The Fixed Tour Experiment in the 115th Precinct: Its Effects on Police Officer Stress, Community Perceptions and Precinct Management

Executive Summary

By

Colleen A. Cosgrove Jerome E. McElroy

AUGUST 1986 VERA INSTITUTE OF JUSTICE, INC. 377 BROADWAY NEW YORK, NEW YORK 10013

EXECUTIVE SUMMARY

Introduction

For some time, the New York City Police Department and law enforcement agencies throughout the country have been concerned with the negative effects of job-related stress on the health and well-being of police officers. In 1980, the New York City Police Department engaged the consulting firm of Rohrer, Hibler, and Replogle (RHR) to study the causes and effects of police officer stress and to make recommendations for alleviating the problem. RHR concluded that the rotating tour system, which required officers to change shifts on a weekly basis, had deleterious effects on their health and home lives. Therefore, RER recommended that the Police Department implement a steady tour system, on a limited and experimental basis, using officers who volunteered for the program.

At the same time, the Department was considering various approaches to improving the management structure on the precinct level. The Department was particularly interested in the "platoon commander" concept. In such a system, patrol sergeants would report directly to a lieutenant/platoon commander, rather than to the commanding officer of the precinct. The platoon commander would be responsible for all precinct patrol operations during his or her specific tour (platoon). The platoon commander concept is thought to promote accountability in supervision by giving the lieutenant the authority to direct operations in the station house and in the field. The Department recognized that implementing such a concept would be facilitated by a steady tour system, which would guarantee continuity of officers and supervisors in each platoon. The combination of the steady or "fixed" tour system and the platoon commander concept came to be known as the "fixed platoon concept" and the Department sought an opportunity to experiment with it.

The opportunity arose when, in 1983, the decision was made to open a new precinct, the 115th, in the Borough of Queens. The Precinct, officially opened on January 4, 1984, was made up of sections of the 110th and 114th Precincts. Based on crime and calls-for-service statistics for 1983, the year preceding its opening, the 115th immediately became one of the six highest activity precincts in the Borough. The 115th Precinct was staffed in a way that permitted implementation of the fixed platoon concept it was given a complement of volunteer police officers, sergeants, and lieutenants who were permitted to choose a tour (platoon) on which they would work steadily over the ensuing year.

The program in the 115th Precinct contained several distinctive elements, in addition to the fact that all police personnel worked steady tours. Everyone had volunteered for assignment to the Precinct and virtually everyone received his or her choice of steady tour. As a result, the same squads of patrol officers and the same sergeants worked together throughout the year. Each tour (platoon) was commanded by a lieutenant to whom that tour's patrol sergeants reported and who had responsibility for all precinct operations on his tour, both inside and outside the station house. And, to a large extent, individual officers tended to be assigned to the same patrol sectors over long periods of time.

Through these changes, the Police Department hoped to achieve several objectives, including: (1) reducing the levels of stress experienced by patrol officers; (2) delivering police services within the territory of the new precinct in at least as effective a manner as was the case before the precinct opened; (3) increasing the sense of safety of the civilian population there, and their positive assessments of police services in the area; and (4) realizing improvements in the management of patrol resources at the precinct level.

Several months before the opening of the 115th Precinct, the Department asked staff of the Vera Institute of Justice to consider the proposed design of precinct operations and to suggest how its effects on police officer stress and precinct productivity might be studied. Vera proposed a research strategy, which the Department in due course accepted; work was begun on the research design during August of 1983.

A. Methodology and Findings

The Vera Institute evaluation consisted of five components:

(1) documentation of project implementation; (2) assessment of changes in patrol officer stress levels; (3) assessment of the management advantages and disadvantages of the fixed platoon concept; (4) review of standard Police Department measures of precinct productivity; and (5) survey of community attitudes toward the police, before and after the opening of the 115th Precinct. The following narrative describes each of these components of the research and summarizes the findings.

1. Project Implementation -- Basic Data

The research data reveal that the complement of officers assigned to the 115th Precinct was young, 80% having had fewer than five years on the force. The vast majority appear to have been assigned to their first choice of tour. In the early months of precinct operations, officers in the 115th expressed some discontent with the unpredictability of their assignments to sectors and to either RMP or foot patrol. This seems to have been the result of platoon commanders spending several weeks trying out various combinations of officers in different assignments before making permanent assignments. By the fourth month of operations, however, these issues seemed to have been resolved.

Seventeen percent of the officers originally assigned had left the precinct by the end of the first year. However, these transfers appear to be unrelated either to the steady tour system or the fixed platoon management concept. Most of these officers received career advancement transfers, while some others made lateral transfers because the 115th precinct was not active enough to suit their preference.

