

Wayland Clifton, Jr. Chief of Police

CONVENIENCE STORE ROBBERIES IN GAINESVILLE, FLORIDA:

AN INTERVENTION STRATEGY BY THE GAINESVILLE POLICE DEPARTMENT

WAYLAND CLIFTON, JR., CHIEF OF POLICE



CONVENIENCE STORE ROBBERIES IN GAINESVILLE, FLORIDA:

WAYLAND CLIFTON, JR., CHIEF OF POLICE

Table of Major Topics

History and Methodology	_p.	1
National Data Analysis	_p.	2
Gainesville Robbery Analysis	_p.	3
Independent Studies	_p.	6
A Step Toward a Solution	_p.	11
Court Test	_p.	13
Initial Results in Gainesville	_p.	14
Appendices	_a_	15

A Listing of Tables

Table	1		Coral Springs Florida, an oasis of crime prevention.	p.	3
Table	2		Convenience store robbery analysis;a six year study.	p.	3-A1
Table	3		Business robberies in Gainesville; A percentage representation	p.	3-B1
Table	4		Business robberies in Gainesville; percentage of stores robbed within each represented business.	p.	4-A1
Table	5		An hourly analysis of convenience	p.	4-B1
Table	6		Violence associated with	p.	4-C1
Table	7	_	A history of 7/11 robberies in Gainesville	p.	5-A1
Table	8		Robberies in Gainesville, a	p.	6-A1

CONVENIENCE STORE ROBBERY - AN INTERVENTION STRATEGY BY THE GAINESVILLE POLICE DEPARTMENT

Wayland Clifton, Jr., Chief of Police

In the spring of 1985, a barrage of convenience store robberies in Gainesville led to an exhaustive analysis of the problem by police personnel. Convenience store robbery is not typically a category of crime that is cataloged and monitored during the course of normal police research and analysis. Therefore, through a comprehensive manual search of the data, department personnel were able to secure information from the year 1981 through the then current data files in the spring of 1985. The intent of the study and analysis was to discover whether any other location throughout the country had successfully combatted or prevented convenience store robbery and to isolate those factors which make the convenience store an attractive location for robbery.

METHODOLOGY

The search for answers began with inquiries to the International City Managers Association and the International Association of Chiefs of Police in order to determine whether national models could be replicated in the City of Gainesville. A nationwide request also began through utilization of the computerized local government information network (LOGIN) with the same purpose in mind. Other groups directly contacted as part of the inquiry included the National League of Cities, National Referral Center, National Association of Convenience Stores, Police Foundation, National Crime Prevention Council, Southland Corporation, National Criminal Justice Referral Services Center, and the American Society of Association Executives.

Initial research indicated that the City of Colorado Springs, Colorado, was conducting some investigatory work with crime prevention cameras; the City of Macon, Georgia, and others were exploring closing hours variables. The real focus rapidly turned to the State of Ohio, Through the assistance of the Ohio Municipal League, it was learned that the City of Akron had pioneered efforts in the convenience store robbery prevention area. Together with Akron, the cities of Alliance, Berea, Brooke Park, Lorraine, and Warren had instituted a radical pioneer program with the following elements required by city ordinance:

- 1) Mandatory attendance by all late night employees at a law enforcement sponsored crime prevention program.
- 2) No more than \$50 available to store clerks between the hours of 12 PM and 6 AM.
- 3) Stores must contain a 500-pound, or greater, floor-bolted drop safe.
- 4) Signs must be posted, providing information that a safe is on the premises and that it is inaccessible to store employees.
- 5) Store front must be clear and unobstructed for full-view effect.
- 6) Cash register and counter must be in full view and visible from the street.
- 7) Parking lot must be lit to a level of at least 5-foot candles per square foot.

The City of Kent, Ohio, adopted all of these provisions and one more: requirement of two clerks in store between the hours of 12 PM and 6 AM.

The nationwide search also led to the City of Coral Springs, Florida, where we discovered that the City had adopted the Kent, Ohio, plan with two exceptions: 1) convenience stores and gas stations were included within the same ordinance; and 2) an option of either two clerks between the hours of 11 PM and 6 AM, or one clerk confined to a self-contained and locked pay booth which is unavailable to the customer public.

NATIONAL DATA ANALYSIS

What did the data reveal? The cities of Brooke Park, Berea, Lorraine, and Akron experienced mild to moderate success (ranging from a 7.6% increase to a 30.1% decrease in robberies) with the adoption of the convenience store ordinance in 1982. Kent, with a two-clerk provision within their ordinance, experienced a straight-line reduction beginning with the year 1982 in which 19 robberies occurred, and ending with the year 1985 in which only five robberies occurred (a reduction of 74%). For Coral Springs, Florida, there has not been a convenience store robbery since 1983, which is when the ordinance went into effect. (This is not particularly significant as there were only three convenience store robberies in the previous year; however, when one considers the communities surrounding it, the City of Coral Springs appears

to be an oasis of crime prevention.) The cities of Margate, Tamarac, Plantation, Oakland Park, Pompano Beach, Deerfield Beach, and Boca Raton are all of similar size and all surround Coral Springs. Yet, by far, Coral Springs has the lowest number of robberies (see Table 1, below).

Table 1

City	<u>Population</u>	Number of Robberies
Coral Springs	56,193	17
Margate	39,643	38
Tamarac	33,343	35
Plantation	54,571	123
Oakland Park	23,981	174
Pompano Beach	67,068	453
Deerfield Beach	43,346	123
Boca Raton	54,491	86

Coral Springs has the second highest population and the lowest number of robberies in this group. The Chief of Police of Coral Springs has stated that, in his estimation, the reason for the low crime rate is due to an aggressive crime prevention program by the police and city officials in terms of preventive ordinances like the one covering convenience stores and gas station operations.

THE GAINESVILLE ROBBERY ANALYSIS

Data analysis began with a survey of all convenience stores, which operated at any time between the years 1981 and 1986, in the City of Gainesville. Of the forty-seven stores analyzed during this period, forty-five had been robbed at least once (96%). Of these stores that had been robbed, the range was 1-14 robberies per store (see Table 2). Thirty-eight of the stores had been multiple victims of robbery (81%), and twenty-two had been robbed five or more times (47%). The average number of robberies per year for all the stores for the 6-year period was thirty-nine with a range of 20-72 robberies per year.

In analyzing all the business robberies in the City of Gainesville for this same period of time, it is interesting to note that the 234 convenience store robberies represented 50% of all business robberies (see Table 3), Further analysis proved even more interesting.

TABLE 2

CONVENIENCE STORE ROBBERY ANALYSIS

A SIX YEAR STUDY

1981 - 1986

<u>NAME</u>	ADDRESS	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>	TOTAL
MAJIK MARKET	119 NE 16 AVE.	4	1	1	2	3	CLOSEI) 11
MAJIK MARKET	809 N. MAIN	0	0	0	0	1	10	11
MAJIK MARKET	1712 SW 13 ST.	4	0	0	2	1	1	8
MAJIK MARKET	1234 NW 16 AVE.	5	1	2	0	2	2	12
MAJIK MARKET	4105 NW 13 ST.	2	0	0	2	1	2	7
MAJIK MARKET	4919 NW 34 ST.	1	0	0	1	0	0	2
MAJIK MARKET	1206 W. UNIV.	0	0	1	0	0	1	2
MM/THE STORE	21 SE 9 ST.	1	2	4	1	1	0	9
MM/THE STORE	1201 SW 16 AVE.	1	X	1	3	0	2	8
7 / 11	616 SW 2 AVE.	2	3	1	2	0	1	9
7/11	105 NW 16 ST.	3	1	1	0	0	2	7
7/11	506 NW 13 ST.	1	1	2	1	2	2	9
7, / 11	2206 NW 6 ST.	0	1	0	1	0	1	3
7/11	2152 NW 39 AVE.	0	0	2	0	1	1	4
7/11	618 NW 23 AVE.	1	0	0	0	CL	OSED	1
7 / 11	3807 NE 15 ST.	5	1	0	3	1	4	14
LIL CHAMP	806 NE WALDO RD	0	0	1	0	0	4	5
LIL CHAMP	3890 NE WALDO RD.	3	1	0	0	0	3	7
LIL CHAMP	203 NE 39 AVE.	1	2	· O	0	3	2	8
LIL CHAMP	1517 NE 39 AVE.	0	0	0	1	1	0	2
LIL CHAMP	922 NE 16 AVE.	0	1	0	0	0	4	5
LIL CHAMP	317 SW 4 AVE.	1	1	2	0	1	0	5
LIL CHAMP	5708 NW 34 ST.	0	0	2	0	0	0	2
LIL CHAMP	4120 NW 6 ST.	1	0	0	0	2	1	4
LIL CHAMP	5220 NW 34 ST.	6	0	0	1	CL	OSED	7
LIL CHAMP	1316 NW 5 AVE.	0	0	1	0	CL	OSED	1
LIL CHAMP	1126 W. UNIV.	0	0	0	0	0	1	1
COTTONS	1631 NE 16 AVE.	1	0	1	2	1	2	7
COTTONS	1136 NE 8 AVE.	0	1	1	0	1	0	3
COTTONS	320 SW 16 AVE.	3	1	0	1	2	1	8
COTTONS	3324 NW 13 ST.	4	0	0	0	CL	OSED	4
JIFFY	1516 SE 4 ST.	0	0	0	0	0	1	1
JIFFY	926 W. UNIV.	0	0	0	0	1	3	4
JIFFY	3907 NW 13 ST.	0	0	0	1	2	1	4
SUWANEE SWIFTY	2109 SW 13 ST.	0	0	0	1	1	1	3
SUWANEE SWIFTY	1702 S. MAIN	_	_	_	_	_	5	5
SUWANEE SWIFTY	1601 NE WALDO RD,	-	_	_	_	_	1	1
THE CARPORT	3838 N. MAIN	0	1	0	0	0	0	1
SWEET WILLIAMS	120 NW 39 AVE.	1	0	0	0	1	0	2
CRAWFORDS	2305 HAWTHORNE RD.	0	0	1	1	2	2	6

GATE :FOODS :IMPERIAL/ :ECOL !KWIK :STOP :EASTSIDE .JOY :FOODS .JOY :FOODS	3001 NW 13 ST. 4207 NW 13 ST. 3436 W. UNIV. 2300 E. UNIV. 2080 HAWTHORNE RD. !528 NW 8 AVE.	10 10 10 11 0	10	(0 (0 (1 1 	(0 (0 	(0 (0 (CĪ.C 	3 0 OSED 4 1	© \(\text{O} \(\text{S} \) \(\text{O} \(\text{S} \) \(\text{A} \) \(\text{L} \)
'TOTALS		52	20	: 27	30	33	72	234

Business Robberies In Gainesville

A Comparison Of Percent Of Business Robberies

Table 3

Business Operation	t of Robberies	Percent Of Business
		Robberies
Convenience Stores	234	50
Gasoline Stations	56	12
Fast Foods	49	10
Retail Sales	38	8
Hotel/Motel	23	5
Bank/Savings and Loan	19	4
Liquor Establishments	17	3
Others	<u>36</u>	8
Total	472	100

Based upon the data on convenience stores, other business establishments were reviewed to see whether the problem was as extensive. Even though 96% of all convenience stores had been robbed during this period of time, only 36% of the fast-food operations, 22% of the hotels, 21% of the service stations, and 16% of the liquor stores/lounges had been robbed (see Table 4). The next step was to examine what separated the operation of convenience stores from that of other business operations in the City.

An analysis of the robbery by time-of-day was performed (see Table 5). Roughly, three-fourths (74.3%) of all the robberies were committed between the hours of 7 PM and 5 AM. The focus of the analysis then shifted to the number of people present when robberies were being performed.

The data revealed that 92% of all the robberies occurred when only one clerk was present in the store. This statistic was not particularly significant since very few stores employed more than one clerk during the 1981-1986 period. Instead, the attention-getting factor here was the number of situations in which the robber had waited for the store to "clear out" -- presenting a single victim upon which to prey.

In 85% of the robberies which occurred, no customers were present at the inception of the crime and there was not a second clerk in the store. The scenario which developed repeatedly within the data analysis was that a perspective robber would enter the store and browse up and down the aisles until any present customers would leave before attempting the robbery. Of the remaining 15%, a second clerk was present in 8%, and a customer was present in an additional 7% at the inception of the robbery. In forty-seven of these instances, a customer would either view the robbery, unknown to the robber, from a location across the street, or would enter onto the scene after the robbery was already underway. Hence, because these witnesses were not in any way involved with the robbery incident prior to its occurrence (thirty-eight observed the robber from a distance and were never seen by the robber), their presence could not have been a deterrent in the prevention of the crime.

In analyzing the crime, the Gainesville Police Department wished to examine the level of violence associated with the robbery of convenience stores. In 91% of the incidents, the victim encountered a visible weapon or a threat of a weapon. In an additional 5% of the incidents, the victim was physically assaulted with fists by the perpetrator. In 3% of the situations, verbal threats only were involved (see Table 6).

Table 4

Business Robberies In Gainesville A Comparative Study Of Percent Of Establishments Robbed 1981-1986

Business Operation	# OF STORES	% Of Stores Robbed
Convenience Stores	47	96 (45)
Fast Foods	67	36 (24)
Hotels/Motels	27	22 (6)
Service Stations	71	21 (15)
Liquor Stores	44	16 (7)

NUMBER IN () INDICATES THE NUMBER OF DIFFERENT STORES ROBBED.

Table 5

Convenience Store Robberies; An Analysis By Hour Of Day

<u>HO</u>	UI	<u>3</u>	ROBBERIES
MIDNIGHT	_	1AM	19
1AM	_	2AM	24
2AM	-	3AM	10
3AM	-	4AM	13
4AM	-	5AM	13
5AM	-	бам	6
бAМ	-	7AM	5
7AM	_	MA8	1
8AM	-	9AM	3
9AM	_	10AM	3
10AM	-	11AM	7
· 11AM	-	NOON	5
12PM	-	1PM	5 5 5 3 6 3 3
1PM	-	2 PM	5
2PM	-	3PM	5
3PM	-	4PM	3
4PM	-	5PM	6
5PM	-	бРМ	3
6PM	-	7PM	
7PM	-	8PM	12
8PM	-	9 PM	19
7 - 1 1	-	10PM	21
10PM	-	11PM	32
11PM	-	MIDNIGHT	<u>11</u>
T	01	TAL	234

TABLE 6

LEVEL OF PHYSICAL VIOLENCE ASSOCIATED WITH CONVENIENCE STORE ROBBERY INCIDENTS

INCIDENTS W	VITH VISIBLE HANDGUN	124 (53%)
INCIDENTS W	VITH KNIFE	39 (17%)
INCIDENTS W	WITH DISGUISED HANDGUN	36 (15%)
INCIDENTS W	VITH CLUB	15 (6%)
INCIDENTS 1	INVOLVING USE OF FISTS	12 (5%)
INCIDENTS I	INVOLVING VERBAL THREATS ONLY	8 (3%)
	INCIDENTS WITH EITHER A APON OR CLAIMED WEAPON	92%

In order to delve further into the issue as to whether or not two clerks, or having a second person present, could deter a robbery, Chief Clifton instructed department personnel to analyze those stores which utilized two clerks. The Lil¹ Champ Food Store chain in the Gainesville area presented a unique situation in which operations were performed with two or more clerks present approximately 47% of the time. Of the twenty (20) Lil¹ Champ stores in and around the Gainesville area and during the 1981-1986 period, there were 70 robberies of these stores. It is significant to note, however, that of the 70 robberies, only three occurred when two or more clerks were present -- meaning, only one clerk was present in 96% of the robberies, yet 47% of the time there were two clerks on duty!

Perhaps the case of the Sprint Food Stores chain in the Gainesville area is even more revealing than those relating to the Lil¹ Champ Food Store chain. Sprint stores have been operating since 1982 at five different locations in Gainesville and Alachua County (one store within City limits and four stores in the County). These stores operate within an environment where 95% of the competitors' stores have been robbed at least once. The Sprint Food chain utilizes two clerks, brightly lit parking areas, clearly visible windows, robbery detection cameras, and drop safes. In other words, this food chain voluntarily practices most of the provisions of the current ordinance, and has done so since the inception of its operation in 1982. Of the five stores, none have been ever robbed at any time during the study period.

Isolating the issue further, a unique opportunity for study was presented in the Archer Road area where a Sprint Food store operates within 100 yards of a competitor's store. While Sprint utilized two clerks on a 24-hour day basis, the competitor utilized only one. The analysis revealed that this Sprint Food Store had never been robbed and that the nearby competition had been robbed eleven times.

