Oregon Coordinated Care Organizations'

Health Information Technology Efforts

Oregon Health Authority, Office of Health Information Technology

June 30, 2015

Executive Summary

This Executive Summary provides an overview of the June 30, 2015 report on the health information technology (HIT) initiatives underway in Oregon's 16 Medicaid coordinated care organizations (CCOs).

Health Information Technology (HIT) and the Coordinated Care Model

Oregon's coordinated care model is designed to improve health, improve care, and lower costs (the "Triple Aim"). HIT plays a critical role in realizing each of these goals of transforming Oregon's health care delivery system. The collection, sharing, and use of health information can facilitate improved:

- Care coordination and population management
- Integration of physical, behavioral, and oral health
- Accountability, quality improvement, and metrics
- Alternative payment methodologies
- Patient engagement

The coordinated care model relies on access to patient information and the HIT infrastructure to share and analyze data. Each of Oregon's 16 Medicaid CCOs has committed to a variety of HIT initiatives to assist them in pursuing the Triple Aim.

Overview of CCO HIT Efforts

All 16 CCOs have made an investment in HIT in order to facilitate healthcare transformation in their community. Nearly all CCOs are pursuing and/or implementing both:

- health information exchange/care coordination tools as well as
- population management/data analytics tool.

Even with those similarities, each of the 16 CCOs chose to invest in a different set of HIT tools.

Through their implementation and use of HIT, CCOs reported early successes in achieving goals such as:

- Increased information exchange across providers to support care coordination
- Making new data available to assist providers with identifying patients most in need of support/services and to help providers target their care effectively
- Improved CCO population management and quality improvement activities, through better use of available claims data, while pursuing access to and use of clinical data

CCO Approaches to Developing and Implementing HIT Efforts

In general, CCOs sought to understand which HIT and EHR resources were in place in their community and provider environments, identify which HIT capabilities were needed to support the CCO's efforts, and identify strategies to meet those needs including leveraging existing resources or bringing in new HIT tools to fill priority needs. Ultimately, the combination of different CCO community, organizational, geographic and provider contexts as well as the variation in EHR and existing HIT resources led to a number of differing approaches to HIT. Some examples of the diverse HIT approaches CCOs have taken include:

- Implementing a coordinated care management system for CCO staff including utilization, disease, and case management which integrates data from disparate sources.
- Providing a community-wide EHR operating as a community health record, which includes data on over 85% of the CCO's members and is available to both physical and behavioral health providers.
- Leading the collaborative development of a regional health information exchange tool, which will collect patient data from various sources and make it accessible to providers at the point of care.
- Pursuing a Community Data Warehouse pilot project to develop and implement a population health management, data aggregation, and analytics tool.
- Investing in a tool that allows for gathering/aggregating/sharing of clinic-level EHR data to identify gaps in care and specific health data points in the population.

Changing Approaches and Next Phases for CCO's HIT Efforts

Many CCOs are in the process of building upon their progress to date and are pursuing additional and/or improved HIT tools to add to (or replace) what they initially implemented:

- Connecting providers to HIT/HIE through integration with their EHR workflows
- Moving from administrative/claims-based case management and analytics to incorporating and extracting clinical data from provider's EHRs
- Incorporating behavioral health information, long-term care and social services in order to increase care coordination across different provider types
- Working with providers and providing technical assistance to establish clinical data reporting
- Supporting providers in new ways with providing data and performance metrics/dashboards back to them
- Investing in new tools for patient engagement and telehealth

CCOs' various investments in telehealth include:

- Teledermatology
- Genetic counseling via telehealth
- Behavioral health telemedicine/telemental health
- Telementoring
- Text 4 Baby
- Tablet-based patient satisfaction (CAHPS) survey
- Virtual Provider Triage (supports delivery of care in the most appropriate setting)
- Gladstone by Kannact (providing high-risk individuals with tablets to facilitate remote patient monitoring)
- Tablet/laptop-based needs and health risk assessments
- Provision of post-hospital discharge tablet/laptop by which member can contact care support

New Relationship to Data

CCOs are committed to increasing the efficacy of available data. They are using data to support their healthcare transformation efforts as well as to support their providers, by furnishing them with data. Many CCOs are distributing regular reports to their providers which might include a variety of information on the provider's patient panel, such as:

- risk scores
- quality metrics measures
- top utilizing members
- patients in need of screenings
- basic ED and inpatient utilization
- top 10% members at risk for poor outcomes
- diagnoses
- prescription drug use

Barriers to HIT Effectiveness

CCOs discussed various barriers encountered in the CCOs' implementation of their HIT initiatives (see table for a summary of the top barriers). Examples of specific barriers reported include: the use of disparate EHRs and challenges with EHR interoperability; limitations of time, resources, and capacity; change fatigue; clinic reluctance to make workflow changes; lack of access to clinical data; providers reliance on their EHR vendors; pressure to meet diverging regulatory and reporting requirements; and challenges with obtaining accurate and complete data.

Top Barriers to HIT Effectiveness	CCOs Who Reported Barrier (n=16)
Technology, Interoperability, and EHRs	88%
Workflows/ Staffing/Training	81%
Clinical Data Collection/ Reporting	75%
Data Analysis, Processing, Reporting	44%
HIPAA, Privacy, Security	31%
Metrics	31%

Barriers to Behavioral Health Information Sharing

Most CCOs also reported significant concerns regarding behavioral health information sharing including: confusion over compliance with state or federal laws, concerns over privacy and confidentiality protection for the patient, technology systems that do not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data), and concerns over liability if information shared is later improperly shared. Ensuring the exchange of information with behavioral health providers is a priority for the CCOs, many of whom are exploring ways to increase the sharing of this data.

Oregon Coordinated Care Organizations' Health Information Technology Efforts

This summary describes the health information technology (HIT) initiatives underway in Oregon's 16 Medicaid coordinated care organizations (CCOs), based on information collected in summer/fall 2014 and revised in spring 2015. This summary is intended to inform Oregon Health Authority's (OHA) HIT planning efforts and the policy and strategic planning work of Oregon's HIT Oversight Committee (HITOC) through HITOC's monitoring of the status of major HIT efforts across the state, and the barriers and challenges faced in Oregon's communities around HIT. In addition, this summary may provide useful information to CCOs, providers, accountable care organizations, health plans, and other stakeholders as they pursue HIT efforts to support new expectations for care coordination and accountability.

Introduction

Health Information Technology (HIT) and the Coordinated Care Model

Oregon's coordinated care model is designed to improve health, improve care, and lower costs (the "Triple Aim"). HIT plays a critical role in realizing these goals of transforming Oregon's health care delivery system.

The collection, sharing, and use of health information can facilitate improved:

- Care coordination and population management throughout the system
- Integration of physical, behavioral, and oral health
- Accountability, quality improvement, and metrics
- Alternative payment methodologies
- Patient engagement

The coordinated care model relies on access to patient information and the Health IT infrastructure to share and analyze data. Each of Oregon's 16 Medicaid CCOs has committed to a variety of HIT initiatives to assist them in pursuing the Triple Aim.

The Three Goals of HIT-Optimized Health Care

The vision for Oregon is a transformed health system where HIT and health information exchange (HIE) efforts ensure that the care all Oregonians receive is optimized by HIT. In an HIT-optimized health care system:

1. Providers have access to meaningful, timely, relevant, and actionable patient information at the point of care including information about the whole person, including information pertaining to relevant physical, behavioral, social and other needs.
2. Systems (health plans, CCOs, health systems, and providers) have the ability to effectively and efficiently use aggregated clinical data for quality improvement, population management and incentivizing value and outcomes. In turn, policymakers use aggregated data and metrics to provide transparency into the health and quality of care in the state, and to inform policy development.
3. Individuals, and their families, can access and engage with their clinical information and are able to use it as a tool to improve their health and engage with their providers.

