Challenges, Assets, and Innovations: Considerations for Secondary Education in Rural Communities
April 2010

“For all the uniqueness of rural and small town districts, they share a lot of the challenges of urban districts. Surveys suggest that rural high school students are more likely to use cocaine and meth and abuse alcohol than their urban peers. Teen birthrates are higher in rural areas than urban ones. More than one-fifth of the nation’s poorest-performing high schools, the so-called dropout factories, are located within rural regions. In short, today’s rural schools are not the pastoral institutions of a simpler yesteryear that many Americans imagine.”

- Secretary of Education Arne Duncan, addressing school superintendents on 2/12/10

A Timely Look at Rural Schools

As Secretary Duncan’s comments underscore, the most alarming challenges plaguing urban school districts are shared by rural school districts across the country. The overall U.S. high school graduation rate is 73.1% among rural students. Nationwide, nearly half of all operating school districts are in rural areas, and 10 million children—approximately one-fifth of the nation’s student population—attend a rural school. Rural school enrollment is accelerating, and in recent years enrollment in rural districts increased by 15% while total school enrollment increased by a mere 1%. As unprecedented funds from the American Recovery and Reinvestment Act (ARRA) flow to states and school districts and as policy priorities for the reauthorization of the Elementary and Secondary Education Act (ESEA) are being solidified, it is a critical time to examine the particular challenges, assets, and innovations present in secondary rural education across the country.

“Rural” encompasses a diversity of school settings across the U.S. Many rural communities are situated in large, mostly urban states where rural residents comprise a small percentage of the total population. Whereas these states generally have less rural poverty and fewer rural minority students, smaller rural states, particularly those in the Southeast and Southwest, tend to have higher rural student poverty and more student diversity. Examples of rural schools include schools in affluent New England towns, large majority-Hispanic high schools in the American Southwest, and impoverished schools in remote areas of Appalachia.
Though there is a vast range of rural school settings and the challenges of rural education are varied, there are some characteristics common across many rural school districts nationwide. Rural districts tend to be smaller than urban and suburban districts, as they serve fewer students. A majority of rural districts have a small and often shrinking tax base, resulting in lower general resources for school funding and support of other public services in the community. Also common across many rural areas is the shift in local economies as traditional industries have disappeared and larger employers have moved out of communities. The result is often the “brain drain” of young people who are educated in local systems and then leave the community to pursue further education or broader career options. Also shared among rural districts are the challenges inherent in providing transportation for students across sometimes vast geographic areas. On the other hand, the remote nature of many rural schools means that the local community is often close-knit. Students and families are known by teachers and administrators, and schools are seen in many areas as the center of community life.

What is Rural?

Under the National Center for Education Statistics locale code classification system, school districts are identified as City, Suburban, Town, and Rural. Each type has three sub-categories. Areas classified as Rural are further sub-classified as Fringe, Distant, and Remote. A Rural classification is assigned to a school or district based on the school’s physical proximity to an urbanized area or urban cluster, as defined by census data. Urbanized areas are core areas with a population of 50,000 or more, and urban clusters have a population between 2,500 and 50,000.

AYPF Field Trip: Spotlight on North Carolina

The American Youth Policy Forum, with funding from the Bill & Melinda Gates Foundation, brought a group of federal policymakers to North Carolina in February 2010 to learn about the challenges and realities of providing high quality education to rural students. This study mission was an opportunity for Congressional staff, officials from the U.S. Department of Education, and representatives of national education organizations to have conversations about rural education with state policy officials, program administrators, district-level leaders, post-secondary partners, high school educators, and students. Our trip to North Carolina highlighted rural education in one state and set of districts that exist among the range of rural education settings nationwide.

North Carolina was a fitting backdrop for discussions of rural education: more students are enrolled in rural schools in North Carolina than in any other state. Rural education in North
Carolina occurs within a larger state context that is exemplary in its use of technology for expanding access to courses across the state and also for the widespread opportunity for students to earn postsecondary credits at no cost while in high school through the Learn and Earn initiative. North Carolina is also a leader in its implementation of new models of high school redesign, which include smaller school models such as Early College High Schools and STEM-focused schools. Many of these smaller school models have been opened in rural communities.

