselves as successful at their work, happy at work, relatively important at work but definitely not doing their best. The State White Hats saw themselves as doing their best, successful, happy at work, and important at work as compared with the other State officers.

To compare this data with the Kelling study (1977) it was necessary to reverse the data on success, importance and effort. Table 7 shows the means for the State
(Insert Table 7 about here)
and County officers separately, the group as a whole, the occupational sample and the patrol sample. The responses of the correction officer sample was more positive than the police officer sample in all categories, and fairly close to the occupational samples in the area of effort, success and importance. In these categories the County officers were more positive than the State officers. With regard to happiness in the job, the correction officer sample like the patrol sample was considerably lower than the occupational sample. There was no difference between the State and County officers in this category.

Kelling's study also indicated a relationship between stress and self-esteem on the job. To examine this, the State and County samples were compared on the Selye scale and the self-esteem scale. This data appears in Table 8.

(Insert Table 8 about here)

Looking at the Selye scale, Long-Term vs. Short-Term officers only showed more stress in the County sample, in the State sample this was reversed. Also, Blue Hats were low on signs of stress in the County sample; whereas the State sample Blue Hats were higher than White Hats. But this difference appears to relate to self-esteem on the job. State Blue Hats were low on the self-esteem items, and high on stress, while County Blue Hats were high on these items and low on stress. Also, looking at the six groups separately the higher the self-esteem the lower the stress, but when the Long-Term groups are combined only the County groups show greater Long-Term than Short-Term stress. Thus signs of stress appear to relate to self-esteem on the job, but not necessarily to length of time in the job or job status.

IV. Causes of Stress

The officers were offered 109 possible sources of stress in their work and asked to rate each as being 1 (very unlikely) to 6 (very likely) to contribute to stress on their jobs. These included 11 items in which interacting with inmates was involved (fear of bodily harm, crisis situations, etc.), 61 items involving administrative matters (existence of rigid rules and regulations, conflicting orders from supervisors, etc.), 26 items related to job conditions (job isolation, shift work, etc.); 6 items concerned with family relations (fear of family safety, lack of family pride in work, etc.) and 5 with community matters (need to understand legal issues, political community pressure groups, etc.).

For the total group, when all items were ranked in descending order of stress, the administrative items were seen as most stressful (average total of ranks across groups, 277.5). Next, in order, came those related to job conditions (353.4), interactions with inmates (415.1), family relations (468.4) and legal and community matters (475.6).

The 21 items seen as most stressful were, in order:

1. lack of clear guidelines for job performance
2. facility policies not being clearly communicated to all staff members of the facility
3. crisis situations

4. getting conflicting orders from your supervisors
5. having to do things against your better judgement
6. having your supervisor give you things to do which conflict with other things you have to do
7. not being treated as a professional
8. low morale of other officers
9. other personnel putting things off
10. lack of training
11. officers in the department not being quickly informed about policy changes
12. criticism from supervisors in front of inmates
13. poor physical conditions and equipment
14. having too little authority to carry out the responsibilities assigned to you
15. your immediate supervisor not keeping you well-informed
16. not having pretty good sharing of information among the officers on all three shifts
17. not receiving adequate pay
18. not having a chance to develop new talents
19. having feelings of pressure from having to please too many bosses
20. lack of training in riot control and the use of firearms
21. lack of opportunity to participate in decision making

In the initial pilot study of correction officer stress, lack of clear guidelines for job performance also emerged as the primary source of stress. Ambiguity about role performance is reflected in 9 other highly rated items, including No. 2 - facility policies not being communicated, No. 3 - crisis situations, No. 4 - getting conflicting orders, No. 6 - having your supervisor give you things to do which conflict with other things you have to do, No. 10 - lack of training, No. 11 - officers in the department not being quickly informed about policy changes, No. 15 - your immediate supervisor not keeping you will informed, No. 16 - not having good sharing of information, No. 19 - having feelings of pressure from having to please too many bosses, No. 20 - lack of training in riot control and the use of firearms. Thus, the ambiguity appears to relate to lack of communication, problems with supervision, and lack of adequate training. As noted earlier, Aldag and Brief (1978) studying police officer stress found role ambiguity to be of critical significance. Interestingly, "crisis situations" appear not to be stressful to the officers in terms of the possibility of harm from the inmates, for fear of bodily harm is not highly ranked, but presumably because the officers do not know how to act and might do something wrong.

Two other closely related themes represented here are related to stress, and lack of self-esteem, which we have already seen to be related to stress, and lack of

autonomy in job performance. These are reflected in 7 items: having to do things against your better judgement, not being treated as a professional, low morale of other officers, criticism from supervisors in front of inmates, having too little authority to carry out the responsibilities assigned to you, not having a chance to develop new talents and lack of opportunity to participate in decision making.

These findings are similar to those of Kroes et. als. (1974) in their job stress study of 100 Cincinnati police officers. Circumstances affecting their sense of professionalism, such as reprimands from supervisors, were more stressful than life-threatening situations. In another study, Margolis (1974) found that non-participation in decision making was the most salient stressor. A Swedish study of white collar workers (Wahlund and Merell, 1976) tended to support Margolis' observation. As a result of his observations, Margolis has concluded that self-esteem is a crucial variable affected by this type of police occupational stress.

Within the groups sampled, differences emerged with regard to the perceived causes of stress (see Table 9). Lack of clear guidelines was included in the top four choices
(Insert Table 9 about here)

of all the officer groups except for the County Short-Term Blue Hats, where it was rated 6th, and State White Hats in which the choice was not included in their top ten.

