

CAREFIRST PCMH PROGRAM

BACKGROUND, HISTORY, AND RESULTS (2011-2016)

The Patient-Centered Medical Home (“PCMH”) Program and its supporting Total Care and Cost Improvement (“TCCI”) Program Array constitute one of the largest and longest efforts of any such programs in the nation. Clear results have emerged that are encouraging and sobering in what it takes to achieve and sustain improved quality and costs results on a large population of people. This overview tells the story from its beginning through 2016.

The Creation and Launch of a Pilot of the CareFirst PCMH Program in 2008-2010

The Company’s initial foray into the PCMH environment to address the issue of rising cost occurred in 2008 when CareFirst launched a small, but intensive, pilot program in which 11 select primary care practices received a Per Member Per Month (“PMPM”) payment to provide care management services to CareFirst Members. Unfortunately, after three years, this pilot did not produce better outcomes. Each practice took an idiosyncratic approach to the use of funds and adopted their own differing approaches that compromised the ability to conduct meaningful analysis, thwarted reporting to self-insured groups, and produced uneven delivery of benefits. Further, the practices had no effective accountability for achieving better outcomes on cost or quality.

We learned many things in this predecessor pilot. Among these learnings was the observation that, without accountability for global outcomes and incentives to achieve them, the additional resource “inputs” were consumed without impact on the goals of the pilot. CareFirst’s experience in this pilot led to the creation of a much different model – the PCMH Program and TCCI Program Array described in this document.

A program similar to CareFirst’s initial pilot, which provided Primary Care Providers (“PCP”) with a monthly capitation fee for practice transformation services, was undertaken by the State of Maryland in its PCMH Pilot Program from 2011-2015. As in CareFirst’s initial pilot with 11 practices, this, too, produced little in the way of discernable results and experienced the same problems as the earlier CareFirst pilot. Of note, the current CPC+ model launched by CMS on January 1, 2017, follows the same essential design as these two earlier failed attempts in Maryland. Further, a model similar to this failed model is now proposed by the State (mid-2017) for Phase 2 of the Maryland All-Payer Waiver.

The current CareFirst PCMH Program was first expressed in a written document that constituted the initial version of a Program Description & Guidelines in the summer of 2010. The surrounding and supporting capabilities of the TCCI Program Array were developed subsequently in furtherance of the goals of the PCMH Program.

Following passage of enabling legislation in 2010 (CareFirst played a key role in seeking this legislation), the company sought approval from the Maryland Health Care Commission (MHCC) on August 26, 2010, to launch the Program. The MHCC promptly approved the Program on September 16, 2010, making the CareFirst PCMH Program the first of its kind in Maryland under the new legislation. The State then launched its own pilot PCMH Program, referred to above, on July 1, 2011, which has since ended per its sunset provisions on December 31, 2015.

The current CareFirst PCMH Program was never intended to be conducted as a pilot since it followed the pilots described above. CareFirst intended from the start, to place the Program in full operation for all segments of its business as soon as possible following regulatory approval in 2010. The company did just that on January 1, 2011.

Current CareFirst PCMH Design

The CareFirst PCMH design creates a global budget target composed of all health care costs for Members attributed to small primary care teams of five to 15 PCPs – called Medical Panels (“Panels”). The global targets for Panels are based on the historical claims experience of the Member population that is attributed to each Panel. All costs in all care settings are included in the targets for each attributed Member and are then risk adjusted and trended forward into the then current Performance Year. This is done so that the total budget target given a Panel represents the expected costs of care for each Panel’s specific population of Members. The average Panel has 2,500 Members and a \$12 million annual budget target.

Hence, the central idea in the Program is that the total care of Members is to be provided, organized, coordinated, or arranged through small Panels of PCPs who are accountable – as a team – for the aggregate quality and cost outcomes of their pooled Member population. Any savings they achieve against their shared, pooled global budget target is shared with them as long as their quality of care achieves certain standards.

In this way, the Program seeks to powerfully incent PCPs – as a team to:

- control costs for their pooled Member population and share savings actually achieved against budget targets; and
- improve quality outcomes that are measured on a Panel-by-Panel basis.

For each Panel, higher quality outcomes achieved with greater cost savings against global targets produce greater rewards. Lower quality with lesser savings yields smaller rewards. Failure to achieve any savings yields no reward, regardless of quality performance.

The Program is, therefore, fully based on the concepts of overall population health management with a Member-centric focus, built squarely on the belief that a primary care team is the essential core upon which to build – even though PCPs, themselves, provide only a small portion of all services rendered to Members (especially for those Members who are sickest). However, PCPs are the gateway to most services under the current CareFirst PCMH Program design.

Although there is little remaining similarity between the Program design that CareFirst piloted in 2008-2010 and the PCMH Program in broad use today, the lessons learned from the pilot about the effectiveness (or lack thereof) of certain design features have proven invaluable in informing the current design. It is this collective and cumulative experience that has caused CareFirst to express to the State of Maryland its serious concerns regarding the primary care portion of the State’s approach to Phase 2 of the Maryland All-Payer Waiver, and to decline participation in the next phase of the Waiver.

Region-wide Recruitment Effort from the Outset

Given the scale of CareFirst’s intent to move its new Program design into full region-wide production, the MHCC approval in 2010 triggered an intensive effort by CareFirst to recruit and enroll PCPs throughout Maryland, Northern Virginia, and the District of Columbia (the “CareFirst service area”) in pursuit of the goal of launching the Program region-wide on January 1, 2011.

To this end, all fully credentialed PCPs in good standing (about 4,400) in the CareFirst Regional PPO and HMO networks throughout the CareFirst service area were invited to join the Program on a voluntary basis. If interested, each was required to sign an addendum to their network contract with CareFirst in which they agreed to:

- abide by Program rules as presented in the Guidelines;
- form or become part of a Medical Care Panel (i.e., the primary care team); and
- become engaged in the Care Coordination activities at the heart of the Program.

The voluntary nature of the Program was an essential feature of the recruitment message from the outset.

Efforts at recruitment began with an invitation on October 1, 2010 to join the new Program that was sent to all PCPs in the CareFirst Regional PPO and HMO networks. Throughout the fall of 2010, a substantial number of town hall meetings were conducted to explain the Program as presented in the Guidelines. These meetings were followed by one-on-one and small group meetings with PCPs to further explain the Program. Hundreds of PCPs attended the various town hall meetings throughout the region and thousands were reached individually or in small groups.

The meetings were generally marked by extensive question and answer sessions that revealed the topics of greatest interest to PCPs. It became apparent that many PCPs had carefully read and made extensive notes on the Guidelines. The Program’s design stood up very well to this questioning – giving some degree of confidence to recruiter and “recruitee” alike.

On January 1, 2011, the Program was launched on schedule, with 1,947 physicians and 205 nurse practitioners in just over 150 newly formed Medical Care Panels spread throughout the CareFirst service area. The average Panel had nine PCPs.

Four different types of Panels were established. The most prevalent and the type with the most CareFirst Members is called a “Virtual Panel”. This Panel-type is composed of small, one to four-person primary care practices and is formed by contract. In this type, each practice remains its own separate legal entity. A second Panel-type involves group practices of between five and 15 PCPs who formed a Panel of their own. A third type is group practices, typically multi-site, larger than 15 PCPs that are broken down into multiple Panels. The fourth Panel-type is composed of Panels that are part of large health care delivery systems in which PCPs are typically employed by the health system.

The substantial initial base of PCPs that formed the first network of the PCMH Program instantly made it one of the largest such networks of its kind in the nation – and the single largest based on a completely uniform model with one set of Program rules, financial incentives, and quality standards on a broad regional basis. The design made the role of the PCP central even as it extended the scope of PCP accountability beyond primary care services to global cost and quality outcomes for Members in their care.

Unique Model Unlike Most Accountable Care Organization (“ACO”) Attempts

In many respects, the CareFirst PCMH Program is unlike the ACO models that have been developing since 2011. ACO models are commonly built around a single or multi-hospital health care delivery system – each with its own idiosyncratic way of coordinating care, providing incentives and achieving results. While federal rules form a common high-level framework, most ACOs today remain one-of-a-kind models that are difficult to extend beyond the particular ACO involved and have limited appeal to large employer groups whose employee populations constitute the majority of enrollment in private health plans. This is due to the fact that differing approaches taken by ACO’s greatly complicate uniform benefit administration as well as comparative data analysis and reporting that is so essential to employers.

In contrast, from the start, CareFirst intended to create a single, uniform, region-wide model not tethered to any hospital-based health care delivery systems. Indeed, the model did not place hospitals or health systems in a central or leading role, but rather, formed a network of PCPs that was nested within the far larger provider networks CareFirst maintains for its membership.

These larger networks were intended to provide all non-primary care services needed by PCMH Members. PCPs are free to refer anywhere they choose in the larger networks in order to arrange services for their Members. However, they are given easily accessible online cost information that makes them more informed “buyers” of specialty, hospital and ancillary services – a critically important key to success in controlling cost.

It is important to note that the recruitment of PCPs did not affect any non-PCPs directly. But, it did set up PCPs with the freedom to refer for specialty and ancillary care that best serves their Members. However, those PCPs employed by large health care delivery systems have turned out to be restrained in making referrals to specialists. This constraint is imposed by the systems themselves (not the PCMH Program) as these large systems seek to “capture” all health care services within their own providers in order to protect or enhance the volume of services on which their revenue depends. To the contrary, the CareFirst PCMH Program seeks to maximize freedom in referral-making based on decision support data that points PCPs to the highest value referral targets wherever they may be.

The Larger CareFirst Networks – Maximizing Referral Choices

To understand the breadth of provider choice CareFirst offers, it is important to recognize that CareFirst’s large and complete network of providers includes all hospitals in the CareFirst service area and over 43,000 different providers of all types.

During the 2008-2016 period, the CareFirst network grew substantially and currently includes the vast majority (well over 90 percent) of all actively practicing providers in CareFirst’s service area of all types – specialty, hospital and ancillary service providers – in two large and highly overlapping networks – the Regional PPO and HMO networks. Of all payments for services rendered to Members – as measured by claims paid – nearly 97 percent are made to network providers for Members who live in the CareFirst service area.

CareFirst categorizes all hospital and specialty providers into one of four cost tiers: High, Mid-High, Mid-Low and Low and leaves the “shopping” decision to the PCP. These four tiers roughly correspond to quartiles. Decisions on

quality are left to the PCP who is in the best position to make the most informed decision in this regard on behalf of the Member.

From 2008 to 2017, the CareFirst Regional PPO network grew from 30,976 participating providers to 43,731 participating providers while the HMO regional network grew from 26,355 to 39,998 providers. These networks offer the broadest choice of in-network providers in the CareFirst service area of any payer or health care delivery system.

It was into this large and growing network that the PCMH Program was placed – all on the basis of a voluntary agreement with willing PCPs who participated in both the Regional PPO and HMO networks. In short, the entire network strategy was intended to give PCPs the widest possible choice in referral decision-making – but, with a powerful incentive to make a high value choice based on data that supports that choice.

Early Member Enrollment

With the signing of the initial network of PCPs, the PCMH Program started its first day of operation on January 1, 2011, with approximately 650,000 Members who were attributed to the initial participating PCPs. This initial enrollment was principally derived from Members who were covered by CareFirst as individuals or as part of small or medium size employer groups (fewer than 200 employees). This constituted the fully-insured portion of CareFirst's total book of business.

Thereafter, a special effort was undertaken to gain the voluntary participation of large self-insured employers, many of whom joined the Program by the end of the first year of operation. The Federal Employee Health Benefit Plan also joined the Program during the first year of its operation. All remain in the Program as of mid-2017.

It must be stressed that were it not for the substantial number of PCPs and the far larger scale of the surrounding PPO and HMO networks in which the Program is nested, it would not have been possible to attract and serve the full range of individual and employer-based membership that CareFirst maintains – approximately two million of whom live in the CareFirst service area.

The uniformity in program design, rules, incentives, and data have made the Program understandable and acceptable to diverse business segments and helped present and illuminate its value by fostering discipline in the way underlying data regarding patterns of cost and quality are displayed in the online iCentric Data System that supports the Program on an end- to-end basis. From the outset, it was CareFirst's intent that groups and individuals who are covered under risk (premium-based) and non-risk contracts with PPO and HMO designs would all be served by the common, scalable, and uniform model that is the core of the Program. Meanwhile, broad network availability provides ubiquitous access, making the whole Program more attractive to a full range of buyers.

