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The Problem of Declining Enrollment in the Elementary Schools of Ziebach County

W. F. Kumlien

Howard M. Sauer

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THE PROBLEM OF DECLINING ENROLLMENT
in
The Elementary Schools
of
Ziebach County

W. F. Kunlien
Howard M. Sauer
C. Scandrette

In 1927, 788 pupils were enrolled in the rural schools of Ziebach county

but in 1940 the total enrollment was only 270

Each figure represents 100 pupils

Department of Rural Sociology
Agricultural Experiment Station of the South Dakota State College of
Agriculture and Mechanic Arts, Brookings, South Dakota
EXPLANATORY NOTE

During recent years, enrollments in most South Dakota elementary schools have declined at a very rapid rate. The prevailing type of rural school district organization in most counties has proved rather ineffective in coping with dwindling enrollments and with the consequent high costs per pupil.

It is the purpose of this pamphlet to assist educators, school board members and other Ziebach county leaders, by analyzing the nature of the problem and by presenting suggestions for its solution; as they have grown out of the experiences of other South Dakota communities.

* * * * * * *

ACKNOWLEDGMENT

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The Problem of Declining Enrollments in the Elementary Schools of Ziebach County

Population experts have been predicting for a number of years, that the downward trend of the birth rate will cause a serious decline in the elementary enrollment. Figure 1 shows that the elementary enrollments of Ziebach county schools have fallen rapidly in the last decade. From 1913 to 1929 the total enrollment increased from 403 pupils to 902 pupils. In 1930 the enrollment began to decline until in 1940 only 388 pupils were enrolled.

A large part of this increase and decline may be attributed to the rapid increase in population during the early settlement of Ziebach county and the later outward migration due to the drouth and depression. However, the trend of the birth rate, (also shown in Figure 1) illustrates the relation between the decline of the birth rate and the decline in elementary enrollment. It will be noted that the birth rate increased from 24.2 persons per 1000 of the population in 1920 to 34.0 persons per 1000 in 1926. In 1935 the birth rate had reached a low of 17.5 persons per 1000 but had increased to 21.2 persons per 1000 population by 1940. The result of the downward tendency in the birth rate has been a steady decrease in the number of children who arrive at school age.

Figure 1. Elementary School Enrollment in Ziebach County, 1912-1940, and Birth Rate Trend, 1920 - 1940

Source: Biennial Reports of the State Superintendent of Public Instruction and Reports of the State Board of Health.
Figure 2. Population Gains or Losses in Ziebach County, 1930 - 1940

Legend:

- Gained
- Lost 0.0 - 9.9%
- Lost 10.0 - 19.9%
- Lost 20.0 - 29.9%
- Lost 30.0 - 39.9%
- Lost 40.0% or more

* Records not complete

Source: Sixteenth U. S. Census, 1940
Another important factor in the elementary enrollment decline is shown in Figure 2, which records the loss of population through outward migration. Between 1930 and 1940 Ziebach county lost 28.8 percent of its population. This decrease is closely related to the loss in rural enrollment since the bulk of the population in Ziebach county is rural. Dupree, the one incorporated town of the county, showed a gain of 20.7 percent in population for the same period.

In the 38 townships for which records are available, three townships showed gains while 24 townships lost more than 40 percent of their population. The direct relation between population decrease and enrollment decline is indicated in the fact that, usually, the township which has the greatest loss in population, (Figures 2 and 3) has the greatest percent of decline in elementary school enrollment.
Figure 3. Elementary School Enrollments in Ziebach County, 1920, 1930 and 1940

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<td>16</td>
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<td>7</td>
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</table>

Legend:
- Top figure 1920 enrollment
- Middle figure 1930 enrollment
- Lower figure 1940 enrollment

* Enrollment figures are for Districts 3 and 15, which were included in one district in 1920

Source: Records of Ziebach County Superintendent of Schools
Thirty-one common schools were in operation in the 14 districts of Ziebach county in 1940, in addition to the one independent district of Dupree. The definite downward trend in enrollment is evident in Figure 1, which lists the elementary school enrollments of each district for 1920, 1930 and 1940.

In all districts the enrollment had dropped in the period between 1930 and 1940. Twenty-eight schools had been closed; six schools had an enrollment of five or fewer pupils. Fifteen had from six to ten pupils, nine had from eleven to fifteen pupils while only one school had more than sixteen pupils. The total rural enrollment had dropped from 584 pupils in 1920 to 270 pupils in 1940. The average number of pupils per school dropped from 13.6 in 1920 to 8.7 in 1940. Further enrollment losses may be expected in the future, unless unforeseen population changes occur.
Figure 4. Instructional Cost Per Pupil by Size of School, Ziebach County, 1940

Legend:
- Closed school
- 5 or fewer pupils
- 6 - 10 pupils
- 11 - 15 pupils
- 16 or more pupils

Figures below circles represent cost per pupil.

