A SURVEY AND EVALUATION OF OFF FARM AGRICULTURAL JOB OPPORTUNITIES IN SALINA, KANSAS

by

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Approved by:

[Signature]
Major Professor
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</table>
INTRODUCTION

Vocational Agriculture played a major role in preparing personnel for Off Farm Agricultural Jobs in Salina, Kansas. However there was a question as to where to put the emphasis in the training to meet the needs of the community. Many people thought of agriculture and farming as being one and the same thing. Now, however, many of the tasks which farmers used to perform have been taken over by other persons. As a result a large off farm agricultural industry has come into being including the many producers of agricultural products who were not called farmers such as nurserymen, greenhouse men, and flower growers. Knowledge of what employers in such an industry deemed to be their needs of trained personnel enhanced the economic, educational, and social development of the community.

Statement of Problem

The specific objective of this report was to develop a community survey tool to supply the school system of Salina with more tangible and reliable advice on job opportunities and requisite training needed.

Secondary objectives were to show the need for continued vocational agricultural education in Salina and to make recommendations for a future vocational education program that would put emphasis in training to meet the needs of the off farm agriculture industry.

This creative research was purposed to determine the needs of employers for trained personnel in the field of off farm agriculture in the Salina School District of Saline County Kansas. There was no record of this information up to the date of this study.

**Physical Profile of Area Surveyed**

The city of Salina was a community of relatively small businesses; its largest organizations numbered their employees by hundreds rather than thousands. Salina was the largest city nearest the Geographical Center of the United States, the cross-roads of the States, fourth largest city in the state of Kansas, and has a population of 43,202. Salina had an altitude of 1,222 feet that gently sloped to provide an adequate surface drainage. A flood control levee system surrounded the community.

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3Ibid.
Agricultural industry in Salina was closely related to its climatic conditions. The average weather conditions for the community were:

- **Annual Rainfall**: 26.33 inches
- **Summer Temperature**: 77 degrees Fahrenheit
- **Winter Temperature**: 41 degrees Fahrenheit
- **Prevailing Winds**: Southerly
- **Humidity**: 55-60 per cent

Salina had the business city-manager form of government which gave all administrative responsibility to this position and eliminated all elective offices other than the five man city-commission. This commission was elected on a non-partisan basis every two years. The city of Salina had a levy of 24.92 mills based on an average evaluation of 22 per cent. The city had a rating of "A" from Moody Investors Service. Salina had the distinction of being one of the few cities in the United States that was located on two different interstate highways. Running east and west across the entire continent was Interstate Number 70. Approaching from the south by way of Dallas and Oklahoma City was Interstate 35W.

Four major railroads served Salina, and reciprocal switching was available from all lines. Salina enjoyed one of the most complete motor carrier services available in any city of comparable size in the country.

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4Ibid., p.4. 5Ibid., p.6. 6Ibid., p.3.
The city of Salina encompassed a large potential labor supply due primarily to the tremendous trade area which was served by the community. The primary labor market was within a ten to fifteen mile radius of the community, but within a forty to fifty mile radius could be found a potential labor force more than double the current level. This work force required a minimum of training to provide qualified operators in almost any semi-skilled field and in many skilled categories due to its farm background.

Civilian Work Force

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Total</td>
<td>19,300</td>
</tr>
<tr>
<td>Employed</td>
<td>18,575</td>
</tr>
<tr>
<td>Unemployed</td>
<td>725</td>
</tr>
<tr>
<td>Per cent of Unemployed Civilian Work Force</td>
<td>3.9</td>
</tr>
</tbody>
</table>

Hourly Wage Rate

<table>
<thead>
<tr>
<th>Category</th>
<th>Range</th>
</tr>
</thead>
<tbody>
<tr>
<td>Skilled Labor</td>
<td>$1.70-$2.60</td>
</tr>
<tr>
<td>Semi-skilled</td>
<td>$1.50-$2.40</td>
</tr>
<tr>
<td>Common Labor</td>
<td>$1.25-$1.75</td>
</tr>
</tbody>
</table>

The beginning history of Salina's economy dated back to 1858 when the first trading store was established. The turning point of the city as to its destiny was the erecting of the first flour mill in Salina about the turn of the century. Certainly any discussion of the economics of the community would not be complete without recognizing the addition of Camp Phillips Army Site and the Smoky Hill Air Base Site during World War II.

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7 Ibid., p.10 8 Ibid., p.12. 9 Ibid., p.8.
Both of these facilities enhanced the economics of the area and expanded its service potential greatly. Following World War II both facilities were closed. But by 1952, the air base was reactivated and renamed the Schilling Air Force Base.

There were four banks and three savings and loan associations operating in Salina. The total deposits of the four banks were in excess of 60,000,000 dollars.\textsuperscript{10}

With over 400 establishments serving Salina in the retail field, sales were at the 90 million dollar mark, thus making the retail field the major employer.\textsuperscript{11} In addition to the many high volume stores in the central business district, there were four strategically located shopping centers in the suburban area. One of the real strengths of the economic position of Salina was found in its being a large wholesale center. It was approximately a 200 million dollar field and employed twelve per cent of the Saline County labor force.\textsuperscript{12}

The heart of Salina's economics was its Board of Trade. Operating as a grain exchange, twelve commissioned merchants marketed millions of bushels of grain annually.