Constancy in Design is Key to Behavioral Change and Understanding Emerging Results

While refinements in the Program have been made continuously since the Program's launch in 2011, all basic Design Elements as outlined in Part III of the Program Description and Guidelines have remained intact. In the main, refinements have served to further clarify the functioning of Program rules or have provided more detailed explanation of core Design Elements.

This constancy in design and rules has lent great stability to the incentive features of the Program and has provided a consistent framework within which to train all key players in the Program – from nurses to administrative staff to PCPs themselves.

It was assumed at the outset, and has been seen with clarity since, that were it not possible for PCPs to count on the constancy in the rules that relate to incentives (Outcome Incentive Awards or OIAs), it would be highly doubtful that behavioral change on the part of these providers could have been stimulated.

Thus, the Program, in its seventh Performance Year (that began on January 1, 2017), is in every major respect, the same as the one initially launched in January of 2011. We recognize that even now, not all PCPs understand the rules with equal depth and clarity. But, once they embrace the Program, behavior change becomes evident and then

accelerates. In recent years, surveys and other assessments have shown that the level of awareness of the Program has broadened and deepened among PCPs as well as among the 25,000 employer accounts that rely on the Program.

This persistence in design and operation – together with the uniformity of the model throughout the CareFirst service area – also provides an unparalleled opportunity to view the impacts achieved by a consistently applied set of Program rules across enough time and on a large enough scale to draw conclusions regarding results. Of particular interest are the underlying changes in the behavior of PCPs that are driving these results.

While keeping the core economic and care management model consistent, there have been refinements to the Program that center around five major themes:

1. **Increased Quality** – Since the initial year of the Program CareFirst has consistently increased quality thresholds needed for Panels to earn an Outcome Incentive Award. Specific clinical measures were chosen for adult, mixed, and pediatric Panels and a much greater focus has been placed on the Panel’s engagement with Program standards and the consistency of that engagement across all PCPs in the Panel. Even with the increased quality standards, Panels are producing savings and earning OIAs at high rates.
2. **Better Targeting of High-Risk Members** – Each year CareFirst has improved the precision with which high-cost/high-risk Members are selected for Care Coordination and ancillary TCCI Programs, culminating in the development of the Core Target Population in 2016. The Core Target uses a matrix of clinical and utilization based indicators to identify the highest priority Members for Care Coordination. The care coordinator and PCP have a collaborative in-person discussion about every Member in the Core Target to assure the Member receives the appropriate services necessary to become stable.
3. **Higher Standard of “Viability”** – In order for a Panel’s financial results to be meaningful, a Panel must have a minimum level of attributed Members over the course of the Performance Year. This is considered the point at which a Panel is considered “viable”. To gain greater confidence in the results being produced by the Panels CareFirst has begun to gradually increase the minimum viability threshold. By 2018 a Panel must have on average, at least 1,500 attributed Members to be considered viable.
4. **Greater Focus on Specialty Referral Patterns** – Over the last few years, CareFirst has shared specialist cost rankings with PCMH PCPs. Quality judgment is left to PCPs and PCPs still refer where they will get the best result. Since providing this cost information, CareFirst has seen evidence of changes in referral patterns from independent PCPs, as many have become convinced of the efficacy of referring to lower cost Specialists and Hospitals for common, routine illnesses.
5. **Introduction of an Element of Risk** – While CareFirst continues to believe that it is inappropriate to place down-side insurance risk on primary care practices, the PCMH Program did introduce an element of PCP risk in 2017. That is, the 12 percent Participation Fee is tied to each Panel’s continuing “engagement” in the PCMH Program. Beginning January 1, 2017 CareFirst reduces or eliminates this fee for Panels that fail to achieve minimum engagement and quality scores. Hence, this “at risk” feature is tied to actual quality performance, not insurance risk for Panels.

TCCI Provides Additional Supports and Capabilities

It quickly became evident, based on early experience, that the incentives and accountability structure of the PCMH Program – by themselves – were not enough to achieve the goals of the Program. Extensive additional supports would be necessary. Hence, over the past five years, the TCCI Program Array has been created and continuously enhanced to provide programmatic supports to the core design of the PCMH Program. Specifically, the TCCI Program Array provides adjunct or supplementary capabilities that are designed to work as direct enablers of the incentive, accountability and organizational structure of the PCMH Program and to further the ability of PCPs to reach their Members with the services needed to better manage their health care risks, diseases and conditions. The long-term effects of the TCCI Program Array are just coming into view.

The 20 programs of the TCCI Program Array are:

1. Health Promotion, Wellness and Disease Management Services Program (WDM)
2. Hospital Transition of Care Program (HTC)
3. Complex Case Management Program (CCM)
4. Chronic Care Coordination Program (CCC)
5. Behavioral Health and Substance Abuse Program (BSA)
6. Home-Based Services Program (HBS)
7. Enhanced Monitoring Program (EMP)
8. Community-Based Programs (CBP)
9. Network Within Network (NWN)
10. Pharmacy Coordination Program (RxP)
11. Expert Consult Program (ECP)
12. Urgent and Convenience Care Access Program (UCA)
13. Centers of Distinction Program (CDP)
14. Pre-Authorization Program (PRE)
15. Telemedicine Program (TMP)
16. Dental-Medical Health Program (DMH)
17. Detecting and Resolving Fraud, Waste and Abuse (FWA)
18. Administrative Efficiency and Accuracy Program (AEA)
19. Precision Health Program (PHP)
20. Healthworx: Innovations in Care, Quality, and Outcomes Program (HWX)

Underlying and enabling all aspects of PCMH and TCCI is the CareFirst-developed iCentric System that provides a web-based set of online capabilities that are available 24/7 serving all network providers. Among its many capabilities, the System documents and tracks all Care Coordination activities and reports on all of these activities across the entire Program.

The value of claims, for all services passing through the PCMH Program under the direction of the Panels reached nearly \$5 billion in 2016 – double the \$2.5 billion in 2011. This represents well over 50 percent of all the claims CareFirst pays on behalf of its membership and makes the Program the largest single uniform model design in the United States.

PCMH/TCCI Programs Status as of January 1, 2017

The PCMH/TCCI Programs entered their seventh full year of operation on January 1, 2017, with 447 Medical Care Panels composed of 4,397 PCPs. This represents nearly 90 percent of eligible PCPs in the CareFirst Regional and HMO networks (up from 47 percent when the Program began in 2011).

PCP participation and membership in the CareFirst PCMH Program by Panel type as of January 1, 2017 is shown in **Figure 4**. Also shown is the breakdown of enrollment by Panel-type and for the Program as a whole. Virtually every major health care delivery system in the region is participating as are the vast majority of privately practicing independent PCPs.

Figure 4: Panel Characteristics By Panel Type As of January, 2017¹

¹ Source: HealthCare Analytics – May 2017. Member counts include the “NA” Panels for multi-Panel entities (except Hopkins). These Members are attributed to an active practice within the entity, but do not have attribution to an active PCP (required for assignment to a specific Panel).

Panel Type	Panels	PCPs	PCPs/ Panels	Members	Members/ Panel
Virtual Panel	155	1,388	8.9	356,726	2,301
Independent Group Practice Panel	81	680	8.3	186,438	2,302
Multi-Panel Independent Group Practice	110	1,086	9.8	269,479	2,450
Multi-Panel Health System	127	1,243	9.7	328,249	2,585
January 2017	447	4,397	9.2	1,140,892	2,552

As already noted, Member enrollment in the PCMH Program is rising toward 1.2 million to date. Enrollment in the Program is now automatic for individual and small or medium group Members as well as for large self-insured group Members who live in the CareFirst service area. That is, the right to the Care Coordination features of the PCMH and TCCI Programs is intended by CareFirst to be part of the intrinsic value proposition of the company as it offers benefits to all of its Members.

While Member consent is required to receive PCMH and TCCI Care Coordination services, all Members are entitled to receive these services unless they or their employer opts out. Among self-insured groups, only a tiny handful of groups have exercised this option. Hence, the PCMH and TCCI Programs have become the ubiquitous backbone of CareFirst's efforts to better control health care costs and improve the quality of care for its Members. Today (mid-2017), the Program serves over 25,000 employer groups and one-quarter of a million Members who buy policies as individuals – regardless of product or risk arrangement (fully-insured, self-insured, credibility rated, etc.).

Enrollment in the PCMH Program automatically triggers enrollment in the TCCI Program Array. However, a number of TCCI Programs also apply to Members not covered by the PCMH Program. The number of TCCI Programs has grown over recent years as greater needs of Members and PCPs have become evident. The number of Members served by these Programs has also consistently grown year-over-year, since the launch of the Program. The number of Members served in the array of TCCI Programs over the previous six years is shown in **Figure 5**.

Figure 5: TCCI Member Engagement, 2011-2016, 2017 Targets

TCCI Element	Annual Volumes for Each TCCI Program						
	2011	2012	2013	2014	2015	2016	2017*
Hospital Transition of Care	N/A	103,500	92,852	89,958	84,655	79,002	72,000
Complex Case Management Care Plans	17,060	22,222	22,250	30,283	36,781	38,526	40,000
Chronic Care Coordination Care Plans	1,022	2,611	6,248	11,800	16,694	14,472	17,500
Behavioral Health & Substance Abuse Care Plans	1,667	1,903	942	3,515	5,307	9,041	15,000
Home-Based Services – Service Requests	N/A	154	1,719	4,645	6,781	7,068	12,000

Enhanced Monitoring – Service Requests	N/A	N/A	15	863	2,341	2,791	7,500
Comprehensive Medication Review	8,300	34,000	6,800	10,144	2,499	3,343	7,500
CMR 1 Service Requests	N/A	N/A	N/A	N/A	92,967	90,234	100,000
CMR 2 Drug Advisories							
Specialty Pharmacy Coordination Managed Cases	N/A	N/A	6,568	2,343	8,255	10,516	15,000
Community-Based Programs – Service Requests	N/A	N/A	8	763	2,135	5,873	10,000
Expert Consult	N/A	N/A	34	346	878	1,016	2,500
Tier 1 Completed Cases	N/A	N/A	N/A	N/A	87	156	1,000
Tier 2 Completed Cases							
Annual Total	28,049	164,390	137,436	154,660	259,380	262,038	300,000

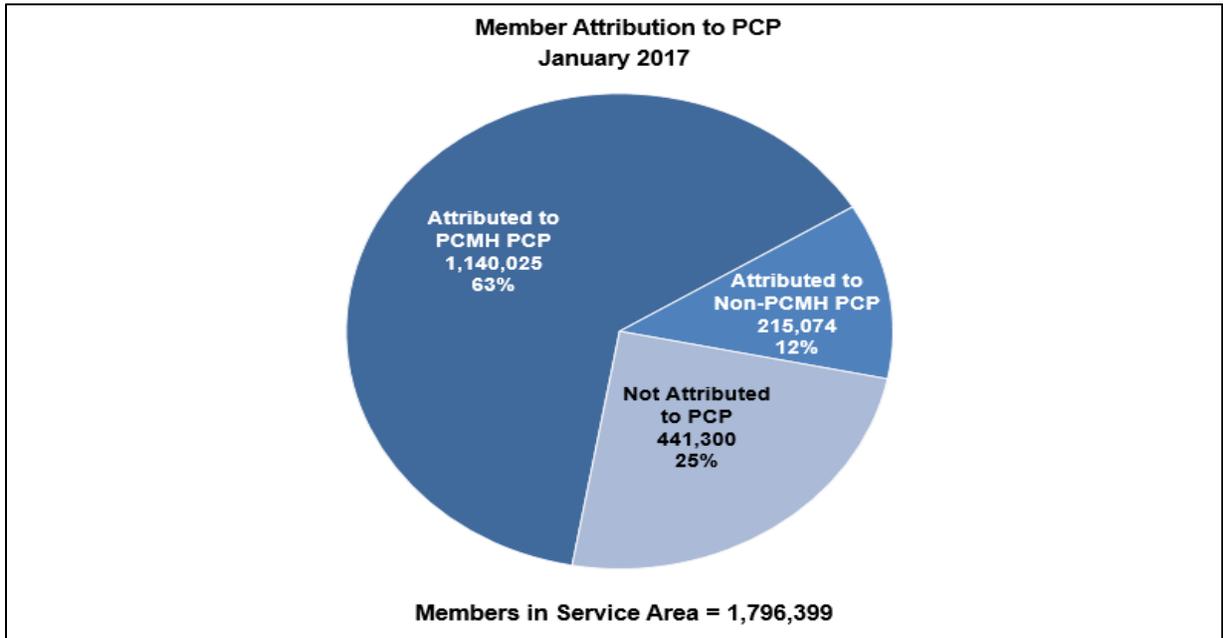
It is noteworthy that a large portion of Members who are non-participants in the PCMH Program are those who have no PCP. This approximates 25 percent of all Members living in the CareFirst service area. This subgroup of Members is composed mostly of two groups: younger Members who see no provider or older Members who see only specialists for established diseases or conditions for which they are being treated. These non-PCMH Members are, however, covered by the TCCI Program Array.