Role of Health System Transformation Funds in Investments in HIT

In 2013, the Oregon Legislature approved $30 million in Health System Transformation Funds. The OHA Transformation Center awarded $27 million in Transformation Fund Grant Awards to help CCOs launch innovative projects aimed at improving integration and coordination of care for Medicaid patients. Specifically, the Legislature directed the funds to be used for projects that would create services targeting specific populations or disease conditions, enhance the CCO's primary care home capacity, and invest in information technology and electronic medical records. Almost all of the CCOs invested a portion of their grant funds in HIT initiatives,

including electronic health records, health information sharing and exchange, data aggregation tools for population health, metrics collection, and telemedicine.

All 16 CCOs agreed to support OHA's plan to use the remaining $3 million to leverage and secure significant federal matching funds for investing in statewide HIT infrastructure. These funds are being used to support OHA's vision of a statewide approach for achieving HIT-optimized health care. OHA-supported HIT infrastructure will connect and support community and organizational HIT and HIE efforts where they exist, fill gaps where these efforts do not exist, and ensure all providers on a care team have a means to participate in basic sharing of information needed to coordinate care. The CCO HIT Advisory Group (HITAG) guides OHA's use of the $3 million. OHA's commitment to the CCOs in state-level HIT infrastructure includes:

- A statewide Provider Directory, critical to supporting health information exchange, analytics and population management, accountability efforts, and operational efficiencies.
- Statewide Direct secure messaging and CareAccord, offer a standards-based, HIPAA-compliant, common method of health information exchange, leveraging new requirements for certified EHRs and for hospital and providers seeking to meet meaningful use.
- Notifications of hospital events, via a subscription-based product called PreManage that would allow CCOs to access this data as real-time notifications when their member has a hospital event (emergency department or inpatient admission, transfer, discharge).
- A Clinical Quality Metrics Registry to capture clinical quality metrics from electronic health records (see below for CCO reporting requirements).
- Technical assistance to support Medicaid providers with the adoption and meaningful use of certified EHR technology as well as support providers in submitting their clinical quality metrics electronically from providers' EHRs to meet meaningful use and OHA's CCOs clinical quality metrics reporting requirements.

Role of CCO Clinical Quality Metrics (CQM) Reporting Requirements

In 2012, as part of Oregon's 1115 waiver agreement with CMS, Oregon committed to an extensive plan of measurement and monitoring, including quarterly and annual reporting on a number of performance metrics at the CCO and state levels. This was to allow CMS to ensure that cost savings were not being realized by withholding needed care or degrading quality. CCOs have been encouraged to meet a number of quality metrics by being offered a financial incentive for achieving performance benchmarks.

Under OHA's waiver with CMS, CCOs are eligible to receive incentive payments (3 percent of their budgets in 2014) associated with their performance on 17 outcome and quality measures. Four of the 17 measures are directly related to HIT. One of the incentive metrics is EHR adoption and three others are clinical quality metrics (CQMs; hypertension, diabetes poor control, and depression screening) that require the CCOs to extract data directly out of EHRs.

To meet benchmarks and receive quality pool funding in 2014 and 2015 (for their 2013 and 2014 reporting years), CCOs had to submit technology plans to OHA, describing the EHR and HIT environment in their service areas, their HIT efforts, and their proposal for collecting sample data for the three clinical quality metrics. The sample size for these three metrics increases over time – emphasizing an expectation that CCOs would work with an increasing number of their key practices to collect these data. The plans for future years involves moving from technology plans and sample data to obtaining more robust data from EHRs, using it for measurement, and paying incentives for performance based on this data. CCOs have therefore been indirectly incentivized to pursue HIT initiatives that would support and facilitate their collection of clinical quality metrics data from providers' EHRs. As discussed further below, CCOs chose to pursue a variety of approaches to this end.

CCO Deeper Dive Sessions

In the summer and fall of 2014, OHA's Office of HIT conducted in-person "Deeper Dive" meetings with each of the CCOs. The overall objective of these meetings was to gain a deeper understanding of each CCO's HIT initiatives and coordinate around OHA's HIT infrastructure in development at the state level. The aim was to ensure that (1)

the state's HIT services support CCO investments; (2) CCO and state efforts remain aligned; and (3) CCOs have a clear understanding and expectations for what state-level services will include.

Following these in-depth meetings, in the winter of 2014-15, Office of HIT produced CCO profile documents (see Appendix B) summarizing each CCO's HIT initiatives including information sharing and care coordination; quality improvement, population management, and data and analytics tools; clinical quality metrics collection and reporting; technical assistance to practices for EHRs and Meaningful Use; patient engagement; and telehealth.

CCOs were given two opportunities to review and update their draft profiles; all CCOs responded to the review request and profiles were edited accordingly. In some cases, the CCO HIT efforts changed since our Deeper Dive meetings. The profiles represent the CCOs' HIT status at a point-in-time. Though we have made every effort to ensure that they are accurate and up-to-date, HIT efforts may have continued to evolve and some information may therefore be out-of-date.

Overview of CCO HIT Efforts

All 16 CCOs have made an investment in HIT in order to facilitate healthcare transformation in their community. These efforts have been supported, in part, by the transformation funds described above. CCOs have invested in helping their provider communities implement and make effective use of various HIT tools intended to improve their patients' health and their patients' care, as well as manage their costs. Various factors have influenced the unique paths each chose to take (see below).

Each CCO had to assess their circumstances and determine their best path forward, given their unique characteristics. Although no two paths were exactly the same, nearly all CCOs are pursuing and/or implementing both a health information exchange/case management/care coordination tool as well as a population management/metrics tracking/data analytics tool. Even with those similarities, each of the 16 CCOs chose to invest in a different set of HIT tools.

Through their implementation and use of HIT, CCOs reported early successes in achieving goals such as:

- Increased information exchange across providers to support care coordination
- Making new data available to providers to assist with identifying patients most in need of support/services and to help providers target their care appropriately
- Improved CCO population management and quality improvement activities, through better use of available claims data, while pursuing access to and use of clinical data

CCO Context for HIT Development

CCOs reported a number of factors that have influenced their approach to HIT development in support of healthcare transformation in their community, such as:

- The types of organizations from which they evolved, and thus their organizational structure (physician-owned/Independent Practice Association-based, health system-based, commercial health plan-based, community/county led, etc.)
- Community and governance factors
    - The already existing (community) efforts, including existing governance structures, they evolved from and therefore whose support they had from the beginning
    - The degree of already existing (community) support for initiatives like HIT at the time of establishment, and the degree of HIT infrastructure that was already in place
- Provider environments
    - The extent of variation in EHRs implemented across their provider community
    - Partnerships with hospital systems
    - The size and type of community members they support
        - The number, type, and size of key practices
        - Concentration of Medicaid patients among primary care clinics
        - Regions with multiple hospitals vs. relatively closed systems where one hospital system dominates care in the area
- The geography of their community
    - Southern Oregon has the most concentrated presence of CCOs: 4 CCOs across 4 counties
    - Eastern Oregon CCO service area covers 12 counties (over 50% of Oregon's land mass)

Role of Community Support

A factor that seems particularly relevant to both a CCO's approach to HIT development and the pace of their progress is the extent to which they began with an already established collaboration in the community. As one engaged stakeholder said during one of the Deeper Dive meetings "*Building the trust and shared commitment is foundational*". Several CCOs had pre-established community governance and shared commitment to work collaboratively on common goals. Some communities had already come together specifically around HIT efforts, such as Southern Oregon's Jefferson HIE and Central Oregon's Central Oregon Health Connect. Having the support of a collaborative community can facilitate the many challenging discussions involved in making decisions

about shared HIT tools, helping to advance the significant process. In community-based HIT efforts, CCOs participated or led work to assess and pursue HIT tools which would most benefit their community, and which required buy-in and (in some cases) financial commitment from providers and hospitals and other stakeholders.