Salina's Public School System consisted of twenty-one schools, including two junior high schools and one senior

\textsuperscript{10}Ibid., p.6. \textsuperscript{11}Ibid., p.9. \textsuperscript{12}Ibid., p.7.
high, were ranked high in the State of Kansas as attested to by the Kansas State Teachers College of Emporia Scholastic Tests. Salina constantly met its obligation toward education by having never rejected a public school bond issue. Salina had a parochial school system with two Roman Catholic grade schools and a junior and senior high school.

The benefits of higher education were available through Kansas Wesleyan University and Marymount College. Other schools included: St. John's Military School, Brown-Mackie School of Business, Asbury and St. John's Schools of nursing, and the area Vocational Technical School scheduled to open the fall of 1965. The school system maintained an all modern school for the physically handicapped, mentally retarded, speech handicapped, and deaf children.

Definitions of Terms Used

Off Farm Agricultural Job Opportunities. Throughout the report of this investigation, the term, "Off Farm Agricultural Job Opportunities," shall be interpreted as referring to those occupations or jobs in which the worker either needs to have or in which he is more effective in his work if he possesses either or both experience in farming and/or a knowledge of the why and how of farming operations.13

Agindustry. The word agindustry was coined by Lyman E. Jackson, Dean of the College of Agriculture, Pennsylvania State University. He defines it as:

1. the industry producing agricultural commodities
2. the industry and businesses supplying and servicing those engaged in agricultural commodity production, and
3. the industry and businesses performing all the necessary functions in making agricultural commodities available to the consumer

Business. A firm listed in the "yellow pages" of the Salina telephone directory which provides one or more of the following functions:

1. manufacturing
2. purchasing
3. servicing
4. constructing
5. retailing
6. warehousing
7. processing
8. wholesaling
9. contracting

Community Survey. Community survey is a means of collecting information about a community. This investigation used the correspondence method with a questionnaire and personal letter to obtain data or make the community survey.


15 Lloyd J. Phipps, Technical Education in and for Rural Areas Project, Preliminary Report No. 1 Sponsored by Vocational and Technical Education Department, College of Education, University of Illinois, 1964, p. 3.
Cooperative Education. Cooperative Education is "A plan of vocational education organized by the school in cooperation with qualified local businesses. Learning occurs in both places, for the classroom instruction is directly related to the learning experiences gained by the students in their chosen part time occupations."\textsuperscript{16}

\textsuperscript{16}Ralph E. Mason, \textit{Methods in Distributive Education}, p. 105.
PROCEDURES USED

The first step in this study was to develop a complete list of all the agriculturally oriented business firms in Salina. This was done by going through the classified section of the Salina telephone directory and selecting such firms. The names of the owners and managers of the 120 firms that were inside the Salina School District, which was used as the population of the survey, were obtained from the Chamber of Commerce. A map of the Salina School District used in this study is included in Appendix A.

The data for this study was obtained by using the correspondence method which consisted of a personal cover letter and questionnaire. It was attempted throughout the questionnaire and letter to keep the questions at a high level of motivation to encourage a good valid response.

Permission was obtained from the school system to use the school letterhead for the cover letter. The principal of Salina Senior High School, Owen E. Hodgson, endorsed the letter as following:

"We respectfully request your cooperation with Norman D. Trichler in his Survey and Evaluation of Off Farm Agricultural Job Opportunities in Salina."

A copy of the cover letter may be found in Appendix B.

Several specialists at Kansas State University were consulted for advice and help in designing the questionnaire. For a copy of the questionnaire, see Appendix C.

The employers were asked to check the selection of their answer or indicate by ( ) Yes ( ) No ( ) Undecided on questions about their business. Blanks were provided if none of the selections fitted their answer so that they might write in their answer.

Much of the basic format of the questionnaire was the same as that used by Dr. Ray Agan, Professor, College of Education, Kansas State University, and his assistants in a similar state wide study in 1964. Used also was the work of Dr. Lloyd J. Phipps, Professor, College of Education, University of Illinois, in his report, "Technicians and other workers who need Technical Knowledge."19


RESULTS OF QUESTION

As reported in the description of procedure used, there was a total of 120 businesses in the population contacted. Only 103 or 86 per cent of the total population of agindustries returned responses from which this data has been prepared.

Information obtained from employers was based on their opinion of their employee needs which included level of ability and skill of employees and the number of new employees needed in the next five years. Type of business, function of business or consumer good was also obtained. This material was projected to establish future vocational educational programs in Salina.

It must be stressed that the data collected in this study was restricted to geographical limits of the Salina School District and to those businesses that were listed in the yellow pages of the Salina telephone directory as agriculturally oriented.

Table I, page 12, presents a summary of persons answering the questionnaire as to their position in the businesses. From this data a degree of accurateness can be attested to the rest of the data.

\[20\text{Ibid.}, \text{p.8.}\]
<table>
<thead>
<tr>
<th>Position in company</th>
<th>Number</th>
<th>Per cent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Owner not manager</td>
<td>42</td>
<td>40.777</td>
</tr>
<tr>
<td>Spouse of owner</td>
<td>3</td>
<td>2.913</td>
</tr>
<tr>
<td>Manager-not owner</td>
<td>38</td>
<td>36.893</td>
</tr>
<tr>
<td>Public Relations Director</td>
<td>6</td>
<td>5.825</td>
</tr>
<tr>
<td>Personnel Director</td>
<td>7</td>
<td>6.796</td>
</tr>
<tr>
<td>Office personnel</td>
<td>5</td>
<td>4.854</td>
</tr>
<tr>
<td>Other</td>
<td>2</td>
<td>1.942</td>
</tr>
<tr>
<td>Total</td>
<td>103</td>
<td>100 per cent</td>
</tr>
</tbody>
</table>

NOTE: This table should be read as follows: 40.77 per cent of the employers answering the questionnaire were owners of their businesses.
The 103 agindustries from which this job information was obtained, owners, not managers, answered the questions in 40.77 per cent of the businesses. Managers, not owners answered in 36.89 per cent of the firms. Personnel directors answered for 6.80 per cent of the businesses and public relations directors answered for 5.83 per cent of the agindustries.

