Bureau of Economic and Business Research

ANALYSIS OF RETAIL TRADE IN THE CAPE KENNEDY AREA

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Ralph H. Blodgett N66-12174 FACILITY FORM 602 (ACCESSION NUMBER) (THRU) JCOD (NASA CR CATEGO

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## RETAIL TRADE

Changes in retail sales, the number of retail establishments, and the number of paid retail employees, along with changes in receipts and the number of persons employed in the service trades, are an important part of the economic development of any region. In analyzing retail sales and the receipts of the service trades, however, we encounter a problem which is not present in population studies. The unit of measurement in population studies (the person) can be taken to have a constant value, but the unit of measurement in studies of retail trade and receipts of the service trades (the dollar) has a value which fluctuates considerably through time. It is necessary, therefore, to analyze retail sales and receipts of the service trades primarily on a relative basis.

# Retail Trade - Total Sales

Total retail sales in the seven-county region under study amounted to 11.89 per cent of those of the State of Florida in 1939. This figure may be compared at least roughly with the 10.99 per cent of the state's population which the region had in 1940. In the fifteen years from 1939 to 1954, the retail sales of the region increased at a somewhat slower rate than those of the state so that, in 1954, the region had 11.45 per cent of the retail sales of the whole state as compared with 11.56 per cent of the state's population. The increase in the retail sales of the region amounted to 11.37 per cent of the increase in the retail sales of the state over the fifteen years. Changes in the total retail sales of the region were much more striking in the nine years from 1954 to 1963, with the development of the NASA program. The retail sales of the region increased by 15.19 per cent a year, as compared with 9.95 per cent for the state, or more than half again as fast. Moreover, the retail sales of the region increased from 11.45 per cent of the state total in 1954 to 14.30 per cent ... in 1963 and in the latter year the region's share of the state's retail trade exceeded its share of the state's population (13.65 per cent). Over the nine years, the region contributed 17.47 per cent of the increase in the retail sales of the state.

The annual rate of increase of 15.19 per cent in retail sales which the region achieved from 1954 to 1963 was considerably higher than the annual rate of increase of population of 9.85 per cent in the region. Tourists and other persons temporarily in the area may have played some part in increasing retail sales rapidly, but there is also a strong implication that per capita personal incomes in the region increased sharply during the period. This matter will be taken up in a later section of the study of the Cape Kennedy region.

As in the case of population increases, the gains in retail sales were not at all evenly distributed among the seven counties from 1954 to 1963. Brevard County was the big winner. Its retail sales increased by 51.75 per cent a year on the average from 1954 to 1963. Four other counties had annual rates of increase, varying from 11.45 to 14.99 per cent a year, which were in excess of the annual rate of

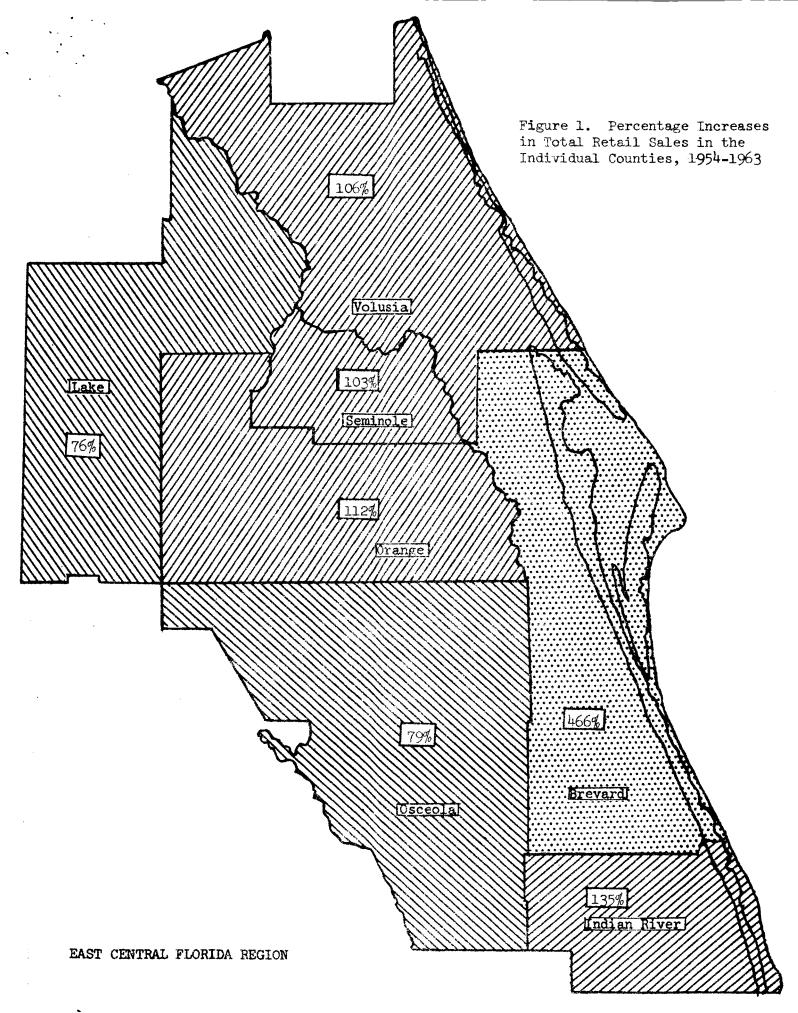
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increase of 9.95 per cent achieved by the State of Florida. Only Lake and Osceola counties gained retail sales at a slower rate than the state.

In 1954, Brevard County had 10.64 per cent of the region's population but only 8.49 per cent of its retail sales. However, by 1963 the county had 19.54 per cent of the region's population and 20.30 per cent of its retail sales. As might be expected from this, all of the other six counties had smaller proportions of the total retail sales of the region in 1963 than in 1954, but Orange and Volusia Counties continued, as in the past, to have higher percentages of the retail sales of the region than of its population. It is also noteworthy that all counties in the region had higher average annual rates of increase in retail sales than in population from 1954 to 1963. Details concerning the relative proportions of county retail sales and population to regional totals are shown in Table 1. Figure 1 indicates the total increases in retail sales which the various counties in the region experienced from 1954 to 1963.

	ru	PULATION TO 1954	REGIONAL	TOTALS 1958	1	963
County	Retail Sales (%)	Population (%)	Retail Sales (%)	Population (%)	Retail Sales (%)	Estimated Population (%)
Brevard Indian River Lake Orange Osceola Seminole Volusia	8.49 4.06 9.38 46.84 2.82 5.11 23.29	10.64 3.62 10.74 42.03 3.22 8.27 21.46	13.83 4.01 8.47 44.57 2.25 4.25 22.62	15.49 4.11 8.80 42.30 2.75 8.26 18.29	20.30 4.03 6.97 41.95 2.13 4.38 20.23	19.54 4.03 8.17 38.46 2.72 8.70 18.38
Dettie of	99•99	99•98	100.00	100.00	99.99	100.00
Ratio of Region to State	11.45	11.56	12,66	12.98	14.30	13.65

TABLE 1. - RELATIVE PROPORTIONS OF COUNTY RETAIL SALES AND BODULATION TO RECIONAL TOTALS



In making projections of retail sales for 1965, 1970, and 1975, the first task was to project the total retail sales of the United States as a whole. This proved to be a rather simple undertaking, for the trend in the retail sales of the whole country seemed obvious and consistent, although there is no certainty, of course, that the past trend will actually continue to be followed in the future.