Impact of Geography and Size

A high concentration of CCO members across a small number of clinics/health systems implies there are fewer groups to bring into the conversation compared to areas where members are distributed across a large number of clinics. Having fewer entities involved in the pursuit of a new HIT tool can simplify and increase the efficiency of communication, making it easier to coordinate across groups more rapidly and effectively. According to one CCO, this has allowed them to "*make an impact quickly.*"

CCO communities with a greater concentration of Medicaid members within fewer providers/clinics may have less EHR variation to contend with and therefore fewer workflow modifications to support. In such communities, maintaining closer contact with each provider may be less burdensome. Additionally, CCOs report having greater influence on practices where their members make up a greater proportion of the patients.

Organizational Affiliations

Many CCOs are affiliated with a health plan that also serves the commercial or Medicare markets. In these cases, the HIT investments made to support CCO operations are often used for their commercial population as well. In other cases, three CCOs are affiliated with an IPA that provides a hosted EHR to practices. This resource can make a significant difference in (1) implementing changes to reporting data to the CCO, (2) supporting functionality within the hosted EHR that enables sharing patient information and care coordination across providers, and (3) providing technical assistance to providers around using their EHR and improving workflows, given their already established relationship.

CCO Approaches to Developing and Implementing HIT Efforts

Many CCOs reported experiencing challenges in setting their HIT strategy. Some CCOs found it challenging to piece together the complex puzzle of EHRs, HIT resources, and gaps in their region, and/or found the offerings from technology vendors complicated to navigate as well. In general, CCOs sought to (1) understand what HIT and EHR resources were in place in their community and provider environments, (2) identify what HIT capabilities were needed to support the CCO's efforts, and (3) identify strategies to meet those needs, including leveraging existing resources or bringing in new HIT tools to fill priority needs. In some cases, CCOs invested in consultants to support their HIT strategic planning and project development efforts. Several CCOs expressed an interest in learning from other CCOs and regional efforts – unsure of whether they selected the best approach, or were making as much progress as their CCO peers, and were interested to learn from other's successes.

Ultimately, the combination of different CCO community, organizational, geographic and provider contexts as well as the variation in EHR and existing HIT resources led to a number of differing approaches to HIT. Some examples of HIT approaches CCOs have taken include:

- A focus on improving CCO case management of their members leveraging a module in their existing administrative software.
- Implementing a coordinated care management system for CCO staff including utilization, disease, and case management which integrates data from disparate sources and combines it into a single, member-centric workflow which enables use of one system in managing the health needs of each member.
- Launching a care management tool that includes actionable clinical information and psychosocial risk factors in support of behavioral health integration and perinatal programs to be used both by CCO staff and provider partners.
- Providing a community-wide EHR operating as a community health record, which includes data on more than 85% of the CCO's members and is available to both physical and behavioral health providers.
- Leading the collaborative development of a regional health information exchange tool, which will collect patient data from various sources, organize it, and make it available and easily accessible to providers at the point of care.

- Supporting local entities that have developed their own HIT tools, while also developing and implementing centralized tools to support care management, population management, utilization and analytics, with a long-term vision for an integrated solution for sharing clinical information with the provider network to support patient care and population health.
- Implementing a comprehensive tool that includes predictive analytics/risk assessment, care coordinator and PCP/Provider management reports, quality metrics and care gaps information, and business intelligence tools.
- Coordinating across local entities that have developed their own HIT tools while also developing and implementing centralized HIT including a data aggregation, analysis, and reporting solution.
- Pursuing a Community Data Warehouse pilot project to develop and implement a population health management, data aggregation, and analytics tool that integrates hospital, ambulatory EHR, pharmacy, and claims data.
- Investing in a tool that allows for gathering/aggregating/sharing of clinic-level EHR data to identify gaps in care and specific health data points in the population (e.g., members in need of screening), as well as produce the three CCO clinical quality metrics.

Changing Approaches and Next Phases for CCO's HIT Efforts

In some cases, CCOs faced unexpected challenges, which caused them to alter their HIT efforts. Some CCOs reported changing course after facing: vendor limitations and mergers, unanticipated prohibitive costs, challenges with community support and buy-in, longer than anticipated development periods, and/or other issues. Some degree of flexibility has been critical given the realities of an ever-changing landscape.

Many CCOs are in the process of building upon their progress to date and are pursuing additional and/or improved HIT tools to add to (or replace) what they have currently implemented, including:

- Connecting providers to HIT/HIE through integration within their EHR workflows
- Moving from administrative/claims-based case management and analytics to incorporating and extracting clinical data from provider's EHRs
- Working with providers and providing technical assistance to establish clinical data reporting
- Supporting providers in new ways by providing data and dashboards back to them
- Investing in new tools for patient engagement and telehealth

New Relationship to Data

A consistent theme across all CCOs' efforts to use HIT to improve healthcare delivery, is their commitment to increase the efficacy of available data. They have developed and fostered new ways of using data to support their healthcare transformation efforts, and supporting their providers by furnishing them with data. CCOs report that they have become more sophisticated with data, and, in some cases, have supported a culture change with their provider networks who are also learning to become more sophisticated with data. The CCOs support providers using data in a variety of ways including:

- Collecting data (e.g., providing assistance to shift burden for collecting data from providers to other staff)
- Compiling, interpreting, understanding data (e.g., prioritizing care coordination, identifying high utilizers and missing screenings, incentive metric progress monitoring, identifying populations to target for complex case management and disease management, tracking clinical quality metrics performance). One CCO described that their HIT tool *"takes a haystack and pull[s] a few needles out*."
- Ensuring credibility of data (e.g., working with clinics to understand and mitigate quality issues)
- Educating and evolving the delivery system to use the data
- Refining how to meaningfully present and effectively communicate the data

Though this is an evolving process in which both CCOs and providers will continue to learn new ways to maximize the value of data, CCOs report that significant progress has already been made in using data to improve care.

Many CCOs are distributing regular reports to their providers which might include a variety of information on the provider's patient panel, such as: risk scores, quality metrics, top utilizing members, patients in need of screenings, basic emergency department and inpatient utilization, top 10% members at risk for poor outcomes, diagnoses, and prescription drug use. One CCO describe themselves as an 'information company' as they "*have information coming in and better information going out*".

Also of note, providers and healthcare systems have demonstrated an increased interest in metrics and are becoming accustomed to reflecting on their data and its implications. Some have changed their approach to patient care management and have newly begun accessing, examining, and utilizing their data for the purpose of population management, decreasing their reliance on the CCO to fulfill this role. Some providers have become increasingly involved with and invested in their data and outcomes, which has fostered a healthy competition and incentive to improve their metrics. This has been reinforced by the requirement that CCOs distribute quality pool earnings to their provider networks. Several CCOs have implemented their own quality pool/pay for performance programs across their provider network, which incentivizes provider investment and commitment to make improvements.

Workflow Changes

Some CCOs are actively engaged in helping providers make workflow changes to accommodate the implementation of HIT tools and/or data needed by the CCO. For example, providers need assistance modifying their workflows to ensure they are accurately capturing the depression screening data required for CQM reporting. Some CCOs are adding staff to conduct training, selecting best practices for workflow, and/or finding provider champions.

Access to Clinical Data

CCOs are all either currently able to access clinical data or are actively pursuing access, in a variety of ways. Some CCOs are working to extract clinical data from their providers' EHRs. Some CCOs are building a process to store and analyze clinical information. One CCO described their interest in moving toward clinical data for population management, metrics, etc., as being related to the lag time with claims data which can make those data not actionable: "*We want to get [data] further upstream to be able to impact care*." Another CCO has piloted a tool that pulls clinical data out of EHRs and integrates it into their case management tool. In the case of regional HIEs with a community health record model, interfaces are established with hospitals, laboratories, and provider EHRs to collect clinical data using standards-based formats like HL7, etc.