Numbers in ( ) indicate districts.

Territory below the dotted line is part of the Cheyenne River Indian Reservation.

Federal Indian School

Source: Records of Ziebach County Superintendent of Schools, 1940
As Figure 4 indicates, the costs per pupil in the schools of Ziebach county vary widely. Schools with the smallest enrollment show the greatest per pupil cost. The cost per pupil of operating the rural schools of Ziebach county ranged from $29 in the Johnson school of District 15, which enrolled nineteen pupils in 1940, to $156 in the Grondahl school of District 5, which enrolled only five pupils in 1940.

Table 1 (below) indicates that the operation of schools for less than ten pupils is excessively expensive on a cost-per-pupil basis. Schools with five or fewer pupils illustrate this sharply. The average cost per pupil for the schools in this group reached $121.55 as compared to the $64.61 average for all schools.

Table 1. Instructional Cost* per Pupil for Operation Schools of Various Sizes in Ziebach County, 1940

<table>
<thead>
<tr>
<th>Size of School</th>
<th>Number of Schools</th>
<th>Number of Pupils</th>
<th>Total Cost</th>
<th>Average Cost Per Pupil</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total**</td>
<td>62</td>
<td>275</td>
<td>$17,767.50</td>
<td>$64.61</td>
</tr>
<tr>
<td>Closed schools</td>
<td>31</td>
<td>---</td>
<td>---</td>
<td>---</td>
</tr>
<tr>
<td>5 or fewer pupils</td>
<td>6</td>
<td>29</td>
<td>$3,525.00</td>
<td>$121.55</td>
</tr>
<tr>
<td>6 - 10 pupils</td>
<td>15</td>
<td>113</td>
<td>$8,715.00</td>
<td>77.12</td>
</tr>
<tr>
<td>11 - 15 pupils</td>
<td>9</td>
<td>114</td>
<td>$4,987.50</td>
<td>43.75</td>
</tr>
<tr>
<td>16 or more pupils</td>
<td>1</td>
<td>19</td>
<td>$540.00</td>
<td>28.42</td>
</tr>
</tbody>
</table>

* Based on Teachers' salaries only

Source: Records of the Ziebach County Superintendent of Schools

** Federal Indian schools not included.

Note: "Several school houses were built after 1920 and at that time some of the Indian Day Schools were operated by the school district. The final complete change was made in about 1936 when the Indian Department took full charge of their schools. These schools have been operating full time since then." Correspondence from Lewis R. Shetnan, Superintendent of Schools for Ziebach county.
Figure 5. Cost of Maintaining Educational Facilities Before and After Closing Schools in District #1 and District #5 in Ziebach County

Legend: Before closing After closing

Source: Records of Ziebach county Superintendent of Schools

To reduce high per pupil costs, school districts throughout South Dakota have closed a large number of schools, during recent years, particularly those with diminishing enrollments. Since records indicate twenty-eight closed schools in Ziebach county, it is evident that this plan has been followed in this county.

During the 1938-39 school term, school operation costs for District 1 with seven schools in operation totaled $5,027.85. The following year two of these schools were closed and the pupils were sent to other schools in the district. That year school operation costs to the district were $3,464.11 or $1,563.74 less than the year before. A similar though smaller saving was made in District 5. During the 1938-1939 school term operating costs in this district were $2,105.90 with three schools in operation. The following year one of these schools was closed, reducing the operating costs for schools in the district to $1,421.48, which meant a saving of $684.42.

Since the cost per pupil increases and the educational efficiency decreases as the number of pupils attending school decreases, it seems practical both from the standpoint of economy and educational efficiency to close a school when the enrollment drops to five or fewer pupils.

* It is common knowledge among teachers that where there are only one or two pupils to a grade it is usually difficult to get students interested.
Figure 5. Areas From Which High Schools Draw Their Ziebach County Tuition Students, 1940

Legend:
- 0- Number of tuition students attending

○ Number of tuition students from each district

* Six students included on the Faith tuition list from Ziebach county without district numbers

** Glad Valley common district has three grades of high school level

Source: Records of Ziebach County High School Superintendents
Since 1921, school districts of South Dakota lacking high schools of their own have been required to pay tuition costs for their students who attend high school outside the district. Figure 6 shows the areas from which high schools drew their Ziebach county tuition students in 1940. Eighteen of these students attended the high school in Dupree while 37 attended high schools outside the county - some of them traveling to points 50 or 60 miles away.

Realizing that the cost of operating their own secondary schools would be prohibitive, the people of the districts of Ziebach county have adopted the policy of sending their students to high schools already existing in village centers. The adoption of a similar plan to elementary education seems practical to some extent, as enrollments continue to shrink and cost per pupil to mount. Rural schools could be closed and the remaining pupils sent to village schools, with the home district paying the tuition and transportation costs. Where distance makes this course impractical some form of centralized rural school may be a solution. If distances are too great for daily transportation, the dormitory plan for housing pupils might be used. Any of these plans would have the advantage of economy and of extending to farm children the superior educational facilities of larger rural schools or of town schools.