Beyond this, the largest grouping of nonparticipation is Members in large national or multi-regional employer groups that are headquartered outside of the CareFirst service area (but who have Members in the area). These Members are typically not participants in the Program since their coverage plans are determined by their employers without regard to CareFirst capabilities, since the groups have headquarters elsewhere. For these groups, CareFirst participates in supplying coverage, but does not do so based on its own Programs and rules. This is expected to change as the results of the PCMH/TCCI Programs prove their value and these national groups elect to opt in.

The second largest cohort of non-participants is composed of those Members who live in the area, but see a non-PCMH participating PCP. This cohort constitutes 12 percent of CareFirst Members, is continually declining, and underscores the importance of continuing efforts to enroll the remaining PCPs still not in the Program.

In total, the nearly 1.2 million Members now in the PCMH Program, who are considered “home” Members of CareFirst, considerably exceeds the number of Members who live in the region, but are not in the Program for the reasons mentioned above. **Figure 6** below shows the breakdown of attributed and non-attributed Members in the PCMH Program.

Figure 6: PCMH Attribution For Members Who Live In CareFirst’s Service Area²



Highly targeted recruitment efforts continue for those PCPs who still do not participate in the PCMH Program in order to raise enrollment in the Program. As of January 2017, 4,397 PCPs participate in the Program. The goal is to have nearly 4,450 participating PCPs by January 1, 2018.

PCPs Stay in the Program

It is interesting to note that physician loyalty to the PCMH Program has been extremely high, even with the entirely voluntary nature of the Program. Since the inception of the Program, of the 394 PCPs who have terminated their participation in the Program, 81 percent retired, left practice or moved out of the area while 19 percent were terminated by CareFirst due to lack of Program engagement. Of those terminated due to lack of engagement, five percent returned to the Program.

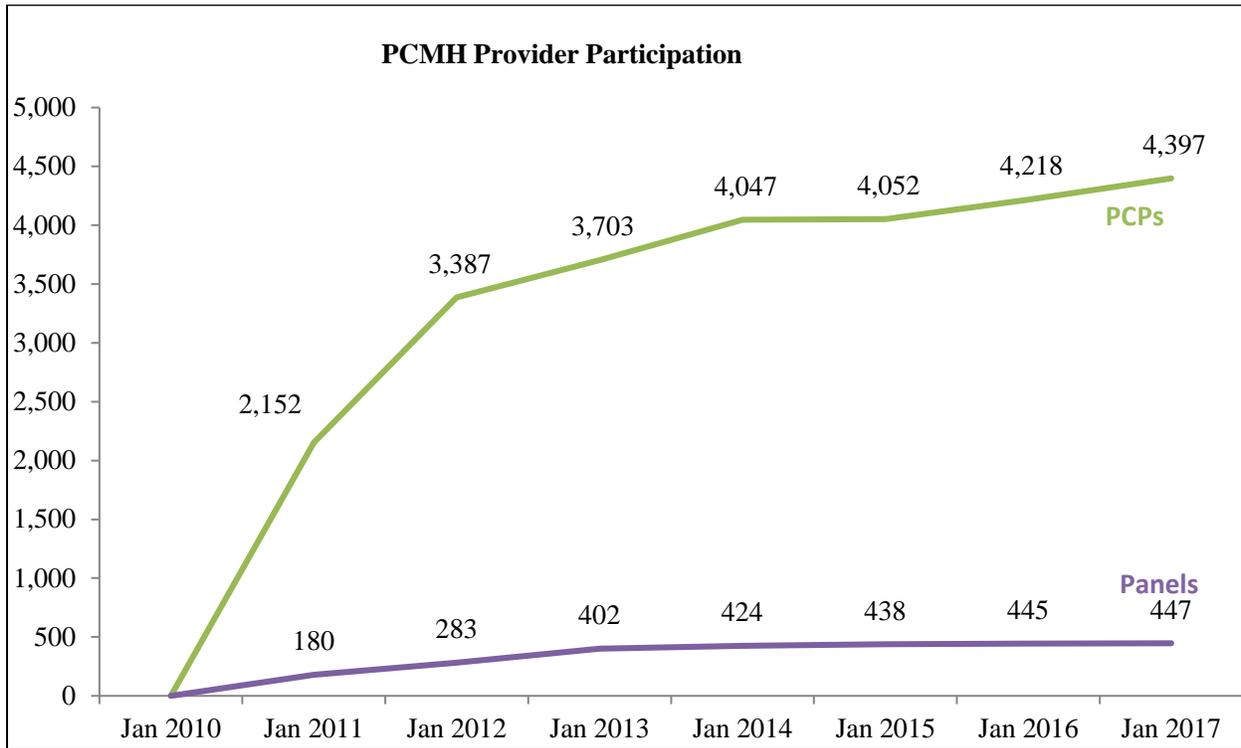
Involuntary termination by CareFirst has been undertaken only for those PCPs who have shown persistent failure to abide by Program rules or to engage in Program Care Coordination activities. These patterns of noncompliance became evident as the Program matured. However, persistent failure to engage in Care Coordination activities remains rare and CareFirst has become more forceful in dealing with this when it occurs.

Additionally, few Panels (less than 12 percent) have changed their PCP membership more than 50 percent since the inception of the Program. Further, Panel size has remained constant at about nine PCPs per Panel over the 2011-2017 period. Thus, the PCP base of the Program has remained highly stable throughout the first six years of the Program’s existence even as there has been steady growth in the number of providers participating. However, considerable change of lesser magnitude occurs continually as PCPs join or leave Panels one at a time. This is accommodated as it occurs on a voluntary basis.

The net growth in the Program can be readily seen as shown in **Figure 7**.

² Excludes Medicare Primary. Source: CareFirst HealthCare Analytics

Figure 7: PCP And Panel Counts Over Time



Finding a PCMH PCP has not been Difficult for Members, so far

So far, the PCMH network has been able to absorb CareFirst membership without difficulty. As a condition of their participation, PCP practices must remain open for CareFirst Members or closed to all new Members from all payers. As of May 2017, only 86 PCPs have closed their practice to all new Members. This represents under two percent of all PCPs participating in the Program.

With this said, it has become clear how significant Nurse Practitioners (“NPs”) and physician extenders (e.g., physician assistants) have become in assuring access to primary care services. The busiest and most significant Panels in the Program often make extensive use of their services. NPs constitute approximately 19 percent of the providers in the PCMH network. It is also noteworthy that some Urgent Care Centers (“UCCs”) are transforming themselves into Medical Panels and have begun to qualify as PCPs under the PCMH Guidelines. While this is still a small portion of the PCP network in the PCMH Program, it is expected to grow.

Finally, it is also worth noting that the merger/acquisition of independent provider practices into large health systems has increased significantly since the start of the Program. In May 2017, approximately 29 percent of PCMH participating PCPs were employed by health systems. Only 17 percent were employed in these large systems in 2013 and 11 percent at the start of the Program in January 2011. This compares favorably against the rest of the nation, where recent reports estimate that over half of practicing physicians are employed by hospitals.

Nevertheless, the pace of hospital employment of physicians continues to rise and is of concern. This trend toward employment of PCPs by the large health care delivery systems has turned out to be significant since the incentives and information on care patterns provided in the Program are often intercepted by the large systems and do not reach the PCPs they employ.

That is, the employed PCPs of these large systems are paid in accordance with the incentives given to them as part of their employment arrangement. Invariably, these large system incentives reward higher volumes of service, referrals to system-only specialists and no reimbursement for Care Coordination activities performed by the employed PCPs.

This weakens and interferes with the behavioral change design at the heart of the Program – as well as weakens cost control and attention to the engagement and quality measures in the Program over the long term. This places the large system Panels in the PCMH Program at a disadvantage – at least as to the total cost of care for their Members on a risk adjusted basis. In a cost-conscious environment, this is a dangerous place to be.

Five Focal Points for Panel Attention and Action

There are five areas of emphasis that Panels are asked to focus on in improving the quality of care while lowering cost for Members in their care. These are shown in **Figure 8**, below.

Figure 8: Five Focus Points For Panel Attention And Action For PCP Panels

Five Focus Areas	Weight
1. Effectiveness of Referral Patterns	35%
2. Extent of Engagement in Care Coordination	20%
3. Effectiveness of Medication Management	20%
4. Consistency of Performance within the Panel	15%
5. Gaps in Care and Quality Deficits	10%

Panel performance in each of these areas is reported in the HealthCheck Scorecard maintained for each Panel every month and on a cumulative basis each Performance Year. This scorecard is available online 24/7 through the iCentric System and is included in the ongoing, more extensive online reporting available for each Panel through the PCMH SearchLight analytics capability in the iCentric System.

Searchlight Reports contain hundreds of different views of each Panel’s demographic, diagnostic, clinical, Care Coordination and cost patterns. These reports are available online 24/7 to each and every Panel PCP with a few clicks of the mouse as is comparative information which tells each Panel how it compares to its own historic patterns as well as to other Panels. The views are updated monthly.

The HealthCheck Scorecard draws from these extensive underlying views and brings forward to the attention of each Panel’s PCPs, the most relevant of these so that they can be acted upon. HealthCheck is, in effect, the equivalent of a periodic checkup on how each Panel is doing in improving quality and lowering cost growth for its Members.

Each of the five HealthCheck areas of emphasis has its own relative impact on overall results that is reflected in the weightings given to each area in constructing the aggregate score achieved by each Panel.

The Five Areas of Emphasis are:

1. **Effectiveness of Referral Patterns (35 percent weight)** - Each specialist and specialty group in the larger CareFirst network is ranked on cost, that is based on the pattern of episodes of care they treat. Using the average cost of each episode in the network as a benchmark, each specialist and specialty group is placed in one of four cost categories: High, Mid-High, Mid-Low or Low. Each Panel, in turn, is shown the degree to which they use High, Mid-High, Mid-Low or Low-cost specialists. Panels are free to refer anywhere they wish, but to maximize their overall performance it is important to maximize use of the most cost-effective specialists.
2. **Extent of Engagement with Care Coordination (20 percent weight)** - The establishment of Care Plans by PCPs for the multi-chronic Member is intended to reduce hospital admissions and readmissions (and ER use) and to overcome fragmentation in the health care system that is essential to improving outcomes for these Members. Breakdowns in the health status of Members are common due to the lack of coordination of services for the multi-chronic Member. This area of emphasis within the HealthCheck Scorecard measures the degree to which each

Panel and each PCP in the Panel is engaged in providing Care Coordination services to Members who could benefit from Care Plans.

3. **Effectiveness of Medication Management (20 percent weight)** - Pharmacy costs exceed 30 percent of all medical costs in the average Panel. Members with multiple chronic conditions or acute illness can often be on 10 to 20 (or more) prescriptions. A comprehensive review of these pharmacy “cocktails” often yields changes that greatly benefit the Member, improve chances for adherence and save considerable amounts of unnecessary spending. Panels that actively pursue and act on such reviews generally improve their chances for better Panel results and improvement in care outcomes for their Members.
4. **Consistency of Performance within the Panel (15 percent weight)** - As Panels mature in their understanding of the PCMH/TCCI Programs and learn how to produce better results for their Members and themselves, a more uniform pattern of engagement among the Panel PCPs emerges. This is accelerated by peer pressure within the Panel itself, which brings less involved/committed PCPs within the Panel along farther and faster than would otherwise have been the case. This focal area is intended to get the Panel to work effectively together as a team in its population health/Care Coordination and cost control efforts by showing which PCPs are contributing to effective results and those that are not.
5. **Reducing Gaps in Care and Quality Deficits (10 percent weight)** - The reduction of gaps in care for the chronic Member is the object of this focal area. Every month, each Panel is shown which of its Members have gaps in care that, if not addressed, could lead to costly breakdowns later on. The score in this area reflects how each Panel is doing in closing these gaps.

