I. Introduction

A study in 2000 identified several key policy issues that impact access to pharmacy services in rural areas including: pharmacy staffing and relief coverage; alternative methods of providing pharmacy services; the financial viability of rural pharmacies; and the potential impact of a Medicare prescription benefit.\(^1\) Nine years later, even with the implementation of Medicare Part D in 2006, these issues remain and access to pharmacy services in rural areas is far from guaranteed. Pharmacists are in short supply across the nation, more so in rural communities and competition to fill vacancies is fierce. Even with increasing numbers of training programs pharmacist shortages are projected to continue.\(^2\) The financial viability of many rural pharmacies is questionable. Rural communities are served by a higher proportion of independent retail pharmacies which are dependent upon prescription sales for the majority of their revenue making them vulnerable to cuts in reimbursement.\(^3,4\) Medicare Part D, to date, has been a mixed blessing for rural areas providing pharmaceutical benefits to elderly persons formerly without prescription coverage but at the same time increasing the financial and administrative challenges for many rural pharmacies.\(^5\)

II. Reimbursement Methodology

Reimbursement for prescriptions is based on a payment rate for the drug dispensed plus a dispensing fee. These rates and dispensing fees are set by pharmacy benefit managers (PBMs) and insurance companies and may or may not cover a rural pharmacist’s actual acquisition cost for a particular medication or the overhead associated with operating his or her store. PBMs negotiate contracts between health care plans and pharmacies. They are neither regulated nor transparent, and they hide their profits – which they make through steering patients to the drugs from which they make the most money on manufacturer rebates, at the expense of quality health care.

Rural independent pharmacies have little leverage with which to negotiate with PBMs or insurers and are usually unable to amend contract terms. This makes contracting with payers a “take it or leave it” scenario where declining some contracts may limit beneficiary access in rural communities but accepting the contract “as is” may not be in the financial best interests of the pharmacy.\(^6\) Through an irony of antitrust law, PBMs and even health care plans enjoy the benefits of prohibiting small independent community pharmacists from working together to negotiate fair reimbursements for their filled prescriptions. The intent of antitrust law is to prevent monopolies and near-monopolies, which dominate an industry by holding all the bargaining power. This intent is thwarted by the lack of an exemption in antitrust law, which, if granted, would allow rural independent pharmacies to negotiate on a level playing field with PBMs and result
Rural independent pharmacies are dependent upon prescription sales which account for over 90% of their total revenue. And with 89% of sales made to patients with insurance coverage (Medicare, Medicaid, private) which predetermine reimbursement rates shifting unreimbursed costs to cash-paying patients, especially lower income uninsured patients, is not practical.\textsuperscript{7,8} Rural pharmacies are also unlikely to generate enough sales on non-prescription items to offset any losses from prescription sales. Like most health care providers, personnel costs are the single largest expense for rural independent pharmacies. With average total expenses of 20.2\% (of which payroll expenses are 13.7\%), it takes an average of more than 4,900 prescriptions per month just to break even.\textsuperscript{9} Because of the need to generate volume, pharmacists rarely decline a prescription sale, even when the reimbursement is less than their cost.

The current reimbursement methodology, based primarily on drug acquisition costs, does not take into account the realities of rural retail pharmacy practice where medications cannot be purchased at the discounted prices available to large retail chains and where lower population densities may not generate the sales volume necessary to adequately cover operational expenses.

### III. Importance of Pharmaceutical Care

The U.S. healthcare system relies heavily on the use of prescription medications to control chronic conditions. Patients are likely to be taking multiple medications for a variety of conditions, often prescribed by different providers:

- 82\% of the U.S. population reported using at least one prescription medication, over-the-counter medication, or dietary supplement in the previous week; and
- 30\% reported using five or more of these drugs in the previous week.\textsuperscript{10}

As medication use has become a more common treatment strategy, increases in the degree of morbidity and mortality due to medications have been documented:

- 1.5 million people are injured each year as a result of medication;
- nearly 25\% of ambulatory patients reported adverse drug events (ADEs); and
- "...for every dollar spent on ambulatory medications, another dollar is spent to treat new health problems caused by the medication."\textsuperscript{11}

There is a difference between dispensing drugs and providing pharmaceutical care. As the above statistics illustrate patients need more than just access to drugs, they also need access to pharmaceutical care, that integrates clinical pharmacy services, improving patient safety and health outcomes. Clinical pharmacy services are defined
as: Patient-centered services that promote the appropriate selection and utilization of medications with the objective to optimize individual therapeutic outcomes. Clinical pharmacy services are provided by an inter-professional health care team through individualized patient assessment and management. These services are best provided by a pharmacist or by another healthcare professional in collaboration with a pharmacist.

IV. Workforce

While a 2008 Bureau of Health Professions report found the overall supply of pharmacists is growing faster than earlier estimates predicted they acknowledged that rural areas remain “hard-to-employ” locations. Many obstacles prevent pharmacists (like other health care providers) from locating in small and rural communities. This mal-distribution of pharmaceutical care hurts rural areas.

A more detailed discussion of rural pharmacy workforce issues can be found in NRHA’s previous policy paper, “Recruitment and Retention of a Quality Health Workforce in Rural Areas – The Rural Health Careers Pipeline: No. 3 Pharmacists and Pharmacy Technicians.”