One final angle from which to analyze the two-clerk issue occurred with the operations of the Southland Corporation (7-Eleven) food chain. Since 1978, the Southland Corporation has adopted nationwide many of the provisions of the current Gainesville ordinance, with the exception of the two-clerk provision, and has claimed great success with its robbery prevention efforts. However, in Gainesville, the Southland Corporation food stores have met only with mixed robbery prevention success (see Table 7). With seven stores operating in Gainesville, this chain was victimized the second-highest number of any other local chain. In fact, while the Southland

TABLE 7

AN ANALYSIS OF SEVEN/ELEVEN ROBBERIES IN GAINESVILLE, FLORIDA

1978 - 1986

1978 - 1 (ROBBERY PREVENTION PLAN ADOPTED)

1979 - 8

1980 - 7

1981 - 12

1982 - 7

1983 - 6

1984 - 7

1985 - 4

1986 - 11

TOTAL 63

Corporation chain consumed only 14% of Gainesville's business time, 20% of all the convenience store robberies involved these stores. In 1986, the number of robberies which occurred in these Southland Corporation stores was the second-highest recorded number of robberies at any time during the past ten years, for this food chain operation (see Table 8).

INDEPENDENT STUDY ANALYSIS

Beginning in the spring of 1985, Gainesville Police Department officials met with representatives of the Convenience Store Industry and the Retail Grocers Association of Florida for the purpose of eliciting a voluntary response by the industry to the robbery problem in Gainesville. While some corporate members of the industry objected to any "intrusion" into their business practices, most of the industry members agreed that something had to be done. The Southland Corporation had been a proponent of clear windows, limited cash, drop safes, employee training, and well-lit parking lots and most of the industry were in agreement that these were central points to any sound robbery prevention program. The debate essentially focused upon the two-clerk issue.

The Southland Corporation, based upon a study conducted by Dr. W. J. Crow and Rosemary J. Erickson of the Athena Research Corporation, argued that two clerks were, in effect, not a deterrent to convenience store robbery and, perhaps, more of a liability in terms of possible increased violence. Crow and Erickson interviewed 241 inmates in the Texas, California, Illinois, Louisiana, and New Jersey State Prison systems. These inmates were all convicted of robbery offenses and information was obtained from the robbers as to their preferances for target characteristics. Only 22% of the simple population had committed convenience store robbery. The inmates were presented with eleven factors that supposedly influenced their thinking with regard to committing a robbery. These factors included:

- a) the amount of money,
- b) the escape route,
- c) anonymity,
- d) likelihood of interference,
- e) active police patrol,
- f) armed clerk,
- g) the number of clerks in the store,
- h) the number of customers in the store,
- i) camera system in the store,
- j) alarm system in the store, and
- k) video recording system in the store.

TABLE 8

CONVENIENCE STORE ROBBERY

A DATA ANALYSIS

1981 - 1986

STORE NAME	TINES ROBBED	% OF ROBBERIES	% OF STORES
MAJIK MARKET	68	29%	18%
SEVEN ELEVEN	47	20%	14%
LIL CHAMP	47	20%	22%
COTTONS	22	9%	8%
LUCKY SEVEN	10	4%	2%
JIFFY FOODS	9	4%	6%
SUWANEE SWIFTEE	9	4%	6%
CRAWFORDS	6	3%	2%
JOY FOODS	5	2%	4%
OTHER	. 11	5%	18%
TOTAL	234	100%	100%

Crow and Erickson's findings indicated that the number of clerks in the store was the seventh-highest ranked factor in their scale — with the related factors of anonymity and likelihood of interference ranking as three and four, respectively. Based upon this study, representatives of the Southland Corporation indicated that it had developed a policy for their stores nationwide that two clerks were unnecessary in terms of developing a program of robbery deterrents. Evidence was further corroborated by way of asking the robbers how many people they would "take on" if they were robbing a store alone and had a gun. Most of the respondent subjects indicated that multiple victims would be no problem (see Appendix A).

Gainesville Police Chief Wayland Clifton did not feel comfortable with this research for three reasons:

- 1) The research was based upon self-reported information of convicted felons;
- The sample group was not convenience store robbers but, rather, generic robbers who had robbed large as well as small establishments;
- 3) The Research was based upon the economic impact to the company; and
- 4) The evidence was contrary to strong data presented within the Gainesville experience.

However, since important policy decisions affecting the convenience store industry were in the development stage and the fact that the industry had a study with results contrary to the recommendations of the Gainesville Police Department, Chief Clifton decided to seek independent corroboration of his own data.

The first step was to ask City Auditor Randy Grover to audit the Department's basic data conclusions. This was accomplished without audit exception. At this same time, Chief Clifton called upon Dr. Richard Swanson, a Forensic Psychologist with the University of Florida, for the purpose of determining whether or not the Chief's conclusions could be corroborated through independent analysis. Dr. Swanson agreed with the stipulation that his study would be completely independent, no money would exchange hands between the City of Gainesville and himself, and study results would be published regardless of its support, or lack of support, for the Gainesville effort. Dr. Swanson then conducted a three-tiered study.

In Part One of this study, Dr. Swanson visited three state prison systems in Florida: 1) The Union Correctional Institute, 2) The Reception Medical Center at Lake Butler, and 3) The Baker

Institute at Olustee. Sixty-five (65) convenience store robbers were interviewed for the purpose of determining how they approached convenience store robbery and how they selected their targets -- what they look for in stores, their patterns and strategy, as well as the characteristics of the store. Dr. Swanson presented a list of store characteristics and asked the convenience store robbers to tell him which of the characteristics were desirable and which were undesirable. These characteristics are listed in Table 4 (Appendix B) and were drawn from thirty-two closed set variables when posed to the convenience store robbers.

The desirable characteristics of stores are listed in progressive order with the most desirable characteristic being easy access/getaway. This is followed by:

- 1) Only one clerk on duty,
- 2) No other business nearby,
- 3) Accessible safe,
- 4) Only one car in front,
- 5) One counter,
- 6) Remote area,
- 7) Poor inside visibility,
- 8) Female clerk,
- 9) Dimly lighted outside,
- 10) Obstructed windows, and
- 11) Gas station.

In ranking the undesirable characteristics, the robbers identified the following:

- 1) Robber knows clerk,
- 2) Store is near robber's residence,
- 3) Lots of customers near,
- 4) Cameras in the store,
- 5) Time-release safe,
- 6) In the middle of other businesses,
- 7) Heavy traffic,
- 8) Two male clerks,
- 9) Raised counter,
- 10) Two or more cars in front, and
- 11) Deep register counter.

Dr. Swanson concluded that a robber does not want the possibility of interference -- therefore, looks for only one clerk, no other businesses nearby, one car in front, and remote area stores -- and wishes to remain anonymous, which is the reason for noting the undesirable characteristics of not wanting to know clerk and not having store near the robber's residence.

Utilizing the open-ended question format, Dr. Swanson asked the convicted convenience store robbers to list five most desirable things to look for when considering which store to rob. Their preferences included the following in descending order of responses:

- 1) Remote area,
- 2) Only one clerk on duty,
- 3) No customers,
- 4) Easy access/getaway,
- 5) Lots of cash,
- 6) Female clerk,
- 7) No backroom,
- 8) Obstructed windows,
- 9) Type of safe, and
- 10) No alarm.

Similarly, when asked to list the characteristics of the stores to avoid when choosing a target, the convenience store robbers indicated, in order of importance to themselves, the following:

- 1) Many customers,
- 2) Heavy traffic in front of store,
- 3) Two clerks,
- 4) A backroom,
- 5) Male clerk,
- 6) One-way mirror in the back,
- 7) Limited getaway,
- 8) Alarms,
- 9) Clear visibility in the store,
- 10) A gas station in front.

The second-tier of the survey analysis involved the victim-clerk associated with the robbery. Dr. Swanson interviewed twenty-four individuals who had been victims of convenience store robbery and asked them to answer the same thirty-two item survey dealing with desirable and undesirable characteristics for robbery as they perceived it.

In order of priority for desirable characteristics, the top five the victim-clerks listed were:

- Easy access/getaway,
- 2) Only one clerk,
- 3) Dimly lighted outside,
- 4) Poor visibility from outside, and
- 5) Obstructed window.

As for the undesirable characteristics for robbery, the response was as follows:

- 1) Two male clerks,
- 2) Robber knows clerk,
- 3) Lots of customers,
- 4) Cameras in the store, and
- 5) Two or more parked cars in front.

Of those victim-clerks interviewed, 75% indicated that they perceived a second clerk on-duty to be a robbery deterrent factor.

The third element of Dr. Swanson's study involved a structural evaluation of convenience stores. Toward this effort, he surveyed forty convenience stores in and around the Gainesville City Limits. Taking into account thirty-two variables and correlating them with robbery data analysis from the years 1982-1986, Dr. Swanson was able to determine the following five factors to have particular significance:

- 1) If the store had any shift with only one clerk on duty, it had a higher propensity for being robbed;
- 2) If a store limited its time of operation, it had a lower propensity for being robbed;
- 3) If a store exhibited visible cameras, it had a lower propensity for being robbed;
- 4) If there were 24-hour stores nearby, there were less occurrences of robbery; and
- 5) If the store exhibited a time-release safe, there were less occurrences of robbery.

(see Table 10, Appendix B)

Grouping all of his studies, Dr. Swanson went on to conclude that the presence of two clerks on duty seemed to be the number one element in deterring convenience store robbery in Gainesville. This study seems to agree with the Athena Study in several important points in terms of target suitability — where the Athena Study rated highly the factors of likelihood of interference, desired anonymity, and whether the robber could control the situation.

The Athena Study concluded that the most effective robbery prevention program was one in which steps taken would:

- a) maximize a perceived risk to the robber,
- b) maximize the probability that the robbery would be witnessed, and

c) convince potential robbers that they will be recognized.

Much of this type of robbery prevention is accomplished by the placement of a second clerk in the store.

In a separate report, Mr. James White, an Attorney and Consultant to the Florida State University Department of Criminology, as well as to the Tallahassee (Florida) Police Department, performed a data analysis of the factors which affect robberies of convenience stores in Gainesville as well as Alachua County. Mr. White analyzed seventy-two convenience store establishments in the Gainesville area and rated them based upon the factors of lighting of the store and the premises, visual obstructions to cashiers, and the number of clerks on duty. He concluded (see Appendix C) that the number of clerks working is the strongest predictor of convenience store robberies and that the use of two clerks in convenience stores would be the main factor in reducing the possibility of robbery.

Finally, parallel studies conducted by Dr. C. R. Jeffery, of the School of Criminology at Florida State University in Tallahassee, Florida, drew similar conclusions to those studies previously explained. His conclusions essentially were that the variables found to be highly significant to robbery deterrents are:

- 1) Location of the cashier in the center of the store (clear visibility);
- 2) More than one clerk on duty; and
- 3) Location of the gas pumps in the front of the stores (possibility of customer traffic).

(see Appendix D)

A STEP TOWARD A SOLUTION

In March 1985, the Gainesville Police Department agreed to work with convenience store industry representatives to determine whether a course of action to deter robberies could be developed. At that time. Chief Clifton informed those representatives that he was leaning towards the development of a convenience store ordinance for City Commission consideration. The representatives of the industry requested some time to develop a voluntary procedure to deter convenience store robberies. After one year of having numerous meetings with the representatives, the only solution offered by the owners was that the police department was to provide additional enforcement personnel.

Sixteen months after these initial discussions began, the signs remained in the windows, the parking lots were still poorly lit, excess money was being kept in the cash registers, and convenience store robberies had gone off the scale. After two public hearings and many, many hours of debate, the Gainesville City Commission adopted the Gainesville Convenience Store Ordinance on July 14, 1986 (see Appendix E).

Provisions of the Ordinance included:

- Removal of signs posted in windows to provide a clear and unobstructed view of the cash register and sales area;
- 2) Locate sales area so that the clerk and customer are fully visible from the street;
- 3) Post a conspicuous sign in the window which states:
 - a) the cash register has \$50 or less,
 - b) employee has access to \$50 or less available to the employee at all times, and
 - c a drop-safe time-release safe is maintained in the store and it is [either] bolted to the floor, installed in the floor, or weighs a minimum of 500 pounds;
- 4) Parking lots are to be lit at an intensity of 2-foot candles per square foot, with a uniformity ratio of no more than 5 to 1;
- 5) Install security camera of a type and number approved by the City Manager; and
- 6) Provide mandatory robbery prevention training to all employees who work between the hours of 8 PM and 4 AM.

At the request of the convenience store industry, the two-clerk provision was not included as part of the July 14, 1986, ordinance. Instead, it was referenced as part of a resolution which was attached to the ordinance. The resolution read that two clerks would be required as part of the ordinance within 240 days of July 14th, unless the convenience store industry was able to adopt a robbery prevention and reduction plan which resulted in at least a 50% reduction in robberies within that 240-day period as compared to the previous 240 days. Because there had been thirty-one robberies during the previous 240 days, this stipulation meant that the industry would have had to

contain the robbery problem to a total of sixteen robberies, or less, between July 14, 1986, and March 14, 1987. The total number of robberies exceeded the sixteen limit as of September 9, 1986 -- less than sixty days after the adoption of the ordinance.

Convenience store robberies continued to escalate during this period of time at a rate of 130% increase. So, based upon data provided by the Chief of Police, the Gainesville City Commission adopted the two-clerk provision of the Gainesville Convenience Store Ordinance on February 2, 1987, with a provision that the industry would be given sixty days to hire and train and new employees.

COURT TEST

In April 1987, representatives of the convenience store industry sought an injunction to prevent the City of Gainesville from implementing the ordinance based upon four factors:

- 1) Likelihood that the industry would ultimately prevail on the merits of the case at a later time;
- 2) The fact that the industry would suffer irreparable damage if the ordinance was implemented;
- 3) The threat and injury would outweigh any possible damage caused by an injunction to the City; and
- 4) The injunction would not be adverse to the public interest.

The judge ruled that the Federal District Court:

- Found no evidence of irreparable injury because the increased labor costs, which the industry cited, were not considered an irreparable injury;
- 2) Found no merit to support the industry's claim that its constitutional rights had been violated;
- 3) Found that, if an injunction was granted, it would be counter to the public's interest as the prevention of robberies was obvious; and

4) Found the evidence presented by the industry that two clerks would not deter robberies was not compelling in light of the City's evidence presented in court.

Based upon the case presented by the City of Gainesville, the Honorable Maurice Paul of the Federal District Court denied the motion for an injunction and the Ordinance went into effect.

INITIAL RESULTS

Through October 26, 1987, the year-to-date figures reveal that there has been a 64% reduction in convenience store robbery over the similar period of time in 1986 (20 vs. 55). When one measures the effect after the April 2nd implementation date, the figures remain the same - 65% reduction in convenience store robbery from April 2, 1987 to October 26, 1987.

The affect on nighttime robberies is even more dramatic. In previous years, two-thirds of all convenience store robberies occurred between the hours of 7 PM and 5 AM. During 1987, roughly half the robberies occur during those hours. There has also been a 75% decrease in the number robberies between the hours of 8 PM and 4 AM from 1987 over the previous year (36 vs.9).

The results, as yet, cannot be considered to be statistically significant due to the brief time period being analyzed. The initial results are certainly very encouraging to the Gainesville community and are most definitely in line with the expectations of the Chief of Police at the time of the inception of the development of the ordinance.

A Listing of Appendices

- Appendix A -- ROBBERY AS ROBBERS SEE IT; A report by Lloyd Scott of the Southland Corporation and W.J. Crow, Rosemary Erickson of the Athena Research Corporation.
- Appendix B Swanson Report of the analysis of convenience store robberies, and potential robbery deterrence.
- Appendix C White report of the computer analysis of factors associated with convenience store robberies in Gainesville and Alachua County.
- Appendix D Crime Analysis, Computers, and Convenience Store Robberies; a study by Jeffery, Hunter, and Griswold.
- Appendix E -- Convenience Food Store Ordinance of the city of Gainesville, Florida.

APPENDIX A

ROBBERY AS ROBBERS SEE IT

Lloyd Scott Southland Corporation

W.J. Crow, Ph.D t Rosemary J. Erickson, M.A. Athena Research Corporation

Robbery 1 Why one of your stores and not someone else's? That depends on what goes on in a robber's head when he *is* out looking for a target and what he sees when he looks at your stores.

To find out more about how robbers think, the Southland Corporation commissioned Dr. Bud Crow and Rosemary J. Erickson of Athena Research Corporation to interview imprisoned robbers. This is the same team that beaded up the Department of Justice study ten years ago, which laid the scientific basis for Southland's robbery prevention program.

A pilot study with 60 inmates was conducted at the Texas State prison at Hunteville, and then 181 robbers were interviewed in the state prisons of California, Illinois, Louisiana and New Jersey. Information was obtained about the robber's preferences of target characteristics; the things they like to see or not Bee when they look at your stores, who they like to rob and how much money they want to get in order to go ahead with the robbery.

The background characteristics of those interviewed fit descriptions of convenience store robbers. Table 1 indicated that they were young with 721 being uder 30 years of age. Their

race is fairly typical of national data on robbers-58% white; 29% black, and 13% Mexican-American. Seventy-one percent were at least high school graduates, and some had college.