While we were awaiting the appearance of census data covering retail sales in 1963, retail sales for the State of Florida were projected to 1963 on the basis of past average annual changes in dollar volume, average percentage increases, changing percentage increases in different short periods, and the changing ratio of Florida retail sales to those of the country as a whole. Later, we compared the figure from the Census of Business for 1963 with the various projections of retail sales in order to determine which method of projection had given the answer which was closest to the official figure.

The method of projection which produced the estimate closest to the census figure for Florida retail sales in 1963 was the one based simply on average annual increases in total dollar volume. The projection called for retail sales of \$7,641,059,000 and the census figure was \$7,609,717,000. The error in the projection amounted to 0.41% of the census figure. It was decided, therefore, to use this method in making projections for future years on the basis of experience to 1963. The resulting projections of total retail sales for the State of Florida amount to \$8,408,700,000 for 1965, \$10,406,100,000 for 1970, and \$12,403,400,000 for 1975. These projections were, of course, checked

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for reasonableness against the population projections for the state which had already been made.

In making projections of retail sales for the seven-county region to 1963, it was possible to use all of the methods mentioned above. In addition, projections were made on the basis of the changing ratio of regional retail sales to those of the state as a whole and, as a check, on the basis of population projections for future years. It was found that the projection based on the changing ratio of regional retail sales to those of the state as a whole came out rather close to the regional total derived from the Census of Business data for 1963, and this method was used in making further projections.

Starting from a total of \$1,087,864,000 in 1963, the projections came to \$1,255,300,000 for 1965, \$1,718,200,000 for 1970, and \$2,244,000,000 for 1975. If these projections should work out in practice, the region would have 14.93 per cent of the total retail sales of the state in 1965, 16.51 per cent in 1970, and 18.09 per cent in 1975. These percentages may be compared with 14.18 to 14.66 per cent of the state's total population in 1965, 14.93 to 15.79 per cent in 1970, and 15.78 to 17.08 per cent in 1975.

With regional projections of retail sales in hand, there remained the task of projecting the retail sales of the individual counties in the region. This was attempted for 1963 in the usual ways on the basis of the past experiences of the individual counties without relation to those of other areas, and also on the basis of the changing ratios of county retail sales to those of the region, the state, and the country as a whole. In the end, when census data for 1963 became available, it

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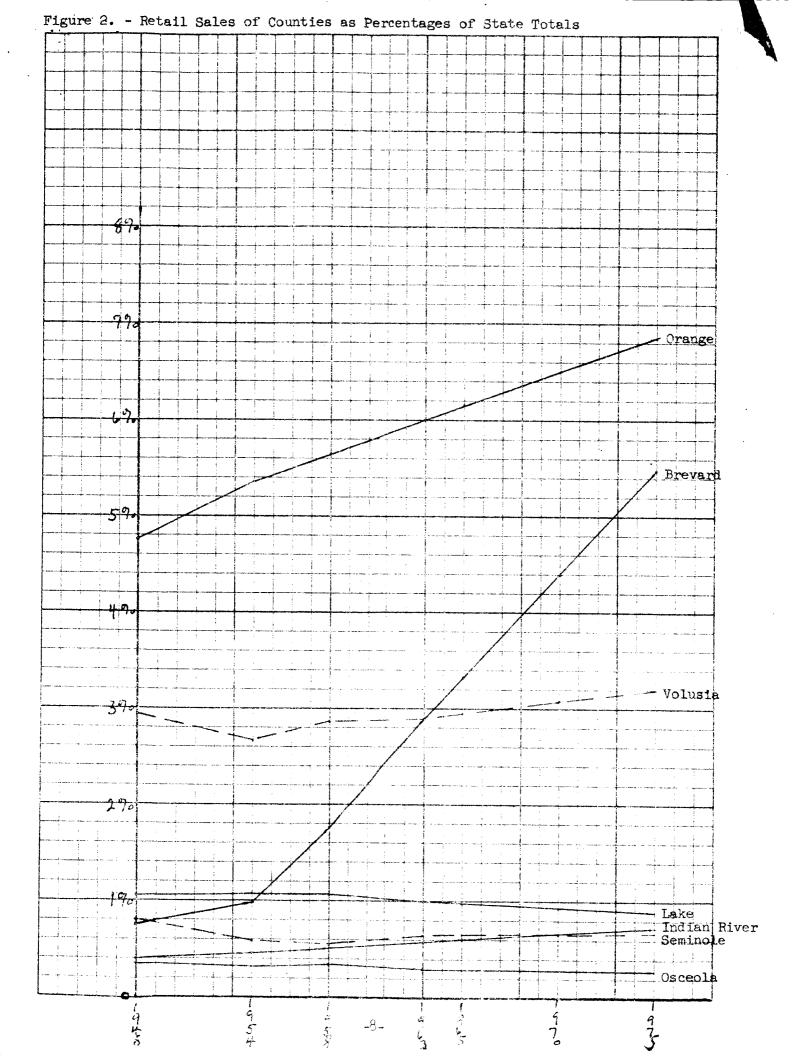
### Retail Trade

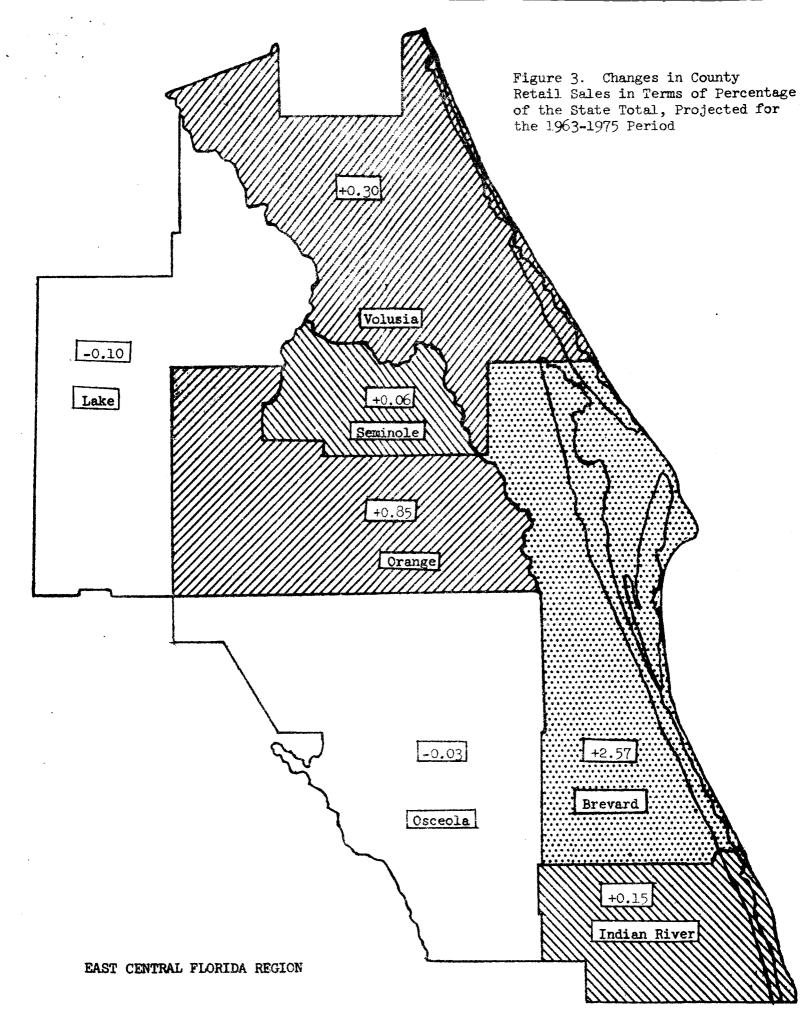
was decided that the changing ratios of county retail sales to those of the state as a whole provided the most satisfactory basis for making projections, and this method was used in arriving at projections for 1965, 1970, and 1975.