2. Stress Assessment

Vera staff measured the stress levels among police officers assigned to the Precinct immediately prior to its opening in January, 1984. On January 2 (Time I), a standardized stress measuring instrument adapted by Vera for this purpose was administered to 133 of the 138 police officers assigned to the 115th precinct. Although the questionnaire only required approximately 20 minutes to complete, it was comprehensive and asked the respondent a series of questions related to: (1) job frustration (that is, the degree to which various aspects of the job are a source of frustration or stress, e.g., inadequate equipment, the promotion system, P.D. bureaucracy); (2) major pressures in personal life (e.g., marital problems, financial problems); (3) the extent to which the respondent enjoyed

being a police officer; (4) physical symptoms commonly associated with stress; (5) the effect that working schedules have had on various aspects of private life (e.g., family life, sleep, social life); (6) the officer's perception of stress-related problems among his/her three closest friends who are police officers (e.g., problems with spouses, excessive worrying, excessive complainants); (7) strategies that the officer uses to reduce stress (e.g., exercise, listening to music, hobbies); and (8) the ways in which being a police officer may cause problems in the household (e.g., communication problems with spouse, bringing work problems home).

In order to determine how stress changed over the course of the project, the instrument was administered again during May and June, 1984 (Time II) and for a third time period during December, 1984, and January, 1985 (Time III)

While this research strategy is suitable for identifying any changes in stress levels that occurred during the project year, it would not, without something more, demonstrate that any changes were attributable to the officers' working in the new precinct on steady tours. For example, it would be possible that stress levels among Queens police officers generally were rising or falling during the same time period, and that the observed changes among the officers working in the 115th were not significantly different from the general trend in the Borough (for example, observed changes in stress levels in the 115th might be attributable to general responses to changes in Borough- wide procedures or to shifting external pressures on the whole Department). Therefore, to provide some basis for inferring a relationship between the new program and any observed changes in the stress levels manifested by the 115th Precinct staff, a stratified, random sample of police officers from six other Queens precincts was selected. The comparison sample, consisting of a total of 146 officers from the 103rd, 105th, 109th, 110th, 113th, and 114th Precincts, completed the same stress questionnaires during January and February, 1984. The questionnaire was re-administered to the comparison group during a period in December. 1984, and January, 1985.

The comparison sample was stratified to resemble the seniority and gender distribution of the officers assigned to the 115th Precinct. Because the members of the comparison sample were selected from six Queens precincts, we may assume that they too would evidence any changes in stress measures that should be attributed to Borough or Departmental shifts in policy or procedure. Then, if changes in the stress levels of officers assigned to the 115th Precinct were not observed in the control sample, it would be reasonable to attribute the changes to the effects of the program in the 115th. (This strategy also provides some insight into how the initial stress levels of a totally volunteer force compare with those of a random sample of officers in the same borough command.)

The first stress indicator in the measuring instrument was the job frustration index. It consists of 30 items covering the four dimensions of police work which prior research had suggested as sources of frustration to officers: (1) the organization and administration of the department; (2) administration and supervision on the precinct level; (3) situations and working conditions encountered while on patrol; and (4) the actions of courts and other elements of the criminal justice system. The respondents were asked to rate each item as a source of annoyance on a scale of "seldom," "sometimes," or "frequently." For analytical purposes, a scoring system was developed in which each answer of "seldom" was assigned one point, "sometimes" two points, and "frequently" three points. The

scores were tallied on a scale ranging from a low of 30 to a high of 90 to derive each police officer's job frustration score. The scores were then combined to calculate the average job frustration levels for the experimental and comparison groups at each testing point.

The scores for the experimental and comparison groups on this index were comparable at Time I. However, at the end of the first year of program operation, there was a statistically significant reduction in the job-related frustration level for the 115th Precinct officers: between Time I and Time III it dropped from 53.4 to 50.0. In contrast, the job frustration level for the comparison group rose slightly over the course of the year, from 51.9 to 52.3.

Moreover, at the end of the first year, the experimental group reported significant reductions in job-related frustration for nine items: lack of recognition, frequent duty changes, boredom and isolation on assignments, doing non-police work, feelings of helplessness in assisting citizens who need aid, anxiety due to the officer having to deal with repulsive situations on patrol, working with incompetent officers, anger caused by Appellate and Supreme Court decisions restricting police action, and, of course, rotating tours

From Time I to Time III, comparison group officers reported significant stress reduction in only four areas: rotating tours (perhaps because the percentage of the comparison group working on the 9-squad rotational chart had dropped from 65% to 50% over the course of the year), partner assignments, duty changes, and feelings of helplessness. But officers in the comparison group reported significantly higher frustration in four areas: salary, public criticism of the police, the police officers union, and outside political influence on the police Department.