Lack of sufficient acculturation to the occupational group (Becker, 1961) was apparently significant in the responses of the County and State Short-Term Blue Hats. Thus, dangerous and life-threatening aspects of the job such as crisis situations unpleasant sights, family concerns about safety, and feeling of confinement received more mention in their top ten choices than in those of the other officer groups.

Categories affecting self-esteem and job performance were more pronounced for both State and County Long-Term Blue Hats. It will be remembered that on the Kelling self-esteem items the State Long-Term Blue Hats ranked lowest of all the groups. However, surprisingly the County Long-Term Blue Hats ranked highest. The State Long-Term Blue Hats rated not being treated as a professional as most stressful, while several other highly chosen categories such as officers not being informed about policy changes criticism from supervisors in front of inmates, etc., also reflected this theme. A

similar pattern appeared for the County Long-Term Blue Hats, moreover, they were the only group that mentioned lack of respect from the inmates within the top ten causes. For them it was rated number two. The low morale of other officers was also seen as highly stressful by this group.

This item, low morale of other officers, was ranked highest by the State White Hats, whereas their counterparts in the County ranked crisis situations as number one. Both State and County White Hats appeared affected by their mid-management position, in that they complained about policies not being clearly communicated to them, having too little authority to carry out their responsibilities, decisions being continuously overturned, lack of support from supervisors, and things being put off by other personnel.

The 21 items rated least stressful by the officers were, in ascending order of stressfulness:

1. temptations, corruptions
2. fear of charges of police brutality
3. political community pressure groups
4. need for overtime, long hours
5. facility is too much like a military organization
6. fear of losing control of oneself
7. resentment of inmates' advantages
8. most of the time having tension between you and your children
9. need to suppress emotions
10. your family not taking pride in the work you do
11. feeling your job interferes with family life
12. not receiving enough praise for the work you do
13. feeling of being imprisoned
14. union meetings
15. having too much influence over the lives of other people
16. job isolation
17. excessive paper work
18. minority group pressures
19. fear of using deadly force
20. existence of rigid rules and regulations
21. need for skills in interpersonal relationships

Thus, as with the patrol officers, the correctional officers were not bothered by many situations specific to their occupational role. Temptations, fear of charges of police brutality, feeling of being imprisoned, job isolation, and fear of deadly force were not bothersome. Job conditions, such as the need for overtime, which is probably seen as positive in terms of overtime pay was not stressful, nor was excessive

paper work. Nor were the officers bothered by the effects of their job on family relations. Trouble with children, lack of family pride in their work, interference with family likewise were rated low. The coldness and inflexibility of the prison also appeared not to be a problem. Being like a military organization, having rigid rules and regulations, the need to suppress emotions and lack of praise from supervisors were lowly rated. Political community pressure groups, resentment of inmate advantages, minority group pressures were not seen as problems.

Looking at the six officer groups individually, again, several items related to inmate interaction were lowly rated. Table 10 shows that for four of the officer groups, County White Hats and the three categories of State officers, the existence
(Insert Table 10 about here)
of temptations and corruption was rated as least stressful. County Short-Term Blue Hats ranked inmate advantages such as education and counselling as least stressful, while the Long-Term Blue Hats said tension between officers and their children was least stressful. There was little difference among the groups with regard to other items perceived as least stressful for the correction officers.

This issue of temptations and corruptions in relation to rules and regulations was addressed by Sykes (1958) in his Society of Captives, an in-depth sociological study of a New Jersey prison. Sykes holds that because of the unique nature of the prison authority structure in which compliance of the inmates is involuntary rather than voluntary, motivating the inmates to obey poses certain problems. According to Sykes "only by tolerating violations of 'minor rules' and regulations can the guard secure compliance of the 'major' areas of the custodial regime". Hence, he holds that for the prison system to operate it is necessary that 'corruption' among the correction officer ranks exist with the inmates.

"The guard (correction officer) is under pressure to achieve a smoothly running tour of duty not with the stick but with the carrot... he finds that one of the most meaningful rewards he can offer is to ignore certain offenses or make sure that he never places himself in a position where he will discover them. Thus, the guard... discovers that his best path of action is to make 'deals' or 'trades' with the captives in his power".

And, of course, in order for such bargaining over rules to occur, clear rules or guidelines must exist.

V. Techniques for Coping with Stress

In this section the degree to which the officers had explored methods of coping with stress, the types of coping activities they engaged in, and their attitudes towards the importance of coping with stress were explored.

The officers were asked to rate forty leisure-type activities such as listening to music, doing yoga, etc. on a six point scale from "never" to "very often" to indicate how often they used these activities to cope with stress. For the group as a whole, in order, the top thirteen activities chosen were:

1. listening to music
2. talking to a friend
3. sex
4. talking to family members
5. reading
6. working hard on the job
7. indoor hobbies
8. working in the house or garden
9. eating a favorite food
10. taking a car or bus ride
11. taking a vacation
12. cursing
13. outdoor sports and activities like fishing

Thus, the activities most utilized by the officers to cope with stress were primarily positive. The most frequently used appeared to be low-key and passive rather than very active. Both social and solitary activities were included and the activities were primarily home and family centered. An exception to this latter characteristic appears in the item rated sixth, "working hard on the job". Interestingly, in the earlier Cheek study of the experience of tension of various diagnostic groups, the normal comparison group rated "working hard at the job" fourth as a stress-reducing technique. It should be noted, however, that recent studies of coping mechanisms for stress suggest a risk factor associated with health when this technique is employed (Friedman and Rosenman, 1968, 1974).