The resulting projections, along with the actual county data for 1963, are shown in Table 2. It should be understood that we are not predicting that these things will actually happen. The figures are merely projections based on past trends. It should also be understood that the figures are stated in terms of dollars which it is presumed will have the same value or purchasing power as at present, and that we are assuming the continuation and some further development of the NASA program and other federal programs in the region. Figure 2 shows the retail sales of the individual counties as percentages of the state totals in 1948, 1954, 1958, and 1963, and the projected percentages for 1965, 1970, and 1975. Figure 3 presents the changes in county retail sales, in terms of percentages of the state total, which would be expected to occur from 1963 to 1975.

			1965, 1970, AND	
County	Actual Data 1963 (000)	1965 (000)	1970 (000)	1975 (000)
Brevard	\$ 220,837	\$ 280,100	\$ 458,200	\$ 679,100
Indian River	43,838	50,500	69,000	89,900
Lake	75,875	82,400	97,500	110,900
Orange	456,395	516,200	675,500	848,800
Osceola	23,183	25,300	30,200	34,700
Seminole	47,640	53,400	68,500	84,500
Volusia	220,096	247,400	319,300	396,100
Region	\$1,087,864	\$1,255,300	\$ 1,718,200	\$ 2,244,000
State	7,609,717	8,408,700	10,406,100	12,403,400

TABLE 2. - TOTAL RETAIL SALES OF INDIVIDUAL COUNTIES, THE SEVEN-COUNTY REGION, AND THE STATE OF FLORIDA IN 1963,





## Retail Sales by Types of Establishments

Table 3 shows the distribution of retail sales by types of establishments for the seven-county region and the State of Florida in 1954, 1958, and 1963. The figures do not show any striking differences between the region and the state. Percentages of retail sales achieved by food stores and drug and proprietary stores run just about the same over these years for both the region and the state. The region runs persistently higher than the state in the percentages of retail sales made through dealers in lumber, building materials, hardware, and farm equipment and through the unclassified retail stores. On the other hand,

TABLE 3. - DISTRIBUTION OF RETAIL SALES BY TYPES OF ESTABLISHMENTS IN THE SEVEN-COUNTY REGION AND THE STATE OF FLORIDA,

	195	4, 1958,	AND 196			
	19	954	19	958	19	63
Type of Establishment	Region	State	Region	State	Region	State
	%	%	%	%	<u>%</u>	%
				•		
Food Stores	22.06	22.74	23.79	23.38	23.72	23.85
Eating & Drinking Places	8.06	8.81	6.56	7.88	6.65	7.52
Gen. Merchandise Stores	7.71	8.61	8.19	9.57	11.39	11.66
Apparel, Accessories						
Stores	5.75	7.17	5.12	6.36	4.01	5.20
Furniture, Home Furnish-						
ings, Appliances Stores	5.46	5.50	5.20	5.60	4.44	4.70
Automotive Dealers	18.22	19.42	18.87	18.72	22.17	21.26
Gasoline Service Stations	8.15	6.69	7.70	7.31	7.97	7.96
Lumber, Building Materials,						
Hardware, Farm Equip.	-					
Dealers	8.21	7.64	8.75	7.03	5.55	4.39
Drug & Proprietary Stores	3.57	3.47	3.74	3.77	3.69	3.76
Other Retail Stores*	12.80	9.94	12.07	10.38	10.40	9.69
	99.99	99.99	99.99	100.00	99.99	99.99

\*Stores selling alcoholic beverages; antiques; second-hand goods; books; stationery; sporting goods; bicycles; hay, grain, and feed; other farm supplies; garden supplies; jewelry; coal and wood; fuel oil; liquified petroleum gas; ice; flowers and plants; tobacco products; newspapers and magazines; cameras and supplies; gifts, novelties and souvenirs; optical goods; typewriters; luggage and leather goods; toys, games and hobby kits; religious goods; and pets. the region comes out steadily but not greatly below the state in the percentages of retail sales made by eating and drinking places, apparel and accessories stores, and stores selling furniture, home furnishings, and appliances. In sales of general merchandise stores, the region came from well below the state in 1954 to about the same percentage in 1963. In the sales of gasoline service stations, the region fell from well above the state to about the same percentage. Finally, in sales of automotive dealers, the region moved from below the state in 1954 to above the state in 1963.

Within the seven-county region itself, considerable changes occurred in the distribution of retail sales by types of establishments between 1954 and 1963. The percentages of total retail sales made through food stores, general merchandise stores, and automotive dealers increased significantly, whereas the reverse was true of percentages of total retail sales made through eating and drinking places, apparel and accessories stores, stores selling furniture, home furnishings, and appliances, unclassified retail stores, and dealers in lumber, building materials, hardware, and farm equipment. However, it does not seem likely that these changes were closely connected with the development of the NASA program in the region, for the increases and decreases merely paralleled changes which occurred in the distribution of retail sales in the state as a whole.

The individual counties, as usual, do not all conform to the pattern of the region but show considerable variation in their distributions of retail sales by types of establishments. Retail sales through food stores in 1963 varied from 34.32 per cent of total sales in Seminole County to 22.06 per cent in Orange County. Sales through eating and drinking places

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ran between 8.9 per cent in Volusia and 4.49 per cent in Osceola. Sales by general merchandise stores were 13.96 per cent in Orange but only 3.92 per cent in Osceola. Sales of apparel and accessories stores ran from 4.84 in Volusia to 2.29 per cent in Seminole.

The stores selling furniture, home furnishings, and appliances captured 7.14 per cent of total retail sales in Osceola but only 2.92 per cent in Lake. Sales by automotive dealers ran from 23.51 per cent in Lake to 17.44 per cent in Seminole. Dealers in lumber, building materials, hardware, and farm equipment obtained 6.85 per cent of total retail sales in Osceola but only 4.56 per cent in Volusia. Sales through gasoline service stations varied between 12.70 per cent in Osceola and 6.24 per cent in Orange. Finally, sales by drug and proprietary stores varied only between 3.93 per cent in Seminole and 3.25 per cent in Indian River.