Management personnel—owners, managers, personnel directors and public relations directors—were the personnel which answered the questionnaire in more than 90 per cent of the businesses studied. A high per cent of owners answered personally and indicated a great interest in the study.

This survey agreed with the findings of Dr. Phipps in Illinois. He found 95 per cent interviewed were in the personnel management area. 21

Office personnel and other made up the minor 10 per cent of the total that remained. Some cases showed office personnel possibly more qualified to answer than those in personnel management.

The following Table II, page 14, divided the types of businesses into nine types. Employers checked those which most nearly described their business.

21 Ibid., p.8.
### TABLE II

**TYPES OF THE 103 AGRICULTURAL BUSINESSES FROM QUESTIONNAIRE**

<table>
<thead>
<tr>
<th>Dominate type of business</th>
<th>Dual role</th>
<th>Number of each type</th>
<th>Per cent of each type</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manufacturing-Wholesaling</td>
<td></td>
<td>10</td>
<td>9.708</td>
<td>4</td>
</tr>
<tr>
<td>Purchasing</td>
<td></td>
<td>2</td>
<td>1.942</td>
<td>6</td>
</tr>
<tr>
<td>Services -Retailing</td>
<td></td>
<td>29</td>
<td>28.155</td>
<td>2</td>
</tr>
<tr>
<td>Constructing</td>
<td></td>
<td>2</td>
<td>1.942</td>
<td>6</td>
</tr>
<tr>
<td>Retailing -Services</td>
<td></td>
<td>36</td>
<td>34.951</td>
<td>1</td>
</tr>
<tr>
<td>Warehouse</td>
<td></td>
<td>1</td>
<td>.971</td>
<td>7</td>
</tr>
<tr>
<td>Processing -Wholesaling</td>
<td></td>
<td>11</td>
<td>10.679</td>
<td>3</td>
</tr>
<tr>
<td>Wholesaling</td>
<td></td>
<td>9</td>
<td>8.737</td>
<td>5</td>
</tr>
<tr>
<td>Contractor</td>
<td></td>
<td>2</td>
<td>1.942</td>
<td>6</td>
</tr>
<tr>
<td>Other (open end question)</td>
<td>Greenhouse Producer</td>
<td>1</td>
<td>.971</td>
<td>7</td>
</tr>
</tbody>
</table>

| Total                    | 103       | 100 per cent        |
The data presented in Table II, page 14, indicated that the retail and service types of business were predominant among businesses studied. Many businesses were found to operate more than one type of business.

This information was recorded as the dominate type and dual role of business. The ranking top four types of businesses most commonly had dual types of business.

Retailing was the most frequently found with 34.9 per cent and services were next with 28.15 per cent. Both were dual types of businesses common to each which meant over 60 per cent of the businesses were of the retailing service combination in Salina industry.

Table II, page 14, showed that one business, a greenhouse producer, filled in the open end question on type. The third ranked type of business was processing which included dairy and poultry processing plants with a few grain elevators. It was found that wholesaling was the most common dual business of the processors.

The data presented in Table III, page 16, is the next step in the classification of the businesses to functions or consumer good of a business. Employers checked one of the eight clusters of business functions or consumer goods.
<table>
<thead>
<tr>
<th>Product, service, function or consumer good</th>
<th>Number of businesses with given function</th>
<th>Per cent of businesses</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Veterinary and Animal Health</td>
<td>4</td>
<td>3.883</td>
</tr>
<tr>
<td>2. Agriculture Machinery</td>
<td>18</td>
<td>17.476</td>
</tr>
<tr>
<td>3. Feed Handling-Storage-Milling</td>
<td>15</td>
<td>14.563</td>
</tr>
<tr>
<td>4. Seed, Fertilizer and Agriculture Chemical</td>
<td>6</td>
<td>5.825</td>
</tr>
<tr>
<td>5. Horticulture and Floriculture</td>
<td>9</td>
<td>8.737</td>
</tr>
<tr>
<td>7. Services (total 39)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a. Utility</td>
<td>1</td>
<td>.971</td>
</tr>
<tr>
<td>b. Petroleum Products</td>
<td>11</td>
<td>10.679</td>
</tr>
<tr>
<td>c. Hardware</td>
<td>2</td>
<td>1.942</td>
</tr>
<tr>
<td>d. Pet Supplies</td>
<td>2</td>
<td>1.942</td>
</tr>
<tr>
<td>e. Banking, Auditing and Bookkeeping</td>
<td>5</td>
<td>4.854</td>
</tr>
<tr>
<td>f. Welding</td>
<td>2</td>
<td>2.913</td>
</tr>
<tr>
<td>g. Auto-Truck</td>
<td>3</td>
<td>1.942</td>
</tr>
<tr>
<td>h. Pest Control</td>
<td>2</td>
<td>.971</td>
</tr>
<tr>
<td>i. Rentals</td>
<td>1</td>
<td>.971</td>
</tr>
<tr>
<td>j. Insurance</td>
<td>1</td>
<td>3.883</td>
</tr>
<tr>
<td>k. Building Materials</td>
<td>4</td>
<td>1.942</td>
</tr>
<tr>
<td>l. Board of Trade</td>
<td>2</td>
<td>.971</td>
</tr>
<tr>
<td>m. Seed Analysis</td>
<td>1</td>
<td>1.942</td>
</tr>
<tr>
<td>n. News Media</td>
<td>2</td>
<td></td>
</tr>
<tr>
<td>8. Other (open end question)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dig water wells</td>
<td>1</td>
<td>.971</td>
</tr>
<tr>
<td>Total</td>
<td>103</td>
<td>100 per cent</td>
</tr>
</tbody>
</table>
The data with regards to Table III, page 16, gives a summary of the number and per cent of businesses which had each function, product, service or consumer good. Services ranked first with 39 businesses having a total of 15 different services. Petroleum production services made up nearly half of the businesses offering services and 10.7 per cent of all the agindustry surveyed.