Our study mission to North Carolina included visits to two high schools that are engaging students in education in innovative ways. We had the opportunity to meet with two additional superintendents from school districts in geographically diverse areas of the state. Site visits were made to Warren New Tech High School in Warren County and Sampson Early College High School in Sampson County, and superintendents from Bertie County and Wilkes County traveled to Raleigh to meet with our group of policymakers. Our conversations with district and school leaders, teachers, students, and members of the community in these different regions of the state brought to light a number of instructional approaches, school improvement strategies, teacher training and development practices, leveraging of partnerships, and innovative uses of technology that are being utilized to strengthen education in rural areas.

**Key Issues Affecting Rural Education Nationwide**

There are a number of key issues related to rural education across the country that have important implications for policy at the local, state, and federal levels. Our study tour of North Carolina provided helpful examples of how many of these key issues play out on the ground at the state level and in rural communities.

**Key Issue #1**  
**Federal Funding May Favor Urban and Suburban Districts**

Federal funding formulas, particularly those for Title I funding, put many rural school districts at a disadvantage to suburban and urban districts that serve larger numbers of students. In particular, one of the Title I formulas, though intended to bolster funding for schools serving low-income students, uses weightings for each district that are based on either the number or the percentage of children who are from families below the poverty level. Since rural districts tend to enroll fewer students, they may not stand to benefit from “number weighting” to the same extent as urban and suburban districts. The result is that small rural districts may receive a smaller percentage of their funding from the federal government.

**Key Issue #2**  
**Rural Schools Utilize Partnerships across Regions, Districts, and Sectors**

Rural schools rely on partnerships with other districts, organizations, and postsecondary institutions to expand their resources and capacity for providing a range of educational options. Bill Harrison, Chair of the State Board of Education in North Carolina, underscored that rural education can be strengthened if regions work collaboratively to share resources. Opportunities in North Carolina for postsecondary credit attainment by rural high school students depend on partnerships with local community colleges and between neighboring counties. Several of the early college high schools we
learned about in North Carolina serve students in multiple counties. Also, community assets should be utilized to improve education in rural areas. Expanded learning opportunities are often limited in rural settings because communities lack individuals with appropriate training to lead such programs. Rural communities may be able to increase their capacity for such programs by tapping into community-based assets. We met longtime residents of Warren County who are engaged in work ranging from weekend tutoring to place-based activities such as quilting circles to teach younger residents about the local history. The local library in Warrenton was described as the center of the community, and a venue for many community-based activities for students.

The private sector can also play a key role in supporting and improving rural education. Business investment in technology and infrastructure in schools can greatly enhance the tools rural educators have in order to produce high quality graduates with skill sets aligned with today’s jobs. Workforce needs should drive education in many respects, and rural educators must have a well-informed understanding of how education should fit with the needs of the workforce. One organization in North Carolina making connections between secondary education and workforce development is the North Carolina Rural Economic Development Center (the “Rural Center”). A central component of this non-profit organization, funded with both private and public dollars, is to work with rural communities to collect relevant evaluation data that will show potential employers the return on investment for engaging in communities and schools. The Rural Center advocates among the business sector for cooperative education placements, apprenticeships, and summer youth employment jobs that benefit youth.

Key Issue #3
Technology is at the Heart of Innovation in Rural Schools

Access to technology has the ability to vastly expand the resources of a rural school district. In the words of Steve Laws, Superintendent of Wilkes County in the Appalachian Mountains of North Carolina, “technology is the great equalizer.” Wilkes County, with the support of Lowe’s, is working to supply laptop computers to every student in 6th to 12th grade. Wilkes County has also invested in Smart Board technology in its classrooms to enable new interactive learning opportunities, and will use video streaming to connect elementary students with a Spanish teacher outside of the district in order to save the expense of a full-time teacher. It is important to note that equipping schools with broadband Internet access is often a challenge in rural communities, and particularly in those not wired for this type of service. Partnerships with businesses that can expand broadband access have been critical in areas such as Bertie County, where Title I funding has been used to engage Century Link to provide such access to the entire county. In tandem with this expansion of service, a program called “Connect Bertie” has utilized $750,000 from the Golden Leaf Foundation to purchase desktop computers for home use by students and their families.