CMMI Innovation Pilot to Integrate Medicare Fee-For-Service (FFS) Enrollment was a Success

In 2012, CareFirst was awarded a three-year, \$20 million Health Care Innovation Award (“Innovation Award” or “Award”) by the Center for Medicare and Medicaid Innovation (“CMMI”). This was the largest grant to a payer in the country and the third largest overall. The Award was to pilot the application of CareFirst’s TCCI and PCMH Program to Medicare Fee-For-Service (“FFS”) beneficiaries in Maryland. This “Common Model”, as it became referred to, offered identical incentives, data/analytic supports, rules, and quality standards for both Medicare beneficiaries and CareFirst Members.

The Common Model Pilot involved 140 PCPs in 14 Panels of PCPs with 60,000 attributed CareFirst Members and over 40,000 attributed Medicare Primary FFS beneficiaries. These Panels were selected to be representative (in structure and geography) of the larger PCMH Program CareFirst operates in its service area involving over 4,300 PCPs in over 440 Panels. The Common Model Pilot began to serve Medicare beneficiaries in July 2013 and concluded on December 31, 2016 – a time span of three and a half years. For the entire period of the Common Model Pilot, Panels assumed responsibility for total cost and quality outcomes for their attributed Medicare FFS and CareFirst patient populations.

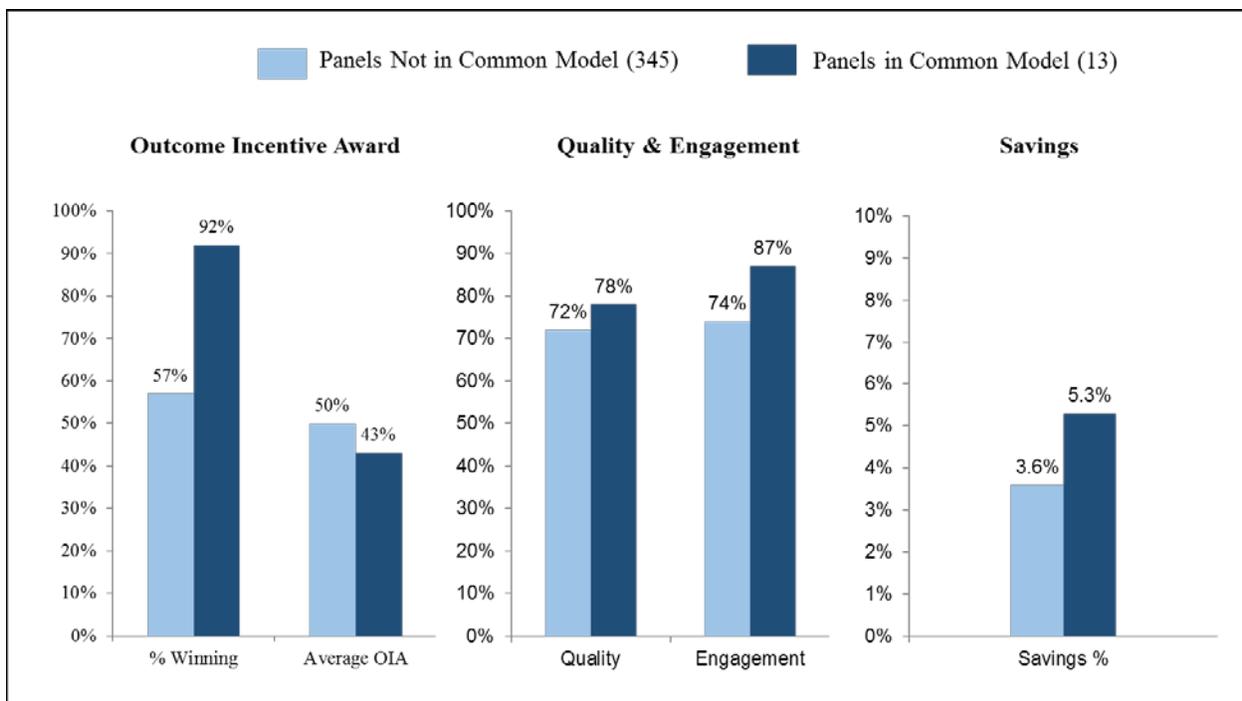
Within the CareFirst service area, combined CareFirst membership and total Medicare FFS beneficiaries account for approximately half the population and half the region’s total health care spending. With this much economic purchasing power, it was theorized that the 14 participating Panels in the Common Model Pilot – who constituted a representative microcosm of the larger system - would be able to have great impact in the way they exercise their referral decision making and Care Coordination activities. And, it was thought that the commonality of all other features of the Program would reinforce Panel PCPs’ understanding and attention to the action categories in HealthCheck necessary to make the most of the TCCI Program Array to maximize achievement of OIAs.

In this connection, it is useful to keep in perspective that a Panel with 2,500 CareFirst Members and 2,000 Medicare beneficiaries has an annual target budget for the two payers combined of over \$50 million. Shared savings on a budget of this size could be a powerful motivator. In the Common Model with the same rules, data, infrastructure, supports and incentives, we have seen that learning based on experience with CareFirst Members can quickly and effectively be applied to the greater needs of Medicare beneficiaries who more frequently suffer from multiple chronic diseases and conditions.

The Common Model Pilot ended on December 31, 2015 with remarkable results. Engagement of the PCP is the single most essential element in obtaining the outcomes desired from the Common Model and is the driving force of the Program. Engagement of the PCPs in each Panel leads to knowledge, not only of the Program but of each Panel's Member population – especially when data on episodes and patterns of care is displayed in the same way for both Medicare and CareFirst populations. Panels participating in the Award achieved significantly high levels of engagement.

Engagement Scores at the end of the Award of the 13 remaining Panels show a striking picture when compared to the 345 viable Panels not participating in the Award, as is shown in **Figure 9**. This supports the theory that such a common approach between the region's largest private payer and the region's largest public payer would drive a more powerful transformation of the health care delivery system since a far larger portion of Members and health care spending would be impacted and subjected to the incentives and accountability structure built into the PCMH/TCCI Programs.

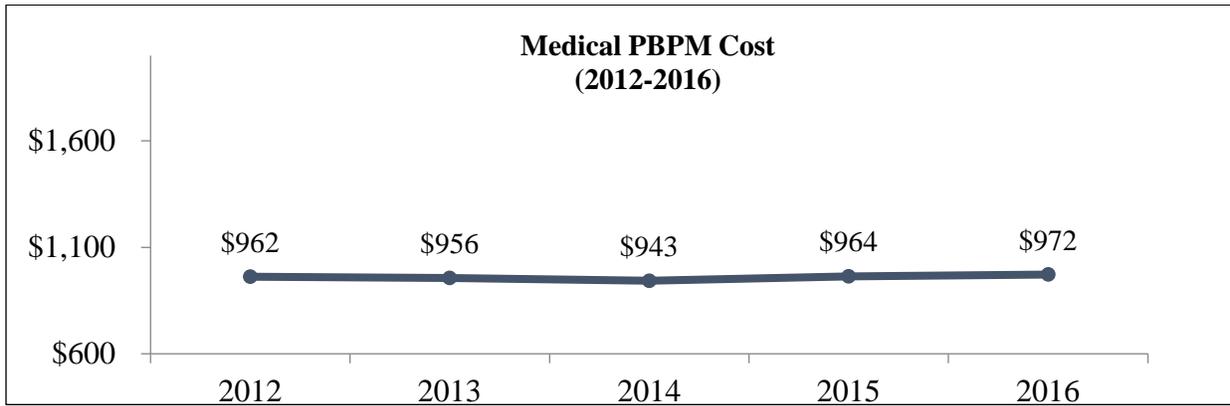
Figure 9: Common Model Impact On Commercial Success (2016)



Source: CareFirst HealthCare Analytics – 2015 Performance Year

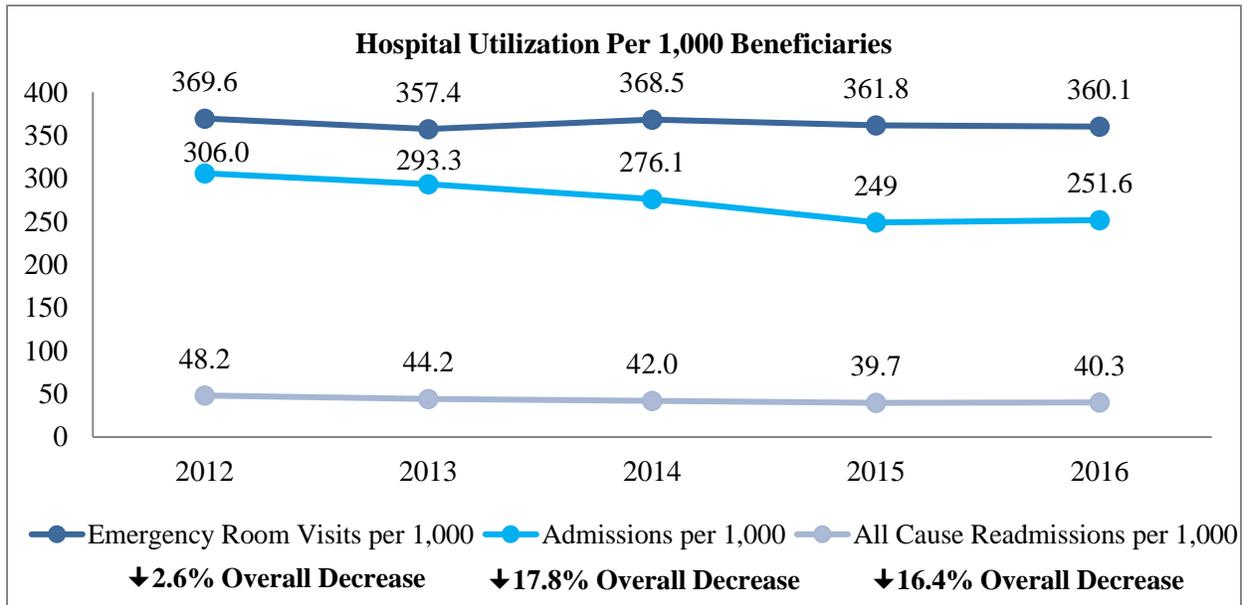
This robust level of engagement helped move utilization and cost trends in the desired direction. The Common Model showed credible evidence of cost savings. When analyzing the Medicare claims data received from CMS during the entire length of the Award (with three months claims run out), the data show Overall Medical PBPM costs remained essentially flat from the Program's 2012 base-year through the end of 2016. This can be seen in **Figure 10**. This trend is remarkable when considering that these costs include the costs of care coordination and ancillary benefits currently not covered by the Medicare FFS program.

Figure 10: Part A & B Costs Per Beneficiary Remained Flat Over The Course Of The Award³



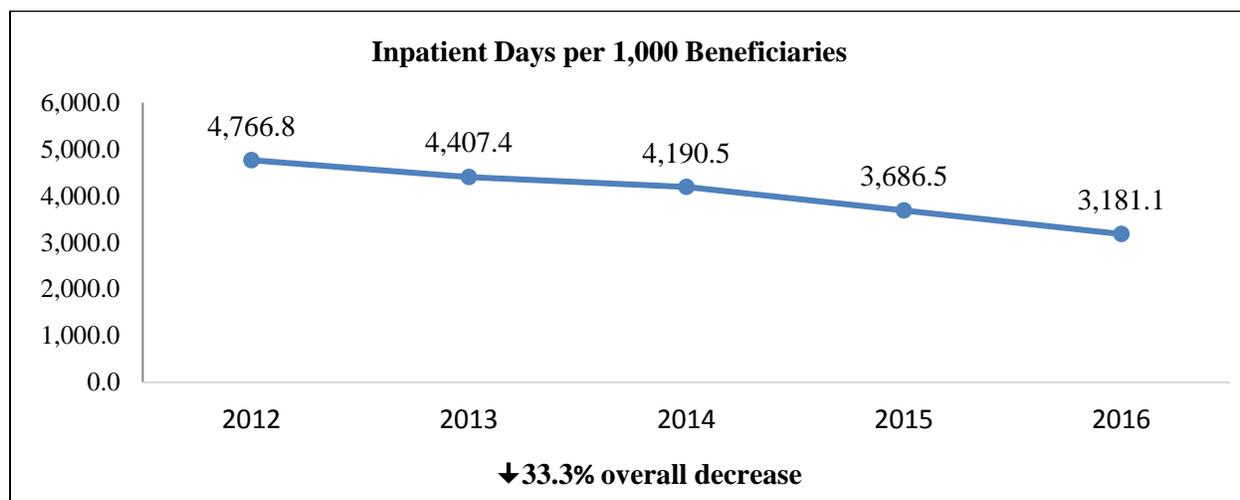
Other utilization metrics also improved. The number of hospital admissions per 1,000 beneficiaries, which continuously increased prior to the launch of the Program, declined by over 17 percent since the Common Model was implemented and ER visits also saw a slight decline as illustrated in **Figure 11**. These are distinctively better than patterns in the non-Common Model population during this period and are noteworthy in a pilot population that averaged 76 years old.