According to Table 2, they were fresh off the streets-69% had committed a robbery within the last year. The majority of their targets were small retail establishments, of which 22% were convenience stores* They had committed multiple robberies in 65% of the cases. Also, for them to rob with a partner was more ceewon than robbing alone. They report that injury occurred in 22% of the cases.

Previous research had identified things that were important to robbers in making the final decision to rob. Table 3 presents the way the robbers ranked eleven factors that influence their thinking. The first four factors are the same ones that robbers ten years ago thought most important: money, escape route, anonymity, and likelihood of interference. It is significant that robbers do not attach more importance to hardware, such as cam*ras and alarms.

Relatively low importance was assigned to the number of clerks and customers in the store. Also, on Table 4, note that the robbers report that they have robbed both men and women, and 68% say that they have no preference. Some people think robbers would prefer to rob women, because males present a greater physical threat, but only 13% say that. The reasons they gave for not preferring women victims were that they were less

predictable and agre likely to panic. Also, only 15% say that it would sake a difference if someone were playing video games—the remainder say they would rob the store anyway.

These results are primarily explained by the fact that robbers believe that a gun gives them control over a surprisingly large number of people. The robbers were asked how many people they would take on and as indicated on Table 5, it is a lot. In fact, 30% say they would take on aore than 5, if robbing alone; and epsilon 0% said aore than five, if they were robbing with a partner. While robbers may prefer to rob a lone clerk, additional people in the store is not a strong deterrent.

The reason these results are important is that city councils and state legislatures often consider laws requiring two clerks on duty when a community is shocked by a brutal criae. People intuitively feel there is safety in numbers, but robbers think differently. The exaggerated control they expect from having a gun aakes two or agree people in the store unimportant to them.

Control of cash is a central element in aost robbery prevention programs. Almost everyone would agree that money is an important factor, but we haven't known how important money is as coapared to other factors such as escape routes, etc. We also haven't known how auch money makes a difference to robbers.

To get at this aspect of the robber's thinking, they were asked the least amount of money they would rob for. Figure 1

presents the percentage of robbers who say they would rob a store for the different amounts of money shown. As expected, fewer robbers would rob as the amount of money decreases. But the details are important.

First note that at around \$100, the scale is at the break-even point. About half the robbers would rob and half would not. Second, note that the slope of the curve is less when above \$100 than it is below \$100. This is what the economists would call diminishing marginal utility—above \$100 additional money Is less important. Third, note that the percentage who would rob is reduced by over half between \$100 and \$50. This means that there would be a big payoff if your stores were seen by robbers as having less than \$100 and the closer to \$50 the better. It also means that those programs that have been working to reduce cash from \$300 to \$200 and from \$200 to \$100 have been reducing the attractiveness of their stores and thereby reducing robberies, but an even greater reduction can be expected if the cash can be reduced from \$100 to \$50 or below.

This Is the theory and research. How does a cash reduction policy work out in practice where implementation must compete with other priorities and obstacles such as employee turnover? The Southland experience follows.

In 1974 the Southland Corporation started a priority effort to do something about their increasing robbery problem. In addition to professional security personnel, they involved behavioral scientists and ex-convicts. The ex-convicts made it possible to approach robbery from the point of view of the robber-what made a store attractive to them. The behavioral scientists Bade it possible to sort out the myths from the reality by making a scientific analysis of Southland's robbery experience and by designing a test of a new program that met scientific standards. The experiment that was conducted was supported by the Department of Justice and led to a 30% reduction in robberies over an eight month period in the experimental stores. This program was implemented in 7-Eleven stores several years ago.

The program has always emphasized the importance of keeping cash low. Its goal has been to live up to what the sign on the door says—"STORE HAS LESS THAN \$30 AFTER DARK." Whatever company policy says about the amount of money that should be in the cash register, the best indication of how much is actually there is the amount of money lost in robberies on the average.

As a result of consistently emphasizing control of money in the cash register, there has been a year by year decrease in the average dollars lost in robberies by the Southland Corporation. As indicated in Figure 2, the amount lost has been cut in half from 1975 to 1980. Even further reduction has taken place in the most recent years. But the goal of only \$30 has not yet been reached.

This cash reduction has been accompanied by a year by year reduction in the number of robberies experienced as well. Figure 3 presents the percentage decrease in robberies in relation to national robbery trends as measured by the FBI. it 1B important to note that toe largest decrease in robberies took place in those years (1978-1981) when the average dollar loss was reduced to the robbers' critical area of \$100. When the amount of money was reduced below \$100, larger percentage decreases in robbery occurred. This is exactly what would be expected from the research results.

In fact, there is a striking similarity in the shapes of the three curves superimposed on each other in Figure 4. The dotted line indicates that fewer and fewer robbers say they would rob as the money becomes less and less. As program implementation became more effective over the years, the amount of dollars lost progressively decreased as indicated by the dashed line. As indicated by the solid line, robberies also progressively decreased. This congruence between research and practical experience increases our confidence in the research results and the implication from those results that large decreases in

robberies will result if the amount of money in the cash register can be reduced below \$100 toward \$50 or less.

Training of personnel stresses the importance of maintaining low cash levels and the rationale behind it—that is to prevent robberies, not to save money. There is a strong program of public relations, using ex-convict Ray Johnson, in an effort to communicate to the public and potential robbers that there isn't enough money available in the stores to take the risk. It has taken time to build the understanding of the importance of money control through all levels of management and operating staff—but the results have been well worth the effort.

The research results examined so far and the operating experience at Southland both indicate the importance of reducing money in order to reduce robberies and of communicating that to Just how important communication is was indicated by the robbers¹ responses when asked how much money they would expect to get if they robbed different types of businesses. indicates that C-stores do well as compared to supermarkets or liquor stores. But on the average a robber expects to get \$120 when he robs your store-that's what iB in his head before he looks at it. What he sees when he looks at a convenience store can either confirm his expectations or change If he sees signs such as "Store has less than \$30 after dark" or "No \$10 or \$20 in the register," he may go He may be particularly impressed if he sees a cash elsewhere. control system that puts out a limited amount of cash at timed

intervals, like the Tidel Timed Access Cash Controller.

But just having the signs is not enough. The robber will find out bov much Money you have by looking in the cash register when he buys a pack of gum, or by the word on the street. Robbers know how much money they get and the word gets around. The policy of cash control has to be implemented to be effective.

The robbers' expectations are a further difficulty. Even if we are successful in reducing the amount of money available below the amount that attracts robbers, it won't change their behavior if they don't know about it. If they expect to get \$120 on the average, as the research results suggest, then that will make stores appear attractive even though the actual amount of money is markedly less. He must avail ourselves of every opportunity to publicize the message that there is not enough money in the stores to warrant the risk.

Why your stores and not someone else's? It depends on what goes on in a robber's head, what expectations he has about your stores, and what he sees when he looks at them. From what we know now, the two most important things you can do are to IMPLEMENT and COMMUNICATE. Implement a cash control system to get the lowest amount of money available in your stores as you can. Communicate the fact of low cash to everyone and thus lower the expectations of robbers.

The policy of low cash has been adopted by many stores, but it is far from universal. If there are some convenience stores in your community where robbers can get large sums of money, it endangers your stores, even though you may have an effective robbery prevention program.

For that reason, it behooves everyone to work together, to •hare information* and to help others in the industry who may want to strengthen their security programs. The Southland Corporation has developed a robbery prevention kit which is offered at nominal cost, and the security staff is available to provide assistance.

FOOTNOTE

The authors wish to thank the following Southland security personnel; Dick Nelson, who initiated and participated in the pilot study, and Ray Bravenec, Jerry Lowery, Bill Price, and Bob Quigley, who made the prison arrangements.

CHARACTERISTICS OF ROBBERS

AGE DISTRIBUTION

'GROUP	PERCENTAGE
17-20 YEARS	10
21-25 YEARS	37
26-30 YEARS	25
30>	28

RACE DISTRIBUTION

GROUP	PERCENTAGE
WHITE	58
BLACK	29
MEXICAN-AMERICAN	13
EDUCATION	
ELEMENTARY SCHOOL	8%
JUNIOR HIGH	21%
HIGH SCHOOL	58%
COLLEGE	13%

ROBBERS EXPERIENCE

TIME SINCE LAST ROBBERY

SIX	MONTHS	OR	LESS	41%
SIX	MONTHS	TO	ONE YEAR	28%
MORI	E THAN	ONE	YEAR	31%

TYPE OF TARGET

CONVE	NIENCE S	TORE		22%
SMALL	RETAIL			38%
BANK,	DRUG DE	ALERS	ETC.	40%

NUMBER OF ROBBERIES

36%
10%
18%
36%

ROBBED ALONE OR WITH PARTNER

ALWAYS ALONE	•	38%
SOMETIMES WITH	PARTNER	40%
ALWAYS WITH PAR	RTNER	22%

VIOLENCE

SOMEONE HURT	22%
NO ONE HURT	78%

IMPORTANCE RATING

SCALE: VERY IMPORTANT (1) TO LEAST IMPORTANT (5)

	RANK ORDER	AVERAGE	RATING
1.	AMOUNT OF MONEY	1.	. 27
2.	ESCAPE ROUTE	2.	.33
3.	ANONYMITY	2.	.76
4.	LIKELIHOOD OF INTERFERENCE	3	3.02
5.	ACTIVE POLICE PATROL	3.	. 44
6.	ARMED CLERK	3.	.60
7.	NUMBER QF CLERKS IN STORE	3.	.76
8.	NUMBER OF CUSTOMERS IN STORE	3.	. 80
9.	CAMERA SYSTEM IN STORE	4.	.18
10.	ALARM SYSTEM IN STORE	4.	. 39
11.	VIDEO SYSTEM IN STORE	4.	. 79

WHO IS ON DUTY

QUESTION: WHEN YOU ROBBED, WERE MEN OR WOMEN ON DUTY?

MEN WOMEN BOTH 21% 10% 69%

QUESTION: IN SELECTING A STORE TO ROB, WHO WOULD YOU PREFER TO BE ON DUTY?

MEN WOMEN BOTH
19% 13% 68%

QUESTION: WOULD YOU ROB A STORE IF CUSTOMERS WERE PLAYING VIDEO OR AMUSEMENT GAMES?

YES NO DOESN'T MATTER
37% 15% 48%

CONTROL WITH A GUN

QUESTION:	IN ROBBING	Α	STORE	ALONE,	AND WIT	'H A	GUN,	HOW	MANY
	PEOPLE WOUL	ıD	YOU T	AKE ON?					

ONE	TWO	THREE	FOUR	FIVE	>FIVE
9%	16%	24%	15%	6%	30%

QUESTION: HOW MANY PEOPLE WOULD BE TOO MANY IF YOU WERE

ROBBING ALONE?

ONE	TWO	THREE	FOUR	FIVE	>FIVE
1%	10%	23%	19%	20%	27%

QUESTION: IN ROBBING A STORE WITH A PARTNER, AND WITH A GUN,

HOW MANY PEOPLE WOULD YOU TAKE ON?

ONE	TWO	THREE	FOUR	FIVE	>FIVE
1%	6%	11%	6%	16%	60%

QUESTION: HOW MANY PEOPLE WOULD BE TOO MANY IF YOU WERE

ROBBING WITH A PARTNER?

ONE	TWO	THREE	FOUR	FIVE	>FIVE
0	2%	. 8%	17%	21%	52%

Appendix B

Convenience Store Robbery Analysis;
A Research Study of Robbers, Victims, and Environment

Dr. Richard Swanson Department of Psychology University of Florida Gainesville, Florida 32601

TABLE A

CHARACTERISTICS OF PERPETRATOR SAMPLES

	U.C.I. N=25	Butler <u>& Baker</u> N=40	Combined N=65
Age: 3=average between 24-28 4=average between 29-33 5=average between 34-43	4.08	3.50	3.72
Size of City Where Arrested: 3=medium City to urban area 4-medium City to urban area	3.56	3.17	3.09
Length of Sentence: (average in years)	7.00	3.70	3.97
Charged or Convicted of Convenience Store Robbery:	23-Yes 92% 2-No 8%	35-Yes 87.5% 5-No 12.5%	58-Yes 89.2% 7-No 10.8%
Have Ever Robbed A Convenience Store:	100%-Yes	100%-Yes	100%-Yes
Ten Eleven Twelve Thirteen Fourteen Fifteen Sixteen Seventeen Eighteen Nineteen Twenty Twenty-One Twenty-Three Twenty-Four Twenty-Four Twenty-Seven Twenty-Seven Twenty-Eight Forty-Three	12.0% 24.0% 16.0% 24.0% 8.0% 8.0% 4.0%	2.5% 5.0% 7.5% 2.5% 2.5% 2.5% 15.0% 10.5% 5.0% 2.5% 5.0% 5.0% 5.0% 5.0% 5.0% 5.0% 5.0%	3.1% 6.2% 4.6% 9.2% 4.6% 12.3% 4.6% 15.4% 4.6% 7.7% 6.2% 4.6% 1.5% 3.1% 3.1% 4.6% 1.5%
Number of Convictions: One Two Three Four Seven Nine	0% 36.0% 20.0% 16.0% 4.0%	2.5% 42.0% 30.0% 12.0% 0%	29.2% 36.5% 18.5% 12.3% 1.5%
Years Incarcerated: Average Range	12.92 4.23	7.3 <6 mos. 24 yr.	9.4 <6 mos. 24 yr.

TABLE B

PERPETRATOR DESCRIPTION OF
ROBBERY BEHAVIORS AND STRATEGIES

		Butler	
	<u>U.C.I.</u>	<u>& Baker</u> N=40	<u>Combined</u> N=65
	<u>N=25</u>	<u> 11-40</u>	<u>N-05</u>
Role of Alcohol:			
No alcohol/drug involvement:	29.2%	35.0%	32.8%
Drinking or using drugs after decision made to rob convenience store:	8.3%	7.5%	7.8%
Drinking or using drugs when decision made to rob convenience store:	54.2%	40.0%	45.3%
Drinking or using drugs before and after decision to rob convenience store:	8.3%	17.5%	14.1%
Use of Weapon: No Weapon Stick Knife Pistol Shotgun Rifle Explosive	8.0% 4.0% 12.0% 72.0% 4.0%	22.0% 2.0% 8.0% 58.0% 5.0% 2.0% 2.0%	17.0% 3.0% 9.0% 63.0% 12.0% 5.0% 2.0%
Why Weapon?: Security- Scare Clerk Hurt Someone No Articulable Reason	17.4% 60.9% 0% 21.7%	20.0% 30.0% 0% 50.0%	19.0% 41.0% 0% 40.0%
Time Preference: No Preference Late Night Early Morning Morning Day Evening Late Night/Early Morning Evening/Late Night Other	0% 4.0% 56.0% 16.0% 4.0% 20.0% 4.0%	15.0% 22.0% 8.0% 5.0% 0% 35.0% 2.0% 2.0%	9.0% 31.0% 9.0% 9.0% 6.0% 29.0% 3.0% 2.0%
By Time Preference: No Reason Fewer Patrons Fewer Police Spontaneous (when up and around)	8.0% 60.0% 4.0%	20.0% 30.0% 2.0%	15.0% 46.0% 3.0% 6.0%
Other	24.0%	32.0%	27.0%

TABLE B

PERPETRATOR DESCRIPTION OF ROBBERY BEHAVIORS AND STRATEGIES (Page 2 of 3 Pages)

What are the five (5) most desirable things to look for (attract you) when considering which store to rob? (open answer)

Perpetrators named and ranked (a store with) the below listed factors as one of their top five (5) reasons to prefer a particular convenience store to rob:

	<u>U.C.I.</u>	Butler <u>& Baker</u>	Combined
Remote Area	56%	38%	45%
Only One Clerk	40%	28%	32%
No Customers	36%	30% .	32%
Easy Access/Getaway	36%	18%	25%
Lots of Cash	24%	. 25%	25%
Female Clerk	20%	25%	23%
No Back Room	4%	8%	6%
Obstructed Windows	0%	. 8%	5%
Type of Safe	4%	2%	3%
No Alarm	8%	0%	3%

When considering characteristics of stores to avoid when choosing a convenience store to rob? (open answer)

Perpetrators named and ranked (a store with) the below listed factors as one of their top five (5) reasons to avoid a particular convenience store to rob:

	U.C.I.	Butler <u>& Baker</u>	Combined
Many Customers	40%	30%	34%
Heavy Traffic In Store Front	28%	22%	31%
Two Clerks	12%	32%	25%
Back Room	4%	15%	11%
A Male Clerk	0%	10%	9%
One-Way Mirror In Back	12%	8%	9%
Limited Getaway	12%	5%	8%
Alarms	8%	8%	8%
Clear Visibility Into Store	0%	2%	2%
Gas Station In Front	4%	0%	2%