Agriculture machinery the consumer good of 17.5 per cent of the businesses ranked second in frequency. The third ranked function was feed handling-storage-milling, which accounted for 14.5 per cent.

Many of the firms performed more than one function as did the businesses. Employers were asked to check the one that most nearly described their function.

Poultry and poultry products with dairy products were the bulk of the consumer good, livestock and livestock products made up 10.67 per cent of the firms.

Table IV, page 18, gave numerical data of the total work force in agindustry with the number and percent in the different levels of work.
### TABLE IV

NUMBER AND PER CENT OF EMPLOYEES AT DIFFERENT LEVELS OF WORK IN 103 AGINDUSTRIES

<table>
<thead>
<tr>
<th>Levels of work in Agriculture Industry</th>
<th>Percent number employed</th>
<th>Per cent of total now employed</th>
<th>Number of employers</th>
<th>Percent of businesses employed of 103</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professional and Managerial</td>
<td>338</td>
<td>17.4</td>
<td>82</td>
<td>80</td>
</tr>
<tr>
<td>Clerical and Sales</td>
<td>476</td>
<td>24.4</td>
<td>72</td>
<td>70</td>
</tr>
<tr>
<td>Skilled Labor</td>
<td>519</td>
<td>26.1</td>
<td>74</td>
<td>72</td>
</tr>
<tr>
<td>Semi-skilled Labor</td>
<td>334</td>
<td>17.2</td>
<td>46</td>
<td>45</td>
</tr>
<tr>
<td>Unskilled Labor</td>
<td>290</td>
<td>14.9</td>
<td>44</td>
<td>43</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>1,957</strong></td>
<td><strong>100 per cent</strong></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**NOTE:** This table should be read as follows: 80 per cent of the businesses employ 17.4 per cent of their employees at the professional and managerial level.
The data presented in Table IV, page 18, indicated that 26.1 per cent of all employees in agindustries were of the skilled labor level and 72 per cent of the businesses had skilled labor.

Professional and managerial employees were found in 80 per cent of the businesses and accounted for 17.4 per cent of all employees. The number of professional and managerial employees was related to the size of the business and ranged from none to 36 employees.

Clerical-sales and skilled labor made up over 50 per cent of the employees in agindustry. Unskilled labor employees worked in only 43 per cent of the employees of all levels.

An average of 75 per cent of the businesses employed employees in the upper three levels whereas an average of 44 per cent of the businesses employ in the semi-skilled and unskilled jobs.

The difficulty of securing employees with the standards set by employers was presented in Table V, page 20.
### TABLE V
DIFFICULTY OF EMPLOYERS IN SECURING EMPLOYEES

<table>
<thead>
<tr>
<th>Degree of difficulty</th>
<th>Number of businesses</th>
<th>Per cent of each difficulty</th>
</tr>
</thead>
<tbody>
<tr>
<td>Difficult all the time</td>
<td>34</td>
<td>33.01</td>
</tr>
<tr>
<td>Difficult in Seasons</td>
<td>28</td>
<td>27.18</td>
</tr>
<tr>
<td>Never have difficulty</td>
<td>41</td>
<td>39.81</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>103</strong></td>
<td><strong>100 per cent</strong></td>
</tr>
</tbody>
</table>

Table V, showed that businesses never having difficulty securing employees made up 39.8 per cent of the businesses. Thirty-three per cent had difficulty all the time finding qualified employees.

Of those having difficulty securing employees over 60 per cent of the businesses indicated they had difficulty either all the time or in seasons.

The number of new employees needed in five years (1964-69) as estimated by employers to fill vacated jobs and to fill new jobs made available through expansion and products were summarized in Table VI, Page 21.
TABLE VI
ESTIMATED NUMBER OF NEW EMPLOYEES NEEDED IN FIVE YEARS (1964-69) IN AGINDUSTRY BY 103 EMPLOYERS

<table>
<thead>
<tr>
<th>New employees needed</th>
<th>Number of businesses</th>
<th>Per cent needing new employees</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 to 19</td>
<td>92</td>
<td>89.320</td>
</tr>
<tr>
<td>20 to 39</td>
<td>6</td>
<td>5.825</td>
</tr>
<tr>
<td>40 to 55 and above</td>
<td>5</td>
<td>4.854</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>103</strong></td>
<td><strong>100 per cent</strong></td>
</tr>
</tbody>
</table>

NOTE: See question VI of questionnaire Appendix C. Table VI shows 89.3 per cent of the businesses needing 1 to 19 new employees each.