Figure 11: Common Model Beneficiary Hospital Utilization



³ Trend is for CareFirst's In-Service Area Book of Business and excludes the Individual Market Segment Source: HealthCare Analytics – Includes data through December 2016, paid thru March 2017. CareFirst Book of Business, excluding Medicare Primary, Catastrophic and TPA members.

Figure 12: Common Model Beneficiary Inpatient Days



The full, final report of the results of the CMMI Common Model Pilot is included in **Part IV** of CareFirst Program Description & Guidelines.

Commercial Program Results Have Been Encouraging and Even Dramatic in the Six Years 2011-2016

There are five categories of performance metrics that have been tracked to date when assessing the results of the combined PCMH/TCCI Programs in the CareFirst commercial population during the 2011-2016 period. Taken as a whole, results across these categories have been strong. Taking the categories one at a time, key results are summarized below.

Bending the Cost Curve

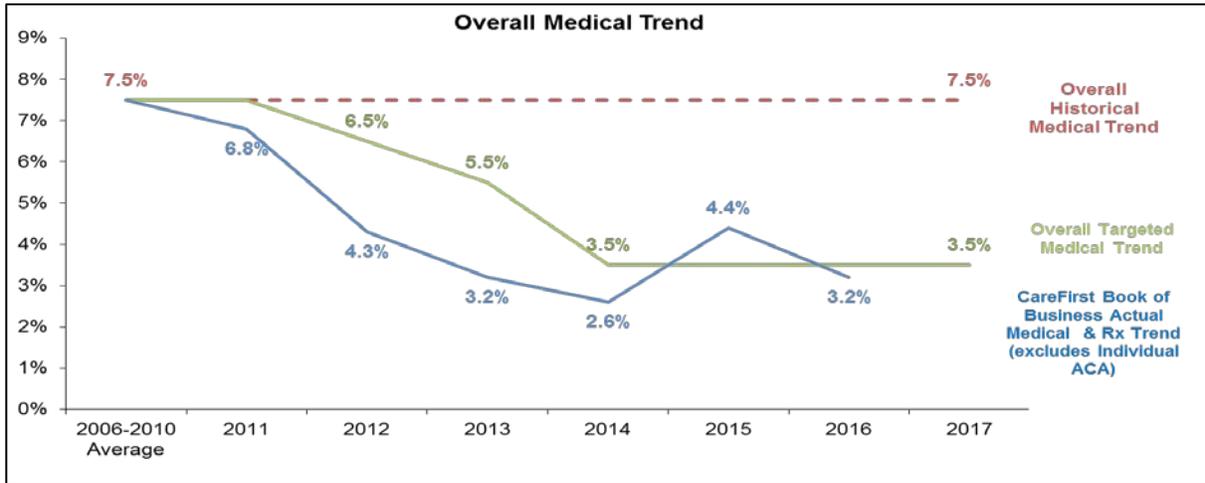
Prior to the advent of the PCMH Program, overall medical trends (“OMTs”) in the CareFirst service area showed a rate of increase of total cost of care for CareFirst Members (on a PMPM basis) in the 7.5 percent range year-over-year. This rate of increase was largely driven by an ever-increasing volume of services – particularly for inpatient and outpatient hospital-based services. It seemed that the persistency of this year-over-year growth in costs was unstoppable.

Specifically, the rate of hospital admissions and re-admissions in the region has been among the highest – if not the highest – in the nation on an all-payer basis. The level of health care costs PMPM approximates \$500 PMPM for many employers – a base that is not sustainable with a rate of escalation at historical levels.

Given this, the central purpose of the PCMH/TCCI Programs is to slow the rise in the OMT on a PMPM basis. This has, indeed, happened as is shown in **Figure 13**.

For the period 2011-2016, the rate of rise in OMT had slowed to the lowest level ever experienced by CareFirst. It is important to view OMT, after 2013, without the impact of the ACA Individual Market. The ACA brought a population of Members who are sicker and whose high costs distort the overall OMT results. As can be seen in **Figure 13**, the rate of increase has been considerably lower than was planned since the launch of the Program and continued through 2016.

Figure 13: Targeted Medical Trend vs. Actual Medical Trend (CareFirst’s Book Of Business)



It would not be fair to claim that this dramatic slowing was caused solely by the PCMH/TCCI Programs – particularly since the larger national picture has also shown a dramatic slowing. Nor would it be fair to assume that these Programs had nothing to do with this slowing. While it is not possible to determine the exact causal relationships, the reinforcing picture presented in the categories of Program performance shown in **Figure 14**, suggests that the combined PCMH/TCCI Programs are having their intended affects.

Sharp Improvement in Key Measures that Matter have Occurred and have been Sustained

The fact that CareFirst in-area membership is split between Members who choose PCPs in the PCMH Program and those who choose primaries who are not program participants (as cited earlier) affords an interesting opportunity to observe the differences in the experience of these two populations on certain key measures (“Measures That Matter”) such as inpatient admissions and readmissions as well as the nature and extent of hospital-based outpatient use.

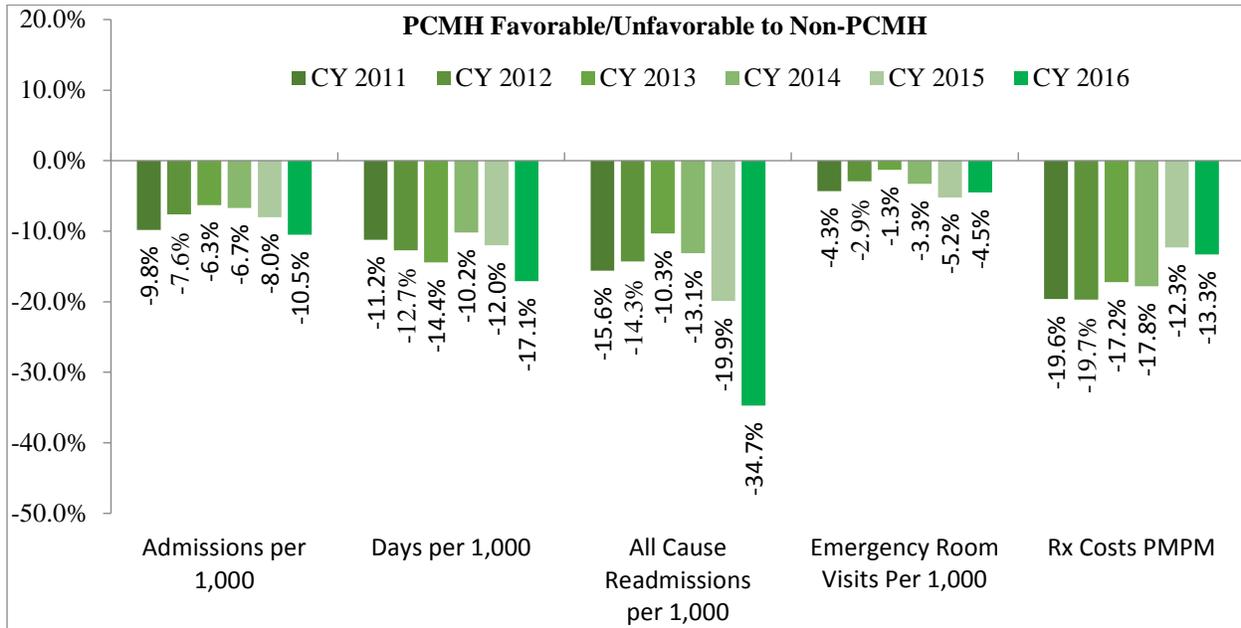
Of these, there are five “Measures that Matter” that have been the most impacted by the Program since the outset. These are listed below.

1. Admissions per 1,000
2. Days per 1,000
3. All Cause Readmissions per 1,000
4. Emergency Room (“ER”) Visits per 1,000
5. Drug Costs Per Member Per Month (“PMPM”)

Since the PCMH and non-PCMH populations are of substantial size, they are fully credible from an actuarial standpoint and they provide a solid basis for comparison on the key measures. This is further strengthened by the fact that both populations live in the same region, are covered by similar CareFirst benefit plan designs, use the same CareFirst provider networks and are served by the same CareFirst administrative capabilities.

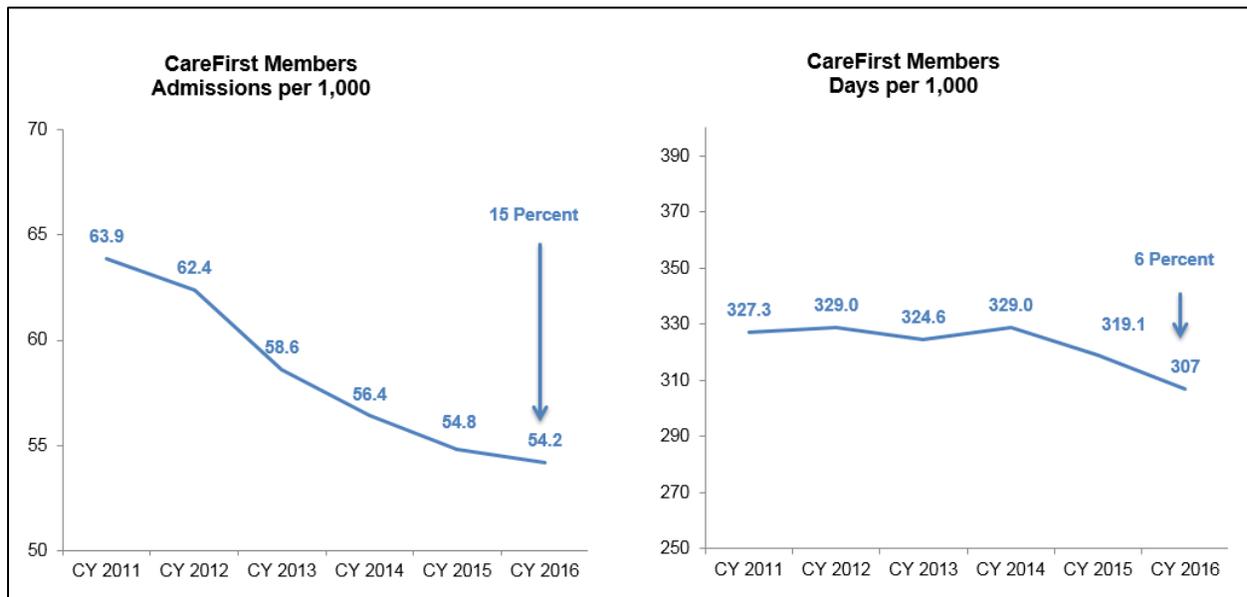
As shown in **Figure 14**, there are marked differences in the way the two populations appear with regard to the key measures of use of health care services.

Figure 14: Measures That Matter⁴



It is noteworthy that the pattern of use reflected in these measures has generally held up over time and has had significant impact on the utilization measures of CareFirst’s entire book of business as can be seen in **Figures 15 and 16** below. All measures reflect the results intended in the Program design and bode well for future results as the Program continues to mature.