TABLE B

PERPETRATOR DESCRIPTION OF ROBBERY BEHAVIORS AND STRATEGIES (Page 3 of 3 Pages)

When asked specifically about each of the below listed factors, the percentage of the perpetrators indicated important consideration as follows:

	U.C.I.	Butler <u>& Baker</u>	Combined
Location Of Store	76%	70%	72%
Visibility Into Store	48%	58%	54%
Number And Type Of Clerks (one clerk preferred; not big/muscular/young)	68%	70%	69%
Only One Clerk (one clerk over two, regardless age/gender/size)	60%	52%	55%
Female Clerk	28%	48%	40%
(instead of male clerk)			
Elderly Clerk (preferred)	16%	15%	15%
Single, Young Male Clerk	28%	20%	23%

When asked if there was a preferred chain of convenience stores to rob:

	U.C.I.	Butler <u>StBaker</u>	Combined
Indicated No Preference	80%	70%	74%
Preferred 7-Eleven Stores	4%	15%	11%
Preferred Majik Markets	8%	0%	3%
Preferred Lil' Champ Stores	0%	5%	3%
Preferred Non-National Stores	8%	10%	9%

TABLE C

DESIRABILITY OF STORE CHARACTERISTICS
CONVENIENCE STORE ROBBER SURVEY — PERPETRATORS

1 = Very Desirable 5 = Very Undesirable

	<u>U.C</u> N=		Butler <u>_ & Baker</u>		Combined N=65	
	$\dot{\overline{\mathbf{M}}}$	S.D.	H	S.D.	$\frac{\mathbf{M}}{\mathbf{M}}$	S.D.
Poor visibility from outside of store to counter	2.71	1.16	2.78	1.31	2.75	1.25
Poor visibility from register to inside of store	2.20	0.84	2.27	0.99	2.28	0.93***
Only one (1) clerk on duty	1.60	0.87	1.62	0.77	1.61	0.80***
Not open 24 hours	2.92	1.00	3.02	1.00	2.98	1.02
Store with a female clerk	2.24	1.30	2.30	1.34	2.28	1.32**
With two (2) female clerks	2.92	1.29	2.87	1.30	2.89	1.29
With an elderly clerk	2.80	1.47	2.80	1.28	2.80	1.35
With two (2) elderly clerks	3.32	1.37	3.10	1.33	3,18	1.34
With accessible safe	2.32	1.31	1.72	1.04	1.95	1.18***
With timed release safe	3.68	1.11	3.85	1.10	3.78	1.10***
With one (1) counter	1.96	1.06	2.20	0.99	2.11	1.02***
Dimly lighted outside	2.40	1.19	2.32	1.05	2.35	1.09***
Brightly lighted inside	3.28	1.21	3.20	0.99	3.23	1.07
Easy access/getaway in all directions	1.24	0.44	1.22	0.62	1.23	0.55***
Remote area in town	2.24	1.01	2.02	1.19	2.11	1.12***
Low income area of town	3.72	0.94	3.12	1.30	3.35	1.25
Store with camera	4.00	1.04	3.77	1.14	3.06	1.10***
Heavy traffic on adjacent highway/street	3.52	1.12	3.36	1.42	3.42	1.30**

TABLE C

DESIRABILITY OF STOKE CHARACTERISTICS
CONVENIENCE STORK ROBBER SURVEY - PERPETRATORS
(Page 2 of 2 Pages)

1 = Very Desirable 5 = Very Undesirable

·	<u>U.C.</u> N=2		Butle <u>& Bak</u> N=4	<u>er</u>	Combin	
	M	S.D.	М	S.D.	Н	S.D.
With (at most) one (1) car in store parking lot	2.40	0.91	1.05	0.86	2.06	0.91***
Two (2) or more cars in parking lot	3.56	1.19	3.12	1.11	3.29	1.15*
Sign: CLERK DOES NOT HAVE COMBINATION TO SAFE	3.36	0.86	3.02	1.00	3.15	0.96
Store in middle of other businesses	3.48	1.12	3.45	1.20	3.46	1.16***
With gas station (pumps) in front	2.56	1.00	2.47	1.06	2.51	1.03**
Lots of customers	3.96	0.79	3.90	1.37	3.92	1.18***
Obstructed windows	2.48	0.92	2.27	1.06	2.35	1.01***
No other businesses near	1.92	0.86	1.67	0.80	1.77	0.82***
Brightly painted store	3.12	0.33	2.77	0.70	2.91	0.60
Store near residence	4.08	0.91	3.97	1.19	4.01	1.08***
Know store clerk	4.60	0.50	4.50	0.96	4.54	0.81***
Deep register counter	3.20	0.58	3.25	0.93	3.23	0.80*
Register/counter on raised platform	3.52	0.82	3.32	0.92	3.40	0.88**
Two (2) male clerks	_	00	3.50	1.15	**	

TABLE D

CHARACTERISTICS INFLUENCING CONVENIENCE STORE ROBBERY SUMMARY TABLE

Robber Survey Significant Variables N = 65

<u>Desirable Characteristics</u> *	Mean	<u>P Level</u>
Easy Access/Getaway	1.23	p = <.001
Only One (1) Clerk	1.61	p = <.001
No Other Businesses Near	1.77	p = <.001
Accessible Safe	1.95	$p = < \001$
Only One (1) Car In Front	2.06	p = <.001
One (1) Counter	2.11	p = <.001
Remote Area	2.11	p = <.001
Poor Inside Visibility	2.28	p = <.001
Female Clerk	2.28	p = <.001
Dimly Lighted Outside	2.35	p = < .001
Obstructed Windows	2.35	p = <.001
Gas Station	2.51	<u>P</u> = < -01

^{*}In order of attraction.

Undesirable Characteristics**	Mean	<u>P Level</u>
Robber Knows Clerk	4.54	$p = < \001$
Store Near Robber's Residence	4.01	p = <.001
Lots of Customers	3.92	p = <.001
Cameras in Store	3.86	p = <.001
Timed Release Safe	3.78	p = < .001
In Middle of Other Businesses	3.46	p = <.001
Heavy Traffic	3.42	P = < .01
Two (2) Male Clerks (N=40)	3.50	p = < .01
Raised Counter	3.40	P = < .01
Two or More Cars in Front	3.29	p = < .05
Deep Register Counter	3.23	p = < .05

^{**}In order of aversion.

TABLE E

VICTIM CLERK SURVEY N = 24

Characteristics of Victim Survey

Average Age Modal Age Range	33 24 19-60 years of age	
Presently Employed by Convenience	e Store	46%
Quit working at Convenience Store	e After Robbery	54%
Number of Tin	nes Robbed	
Once Twice Three Times	62.5% 25.0% 12.5%	
Quit After Robbery Quit Within 12 Months of Robbery Still Working at Convenience Stor Quit Because of Robbery	re ·	21% 50% 46% 17%
Clerks report they received train after they were hired	iing	66%
Clerks report receiving training robbery behavior after they had		62%

TABLE F

VICTIM CLERK SURVEY N = 24

Description of Robbery

Number of customers in store during robbery	0 cust 1 cust 2 cust 83.3% 12.5% 4.2%	
Number of robbers	1 robber 2 robbers 79.0% 21.0%	
Number of clerks robbed	One (respondent alone) Two (one other clerk)	92% 8%
When there was another clerk	2nd clerk was female 2nd clerk was elderly	100% 50%
Time of Robbery	Daytime (8AM-4PM) shift Evening (4PM-midnight) shift Night (midnight-8AM) shift	12% 38% 50%
<pre>Anyone hurt during robbery (clerk(s), customer(s))</pre>	No one hurt Someone hurt	75% 25%
Perceived characteristics of robber: Noticeably under Timid robber Nervous robber Agitated robber Aggressive robber Abusive robber		22% 17% 52% 26% 46% 29%
Perceived store characteristics: Remote/isolated In town (urban area) Near other businesses Gas station in front Easy access/getaway Good visibility into store		21% 75% 88% 58% 96% 80%
Robber had weapon		77%
Type of weapon: Rifle Pistol Knife Bat None		4% 52% 9% 13% 21%

TABLE F

VICTIM CLERK SURVEY N = 24(Page 2 of 3 Pages)

Description of Robbery

Clerk was frightened of being harmed.	67%
Clerk felt personally threatened.	54%
Clerk was physically hurt.	1%
Clerk lost work and pay as a result of robbery. Result of robbery: 10% lost a week or more of work.	26%
Clerk felt affected by robbery experience.	67%
Clerk found himself/herself thinking about	67%
robbery experience: Frequently Often Seldom Never	29% 8% 46% 17%
Clerk found the robbery experience affected his/her job.	65%
Clerk dreaded going to work after robbery experience.	35%
Clerk reported being afraid of the store customers.	27%
Clerk reported having difficulties with relating to others as a result of robbery experience.	29%
Clerk reported having difficulty sleeping after robbery experience.	33%
Clerk reported having nightmares after robbery experience.	4%
Clerk reported receiving assistance from management after robbery experience.	46%
Management:	0 %
Very actively assisted Concerned and helpful	0% 11%
Showed some concern Very little concern	25% 12%
No concern or assistance	50%

TABLE F

VICTIM CLERK SURVEY N = 24 (Page 3 of 3 Pages)

Description of Robbery

Clerk would never work again as a convenience store clerk.	25%
Clerk feels additional clerks would deter future robberies.	75%
Clerk feels silent alarms would deter future	46%
robberies.	
Clerk feels guard dogs would deter future robberies.	21%
Clerk feels a security booth would deter future robberies.	42%
Clerk's feeling that more than one clerk would deter convenience store robbery:	
Very desirable	76%
Desirable	10%
Unimportant	10%
No opinion	5%

TABLE G VICTIM CLERK SURVEY N = 24

Desirable Characteristics

	<u>M</u>	<u>S.D.</u>
Poor visibility from outside of store to counter	1.67	0.82
Poor visibility from	2.67	1.01
register to inside of store		0
Only one (1) clerk on duty	1.58	0.65
Not open 24 hours	3.46	0.66
Store with a female clerk	1.87	0.80
	3.37	1.09
With two (2) female clerks	1.92	0.88
With an elderly clerk	3.08	1.02
With two (2) elderly clerks	2.08	1.35
With accessible safe		
With timed release safe	3.79	0.72
With one (1) counter	2.33	0.82
• •	1.67	0.87
Dimly lighted outside	3.75	0.74
Brightly lighted inside Easy access/getaway	1.25	0.44
in all directions	1.23	0.44
Remote area in town	1.92	1.02
Low income area of town	2.79	0.98
Store with camera	4.21	0.72
Heavy traffic on adjacent highway/street	3.50	0.98

TABLE G

VICTIM CLERK SURVEY N = 24 (Page 2 of 2 Pages)

Desirable Characteristics

•	<u>_M</u>	<u>s.D.</u>
With (at most) one (1) car in store parking lot	2.17	0.82
Two (2) or more cars in parking lot	3.79	0.78
Sign: CLERK DOES NOT HAVE COMBINATION TO SAFE	3.08	0.41
Store in middle of other businesses	3.54	0.88
With gas station	3.08	0.72
(pumps) in front		
Lots of customers	4.25	0.85
Obstructed windows	1.75	0.61
No other businesses near	1.87	0.90
	3.00	0.29
Brightly painted store	3.58	0.83
Store near residence	4.29	0.81
Know store clerk		
Deep register counter	3.29	0.55
Register/counter on raised platform	3.42	0.72
Two (2) male clerks	4.33	0.72

TABLE H

CHARACTERISTICS INFLUENCING CONVENIENCE STORE ROBBERY SUMMARY TABLE

Victim Survey N = 24

<u>Desirable Characteristics for</u>	Robbery
Easy Access/Getaway	1.25
Only One (1) Clerk	1.58
Dimly Lighted Outside	1.67
Poor Visibility from Outside	1.67
Obstructed Window	1.75

Undesirable Characteristics for Robbery Two (2) Male Clerks 4.33 Robber Knows Store Clerk 4.29 Lots of Customers 4.25 Cameras in Store 4.21 Two or More Cars Parked In Front 3.79 Timed Release Safe 3.79

TABLE I

GAINESVILLE CONVENIENCE STORE STRUCTURAL EVALUATION ${f N}={f 4}\,{f 0}$

Location:		
Rural	2.5%	
Residential	15.0%	
Residential/Commercial	55.0%	
Commercial	27.5%	
Adjacent Stores/Businesses:	65.0%-Yes	35.0%-No
24-Hour Stores Nearby:	17.5%-Yes	82.5%-No
Availability of Roads:		
One Exit	15.0%	
Two Exits	52.5%	
Three Exits	25.0%	
Near Connecting Highways	7.5%	
Traffic on Adjacent Streets: Heavy	40.0%	
Medium	50.0%	
Low	10.0%	
Ingome Level of Neighborhood:		
<pre>Income Level of Neighborhood:</pre>	0%	
Medium	51.0%	
Low	49.0%	
Within One (1) Mile of Police Station:	10.0%-Yes	00 09 No
Bar Within A Couple of Blocks:	41.0%-Yes	59.0%-No
Visibility from Outside of		
Store to Inside Counter:		
Completely clear		12.5%
Clear except for signs above		15.0%
Fairly cluttered (still can		
Completely cluttered (cannot	see the coun	iter) 15.0%
<u>Lighting on the Outside of the Store</u> :		
Well Lighted	25.0%	
Fairly Well Lighted	70.0%	
Poorly Lighted	5.0%	
<u>Lighting on the Inside of the Store:</u>		
Well Lighted	70.0%	
Fairly Well Lighted	27.5%	
Poorly Lighted	2.5%	

TABLE I

GAINESVILLE CONVENIENCE STORE STRUCTURAL EVALUATION N = 40 (Page 2 of 4 Pages)

Sians on the Window Saying, "Clerk Does Not Have Combination to Safe1?:	35.0%-Yes	65.0%-No
Sians on the Window Saying, "Less Than '??' dollars in Register":	22.5%-Yes	77.5%-No
If Sign Present, What Dollar Amount: No Sign \$30.00 \$50.00	77.5% 12.5% 10.0%	
Gas Station in Front:	55.0%-Yes	45.0%-No
Visibility from Counter to Inside of the Store: Completely visible (from register Blocked in certain places (from Poor visibility (from register)	om register)	55.0%
<u>Visible Cameras</u> :	22.5%-Yes	77.5%-No
Mirrors [To Assist Clerk In Surveillance of Store]:	62.5%-Yes	37.5%-No
One-Way Mirrors:	10.0%-Yes	90.0%-No
Type of Counter(si: Near Door Raised Center Counter Inside Counter Fenced-In or Caged Raised and Near Door Raised and Deep Counter Near Door and Centered	65.0% 0% 6.0% 0% 0% 2.5% 5.0% 12.5%	
Number of Registers: One Counter Two Counters	51.3% 48.7%	
Backroom (Office in Rear):	97.4%-Yes	2.6%-No
Hours of Business: 24-hour Closes	52.5% 47.5%	

TABLE I

GAINESVILLE CONVENIENCE STORE STRUCTURAL EVALUATION N = 40 (Page 3 of 4 Pages)

Any Shift	With Only One (1) Clerk: One Clerk Two Clerks (during all business hours)	80.0% 20.0%	
Which Shi	ft Manager Works: Day Evening Night	95.0% 5.0% 0%	
Peak Hour	<u>s</u> :		
	Day Shift Evening Shift Night Shift	37.0% 63.0% 0%	
Slow Hour	<u>s</u> :		
	Day Shift	17.0%	
	Evening Shift	28.0% 55.0%	
	Night Shift		7 4 004 37
Alarm Sys	<u>tem</u> :	46.0%-Yes	54.0%-No
Alarm Type		70 00/	
	No Alarm	53.0% 8.0%	
	Silent Alarm Register Alarm	3.0%	
	Alarm in Plain View	5.0%	
	Burglar Alarm (for after	29.0%	
	hours break-in)		
	Other	3.0%	
Type of Sa		1	
	Drop Safe Floor Safe	15.0% 20.0%	
	Timed-Release Safe	18.0%	
	Drop (Floor) Safe	41.0%	
	Drop (Timed-Release) Safe	5.0%	
<u>Location</u> of	of Safe: Visible from Outside Behind Counter Backroom Other	0% 92.0% 0% 8.0%	

Security Guard:			5.0%-Yes	95.0%-No
<pre>Guard Dog(s):</pre>			0%-Yes	100.0%-No
Number of Times Robbed (3 Years): None Once Twice Three Times Four Times Five Times		34.0% 26.0% 24.0% 8.0% 5.0% 3.0%		
Robberies:	-1982-	-1984-	-1985-	-1986-
0	15%	62%	45%	40%
1	10%	8%	35%	38%
2	15%	10%	15%	8%
3	18%	8%	5%	12%
4	12%			
5	5%			
6	5%			
7	8%			
8	8%			
9	2.5%			
10	2%			
11	2.5%			