The middle range of coping techniques included some negative activities like withdrawing, as well as chemical means, like cigarette smoking and coffee drinking. Least used, were very negative means like hitting, or kicking someone, drugs, either non-prescription or prescription, and both the formal types of therapy, like seeing a therapist, and less formal, like breathing exercises and massages.

Though formal therapies were not reported as being much utilized as coping techniques, the officers reported frequent use of talks with friends and with family members as tension coping devices. This finding was supported by the officers' responses to a direct question concerning the frequency of meaningful talks with various other persons about their job problems. When the officers were asked to rate the frequency on a six point scale from "never" to "very often" spouses were most frequently reported as confidantes, (average 4.1, sometimes), next came others at work (4.0) and immediate supervisors (average 4.0), close friends (average 3.4) and other relatives (average 2.6).

Direct comparison cannot be made with Kelling's patrol sample, in this matter, because the present study utilized a six rather than a five point scale and focused on discussion of job problems, rather than personal problems as in the Kelling study. However, it is worth noting that the patrol sample also found spouses most frequently reported as confidantes (3.80). For the patrol sample colleagues were second (2.56), close friends third (2.42), immediate supervisors fourth (2.11) and other relatives fifth (2.01), unlike the correction officer sample where immediate supervisors were second, then other people at work, close friends and other relatives. This difference in the position of the immediate supervisor, probably reflects the fact that the correction officers were discussing job related problems rather than personal ones, as in the case of the patrol officers. The reported high use of spouse as a confidante for both job related and personal problems is somewhat surprising in light of the high divorce rates for both the patrol and correction officer samples, unless the families did not appreciate these discussions.

It would be recalled that use of both prescription and non-prescription drugs to reduce stress was reported to be low. The officers' reports of actual use of a variety of drugs did not entirely support this. When asked which of several medications they had used during the past month, the officers reported most use of aspirin or headache medicines (70% had used), cough or cold medicines (36%), antacids (30%), laxatives (31%), pep medicine (8%), tranquilizers (7%), and sleeping pills (3%). The high use of aspirin ties in with the previous response that headaches were the most frequent physical symptom experienced with stress.

The officers also did not report use of alcohol, coffee or cigarettes as primary coping techniques. This was supported to some extent by the officers reports of actual use. In their responses to the question regarding use of these as coping techniques the order of use reported was cigarettes, coffee and then alcohol and these were all in the medium or lower range of use.

The average number of cigarettes reportedly smoked per day by the total sample was 13.91.² The County officers (12.01) were lower than the State officers (16.17) in this regard. In the Kelling study, the average number of cigarettes smoked by the patrol officers was 13.13, very close to the present sample.

The average amount of coffee drunk per day by the total sample was 3.42 cups. The County officers (3.68) were higher than the State officers (3.10) in this regard, though the difference was not great. Both groups were lower than the two sample groups in the patrol study; the ICPA sample was 4.70, the NIOSH sample was 3.74.

For beer drinking, 21% reported drinking 1-2 bottles per day; 11%, 3-5 bottles per day; 1% more than 6 bottles per day. For liquor, 4% reported drinking 1-2 shots per day; 2% 3-5 shots per day; 1%, 6 or more shots per day. For wine, 11% reported drinking 1-2 glasses per day; 2%, 3-5 glasses per day and 1%, 6 or more glasses per day.

Finally, the reported tendency of the officers to engage primarily in low-key, passive activities as tension-reducing techniques rather than practice of sports activities and jogging did not suggest extensive involvement in these activities. However, despite the perceptions of their activities, their actual involvement was

notable. Thus, the average time spent in physical conditioning, including weight lifting, per week for the whole sample was 5 hours, 12 minutes. This was considerably higher than both the ICPA (2 hours, 12 minutes) and NIOSH (4 hours, 23 minutes). The State Correction Officers spent more time (5 hours, 53 minutes) in physical conditioning than County Officers (4 hours, 42 minutes). The Short-Term officers within both State and County groups spent the most time in such activities. Both the State and County Blue Hats participated in physical conditioning for time periods nearly twice as long as those of their White Hat counterparts.

DISCUSSION

For comparability, both State and County officers were studied, while to examine the effects of job status on the experience of stress for correction officers, Blue Hats were compared with White Hats and to look at the effects of length of service the differences between those officers with 2 years or less in corrections were compared with officers with more than 2 years in service. Some differences with regard to these groupings appeared which will be examined more systematically with correlational analysis in a later study. Thus, the County officers were more likely to see themselves as more successful, important and doing their best at work than did the State officers. Also, the County officers were lower on physical problems on the Selye scale. It appeared, then, that self-esteem at work was related to stress. This relationship was also suggested by the fact that neither length of service nor job status appeared to determine the amount of stress, but rather self-esteem on the job. However, on the whole, the responses of the officers in all categories followed a fairly consistent pattern.

From the point of view of their own self-perceptions, the officers were not greatly stressed, and the stress they did experience appeared to come largely from their interaction with inmates. However, the additional data gathered provided a more complex picture of the matter.

Thus, while the correction officers did not perceive themselves as greatly stressed, they did see their fellow officers as more stressed than themselves, and working in corrections as moderately more stressful than working in other occupations. Emotional status was seen as more likely to suffer from job stress, then physical health, family relations and job performance, in that order.

With regard to stress associated with various members of the role set, being with inmates was seen as most likely to cause stress. Next came being with those supervised, other correction officers and one's own supervisors in that order. In

terms of situations causing stress, those involving violence such as stabbings, inmates with weapons, etc. were seen as most tension-arousing. Again, the most disliked situations usually involved violence, however, here, problems with co-workers such as incompetence and need for constant supervision assumed greater significance.