Moving beyond Primary Care and Physical Health Information

Though CCOs have focused their efforts largely on primary care providers and physical health information, they are interested in incorporating behavioral health information in order to increase care coordination across different provider types. Most CCOs, however have significant concerns regarding the security and privacy issues surrounding behavioral health information sharing. Some CCOs have invested funds and significant effort into overcoming barriers and taking steps toward increasing behavioral health information sharing.

CCOs expressed that exchanging information across the full care team involved in their members' care is an area of priority. For example, some CCOs are taking steps to electronically share information and coordinate care with long-term care and social services. One CCO has expressed interest integrating information from social services, non-emergency medical transportation, residential care settings, schools and school-based health centers, in addition to behavioral health and long-term care.

Summary of CCO-Specific HIT Investments

See Appendix A and Appendix B for further details. Note that the categories used below are not necessarily mutually exclusive, as tools can be used to serve more than one function (and often do). The HIT tools are grouped based on their primary function.

	# of CCOs	Overview	Details
Health Information Exchange	13	2 active HIEs (6 CCOs)	Medicity: Jefferson HIE (5 CCOs)
			RelayHealth: Central Oregon Health Connect
		2 HIEs in development	InterSystems: Care Team Link (Regional Health Information Collaborative; RHIC)
			Bay Area Community Informatics Agency (BACIA)
		1 Community-wide EHR	GE Centricity: Umpqua One Chart
		Hospital Notifications (4 CCOs are live, 3 CCOs are in discussion)	Collective Medical Technologies: PreManage
Case Management and Care Coordination	10	1 Social Services -focused tool (2 CCOs)	VistaLogic: Community Connected Network
		Case Management Tools (9 CCOs)	Essette: Case Management
			PopIntel Care Coordination Registry
			InterSystems: Care Team Link
			McKesson: VITAL
			The Advisory Board: Crimson CM (2 CCOs)
			Milliman: Patient Relationship Manager
			IMA Technologies: CaseTrakker (2 CCOs)
Population Management, Metrics Tracking, Data Analytics	15	Population Management tools (9 CCOs)	Milliman: MedInsight (2 CCOs)
			Optum: Impact Intelligence
			The Big Kahuna
			Arcadia: Community Data Warehouse
			Crimson Population Risk Management
			Milliman: Patient Relationship Manager
		Business Intelligence (BI) tools (6 CCOs)	SAS BI (3 CCOs)
			IBM Cognos BI
			Microsoft BI (2 CCOs)
		Health Analytics tools (11 CCOs)	Inteligenz: CCO Metrics Manager (2 CCOs)
			Truven Health Analytics (2 CCOs)
			Inovalon Indices
			SAS Data Store
			IBM: SPSS
			SAS
			Tableau (2 CCOs)
			IBM Cognos Query Studio
			PopIntel
EHR Hosting via Affiliated IPA	3		DCIPA: Umpqua One Chart
			MVIPA: NextGen
			MRIPA: Greenway PrimeSuite

Health Information Exchange
CCO health information exchange investments include a variety of tools and services each intended to securely share health information electronically between providers and across organizations. There are two health information exchanges currently in use in Oregon including Jefferson HIE in use by five CCOs and Central Oregon Health Connect in use by one CCO, and two that are in development including IHNCCO's Care Team Link (Regional Health Information Collaborative; RHIC) and an effort in Coos Bay lead by BACIA (Bay Area Community Informatics Agency). Umpqua One Chart is a community wide EHR which has been adopted by over 85% of providers in the area. Finally, four CCOs have gone live with a PreManage subscription, which provides them with hospital event (emergency department admission, inpatient, and discharge) notification. Some are opting for the 'complete' PreManage package, which makes the notifications available to their key practices in their provider network.

Case Management and Care Coordination
CCOs have implemented a range of case management and care coordination tools. One of the tools, Community Connected Network supported by two CCOs, is a social service-based tool which is expected to include data for the entire patient population across a variety of social service agencies. There are seven case management tools in use by nine CCOs. They differ in the data that is incorporated into the tool and made available as well as the tool functionality. Some are intended to be used only by CCO staff (e.g., case managers) and others are intended to be used across providers. CCO staff use case management tools for various tasks including: to record assessments; develop care plans; record tasks, notes, correspondence; and get daily email alerts/reports for important events such as surgery. Case management tools may allow case managers to set goals, identify interventions and assign members to care teams, support coordination around transitions of care, and identify barriers for managed patients that need to be addressed.

Population Management, Metrics Tracking, and Data Analytics
CCOs reported implementing and/or using seven population management tools, three Business Intelligence (BI) tools, and nine health analytics tools. Some CCOs have developed and/or implemented claims-based analytic reporting via BI software. This type of reporting might include aggregate reporting for CCO-, provider-, and member-level data for demographics, utilization, and gaps in care.

EHR Hosting via Affiliated IPA
Three Independent Practice Associations (IPAs) host EHRs for some of their member clinics: Douglas County IPA hosts Umpqua One Chart (Umpqua Health Alliance CCO), Mid Valley IPA hosts NextGen (Willamette Valley Community Health), and Mid Rogue IPA hosts Greenway PrimeSuite (AllCare CCO).

Other HIT efforts: Technical Assistance, Patient Engagement, and Telehealth
Many CCOs offer technical assistance to their provider network including assistance in support of workflow modifications (e.g., effective handoff protocols), HIE connectivity, and Direct secure messaging. Other types of assistance has included training about meaningful use as well as IT and analytic resources to help providers set up reporting tools needed to pull relevant information out of their own EHRs and IT systems.

Several CCOs expressed support for increasing patient engagement and access to specialty care through HIT and telehealth. CCOs mentioned supporting the use of patient portals that include access to medical records, scheduling, and secure correspondence with primary care providers and/or supporting the OpenNotes movement, which makes full clinician notes available to patients via their provider's EHR patient portal.

Several CCOs have made an investment in various telehealth efforts including:

- Tele-dermatology
- Genetic counseling via telehealth
- Tablet/laptop-based needs and health risk assessments
- Behavioral health telemedicine/tele-mental health
- Telementoring
- Tablet-based CAHPS survey
- Text4Baby
- Virtual Provider Triage (supports delivery of care in the most appropriate setting)
- Gladstone by Kannact (providing high-risk individuals with tablets to facilitate remote patient monitoring)
- Provision of post-hospital discharge tablet/laptop by which member can contact care support

Barriers and Challenges

During the Deeper Dive conversations, CCOs discussed a variety of barriers that they themselves and/or their clinics encountered in the process of the CCOs' implementation of their HIT initiatives. OHA staff categorized the information into various barrier types and then tallied the frequency with which the information was discussed across CCOs. The results are reported below in three sections: (1) *Top Barriers to HIT Implementation* includes the six most frequently discussed barrier categories, (2) *Additional Barrier Categories* lists the four barrier categories mentioned by only 2-3 CCOs each, and (3) *Other Barriers* lists five barriers that were each mentioned by only one CCO. As the CCOs were not specifically asked about each of the various barrier categories, the frequency of the barriers reported is not representative of all the CCOs who are experiencing each barrier. Rather, the frequency represents for whom the barrier was reported during the Deeper Dive meetings or included in the CCO HIT Profiles. Lastly, the final section included below summarizes the barriers CCOs have experienced with behavioral health information sharing.

Top Barriers to HIT Implementation

Top Barriers to HIT Implementation	CCOs Who Discussed Barriers in the Category (n=16)
EHR, Technology, and Interoperability	88%
Workflows, Staffing, and Training	81%
Clinical Data Collection and Reporting	75%
Data Analysis, Processing, and Reporting	44%
HIPAA, Privacy, and Security	31%
Metrics	31%

EHR, Technology, and Interoperability Barriers

The top barriers to HIT implementation discussed by the CCOs include issues specific to technology constraints, interoperability challenges, and EHR limitations. Though the overall EHR adoption rate in Oregon is high, there remain some rural areas where the rate is lower contributing to a variety of challenges. In addition, providers have implemented over 100 different EHR systems across the state, leaving most CCO regions to grapple with the challenges associated with having numerous systems with which to interact. Disparate EHR systems complicate interoperability and information exchange as well as the collection of clinical data.