 $\frac{\texttt{TABLE} \ \texttt{J}}{\texttt{SPEARMAN}}$ SPEARMAN CORRELATIONS FOR 1986 CONVENIENCE STORE ROBBERIES AND STORE CHARACTERISTICS $N \ = \ 40$

Correlation	P_Value	
.00	(.61)	Store Location
.14	(.39)	Adjacent Stores
*,32	(.04)	24-Hour Stores Nearby
.06	(.73)	Availability of Access Roads
10	(.53)	Traffic on Adjacent Streets
.14	(.42)	Income Level of Neighborhood
11	(.49)	Within One (1) Mile of Police Station
05	(.74)	Bar Within a Couple of Blocks
03	(.84)	Visibility from Outside of Store to Inside Counter
12	(.44)	Lighting on the Outside of the Store
19	(.23)	Lighting on the Inside of the Store
27	(.08)	Signs on the Window Saying, "Clerk Does Not Have Combination to the Safe"
16	(.32)	Signs on the Window Saying, "Less Than
		'\$\$' Dollars in Register"
.16	(.29)	Amount '\$\$'
06	(.73)	Gas Station
.19	(.23)	•
*.35	(.02)	Visibility from Counter to Inside of Store
.03	(.84)	Visible Cameras
.25		Mirrors (to assist clerk in store surveillance)
. 43	(.11)	One-Way Mirrors

SPEARMAN CORRELATIONS FOR 1986 CONVENIENCE STORE ROBBERIES AMD STORE CHARACTERISTICS $N = 40 \\ (Page 2 of 2 Pages)$

Correlation	<u>P_Value</u>	
06	(.72)	Type of Counter(s)
.09	(.56)	Number of Registers
.24	(.73)	Backroom
36	(.02)	Hours of Business
**39	. (,01)	Any Shift with Only One (1) Clerk
10	(.56)	Which Shift Does Manager Work
07	(.58)	Peak Hours
.20	(.23)	Slow Hours
.23	(.16)	Alarm System
07	(.66)	Type of Alarm System
*.32	(.05)	Type of Safe
.04	(.82)	Location of Safe
.25	(.11)	Security Guard

TABLE K

1986 STRUCTURAL ASSESSMENT OF GAINESVILLE CONVENIENCE STORES AND NUMBER OF ROBBERIES SUMMARY TABLE

N = 40

Correlation Coefficient	<u>Variable</u>
39**	Only One Clerk (higher robbery rate)
.35*	Visible Cameras (lower robbery rate)
.32*	24-Hour Stores Nearby (lower robbery rate)
.32*	Type of Safe (Timed Release) (lower robbery rate)
36*	Hours of Business (24-Hours) (stores that close have lower robbery rate)
** F	p = < -0.1 * $p = < .05$

TABLE L

MULTIPLE REGRESSION

GAIHESVILLE CONVENIENCE STORE CHARACTERISTICS BY ROBBERIES IN 1986

Step 20 Variable MNGR Entered R Square = 0.99299195

Sum of

Mean

Problem

Regression Error Total	DF 20 8 28	Souares 107.037 0.755 107.793	<u>Square</u> 5.351 0.094	F 56.68	> F 0.0001
Store Characteristics	B Value	STD Error	Type II SS	F	Problem > F
(Intercept)	15.606				
Location of Store	0.533	0.114	2. 038	21. 59	0.0017
Adjacent Businesses	1.318	0.198	4. 180	44. 27	0.0002
Access/Getaway-	-0,965	0.097	9.191	97.34	0.0001
Traffic	1.144	0.143	5.968	63. 20	0.0001
Income of Neighborhood	1.694	0.189	7. 563	80.10	0.0001
Police Station Nearby	-2.481	0.290	6.874	72.81	0.0001
Bar	-0.886	0.185	2. 157	22. 85	0.0014
Visibility Into Store	-1.300°	0.094	17. 833	188. 86	0.0001
Lighting Outside	0.554	0.176	0.928	9.83	0.0139
Lighting Inside	0.981	0.190	2.510	26. 59	0.0009
"Clerk Does Not Have Combination" Sign	0.612	0.418	0.202	2. 14	0.1816
"Limited Cash" Sign	-9.100	0.766	13. 304	140. 90	0.0001
Amount of Limited Cash	-0.146	0.015	8.196	86.80	0.0001
Mirror	-0.617	0.201	0.887	9.40	0.0154
Register	-3.298	0.333	9.226	97.71	0.0001
Hours Guard	-1.073	0.245	1.800	19. 07	0.0024
One (1) Clerk	0.443	0.248	0.301	3.19	0.1118
Slow Evening	1.975	0.154	15. 359	162. 66	0.0001
Timed Release Safe	0.223	0.052	1.718	18. 20	0.0027
Layout	2.049	0.261	5.795	61. 37	0.0001

The above model is the best 20 variable model found.

TABLE M

STEPWISE REGRESSION PROCEDURE FOR DEPENDENT VARIABLE NUMBER OF ROBBERIES (3 YEARS - 1982, 1985, 1986)

Step 19 Variable MNGR Entered R Square = 0-97410556

	DF	Sum of Squares	Mean Square	F	Problem > F
Regression	19	72.918	3.837	15.84	0.0002
Error	8	1.938	0.242		
Total	27	74.857			
		 			
		_		_	Problem
Store Characteristics	<u>B Value</u>	std Error	Type 11 SS	<u> </u>	>_F
(Intercept)	6.312				
Location of Store	1.432	0.213	10.922	45.08	0.0002
24 Hours	-3.591	0.455	15.067	62.18	0.0001
Access/Getaway	-0.457	0.186	1.454	6.00	0.0400
Traffic	1.983	0.256	14.458	59.67	0.0001
Income of Neighborhood	-1.171	0.307	3.510	14.49	0.0052
Police Station Nearby	-2.438	0.471	6.483	26.76	0.0009
Visibility Into Store	-0.479	0.165	2.038	8.41	0.0199
Lighting Inside	0.657	0.270	1.435	5.92	0.0410
"Limited Cash" Sign	-1.780	0.364	5.783	23.87	0.0012
Gas Station	-0.901	0.317	1.950	8.05	0.0219
Visibility Within Store	1.337	0.431	2.324	9.59	0.0147
Cameras	2.953	0.357	16.563	68.36	0.0001
Mirror	1.687	0.301	7.601	31.37	0.0005
Register (2)	0.876	0.451	0.911	3.76	0.0883
One (1) clerk	-2.214	0.400	7.394	30.52	0.0006
Manager	0.655	0.498	0.418	1.73	0.2252
Peak	-1.797	0.348	6.447	26.61	0.0009
Type of Safe	0.311	0.074	4.198	17.33	0.0032
Layout	0.238	0.490	0.055	0.23	0.6452

Bounds on Condition Number: 6.5%, 112,65

APPENDIX C

CONVENIENCE STORE ROBBERY ANALYSIS

The purpose of this study was to determine what factors affect robberies of convenience stores. Data were gathered on every convenience store in Alachua County by police officers familiar with the area. After examining numerous possible factors that could influence the robbery rate, it was determined that the number of clerks working is the strongest predictor of convenience store robberies.

METHODS

The Gainesville Police Department cooperated in the effort to study factors influencing past convenince store robberies in their city and county. The participating officers were asked to rate factors of all 72 convenience establishments lighting of store and premises; visual based on: obstruction to cashiers; and number of clerks on duty. For the purposes of computer analysis, variables were given numerical values. Robberies between the years 1981 and 1986 (partial) were used as the dependent variable. Each store was given an annual robbery rating of "low" (1 robbery every 4 years), "medium" (less than 1 robbery per year), or "high" (over 1 robbery per year). Independent variables were then introduced. Lighting was assigned ratings of "poor" (2), "good" (1), or "excellent" (0). If obstructions were present, it was given a rating of one (1); if not, a zero (0) was used. Finally, a combinatin of lighting and obstruction measurement were used in order to obtain an overall rating of the "Environment". The ratings used were: "excellent" (0); "good" (1); "fair" (2); "poor" (3).

The final independent variable employed was the number of clerks on duty. With the categories now clearly defined, robbery information for the five-year period was processed.

FINDINGS

Some clear findings were uncovered by this research. First, it was seen that the better the environment, the lower the crime rate. This discovery, while helpful in the research, was NOT found to be statistically significant. Second, it was revealed that variation in robberies was largely explainable by the number of clerks on duty. Two clerks lowered the robbery rate significantly. In fact when the environment was rated "good" or "excellent" and there were two clerks working, no robberies were reported at all. This data clearly suggests that the use of two clerks in these convenience stores is the main factor in lowering the chance of robbery.

TABLE 1. Relationship Between Number of Clerks and Robbery Rate

Robbery Rate	Number of Cl	erks On Duty
Low	12.5%	79.2%
Medium	52.5%	79.2%
High	35.4%	0
TOTAL %	100%	100%
•	(N=48)	(N=24)

TABLE 2. Relationship Between Number of Clerks
and Robbery Rate for Convenience Stores Rated
Excellent on Environmental Factors

Robbery Rate with Excellent Environment	Number of C	lerks On Duty
Low	0	85.7%
Medium	85,7%	14.3%
High	14.3%	0
TOTAL %	100%	100%
	(N=7)	(N=7)

The following conclusions become clear. First, the store environment affects the robbery rate. Second, and more importantly, the number of clerks on duty has been shown to be a highly significant factor in this study. Stores employing two cashiers consistently had the lowest robbery rates.

APPENDIX D

CRIME ANALYSIS, COMPUTERS, AND CONVENIENCE STORE ROBBERIES

C.R. JEFFERY SCHOOL OF CRIMINOLOGY FLORIDA STATE UNIVERSITY TALLAHASSEE, FLORIDA 32306

RONALD HUNTER
POLICE DEPARTMENT
CITY OF TALLAHASSEE
TALLAHASSEE, FLORIDA 32303

JEFFREY GRISWOLD SCHOOL OF CRIMINOLOGY FLORIDA STATE UNIVERSITY TALLAHASSEE, FLORIDA 32306 Ι

Ι

Ι

Ι

Ι

Crime Analysis, Computers, and Convenience Store Robberies

Introduction

This research project started as a class project in a graduate course in crime prevention at Florida State University, Spring, 1986. One student, Ronald Hunter, was a doctoral student as well as coordinator of ICAP (Integrated Criminal Apprehension Program) for the Tallahassee Police Department. The ICAP program has been adopted by many progressive police departments in order to provide more efficient services to the public through improved data collection, analysis, planning, and feedback. A vital component of ICAP is crime analysis.

Another doctoral student, Jeffrey Griswold, had worked as a crime analyst for several governmental agencies using computers and computer drawn maps (computer graphics) to analyze crime rates. He is also a graduate student in the Department of Geography.

Several other students volunteered to work on the research team in order to determine the relationship of crime sites to geographical features, including Gary Hendrix, Dorothy Taylor, Mary Maney, Karen Mann, and John Speir.

Crime Prevention and the Police

The police are involved in a <u>reactive</u> rather than <u>proactive</u> approach to crime, as are the courts and the prison system, that is, the criminal justice system waits for a crime to occur before action is taken. The effort is then to process the criminal through detection, arrest, prosecution, and sentencing, and as a result less than one percent of the crimes actually committed results in an individual being placed in prison (Jeffery, 1977).

The <u>proactive</u> approach is based on the prevention of crime before it occurs through changes in the environment in which crimes occur. It is estimated that crimes occur in less than 25 percent of the environment, and it is well-known that most crime are concentrated in a very small area of the city. Since crime is related to certain environmental variables, it is logical to attempt to prevent crime by finding out what variables are associated with crime and then change such variables.

In England in the 1950's the Home Office established a crime prevention unit which has been very active in research in this area (Clarke and Mayhew, 1980). Dean John Klotter of the Southern Police Institute established the National Crime Prevention Institute at the University of Louisville a few years later (Jeffery, 1977). This Institute was devoted to target hardening through locks, window design, and alarms, and other such measures— The police also established crime prevention units devoted to public relations and public education through such programs as Stop Crime, Neighborhood Watch, and Officer Friendly, as well as programs to mark property with an identification number.

Recently the police department of Newport News, Virginia (U.S. News and World Report, July 21, 1986, p. 55-57) under the sponsorship of the Police Executive Research Forum of Washington, D.C. has initiated a crime prevention program entitled "problem oriented policing." This program consists of crime analysis of crime sites, victims, and criminals. For example, family violence might be handled by referrals to family counseling centers before further violence erupts, or a robbery will be analyzed in terms of the characteristics of the crime site, victims, and criminals. Unfortunately this project with major financial backing from the federal government has no theoretical or research base in the literature on crime prevention and environmental design.

The Use of Computers by Police Departments

There has been a major move in recent years for police departments to utilize computers for the storage and retrieval of information on crime data. The term "crime analysis support system" has been used to describe this movement (Chang et al., 1979) and as a result many police departments have created Crime Analysis Units and such units now form the basis for crime prevention programs in many urban police departments.

Computers are used by police departments (1) to find crime patterns by time of day and street location, (2) to develop criminal career files and to store other information on known criminals, (3) to profile target areas such as specific buildings or types of individuals, (4) to forecast crime potentials, (5) to forecast crime trends, and (6) to develop resource allocation for the use of manpower and police patrols (Chang et al., 1979).

Of these functions only target profiling fits into the category of crime prevention. The other uses of crime analysis are geared to arrest, conviction, prosecution, and imprisonment. Although target profiling is used to increase patrols and surveillance, a more profitable use would be to prevent crime by altering the nature of the target under attack. Concerning the use of crime analysis for target profiling, the International Association of Chiefs of Police (Chang et al., 1979; 80) stated:

In crimes against property, it has been suspected that individual locations (i.e., dwellings, businesses) vary widely in their likelihood of criminal attack, with a high probability that those with high potential share common attributes, and those with low potential exhibit common differences from those attributes. As with crimes against persons, identification and documentation of crime suspect correlations to enhance decisions made as to tactical and strategic responses. At this point it should be admitted that this is an experimental concept not currently in significant use, (emphasis by writer)

It should be noted that not only is target profiling not currently in significant use, but that it is used for strategic and tactical responses such as patrol allocation by time of day, week, and month, or as to stakeouts of stores or bars, or increased patrol activity in one section of town rather than another. It is not used for purposes of redesigning the environment through urban planning and urban design so as to prevent crimes in the future.

This project focused on identifying high crime/criminal areas with the purpose of redesigning such urban areas so as to prevent crimes in the <u>future</u>. Target profiling will focus on potential targets and potential criminals, and on the features of the physical environment which contribute to high crime rates and which can be altered or modified. Such a program will allow police departments to move from a <u>reactive</u> to a more <u>proactive</u> stance in fighting the crime problem. Law enforcement can then become a major factor in preventing crime rather than responding to crime after it has occurred.

Crime Prevention Through Environmental Design

In 1971 Jeffery (1971» 1977) published <u>Crime Prevention Through Environmental Design</u>. The major idea of the book was that crime sites should be analyzed as to their physical characteristics which then could be altered to prevent crimes in the future. The focus was on prevention in the future and on the physical nature of the crime site. This model was based on potential targets and the opportunity for crime, and it can be labeled the "opportunity theory" of crime control and prevention. Baldwin and Bottoms (1976) and Brantingham and Brantingham (1981) have pursued this model of crime and ecology. Brantingham and Brantingham (1981) noted that crime involved (1) a law, (2) an offender, (3) a target, and (4) a temporal and spatial location. In this

project we are interested in the interaction of the offender with the environmen and potential targets within a temporal and spatial framework. This interaction occurs in urban areas in relation to the location of residential areas, work areas, and recreation areas in respect to one another.

Other studies of crime and the physical environment include Newman (1972), Davidson (1981), Clarke and Mayhew (1980), Greenberg and Rone (1984), Georges-Abeyie and Harries (1980), Brantingham and Brantingham (1984), Herbert (1982), Poyner (1983), and Rubenstein et al. (1980).

Perhaps the most dramatic application of target and opportunity model theory to crime site analysis occurred in a Ph.D. dissertation by Francis Stoks (1982). Stoks built a computer model of the urban environment of Seattle, and from his data he was able to predict with a 95 percent accuracy rate where rapes in a public place would occur. He did this by a computer analysis of the, physical environment based on location of buildings, streets, shrubbery, alleys, garages, homes, and so forth.

Convenience Store Robberies in Tallahassee

In order to test the "opportunity model" of crime prevention a research project was undertaken at Florida State University as described in the Introduction.

All of the convenience stores in Tallahassee were surveyed as to their record for robbery from January 1, 1981 to July 1, 1985. In all thirty four stores were involved, and the distribution of robberies was from a high of 18 to a low of zero. It is obvious from this distribution that some stores are very attractive targets while other stores are never robbed. This in Itself supports the hypothesis that some geographical crime sites are potential target sites

while other sites are not. The stores were divided into high, medium high, medium low, and low depending on the number of robberies which had occurred at each store.