This phase of the research indicates that job frustration (both for the experimental and for the control group officers) flows, for the most part, from their perceptions of organizational and bureaucratic aspects of the police work and from the operations of the criminal justice system - matters over which police officers believe they have little control. Contributing to their job frustration, but at lesser intensity, were aspects of the immediate work environment such as lack of recognition for good job performance, actions of immediate supervisors, favoritism, lack of support, and lack of continuity in assignment. The officers in this survey reported little stress from dealing with repulsive or dangerous situations on patrol, being over worked on assignment, or receiving insults from the public. Although it may be stressful to deal with repulsive situations or be insulted by the public, these situations are relatively rare and, therefore, they do not appear to be major, continuous sources of stress. In contrast, having to cope with a police bureaucracy that they often think is insensitive to their needs, and dealing with perceived inefficiencies of the criminal justice system are more persistent sources of job frustration. (The results from this phase of the research are consistent with other studies of police occupational stress.)

For another measure of stress levels, the questionnaire presented a list of ten physical symptoms frequently associated with stress, and asked the respondents to indicate which symptoms they had experienced in the three months prior to completing the questionnaire. The principal finding here was that, while the percentage of officers in the

comparison group reporting no recent health problems rose from 30.8% at the beginning of the research year to 41.2% at the end of the year, the proportion of the experimental group reporting recent health problems almost doubled over that period, rising from 33.8% to 61.0%.

When the officers were asked to indicate how their duty schedules affected seventeen specific aspects of their personal lives, it was apparent that officers in the 115th precinct found that working steady tours had had very positive effects. Specifically, the officers were asked to indicate whether their current duty chart had positive, negative, or no effect on various aspects of their lives. The results for the experimental and comparison groups at Time I were similar-relatively small proportions of the officers in both groups reported that their cur rent working schedules had a positive effect on the selected aspects of their lives. For example, very few reported positive effects on family life, sleep, digestion, sex life, eating habits, alertness, social life, or friendships with non-police personnel.

The change in the experimental group from Time I to Time III was dramatic in many areas. The percentage reporting positive effects of duty schedule on family life rose by 50.1%, sleep by 52.9%, recreation by 45.8%, eating habits by 51.7%, digestion by 43.1%, energy level by 47.6%, and alertness by 46.9%. In contrast, the changes for the comparison group over the course of the year were negligible: the percentage reporting positive effects of duty schedule on sleep patterns rose by 2.4%, digestion by 4.1%, sex life by 6.6%, eating habits by 2.0%, and alertness by 2.3%. Moreover, unlike the experimental group, the percentage of comparison group members reporting positive effects from their current duty chart dropped for several aspects of personal life: positive effects of duty schedule on social life decreased by 0.4%, energy level by 4.4%, ability to hold a second job by 0.9%, and friendships with other police officers by 6.3%.

In sum, after a year of program operations, the patrol officers in the 115th Precinct reported lower levels of job frustration, fewer physical symptoms of stress, and more positive benefits in their personal lives from their steady tour duty charts, Similar changes were not evident among the comparison group officers, and it is reasonable to attribute the reduced stress levels among the officers in the 115th to the program operating there.

3. Managing a Precinct through the Fixed-Platoon Concept

During the research period, Vera staff were told repeatedly that "lieutenant" is the "lost rank" in the Department - a high rank without commensurate responsibility or authority. In a traditionally organized precinct, the lieutenant's primary function is to serve as the desk officer and control operations in the station house. He rarely becomes involved in the assignment system because these matters are usually handled by the commanding officer, roll call clerks, and the patrol sergeants. He rarely ventures into the street, because he is responsible for the station house. Routine "communications," citizens' complaints, and reports about post conditions are not directed to him; rather, they are forwarded to the Precinct Administrator. Often, the Commanding Officer will bypass the lieutenants and deal directly with the patrol sergeants, who know the conditions in the street and the officers in their squads.

By contrast, lieutenant platoon commanders in the 115th Precinct worked a fixed tour with the same sergeants and patrol officers and were delegated responsibility for directing all police operations during that tour. They were responsible to the Commanding Officer

for identifying the priority conditions to be addressed by the officers under their command and for allocating the resources available on the tour.

All of the platoon commanders in the 115th had served as lieutenants in other commands; without exception, they were dissatisfied with that role in traditionally organized precincts and much preferred the platoon commander role as it developed in the 115th.

To assess the management effects of the program in the 115th Precinct, Vera staff spent about six hundred hours in squads cars with patrol officers and supervisors on all three platoons, on weekdays and on weekends. As a result, the researchers became familiar with the conditions and problems that arise in this precinct on each of the tours, and the ways in which the officers assigned to those tours responded to various problems. Riding with the officers provided opportunities not only to observe patrol operations, but also to discuss informally their views on the many dimensions of the patrol function.