Amid all this variation from county to county, certain clear-cut and predictable patterns tend to emerge. The more populous counties (Orange, Volusia, and Brevard) tend to run high in the percentages of total sales made through general merchandise stores (including department stores, of course), apparel and accessories stores, and stores selling furniture, home furnishings, and appliances. This probably indicates that retail customers are likely to travel to Orlando or some other center of population in shopping for goods sold by these types of stores. On the other hand, these counties tend to rank low and the less populous counties tend to rank high in connection with percentages

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of total retail sales made through food stores, gasoline service stations, and drug and proprietary stores. People do not usually travel long distances to buy food, gasoline, and drugs.

Percentages of total retail sales made by eating and drinking places are high in the coastal counties of Indian River, Brevard, and Volusia, and low in the inland counties. This may be connected with a relatively greater flow of tourists through the coastal counties. There does not seem to be any clearly definable inter-county pattern in connection with the percentages of retail sales made through automotive dealers or dealers in lumber, building materials, hardware, and farm equipment.

#### Retail Trade - Numbers of Establishments

The number of establishments engaged in retail trade has grown much more slowly than total retail sales over the years in both the sevencounty region and the State of Florida. From 1939 to 1954 the number of retail establishments in the region increased by 2.34 per cent a year on the average, as compared with 2.96 per cent a year for the state as a whole. As a result, the region's share of the state's total retail establishments declined from 13.54 per cent in 1939 to 12.67 per cent in 1954. Over the fifteen-year period, the region was responsible for 11.12 per cent of the increase in the total number of retail establishments in the state as a whole.

The number of retail establishments increased more rapidly from 1954 to 1963 than from 1939 to 1954 in both the region and the state. In this

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period, however, the average annual rate of increase was 4.46 per cent for the region and only 3.23 per cent for the state, so that, by 1963, the region had 13.76 per cent of all the retail establishments in the state. Moreover, the region was responsible for 17.53 per cent of the increase in the total number of retail establishments in the state as a whole during the period. On the other hand, the number of retail establishments increased much less rapidly than either population or total retail sales in both the region and the state.

Growth in the number of retail establishments was stimulated far more in Brevard County than in any other in the region by the development of the NASA program from 1954 to 1963. After having had an annual rate of growth of only 2.07 per cent on the average from 1939 to 1954, the number of retail establishments increased by 14.64 per cent a year on the average from 1954 to 1963. This latter rate was far above those for the region and the state in the same period, although it was only about half as great as Brevard County's rate of population growth. One other county, Indian River with 6.28 per cent, had an average annual rate of growth which was above those for both the region and the state. This was one of the two counties which followed Brevard in connection with population growth.

Seminole and Orange Counties, at 4.23 and 4.18 per cent a year, had annual average rates of increase in the number of retail establishments which were above that for the state as a whole but below the rate for the region. Lake, Osceola, and Volusia Counties had average annual

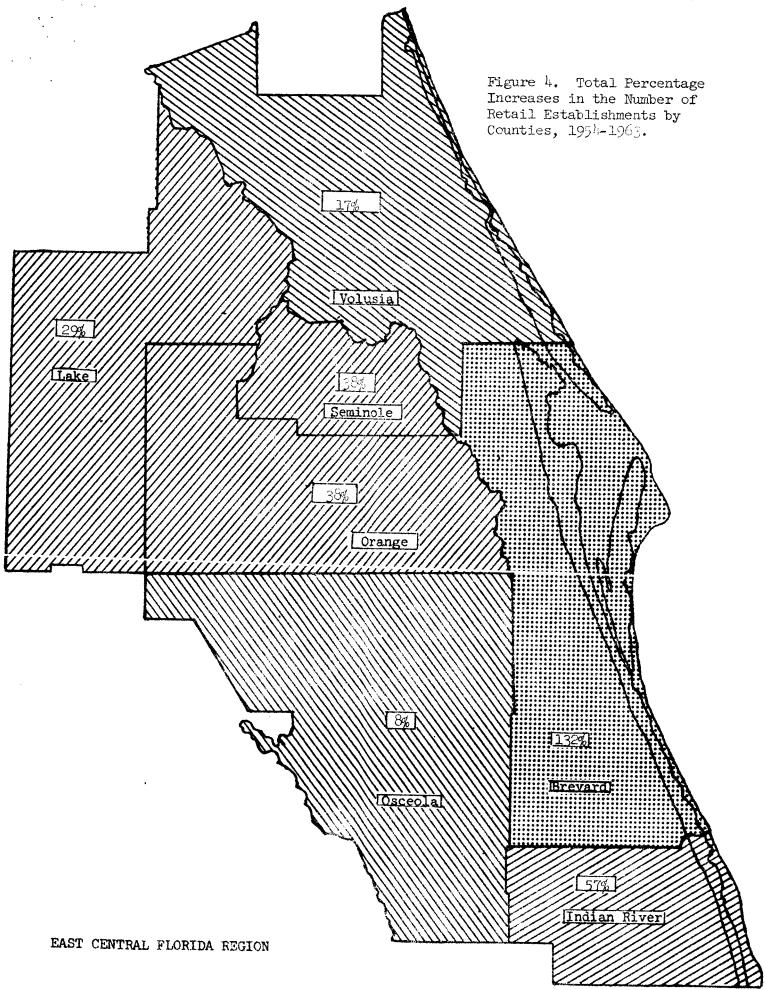
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rates of growth which were below both that for the region and that for the state as a whole. No county in the region had as rapid a rate of increase in the number of retail establishments as in population, and in all but one case the disparities in the rates of growth were enormous.

The number of retail establishments in Brevard County increased from 10.24 per cent of the regional total in 1954 to 16.93 per cent in 1963. Indian River showed a slight gain from 4.22 to 4.72 per cent of the regional total, while Seminole experienced a slight decline from 6.42 to 6.33 per cent. Lake fell from 11.31 to 10.37 per cent, Orange from 36.23 to 35.58 per cent, Osceola from 4.13 to 3.19 per cent, and Volusia all the way from 27.44 to 22.88 per cent. The indications are, then, that the growth in the number of retail establishments in the period from 1954 to 1963 was stimulated primarily in Brevard County and to a much smaller degree in Indian River County. Figure 4 shows the total percentage increases in the number of retail establishments which occurred in the individual counties from 1954 to 1963.

Inasmuch as average annual rates of increase have been much smaller for numbers of retail establishments than for total retail sales in all counties in the region, it follows that sales per establishment have been increasing considerably in all counties. Details with regard to this matter are shown in Table 4. Once more it is clear that the most striking change occurred in Brevard County, where sales per retail establishment were about 2 1/2 times as great in 1963 as in 1954.