As to the temporal experience of tension, the second shift proved the most tension arousing, a time which would involve much individual contact with inmates, and the first shift least, when inmates would be in various structured activities. When tense, the officers reported experiencing most frequently head and neck symptoms. They said they were most likely to be lively and energetic when tense, and, in terms of behavioral effects of tension, reported aggressive, acting-out behaviors rather than under-assertive, passive responses.

The picture thus far, from the point of view of the perceptions of the officers, is standard and fairly cohesive. It suggests impassive, tough men, denying their feelings and weaknesses, (the macho image) irritated by their encounters with inmates, probably, when disrespect to their authority is shown, and responding with overt, aggressive behaviors, rather than holding on to their anger. Similar patterns have been noted for police (Wilson, 1971; Skolnick, 1966).

However, as we begin to look at the consequences of correction officer stress in terms of actual indices like physical health, job performance and marital relations a more complex and somewhat different picture emerges, which suggests that their tension and anger may be denied, internalized, and displaced. For example, denial and internalization are suggested by the fact that the correction officers reported good health, in that they felt there had been little decline in health since joining corrections and listed fewer minor symptoms than the patrol officers, whereas their actual rates of serious physical illnesses like hypertension, ulcers, heart disease, diabetes as well as hay fever, gout, gall bladder, and hypoglycemia were higher than the patrol sample.

Denial is also suggested by the fact that when asked to report their observations on consequences of stress like heart attacks, suicides, other physical health problems, marital problems, etc. in their co-workers, the officers, like the patrol sample, saw considerable evidence of stress. The officers also rated their co-workers as having more stress than themselves. Thus, they appeared to have greater awareness of stress in others than in themselves. Displacement is suggested by the high divorce rates and by the fact that negative feelings towards inmates, letting out tension in the wrong places, and tightening of discipline were seen as products of job stress.

Thus, strategic impairment in job performance is suggested. However, once again, problems in work adjustment were denied as they, like the patrol sample, rated themselves as quite positive about working in corrections and about their present jobs, though they were somewhat less positive about again taking a job in corrections or advising a friend to do so. Also, in their responses to the self-image at work question, they saw themselves as more successful, satisfied with their degree of effort, important and happier than the patrol sample.

However, despite their positive view of their job adjustment, and in spite of their initial reports of the inmates being the most stressful factor in their job situation, when they were queried in more depth as to the causes of their stress, the correction officers rated administrative matters and not inmate-related situations as most stressful. Next in order were items related to job conditions, interaction with inmates, family relations and legal and community activities.

Of the administrative items, those related to role ambiguity, such as lack of clear guidelines for job performance, and policies not being clearly communicated, etc., and role conflict such as getting conflicting orders from supervisors were most prominent. Items related to self-esteem, such as not being treated as a professional, and to autonomy on the job, such as lack of participation in decision-making, were also seen as very important in causing stress.

Thus, correction officers were similar to patrol officers in that items related to role ambiguity, role conflict, autonomy, and self-esteem were high in their list of job stressors (Margolis et. al., 1974; Kelling, 1977; Aldag and Brief, 1978). However, as in the Aldag and Brief study, the correction officers, like the police officers, rated items associated with role ambiguity and role conflict as more stressful than those related to job autonomy and self-esteem.

Role ambiguity is probably a highly significant source of stress for correctional personnel, in that working within the context of a tightly controlled environment, it is important to know the 'right way' to do things to avoid getting into trouble for doing them the wrong way. When guidelines are unclear it is impossible to know the right or wrong way and criticism and punishment for the officers may become arbitrary and perhaps personal. The particularly high emotional and physical distress experienced by correction officers in this situation might result because correctional work selects out authoritarian types who need control and specificity of rules to function. Unfortunately, there are no definitive studies of personality characteristics of correction officers to date.

In line with this, the correction officer respondents in this study indicated that the military, authoritative nature of correctional organizations did not bother them. Moreover, they also were not stressed by the presence of rigid rules and regulations. Thus, the correction officers appeared to prefer a more highly structured and disciplined situation. In this regard it is interesting that Lawrence (1978) showed that the personality of the individual police officer is related to the kinds of job factors producing stress. Thus, two inputs into this situation, the personality of the correction officer, and the characteristics of the organization are probably significant in determining sources of stress and impact on the officers.

The stressfulness of role ambiguity was also suggested by comments of students in the Stress Awareness courses at the Correction Officers Training Academy. One Short-Term Blue Hat officer remarked, "When we know how we are supposed to act, it is easier for us to do our jobs. When the officer on the first shift acts one way, and the

officer on the second shift another way, it makes it hard for me the third shift officer, to operate, because the inmates capitalize on the situation and try to manoeuver and manipulate us".

An older White Hat student reflected this preference for standardization and for rigid rules, when he said, "It's not like it was years ago, when the inmates had to walk to mess hall two by two. Now there's too much freedom and not enough discipline in the prison". Thus, it is lack of standardization and resultant ambiguity within the correctional setting that poses problems for officers. The officers in the stress courses also saw the confusion as having occurred over time and as presently increasing. They attributed much of this confusion to the previous movement from a custodial to a rehabilitative orientation in corrections and the present tendency for movement back to a custodial point of view.

And, indeed, in understanding the prevalence of role ambiguity in the correctional setting, it is important to consider the nature of correctional organizations and their historical development. Cressey (1959) and Grusky (1954) have pointed out that correctional organizations by their nature have a double bind conflict built into them, through the continuing controversy regarding custody vs. treatment. Not only is the institution committed to pursuing two conflicting goals, but the emphasis between the goals changes over time, in response to varying social philosophies, as well as to political and legal pressures. Hence, administrative policies may be poorly defined and may alter frequently. As a result the correction officer finds it difficult to function in his occupational role, because of his uncertainty as to what rules are operative at any particular time. Kahn (1974) has commented on the contribution of organizational change to role ambiguity.