High	(8-18 robberies)	8
Medium	High (4-7 robberies)	. 8
${\tt Medium}$	Low (1-3 robberies)	10
Low	(zero robberies)	8

The variables selected for inclusion in the study as independent variables possibly influencing the crime rate for convenience store robberies were divided into <u>Internal Variables</u> characteristic of the design of the store itself, and <u>External Variables</u> characteristic of the immediate environment surrounding the store. The theory maintains that both i/iternal and external environmental variables impact on crime rates.

The Internal Variables surveyed were:

Variable 1 Location of cashier

Variable 2 Number of mirrors in store

Variable 3 Number of blind corners

Variable 4 Phones visible from inside store

Variable 5 Hours store open

Variable 6 Number of clerks in store

Variable 7 Windows clear of obstructions

The External Variables surveyed were:

Variable 8 Located on a major street

Variable 9 Access to store

Variable 10 Number of exterior lights

Variable 11 Number of gas pumps in front of store

Variable 12 Sides adjacent to store with vacant lots

Variable 13 Sides adjacent to store with woods

Variable 14 Sides adjacent to store with commercial buildings

Variable 15 Sides adjacent to store with single family dwellings

Variable 16 Sides adjacent to store with multiple family dwellings

Variable 17 Sides adjacent to store with parking lots

Variable 18 Sides adjacent to store with shrubbery

Variable 19 Sides adjacent to store with commercial buildings open in the evening

Variable 20 Vehicular traffic in front of the store

Variable 21 Pedestrian traffic in front of the store

Analysis of results

The analysis of the results was simply by the percentage of each variable found in the high, medium high, medium low, and low stores. For example, 75 percent of the stores with a low robbery rate had the cashier in the center of the store compared to 12.5 percent for stores with a high robbery rate. On the other hand, 25 percent of the stores with a low robbery rate had the clerk on the side compared to 87.5 percent of those stores with a high robbery rate.

The variables found to be significant were:

Variable 1 Cashier - center of store

Variable 3 Blind corners - none

Variable 6 Number of clerks - more than one

Variable 7 Windows ~ clear

Variable 8 Located on a major street - no

Variable 10 Exterior lighting - 3 or 4 lights

Variable 11 Gas pumps in front of store

Variable 15 Single family dwellings -- none in area

Variable 16 Multiple family dwellings -- none in area

Several observations can be made about the convenie^ce^stores which were high in robberies. The critical variables seem to be tfW--Tocation of the clerk in the center of the stor^pinore than one cleric. gas pumps in front of the store, and-'Tew single or multiple family dwellings in the area. One cannot judge from the general area where crimes will occur, that is, one cannot predict individual crime sites knowing that an area is a high crime rate area. One store, a Majic Market, was located in the center of the black district in Tallahassee, the high crime rate area for Tallahassee, and yet this store had zero robberies during the four and a half year period under study. This would never have been predicted from an ecological study of the area, and this emphasizes the need for individual crime site data and analysis.

It should also be noted that thirteen of the sixteen stores robbed four times or more were Majic Markets. The Majic Markets have the clerk on the side, with one clerk, and they exhibit many of the characteristics found in high robbery rate stores. Recently (the week of August 30-September 3, 1986) the Majic Market at 892 West Brevard, which ranked second in robberies with 16, had three armed robberies in the course of a four day period. There is certainly something about that store that encouraged robberies.

Computer Graphics in the Analysis of Crime Sites

Through the use of computers it is possible to produce a map of a given geographical area. Because of the cost of such computer graphics we did not reproduce every crime site, but we did reproduce ten such sites, five of them from the high category and 5 of them from the medium low to low categories. The features surrounding each crime site are visually represented on these maps (see

figures 1-11).

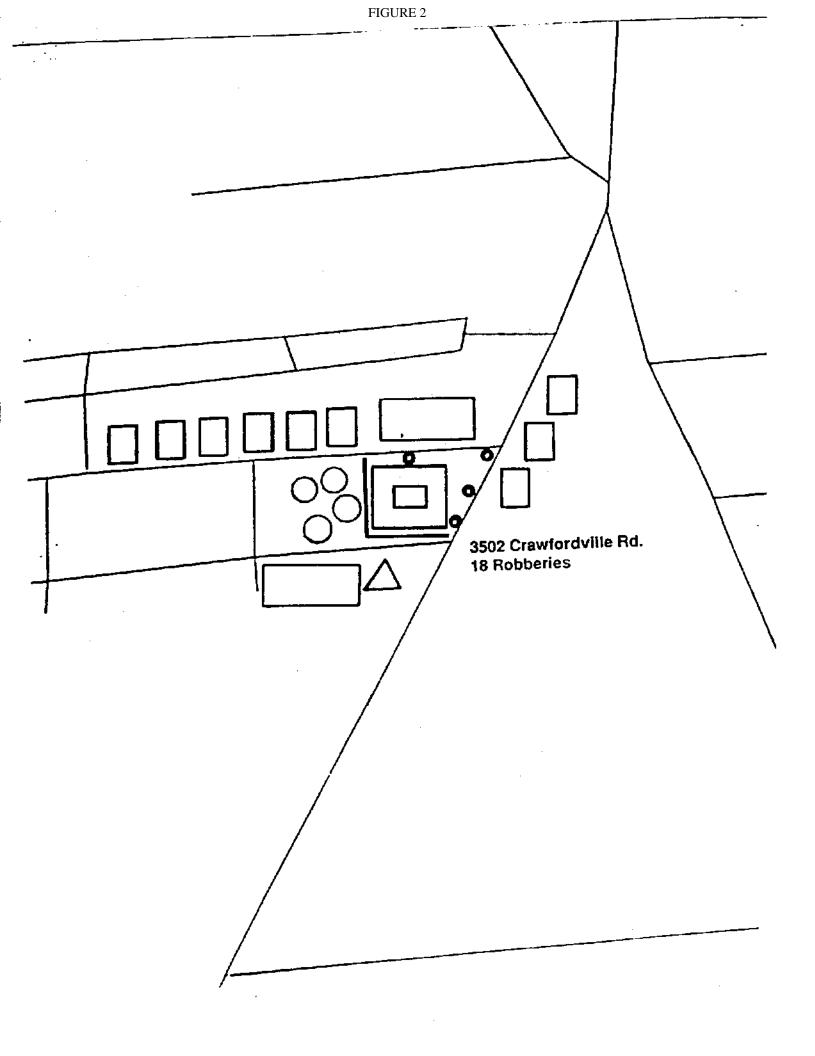
Summary and Conclusions

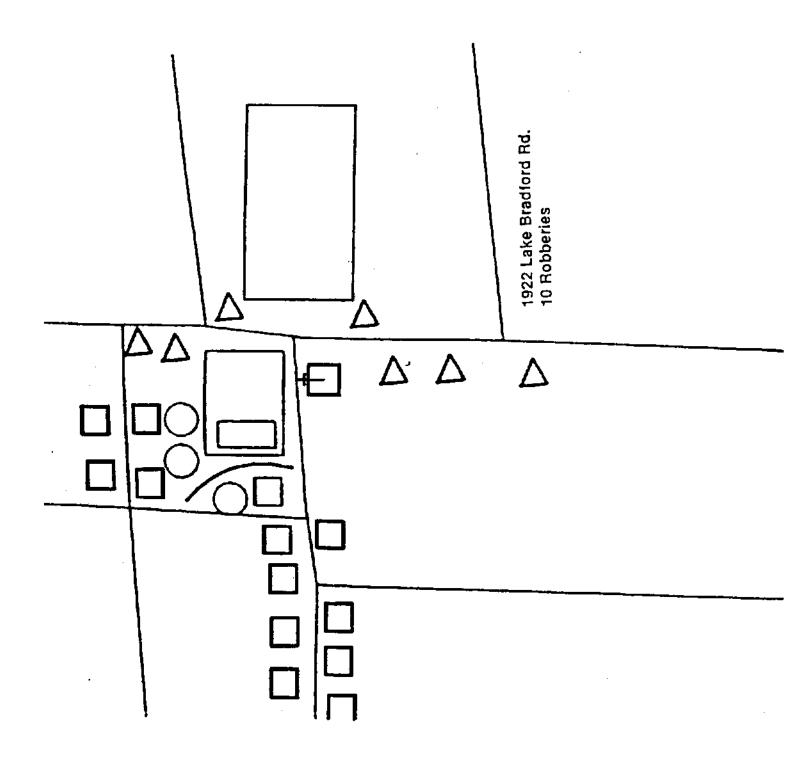
Analysis of the physical design of the city can be used by both public and private security forces to prevent crime before it occurs. In this study it was shown that convenience stores which are robbed differ in certain important aspects from convenience stores which are not robbed. The computer, which is a major investment for major urban police departments, can be used for more than storing information and keeping records. The computer can be used in crime analysis to locate where crimes are likely to occur, and then steps can be taken to redesign the environment in such a way as to reduce the opportunity structure for crime, thus reducing the overall crime rate.

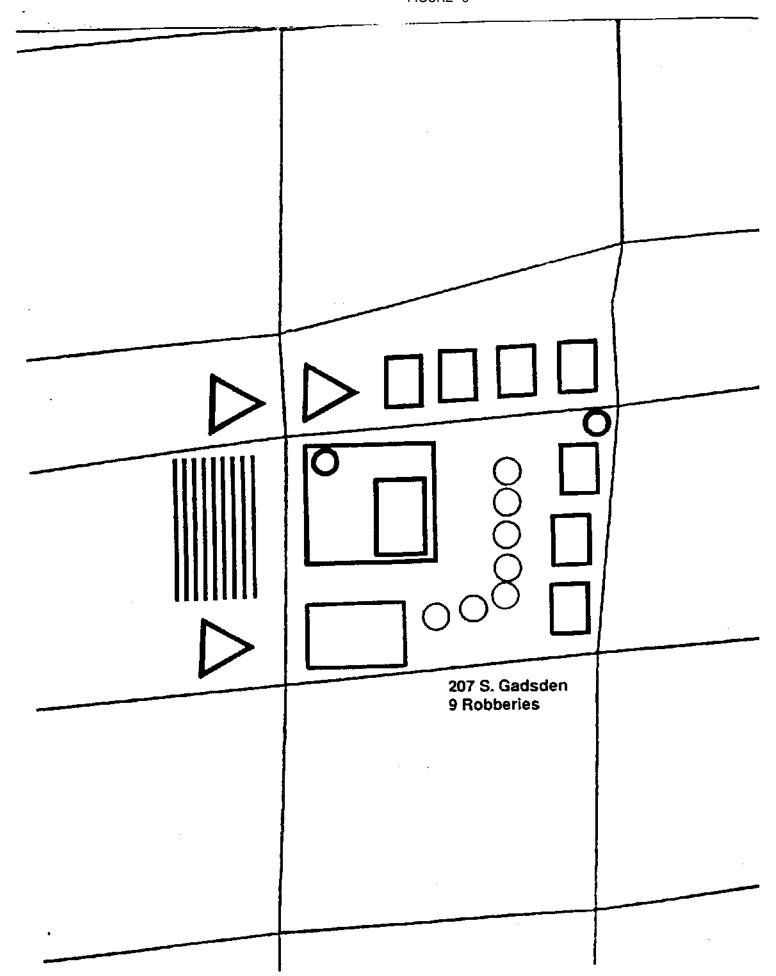
REFERENCES

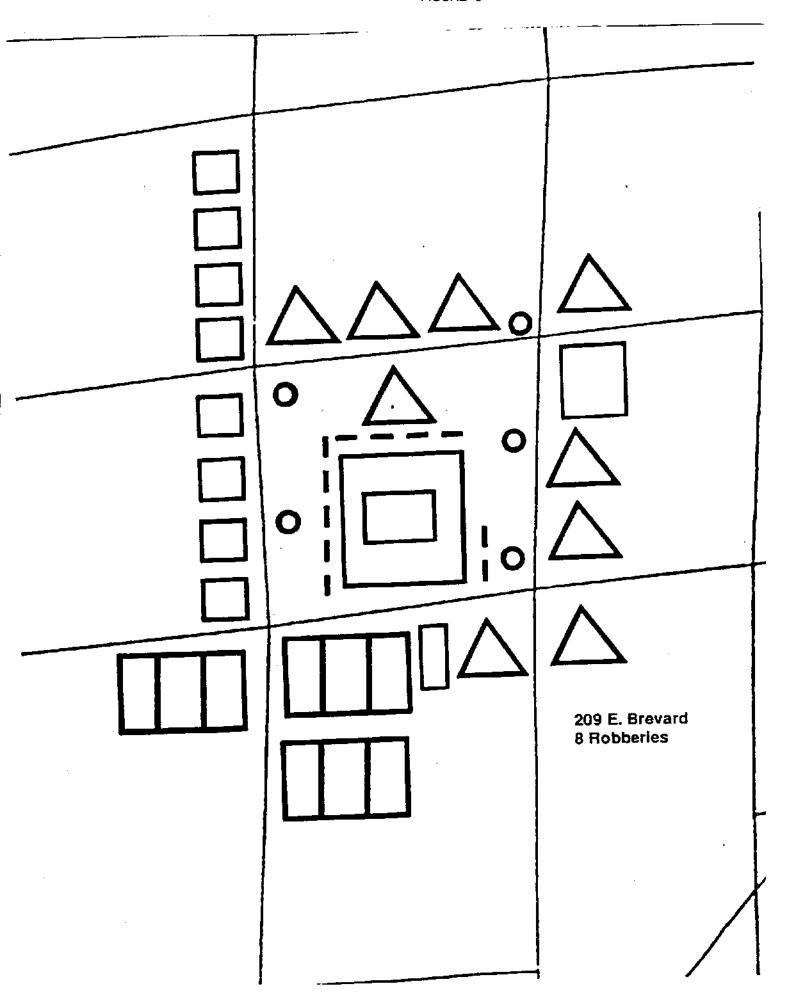
- Baldwin, J. and A.E. Bottoms (1976) The Urban Criminal. London: Tavistock.
- Brangintham, P.J. and P.L. Brantingham (1984) Patterns in Crime. New York: Macmillan.
- Brantingham, P.J. and P.L. Brantingham (1981) Environmental Criminology. Beverly Hills: Sage Publications.
- Chang, S., W.H. Simms, CM. Makres, and A. Bodnar (1979) Crime Analysis System Support. Gaithersburg, MO, International Association of Chiefs of Police.
- Clarke, R.V.G. and P. Mayhew (1980) Designing Out Crime. London: Her Majesty's Stationery Office.
 - Davidson, R.N. (1981) Crime and the Environment. London: Croom Helm.
- Georges-Abeyie, D.E. and K.E. Harries (1980) Crime: A Spatial Perspective: New York: Columbia University Press.
- Greenberg, S.W. and W.M. Rohe (1984) "Neighborhood Design and Crime." Journal of the American Planning Association. Winter, Vol. 50, No. 1.
 - Herbert, D. (1982) The Geography of Urban Crime. London: Longman.
- Jeffery, C.R. (1971, 1977) Crime Prevention Through Environmental Design. Beverly Hills: Sage Publications.
 - Newman, 0. (1972) Defensible Space. New York: Macmillan.
 - Poyner, B. (1983) Design Against Crime. London: Butterworths.
- Rubenstein, H.C., Murray, T., Motoyama and W.V. Rouse (1980) The Link Between Crime and the Built Environment. Washington, D.C.: National Institute of Justice.
- Stoks, F.G. (1981) Assessing Urban Public Space Environments for Danger of Violent Crime-Especially Rape. Ph.D. Dissertation, University of Washington, Seattle, Washington.