CCOs reported experiencing various interoperability challenges across systems. Bringing systems together across a common platform requires significant investments of time, effort, and testing. In addition, providers are at the mercy of their EHR vendors for the development and expansion of interoperability capabilities. Also, some providers have implemented out-of-the-box EHR systems (without enhancements), which are often quite costly to expand or customize.

All CCOs have a vision of the role they plan HIT to play in their health care transformation efforts. Many expressed some frustration regarding the slower than expected pace of development among their technology vendors/partners, as they had hoped for additional capabilities to be more (broadly) available sooner. Additionally, CCOs reported challenges with (or lack of) EHR interoperability with other systems.

The following were also mentioned as barriers in the area of technology and interoperability:

- Lack of a standardized and central data repository for patient health information
- Cumbersome to retool each EHR interface when new CQMs are released
- Challenges with Direct secure messaging as implemented within certain EHRs
- Concerns about making significant investment in HIE given interoperability challenges (e.g., integration of care summaries in CCDA format, limits on some EHRs regarding message delivery via Direct secure messaging)

Workflows, Staffing, and Training Barriers

Most CCOs reported that they have received push-back from clinics regarding workflow requirements. Some clinics do not see value in changing workflows to accommodate CQM reporting requirements, for example. Clinics report challenges related to limited time, resources, and bandwidth given the numerous competing demands. Many are also experiencing change fatigue due to the unremitting requests for changes across various aspects of clinic functions.

Training needs identified include:

- assistance with making workflow adjustments to allow for properly collecting/reporting depression screening data
- greater knowledge and understand regarding Direct secure messaging
- implementation training and technical assistance related to all aspects of data (e.g., collection, use, coordination)

Clinical Data Collection and Reporting Barriers

Another top category of HIT implementation barriers is specific to the collection and reporting of clinical data. As mentioned above, CCOs are incentivized to collect clinical quality metrics data (for an increasing percentage of their member population) in order to qualify for incentive payments. In addition, CCOs are all keenly aware of the need for access to clinical data in order to maximize the utility of available data; that is, the extent to which the data are actionable. CCOs are therefore highly interested in and actively pursuing HIT initiatives to collect clinical data. These efforts have not been without challenge.

CCOs noted that EHR usability is a barrier to data entry and thus accurate reporting, with many providers at the mercy of vendors for CQM reporting. CCOs spoke of challenges with data collection consistency across providers, with CQM data quality and reporting being limited by workflow. Obtaining CQMs is often experienced as tedious and/or challenging due to data extraction issues. Some organizations are hesitant or reluctant to share clinical data for purposes of CQM reporting creating an additional layer of challenges.

Additional barriers to clinical data collection and reporting include:

- Doubts about relying on new CQM reporting formats in EHRs such as QRDA
- Financial burden on smaller practices to configure their system to produce CQMs
- Requiring CQM data transmission to multiple CCOs could increase costs for providers, which may deter treatment of Medicaid patients

Data Analysis, Processing, and Reporting Barriers

More than a third of the CCOs described data analysis, processing and reporting barriers. Core issues include difficulties obtaining clean and complete data, with some providers unable to share data in standardized formats (e.g., HL7), as well as challenges with performing data verification. CCOs discussed experiencing challenges with meeting diverging regulatory and reporting requirements. In addition, CCOs have received pushback from clinics with many of them struggling to meet the various reporting requirements. The demand on providers to collect and enter data is a major barrier due to growing and conflicting requirements. Finally, with respect to data analysis, CCOs reported that practices lack the necessary resources to develop improved analytic capabilities resulting in a dependence on the functionalities inherent in their EHR.

HIPAA, Privacy, and Security Barriers

About a third of the CCOs discussed barriers related to HIPAA, privacy, and security (including issues with FIRPA, federal privacy requirements related to education). More specifically, CCOs expressed concerns about data sharing policies and adequate consent procedures to allow for the sharing of data. There are concerns among providers regarding correct business agreements that identify who has access to data and a lack of clarity about what information is acceptable to share.

Metrics Barriers
About a third of the CCOs discussed metrics-related challenges. For example, there are metrics data being collected in non-primary care environments (e.g., schools, behavioral health, dental), but there are no means by which to capture these data. Also, providers have expressed frustration regarding some metrics not being relevant to specific providers (e.g., some providers may order a mammogram, but not perform them); providers are requesting that the metrics by which they are being evaluated are credible and valid.

Additional Barrier Categories (each identified by two to three CCOs):

- Data Access
  - Questions about the management of access to patient information and how case managers would coordinate data
- Vendors
  - Waiting on 2014 updates (to support meaningful use Stage 2) from EHR vendors
  - Difficulty in engaging EHR vendors about getting certain information into the standardized care summary format (CCDA)
- Patient Attribution
  - Challenges with managing patient attribution
  - Some challenges with ensuring information only goes to right health plan
  - Patient attribution challenges: PCP reconciliation between the plan, provider records, and provider providing services
- Dental
  - Lack of EHR adoption among dental providers
  - Uncertain of when dental providers must meet meaningful use and other HIT goals/metrics

Other Barriers (each reported by one CCO)

- Broadband connectivity issues in some rural areas
- Challenges with logistical and geographical technology capabilities
- Lack of provider understanding or interest of available HIT tools (e.g., Epic CareEverywhere for providers with Epic EHRs)
- Ongoing changes with provider networks
- Lack of CCO technology/analytics staff

Barriers to Behavioral Health Information Sharing:

The draft CCO HIT Profiles included a survey asking that each CCO identify which of the listed barrier to behavioral health information sharing they have experienced. Thirteen of the CCOs completed the survey. The table below summarizes the responses, in order from most to least frequently experienced.

Barriers to Behavioral Health Information Sharing	CCOs Reporting Experiencing Barrier (n=13)
Confusion over compliance with state or federal laws	77%
Concerns over privacy and confidentiality protection for the patient	77%
Technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data).	62%
Concerns over liability if information you share is later improperly shared	62%
Lack of proper consent forms from the patient	38%
State or federal laws prohibit the type of sharing I want/need to do	23%

Interest in OHA'S HIT Initiatives

As mentioned above, OHA's Office of HIT is pursuing five statewide HIT initiatives: (1) a Statewide Provider Directory; (2) PreManage hospital event notifications; (3) a Clinical Quality Metrics Registry; (4) Technical Assistance to Medicaid practices; and (5) CareAccord providing Direct secure messaging. All of these initiatives were discussed with each CCO at the Deeper Dive meetings. Below is a tally of the level of interest reported by all 16 CCOs in each of the five initiatives.

OHA's HIT Initiatives	CCO Interest Level		
	Using or expect to use	Considering	Not currently interested
Statewide Provider Directory	69%	31%	0%
PreManage – hospital event notifications	50%	44%	6%
Clinical Quality Metrics Registry*	38%	38%	25%
Technical Assistance on EHRs and Meaningful Use for Medicaid Practices	25%	75%	0%
CareAccord Direct secure messaging	16%	69%	19%

*All CCOs will need to report to the Registry – the interest level reflected here is whether the CCO is considering having any of their providers submit clinical quality metrics directly to the Registry.

Overall, the CCOs expressed the most interest in the Statewide Provider Directory and the PreManage hospital notifications. The CCOs had the most questions about whether or how they would use Technical Assistance for Medicaid practices and CareAccord Direct secure messaging. In terms of technical assistance, some CCOs reported experiencing a variety of challenges in their previous efforts to deliver technical assistance to providers. CCOs reported being uncertain regarding what the assistance would include and therefore to what extent it would benefit their providers when it becomes available. In terms of CareAccord, CCOs varied in their understanding and approach to Direct secure messaging. Most reported that many providers remain unaware of or confused by Direct secure messaging. Some providers are taking advantage of Direct secure messaging capability available via their EHRs. Several CCOs are invested in a regional HIE that includes Direct secure messaging capability. Some CCOs are exploring the use of Direct secure messaging as a means for communicating securely with non-health entities such as law enforcement and education (e.g., early learning hubs).