However, until the time that concentration of educational services in town or rural centers becomes more general, districts may well continue their policy of closing those schools in which enrollments fall below a minimum and of sending their pupils to the nearest rural school still operating.
Figure 7. Percentage Distribution of Elementary and Secondary Enrollments, by Grade Groups in Ziebach County, 1920 - 1940

Source: Biennial Reports of State Superintendent of Public Instruction

Between 1920 and 1940 the proportion enrolled in the first four elementary grades of Ziebach county shrank from 58.7 percent to 39.3 percent of the total elementary and secondary enrollment. The explanation of this trend may be found in the fact that birth rates have fallen sharply since 1920. Consequently with each passing year there have been fewer and fewer pupils to enter the first grade. In 1940 the proportions for first and eighth grades were 9.1 and 10.4 percent respectively as compared to 21.4 and 9.5 percent respectively in 1920. (See Table 2). With the greatly reduced number of persons under six years of age, it is obvious that elementary enrollment will continue to decline for a number of years even if the birth rate trend should be reversed.

The proportion enrolled in high school grades was almost five times as large in 1940 as in 1920, increasing from 3.9 percent to 17.5 percent. This trend may be explained by the fact that an increasingly greater proportion of eighth grade graduates are continuing their education in high school.

Table 2. Percentage Distribution of Elementary and Secondary Enrollment by Grades, 1920 - 1940

<table>
<thead>
<tr>
<th>Year</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
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<tbody>
<tr>
<td>1920</td>
<td>21.5</td>
<td>15.1</td>
<td>10.2</td>
<td>12.0</td>
<td>7.6</td>
<td>12.9</td>
<td>7.5</td>
<td>9.5</td>
<td>1.2</td>
<td>1.5</td>
<td>0.7</td>
<td>0.4</td>
</tr>
<tr>
<td>1925</td>
<td>19.6</td>
<td>11.1</td>
<td>11.2</td>
<td>12.7</td>
<td>9.9</td>
<td>11.3</td>
<td>12.0</td>
<td>5.2</td>
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<td>1.5</td>
<td>1.2</td>
<td>0.9</td>
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<tr>
<td>1930</td>
<td>13.9</td>
<td>10.0</td>
<td>12.4</td>
<td>10.1</td>
<td>11.9</td>
<td>12.2</td>
<td>10.9</td>
<td>9.4</td>
<td>4.2</td>
<td>2.6</td>
<td>1.6</td>
<td>0.8</td>
</tr>
<tr>
<td>1935</td>
<td>11.7</td>
<td>10.7</td>
<td>11.4</td>
<td>9.0</td>
<td>9.8</td>
<td>10.5</td>
<td>9.6</td>
<td>11.3</td>
<td>7.1</td>
<td>3.5</td>
<td>3.0</td>
<td>2.6</td>
</tr>
<tr>
<td>1940</td>
<td>9.1</td>
<td>10.2</td>
<td>8.9</td>
<td>11.1</td>
<td>12.1</td>
<td>9.9</td>
<td>10.8</td>
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<td>6.3</td>
<td>4.3</td>
<td>3.2</td>
<td>3.2</td>
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</table>

Source: Biennial Reports of State Superintendent of Public Instruction, 1920, 1925, 1930, 1935 and 1940.
How Certain South Dakota Rural Communities Are Successfully Solving the Declining Enrollment Problem

School boards confronted with the problem of declining enrollments should study their local situation carefully before taking action. The four plans listed below have all been tested by different South Dakota communities and have been found practical. One or the other of the first two alternatives has frequently been used as a temporary measure until further action was necessary. The last two plans are in the nature of a more or less permanent reorganization of the present rural district system.

Cooperating with nearby rural schools

When enrollment has dropped to five or fewer pupils certain districts have kept their district organization intact but have closed one or more schools. In cases where all schools of the district have been closed, the remaining pupils have been sent to the nearest adjoining rural school where satisfactory arrangements for tuition and transportation could be made.

Tuition pupils to town schools

Where satisfactory arrangements could not be made with nearby rural schools, the remaining pupils have been sent as tuition students to the nearest independent school in village or town. This plan is frequently no more expensive than the first, but has the further advantage of better educational experience than is usually possible in the one room school. In effect, it is essentially the same method which has been successfully used in sending farm children as tuition pupils to high school.

Consolidation

Where the second plan has been in operation for a number of years, town and nearby country districts have frequently consolidated into a single district. Such a plan has many advantages, but should first be tried out informally as a centralized school system before determining the details of consolidation.

County-wide district plan

In at least one west river county a county-wide district plan is now in operation. Under such a plan one county school board determines the location of rural schools and can regulate the number of such schools to fit in with the enrollment trend.