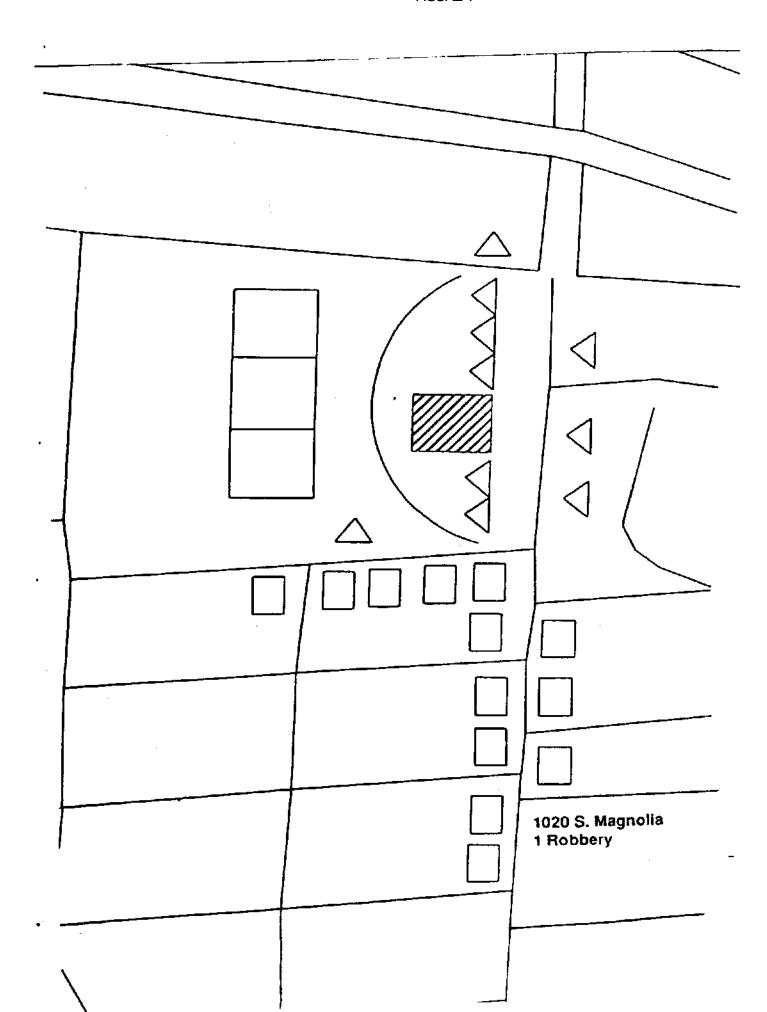
	LOW CRIME SITE
	HIGH CRIME SITE
	GAS PUMP
	WOODS AND TREES
	VACANT LOT >
	APARTMENTS AND MOTELS
	CHURCH
	DRIVEWAY OR PATH
	SINGLE FAMILY DWELLING
\triangle	COMMERCIAL BUILDING
$\overline{\wedge}$	VACANT COMMERCIAL BUILDING
	FENCE
0	LIGHTS
	PARKING GARAGE

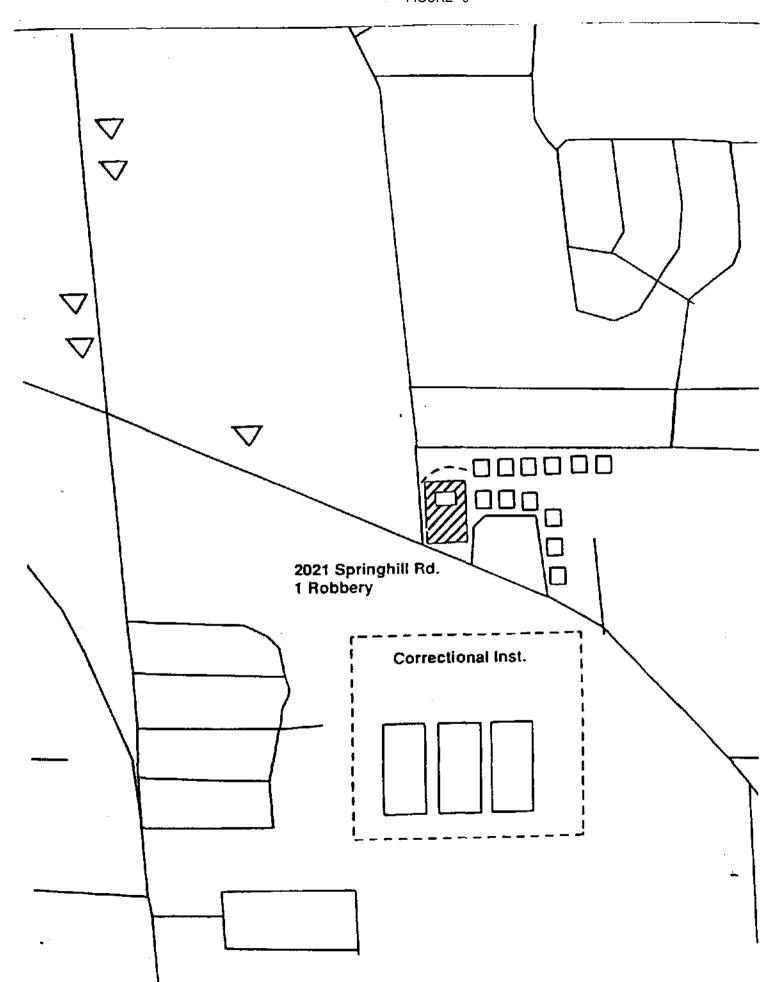


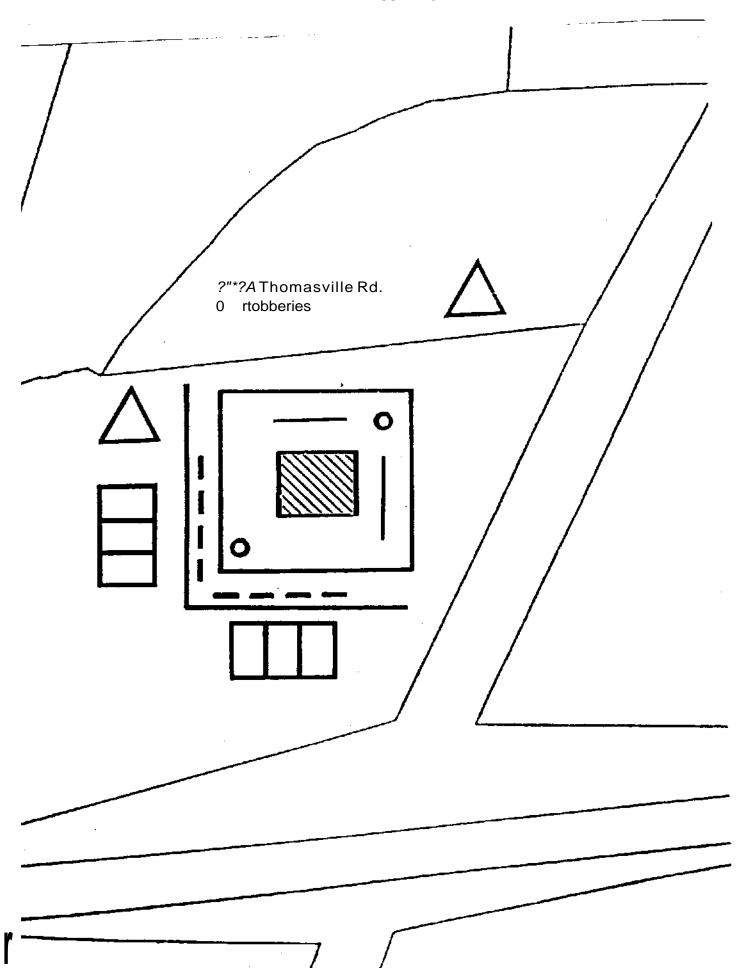


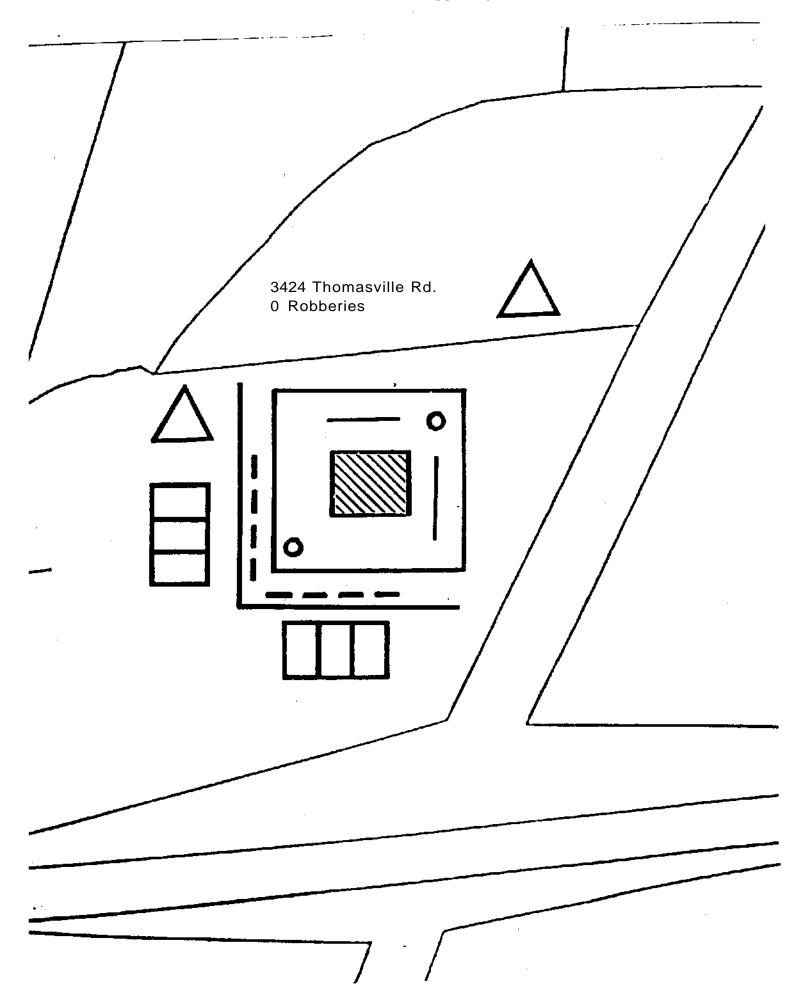


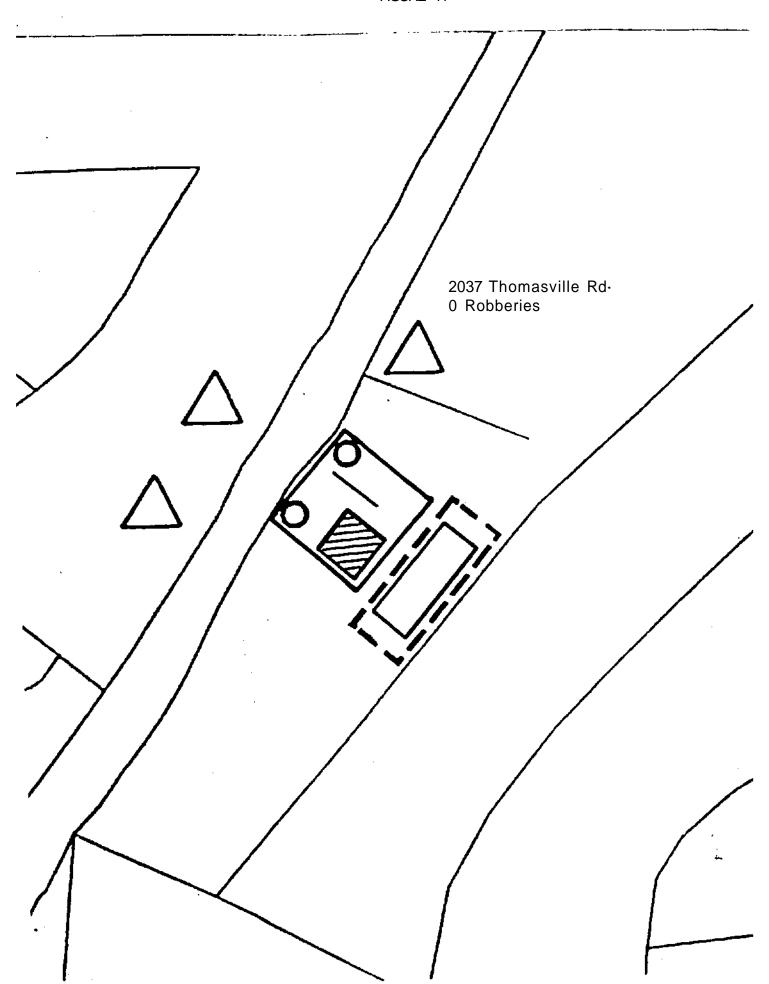












APPENDIX E

1	
2	
3	ORDINANCE NO. 3230 0-86-30
4	
5	AN ORDINANCE OF THE CITY OF GAINESVILLE,
6	FLORIDA, CREATING CHAPTER 14B OF THE CODE OF ORDINANCES ENTITLED "CONVENIENCE
7	FOOD STORES"; PROVIDING DEFINITIONS; ESTABLISHING REGULATIONS, ESTABLISHING
8	SECURITY MEASURES INCLUDING TRAINING, NUMBER OF PERSONNEL TO BE ON DUTY AND
9	LIGHTING REQUIREMENTS; F^TABLISHING A RIGHT OF ENTRY FOR INSPECTION;
10	ESTABLISHING PENALTIES; PROVIDING A SEVERABILITY CLAUSE; PROVIDING A
11	REPEALING CLAUSE; AND PROVIDING AN EFFECTIVE DATE.
12	EFFECTIVE DATE.
13	
13	WHEREAS, the number of homicides and robberies at
15	Convenience Food Stores exceeds the number of such incidents
15 1G	at other establishments between the hours of 8:00 p.m. and
15 16	4:00 a.m.;
Ι/	WHEREAS, such excess demonstrates a greater likelihood
	that such incidents will occur unless precautionary measures
19	are taken at Convenience Food Stores;
20	WHEREAS, the occurence of such incidents has resulted in
21	loss of life and loss of property and is contrary to the
22	Tobb of Tile and Tobb of Mark 10 conclud, to one
	public health, safety and welfare of the employees and
	customers of Convenience Food Stores;
25	
26	
27	CODE: Except for whole sections added or deleted as indicated in the text, words in struck-through type are deletions from existing law ; words in underscored type are

additions.

- 2 WHEREAS, the Police Department of the City of
- 3 Gainesville has provided evidence that these regulations are
- 4 necessary and provide essential requirements that will
- 5 minimize or eliminate the excessive incidents of homicide
- 6 and/or robbery at Convenience Food Stores.
- 7 NOW, THEREFORE, BE IT ORDAINED BY THE CITY COMMISSION OF
- 8 THE CITY OF GAINESVILLE, FLORIDA:
- 9 Section 1. Chapter 14B, consisting of Sections 14B-1
- 10 through 14B-3 inclusive, is hereby created and added to the
- 11 Code of Ordinances of the City of Gainesville as follows:
- 12 Chapter 14B Convenience Food stores
- sec. 14B-1. Definitions.
- 14 The following terms and phrases, when used in this
- 15 chapter, shall have the meanings ascribed to them
- in this section, except where the context clearly
- 17 indicates a different meaning:
- 18 (a) "Convenience Food Store" is a business
- 19 establishment that:
- Q) derives 50% or more of its gross income
- 21
- **22** from the sale of goods, merchandise, or
- 23
- 24 other articles of value in their original
 - containers and,
- 25 (2) offers a limited quantity and variety of
- 26 food, household and sundry items and,
- 27
- CODE: Except for whole sections added or deleted as 28 indicated in the text, words in struck-through type are deletions from existing law; words in underscored type are additions.

1 2 operates at any time during the hours of 3 8:00 p.m. and 4:00 a.m. and, 4 (4) does not sell or have for sale 5 prescription drug items. "Owner" is the person, corporation, 6 **<**b) 7 partnership, joint venture or other group 8 enterprise having lawful possession of the 9 premises upon which the Convenience Food store 10 i_s operated. 11 (c) "Employee" is person, the corporation, 12 partnership, joint venture or group enterprise 13 legally responsible for the day-to-day 1 4 operation of the Convenience Food store, 15 sec. 14B-2. Regulations. 16 All Convenience Food Stores shall comply with the following regulations. 17 There is no minimum number of employees 18 (a) 19 required during operational hours. **20** (b) Locate any signs posted windows in the SO 21 as to provide a clear and unobstructed view of 22 the cash register and sales area from the 23 street. 24

25

26

Except for whole sections added or deleted 27 indicated in the text, words in struck-thteisgh type are deletions from existing law; words in underscored type are 28 additions.

1 2 (C) Locate the sales area so that the clerk 3 and customer are fully visible from the street 4 at the time of the sales transaction. 5 Post a conspicuous sign in the window 6 which states that the cash register has \$50.00 7 less in it. or 8 \$50.00 (e) Have more than cash available no 9 and readily accessible to employees. 10 Maintain a drop-safe or time release safe 11 is at the Convenience Food Store which bolted 12 to the floor, or installed in the floor, or 13 weighs at least five hundred (500) pounds. Post a conspicuous sign in the window 14 15 which states that there is a safe at the 16 convenience store and it is not accessible to 17 the employees. 18 (h) The entire area of the Convenience Food 19 Store, utilized bу customers for parking , 20 shall be lighted and maintained at five (5) 21 foot candles per square foot. The level of 22 lighting shall be measured at the surface 23 of the parking area. 24 install a security camera of a type and (i) 25 | 26

CODE: Except for whole sections added or deleted as 27 indicated in the text, words in struc-through type are {deletions from existing law; words in underscored type are 28 additions.

