

ARKANSAS CONTEXT

Much scholarly and public debate has centered on whether consolidation of small schools is positive, negative, or neutral for student academic achievement, student social development, and funding efficiency. In an attempt to derive lessons from the research on this issue, we investigated evidence related to: (1) school district consolidation and school size, and (2) spending and academic performance data for schools and districts in Arkansas.

WHAT DID WE FIND FROM THE RESEARCH LITERATURE?

Unfortunately, the review of the literature revealed little direct evidence as to the potential impacts of school consolidation. The literature does contain numerous scholars offering opinions and commentary about the possible academic, social, and fiscal effects of consolidation; however, only a handful of studies have rigorously evaluated schools or districts before and after consolidation.

Notwithstanding, the literature on optimal school size does provide guidelines for the debate. Here we find an emerging consensus that high schools with enrollments below 400 or above 900 are outside of the “optimal” range, meaning generally those schools are either more costly or produce poorer academic and social outcomes—or both—than do schools within the range.

WHAT DID WE FIND FROM THE ARKANSAS DATA?

The research literature suggests that high schools with enrollments in the range of 100, 200, and 300 students are not within the optimal range. The data on Arkansas schools show that nearly 70 percent of the state’s high schools have enrollments below 400 and that Arkansas’ high schools are small compared to other high schools in the United States. While the average enrollment for high schools around the nation is more than 785, the average Arkansas high school enrolls only 401 students. In addition, more than 33 percent of the nation’s high schools enroll over 600 students, while slightly over 15 percent of Arkansas high schools are that large.

With respect to cost, Arkansas’ smallest schools have the highest average per-pupil funding levels and offer the lowest teacher salaries in the state (see Figure 1). For example, high schools with fewer than 100 students are in districts with average expenditures per pupil of \$8,235 and average teacher salaries of \$29,875. Compared to Arkansas’ largest high schools, where the average per-pupil expenditure is \$6,669 and the average teacher salary is the highest in the state at \$40,470, the smallest high schools are quite costly yet pay teachers the least. The U-shaped per-pupil spending curve in Figure 1 shows that schools with enrollments between 300 and 900 students have the lowest levels of expenditures per pupil in the state.

However, the findings were not so clear with respect to academic performance. While the students in larger high schools fare better in terms of standardized exams and college remediation rates, these students also exhibit lower rates of poverty. After controlling for differences in socioeconomic status, our analyses revealed no relationship between school size and school performance on any academic measures. Hence, it is not clear that either small schools or large schools are superior in terms of academic performance.

WHERE DOES THIS LEAVE US?

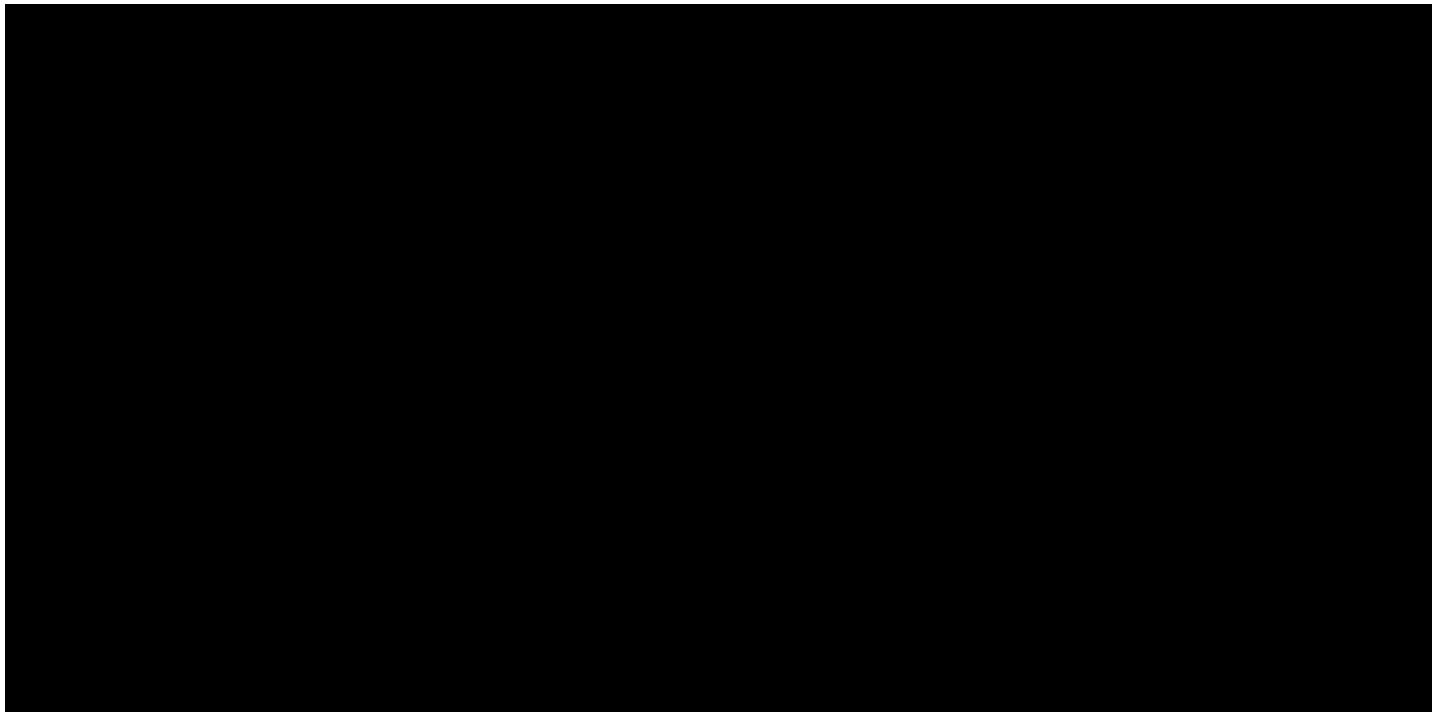
The academic literature in this area – and perhaps common sense – suggests that it would be quite difficult for a high school with approximately 300 students (or fewer) to offer a full and rich curriculum.

We conclude that many Arkansas schools – those with enrollments in the range of 300 or below – should be considered prospective candidates for consolidation. The use of the term "candidate" is intentional.

For these candidates, all of the potential costs and benefits of a potential consolidation should be considered. After such consideration, reasoned decisions can be made regarding whether or not these schools should be consolidated or merged into “regional” schools. Arkansas should view consolidation, however, as one potential reform strategy, but not one that will solve all of the state’s educational problems.

Finally, we should not overlook the fact that the consolidation debate focuses on students in grades 9-12 in relatively small high schools. These students comprise no more than approximately 15% of the total state enrollment. Consequently, we conclude that all of the clamor surrounding consolidation – which, after all, is only one possible policy option for a small group of students – may be distracting the policymakers and the public from the larger question, namely, how do we provide a constitutionally equitable and adequate education to the state's 450,000 school children?

Figure 1: High School Size, School District Spending, and Teacher Salary in Arkansas, 2001-2002 and 2002-2003



This complete study can be found at http://www.uark.edu/ua/oepp/Working_Papers/Consolidation.htm or by contacting the Office of Education Policy at the University of Arkansas at (479) 575-3773.

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