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	BY COUNTIES,	1954, 1958, AND 1963	
	Sales per	Sales per	Sales per
County	Establishment	Establishment	Establishment
	1954	1958	1963
Brevard	\$ 72,820	\$ 121,600	\$ 177,800
Indian River	84,430	102,200	126,700
Lake	72,850	88,200	99,700
Orange	113,550	145,400	174,900
Osceola	60,110	82,000	99,100
Seminole	69,840	75,900	102,700
Volusia	74,540	101,600	131,200

TABLE 4. - TOTAL RETAIL SALES PER RETAIL ESTABLISHMENT,

In making projections for future years in connection with numbers of retail establishments, it was not much of a problem to deal with the United States as a whole, for increases in the total number of establishments have been both small and regular. Projections for the State of Florida were made on all of the bases noted earlier in this report in connection with retail sales, and it was decided that the most reasonable projections were obtained on the basis of the changing ratio of the number of establishments in the state to the number in the United States over the years. Taking off from 53,293 establishments in the state in 1963, the resulting projections are 56,000 establishments in 1965, 63,000 in 1970, and 70,300 in 1975.

Projections for the seven-county region were made on all the bases described in connection with retail sales, and it seemed that the most satisfactory results were obtained on the basis of the changing ratio of the number of establishments in the region to the number in the State of Florida over the years. With a base of 7,335 retail establishments in

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the region in 1963, the projections which resulted are 7,840 in 1965, 9,200 in 1970, and 10,700 in 1975. This would increase the region's share of the state's total number of establishments from 13.76 per cent in 1963 to 14.01 per cent in 1965, 14.61 per cent in 1970, and 15.22 per cent in 1975.

Methods previously described in connection with retail sales were used to make projections of numbers of retail establishments for the individual counties in the region. In addition, projections of sales per retail establishment were made and divided into the projections already made for total retail sales in order to get another insight into the probable numbers and distribution of retail establishments among the counties. In the case of some variables, such as population or retail sales, it has seemed desirable to make projections for the counties on the basis of the changing ratios of their totals to those of the state or possibly the region. Such methods, however, would provide rather unlikely projections for some counties which have had fairly rapidly declining ratios with respect to the state and region. It is difficult to believe that future developments will result in any county in this region having a rapidly declining number of retail outlets.

All things considered, it seemed best to make projections based on past trends in total retail sales and retail sales per establishment. In this way, projections of numbers of establishments are at least tied in with projections of total retail sales, and we avoid any seemingly nonsensical projections which would call for counties to

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have rapidly increasing numbers of establishments to make only slightly increasing total retail sales. Once county projections for numbers of retail establishments had been made on the basis of retail sales per establishment and total retail sales, they were, of course, adjusted to add to the total number of establishments already projected for the region as a whole.

The resulting projections, together with the actual data for 1963, are shown in Table 5. Figure 5 shows how these projections work out in comparison with the numbers of establishments actually achieved by the individual counties in the past, and Figure 6 indicates the changes in the numbers of retail establishments, in terms of percentages of the state total, which would be expected in the individual counties from 1963 to 1975 on the basis of our projections.

		A IN 1963, AND F 1965, 1970, AND		
	1963	1965	1970	1975
County	Total	Projection	Projection	Projection
Brevard	1,242	1,410	1,880	2,410
Indian River	346	380	460	550
Lake	761	790	860	920
Orange	2,610	2,780	3,240	3,740
Osceola	234	240	250	260
Seminole	464	490	570	650
Volusia	1,678	1,750	1,940	2,170
Region State	7,335 53,293	7,840 56,000	9,200 63,000	10,700 70,300

TABLE 5. - TOTAL NUMBERS OF RETAIL ESTABLISHMENTS OF INDIVIDUAL COUNTIES, THE SEVEN-COUNTY REGION, AND THE STATE OF FLORIDA IN 1963, AND PROJECTIONS FOR

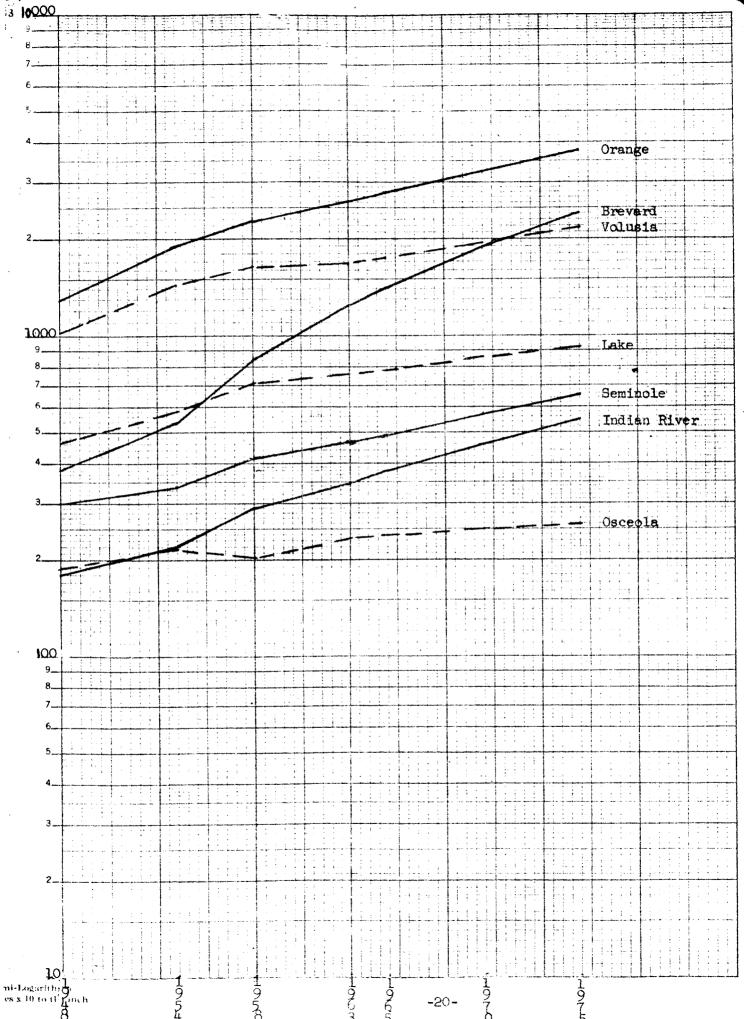
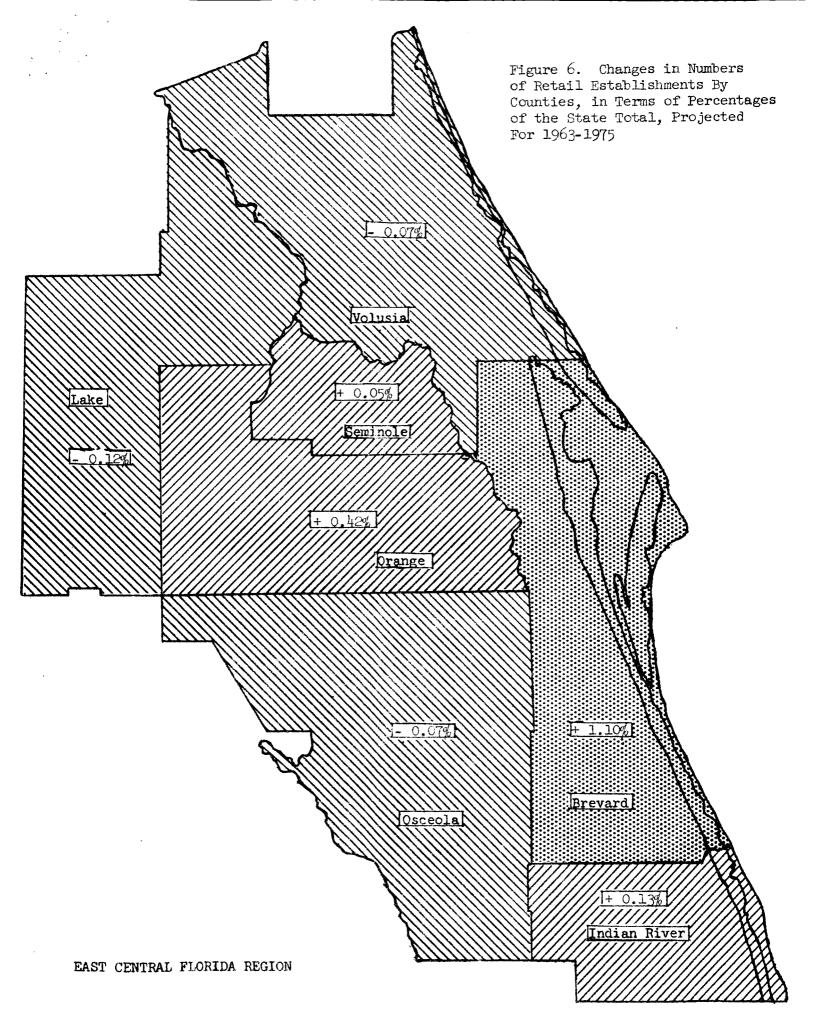