Nine businesses or the remaining 10 per cent needed 20 to 55 and above new employees each, but this 10 per cent made up the larger employers and their needs in individuals equaled that of the 89.3 per cent of small businesses.

To provide a check for the businesses picked as to their per cent of agriculture relation, employers were asked to indicate the per cent of employees with agricultural background. This data was presented in Table VII, page 22.
TABLE VII

THE NUMBER AND PER CENT OF BUSINESSES AND PER CENT OF EMPLOYEES WITH AN AGRICULTURAL BACKGROUND

<table>
<thead>
<tr>
<th>Per cent of employees with agricultural background</th>
<th>Number of businesses with per cent of employees having agricultural background</th>
</tr>
</thead>
<tbody>
<tr>
<td>10       . . . . . . .</td>
<td>30</td>
</tr>
<tr>
<td>20       . . . . . . .</td>
<td>7</td>
</tr>
<tr>
<td>30       . . . . . . .</td>
<td>11</td>
</tr>
<tr>
<td>40       . . . . . . .</td>
<td>1</td>
</tr>
<tr>
<td>50       . . . . . . .</td>
<td>22</td>
</tr>
<tr>
<td>60       . . . . . . .</td>
<td>6</td>
</tr>
<tr>
<td>70       . . . . . . .</td>
<td>1</td>
</tr>
<tr>
<td>80       . . . . . . .</td>
<td>6</td>
</tr>
<tr>
<td>90       . . . . . . .</td>
<td>6</td>
</tr>
<tr>
<td>100      . . . . . . .</td>
<td>13</td>
</tr>
<tr>
<td>Total</td>
<td>103</td>
</tr>
</tbody>
</table>


The data presented in Table VII, page 21, showed that fifty-four (52.4 per cent) business employers hired from 50 to 100 per cent of their employees with an agricultural background. Forty-nine (47.5 per cent) businesses hired 10 to 40 per cent of their employees with an agricultural background.

Employers were to check the per cent of employees with agricultural background from 10 to 100 per cent by intervals of 10.22 The highest ranking interval was 10 per cent with 30 businesses, next was 50 per cent with 22.

No explanation could be given as to why 65 businesses (over 60 per cent) of the businesses checked one of the following intervals; 10 per cent agriculture background (the lowest), or 50 per cent (middle) and 100 per cent (the highest per cent).

The measure of interest of businesses in hiring part time workers taking vocational education programs was indicated in Table VIII, page 24.

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TABLE VIII
INTEREST OF BUSINESSES IN HIRING PART-TIME WORKERS TAKING VOCATIONAL EDUCATION PROGRAMS

<table>
<thead>
<tr>
<th>Answers</th>
<th>Number of businesses</th>
<th>Per cent of businesses</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>40</td>
<td>38.835</td>
</tr>
<tr>
<td>No</td>
<td>36</td>
<td>34.951</td>
</tr>
<tr>
<td>Undecided</td>
<td>27</td>
<td>26.214</td>
</tr>
</tbody>
</table>

Total 103 100 per cent

The preceding Table VIII, showed 38.8 per cent of the businesses were interested in hiring part time workers and 34.9 were not. There was not enough difference to draw significant conclusions without full consideration of the 26.2 per cent who were undecided and made these comments:

1. Cannot devote a great deal of time to on job training.
3. At times or seasons
4. What hours-
5. Work force will be affected by increased automation.
6. If could be worked out with mechanical Labor Unions.

The willingness of employers to cooperate in accessing the employee needs of agindustry is presented in Table IX, page 25.
TABLE IX
WILLINGNESS OF 103 AGRICULTURE ORIENTED BUSINESSES TO COOPERATE IN DEVELOPING A SURVEY TO DETERMINE THE GREATEST NEEDS FOR TRAINED AND UNTRAINED EMPLOYEES

<table>
<thead>
<tr>
<th>Answers</th>
<th>Number of businesses</th>
<th>Per cent of businesses</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>71</td>
<td>68.932</td>
</tr>
<tr>
<td>No</td>
<td>13</td>
<td>12.621</td>
</tr>
<tr>
<td>Undecided</td>
<td>19</td>
<td>18.447</td>
</tr>
</tbody>
</table>

Total 103 100 per cent

Table IX, indicated 68.9 per cent desired to cooperate with the school in determining the greatest needs for trained and untrained employees. The 18.4 per cent of those who marked undecided qualified their indecision by comments which generally agreed with those who marked yes.
SUMMARY

This creative research was purposed to supply the school system of Salina with tangible and reliable information on job opportunities and requisite training needed in agindustry.

Data in this study was obtained through a community survey by use of a questionnaire. Contact was made with 120 business employers which brought a returned response of 86 per cent.

Questions were so designed in the questionnaire to gather general data. The types, sizes, levels of work and function of the business were determined.

Management—personnel—owners, managers, personnel directors and public relations directors—made up the largest per cent answering which indicated a great interest in the study.

Service was the most frequent function or consumer good of the businesses with petroleum services being the bulk of service. Agriculture machinery ranked second and feed handling-storage-milling placed third. Many of the firms performed more than one function just as the businesses were of two or more types.
Professional and managerial employees were found in 80 per cent of the businesses and accounted for 17.4 per cent of all employees. Clerical-sales and skilled labor made up over 50 per cent of the employees in agindustry. An average of 75 per cent of the businesses employed employees in the upper three levels, while an average of 44 per cent of the businesses employed in the semi-skilled and unskilled jobs.

Employers indicated that 52 per cent of the businesses hired over half of their employees with an agricultural background.

