The April 2015 passage of the Medicare Access and Children’s Health Insurance Program Reauthorization Act is accelerating the move of the US health care industry from traditional fee-for-service provider payments to alternative payment methods that are focused on value rather than volume of services. Medicaid, private employers, and consumer groups are also developing similar payment models. Learning from the experience of the 27 early accountable care organizations in North Carolina, such as Cornerstone Health Care, will help to accelerate the transformation that will be necessary across the health care delivery ecosystem in our state.

In April 2015, President Obama signed into law the Medicare Access and Children’s Health Insurance Program Reauthorization Act, which had been passed by a near-unanimous vote in both houses of Congress. This legislation will accelerate the pace of changes occurring in the US health care industry by moving us from traditional fee-for-service provider payments to alternative payment methods focused on value rather than volume of services. Since the 1970s, Congress and successive administrations have attempted to lower the cost of care through a variety of methods, including diagnosis-related group (DRG) codes, health maintenance organizations (HMOs), and no reimbursement for “never events.” However, costs have continued to rise, care has remained fragmented, and quality has remained variable. What was not addressed in earlier efforts was the linkage of costs to outcomes—and the subsequent linkage of payment to outcomes—which is at the heart of value-based payment models.

With passage of the Patient Protection and Affordable Care Act (ACA) of 2010, incremental steps to move to value-based payment models were set in motion through the various initiatives of the Center for Medicare and Medicaid Innovation. This center was given authority to implement a number of value-based payment models (see Table 1), including patient-centered medical home (PCMH) models, bundled payments, and accountable care organizations (ACOs). In 2015, the Centers for Medicare & Medicaid Services (CMS) announced the goal of increasing

| TABLE 1. | Value Portfolio From the Centers for Medicare & Medicaid Services (CMS) |
| --- | --- |
| Accountable Care Organizations (ACOs) | Medicare Shared Savings Program (Center for Medicare) |
| | Pioneer ACO Model |
| | Advance Payment ACO Model |
| | Comprehensive ESRD Care Initiative |
| Primary Care Transformation | Comprehensive Primary Care Initiative (CPC) |
| | Multi-Payer Advanced Primary Care Practice (MAPCP) Demonstration |
| | Federally Qualified Health Center (FQHC) Advanced Primary Care Practice Demonstration |
| | Independence at Home Demonstration |
| | Graduate Nurse Education Demonstration |
| Bundled Payment for Care Improvement | Model 1: Retrospective AcuteCare |
| | Model 2: Retrospective Acute Care Episode & Post Acute |
| | Model 3: Retrospective Post Acute Care |
| | Model 4: Prospective Acute Care |
| Capacity to Spread Innovation | Partnership for Patients |
| | Community-Based Care Transitions |
| | Million Hearts |
| Health Care Innovation Awards | State Innovation Models Initiative |
| Initiatives Focused on the Medicaid Population | Medicaid Emergency Psychiatric Demonstration |
| | Medicaid Incentives for Prevention of Chronic Diseases |
| | Strong Start Initiative |
| Medicare-Medicaid Enrollees | Financial Alignment Initiative |
| | Initiative to Reduce Avoidable Hospitalizations of Nursing Facility Residents |

Note. ESRD, End-stage renal disease.
Source: Innovation Center. CMS.gov website. https://innovation.cms.gov. Accessed February 29, 2016.
the percentage of Medicare payments in alternative payment models from 20% in 2014 to 50% in 2018, with the additional goal of tying 90% of all payments to quality or value by 2018. CMS recently introduced the Comprehensive Care for Joint Replacement Model, which made it mandatory in certain areas—including the Charlotte market—to receive bundled payments for certain joint replacement procedures from initial hospitalization through 90 days post-surgery.