As noted above, four CCOs have gone live with a PreManage subscription as of June 2015, which provides them with hospital event (emergency department admission, inpatient, and discharge) notification. One has opted for the 'complete' PreManage package, which includes the availability of PreManage subscriptions for the key practices in their provider network. Three additional CCOs are in discussions with CMT about purchasing PreManage.

Appendix A: Summary of CCO HIT Investments

	Health Information Exchange	Case Management & Care Coordination	Population Management, Metrics Tracking, Data/Analytics	EHR Hosting Via Affiliated IPA
AllCare	Medicity: Jefferson Health Information Exchange	Essette: Case Management; Vistalogic: Community Connected Network (C2)	Milliman: MedInsight	MRIPA: Greenway PrimeSuite EHR
Cascade Health Alliance	Medicity: Jefferson Health Information Exchange	*Pursuing new CM tool;* EZCap has CM module		
Columbia Pacific CCO			SAS BI	
EOCCO		*Provider Portal (in development)*	SAS Data Store	
FamilyCare	Collective Medical Technologies (CMT): PreManage	McKesson: VITAL	Milliman: MedInsight; Inovalon: Indices	
Health Share	Alignment across EPIC CareEverywhere installations; *Pursuing CMT: PreManage*	PopIntel: Care Coordination Registry	The Big Kahuna/PopIntel	
Intercommunity Health Network (IHN) CCO	*InterSystems: Care Team Link (Regional Health Information Collaborative; RHIC) in development*	*InterSystems: Care Team Link (Regional Health Information Collaborative; RHIC) in development*	IBM: Cognos Data Marts, BI, Query Studio	
Jackson Care Connect	Medicity: Jefferson Health Information Exchange	Vistalogic: Community Connected Network (C2)	SAS BI	
PacificSource Central Oregon CCO	RelayHealth: Central Oregon Health Connect; CMT: PreManage	IMA Technologies: CaseTrakker Dynamo	Truven Health Analytics; Internally developed tools, SAS, Tableau, Microsoft BI	
PacificSource Columbia Gorge CCO	Medicity: Jefferson Health Information Exchange; CMT: PreManage	IMA Technologies: CaseTrakker Dynamo	Truven Health Analytics; Internally developed tools, SAS, Tableau, Microsoft BI	
PrimaryHealth	Medicity: Jefferson Health Information Exchange	*Exploring CareManager solution*	Inteligenz: CCO Metrics Manager	
Trillium Community Health Plan	*Pursuing CMT: PreManage*	The Advisory Board: Crimson Care Management; Internally developed: Care Timeline	Optum: Impact Intelligence and ImpactPro; SAS, SPSS	
Umpqua Health Alliance	GE Centricity: Umpqua One Chart (Community-wide EHR)	Plexis Case Management	Inteligenz: CCO Metrics Manager; Inteligenz Reporting	DCIPA: Umpqua One Chart EHR
Western Oregon Advanced Health	*BACIA; In development: tool to exchange clinical data with PRM*	Milliman: Patient Relationship Manager (PRM)	Milliman: Patient Relationship Manager (PRM)	
Willamette Valley Community Health	*Pursuing CMT: PreManage*		Arcadia: Community Data Warehouse	MVIPA: NextGen EHR
Yamhill CCO	CMT: PreManage	*Exploring The Advisory Board: Crimson Care Management*	Crimson Care Registry; Crimson Population Risk Management (Milliman analytic support); SAS BI	

Appendix B: CCO HIT/HIE Profiles

(In alphabetical order)

1. AllCare Health Plan
2. Cascade Health Alliance
3. Columbia Pacific CCO
4. Eastern Oregon CCO
5. FamilyCare, Inc.
6. Health Share of Oregon
7. Intercommunity Health Network CCO
8. Jackson Care Connect
9. PacificSource Community Solutions CCO, Central Oregon Region
10. PacificSource Community Solutions CCO, Columbia Gorge Region
11. PrimaryHealth of Josephine County
12. Trillium Community Health Plan
13. Umpqua Health Alliance
14. Western Oregon Advanced Health
15. Willamette Valley Community Health
16. Yamhill Community Care Organization

AllCare CCO HIT/HIE Profile

Southern Oregon, 47,805 members[1]

CCO Description:

- Mid Rogue AllCare Health Assurance, Inc. owns AllCare CCO, Inc.
- Medicaid members who reside in Jackson, Josephine, Curry and Southern Douglas Counties.
    - Includes more than 8,500 new enrollees for 2014 through the ACA Medicaid expansion. Majority of new enrollees reside in Jackson County.
    - Medicare Advantage plan, CareSource, serves 2,100 Members who reside in Jackson and Josephine Counties, of which about 800 are dually eligible.
- Network of providers exceeds 1400 primary care and specialty care providers with an extensive network of behavioral health and dental health providers. AllCare has a varied provider network and doesn't rely as heavily on FQHCs as other CCOs. AllCare's network has grown considerably with the ACA expansion population.
- Mid Rogue AllCare Health Assurance, Inc, AllCare's owner, owns AllCare eHealth Services, an EMR company that provides Greenway's PrimeSuite EHR solution to a number of clinics in AllCare's network. They also own Mid Rogue Independent Physicians Association, a contracting entity for the Josephine County Providers.
- AllCare is one of 4 Southern Oregon CCOs participating in the Jefferson Health Information Exchange (JHIE).
- AllCare is also supporting Community Connected (C2) Network – led by the county agency, in partnership with 2 CCOs, education and social services stakeholders, to develop a database and system for coordinating and integrating information related to social services assessment and delivery in Jackson County

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination			Quality Improvement, Population Management, Data and Analytics Tools
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing
Vendor Name	Medicity	Essette	Vistalogic	Milliman
Product Name				MedInsight
Version		2013		
Comment	Provided by Jeffferson HIE	Case management software	Provided by Community Connected Network for social service delivery	Predictive Modeling, assist in population management through our case management team

[1]As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	AllCare is participating in the Jefferson Health Information Exchange (JHIE) which aims to provide the care team with access to patient-centered health information at the time and place of care to improve timeliness, quality and coordination of care. JHIE covers a three county region in Southern Oregon inclusive of Jackson, Josephine, and Klamath Counties, and recently added partnerships with a 5th CCO and providers in the Columbia River Gorge area. **Health Information Exchange:** • JHIE currently offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. These features support health information exchange and referrals among behavioral, physical, and dental health providers and with CCO Care Coordinators. • JHIE is in the process of implementing "phase 2" to include additional functions/services including clinical alerts, 30-day readmission alerts, patient search, and a consolidated clinical inbox to be accessible to any enrolled provider or CCO with a patient/member relationship. Patient matching and record location supports patient/provider attribution. EHR integration and connectivity will be supported as well, including single sign on for patient search of HIE, results delivery to the EHR and receipt of CCD/care summary to the EHR. AllCare is also supporting Community Connected (C2) Network – a committed group of organizations working together to change the way individuals access and receive social service support in Jackson County; startup funding supported by county and 2 CCOs; other partner organizations from social services, education sectors. Launch expected in 2015. Intersections with JHIE are under discussion. • Goals include: to support sharing of information and coordination of services amongst community partners, to provide tools to help integrate and coordinate the existing social service delivery infrastructure including identifying service providers for common clients, and to provide a mechanism to connect existing systems within social service, health care, and education sectors. • C2 database will include centralized contact registry, resource/referral module, onboarding tool, release of information module, record capabilities, survey/assessment module, auto-populating forms/summary sheets, integrated calendar and discussion forum, aggregate data reporting. **Direct Secure Messaging[2]:** AllCare sees value in getting their case managers signed up with and using JHIE, specifically the Direct secure messaging feature. • JHIE offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. • The JHIE Medicity HISP is DirectTrust accredited, and thus interoperable with CareAccord and other Direct secure messaging users across the state. JHIE participates in the flat file directory sponsored by OHA, to share Direct secure messaging addresses across Oregon organizations using accredited HISPs to support cross-organizational exchange • AllCare is interested in communicating securely with non-health entities such as law enforcement and education (e.g., early learning hubs), and is therefore exploring the use