After several weeks of observation and discussion, Vera staff formally interviewed the Commanding Officer, the three Platoon Commanders, the Integrity Control Officer, the Operations Lieutenant, and eight Patrol Sergeants. These interviews were tape recorded. The interviews with the Lieutenants and the Commanding Officer lasted between an hour and two hours. The interviews with the sergeants were conducted while these officers were on patrol.

These observations of and interviews with precinct personnel lead to the conclusion that there are significant management advantages to the fixed-platoon concept as it has been implemented in the 115th. They may be summarized as follows:

- a. <u>The Chain of Command is Simplified.</u> The Commanding Officer deals directly with three platoon commanders, rather than fourteen sergeants. The lieutenants, in turn, deal directly with the three or four sergeants assigned to their platoons. In this system the span of control of the commanding officer and the lieutenants is reduced. In addition, the system promotes consistency and continuity in command.
- b. <u>Accountability and Responsibility.</u> Duties are clearly defined and responsibility is fixed. In this system it is very difficult to shirk responsibility and hide behind the anonymity of the 9-Squad Chart. Accountability extends not only to the platoon commanders and the patrol sergeants, but also to the police officers who are held accountable for conditions in their sectors, to which they can be more consistently assigned than is possible under the 9-squad rotation chart.
- c. <u>Meaningful Role for Lieutenants</u>. Lieutenants in the role of platoon commanders have a definite and useful place in the chain of command. They have authority and responsibility to direct all patrol operations during their tours. They are in the field and thereby develop a first-hand knowledge of conditions and problems in the street.
- d. <u>Improvement in the Quality of Supervision</u>. The presence of the lieutenant in the field adds a layer of supervision that is not available in traditionally organized precincts. As a result, the activities of sergeants and patrol officers are more carefully monitored, and lieutenants have the opportunity to work continuously with officers who need personal training or graduated levels of discipline.
- e. <u>Familiarity with the Area</u>. Because the same officers are patrolling the same territory at the same time of day every day, they develop an extensive knowledge of the area, the

people, and the problems. Thus, officers can be deployed more effectively to combat problems and deliver services to the community.

- f. <u>Teamwork</u>. Because the supervisors and the patrol officers are working with the same set of personnel every day, they tend to develop a sense of teamwork that fosters an attitude of cooperation. In this system, the police officers may themselves bring pressure on an officer who is not working as an effective part of the platoon.
- g. <u>More Efficient and Effective Deployment of Resources</u>. The 115th Precinct uses fewer specialized cars and units than many precincts in New York City, because the officers assigned to the RMP sectors and foot patrol posts perform tasks that are often delegated to specialized units in other precincts. The command does <u>not</u> deploy summon unit, burglary or robbery cars, or other specialized (and often temporary) units that are designed to deal with particular conditions. Nevertheless, the Precinct delivered a high volume of services which were well received by the residents (see, below).

Because a smaller percentage of the patrol force is assigned to specialized cars, the platoon commanders and sergeants have more resources to devote to everyday conditions in the precinct.

h. Improvement in the Quality of Police Services. The findings suggest that the fixed platoon concept is an efficient and effective management structure, simple yet powerful. It is reasonable to assume that an improvement in the management structure of a precinct, accompanied by the more appropriate deployment of resources that the program in the 115th seemed to permit, will result in improvements to the quality of police services.

One of the issues to which a Precinct Commander needs to be sensitive in this system is the possibility of platoons becoming isolated from one another. Many of those interviewed for the study cited this as the only potential disadvantage. Specifically, because the officers do not have the experience of working the Precinct across the tours or of working with officers assigned to the other tours, there is a tendency for them to develop some tunnel vision about the problems of the Precinct and to identify with the members of their platoons rather than with the Precinct as a whole.

While many of the respondents to Vera staff interviews recognized this as a potential limitation, all believed that it could be avoided through frequent communication between the Commanding Officer and the Platoon Commanders and among the Platoon Commanders and sergeants working the different tours. The focus of the communications suggested would be to orient all of the supervisory staff to the problems of the Precinct as a whole. In addition, several of those interviewed suggested that a sense of unity could be promoted, in a precinct organized around platoons and steady tours, by seeking out opportunities for periodic precinct-wide activities to engage all the officers.

It is important to note that the managerial benefits that seemed to flow from the adoption of a platoon commander structure in the 115th would almost surely be less evident if the structure were introduced into a precinct which continued to operate on the 9-Squad Chart. This is because the continuity of personnel and supervision probably contributed as much to the management benefits as did the increased responsibility and authority of the lieutenants

4. Measuring Productivity and Service Delivery

Vera's evaluation of the 115th Precinct program attempted to describe and measure the delivery of police services in the area, using a variety of conventional indicators. Vera staff used standard Department records where available, and when necessary created new data bases. Among the indicators used were absentee rates, volume of calls-for-service handled by the Precinct personnel, and level of crime complaints and arrests.

a. <u>Absentee Rates</u>: One of the reasons for instituting the steady tour system was the belief that, if the officers worked steady shifts, they would feel healthier and actually be healthier than if they were working the 9-Squad Chart. It was hypothesized that improvement in the state of their health would be reflected in a decline in absenteeism due to illness.