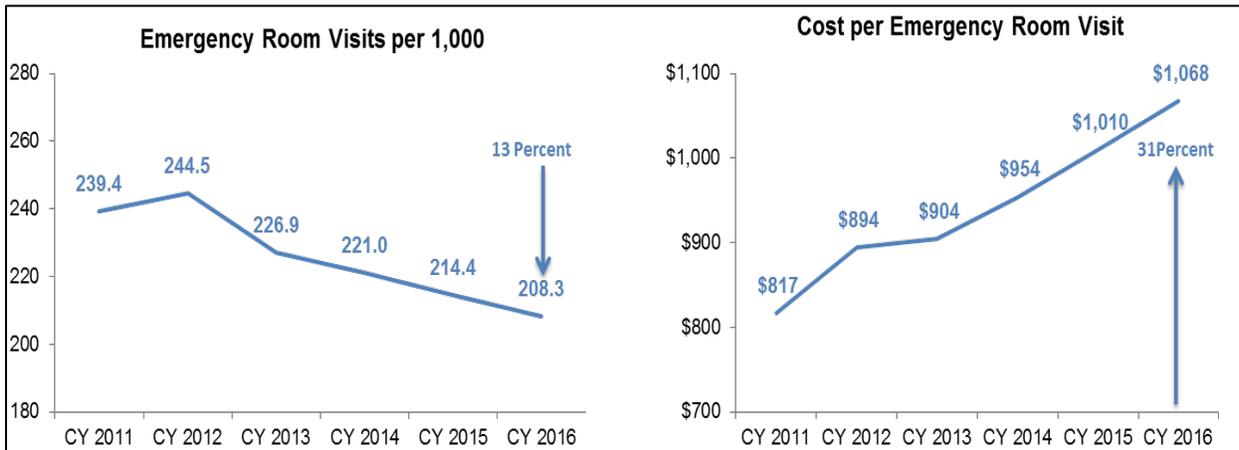
Figure 15: CareFirst Book Of Business Admission Measures⁵



⁴ Source: CareFirst HealthCare Analytics - Attributed PCMH Primary Care Provider (PCP) population compared to attributed non-PCMH Primary Care Provider (PCP) population. Includes data through December 2016, paid through March 2017. Exclusions: Medicare Primary, Catastrophic and TPA.

⁵ Source: CareFirst HealthCare Analytics - In-Service Area Book of Business Claims Incurred December 2016, paid through April 2017

Figure 16: CareFirst Book Of Business Emergency Room (ER) Visit Measures⁶

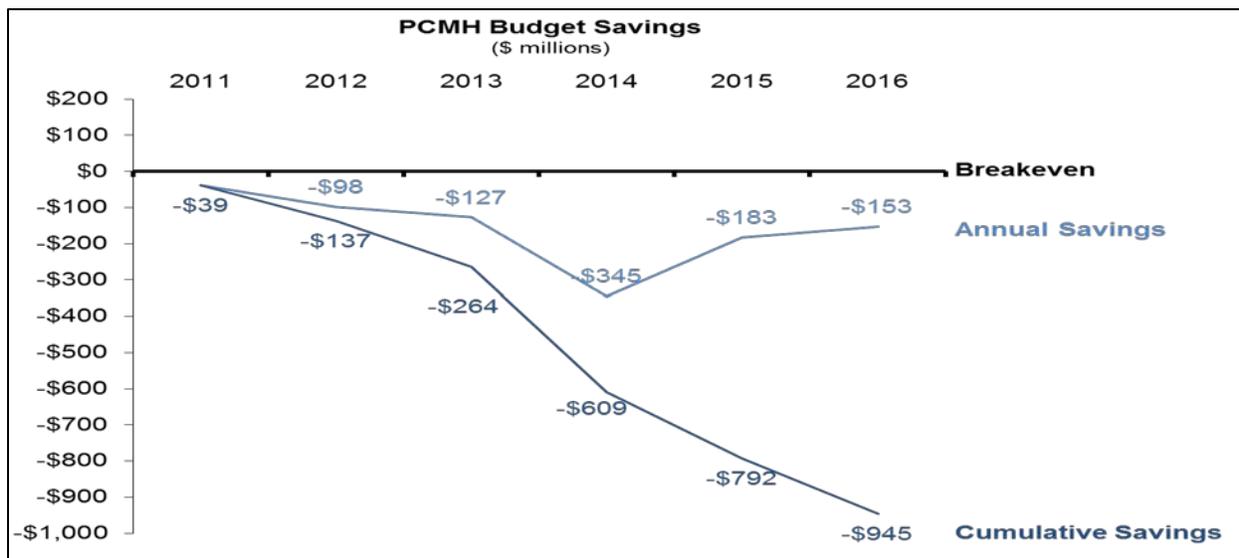


Winning Panels Outperform Non-Winners by a Substantial Margin

The PCMH Program provides strong incentives to Panels to earn OIAs on an annual basis. In essence, these awards share the savings that Panels achieve against their global budget targets and ratchet these awards up when savings are achieved with higher Quality Scores and with consistently strong results over multiple consecutive years.

In the Program’s first **Performance Year #1 (2011)**, 60 percent of Panels won an OIA by beating their global budget targets by 4.2 percentage points while those Panels that did not produce savings were above target by four percent. This spread in performance - over eight percentage points - between the winning and non-winning Panels caused a net savings of \$39 Million, larger than expected in the first year. This pattern continued in following years, producing a net savings for the Program, so far, of \$945 Million, as show in in **Figure 17** below.

Figure 17: PCMH Net Savings 2011-2016



⁶ Source: CareFirst HealthCare Analytics – In-Service Area Book of Business Claims Incurred December 2016, paid through March 2017

After the initial year of the Program, the percentage of Panels that won an OIA rose to a high of 68 percent in 2013 and was still at 60 percent during the sixth Performance Year of the Program. The average OIAs in each year ranged from 25 percent in the first year to a high of 59 percent in **Performance Year #4 (2014)**.

It is noteworthy that since **Performance Year #4 (2014)**, the percent of Panels that received OIAs is materially lower than the percentage of Panels that produced savings. This is due to increased quality standards that caused a number of Panels to forfeit OIAs. In 2016, this pattern continued. However, the percentage of Panels who produced a savings but did not realize an OIA was at its lowest level, seven percent, since the increased performance standards in 2014.

The results for each Performance Year are shown in **Figure 18**.

Figure 18: Outcome Incentive Award (OIA) Results By Performance Year

Performance Year	Percentage of Panels with Savings	Percentage of Panels Receiving OIA	Average Award	Net Savings % (All Panels)*
2011	60%	60%	25%	1.5%
2012	67%	66%	33%	2.7%
2013	68%	68%	37%	3.1%
2014	84%	48%	59%	7.6%
2015	74%	57%	42%	3.9%
2016	67%	60%	49%	3.0%

These results have exceeded the expectations that existed at the outset of the Program by a substantial margin.

Value-Based Incentives Drive Behavior-Change without Risk of Base Fees

It is important to understand that these results have occurred in a model that does not share down-side risk with or penalize PCPs for underperforming on cost targets. CareFirst offers three different types of value-based payments to PCPs in the PCMH Program that are explicitly tied to value-based activities as well as global cost and quality outcomes. PCPs receive substantial value-based payments to encourage strong Care Coordination and substantial bonus payments for attaining better quality and total cost outcomes for the CareFirst members that are attributed to them.

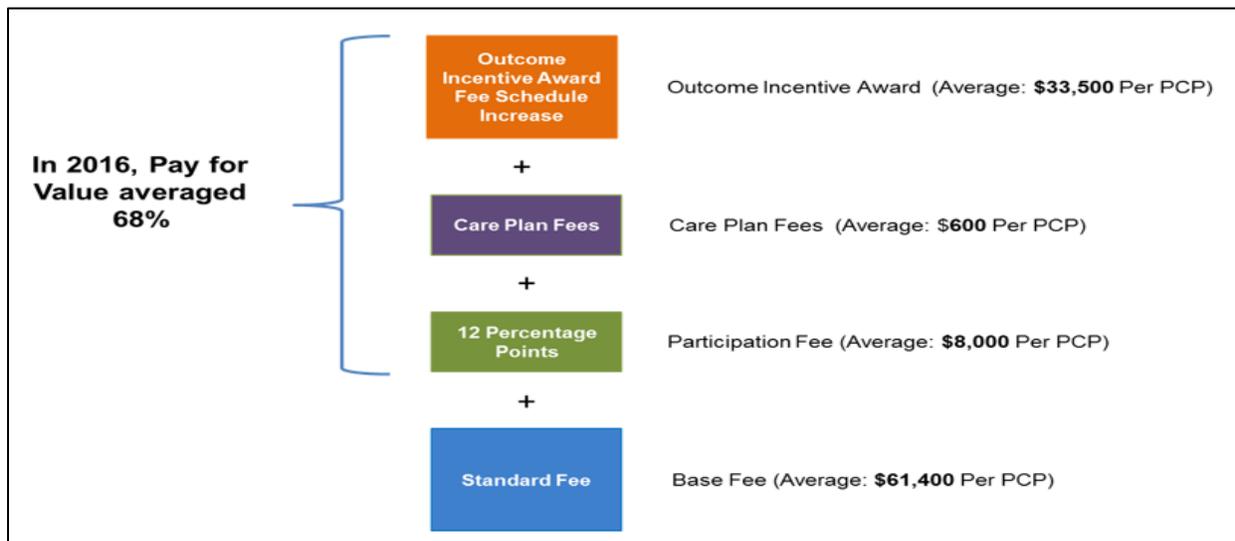
First, all PCPs are paid an ongoing Participation Fee equal to a 12-percentage point supplement to their professional fee schedule. The Participation Fee is tied to each Panel’s continuing “engagement” and good standing in the PCMH Program. Beginning January 1, 2017 CareFirst will reduce or eliminate this fee for Panels that consistently fail to achieve minimum engagement scores. This refinement makes the participation fee an “at risk” payment that is tied to actual quality performance, but that does not burden primary care practices with potential loss of their base income due to insurance-type risk.

Second, PCPs are paid \$200 to develop and \$100 to maintain care plans (in addition to regular visit fees) in active oversight of registered nurses assigned to their practice through the PCMH Program. These amounts recognize the additional time involved in setting up and monitoring Member compliance with care plans. CareFirst arrived at this approach based on analysis from our early pilots with PCMH incentives.

Third, Panels may earn an OIA for achieving better than target overall cost and quality outcomes for the attributed population in each Panel. The OIA is analogous to a shared savings payment. This payment is critical to motivate PCPs to achieve improved results and undertake the additional workload of Care Coordination and practice transformation. In other words, Panels must produce demonstrable results that are consistent with Program objectives in order to achieve an OIA. As you can see in **Figure 19**, this third category of value-based payment is the most significant of the three value-based components in the Program.

The average PCP earns just over \$60,000 in standard fee-for-service claims payments from CareFirst. This base fee is never reduced for any PCP because of performance in the Program. And when combining the three value-based payments in the PCMH Program, the average additional payments approximated \$42,000 in additional annual income, - or approximately 68 percent greater income than had the Program not existed.

Figure 19: Average Value-Based Payments For Winning PCPs, 2016



Wide Differences in Results Across Panels Emerge

With five years of experience now complete, patterns relating to the consistency of results can be seen. The Program has an abiding interest in finding top performing Panels of PCPs who have performed at high levels of efficiency and quality over an extended period of time. The Program considers a longitudinal, three-year record sufficient to make judgments about which Panels are doing better than others.

Accordingly, the experience of all Panels with at least three years of experience is gathered and compared to other Panels with similar duration of experience on a rolling three-year basis. Panels are ranked from lowest to highest cost PMPM on a risk adjusted (global PMPM) basis. Additionally, their Quality Scores over the three years are calculated and the rate of rise or decline in their aggregate care costs and Quality Scores is also determined.

This results in a ranking of Panels by quartiles – with the lowest cost/highest quality performers placed in the first quartile (High Performers) and the highest cost performers/lowest quality performers in the fourth quartile (Lowest Performers). The uniformity in program design and data definitions/measurement enables such comparisons to be validly made. This would not be possible if each Panel were doing its own version of Care Coordination and medical home program. These rankings are shown in **Figure 20**.

Figure 20: Variation In Cost Among PCMH Panels⁷

Adult Panels			Pediatric Panels	
Cost Quartile	Risk Adjusted PMPM		Cost Quartile	Risk Adjusted PMPM
Low	\$348.65	← 25.0% ←	Low	\$145.79
Mid-Low	\$376.53		Mid-Low	\$160.85
Mid-High	\$401.01		Mid-High	\$176.26
High	\$435.94		High	\$194.76
Total	\$390.03		Total	\$168.97

In looking at the reasons for better performance, it appears that the single most important factors are where Panels refer their Members for specialty care and whether they are part of large, integrated delivery systems. Large health systems Panels and large multi-panel practices heavily populate the high cost quartile while independent, community-based Panels generally perform better and heavily populate the low-cost quartiles. See **Figure 21**.

Figure 21: Variation In Cost Among PCMH Panel Types⁸

Cost Quartile	Health System Panels	Virtual Panels	Single Panel Independent	Multi-Panel Independent
Low	13%	39%	27%	12%
Mid-Low	23%	28%	35%	15%
Mid-High	30%	19%	27%	25%
High	34%	13%	29%	37%
Total	100%	100%	100%	100%

It is noteworthy that the best performers in the top quartiles take on Members that are sicker based on their average Illness Burden Scores and maintain Quality Scores that are comparable to the Panels in the other quartiles who have

⁷ Source: CareFirst HealthCare Analytics – 2016 Data for Panels Participating in PCMH.