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

	of CareAccord as a service for those entities to use for that purpose, if these organizations do not become part of JHIE. • AllCare clinics using AllCare eHealth Services' Greenway EHR will have access to Direct secure messaging. Greenway's preferred HISP is Updocs. • AllCare notes that clarification and information about Direct secure messaging and JHIE would be helpful for communicating with provider network and affiliates including about the value and need for health information exchange. **Hospital Notifications[3]:** • JHIE will include hospital event notifications from its member hospitals (Asante, Providence, Sky Lakes, Mid-Columbia Medical Center) to JHIE members as part of "phase 2" and is contemplating connecting to PreManage to enable its members to send and receive hospital alerts from hospitals beyond the JHIE region across the state. • AllCare case managers will use JHIE as well for referrals, hospital event notifications, etc. They used to receive hospital event (ADT) information which made a big difference in behavior health/physical health integration. Looking forward to having that info again. **Care Management and CCO-Provided Information to Providers/Care Teams:** • AllCare uses Essette case management system for members who need case management and/or do not have care managed by a PCPCH. AllCare case management staff use Essette to record assessments; develop care plans; record tasks, notes, correspondence; and get daily email alerts/reports for important events such as surgery. The care plan allows case managers to set goals, identify interventions and assign them to care teams, supports coordination around transitions of care, and identifies barriers for managed patients that need to be addressed. AllCare case management teams are organized to support groups of patients such as those needing disease management, exceptional needs care coordination, community health worker assistance, etc. • AllCare case managers will use JHIE as well for referrals, hospital event notifications, etc. AllCare would like to add lab, hospital data for case managed members integrated into the Essette dashboard. • Many AllCare members have their care coordinated within a PCPCH. AllCare provides member information to their PCPCHs to support care management and care coordination, including including provider specific lists of their, CMHPs a list of their members diagnosed with Severe and Persistent Mental Illness (SPMI) and Diabetes who have not had the appropriate lab monitoring (LDL and HgbA1C testing).
Quality Improvement, Population Management, Data and Analytics Tools	AllCare is anxious to better leverage the data they have, and add new data to the mix. They have staffed a data team. ▪ Roll-out of new compensation formulas and incentives will require better use of data and provide the opportunity to strengthen the health plan's ability to collect and report on specific quality measures in a standardized, replicable, and comparable format. o As part of their OHA Transformation Grant, AllCare created new provider incentive compensation plan for its primary care providers that commenced on January 1, 2014. o Quarterly, the team distributes quality dashboard reports for each provider, focusing on access, number of member in practices, compensation capitation tied to acuity, then adding basic ED and inpatient utilization and primary care data, and third are 17 measures for PCPs.

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	o The team has developed a Specialty incentive compensation plan this is in a pilot phase as of the end of 2014. o The team has developed a Dental and a Behavioral Health incentive compensation plan which are in the final phases of development. <u>Incorporating clinical data</u>**:** • AllCare will also need to access utilization and clinical quality data within a provider's EHR system in order to manage the new provider compensation formulas real time. • Defining tools for data analytics and population health management are anticipated for 2015 with services available in 2016 through participation with JHIE. • In addition, AllCare anticipates it might need to implement or develop its own data warehouse & database management system in the future for clinical data for analytics and metrics (e.g., JHIE data, HL7 messages, CCDs, etc.). Particularly interested in getting lab data – potentially through JHIE, which is needed for multiple reporting requirements including HEDIS.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** • AllCare providers largely use 3 different 2014 CCHIT certified electronic medical record systems (Epic, Greenway, and NextGen). The three software systems have the capacity to report electronic clinical quality measures per Meaningful Use Stage 1 requirements and are working towards those criteria for Meaningful Use Stage 2. (See update under "Other" below for the Greenway solution.) • AllCare reports it will need some of the smaller (1 to 2 doc practices) with EHRs to participate in order to achieve the Year 2 population % CQM requirements. The clinics on Greenway will not be enough to meet these requirements. **Longer term CQM Strategy:** Utilizing JHIE is part of the CCO's long-term strategy for CQM reporting. JHIE member CCOs will be able to collect CQMs from providers using JHIE and are exploring using JHIE to submit data to the CQMR.
Technical Assistance to Practices for EHRs and Meaningful Use	AllCare eHealth Services, an EMR company that provides Greenway's PrimeSuite EHR solution to a number of clinics in AllCare's network, provides technical assistance and support to those clinics related to using the EHR and meeting Meaningful Use. AllCare found many providers faced challenges in 2013 for recording depression assessments in EHRs – didn't know where to put the assessments in the EHR. AllCare provides training to providers to ensure they are putting the data in the right place.
Telehealth and Patient Engagement through HIT	▪ In the fall 2014, AllCare worked with Providence for eHealth Express, which offers "virtual provider triage" to support delivery of care in the most appropriate setting, including identifying non-emergent issues. ▪ AllCare is interested in texting initiatives for telehealth. Have been doing Text 4 Baby for about 4-5 years. Interested in moving into disease management.
Other	**EHR Hosting** • AllCare eHealth Services (hosting Greenway's PrimeSuite EHR) – upgraded to 2014 version in fall 2014; fully integrated practice management and EMR; includes a meaningful use dashboard for providers monitoring their metrics and CQMs. The dashboard is great for meaningful use, but not the best for other metrics like the PCPCH metrics, since meaningful use dashboard is set for a calendar year. Can export meaningful use CQMs. **Local Provider Directories:** • AllCare maintains a provider directory within their administrative systems including within Essette case management; and AllCare eHealth Services (hosting Greenway's

	PrimeSuite EHR). JHIE includes a provider directory based on user enrollment and clinical results attribution expected to be compliant with anticipated HPD standards.
Barriers to Implementation of HIT Tools/ Services	• Lack of EHR adoption with some private solo and small practice sites. Certain providers and clinics that serve as key access points for patients to the care system have not yet adopted EHRs and it's unclear if they will be doing so in the future. • Many smaller offices are struggling with reporting burden and meeting PCPCH, PQRS, meaningful use, and other requirements. Concerned that burden will become a barrier to achieving or maintaining PCPCH status. Our AllCare eHealth Services spends plenty of time supporting EHR and pulling reports – some small practices just may not have sophistication to do it or the time to deal with upgrading EMR, and it is frustrating for them when we keep pushing in that direction when they don't have the resources to do those things. One-stop reporting for providers would be helpful. • Providers want credible metrics – some metrics aren't credible, such as holding a PCP accountable for mammograms, when the PCP orders but doesn't perform them. The certified EHR system doesn't account for that. • AllCare is experiencing some pushback from clinics because of all of the reporting/workflow requirements placed on them. Some clinics are averse to becoming primary care homes because of the reporting burden (e.g., NQF measures). AllCare is using its case management staff to fill some of the gaps in care coordination experienced by practices in its network. • For C2 and sharing individual-level data between non-health providers – many issues around FIRPA (laws regulating sharing of student data within the education system) and HIPAA arise. C2 and JHIE sharing HIPAA resources. • JHIE and its partners would like to include access to the Prescription Drug Monitoring Program data to support efforts to reduce inappropriate prescribing and abuse of prescription drugs.
Barriers to Behavioral Health Information Sharing	JHIE and its partner CCOs would like mental health agencies in their network to be able to contribute data to JHIE's community health record for patient search, but data management concerns resulting from the sensitivity of mental/behavioral health information (and the potential co-mingling of that information with physical health data) present challenges. Barriers/challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include: _X__ Confusion over compliance with state or federal laws ___State or federal laws prohibit the type of sharing we want/need to do ___Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). __X_Concerns over privacy and confidentiality protection for the patient ___Concerns over liability if information you share is later improperly shared ___Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