Medicaid reform is also accelerating at the state level. The ACA included nearly $30 billion for Delivery System Reform Incentive Payment waivers to encourage Medicaid programs to advance efficiency and population health. In his State of North Carolina address on April 3, 2013, Governor Pat McCrory emphasized that, “Medicaid reform is long overdue and essential for the future health of North Carolina” [1]. House Bill 372, which passed the North Carolina General Assembly in October 2015, reforms North Carolina’s $14 billion Medicaid program by moving providers to risk-payment models.

As these government payment models change, private employers and consumer groups are beginning to develop similar payment models. The Health Care Transformation Task Force—a 28-member group of providers, employers, and payers—has committed to moving 75% of its members’ health care payments to value-based payment methods by 2020 [2]. Public and private employee programs are driving innovation through payment models, benefit design, new care delivery solutions, and alternative purchasing channels such as private exchanges. Increasing demand from consumers for transparency around health care quality and price, as well as heightened expectations for convenience, personalization, and care continuity, are also accelerating major structural changes in health care. Thus, providers will soon find traditional fee for service an increasingly rare form of payment, and remaining fee-for-service payments may be directly linked to fee reductions for poor performance. As a result, providers have already come together in 782 ACOs over the past 5 years, covering an estimated 23.5 million lives as of 2015, one-third of whom are Medicare patients [3].

If properly implemented, linking payment to quality and outcomes should improve the overall value of health care services for consumers. For many health care providers, however, value-based payment is uncharted territory, and adequate preparation and infrastructure redesign have not been developed. Fortunately, there are already 27 separate provider entities in North Carolina organized as ACOs (see Table 2). Learning from the experiences of these health care organizations will help to accelerate the transformation that will be necessary across the health care delivery ecosystem in our state.

Cornerstone Health Care is a multispecialty medical practice in the Piedmont Triad and Western Triad regions of North Carolina that made the strategic decision in 2012 to move all of its contracts to value-based models. We focused on redesigned models of care, information management integration, and value-based contracts with all payers. Our experience as an ACO demonstrates both the challenges and opportunities in the transition to value-based payment models. Prior to our strategic change in direction, Cornerstone was a highly efficient multispecialty medical group that had invested in the key organizational infrastructure necessary for the fee-for-service business model, such as back-office revenue cycle management functionality, an integrated electronic health record system, and outpatient medical office and ancillary services. All of our primary care practices were recognized by the National Center for Quality Assurance as PCMHs, and our specialist practices provided highly integrated clinical care.

As strong as these resources were, they were inadequate to allow our system to perform successfully as an ACO, which

| TABLE 2. North Carolina Accountable Care Organizations (ACOs) |
|---------------------------------------------------------------|
| **Medicare ACOs**                                              |
| Accountable Care Coalition of Caldwell County, LLC – Lenoir, NC (2012) |
| Accountable Care Coalition of Eastern NC – New Bern, NC (2012) |
| Bayview Physician Group – Chesapeake, VA (2014)                |
| Cape Fear Valley Health System – Fayetteville, NC (2015)      |
| Carolinas ACO, LLC – Charlotte, NC (2014)                     |
| Carolina Medical Home Network Accountable Care Organization, LLC (FQHCs) (2015) |
| CaroMont Health – Gastonia, NC (2014)                         |
| Central Virginia Accountable Care Collaborative, LLC (2014)   |
| CHESS (Catawba Valley Medical Group, Inc., Cornerstone Health Care, P.A., High Point Regional Health System, Regional Physicians LLC, and Wake Forest University Health Sciences) (2015) |
| Coastal Carolina Quality Care, Inc – New Bern, NC (2012)      |
| Coastal Plains Network, LLC (Vidant) (2015)                   |
| Duke Connected Care – Durham, NC (2014)                       |
| Mission Health Partners – Asheboro, NC (2015)                 |
| Physicians Healthcare Collaborative (Wilmington Health) – Wilmington, NC (2013) |
| Pinehurst Accountable Care Network – Pinehurst, NC (2015)     |
| Pioneer Health Alliance (2015)                                |
| Triad HealthCare Network, LLC – Greensboro, NC (2012)         |
| WakeMed Key Community Care – Raleigh, NC (2014)               |
| **Commercial ACOs**                                           |
| Accountable Care Alliance (Wilmington Health and NHRMC) – Wilmington, NC; with BCBSNC* |
| Boice Willis Clinic – Rocky Mount, NC; with Cigna             |
| Cape Fear Valley Health System – Fayetteville, NC; with BCBSNC* |
| Carolina Advanced Health – Durham, NC; with BCBSNC             |
| Carolinas Healthcare System – Charlotte, NC; with Aetna       |
| Cornerstone Health Care, PA – High Point, NC; with all commercial payers* |
| Duke Connected Care – Durham, NC; with Cigna                  |
| Key Physicians – Raleigh, NC; with Cigna*                     |
| WakeMed Key Community Care – Raleigh, NC; with BCBSNC*        |
| Novant Health – Winston-Salem, NC; with Cigna                  |