Moreover, while custody requires the presence of clearly defined rules and regulations in order to maintain control, lack of rigidity in the bureaucratic authority structure would be characteristic of more treatment oriented correctional facilities (Cressey, 1965). Thus, the security of officers in their simpler, more impassive and impersonal custodial roles would be jeopardized as they are forced to deal with inmates on a more personal basis, in which it is not appropriate to

define roles and operate with specific guidelines. Pogrebin (1979) has described this kind of situation in treatment oriented correctional institutions. Interestingly Merton (1957) has pointed out the fact that highly bureaucratic rules function to protect the job incumbent in this way. For instance, problems in enforcing rules could develop as officers begin to care for their charges (Sykes, 1958), creating anxiety.

Finally, let us summarize the major findings briefly. First, the correction officers, like the patrol officers, showed high rates of physical illnesses, and divorce, higher than those of the other occupations to which Kelling compared the patrol officers. Indeed, for many illnesses, the rates for correction officers were higher than those for the patrol sample. Secondly, stress appeared to relate to self-esteem on the job but not necessarily to length of time on the job or to job stress. Thirdly, administrative policies and procedures fostering role ambiguity appeared to be most significant in producing stress, rather than matters associated with the correction officer role per se.

To return to the original purpose of the study, what do these findings indicate about the training of correction officers in Stress Awareness and Coping Techniques? First, that a need exists for this training in terms of actual physical, emotional and interpersonal consequences of correction officer stress. Secondly, that stress awareness must be taught because it appears that officers are not aware of their stress and of its major triggers for them. Thirdly, while the coping techniques presently utilized by officers are primarily positive, they may not be the most effective, so that training in this area is necessary. For instance, it would be useful to provide instruction in simple but effective techniques such as relaxation training to help the officer to cope with inner stress, as well as assertive training to enable the officer to handle tension-producing interpersonal situations more effectively. The families of correctional officers also would appear to be in serious need of training in Stress Awareness and Coping Techniques.

In closing, these findings also suggest that further research studies should examine in-depth the organizational factors, including administrative procedures and managerial styles that produce stress in the correctional settings. With this sort of information, special training programs might be developed for managers aimed at reducing administrative stress-producing malfunctions, as suggested by this study. Until such information and programs are available, correctional managers might consider a review of and tightening of standards of job performance, improved communication regarding administrative matters and greater input of officers into decision-making (more of a team approach) as measures to reduce organizational stress.

FOOTNOTES

¹ Kelling included two samples, the International Conference of Police Chiefs Associations (ICPA), which utilized a mailed questionnaire for which respondents were randomly selected, and the National Institute of Occupational Safety and Health Study (NIOSH), in which questionnaires were distributed to as many officers as possible in 16 departments around the country. The ICPA included 1,591 patrol officer respondents, which 31.6% return. The NIOSH sample included 667 respondents, with a 64.9% return rate.

² While most of the questions on the questionnaire were responded to by the complete sample, some of the officers did not respond to the question regarding use of cigarettes, etc. Because it was felt that some might not answer in order to conceal their use, the percentages of use were calculated in terms of members of actual responses for cigarette smoking (120) , coffee drinking (137), bottles of beer (129), glasses of wine (114) and shots of liquor (95).

REFERENCES

- Aldag, R.J. and Brief, A.P. (1978). "Supervisory style and police role stress." Journal of police science and administration. 6: 362-367.
- Becker, H.S., Geer B., Hughes, E.C. and Strauss, A. (1961). Boys in white. Chicago: University of Chicago Press.
- Cheek, F.E., "A survey of the experience of tension in alcoholics and other diagnostic groups". International journal of neuropsychiatry. 3: 477-488.
- Cressey, D., (1959). "Contradictory directives in complex organization: the case of the prisons". Administrative science quarterly. 4: 1-19.
- Friedman, M., M.D., and Rosenman, R.H., M.D. (1968). "Etiology and pathogenesis of coronary arteriosclerosis." Cardiovascular disorders. Phil.; F.A. Davis.
- ____ (1974). Type A behavior and your heart. New York: Alfred A. Knopf.
- Grusky, O., (1959). "Role conflict in organizations: a study of prison camp officials." Administrative science quarterly. 3: 457-472.
- Gurin, G., Veroff, J. and Feld, S. (1960). Americans view their mental health. New York: Basic Books.
- Inkeles, A. (1960). "Industrial man; the relation of status to experiences, perception and value." American journal of sociology. 66: 1-31.
- Jacobs, J.B., (1978). "What prison guards think: a profile of the Illinois force." Crime & delinquency. 24: 185-197.
- Joint Commission on Correctional Manpower and Training, (1968). "A climate for change." Washington.
- Kahn, R.L., Wolfe, D.M., Quinn, R.P., Snock, J.D., Rosenthal, R.A., (1964). Organizational stress. New York: Harper and Row Media.
- Katz, D., and Kahn, R., (1952). "Some recent findings in human relations research in industry". In G. Swanson, T. Newcomb & E. Hartley (Eds.) Readings in social psychology. New York: Holt.
- Kelling, G.L., & Pate, T., (1977). "Job stress among police officers". HEW Pre-Publications No. 7604228, National Institute for Occupational Safety and Health, Cincinnati, Ohio
- Kirkham, G., Officer stress awareness. New York: Harper and Row Media.
- Kroes, W.H., Margolis, B.L., Hurrell, J.J. Jr., (1974). "Job stress in policeman". Journal of Police Science and administration. 2: 144-5