2

2			numb	er app	roved	by th	ne Cit	y Mai	nager	or	his
3			desig	gnee.	Said	came	era mu	st be	capa	ble	of
4	produci	ng a	reti	rievab	le i	mage	on	film	or	t	ape
5			that	can be	e made	a pe	rmanen	t reco	ord a	nd t	hat
6			can l	oe enl	larged	throu	gh pro	ojectio	on or	ot	her
7	means.		Camera	ıs n	neeting	th	ne r	equire	ment	S	of
8	this	sectio	on s	hall	be	mai	ntaine	1	in	pro	per
9			workii	ng or	der a	t all	time	s and	d sh	all	oe
10			subj	ect to	perio	odic i	nspec	tion 1	by th	e C	City
11	Manag	ger	or	his	de	signee	e.				
12			(j) A	Any ov	vner or	empl	oyee v	who we	orks	betw	een
13			the l	nours	of 8:0	00 p.r	n. and	4:00	a.m	. a	t a
'14			Conve	nience	Food S	Store	shall	compl	ete a	cou	ırse
15			in R	obbery	prev	entior	n to l	e gi	ven 1	by	the
16			Gaine	sville	police	e De _l	partmer	nt, or	a j	prog	ram
17			certif	ied by	y the	City N	<i>M</i> anager	or h	is de	sign	ee,
18			within	90	days	afte	r he	or	she	beg	ins
19			emplo	yment.	I	f the	e Ga	inesvi	ille	Pol	ice
20	Departm	nent's	Ro	bbery	P	revent	ion	cou	ırse		is
21			utili	zed,	the C	ity M	anager	or h	is de	sign	nee
22	shall	detern	nine	the	cost	of	traiı	ning	per	-	
23	employee	to	the	City	, an	d tl	he Co	nveni	ence	F	ood
24	Store	shall	pay	the	e cos	st	to t	he	Gaine	esvi	lle
25											

26

CODE: Except for whole sections added or deleted as 27 indicated in the text, words in struck-through type are deletions from existing law; words in underscored type are 28 additions.

police Department prior to the training of the employee.

Sec. 14B-3. Penalties,

- (a) Violation of any of the above numbered sections is subject to punishment as provided in Section 1-8 of the Gainesville Code of Ordinances.
- (b) The City of Gainesville may obtain injunctive relief to restrain or prohibit violation of this.Ordinance.
- (c) The occupational tax receipt for any establishment may be revoked by the City Manager or his designee upon proof of violation of this Ordinance.

Section 2. If any section, sentence, clause or phrase of this Ordinance is held to be invalid or unconstitutional by any Court of competent jurisdiction, then said holding shall in no way affect the validity of the remaining portions of this Ordinance.

Section 3. All ordinances, or parts of ordinances, in conflict herewith are, to the extent of such conflict hereby repealed.

CODE: Except for whole sections added or deleted as indicated in the text, words in struc-through type are deletions from existing law; words in <u>underscored</u> type are additions.

1	
2	Section 4. This ordinance shall stand repealed two (2)
3	years after its effective date.
4	Section 5. This ordinance shall become effective 120
5	days from the date of final adoption.
6	DATED this 14th day of July , 1986.
7	Bosso-0., 4:00
8	MAYOR-COMMISSIONER
9	ATTEST:
10	Marit Sund to the
11	Chery of the Commission Approve is to sum and correctness
12	AEG:sd Marion 1. Madson, City Attorney 5/6/86 City of Gainesville, Florida
13	JUL 24 1986
14	This Ordinance passed on first reading this 19th day of
15:	
15	<u>May</u> , 1986.
16	May , 1986. This Ordinance passed on second and final reading this
	· · · · · · · · · · · · · · · · · · ·
16	This Ordinance passed on second and final reading this
16 17 18 19	This Ordinance passed on second and final reading this
16 17 18 19 20	This Ordinance passed on second and final reading this
16 17 18 19 20 21	This Ordinance passed on second and final reading this
16 17 18 19 20 21 22	This Ordinance passed on second and final reading this
16 17 18 19 20 21 22 23	This Ordinance passed on second and final reading this
16 17 18 19 20 21 22 23 24	This Ordinance passed on second and final reading this
16 17 18 19 20 21 22 23	This Ordinance passed on second and final reading this
16 17 18 19 20 21 22 23 24	This Ordinance passed on second and final reading this 14th day of
16 17 18 19 20 21 22 23 24 25	This Ordinance passed on second and final reading this

RESOLUTION NO. R-86-48

PASSED J*ly I*. 1986

A RESOLUTION OF THE CITY OF GAINESVILLE, FLORIDA, ESTABLISHING A "CONVENIENCE STORE OPERATIONS" ADVISORY BOARD; AND PROVIDING AN EFFECTIVE DATE.

WHEREAS, the City -commission of the City of Gainesville is committed to highlight the image of the City of Gainesville as a safe Community; and

WHEREAS, the City Commission is committed to protect the health, safety $_{\rm r}$ and welfare of the employees and customers of convenience food stores; and

WHEREAS, the City Commission desires to establish a Convenience Store Operations Advisory Board to provide tangible, reasonable, and effective solutions that will minimize or eliminate the excessive incidence of robbery, battery, and other related crime at convenience food stores; and

WHEREAS, the City Commission wishes to provide an opportunity for representatives of the food industry and members of the Police Department to work together in a team effort to provide the highest deterrene to reduce crime related incidents at convenience food stores;

NOW, THEREFORE, BE IT RESOLVED BY THE CITY

COMMISSION OF THE CITY OF GAINESVILLE, FLORIDA, AS FOLLOWS:

Section 1. There is hereby created and established a Convenience Food Operations Advisory Board (the "Board") which shall be advisory to the City Manager.

Section 2. The Board shall consist of eight (8) members appointed by the City Manager who shall in like manner fill all vacancies and unexpired terms. Each member shall be appointed for a term of one year ending August 1.

Section 3. The Composition of the members of the Board shall be as follows and each member shall serve without pay:

- One representative of the Retail Grocers

 Association.
- . - Two representatives of Major Chain Operations.
 - Two representatives of Independent Operations.
 - One representative of the Gainesville Area Chamber of Commerce.
 - One citizen representative.
 - Chief of Police.

Section 4. The purpose of the Board shall be to advise the City Manager concerning incidents related to

homicide and/or robbery at convenience food stores, and which shall have the following initial charges:

- to measure the effectiveness of the security measures outlined in the convenience food stores ordinance.
- to develop a team effort between the Police

 Department and the convenience store industry.
- to examine special precautions which must be taken if a convenience store is robbed within a five year time period.
- to create innovative methods for the reduction of crime within the convenience store industry.

Section 5. The Board shall have the authority to adopt rules, as approved by the City Manager, for the transaction of its -business which provides for the time and place of regular meetings and calling of special meetings.

Section 6. The Board shall meet at least once each quarter and file, in writing, at least annually a report of its activities to the City Manager.

Section 7. Clerical and office service support for the Board will be provided by the City of Gainesville through a department designated by the City Manager.

i	Section 8.	This	resolution	shall	become	effective
immed	iately upon	passag	e.			
	DATED this _	<u>14t</u> hd	ay of	<u>July</u>		, 1986.
			B	موه	rele	DieH
			MAYO	R -C OMMI	SSIONER	2
ATTEST	Γ:					
Max	11 Suint		Polk Tolk			
CLERK	OF THE COMM	ISSION	unger!			

Approved as to form and correctness
By Agriculture Approved as to form and correctness
Marion J. Radson, City Aftorney
City of Gainesville, Florida

JJL 24 1986

RESOLUTION NO. R-86-49

PASSED July 14, 1986

A RESOLUTION OF THE CITY OF GAINESVILLE, FLORIDA, ESTABLISHING A POLICY THAT WOULD CREATE AN ORDINANCE REQUIRING TWO (2) EMPLOYEES IN A CONVENIENCE FOOD STORE DURING CERTAIN HOURS IF CERTAIN CONDITIONS ARE NOT MET; AND PROVIDING AN EFFECTIVE "SATE"

WHEREAS, the number of horacides and robberies at Convenience Food Stores exceeds the number of such incidents at other establishments between the hours of 8:00 p.m. and 4:00 a.m.; and

WHEREAS, such excess demonstrates greater likelihood incidents that such will occur unless precautionary measures are taken Convenience at Food Stores: and

WHEREAS, the occurrence of such incidents has resulted in loss of life and loss of property and is contrary to the public health, safety and welfare of the employees and customers of Convenience Food Stores; and

WHEREAS, the Police Department of the City of Gainesville has provided evidence that two (2) employees on duty between the hours of 8:00 p.m. and 4:00 a.m. would provide an essential requirement that would minimize or

eliminate the excessive incidents of homicide and/or robbery at Convenience Food Stores.

WHEREAS, the Gainesville City Commission wishes to allow representatives of the food store industry an opportunity to examine and to provide innovative methods to the Commission that will minimize or eliminate the excessive incidence of robbery, battery, and related crimes at convenience food stores.

NOW, THEREFORE, BE IT RESOLVED BY THE CITY COMMISSION OF THE CITY OF GAINESVILLE, FLORIDA, AS FOLLOWS:

Section 1. It is the intent of the City Commission that Convenience Food Stores, as defined in Ordinance No. 0-86-30, will be required, by a future ordinance, to have minimum of two (2) duty within persons on the Convenience Food Store between the operational hours of 8:00 p.m. and 4:00 a.m., unless there is a City wide decrease in the number of convenience food store robberies by at least 50% within 240 days of the date that Ordinance No. 0-86-30 is passed on second and final reading. purposes of this Resolution, the 50% decrease in robberies will be based upon a comparison of the number of robberies occurring in the 240 day period immediately preceeding the passage of Ordinance No. 0-86-30 with the number of robberies occurring in the 240 day period following the second and final reading of Ordinance No. 0-86-30.

Section 2. This resolution shall become effective immediately upon adoption.

Section 3. The Clerk of the Commission is directed to send certified copies of Ordinance No. 0-86-30, Resolution R-86-48 and R-86-49 to every Convenience Store Operator in the City of Gainesville, Florida.

Passed this 14th day of July, 1986.

MAYOR-COMMISSIONER

ATTEST:

DERV OF THE COMMISSION

Marion J. Radson, City Attorney

Cit« cf Gainesville; Florida

. JUL 24 1986

28

ANORDINANCE OF THE CITY OF GAINESVILLE, FLORIDA, RELATING TO CONVENIENCE STORES; AMENDING FOOD SECTION 14B-2(h)OF $_{
m THE}$ CODE OF ORDINANCES OF THECITY OF GAINESVILLE, BYCHANGING THE LIGHTING REQUIREMENTS FOR THE PARKING AREA UTILIZED BY CUSTOMERS; SEVERABILITY PROVIDING Α CLAUSE; PROVIDING A REPEALING CLAUSE; AND PROVIDING AN IMMEDIATE **EFFECTIVE** DATE.

WHEREAS, at least ten (10) days notice has been given once in a newspaper of general circulation notifying the public of this proposed ordinance and of a Public Hearing in the A, Clarence O'Neill Auditorium of the Municipal Building of the City of Gainesville.

NOW, THEREFORE, BE IT ORDAINED BY THE CITY COMMISSION OF THE CITY OF GAINESVILLE, FLORIDA:

Section 1. Subsection (h) of Section 14B-2 of the Code of Ordinances of the City of Gainesville, is amended to read:

Sec. 14B-2. Regulations.

- All Convenience Food Stores shall comply with the following regulations
- (h) The entire area the Convenience Food Store, utilized by customers parking shall be lighted and maintained at five (5) candles per square feet. level of lighting shall be measured at the surface of the parking parking lot areas by customers of the utilized

CODING: Words stricken are deletions; words underlined are additions.

Convenien				must_	be
lighted_				ours	of
darkness					
customers	are	on the	pre	nises	as
follows:					

- (1) Minimum average maintained illuminance must be two (2) foot candles or greater with a uniformity ratio (average to minimum) of no more than 5:1.
- (2) Additionally, all such lighting shall be in accordance with the applicable City lighting code requirements.

Section 2. If any section, sentence, clause or phrase of this ordinance is held to be invalid or unconstitutional by any court of competent jurisdiction, then said holding shall in no way affect the validity of the remaining portions of this ordinance.

Section 3. All ordinances, or parts of ordinances, in conflict herewith are to the extent of such conflict "hereby repealed.

Section 4. This ordinance shall stand repealed on July 15, 1988.

Section 5. This ordinance shall become effective 120 days from the date of final adoption.

	Ordinance 0-86-127 (3308)
1	DATED this <u>15th</u> day of <u>December</u> , 198 <u>6</u>
2	
3	MAYOR-COMMISSIONER
4	ATTEST:
5	$\parallel \cdot \parallel \sim 1 2 2 2 2 2 2 2 2 2 $
6	CLEDWIOE THE COMMISSION
7	
8	MJR:nmh 11/11/86
9	This ordinance passed on first reading this 8th day
10	of <u>December</u> , 198 <u>6</u> .
11	This ordinance passed on second and final reading this
12	
13	
14	Approved fis to form and correctness
15	Marion ^KJtadsbnrXity Attorney
16	City of GainesvilK Florida OEC 16 1986
17	OEC 1.0 1900
18	
19	
20	
21	
22	•
23	
24	
25	
26	

ORDINANCE NO. 3318 0-87-06

ORDINANCE THE OF GAINESVILLE, FLORIDA RELATING TO STORES; CONVENIENCE FOOD AMENDING SECTION 14B-2 (a); TO REQUIRE THAT **EMPLOYEES** $_{
m BE}$ onDUTY CERTAIN OPERATIONAL HOURS ΙN CONVENIENCE FOOD STORES; AMENDING SECTION 14B-2(J)TO REQUIRE CONVENIENCE FOOD STORE EMPLOYEES WHO WORK BETWEEN THE HOURS OF 7:00 P.M. AND 5:00 A.M. TO COMPLETE A COURSE IN ROBBERY PREVENTION WITHIN THIRTY (30) DAYS OF EMPLOYMENT; PROVIDING A SEVERABILITY CLAUSE; PROVIDING REPEALING CLAUSE; AND PROVIDING AN EFFECTIVE DATE.

WHEREAS, the number of homicides and robberies at Convenience Food Stores exceeds the number of such incidents at other establishments between the hours of 7:00 p.m. and 5:00 a.m.;

WHEREAS, such excess demonstrates greater likelihood that incidents will unless such occur precautionary measures are taken Convenience at Stores; and

WHEREAS, the occurrence of such incidents has resulted in loss of life and loss of property and is contrary to the public health, safety and welfare of the employees and customers of Convenience Food Stores; and

WHEREAS, the Police Department of the City of Gainesville has provided evidence that two (2) employees on duty between the hours of 8:00 p.m. and 4:00 a.m. would provide an essential requirement that would minimize or CODING: Words stttefcen are deletions; words underlined are additions.

eliminate the excessive incidents of homicide and/or robbery at Convenience Food Stores.

NOW, THEREFORE, BE IT ORDAINED BY THE CITY COMMISSION OF THE CITY OF GAINESVILLE, FLORIDA:

Section 1. Subsections (a) and (j) section 14B-2 (a) of the Code of Ordinances of the City of Gainesville, Florida, are amended to read:

"Sec. 14B-2 Regulations.

All Convenience Food Stores shall comply with the following regulations.

- (a) 5here is no minimem number ©f employees repaired daring operational howrsT If open for business after 8:00 p.m., the Convenience Food Store must employ two persons who are continuously on duty on the premises from 8:00 p.m. until closing or 4:00 a.m. whichever event occurs first.
- (j) Any owner or employee who works between the hours of Bt-66 PTIBT ana" 4*69 a-m-r 7:00 p.m. and 5:00 a.m. at a Convenience Food Store shall complete a course in Robbery Prevention to be given by the Gainesville Police Department, or a program certified by the City Manager or his designee, within 96 30 days after he or she begins employment. If the Gainesville Police

CODING: Words stricken are deletions; words underlined are additions.

Department's Robbery Prevention is course utilized, the City Manager or his designee shall determine the cost of training per employee to the City, and the Convenience Food Store shall Gainesville pay the cost to the Police Department prior to the training of the employee."

Section 2. The two employees required pursuant to subsection (a) of Sec. 14 B-2 of Section 2 of this Ordinance must be employed and trained on or before the effective date of this ordinance as provided in Section 7 below.

Section 3. If any portion of this ordinance is declared by a court of competent jurisdiction to be invalid or unenforceable, such declaration shall not be deemed to effect the remaining portions of this ordinance.

Section 4. All ordinances, or parts of ordinances, in conflict herewith are to the extent of such conflict hereby repealed.

Section 5. This ordinance shall stand repealed on November 11, 1988.

Section 6. This ordinance shall be effective 60 days from the date of final adoption,

CODING: Words attieken are deletions; words <u>underlined</u> are additions.

0-87-06 (3318)

DATED this 2nd day of February , 1987.

MAYOR-COMMISSIONER HILL

ATTEST:

CLERK f.1F THE COMMISSION

AEG:kb

Approve Storm 614 correctness

By
Marion HWSbn, City Attorney
City of Gainesvilk Florida

FEB 4 1987

This ordinance passe'd on first reading this 26th day of January, 1987.

This ordinance passed on second and final reading this 2nd day of February, 1987.