Figure 5.-Actual and Projected Numbers of Retail Establishments by Counties.



# Numbers of Retail Establishments by Types

The distribution of numbers of retail establishments by types is shown in Table 6 for both the seven-county region and the State of Florida in 1954, 1958, and 1963. Again there are few significant differences between the region and the state. In fact, in 1963, differences of one per cent or more between the region and the state existed only in connection with food stores, automotive dealers, and unclassified retail stores. In comparison with the state, the region was short of food stores in 1963, but long on automotive dealers and unclassified retail stores.

TABLE 6.-DISTRIBUTION OF RETAIL ESTABLISHMENTS BY TYPES IN THE SEVEN-COUNTY REGION AND THE STATE OF FLORIDA,

	1954,	1958,	AND 1963			
	19	54	19	58		63
Types of Establishment	Region %	State %	Region %	State %	Region %	State %
Food Stores	18.27	-	15.03	-	13.52	16.07
Eating & Drinking Places General Merchandise	18.12		17.18		17.16	17.39
Stores Apparel, Accessories	3.67	3.72	4.49	4.40	3.29	3.41
Stores Furniture, Home Furnish-	6.92	8.00	7.22	8.07	7.14	7.60
ings, Appliance Stores	6.36	5.95 5.03		6.81 5.81	6.72 7.53	
Automotive Dealers Gasoline Service Stations	12.84		12.13	-		14.60
Lumber, Building Material Hardware, Farm Equip.	•					·
Dealers Drug and Proprietary	4.83	4.56	5.45	5.05	4.95	4.32
Stores Other Retail Stores	3.82 19.45	3.86 19.44	3.68 21.22	3.58 19.81		
Other Retail Stores	170 <b>4</b> )	17044	C10CC	17.01	21.00	20.03

Within the region there was a sharp decline in the percentage of food stores to total retail establishments and much smaller declines in the percentages of eating and drinking places, general merchandise stores, and drug and proprietary stores. All other types of stores were a greater percentage of the total number in 1963 than in 1954. However, the increases and decreases in the region again merely paralleled changes which occurred in the state as a whole. Apparently there was nothing in the period from 1954 to 1963 to make the region depart significantly from the pattern of the state as a whole in this matter.

The distribution of retail establishments by types was quite different from one county to another in 1963. Food stores ran from 18.80 per cent of all retail establishments in Osceola County to 11.68 per cent in Volusia, eating and drinking places from 21.10 per cent in Indian River to 15.10 per cent in Orange, and general merchandise stores from 4.73 per cent in Lake to 2.92 per cent in Volusia. Stores selling apparel and accessories varied between 9.83 per cent in Indian River and 3.88 per cent in Seminole, stores selling furniture, home furnishings, and appliances between 7.59 per cent in Orange and 4.60 per cent in Lake, and automotive dealers from 8.94 per cent in Lake to 5.49 per cent in Indian River. Gasoline service stations varied between 19.23 per cent in Osceola and 13.60 per cent in Orange, dealers in lumber, building materials, hardware, and farm equipment between 5.82 per cent in Seminole and 3.47 per cent in Indian River, and drug and proprietary stores between 4.03 per cent in Brevard and 2.50 per cent in Lake.

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The most populous counties (Orange, Brevard, and Volusia) tend to rank high in connection with percentages of stores selling apparel and accessories stores selling furniture, home furnishings, and appliances, automotive dealers, and drug and proprietary stores. The same counties, on the other hand, tend to rank low in the region in connection with percentages of food stores, general merchandise stores, and dealers in lumber, building materials, hardware, and farm equipment. As in the case of retail sales by eating and drinking places, the coastal counties of Indian River, Volusia, and Brevard rank one, two, and three in the matter of eating and drinking places as a percentage of total retail establishments. No inter-county pattern appears in connection with numbers of gasoline service stations.

# Retail Trade - Paid Employees

The number of paid employees in retailing has grown much more rapidly than the number of retail establishments but much less rapidly than total retail sales over the years in both the seven-county region and the State of Florida. From 1939 to 1954 the number of paid employees in retailing in the region increased by 8.37 per cent a year on the average, as compared with 8.81 per cent for the state as a whole. This meant that the region's proportion of the state's total of paid employees in retailing declined gently from 11.56 per cent in 1939 to 11.22 per cent in 1954. Over the same period the region was responsible for 10.99 per cent of the increase in the total number of paid employees in retailing in the state as a whole.

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In the state as a whole, the number of paid employees in retailing increased at a rate of 6.33 per cent a year on the average from 1954 to 1963. In the region, however, under the influence of the NASA program and other developments, the number of paid employees in retailing increased by 10.81 per cent a year on the average. The region's share of the state's total number of paid employees in retailing increased from 11.22 per cent to 14.11 per cent, and the region contributed 19.17 per cent of the increase which occurred in the state total.

As in other cases, the increases which occurred in the regional total number of paid employees in retailing were very unevenly distributed among the individual counties from 1954 to 1963. Brevard County gained paid employees in retailing at the rate of 42.10 per cent a year on the average. This was more than four times the annual rate of 10.23 per cent which it had shown from 1939 to 1954, slightly less than four times the annual rate for the whole region from 1954 to 1963, and nearly seven times the annual rate for the whole state from 1954 to 1963.