V. Pharmacist Services in RHCs & FQHCs

Rural health clinics (RHCs) and Federally Qualified Health Centers (FQHCs) are critical components of the rural healthcare safety net. These providers serve large numbers of uninsured, Medicare, and Medicaid patients across rural America. When these programs were established, CMS designed their Medicare and Medicaid reimbursement structure to specifically provide payment for primary care services provided by nonphysician practitioners (FNPs, PAs). Over the years CMS expanded the definition of nonphysician practitioners to include certified nurse midwives, licensed clinical social workers, and clinical psychologists. While RHCs and FQHCs can be reimbursed for dispensing medications (i.e., operating an in-house pharmacy), they cannot bill for clinical pharmacy services. To fully integrate clinical pharmacy services into RHCs & FQHCs pharmacists need to be recognized by CMS as “nonphysician practitioners.” Without the ability to bill for clinical pharmacy services the ability of these safety net providers to meet their potential in reducing adverse drug events and optimizing the outcomes of chronic medication therapy will be severely limited.

VI. Recommendations

Issues around reimbursement, workforce, and recognition of the role of pharmacist as a distinct provider of clinical services all need to be addressed to ensure access to appropriate pharmacy care in rural areas. The following recommendations seek to address these issues and strengthen access to clinical pharmacy services in rural America.
Payment Recommendations

1. Transition from a payment system based mainly on product-based reimbursement to one that includes appropriate payment for professional services and management of the medication use system.

2. Allow rural independent pharmacies a narrow exemption to antitrust law in order to approach the leverage that much larger chain pharmacies have when negotiating their Medicare Part D and other third-party contracts.

3. Address the payment system for provision of drug product and increase cost-savings by promoting generics not by underpaying pharmacies. Some 90 percent of savings expected from the Deficit Reduction Act are anticipated to come from lower payments to pharmacies. The greatest savings should come from prescribing and dispensing generics, not from underpaying pharmacies for generic prescriptions (and inadvertently creating disincentives to dispense generics).

4. Develop fair payment rates for Medicare and Medicaid that cover actual acquisition costs, dispensing and operating costs and a reasonable return on investment. Payments must be set high enough to ensure the ongoing presence of pharmacy care providers. To minimize impact on the federal budget, such a policy could be targeted towards a subset of pharmacies that are identified as essential for local access.

5. AMP must differ from best price. If AMP is to represent the price of drugs bound for the retail pharmacy class of trade, it should include and exclude components according to their impact on the acquisition price actually paid by the retail pharmacy class of trade.

6. Adjust payments yearly to account for changes in price/costs. Inflation, supply and demand, and technology affect the price/cost of pharmacy products and pharmacy care. Payment rates, therefore, should be updated annually to account for changes.

7. Work with Congress and CMS, in collaboration with HRSA’s Office of Pharmacy Affairs and Office of Rural Health Policy, to expand the Medicare definition of “nonphysician practitioners” in RHCs and FQHCs to include clinical pharmacists.
Workforce Recommendations

1. Provide loan forgiveness for pharmacists serving in underserved areas. The average pharmacy student graduates with $100,000 in loan debt. Loan forgiveness programs like those offered to other medical professionals could increase the number of pharmacists practicing in rural communities.

2. Develop and promote rural training and residency tracks for pharmacy students. Similar to other health care providers, pharmacists are most likely to locate in settings with which they are familiar and comfortable.

3. Support the inclusion and integration of pharmacists within rural hospital and health networks. Medication error rates decrease when a pharmacist is part of inter-disciplinary teams. However, rural hospitals with low daily patient census counts may find it difficult to justify the cost of a full-time pharmacist. Encouraging networks providing remote pharmacist services to multiple facilities is one way to leverage access to clinical pharmacy services in a more cost-effective way.

Research Recommendations

1. Monitor the financial health of pharmacies with a higher than proportionate share of Medicaid prescriptions and those in rural or low-income areas. Once closed, pharmacies are difficult to reopen. Therefore, it is essential to avoid the loss of pharmacies identified as critical access points.

2. Develop and make available the data needed to conduct county-level insurance plan-specific studies. Such data are necessary to assess whether rural patients are receiving benefits comparable to their urban counterparts.

3. Conduct a long-term panel study of rural Medicare Part D beneficiaries regarding cost and benefit options as compared to their urban counterparts.

4. Conduct a study of the clinical value of the rural pharmacist. The IOM states that “...for every dollar spent on ambulatory medications, another dollar is spent to treat new health problems caused by the medication.” Documentation of savings resulting from the provision of clinical pharmacist services in rural areas is needed.

5. Conduct case studies of rural pharmacy closures over time and from them develop prospective risk assessment tools. It is important to know exactly why pharmacies close and, more critically, how to identify which pharmacies are at
risk and what can be done to prevent closure.

6. Evaluate alternative models to pharmacy practice. With current communication technologies, the ability exists to access cognitive pharmacist services in rural remote settings where a pharmacist is not available. State Boards of Pharmacy should be encouraged to promulgate rules and regulations allowing for increased access to cognitive pharmacist services through alternative delivery mechanisms, including national models for the provision of cognitive pharmacist services across state lines without multiple state licensures.
Bibliography


7. See note 4.


9. 2008 NCPA Digest.


12.“The Adequacy of Pharmacist Supply 2004 to 2030” Department of Health and Human Services, Health Resources and Services Administration, Bureau of Health Professions December 2008.

13. See Note 11