⁸ Source: CareFirst HealthCare Analytics – 2016 Data for Panels Participating in PCMH.

higher PMPM care costs. That is, it does not appear that higher costs result in higher quality of care or that lower costs result in lower quality of care.

Improvements in Engagement and Quality Scores have been Strong

As the Program matures, Panels have become increasingly engaged in both the Care Coordination and practice transformation aspects of the Program. A key measure of Engagement is the PCPs participation in Care Coordination of Members with multiple chronic conditions. This involves identifying Members who would most benefit from Care Coordination, introducing the Program to Members, and working with the LCCs on coordination activities and Member follow-up.

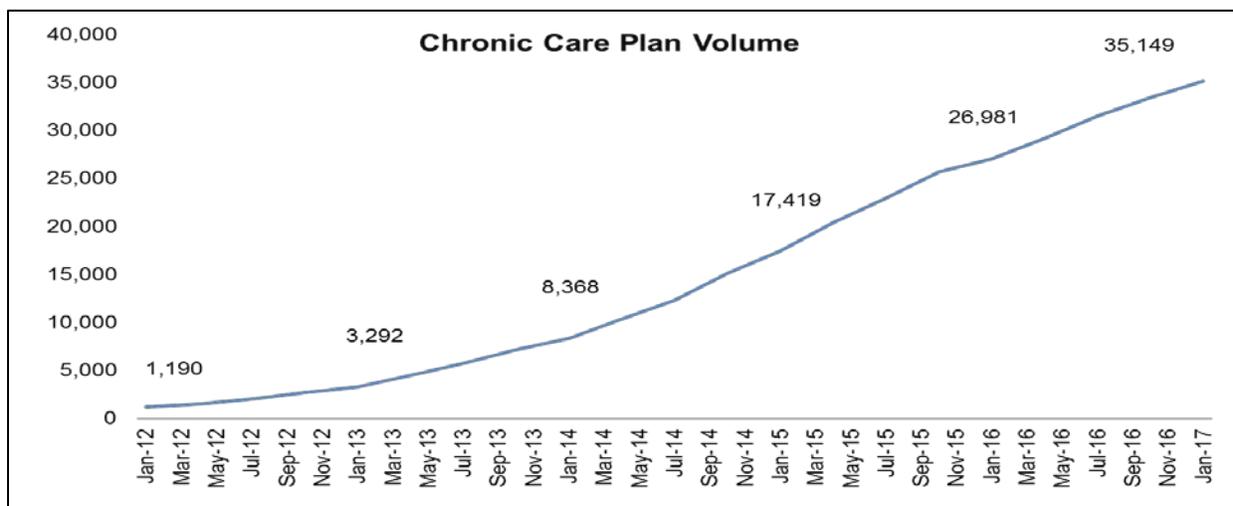
There were more than 3,000 PCPs who had at least one Member in a Care Plan in 2016. This is nearly seven times the number of PCPs with a Member in a Care Plan in 2011 (approximately 390) and almost triple the number of PCPs with a Member in a Care Plan in 2012 (approximately 900). Of the PCPs who have had at least one Member in a Care Plan, 49 percent have had at least five Members and 29 percent have had 10 or more.

The standard for Panel achievement of a minimum Engagement Score has increased from an average of two Care Plans activated by 60 percent of Panel PCPs to an average of five Care Plans activated by 90 percent of Panel PCPs. With the growth in Care Plan volume, there has been a growth in the number of nurse Care Coordinators operating in the field. In 2017, there are 250 such nurses working with Panel PCPs.

Once a PCP has a Member in a Care Plan and establishes a relationship with a Care Coordinator, he or she has a better understanding of the support resources and data and analytic tools available to manage his or her population and is inclined to do more Care Plans. This seems to be the key to opening up understanding of the Program and to increased receptivity on the part of PCPs to the Program’s incentive structure and goals.

The growth of Care Plans volume is shown in **Figure 22**.

Figure 22: Chronic Care Plan Volume By Month 2012-2017 ⁹

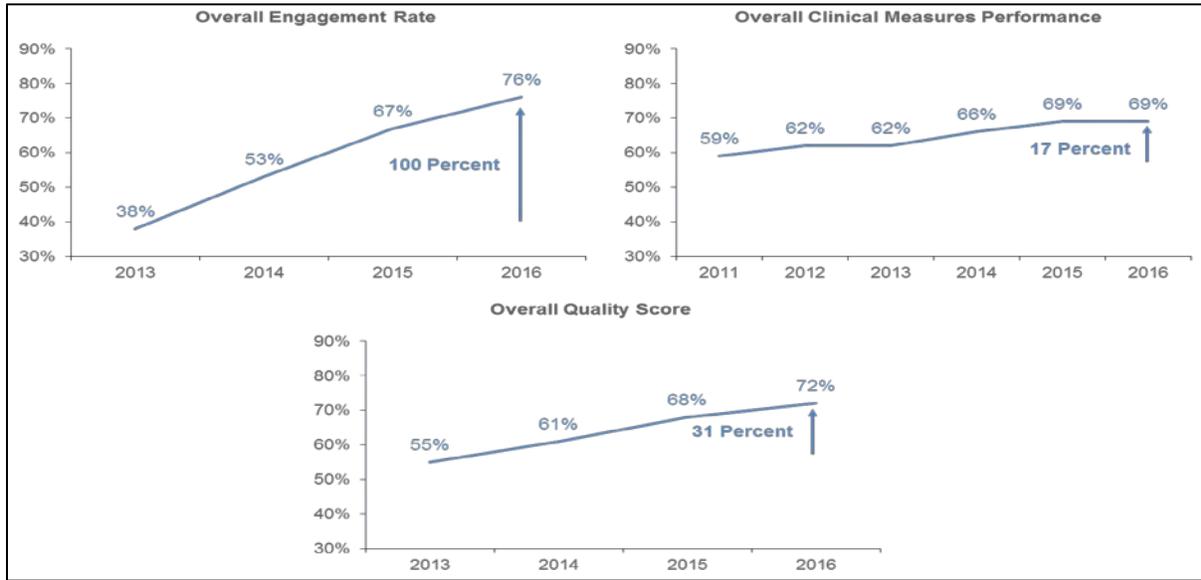


The rise in Engagement among PCPs is evident not only in the Care Plan totals, but also in the consistent rise in Quality Scores among Panels. The Overall Quality Score is an equally weighted average based on the value of the Engagement and Clinical Quality. Over the last four years of the Program Panels have increased their overall Quality Scores by 31 percent. Much of this increase is due to a material increase in the Engagement levels of PCPs over time. Clinical measures have also risen but at a less dramatic rate, increasing 17 percent since the inception of the Program in 2011.

⁹ Source: CareFirst HealthCare Analytics – Chronic Care Plan Volume by Month through February 1, 2017

It is worth noting that Engagement was not scored in **Performance Year #1 (2011)** and only 25 percent of Panels received an Engagement Score in 2012. Therefore, these two Performance Years' Engagement scores cannot be equitably compared to the panel averages for later years. Beginning in 2013 all Panels were scored on Engagement and since then, Engagement Score rates across all Panels have continued to improve on average by 12.5 percent each year. **Figure 23** displays this increase in quality over time.

Figure 23: Average Quality Score Improvement Over Time



While CareFirst updates the clinical measures in the Score Card to maintain alignment with industry standards (i.e. Healthcare Effectiveness Data and Information Set (“HEDIS”)), several clinical measures have persisted throughout, with Adult measures being consistently scored since the inception of PCMH in 2011 and the addition of many more Pediatric measures in 2013. Most of these are preventive measures: cancer screenings for adults and immunization and well-visits for children (see **Figure 24**). With one exception, Lower Back Pain, all clinical health-based measures have made material improvements since they were first rated in the PCMH Score Card. With this level of quality, CareFirst expects that the rise in quality scores will be tapering and maintain current rates.

Not only did the average clinical quality improve year-over-year, but Members attributed to a PCMH PCP outperformed Non-PCMH Members on every clinical measure on the Scorecard. On average, PCMH Panels performed 13 percentage points higher than Non-PCMH Panels on the same measures. **Figure 24** on the next page displays each measure and the score of both populations of Members.

Figure 24: PCMH vs. Non-PCMH Clinical Quality

	PCMH Clinical Quality Score Card	Non-PCMH Quality Scores
Adult - Preventive Health Measures	2016	2016
Breast Cancer Screening	76.20%	59.28%
Cervical Cancer Screening	73.60%	63.49%
Colon Cancer Screening	62.70%	48.39%
Adult - Other Health Measures		
Patients with Low Back Pain	72.90%	70.24%
Diabetes - HbA1c Screening	87.00%	81.28%
Diabetes - Retinal exam	39.50%	26.79%
Diabetes - Medical Attention for Nephropathy	80.00%	76.25%
Pediatric - Preventive Health Measures		
<i>Childhood Immunizations / Well Visits</i>		
Diphtheria, Tetanus, and Pertussis Vaccine (DTaP)	74.00%	53.32%
Inactivated Poliovirus Vaccine (IPV)	80.70%	59.01%
Measles, Mumps, & Rubella Vaccine (MMR)	93.20%	77.58%
Haemophilus Influenzae Type B Vaccine (HiB)	84.10%	63.63%
Hepatitis B Vaccine (Hep B)	24.70%	23.56%
Varicella-Zoster-Virus Vaccine (VZV)	92.60%	76.42%
Pneumococcal Conjugate Vaccine (PCV)	74.60%	53.36%
Hepatitis A Vaccine (HepA)	90.00%	72.99%
Rotavirus Vaccine (RV)	74.00%	51.03%
Influenza Vaccine (Influenza)	60.10%	48.68%
Well-Child Exams Ages 0-15 Months	76.20%	39.60%
<i>Adolescent Immunizations / Well Visits</i>		
Meningococcal	83.40%	56.35%
Diphtheria and Tetanus Toxoids (Tdap/Td)	85.50%	62.09%
Human Papillomavirus Vaccine (HPV) for Females	17.40%	10.25%
Well-Child Exams Ages 3-6 Years	82.20%	41.72%
Pediatric - Other Health Measures		
Children with Viral Upper Respiratory Infections	92.60%	86.17%
Children with Pharyngitis	94.30%	83.81%
Total Average	73.81%	57.72%

Each year CareFirst audits hundreds of cases of Members in active or recently closed Care Plans. In so doing, CareFirst reviews and analyzes detailed clinical outcomes from claims, the Member’s Health Record, Care Plan and Care Coordinator progress notes to determine clinical outcomes of the PCMH and TCCI interventions. These findings have been encouraging.

For example, in 2016, the audit looked for improvement of A1c in Care Plan Members with diabetes. Testing A1c gives a picture of a Member’s average blood glucose control for the past two to three months. Even a slight decline has a material impact on the health of a Member. Just a one percentage point decrease in A1c produces a 40-45 percent decreased risk of cardiovascular death and risk of microvascular complications such as kidney diseases, eye diseases, and neuropathies. Members in Care Plans experienced an average decrease in A1c of 3.6 percent upon completion of a Care Plan. Similarly, the audit found that Members with obesity as a condition decreased their Body Mass Index (“BMI”) by 6.8 points.