Note. BCBSNC, Blue Cross and Blue Shield of North Carolina; NHRMC, New Hanover Regional Medical Center.
Source: Toward Accountable Care (TAC) Consortium. NC ACOs. TAC Consortium website. http://www.tac-consortium.org/nc-acos/ . Accessed February 29, 2016.
would have required a number of other resources, including information systems with analytic functionality and the ability to effectively segment patient populations and apply resources and interventions where they are most needed. Crucial elements for successful value-based delivery performance also include contracting expertise that aligns financial incentives with clinical performance, strategic selection of partners, transparent clinical and financial performance metrics, and systems of care designed around the patient (rather than simply around office transformation).

Cornerstone’s approach to developing the structure necessary to performing well as an ACO was multifaceted. We focused on what we knew best—patient care—and we developed new care models for those patients most in need of improved care. These efforts included care models for patients who were medically stable but had 5 or more chronic diseases, cancer patients, patients with congestive heart failure, patients with chronic obstructive pulmonary disease (COPD), patients who were Medicare-Medicaid dual eligible, frail elderly patients, and patients with dementia. We developed convenience care clinics for our patients where they could be seen as walk-ins from 7:00 AM to 9:00 PM Monday through Friday and from 8:00 AM to 5:00 PM on weekends. We developed a strategic partnership with FastMed Urgent Care to provide services in geographic locations where we did not have the resources to establish convenience care clinics. We also partnered with Rite Aid so that health coaches could provide patients with resources for weight management, medical adherence, and disease-specific counseling. We redesigned health benefits for our own employees and their family members with diabetes, hyperlipidemia, or hypertension, and their medications were provided for free if they participated in condition-specific care models. We also launched a wellness program for all of
our employees and their spouses.

We reorganized our medical practices into service lines, and we worked on standard evidence-based clinical pathways for the common conditions we treat across the organization. We developed a pharmacy hub where clinical pharmacists could provide comprehensive medication management for patients with complex medication regimens. Patient care advocates focused on identifying patients with gaps in care, and nurse navigators worked directly with those patients most in need of integrated services. Other important aspects of our care redesign efforts included integration of behavioral medicine into our care models— involving social workers, psychologists, and psychiatrists—and the development of transition-of-care protocols for patients who are discharged from the hospital.

Investment in analytic tools that permit clinical information from our electronic health records to be integrated with claims data from those payers willing to provide it has been crucial to improving outcomes. Our physicians receive transparent cost and quality data in addition to their patient satisfaction results. Registry functions permit us to identify gaps in care and to engage the patients identified. Realignment of physician compensation to include not only a productivity and office efficiency component but also a value component based on patient satisfaction, quality, and access has also been crucial to aligning our financial incentives with our strategic direction.