The Department measure of absenteeism is the average number of "man-days" lost per year. This rate is simply the number of days lost divided by the number of officers assigned to the command. For 1984, the average number of man-days lost for Patrol Borough Queens (PBQ) was 8.01. Thus, on average, each officer was absent due to illness approximately eight days a year. The 115th Precinct had the lowest absenteeism rate in PBQ - 4.90 man-days per year. This rate is 38.8% lower than the PBQ average. The Queens precinct with the second lowest absentee rate was the 109th with an absentee rate of 5.89 man-days per year. The absentee rate for the 109th, while much lower than the Borough average was still 20.2% higher than in the 115th. This finding suggests that the program (both steady tours and the platoon commander structure) in the 115th did in fact reduce officer absenteeism.

The 115th Precinct also had the lowest <u>civilian</u> absentee rate in the Borough--10.1 mandays per year compared to a Borough average of 14.3 man-days. This finding is surprising because civilians in all Queens precincts work steady tours and, therefore, there is no obvious reason for lower absenteeism rates for the 115th Precinct civilian staff. In this regard, it must be noted that the precinct with second lowest civilian absenteeism rate was again the 109th with an average civilian absentee rate of 11.14 man-days per year. While these results are inconclusive, the unusually low rate in the 115th may reflect a higher level of civilian morale brought about by the management innovations.

The Department routinely compiles several statistics designed to measure either workload or productivity or both. These measures include, but are not limited to, the number of crime complaints and arrests, the volume of calls for service, and the number of summonses issued for moving or parking violations.

In considering the statistics presented in the following sections, it must be noted that the 115th Precinct did not exist in 1983. However, the Department, in anticipation of the opening of that precinct, maintained statistics for those areas that would eventually become the 115th Precinct, and it is these statistics that are used in the comparisons between 1983 and 1984 activity levels.

b. <u>Summonses for Moving and Parking Violations</u>: The number of summonses for moving violations rose by 55.9% (from 5710 to 8904), compared to a 4.8% rise for the Borough as a whole. Similarly, the number of summonses issued for parking violations

increased by 42.8% (from 18,774 to 26,811) compared to a 6.3% Borough-wide increase. In fact, activity in the 115th accounted for approximately one-third of the Borough's increase in summonses for both parking and moving violations.

- c. <u>Complaints for Major Offenses</u>: The New York City Police Department groups serious crimes into seven major offense categories: murder and non-negligent manslaughter, forcible rape, robbery, felonious assault, burglary, grand larceny, and grand larceny auto.
- (1) The volume of complaints for the seven major offense categories for Patrol Borough Queens (PBQ), excluding the 115th Precinct, rose by 1.6%, from 95,926 in 1983 to 97,465 in 1984. During the period complaints rose by 4.3% in the 115th Precinct, from 7389 in 1983 to 7709 in 1984. That is: the volume of complaints for serious crimes increased somewhat more in the 115th Precinct than in the rest of the Borough.
- (2) Although the volume of complaints for the seven major offenses increased for PBQ, from 1983 to 1984, there was a 1.8% <u>decrease in the number of robbery complaints</u> for PBQ (excluding the 115th Precinct). In contrast, the volume of robbery complaints in the 115th Precinct rose by 5.7%, from 790 to 835.
- (3) similarly, the number of burglary complaints for PBQ, excluding the 115th Precinct, dropped by 5.8% (from 28,510 in 1983 to 26,859 in 1984), while burglary complaints in the 115th Precinct remained virtually unchanged (1599 complaints in 1983 and 1603 in 1984)
- d. <u>Total Crime Complaints</u>: The seven major offenses only cover the most serious criminal offenses. They do not include lesser crimes such as petit larceny, or offenses which are particularly subject to variations in reporting behavior, such as offenses against public morals (e.g., gambling, prostitution) or the possession and sales of drugs and narcotics. The volume of all crime complaints for PBQ, excluding the 115th Precinct, rose by 4.6% from 1983 to 1984 (186,894 to 195,472). During this same period, the total number of crime complaints in the 115th Precinct rose by <u>23.2%</u> from 12,533 to 15,438.