There was favorable interest in establishing a cooperative work program. Many of the 26.2 per cent who were undecided made comments that they would be interested when they found out more about the program.

Employers were asked to estimate the number of new employees anticipated due to business growth and employee turn over in the next five years (1964-69). From this estimate, 89.3 per cent will need 1 to 15 new employees and 4.8 per cent will need 40 to 55 new employees.

In essence this study was based upon employers opinions of their needs in employees, indicating what has happened in the past, what the present situation revealed, and on what would likely happen in the future.
RECOMMENDATIONS

From this data the need for more skilled, professional and managerial employees for the present and the future was clearly noted. In order to provide salable skills and those understandings and attitudes that make the worker an intelligent and productive participant in economic life, the school and the agricultural businesses must work together.

Need for students to have the opportunity to apply classroom and laboratory learnings under actual working conditions was expressed by the fact that 38.8 per cent of the employers desired such a program, Table VIII, page 23. Also noted was that 68.9 per cent of the employers were willing to devote more time to research such a program.

Local public schools would have the responsibility for planning, organizing, providing facilities, personnel, and operating the program. The National Public Program of Vocational and Technical Education commanded the attention of the panel of consultants on Vocational Education from October 5, 1961 until their report to the president was completed in November of 1962.23

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As a result, the panel's general recommendation for the vocational agriculture program, under federal reimbursement, "should permit instruction for occupations related to agriculture as well for actual farming."24

From the recommendations of the panel, congress approved the Vocational Education Act of 1963 and the act was signed into law by President, Lyndon B. Johnson. With this reawakening of the true importance of vocational education, the growing realization that only a minority of students can master higher mathematics and can successfully major in specialized aspects of the physical and biological sciences. The realization of dangers in large numbers of young people out of work and with no salable skills promoted action.

The act amended the Smith Hughes and George-Barden Acts as follows:

(b) any amounts allotted (or apportioned) under such titles, Act, or Acts for agriculture may be used for vocational education in any occupation involving knowledge and skills in agricultural subjects, whether or not such occupation involves work of farm or of the farm home, and such education may be provided without directed or supervised practice on a farm."25

There has never been a better time or a time of greater urgency than the present for replanning high school programs of agriculture education.

Vocational agriculture is a component of general education tending to strengthen the whole educational process. It complements the instruction in other subjects by providing opportunities for practical application. The strong emphasis on work experience, "learning by doing." should be maintained as the core of the program or future programs.

Programs of the future must make frequent business surveys and other types of research. Those responsible for the administration of such programs must be flexible enough to change with the constant shifts in the community's economics.

The employment service office can and would render assistance in aptitude testing and counseling of students in cooperation with the school. Labor groups could assist by helping to set up desirable training standards such as trade competency and necessary training content. Chamber of Commerce services would be invaluable in collecting information and assisting in promotional activities.

With all of the excellent resources in Salina, including skilled personnel and physical facilities when brought together to assist in the development of needed
educational programs as discovered in this study, there is every reason to believe that Salina will continue to be an alert and thriving community.
BIBLIOGRAPHY


ACKNOWLEDGEMENT
ACKNOWLEDGEMENTS

The author wishes to express his sincere appreciation for the helpful suggestions and guidance received from Dr. Raymond J. Agan, major advisor, and to the author's wife for her assistance and interest in the preparation of this report.
APPENDIX

Map of Geographical Limits ........ APPENDIX A

Cover Letter ....................... APPENDIX B

Questionnaire ....................... APPENDIX C

List of Businesses ................. APPENDIX D

Abstract ............................
APPENDIX A

Map of Geographical Limits
APPENDIX B

Cover Letter
Owen E. Hodgson  
Principal  
SALINA, KANSAS

Mr. J. J. Vanier, owner  
Weber Flour Mills Co.  
215 E. Iron  
Salina, Kansas

Dear Mr. Vanier:

As one of the largest employers in agindustry in Salina, the problem of obtaining trained qualified personnel is not new. The young men who are leaving and graduating from high school to work in agindustry are not getting adequate vocational training. It is my opinion that the school and especially the vocational agriculture department can develop a program that will change this situation.

However, there is a question as to where to put the emphasis in training to best meet the needs of the community. Knowledge of what employers such as you, Mr. Vanier, deem to be your needs of trained personnel will better enhance the economic, educational and social development of the community.

Such information collected from this questionnaire and study will be of great use to the local school system in supplying tangible and reliable advice on job opportunities and requisite training needed.

Please take a few minutes of your time to-day to answer the enclosed questionnaire and return it in the stamped, self addressed envelope. A study of this type loses its effectiveness unless all participate. Please help us make it successful.

Your name will not be used in any reports made from this inquiry if you do not fill in the name. Yet, your name gives us an opportunity to serve your employment needs more directly.

Director of the Study  
Voc. Ag. Instructor

"We respectfully request your cooperation with Norman D. Trichler in his SURVEY AND EVALUATION OF OFF FARM AGRICULTURAL JOB OPPORTUNITIES IN SALINA."

Principal, of Salina Senior High School
APPENDIX C

Questionnaire
A SURVEY OF EMPLOYMENT IN SALINA AGRICULTURE INDUSTRY

Date ____________________________

I. Name of business or firm ____________________________________________________________

__________________________________________________________________________________

Address ____________________________________________________________________________

Name of person who answers the questionnaire ___________________________________________

__________________________________________________________________________________

Tel. ____________________________

Position in the business ______________________________________________________________

Directions: Check the blank that is nearest the one correct answer for items II through IX.