We now have data indicating that our strategic transformation has a measurable impact on the cost and quality of the care we provide. Cornerstone did not obtain any gain-sharing from the Medicare Shared Savings Program (MSSP) in our first year, which was disappointing, but it appeared to be partially the result of having a baseline cost component that was much lower than average. However, in 2014, our second year in the program, we did achieve shared savings in the MSSP, and we had the 6th highest quality score.
in the nation. We also achieved the 4th lowest cost-basis of those who achieved shared savings. Our quality/cost performance was among the best in the nation (see Figure 1). The Medicare data indicate that Cornerstone’s risk-adjusted cost performance was 17% below our community benchmark. In care models for polychronic, frail-elderly, congestive heart failure, and dual-eligible patients, we were able to study 267 patients from either the MSSP data or United Healthcare Medicare Advantage contract data. Based on 1 year of data, we identified an overall reduction in costs of 12.7%, with a reduction in hospitalization of 30%. Newer programs are also beginning to show results, such as a reduction in readmissions for our COPD patients from 12% to 6%. Over the past 4 years, we have received some shared savings from each commercial, Medicare Advantage, and traditional Medicare payer with whom we have a contract. We believe there is ample opportunity to improve these results in a far broader context than our medical group, as health care delivery system transformation must occur across the entire health care delivery system. In 2013, Cornerstone spun off the infrastructure it had developed for population health into a separate company called CHESS. This population health enablement company is co-owned by Cornerstone, Wake Forest Baptist Health, and LabCorp. CHESS supports 2 separate ACOs, including a CHESS track 1 MSSP, whose participants include Wake Forest Baptist Health, Catawba Valley Medical Center, and Appalachian Regional Healthcare System. In 2016, Medicare awarded CHESS 1 of 21 Next Generation advanced ACOs. By expanding value-based payment models and clinical redesign efforts across the clinical delivery system, we believe our efforts will have a broader impact in our region.
Cornerstone’s Medicare Shared Savings Program (MSSP) Results

Source: Centers for Medicare & Medicaid Services. Data.CMS.gov website. https://data.cms.gov/. Accessed November 13, 2015.
The efforts to lead in the transformation of the health care delivery system have not been easy. In the early years, payments for value-based contracts came retrospectively, while investment in the care models and necessary analytic infrastructure had to be made in advance of payments. Not all payers have been willing to invest in the resources necessary to smooth the transition to value-based payment. Because traditional asset-based lenders do not understand the new revenue models, access to capital is limited for medical groups. Not all members of the local health care delivery system are ready to align incentives around value. The high fixed costs of large hospital systems may make it difficult to pivot to value-based payment models. Finding creative and strategic approaches to partnering with nontraditional community resources is new ground for established health care systems.

ACOs will continue to evolve as the health care system adapts to alternative payment models. Regardless, we at CHESS believe there are 7 critical elements for success in ACOs: know your patients, confirm and support your VIPs (very important patients—those with complex medical needs), create and communicate patient access, define the care network, drive utilization, master the metrics, and wow your patients.

These factors should have been the basis for good health care delivery all along, but with value-based payment reforms, a redesigned health care delivery system that incorporates these success factors will continue to improve and be a more sustainable model for our country. Purposeful, coordinated care across the continuum of the health care delivery system is the central purpose of the ACOs business model. ACOs will evolve and improve as the health care industry continues its migration to value.

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References
1. Governor McCrory Announces “Partnership for a Healthy North Carolina” [news release]. Raleigh, NC: North Carolina Office of the Governor; April 3, 2013. http://votesmart.org/public-statement/775008/governor-mccrory-announces-partnership-for-a-healthy-north-carolina#.V2RkxOYyKjh. Accessed June 17, 2016.
2. Health Care Transformation Task Force. Home. Health Care Transformation Task Force website. http://www.hcttf.org/. Accessed May 23, 2016.
3. Muhlestein D, Gardner P, Caughey W, de Lisle K. Projected Growth of Accountable Care Organizations. Salt Lake City, UT: Leavitt Partners; 2015.