- Kroes, W.H., Hurrell, J.J. Jr., (1975). "Job stress and the police officer: identifying stress reduction techniques". HEW Publication No. NIOSH 76-187 National Institute of Occupational Safety and Health, Cincinnati, Ohio,
- Lawrence, R., (1978). "The measurement and prediction of police job stress", unpublished dissertation, Texas: Sam Houston University.
- Margolis, B.L., Kroes, W.H., Quinn, R.P., (1974). "Job stress: an unlisted occupational hazard", Journal of occupational medicine, 16: 659-61
- Merton, R.K., (1957). "Bureaucratic structure and personality," in Social theory and social structure, Glencoe, Ill: Free Press.
- New York State, (1975). "For a more humane approach to employee disabilities". Albany: State of New York.
- Pogrebin, M., (1978). "Role conflict among correctional officers in treatment oriented correctional institutions," International journal of offender therapy and comparative criminology.
- Selye, H., (1976). The stress of life . New York, McGraw-Hill.
- Skolnick, J., (1966). Justice without trail . New York: Wiley.
- Sykes, G.M., (1958). The society of captives: a study of a maximum security prison . Princeton, Princeton University Press.
- Wahlund, I., & Merell, G., (1976). "Work environment of white collar workers". Central Organization of Salaried Employees, Stockholm, Sweden.
- Wilson, J.Q., (1971). Varieties of police behavior . New York: Atheneum.
- Wynne, J.M. Jr., (1977). Prison employee unionism: the impact on correctional administration and program . California; American Justice Institute.

Demographic Characteristics Of The Groups
TABLE 1

Sex	<u>County</u>				<u>State</u>			
	<u>Short-Term Blue Hat</u>	<u>Long-Term Blue Hat</u>	<u>Long-Term White Hat</u>	<u>Total</u>	<u>Short-Term Blue Hat</u>	<u>Long-Term Blue Hat</u>	<u>Long-Term White Hat</u>	<u>Total</u>
Male	23	21	22	66	19	21	15	55
%	30%	27%	28%	85%	29%	32%	23%	84%
Female	5	4	3	12	3	4	3	10
%	06%	05%	04%	15%	05%	06%	05%	16%
<u>Age</u>								
19-30	22	8	5	35	15	8	0	23
%	28%	11%	06%	45%	23%	12%	00%	35%
31-40	4	7	6	17	6	12	3	21
%	05%	09%	08%	22%	09%	18%	05%	32%
41-50	1	7	7	15	1	3	8	12
%	01%	09%	09%	19%	02%	05%	12%	19%
50 +	1	3	7	11	0	2	7	9
%	01%	04%	09%	14%	00%	03%	11%	14%
<u>Mean Years of Service</u>								
	10 mos.	5 yrs. 9 mos.	9 yrs. 4 mos.	5 yrs. 5 mos.	1 yr. 3 mos.	5 yrs. 10 mos.	15 yrs.	6 yrs. 10 mos.
<u>Ethnicity</u>								
White	21	15	22	58	17	22	11	50
%	27%	19%	28%	74%	26%	34%	17%	77%
Black	5	9	2	16	3	3	6	12
%	06%	12%	03%	21%	05%	05%	08%	18%
Hispanic	2	1	0	3	0	0	0	0
%	03%	01%	00%	04%	00%	00%	00%	00%
Other	0	0	1	1	2	0	1	3
%	00%	00%	01%	01%	03%	00%	02%	05%
<u>Marital Status</u>								
Never married	15	5	5	25	6	3	4	13
%	20%	06%	06%	32%	09%	05%	06%	20%
Married, never divorced	9	14	13	36	11	14	11	36
%	11%	18%	17%	46%	17%	21%	17%	55%

Demographic Characteristics Of The Groups
TABLE 1 (Cont.)

<u>Marital Status</u>	<u>County</u>				<u>State</u>			
	<u>Short-Term Blue Hats</u>	<u>Long-Term Blue Hats</u>	<u>Long-Term White Hats</u>	<u>Total</u>	<u>Short-Term Blue Hat</u>	<u>Long-Term Blue Hat</u>	<u>Long-Term White Hat</u>	<u>Total</u>
Remarried	2	3	5	10	1	4	2	7
%	03%	04%	06%	13%	02%	06%	03%	11%
Divorced	1	3	2	6	1	3	0	4
%	01%	04%	03%	08%	01%	05%	00%	06%
Separated	1	0	0	1	3	1	1	5
%	01%	00%	00%	01%	05%	2.5%	2.5%	08%
<u>Education</u>								
H.S. Grad or less	14	11	6	31	7	10	2	19
%	18%	14%	08%	40%	11%	15%	13%	29%
Some College or Tech. Sch.	12	12	18	42	15	12	14	41
%	15%	15%	22%	54%	23%	18%	22%	63%
College degree and/or grad work	2	2	1	5	0	3	2	5
%	2.5%	2.5%	01%	06%	00%	05%	03%	08%

TABLE 2
SYMPTOMS, ON DUTY

Symptom (N)	Mean Occurrence in Past Month (0=Never 1=Once 2=Twice 3=Three or more times)		
	C.O.	ICPA	NIOSH
Headaches	1.28	1.72	1.50
Being fidgety or tense	1.06	1.86	1.34
Being nervous or shaky inside	.86	1.47	N.D.*
A loss of appetite	.76	.92	.69
Stomachaches	.38	.81	.64
Backaches	.30	1.37	.94
Hands sweating so that you felt damp and clammy	.34	.61	.39
Constipation	.31	.61	.40
Being bothered by your heart beating faster than usual	.24	.51	.16
Nausea	.22	.41	.32
Spells of dizziness	.22	.20	.11
Shortness of breath when you were not working hard or exercising	.17	.38	.16
Feeling you were going to have a nervous breakdown	.11	.19	.10
Hands trembling enough to bother you	.10	.24	.16
Fainting or blacking out	.05	.01	.03