The increase in total crime complaints in the 115th appears, however, to be attributable to a greater willingness on the part of the residents of the 115th Precinct to report crimes, no matter how trivial, since the new precinct opened. As indicated above, the volume of reported serious crimes in the 115th Precinct increased by 4.3%. However, when the complaints for serious offenses are subtracted from the total volume of crime complaints for the 115th Precinct, it is evident that the number of complaints for lesser offenses, which are more likely to be affected by changes in reporting patterns, rose by 50.3% from 5,144 in 1983 to 7,729 in 1984. Thus, what at first appears to be an increase in the crime rate is more likely to be a substantial shift in citizen reporting patterns. This interpretation is also consistent with evidence, discussed below, indicating that residents and merchants in the 115th, very pleased with the opening of the new precinct, became considerably more likely to bring their problems to the attention of the police.

e. <u>Arrest Rates for the Seven Major Offenses</u>: Arrests for the seven major offenses for PBQ, excluding the 115th Precinct, declined by 5.7% from 10,375 to 9,788. In contrast, the volume of such arrests for the 115th Precinct increased by 43.2%, from 549 to 786. The 115th Precinct witnessed substantial increases in robbery arrests (up 111%, from 91).

in 1983 to 192 in 1984); felonious assault arrests (up 66.7%, from 99 to 165), burglary arrests (up 31.6%, from 95 to 125), grand larceny auto arrests (up 47%, from 102 to 150).

The proportionate increases in arrests for robbery, felonious assault, and grand larceny auto were a great deal larger than the proportionate increases in recorded complaints for these offenses. Moreover, the number of arrests as a percentage of the number of complaints increased sharply from 1983 to 1984 for virtually every one of the seven major offense categories. The most notable arrest rate increases were for robbery (up 11.5%), felonious assault (up 9.7%), and forcible rape (up 4.9%). Thus, in serving the territory covered by the 115th Precinct, the police were more productive, in 1984, than they had been in 1983.

f. Radio Runs: While the number of radio runs handled by the patrol force is a useful measure of workload, this statistic always underestimates the actual workload of individual units and the patrol force in general. The volume of radio runs is the number of calls for service dispatched by Central Communications plus the number of "pick-up" calls, that is, calls initiated by the officers themselves and reported to Central Communications. The volume of radio runs is based on the number of incidents to which the police respond, not the total number of police units that respond to an incident. Because the volume of radio runs does not include the number of back-up units dispatched, it will always underestimate the actual number of jobs that the units are responding to individually and collectively.

From 1983 to 1984, the number of radio runs for PBQ, excluding the 115th Precinct, rose 4.0% from 558,574 to 581,039. In contrast, the number of radio runs for the territory covered by 115th Precinct increased 14.6% from 37,964 to 43,494. (Again, the increase in the volume of radio runs in the 115th Precinct does not appear to be attributable to deteriorating conditions. Rather, the change seems to be due to a greater readiness on the part of the residents to request police assistance.)

g. Statistical Chan for the Territory Comprising the 110th 114th and 115th Precincts: The statistical increases in arrests, summons and radio run activity in the areas comprising the 115th precinct were impressive. These data indicate that those areas received more intensive service from the new precinct than they did while they were geographically marginal areas within the 110th and 114th Precincts. They leave open, however, the question of whether the total territory covered by the 110th and 114th precincts in 1983 was more fully serviced by the police in 1984, when three precincts covered the area.

To address this question, data were obtained from the Department describing arrest, summons, and law enforcement activity in the 110th and 114th Precincts in 1983 and in each of the three Precincts in 1984. It was expected that the combined figures for the 110th and 114th precincts would drop in 1984 when these precincts shared the territory with the new precinct and had commensurately lower manpower levels. The test was whether the 1984 figures for the 115th exceeded the combined decline for the other two precincts. Our analysis indicated that the volume of felony arrests in the 115th Precinct was approximately 10% higher than the aggregate decline in the number of felony arrests for the 110th and 114th Precincts. The number of summonses issued for traffic infractions in the 115th Precinct in 1984 was 62% higher than the aggregate decline in the other two precincts. These data indicate that the level of police activity in the territory

which comprised the 110th and 114th Precincts in 1983 was substantially increased after the opening of the 115th Precinct in1984.

h. <u>Unit Productivity in the 115th Precinct</u>: The consider able increase in services provided during 1984 to the area covered by the three precincts cannot be viewed as a product of the innovations introduced in the 115th. By creating the 115th -- making three precincts where once there had been two — the number of sworn personnel assigned to the total area also increased, by approximately 25% (from 395 on July 1, 1983 to 496 on July 1, 1984). More officers should produce higher measures of service, and there is no reason to believe that the use of steady tours and a platoon commander structure in the 115th Precinct would additionally increase the level of services provided, at least as service is conventionally measured. In the context of this study, however, it is appropriate to ask whether the innovations introduced in the new precinct adversely effect the productivity of the force. The evidence indicates that they do not.