II. Which describes your type of business best?

1. ___ Manufacturing
2. ___ Purchasing
3. ___ Services
4. ___ Constructing
5. ___ Retailing
6. ___ Warehouse
7. ___ Processing
8. ___ Wholesaling
9. ___ Contractor
10. ___ Other (specify)

III. What is the product, service, function or consumer good of the business?

1. ___ Veterinary and Animal Health
2. ___ Agriculture Machinery
3. ___ Feed Handling-Storage-Milling
4. ___ Seed, Fertilizer and Ag. Chemical
5. ___ Horticulture and Floriculture
6. ___ Livestock and livestock products
7. ___ Services (specify)
8. ___ Other (specify)

IV. Fill in the number of employees that you now have in these levels of work.

___ Professional and managerial
___ Clerical and sales
___ Skilled laborers (H.S. or trade school diploma with spec. training or experience.)
___ Semi skilled laborers (Less training and experience than skilled laborers.)
___ Unskilled laborers (Less training and experience than semi skilled laborers.)
___ Total
V. How would you describe the difficulty you have in securing employees?

- Difficult all the time
- Difficult in seasons
- Never have difficulty

VI. How many new employees do you estimate you will need in five years due to business growth and employee turnover, if you could get qualified personnel for the jobs?

- 1 to 4
- 5 to 9
- 10 to 14
- 15 to 19
- 20 to 24
- 25 to 29
- 30 to 34
- 35 to 39
- 40 to 44
- 45 to 49
- 50 to 54
- 55 & above

VII. What per cent of your employees have an agriculture background?

- 10
- 20
- 30
- 40
- 50
- 60
- 70
- 80
- 90
- 100

VIII. Would you be interested in hiring part-time workers taking vocational education programs in the area of your need?

- Yes
- No
- Undecided (Explain: ____________________________

IX. Would you be willing to cooperate further with the Salina School System in developing and making a survey of the Agriculture oriented businesses in Salina to determine the greatest needs for trained and untrained employees?

- Yes
- No
- Undecided (Explain: ____________________________)
APPENDIX D

List of Businesses
1. ACE SUPPLY INC.
2. A-E-C PEST CONTROL
3. ALEXANDER W. H. WLDG. & BLACKSMITH SHOP
4. ANIMAL CLINIC
5. APCO OIL CORP
6. ARMSTRONG QUALITY CHECK ICE CREAM DAIRY
7. BACON SID MOTOR CO
8. BAKER R. L. OIL CO
9. BARRAGREE'S UNITED RENT ALLS
10. BEATRICE FOODS CO
11. BELL MOTOR CO
12. BEVERLY'S INDEPENDENT PACKING CO. INC
13. BEVERLY WHSLE. MEAT AND Locker PLANT
14. BROADWAY MEAT CO.
15. BRO. MAN OIL CO. INC
16. BROWN WELDING SUPPLY INC.
17. BUCK'S RED WING CHEML. CO.
18. C AND C RECONDITIONING
19. CENTRAL STATES WHOLESALE SUPPLY INC
20. C. G. F. GRAIN CO
LIST OF AGINDUSTRIES

21. CHEVROLET TOBMASTER TRUCKS
22. CONSUMER CREDIT
23. CRUCE PRODUCE
24. CUNNINGHAM DESIGNS
25. ELMORE DAIRY
26. EVANS GRAIN CO.
27. FAIRMONT FOODS CO.
28. FARM BUREAU INSURANCE
29. FARMERS INSURANCE GROUP
30. FARMERS UNION CO-OP MKT. ASSN.
31. FENCIL WESTLAND SEED CO.
32. FIRST NAT'L BANK & TRUST CO.
33. FIRST STATE BANK OF SALINA
34. FISK OIL CO.
35. FLEMING MOTOR CO. INC.
36. FLOWER NOOK - THE
37. FOLEY TRACTOR CO.
38. GOOCH FEED MILL CO.
39. GOODRICH B F TIRES
40. GRAIN BELT SUPPLY CO. INC.
LIST OF AGINDUSTRIES

41. GRAIN FUMIGATIONS CO. INC.
42. GREAT WESTERN HATCHERY
43. GRAIN MANGMNT. ASSOCTS. INC.
44. GRIGSBY GREEN HOUSE
45. HARMON AND GREGG CO. INC.
46. HAWORTH LUMBER CO. INC.
47. HI PLAINS ELEVATOR MCHRY. CO.
48. HOLZHUTER PETROLEUM CO.
49. HYDRAULIC DRILLING CO.
50. INTERNATIONAL MILLING CO.
51. JO-MAR DARIES CO.
52. KANSAS LANDSCAPE AND NURSERY CO.
53. KANSAS POWER AND LIGHT CO.
54. KENISON GRAIN SAVING GUARD CO.
55. LAPPIN IRRIGATION EQP.
56. LARSON LUMBER CO.
57. LEIGHTON FLORAL CO.
58. LEIDIGH AND HAVENS LBR. CO.
59. LINDQUIST IMPLMT. CO.
60. LONG-MC ARTHUR INC.
LIST OF AGINDUSTRIES