We heard from educators and policy officials alike that virtual education is a critical mechanism for providing instruction in rural areas. This is one strategy for providing higher-level academics, college-level coursework, and instruction in a range of topics that a rural district might otherwise lack. North Carolina has statewide access to virtual coursework through the North Carolina Virtual Public School. The delivery model for virtual coursework varies in North Carolina, and ranges from virtual, in-person, and blended instruction, depending on the capacity of the local district. Postsecondary credit is available at every public high school in North Carolina through the state’s Learn and Earn initiative, largely facilitated via virtual coursework.
Key Issue #4

There are Unique Teacher Pipeline Considerations in Rural Areas

Pay for teachers is generally lower in rural areas than in more urbanized areas, which poses an obvious challenge to attracting teachers into rural areas. In addition, teachers in smaller rural districts are often required to teach in multiple subject areas. Our nation’s teacher preparation programs are not designed to teach these specialized skill sets for rural educators. Such teachers may also have trouble meeting the No Child Left Behind requirements to be considered a “highly qualified teacher” in a content area at the secondary level. Because of the difficulty attracting top candidates from teacher preparation programs, rural communities often rely on “grow-your-own” approaches to bolster the pool of qualified teachers. North Carolina is an incubator for several grow-your-own teacher approaches that create a pipeline to deliver committed, high quality teachers to rural schools. In Bertie County, for example, the district has created a partnership with Shaw University to pay the cost of teacher training for local high school graduates in exchange for five years of service in the community after certification. In addition, the Office of Teacher Education at East Carolina University has two targeted programs—the Latham Clinical Schools Network and the Wachovia Partnership East—to address the challenges of recruiting teachers to rural school districts in a state that also offers broad urban and suburban options for teachers. The Wachovia Partnership East focuses on recruiting mid-career professionals who are established residents in the targeted communities to the teaching field. These models, like other similar innovations across the country, are an essential component of equitable teacher distribution in all geographic areas.

Though it is often the case that rural districts lose teachers to higher paying districts in the state, the educators we met in the schools visited were deliberate in their choice to teach in a rural community. Many teachers were native to the area, had moved away, and had recently come back home as a way to invest in the community. As the two high schools we visited had a strong specialized focus, teachers were drawn to these rural schools by the opportunity to teach in a particular educational setting (i.e. an early college or project-based learning environment). The leadership of Sampson Early College High School told our group that recruiting teachers to this rural community has been about “selling the overall package” of a small town, a small school environment, a close teacher community, and the ability to move up the career ladder quickly. Warren New Tech has broadened its available talent pool by employing several Teach for America teachers. When asked about how professional development is delivered, educators in rural schools told us that their ongoing learning was enhanced through professional learning communities and by flexibility granted by administrators to seek out professional learning opportunities beyond the school system.

Key Issue #5

Transportation is a Central Challenge in Rural Education

A geographically diffuse county or district translates into long commutes to and from school for students and is a key challenge for school administrators in terms of both cost and feasibility for offering expanded learning opportunities to students beyond the school day. This is especially pronounced in rural districts with school choice such as Warren County, where buses are shared among several schools. Students at Warren New Tech High School told our group of commutes to school that lasted up to 2.5 hours on the bus each way. In many parts of the country, innovations do exist to use transportation time productively as learning time, such as wireless-equipped buses and docking stations for iPod touch technology that is used in the classroom.
Key Issue #6
Agricultural Education is Evolving in Rural Areas

Many rural communities have experienced the loss of large employers that have left communities in favor of more urbanized areas. In communities with a strong presence of farming, agricultural science has evolved, and the skills necessary for young people to build productive careers in agricultural trades have also evolved. Cooperative extension programs, 4H centers, and Future Farmers of America (FFA) continue to play a significant role in rural education. The Department of 4H Youth Development and Family & Consumer Sciences at North Carolina State University, for example, is responsible for ensuring that the agricultural science courses taught in classrooms in rural America are informed by cutting-edge science in laboratories and universities and are relevant to jobs in today’s economy. This effort at NC State is supported by an $800,000 per year investment by the state legislature for STEM (Science, Technology, Engineering and Math) innovation. In Bertie County, an early college high school focused on agribusiness was recently opened. Bertie Early College High School will be a five-year program that grants students a two-year degree from North Carolina State University and is designed to award college credit in science and technology fields relevant to the local economy.

Key Issue #7
Innovative School Models Exist in Rural Areas

A commitment to school redesign in North Carolina has spurred the creation of many smaller, more specialized schools across the state, including in rural areas. AYPF met with several district leaders who are creating school choice in rural areas by expanding the range of options in areas previously limited to traditional high school models. Warren County, which opened its first redesigned high school in 2007, now enrolls students at an Early College High School, a New Technology High School, and a traditional high school. Sampson County, the site of Sampson Early College High School, is a rural county that has expanded access to college coursework for students through a partnership with Sampson Community College. Many of North Carolina’s innovative models were implemented with the assistance of the North Carolina New Schools Project, a statewide resource for technical assistance which collaborates with both rural and urban schools undergoing redesign. Many of the state’s Early College High Schools and STEM-focused high schools were opened in partnership with this entity, funded jointly by the state and foundation funding. While redesigned schools in rural districts provide diverse opportunities for students, it is unclear what the long-term effects are on traditional high schools in these same districts that are not redesigned. This AYPF study mission did not include visits to traditional high schools, where the majority of rural students still attend.