No other county had an annual average rate of increase which exceeded those for both the region and the state as a whole from 1954 to 1963, but all the other counties except Osceola had average annual rates of increase which exceeded that for the state as a whole. Four counties gained paid employees in retailing at a more rapid rate than that at which they gained total population from 1954 to 1963. These were Brevard, Lake, Orange, and Volusia. Moreover, Brevard, Orange, and Volusia Counties had larger shares of the region's paid employees in retailing than of its total population by 1963.

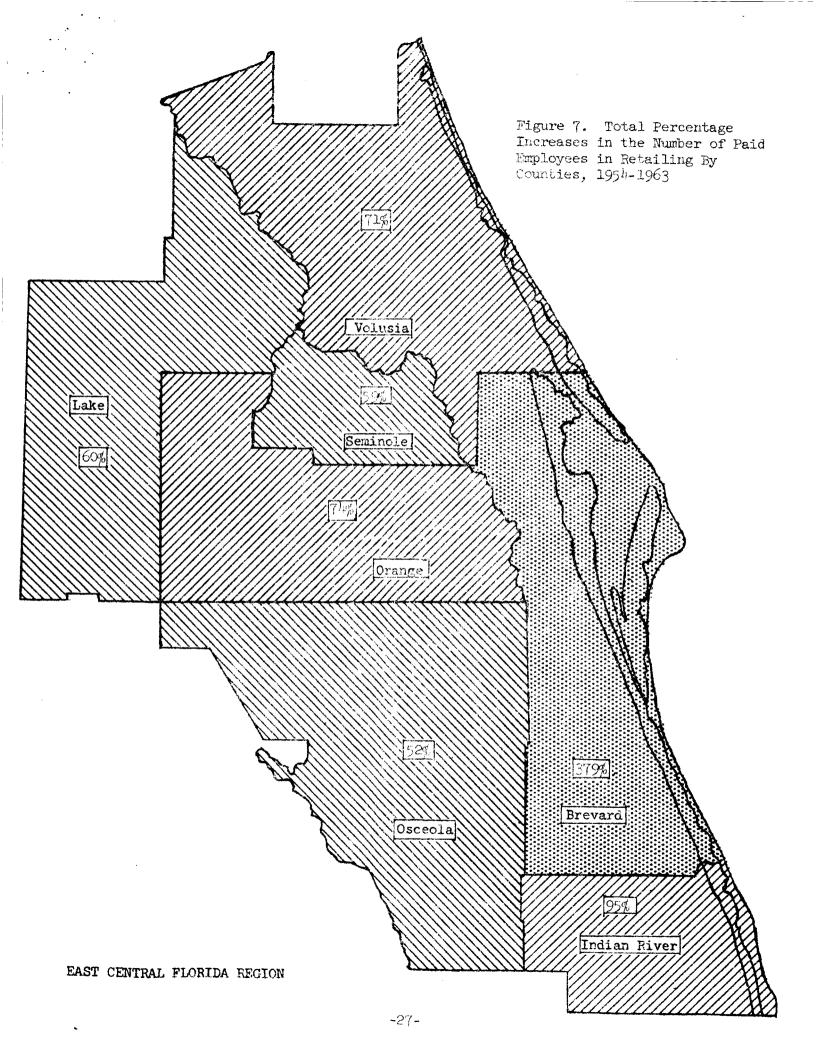
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Brevard County's share of the regional total of paid employees in retailing increased from 8.46 per cent in 1954 to 20.54 per cent 1963 -- a really phenomenal increase. All of the other counties experienced declines in their shares of the regional totals. The largest declines were in Orange County, which fell from 48.02 per cent to 42.27 per cent of the regional total, and in Volusia County, which dropped from 24.12 per cent to 20.94. Figure 7 shows the total percentage increases in the number of paid employees in retailing which occurred in the individual counties over the period from 1954 to 1963.

Projections for future years for the United States were not quite so easy to make for the number of paid employees in retailing as for the number of retail establishments, for past changes in the total number of paid employees had been somewhat less smooth and regular than those in the number of establishments. Once national projections which seemed reasonable had been made, projections for the State of Florida were made on all the bases noted earlier in this report in connection with retail sales, and two additional methods were used. Projections of retail sales per employee were divided into projections of total retail sales, and projections of the numbers of employees per retail establishment were multiplied by projections of the numbers of establishments. Both, of course, provided some insight into the probable numbers of employees in future years.

In the end it was decided that the most reasonable projections were those obtained on the basis of past trends in and projections for total

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retail sales and retail sales per employee. Starting from 266,752 paid employees in 1963, the resulting projections are 288,900 paid employees in 1965, 321,800 in 1970, and 353,800 in 1975.

Projections for the seven-county region were also made on all the bases described in connection with retail sales and also by dividing projections of retail sales per employee into projections of total retail sales and by multiplying projections of paid employees per retail establishment by projections of the numbers of retail establishments. The projections of the number of paid employees in retailing which were finally chosen for presentation here were those found by dividing projections of retail sales per employee into projections of total retail sales. Starting from 37,646 paid employees in 1963, the resulting projections are 41,890 in 1965; 52,640 in 1970; and 63,540 in 1975. These totals would give the region 14.50 per cent of the state total of paid employees in retailing in 1965, 16.36 per cent in 1970, and 17.96 per cent in 1975.

All the methods previously noted were used to make projections of the distribution of the region's totals of paid employees in retailing among the individual counties. As in the case of projections for numbers of establishments, it seemed unwise to base county projections for paid employees on the changing ratios of the county totals to regional or state totals in the past. Such ratios have declined considerably for some counties in the past and it is difficult to believe that any counties in the region will have seriously reduced numbers of paid employees in retailing in the years to 1975.

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Under the circumstances, it was decided to make the county projections for numbers of paid employees in retailing on the basis of projections of total retail sales and of retail sales per employee in the various individual counties. That is, retail sales per employee were projected for each county and these projections were divided into those which had already been made for total retail sales for each county. The use of this method was based on the conclusion that there should be internal consistency among the various projections in the field of retail trade. It would seem idle to project a rapidly increasing number of paid retail employees for a county for which projections of total retail sales indicated only slight increases, or to project increases in paid employees at the same rate as projected increases in retail sales for a county with rapidly increasing retail sales per paid employee.

The resulting projections for the individual counties, together with the actual data for 1963, are shown in Table 7 below. Figure 8 shows how these projections appear in comparison with the numbers of paid employees in retailing actually achieved by the individual counties in the past, while Figure 9 indicates the changes in numbers of paid employees, in terms of percentages of the state total, which would be expected to occur in the individual counties, on the basis of our projections, between 1963 and 1975. Data are not available which would enable us to study the distribution of paid employees in retailing by types.