*N.D. - No data was collected

TABLE 3
SYMPTOMS, OFF DUTY

<u>Symptom (N)</u>	Mean Occurrence in Past Month (0=Never 2=Twice 1=Once 3=Three or more times)		
	<u>C.O.</u>	<u>ICPA</u>	<u>NIOSH</u>
Headaches	1.03	1.63	1.38
Trouble falling or staying asleep	.92	1.67	1.22
Being fidgety or tense	.62	1.30	.83
A loss of appetite	.48	.69	.48
Backaches	.39	1.22	.82
Being nervous or shaky inside	.28	.73	.38
Stomachaches	.27	.74	.56
Constipation	.25	.55	.36
Nightmares	.22	.64	.38
Nausea	.22	.37	.25
Hands sweating so that you felt damp and clammy	.22	.36	.21
Being bothered by your hear beating faster than usual	.14	.31	.16
Shortness of breath when you were not working hard or exercising	.13	.30	.14
Hands trembling enough to bother you	.12	.17	.09
Feeling you were going to have a nervous breakdown	.10	.18	.10
Spells of dizziness	.08	.20	.08
Fainting or blacking out	.06	.01	.03

TABLE 4

Total Illnesses by Frequency During the Past Six Months,
Correction Officer Sample,
Patrol Officer Sample and
23 Occupation Sample

<u>Illness</u>	<u>C.O.</u>	<u>P.O.</u>	<u>WORKERS*</u>
A cold/influenza	42.7%	68.1%	70.0%
Hypertension/high blood pressure	16.8	10.1	9.2
Hay fever	12.6	11.9	10.8
Trouble with teeth or gums	11.2	14.3	N.D.
Arthritis or rheumatism	8.4	9.5	12.6
Migraine/severe headaches	8.4	13.7	N.D.
Trouble with seeing	7.8	8.2	12.0
Trouble with gastrointestinal tract	6.3	12.7	N.D.
Ulcers	5.6	5.1	4.8
Trouble with hearing	4.5	6.5	7.8
Bronchitis	4.5	5.6	5.8
Trouble with spine	4.2	13.5	18.8
Heart disease/trouble	3.5	1.4	2.1
Trouble with urinary tract	3.5	4.5	N.D.
Gout	2.9	1.1	N.D.
Repeated skin trouble	2.8	9.6	10.3
Gall bladder trouble	2.4	0.9	N.D.
Diabetes	2.4	1.2	2.2
Whiplash injuries	2.1	5.1	N.D.
Hypoglycemia/low blood sugar	1.4	1.0	N.D.
Paralysis, tremor or shaking	1.4	2.8	N.D.
Asthma	1.4	2.2	2.3
Hernia or rupture	1.4	1.5	2.5
Kidney trouble	0.7	1.7	N.D.
Mental illness/nervous breakdown	0.7	0.7	N.D.
Venereal disease	0.7	0.7	N.D.
Liver trouble	0.7	0.5	N.D.
Epilepsy	0.7	0.3	0.2
Cancer	0.7	0.3	0.2
Tuberculosis	0.7	0.3	0.2
A stroke	0.7	0.2	0.1
Thyroid trouble/goiter	0.7	1.0	2.5

*Having illness for the past

N.D. - No data collected

TABLE 5

Percent of Illness Judged to be Caused or Made Worse by the Job

<u>Illness</u>	<u>Percent Termed Job Related Correction Officer</u>	<u>Percent Termed Job Related Patrol Officer</u>
Hypertension or high blood pressure	66.6	69.4
Heart disease or heart trouble	60.0	58.1
Migraine or severe headache	58.3	51.9
Trouble in gastrointestinal tract	55.5	62.9
Hernia or rupture	50.0	57.6
Paralysis, tremor or shaking	50.0	62.5
Gall bladder trouble	50.0	52.4
Diabetes	50.0	35.7
Trouble with hearing	42.9	42.2
Whiplash injuries	33.3	80.0
Trouble with spine	33.3	79.3
Arthritis or rheumatism	33.3	50.5
Bronchitis	28.6	54.0
Trouble with seeing	27.3	49.5
Repeated skin trouble	25.0	44.0
Gout	25.0	28.0
A cold or influenza	16.4	42.4
Hay fever	11.0	26.4
Mental illness or nervous breakdown	0.0	66.7
Tuberculosis	0.0	50.0
Hypoglycemia	0.0	45.5
Trouble in the urinary tract	0.0	43.6
Epilepsy	0.0	42.9
Kidney trouble	0.0	41.0
Stroke	0.0	40.0
Asthma	0.0	34.0
Liver trouble	0.0	33.3
Venereal disease	0.0	31.3
Cancer	0.0	28.6
Trouble with teeth or gums	0.0	11.2
Thyroid trouble or goiter	0.0	9.1

TABLE 6
Perceptions of Co-Workers with Problems
among 5 Closest Colleagues

<u>Types of Problem</u>	<u>Correction Officer</u>	<u>Police Officer</u>
Alcohol	27%	23%
Marriage	26	37
Children	14	20
Health	30	36
Finances	36	*N.D.
Drugs	4	10
Neighbors	8	21

*N.D. = No data

TABLE 7 *

Comparison of Responses of State & County Officer to
Patrol Officer & Occupational Sample to Self-Esteem Items.