61.  LOWE'S POULTRY
62.  MAI AND GOEDECKE MCR. AND WLDG. SHOP
63.  MARKLE TREE PEST CONTROL
64.  MC KEE GARDENS
65.  MELVIN KNOX HOME IMPROVEMENT CO.
66.  MID STATES ARMATURE WKS.
67.  MID WESTERN FARM IMPLMT. CO.
68.  MORRISON GRAIN CO.
69.  NAT'L BANK OF AMERICA
70.  OLSON VET HOSPITAL
71.  PEATING VERN MOTOR CO.
72.  PET LAND SHOP
73.  PETTLE'S FLOWERS
74.  PLANTERS STATE BANK
75.  PUGH JOHN DR. LARGE AND SMALL ANIMAL HOSP.
76.  RICE COML. SEED TESTING LAB.
77.  RIDDLE QUARRIES INC.
78.  ROBINSON MILLING CO.
79.  ROMBEISER GRAIN CO.
80.  RUNDALL LIGHTNER WLDG. SUPPLY
LIST OF AGINDUSTRIES

81. SALINA CONCRETE PRODUCTS INC.
82. SALINA FARM SUPPLY
83. SALINA IMPLMT. CO.
84. SALINA JOURNAL
85. SALINA POULTRY CO.
86. SALINA PRODUCTION CREDIT ASSN.
87. SANDELASTING SPECIALTIES CO.
88. SALINA SUPPLY CO.
89. SALINA TERMINAL ELEV. CO.
90. SALINA TESTING LABORATORY
91. SALINA WHITE TRUCKS INC.
92. SENG AGCY.
93. SINCLAIR REFINING CO.
94. SKELLY OIL CO.
95. SKELLY OIL CO. SKELGAS MARKETING
96. SMOKY VALLEY BOARDING KENNELS
97. SMOOT GRAIN CO.
98. SOCONY MOBIL OIL CO. INC. BULK PLANT
99. STANDARD OIL DIV. OF AMERICAN OIL CO. BULK PLANT
100. STAUFFER HDW.
LIST OF AGINDUSTRIES

101. STEELE OIL CO.
102. STOREY HARRIS TIRE CO.
103. STRAHAN CREAMERY CO.
104. SUPERSWEET RETAIL STORE
105. SUN ENTERPRISES
106. SWIFT AND CO.
107. TANNER FEED STORE
108. TEA TABLE MILLS INC.
109. TENNECO OIL CO.
110. TOWN AND COUNTRY ANIMAL HOSP.
111. TOX EOL TERMITE SER.
112. TWIN VALLEY NURSERY AND GARDEN CENTER
113. VAHS\HOLTZ IMPLMT. CO.
114. WISSING'S PROPANE GAS SERV. INC.
115. WALLACE GRAIN CO.
116. WEBER FLOUR MILLS CO.
117. WESTERN STAR MILL
118. WOLCOTT AND LINCOLN
119. WYATT MFG. CO. INC.
120. YOUNGQUIST IMPLMT. CO.
A SURVEY AND EVALUATION OF OFF FARM AGRICULTURAL JOB OPPORTUNITIES IN SALINA, KANSAS

by

NORMAN D. TRICHLER

B.S., Kansas State University, 1964

AN ABSTRACT OF A MASTER'S REPORT

submitted in partial fulfillment of the requirements for the degree

MASTER OF SCIENCE

College of Education

KANSAS STATE UNIVERSITY
Manhattan, Kansas
1965
This creative research was purposed to determine the needs of employers for trained personnel in the field of off farm agriculture in the Salina School District of Saline County, Kansas. There was no record of this information up to the date of this study. Information in this study was obtained through a community survey questionnaire with a follow-up interview over the telephone. The first step was to develop a complete list of all the agriculturally oriented firms in Salina. This was done by going through the classified section of the Salina telephone directory. The school endorsed a cover letter which was addressed to the owner or manager and sent with the questionnaire to 120 firms with a 85.7 per cent return.

The specific objective of this report was to develop a community survey tool to supply the school system of Salina with more tangible and reliable information on job opportunities and requisite training needed. Secondary objectives were; 1. To show the need for continued Vocational Agricultural Education in Salina; 2. To make recommendations for a future vocational education program that will put emphasis in training which will meet the needs of the off farm agriculture industry.
Questions were so designed in the questionnaire to gather general data, the types, sizes, levels of work and function of the business were determined.

Retailing was the predominate type of business with services being a close second. Those surveyed showed a correlation between retail and service types of businesses.

Regarding the question, "What is the product, service function or consumer good of the business?" most businesses indicated that service was their end product and next most frequent was, "agriculture machinery." Food handling-storage-milling being third in number of businesses.

Levels of work were divided into categories that correspond to that of the Dictionary of Occupational Titles. There were 1,957 jobs listed in the five following levels: Professional and managerial, clerical and sales, skilled laborers, semi-skilled laborers and unskilled laborers.

Employers were asked to estimate the number of new employees anticipated due to business growth and employee turn over in the next five years (1964-1969). From this estimate, 89.3 per cent will need 1 to 15 new employees and 4.8 per cent will need 40 to 55 new employees.
Over half of the employers employ 50 to 100 per cent of their employees with an agriculture background.

A study of the interest of the employers in hiring part time workers taking vocational education programs in the area of their need showed 39 per cent would be interested and 26 per cent undecided.

From this data the need for more skilled, professional and managerial employees for the present and the future was clearly proven. In order to provide salable skills and those understandings and attitudes that make the worker an intelligent and productive participant in economic life, the school and the agricultural businesses must work together. Need for students to have the opportunity to apply classroom and laboratory learnings under actual working conditions was expressed by the fact that 39 per cent of the employers desired such a program.

In essence this study was based upon employers opinions of their needs in employees, indicating what has been happening in the past, what the present situation reveals, and on what will be likely to happen in the future.