Officers in the 115th precinct, in 1984, averaged 7.9 felony arrests during the year, compared with 5.6 among those assigned to be 110th and 6.8 for those in the 114th. The average number of misdemeanor arrests by officers in the 115th (6.9) was second to that in the 110th (7.4) and ahead of the average in the 114th (5.3). The same order was evident for traffic summonses -- 119.1 per officer in the 110th, 108.9 in the 115th and 75.6 in the 114th. Thus, the per-officer productivity figures for the 115th Precinct compare quite favorably with those for its neighboring precincts.

In this regard, it is appropriate to note again the unusually low rates of absenteeism in the 115th. Lower absenteeism is a productivity gain and there is reason to believe that these gains were a product of the program implemented in the 115th Precinct.

5. Measuring Community Attitudes and Reactions

In recent years, research in the police field has increasingly focused on the effects of police projects on citizens' fear of crime, perceptions of safety, and assessment of local police services. Studies of this kind are important for two reasons. In the first place, citizen fear of crime is a source of major concern in its own right, and recent research has indicated that it can and often does fluctuate quite independently from the actual volume of crime in the neighborhood. Secondly, police agencies are more and more taking the view that their crime control and order-maintenance functions cannot be performed effectively without the substantial, cooperative involvement of the community. For both of these reasons, the community's reaction to any police initiative has become an important dimension of its perceived effectiveness.

As part of the evaluation of the 115th Precinct, Vera assessed the community survey instruments used in recent studies and adapted one for use in this research. During November and December 1983, just prior to the opening of the 115th Precinct, Vera conducted a telephone survey of 300 randomly selected households. During the 20 minute interview, one adult respondent from each household was asked a series of questions about: (a) the quality of facilities, services and conditions in their neighborhood (e.g., shopping facilities, crime problems, schools, disorderly people, traffic); (b) the extent to which they were worried about crime problems; (c) how safe they felt in their neighborhood; (d) whether they believed that the crime rate had increased, decreased, or stayed the same in their neighborhood in the last year; (e) the extent to which fear of

crime prevented them from walking, socializing, or going to local entertainment in their neighborhood as much as they would have liked; (f) any interactions they had had with the police during the last year; (g) their assessment of police officers' fairness, helpfulness, and politeness; and (h) their assessment of the Police Department's ability to control crime, maintain order, and enforce traffic laws. Demographic information about the respondents was also collected. This survey was repeated during December, 1984 and January, 1985 using a second independent random sample. The highlights of findings from this phase of the research are as follows:

- a. The percentage of residents in the 115th precinct reporting increased police visibility during the preceding year rose significantly from 29.0% at Time I to 61.0% at Time II.
- b. The percentage of respondents believing that the crime rate had increased during the preceding year dropped significantly from 34% at Time I to 26 at Time II. The percentage believing that the crime rate had decreased rose significantly from 8.3% to 19%
- c. There was also a significant increase in the proportion of respondents expressing the belief that the police were doing a good job in preventing crime: 40.6% of the respondents believed it at Time I, compared to 58.0% at Time II. The percentage of respondents characterizing police performance of the crime control function as unsatisfactory dropped from 19.4% to 5.3% over the year's time.
- d. With respect to police responses to quality of life problems, 47.4% of the respondents rated performance good or very good at Time I, compared to 58.6% at Time II.
- e. The percentage of respondents reporting that the police were helpful rose significantly from 64.7% at Time I to 81% at Time II. Over the same time, the percentage indicating that the police were not helpful dropped from 12.7% to 6.0%.
- f. The percentage believing that the quality of police services had improved increased significantly, doubling from 30.3% prior to the opening of the 115th Precinct to 61.3% at the end of the first year.
- g. This dramatic improvement in the assessment of service quality was reported by white, black and Hispanic respondents, with the largest improvement in the assessment of police services recorded by blacks.

In-person interviews were conducted with twenty-five community leaders; they believed that the quality of police services had improved enormously since the opening of the 115th Precinct. All of these respondents reported major improvements in police visibility and response time in both emergency and non- emergency situations. They also indicated that the police were making substantial progress in addressing crime and quality of life conditions. Moreover, several of those interviewed stated that the opening of the 115th Precinct had served to unify the Jackson Heights, East Elmhurst, and Corona communities located within it.

While all of the community leaders that Vera staff inter viewed expressed very favorable opinions about the overall performance of the officers from the 115th precinct, several

respondents stated that the Precinct's patrol force ought to pay more attention to the low priority, yet annoying quality of life conditions that plague the community. These included the problems posed by double parkers and people repairing cars in the street and obstructing traffic, commercial vans parked in residential areas, and cars parked next to fire hydrants.