How Current Federal Policy Priorities Affect Rural Education

In many regards, the current federal education reform priorities articulated by the U.S. Department of Education in ARRA, including the Race to the Top competition and more recently the $3.5 billion and $900 million additionally proposed for school turnaround, do not consider the unique circumstances of rural districts. Similarly, the Obama Administration’s Blueprint for Reform sets forth policy priorities for the reauthorization of ESEA that raise questions about the impact these policies would have on rural school districts. Some considerations include:
**Competitive versus Formula Funding:** President Obama’s current budget proposal that would consolidate many previously distinct funding streams into fewer funding streams that would be competitive is of great concern to state and local leaders representing rural communities. At the local level, the need to apply for competitive funding would put disproportionate strain on rural LEAs, where the staff capacity for completing applications simply does not exist. The $650 million in funds available through the Investing in Innovation (i3) program are only available to districts that apply with a partner organization and obtain a 20% match from the organization for any federal funds received. June Atkinson, Superintendent of Public Instruction in North Carolina, predicted that many rural districts will therefore not apply. Dr. Atkinson cited this as an illustration why a balance between competitive and formula funding is important.

**Turning around Low-Performing Rural Schools:** The options set forth in ESEA for school reform, such as school turnaround, need to consider the unique challenges of rural education and the supports that are necessary for turnaround to succeed. Turning around low-performing schools requires a vast range of resources that are often sparse in rural communities. Aside from the investment of financial resources necessary, it is difficult to replace existing school leaders and teachers from small communities with few trained educators, and to provide the intensive professional development necessary to sustain such reform. Incentives must be considered to draw new teachers and leaders to rural schools implementing a turnaround model. Turnaround also requires significant technical assistance, which often comes from working with a third party organization with specialized expertise. These organizations, which may include charter management organizations (CMOs) or non-profit intermediary organizations, rarely have a presence in rural America.

**Equitable Distribution of Effective Teachers:** The Blueprint recommends that states rate teachers and principals based on student test score growth. Districts would then need to design plans for equitable distribution of teachers rated “effective” based upon these measures of student growth. This is similar to efforts in No Child Left Behind to address the distribution of high quality teachers. If teachers not deemed effective based upon student performance will need to be replaced, rural districts would not have the same ability to recruit and retain high quality teachers as would more urbanized districts. Rural districts already face the challenge of attracting teachers from surrounding areas that have a higher tax base and can pay teachers higher salaries.

**Conclusion**

Rural schools operate in a vast range of geographic, cultural, and economic settings across different regions of the U.S. Often common across rural education systems are limited resources, in terms of both school funding and the ability to recruit and retain strong teachers and leaders. Transporting students across large geographic areas is costly and time-consuming and generally an obstacle to
providing expanded learning opportunities beyond the school day. The assets in rural communities, however, are not to be underestimated. Rural schools are often regarded as the center of the community, which enables broader school involvement in the lives of students and families. District leaders are innovative in their use of federal, state, and local resources, and leverage partnerships with businesses, community-based organizations, and postsecondary institutions to enable diverse learning options for students. Rural districts are resourceful in the use of technology to expand course options and educational opportunities beyond the classroom, and also to enhance professional learning opportunities for teachers. Agricultural education remains important in rural areas, and is continually evolving through the support of longstanding national programs such as 4H and FFA. Policymakers must consider both these challenges and innovations common in our nation’s rural education systems at this critical time when ARRA funds continue to be distributed and as the reauthorization of ESEA approaches.

---


vii Rural, Fringe areas are rural territories less than or equal to 5 miles from an urbanized area, as well as those less than or equal to 2.5 miles from an urban cluster. Rural, Distant areas are rural territories more than 5 miles but less than or equal to 25 miles from an urbanized area, and those more than 2.5 miles but less than or equal to 10 miles from an urban cluster. Rural, Remote areas are rural territories more than 25 miles from an urbanized area and those more than 10 miles from an urban cluster.