Future Program Direction

In the Program’s seventh Performance Year, the direction from here is to:

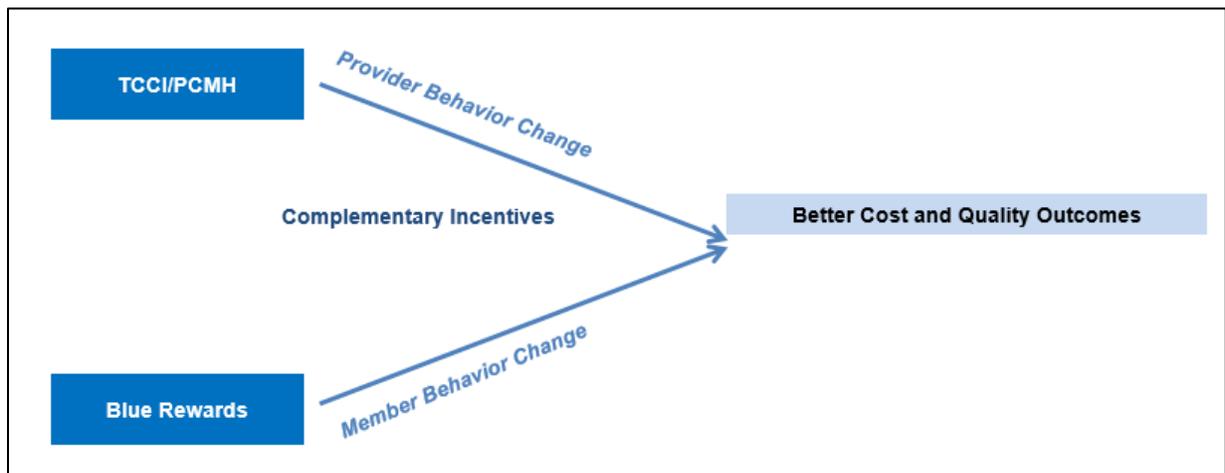
- continue to strengthen and scale up the supports provided in the TCCI Program Array;
- deepen understanding among PCPs regarding how the incentives in the Program work in the context of global budgets and performance targets;
- encourage Panels to focus on the five key categories of action in the HealthCheck Scorecard (especially referrals and intra-Panel consistency of performance among PCPs); and
- strengthen the intra- and inter-Panel comparisons that spur competition among providers in the Program toward higher levels of performance as teams, which become higher performance units.

In the end, the model at the core of the PCMH Program is a free market, competitive model in which PCPs pursue self-interest by serving their Member’s interest more effectively. The goal is to reward those who intervene in the health risks of their Members early, coordinate care of the multi-chronic Member with attentiveness and most of all, “buy” or “arrange” expensive specialty services with great attention to cost and quality outcomes (in which the PCP has a stake as well as the Member).

Benefit Designs that Assist Higher Quality and Cost Control

The PCMH Program is designed to work in concert with CareFirst products that align Member incentives. While the CareFirst PCMH Program rewards PCPs for ring low-cost, high-quality care delivery, CareFirst products reward Members for taking control of their health and being careful how they access health care services. Incentives woven into CareFirst health benefit plans encourage Members to strive to achieve the same goals that the PCMH Program rewards providers to meet.

Figure 25: Aligning Provider And Member Incentives To Shape Behavior Change



Through the Blue Rewards Program, benefit plan coverage, and cost-sharing changes, CareFirst has introduced benefit designs that encourage Member selection of high-performing PCPs, awareness of health status/roles, achievement of improved health outcomes, and increased consideration when selecting the most cost-effective setting of care. These benefit designs are pervasive among all premium-based individual and small group plans as well as with large group self-insured designs – whether these are HMO or PPO in nature.

Additionally, CareFirst’s benefit plans include the ability to waive cost-sharing requirements when a Member is placed in a Care Plan under the direction of their PCP. This is based on the observation that even minor cost sharing amounts discourage compliance with a Care Plan or in gaining the Member’s consent to enter into a Care Plan in the first place. The waiver of cost sharing is, however, conditioned on the Member’s continuing compliance with the elements of the plan. This aligns the interests of all involved – PCP, Member and nurse coordinator.

The PCMH Program helps PCPs steer Members away from expensive hospital-based services, unless they cannot be provided effectively in a non-hospital setting. To support this effort, Blue Rewards and other CareFirst benefit design reflect differential cost-sharing to encourage Members to access care in the most appropriate and cost-effective setting. As illustrated in **Figure 26**, Members who access care in higher cost settings may be subject to higher out-of-pocket costs, (e.g., deductible and/or higher co-pay).

Figure 26: Members Are Induced To Seek Most Efficient Care Settings¹⁰

Service	Freestanding	Hospital Setting
Labs	\$15 co-pay	Deductible, then \$30 co-pay
X-rays	\$30 co-pay	Deductible, then \$60 co-pay
Imaging	\$200 co-pay	Deductible, then \$400 co-pay
Urgent/Emergency Care	\$50 co-pay	Deductible, then \$250 co-pay
Outpatient Surgery	\$200 co-pay	Deductible, then \$300 co-pay

Additional incentives include waiving some of the deductible when a Member takes an annual health assessment and consents to share the results with the Member’s PCP. The Program also rewards a Member for reducing their known risk factors – usually through diet, exercise, and smoking cessation. These rewards typically take the form of a reduction in the Member’s cost share (through a credit) against their deductible or as a credit on a medical expense debit card.

Perhaps the most significant of all is an incentive for a Member to pick a PCP within a high-performing Panel as part of the PCMH Plus Program. Special additional rewards – in the form of a credit against a deductible or a credit on a medical expense debit card – are offered to Members who select top performing PCPs in Panels with strong, proven performance over a three-year period as described above (i.e., top tercile or top two terciles). These PCPs constitute a select PCMH network in the CareFirst provider directory to ease Member choice. The PCMH Plus incentives are not available for Maryland risk coverage plans in the individual and small group markets due to constraints in Maryland law, but are available for all coverage plans in the District of Columbia and Virginia as well as all self-insured groups everywhere in the CareFirst Service Region.

The desire of Members to select such top performing PCPs is high due to the considerably greater cost sharing (in the form of higher deductibles and out-of-pocket expense) built into ACA benefit plan designs – particularly on the Silver and Bronze levels.

Encouraging Members to choose PCPs in top performing Panels who, in turn, direct specialty care referrals to their own selected specialists (and hospitals) is a key goal of benefit designs. It appears – based on the first six months of 2016, that these designs increase the market share of high performing Panels and the specialists while re-directing referral traffic away from other specialists and hospitals.

In these ways, the Program uses market forces to reward strong performers and place pressure on lower overall value performers to improve. In the long term, Panels that receive substantial supplemental/earned income based on their

¹⁰ *Examples of cost-sharing in BlueChoice Advantage Gold 1000, 2016*

performance should be in the best place to recruit and retain new PCPs in order to sustain and grow their enrollment and revenue.

Summary Of Key Insights To Date

Five years of experience provides a practical perspective on the elements of greatest importance in the CareFirst PCMH Program and the TCCI Programs. Five design features, thought to be important at the outset, have proven to be every bit as critical as originally believed. These are:

PCP Scope of PCP Accountability Needs to be Global

It has turned out to be essential that PCPs in Panels are accountable for all care outcomes and all costs for all the Members in their Panel. Only six percent of all the care costs that CareFirst pays for its membership are for primary care services while all other costs are driven by specialists, hospitals, or ancillary providers (including pharmacy). Yet, having a direct economic interest in the downstream implications of their own referral decisions and in unplanned care by Members creates a focus and attentiveness in PCPs to the whole care experience of Members that is essential to cost control and quality outcomes alike.

Nature of Incentives Have to be Tied to Population Health Outcomes at a Panel Level

Population health management, when coupled with a Member-centric approach, requires a strong PCP interest in the ultimate outcome for an individual as well as for the whole population of Members in a Panel. Therefore, reward under the Program comes when the sum of individual results contributes to improved outcomes for the whole membership of a Panel in a way that can be seen and measured as well as compared across all Panels in a consistent way. This is the essential goal of the "population health" approach that is at the heart of the Program.

OIAs in the CareFirst PCMH Program are just what their name implies – rewards for better outcomes on both quality and cost effectiveness for the whole membership of each Panel. These awards are always at the Panel level and mirror the scope of accountability of PCPs. And, for each Panel, the OIAs are not dependent on the whole Program's results – but, instead, determined Panel by Panel where no Panel's award is dependent on what other Panels do or on how the whole Program performs. It is each Panel's results that dictate awards.

This greatly focuses PCP attention on what each Panel, itself, has to do. So, if one or more Panel PCPs in the Panel are not performing, it becomes a matter of great interest to the other Panel Members who can – and do – place peer pressure on the poorer performers in close quarters (given the small size of Panels).

Consistency in Incentive Design is Essential

It takes considerable time and experience to win over skeptical PCPs who have become deeply convinced that payers undervalue their service and underpay them. It is critical that they come to believe that changes in their income based on value-based payment tied to better outcomes will actually be fairly measured and rewarded. A Program with changing rules, moving goal posts, changes in measurement processes or too many requirements undermines trust and, with it, the will it takes to change established ways of practicing.

One other point here: Incentives are essential, not large risk shifts and penalties. Placing global insurance risk on a PCP who is not able to bear that risk is not fair and undermines the whole purpose of incentives, creating distrust and behavior that undermines the purpose of the Program – to serve Members more effectively. It certainly appears, based on six years of experience, that incentives, and the risk of losing them, are a sufficient motivator when constructed soundly.

Self-Chosen Teams with Wide Specialty Physician Choices are Critical to PCP Acceptance of Accountability

We have learned that it is critical that PCPs be able to pick their own Panel teams and change the membership of these teams if need be. While there has been modest change in Panel composition during the first five years, we expect more "tuning" to occur in teams as maturity in experience and understanding deepens.

An equally important point is that Panel “teams” are just now beginning to extend their focus to preferred specialists underscoring how difficult it is to make substantial, sustained changes in health care delivery modes. These changes in referral patterns will be strongly encouraged and watched closely as the Program continues to mature.

Data Must Be a Click Away

As in so many fields, the importance of understanding patterns cannot be overstated. Without comprehensive views of patterns matched with the ability to drill down into the details behind them (to the Member and service level), there seems to be inattentiveness on the part of primaries to feedback. The more available, the more complete and the more drillable the data, the more it is used in decision making by PCPs. This is essentially what SearchLight and HealthCheck analytics capabilities provide to Panels.

Conclusion

With all of this said, the overwhelming impression after six years of experience with the TCCI/PCMH Programs, on a large scale, is that making progress toward better outcomes is hard to achieve, but possible, even if it seems slow. Changing the perspective and context for PCPs – away from the treadmill of visit-based reimbursement to Member-centric population management - is also very hard to do, but possible. But, FFS cannot – and should not – be removed as a basis of payment. It should be held in check.

Getting PCP “buy in” to all the elements of the PCMH Program and TCCI Program Array requires persistence and a credible partnership between payer and provider after years during which this was not present. This means scrupulous attention to detail, to honest, respectful relationships and to follow through on support and making good on OIA’s actually earned.

The challenge, therefore, is not in the doing of one or two things better or differently, but, rather, in the doing of dozens of things differently and consistently as part of a coherent whole. This is at the heart of the purposeful, integrated design of the PCMH and TCCI Programs and the Member benefit plan designs that dovetail with them.

Several remaining elements of the infrastructure to support the PCMH/TCCI Programs are still being put in place even though an enormous amount has already been constructed. As of January 1, 2017, there were approximately 75 HTC nurses stationed in area hospitals, another 85 case management nurses and yet another 250 nurses in local communities working with Panels and their Members every day. This latter number is expected to increase in the coming years. There were also 25 data experts – Practice Consultants – working full time with Panels to help them see and react to the patterns that are most telling. This number, too, is expected to increase. And, the Program is expected to engage Members in over 900,000 interventions 2017 that are needed for their health and wellbeing.

Gradually, Panels learn the Program, how the incentives work and how to effectively work with nurses assigned to them. They learn how to do a Care Plan and how to interpret and use the data. They learn to trust Program rules and the staff that carries them out.

Were it not for the blend of global capitation and FFS features of the model, there would be little usable data and little in the way of disciplined, comparative information. This is very likely one of the most critical learnings. FFS payment not only preserves and builds a comprehensive data base, it easily accommodates the ever changing and the complex patterns of service to Members. The challenge is not to replace FFS, but to check its volume inducing tendency through global capitation-like features.

In the end, quality – particularly for the multi-chronic, resource intensive Member – is best achieved by an attentive PCP able to see data well outside their own practice who is supported by a nurse led team able to function across all care settings in constructing and following up on a Care Plan. To make this happen requires a great deal more than incentives to the PCP. All of the programs that make up the TCCI Program Array are operated and arranged by CareFirst with this end in mind, as is the administration of all data and incentives in the PCMH Program. There is no charge to Panels for these supports.

When taken together in a unified Program structure – as is described in great detail in the Program Description and Guidelines that follow - the opportunity for real improvement is enabled.

To realize this improvement, however, a different perspective and mindset among PCPs is the single most important need that must be met before attention to total outcome for a Member or a cohort of Members can be achieved and sustained.

CareFirst expects the Program to continue to mature as measured by broader, deeper and consistent PCP understanding of all Program elements - resulting in their significant behavioral change. Progress, so far, towards this goal is well underway.

Independent analyses are now ongoing to assess all aspects of the Programs' impacts. These analyses have resulted and will result in published papers as experience develops in the Program. So far, there are strong reasons to be encouraged and press on.