In many respects, the findings from the community leaders' survey were consistent with the results of the telephone surveys. There was agreement that police visibility had improved, that the quality of police services had improved, and that police were effectively tackling crime problems. The greatest difference between the community leaders and the telephone survey respondents seemed to be a matter of tone. The attitude of the latter may be characterized as "guarded optimism" — some conditions in their neighborhood were better, some were worse, and many had stayed the same. In contrast, the attitudes of the community leaders were decidedly upbeat. From their own observations and discussions with their constituents, these respondents concluded that conditions had improved greatly and would continue to improve. The opening of the 115th Precinct had bolstered their confidence in the Department and in its ability and willingness to combat the serious crime and quality of life problems existing in their neighborhoods.

B. Conclusion

The decision to open the new precinct flowed from the Departments' desire to provide more and better services to a segment of the Queens population. Vera's research report provides considerable evidence that this objective was achieved.

There were significant increases in the proportion of those residents who thought that conditions in the community were improving, crime rates were dropping, police personnel were more visible, police services were more extensive and the general quality of such service was better.

Community leaders were even more generous in their assessments. They identified several specific problems that had been eliminated or alleviated since the Precinct opened and they found the police to be a great deal more sensitive to and more quickly responsive to the community's needs. Moreover, they thought the residents were generally more willing to bring their concerns to the attention of the police because they had significantly more confidence that they would receive assistance.

Statistical indicators reflected the increased levels of service provided to the residents of the 115th Precinct. Although crime complaints for the seven major offenses increased by approximately 4% for that territory, the volume of complaints for lesser offenses rose by 50% over the same period. While these figures may or may not reflect some real increase in amount of criminal behavior in the area, they certainly reflect a greater willingness on the part of the citizens to report apparently criminal incidents.

The volume of arrests made in the territory covered by the new 115th Precinct, for the seven major offenses, increased by over 40% from 1983 to 1984. The ratio of arrests to complaints for these offenses increased sharply over the year. Over 40% more parking summonses and 55% more summonses for moving violations were issued and substantially more radio runs were made.

The Department hoped that the various changes introduced in the 115th Precinct would help reduce the level of stress experienced by police officers, make precinct management more effective and efficient, and maintain acceptable levels of performance and productivity. The Vera evaluation indicates that all of these objectives were achieved—some of them dramatically.

This research confined the findings of other studies that the criminal justice system and the bureaucratic characteristics of police organizations are the chief sources of job frustration among police officers. It also confirms prior findings that shift rotation is one of the more stressful characteristics of the job. Statistically significant reductions in job frustration scores among the officers of the 115th precinct, coupled with an absence of such changes among officers in a randomly selected comparison group, suggest that the program in the new precinct did reduce stress levels to some extent. That conclusion is strengthened by the fact that significantly fewer officers in the 115th Precinct complained of experiencing various physical symptoms of stress at the end of the research period than did so immediately before the Precinct opened. The stress reduction effect of the program can also be inferred also from the enormously increased percentage of officers assigned to the 115th who ex pressed the belief, at the end of the year, that their duty charts had positive effects on seventeen selected aspects of their personal lives. No such changes were observed among the comparison officers.

Perhaps the most provocative findings, however, pertain to the managerial changes embodied in the platoon commander concept. These include: a reduced span of control for the Commanding officer and a simplified chain of command at all levels; more clearly defined responsibility, authority and accountability; a meaningful role for lieutenants, reclaiming what is widely referred to elsewhere in the Department as the "lost rank"; more efficient and effective deployment of resources; and an improved capacity to supervise and discipline subordinate personnel.

The only disadvantage which emerged from the research inter views was a tendency for the 115th Precinct to operate as three precincts rather than one. Although this perception was articulated by a number of those interviewed, each hastened to add that it was not a "serious" problem, that it was manageable, and that it was more than offset by the advantages of the fixed platoon system.

Of course, to be acceptable, management changes must also satisfy various productivity criteria. The analyses revealed that the opening of the new 115th precinct produced a substantial increase in the services provided in the area that had been en compassed by the 110th and 114th precincts in 1983. The principal beneficiaries of this service were those residing within the boundaries of the newly formed 115th precinct. The increase was a consequence of the fact that sworn police personnel assigned to the whole territory were increased by an estimated 25% from 1983 to 1984. At the same time, however, it appears that per-officer productivity levels in the 115th Precinct compared favorably with those for the 110th and 114th in 1984. For example, the 115th ranked higher than the other two with respect to the number of felony arrests per officer, and it ranked second with respect to the per—officer levels of misdemeanor arrests and summonses for moving violations. Moreover, the significantly lower absenteeism rates in the experimental precinct were a productivity gain for the Precinct.

In conclusion, the Vera research suggests that the Department seriously consider extending to other precincts the innovations introduced in the 115th Precinct. Such an expansion, should it be undertaken, might profitably include both of the principal elements of the program in the 115th: that is, the steady tours and the platoon commander management structure. Should such an expansion be undertaken, it would be well to de sign it to permit ongoing, careful analysis of the effects of the managerial changes on officer performance and productivity levels.