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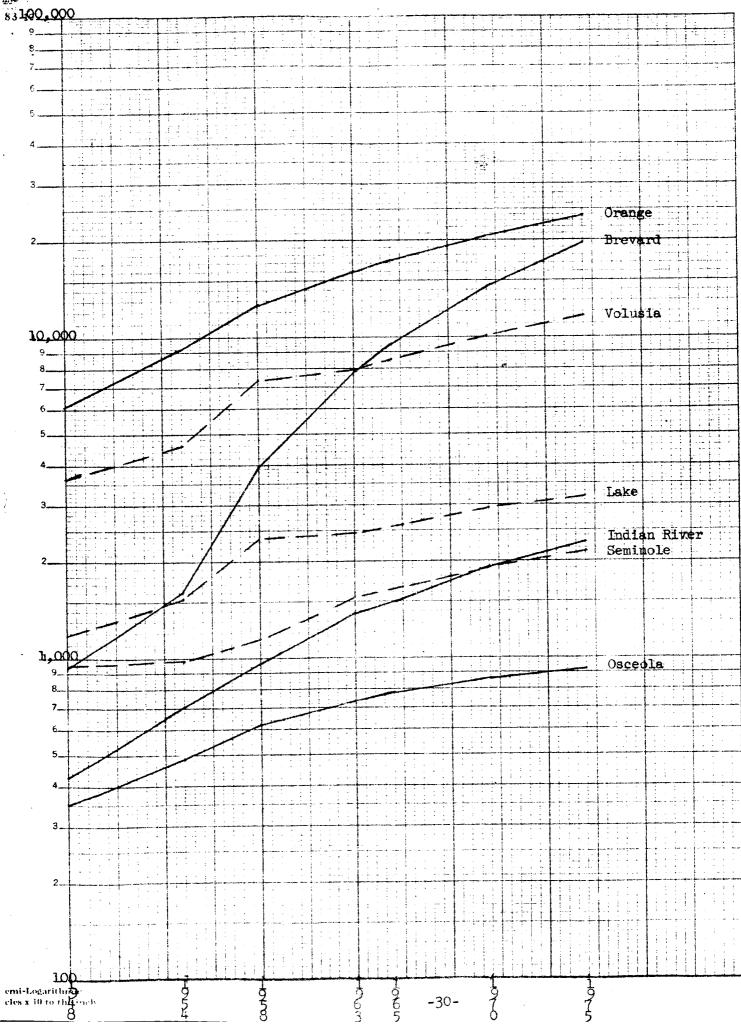
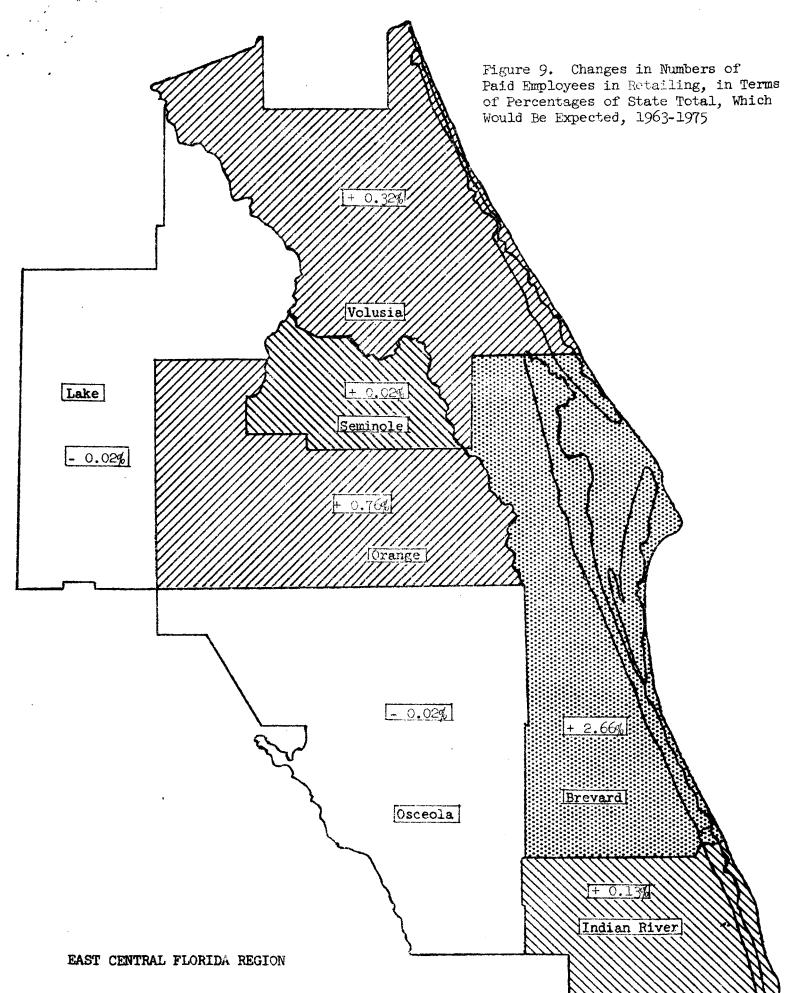


Figure 8.-Actual and Projected Numbers of Paid Employees in Retailing by Counties



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	FLORIDA	IN 1963, AND PR 1965, 1970, AND		
County	1963	1965	1970	1975
	Total	Projection	Projection	Projection
Brevard	7,734	9,480	14,300	19,680
Indian River	1,382	1,530	1,920	2,300
Lake	2,447	2,600	2,930	3,180
Orange	15,914	17,300	20,620	23,770
Osceola	736	780	860	920
Seminole	1,551	1,660	1,900	2,130
Volusia	7,882	8,540	10,100	11,560
Region	37,646	41,890	52,640	63,540
State	266,752	288,900	321,800	353,800

TABLE 7.	- TOTAL NUMBERS OF PAID EMPLOYEES IN RETAILING IN INDIVIDU	JAL
	COUNTIES, THE SEVEN-COUNTY REGION, AND THE STATE OF	
	FLORIDA IN 1963, AND PROJECTIONS FOR	

## Summary

In connection with total retail sales, numbers of retail establishments, and numbers of paid employees in retailing, the seven-county Cape Kennedy Region under study had a smaller share of state totals in 1954 than in 1939. From 1954 to 1963, however, under the influence of the NASA program, the region gained more rapidly than the state in connection with all of these aspects of retail trade and came to have an increasing share of state totals. Five counties in the region (Brevard, Indian River, Orange, Seminole, and Volusia) increased their total retail sales relatively more rapidly than the state in this period, four counties (the above list minus Volusia) increased their numbers of retail establishments relatively more rapidly than the state, and six counties (all except Osceola) increased their numbers of paid employees in retailing relatively more rapidly than the state.

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Brevard County has been far and away the leader in all respects. From 1954 to 1963 this county enjoyed an average annual rate of increase of 51.75 per cent in total retail sales, 42.10 per cent in numbers of paid retail employees, and 14.64 per cent in numbers of retail establishments, as compared with 9.95 per cent, 6.33 per cent, and 3.23 per cent, respectively, for the State of Florida. On the basis of our whole analysis it seems clear that Brevard County has received the lion's share of the stimulation to retail trade which has resulted from the NASA program and other developments of recent years in the region. On the other hand, inasmuch as three to five other counties have had annual rates of increase which were higher than those for the state as a whole in the various phases of retailing, there has undoubtedly been a significant amount of spill-over from Brevard into other counties. These considerations are, of course, reflected in our projections for the counties and the region.

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