	<u>State</u>	<u>County</u>	<u>Total</u>	<u>Occupational</u>	<u>Patrol</u>
Doing My Best - Not Doing My Best	1.9	1.5	1.7	1.6	2.3
Sad - Happy	5.3	5.3	5.3	5.9	5.1
Successful - Not Successful	2.1	1.7	1.9	2.0	2.4
Important - Not Important	2.9	2.0	2.4	2.2	3.3

* Note that high scores indicate low performance, success and importance.

TABLE 8

	Self-Esteem (ave. of Self- Esteem items)	Signs of Stress (ave. of Selye items)
<u>County</u>		
Short-Term Blue Hats	6.0	1.6
Long-Term Blue Hats	6.1	1.6
White Hats	5.9	1.8
<u>State</u>		
Short-Term Blue Hats	5.4	1.9
Long-Term Blue Hats	5.0	2.0
White Hats	5.7	1.8

TABLE 9

The Ten Most Frequent Causes of Stress for State & County Correction Officers

No	<u>County</u>			<u>State</u>		
	<u>Blue Hat Short-Term</u>	<u>Blue Hat Long-Term</u>	<u>White Hats</u>	<u>State Basic Short-Term</u>	<u>Blue Hat Long-Term</u>	<u>White Hats</u>
1	Crisis situations.	Lack of clear guidelines.	Crisis situations.	Lack of encouragement of new ideas.	Not treated as professionals.	Low morale of other officials.
2	Unpleasant sights.	Lack of respect from inmates.	Lack of clear guidelines.	Lack of clear guidelines.	Not being informed about policy changes.	Conflicting orders from supervisors.
3	Not adequate pay.	Lack of training.	Do things against better judgement.	Crisis situations.	Criticism from supervisors in front of inmates.	Other personnel putting things off.
4	No sharing of information among shifts.	Not being able to use skills from previous training.	No adequate pay.	Lack of training in riot control.	Lack of clear guidelines.	Crisis situations.
5	Having to bend department policies to get job done.	Poor physical working conditions.	Lack of support from supervisors.	Facility policies not being clearly communicated.	Getting conflicting orders.	Too little authority to carry out responsibilities.
6	Lack of clear guidelines.	Not receiving adequate pay.	Facility policies not being clearly communicated.	Not knowing how supervisor evaluates performance.	Poor physical working conditions and equipment.	Facility policies not communicated clearly.
7	Lack of first-aid training.	Not being informed about policy training.	Lack of training.	Feeling of being imprisoned.	Supervisor not keeping you well informed.	Officers not being informed about policy changes.
8	Do things against your better judgement.	Low morale of other officers.	Poor physical working conditions.	Getting conflicting orders from supervisors.	Other personnel putting things off.	No say in transfer or duty assignment.
9	Family worried about you.	Facility policies not being clearly communicated.	Decisions continuously being overturned.	Supervisor giving conflicting orders.	Lack of support from supervisors.	Lack of opportunity to participate in decision making.
10	Not being kept informed by supervisors.	Criticism from supervisors in front of inmates.	Excessive criticism from supervisor.	Officers not being quickly informed of policy changes.	Excessive criticism from supervisors.	Difficulties in getting promoted.

TABLE 10

The Ten Least Frequent Causes of Stress for State & County Correction Officers

No.	<u>County</u>			<u>State</u>		
	<u>Blue Hat Short-Term</u>	<u>Blue Hat Long-Term</u>	<u>White Hats</u>	<u>State Basic Short-Term</u>	<u>Blue Hat Long-Term</u>	<u>White Hats</u>
1	Resentment of inmate advantages.	Most of the time having tension between you and your children.	Temptations - corruptions.	Temptations - corruptions.	Temptations - corruptions.	Temptations - corruptions.
2	Fear of losing control of oneself.	Need to suppress emotions.	Being a target of hostility.	Political community pressure groups.	Fear of actual harm.	Facility too much like a military organization.
3	Need to understand legal issues in corrections and prison social problems.	Resentment of inmate advantages - education counseling.	Resentment of inmate advantages - education counseling.	Facility too much like a military organization.	Fear of charges of police brutality.	Feeling of being imprisoned.
4	Not receiving enough praise for the work you do.	Temptations - corruptions.	No freedom in setting own work hours.	Union activities.	Political community pressure groups.	Need for overtime-long hours.
5	Political community pressure groups.	Not being satisfied with pace of work.	Union meetings.	Need for overtime-long hours.	Feeling of being imprisoned.	Political community pressure groups.
6	Feeling job interferes with family life.	Time pressure of the job.	Feeling of being imprisoned.	Fear of using deadly force.	Need for overtime-long hours.	Tension between you and your children.
7	Fear of charges of police brutality.	Feeling job interferes with family life.	Lack of respect from inmates.	Tension between you and your children.	Facility too much like a military organization.	Immediate supervisor will not bail you out when you need it.
8	Being a target of hostility as an authority figure.	Job having negative effect on home life.	Existence of rigid rules & regulations.	Fear of charges of police brutality.	Need for skills in interpersonal relations.	Family not taking pride in work you do.
9	Facing continual deadlines.	Conflicting job obligations.	Pressure from other officers to conform to negative attitudes.	Excessive paperwork.	Too much influence over lives of others.	Fear of using deadly force.
10	Temptations - corruptions.	Fear of charges of police brutality.	Not receiving enough praise for your work.	Existence of rigid rules & regulations.	Resentment of inmate advantages.	Worry about family safety.

END