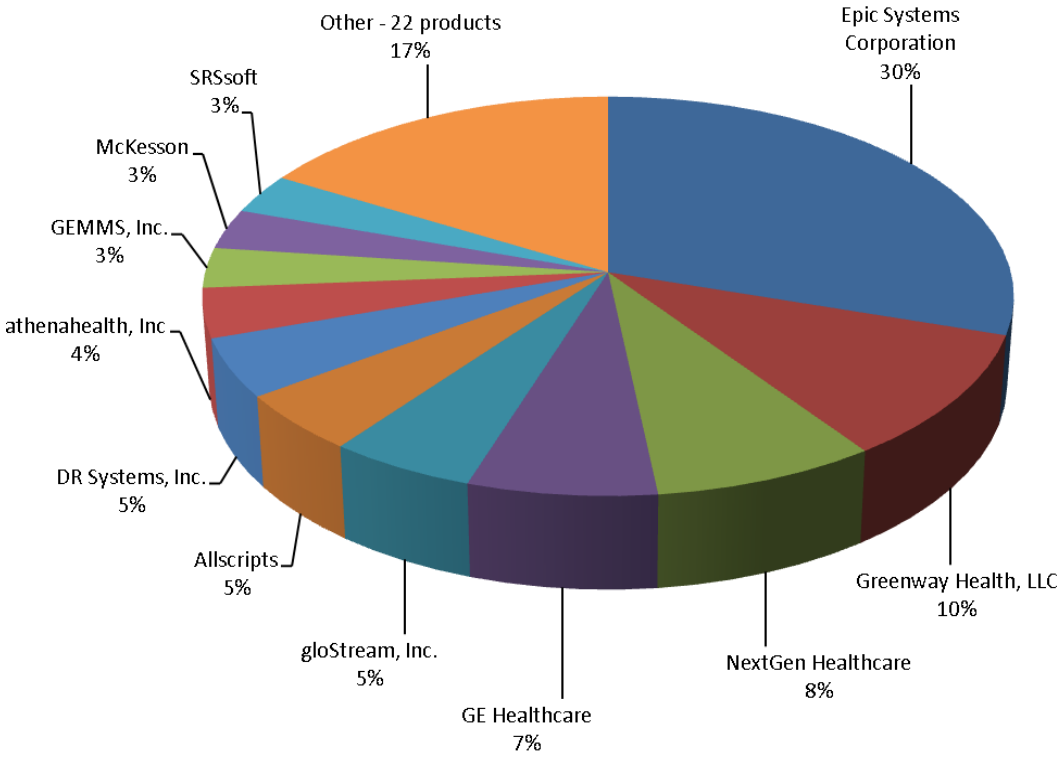
Hospital Name	EHR Vendor	Stage of Meaningful Use*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Asante Three Rivers Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Asante Ashland Community Hospital	N/A	N/A	Feed is live for ED and inpatient data—receiving notifications to EMR.
Asante Rogue Regional Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Curry General Hospital	CPSI	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Providence Medford Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top Certified EHR Technology Products for AllCare

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 400 unique providers affiliated with AllCare CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, EHR represented in data is based on the most recent information. There are a total of 32 different EHRs in use within the CCO. The top 11 products are represented in the chart, which are in use by 334 unique providers.



Cascade Health Alliance CCO HIT/HIE Profile

17,125 members[1]

CCO Description:

- 9 primary care clinics and 45 primary care providers, with 75 local IPA specialists and 1hospital.
- 3 largest clinics are assigned approximately 25% of membership each. As of December 2013, the largest 4 clinics (two of which are pediatric clinics) made up a total of 91.82% of membership.
- Cascade Health Alliance is one of 4 Southern Oregon CCOs participating in the Jefferson Health Information Exchange (JHIE).

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination	Quality Improvement, Population Management, Data and Analytic Tools
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing
Vendor Name	Medicity	
Comment	Provided by Jefferson HIE	Pursuing new case management software

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	Cascade Health Alliance is participating in the Jefferson Health Information Exchange (JHIE) which aims to provide the care team with access to patient-centered health information at the time and place of care to improve timeliness, quality and coordination of care. JHIE covers a three county region in Southern Oregon inclusive of Jackson, Josephine, and Klamath Counties, and recently added partnerships with a 5th CCO and providers in the Columbia River Gorge area. **Health Information Exchange:** • JHIE currently offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. These features support health information exchange and referrals among behavioral, physical, and dental health providers and with CCO Care Coordinators. • JHIE is in the process of implementing "phase 2" to include additional functions/services including clinical alerts, 30-day readmission alerts, patient search, and a consolidated clinical inbox to be accessible to any enrolled provider or CCO with a patient/member relationship. Patient matching and record location supports patient/provider attribution. EHR integration and connectivity will be supported as well, including single sign on for patient search of HIE, results delivery to the EHR and receipt of CCD/care summary to the EHR. **Direct Secure Messaging[2]:** • JHIE offers Direct secure messaging and a provider-to-provider closed-loop referral system

[1] As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

	through its technology vendor Medicity. • The JHIE Medicity HISP is DirectTrust accredited, and thus interoperable with CareAccord and other Direct secure messaging users across the state. JHIE participates in the flat file directory sponsored by OHA, to share Direct secure messaging addresses across Oregon organizations using accredited HISPs to support cross-organizational exchange. **Hospital Notifications[3]:** • JHIE will include hospital event notifications from its member hospitals (Asante, Providence, Sky Lakes, Mid-Columbia Medical Center) to JHIE members as part of "phase 2" and is contemplating connecting to PreManage to enable its members to send and receive hospital alerts from hospitals beyond the JHIE region across the state. **Care Management and CCO-Provided Information to Provider/Care Teams:** CHA is heavily involved in providing case management to their members. EZCap, their practice management software, has a case management module that is in use by the CCO. MedImpact (Atrio's chosen reporting software) and MedOptimize (Pharmacy) are used for running reports from Atrio for dual eligible population. The CCO is exploring the possibility of implementing a new case management application, which would have the ability to ingest data from the state, interface with practices and/or the JHIE platform, and access claims data from EZCap.
Quality Improvement, Population Management, Data and Analytics Tools	CHA has a focus on claims analytic capabilities and report preparation. A key barrier to improved analytics is the lack of access to EHR clinical data. **Incorporating Clinical Data:** • Expecting significant growth in the capacity to report clinical metrics internally with the advent of JHIE tools for data analytics and population health management. Defining tools for data analytics and population health management are anticipated for 2015 with services available in 2016 through participation with JHIE. • Additional opportunities exist for future alternate data collection. In time, these may be the best opportunities because they are less dependent on clinic personnel resources. o Utilize JHIE for the majority of clinical data reporting. Looking forward to using JHIE to get aggregate data. o The CCO expects to rely on report from their anticipated (new) care coordination software integrated with clinic EHRs. This will depend on the software's ability to integrate effectively, but will serve a dual purpose – more real time data as well as faster turnaround for clinical reports because of direct access.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** • As in year 1, CHA plans to utilize aggregate-level data provided by OCHIN for year 2 CQM reporting. • One of CHA's larger clinics, Klamath Open Door, has recently implemented Greenway EHR technology, which is currently only capable of reporting on one of the three CQMs. • Klamath Open Door is providing data generated from internal reporting for all three CQMs. Despite the new EHR not having canned reports, the data desired is in the system and can be extracted. **Longer term CQM Strategy:** Utilizing JHIE is part of the CCO's long-term strategy for CQM reporting. JHIE member CCOs will be

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	able to collect CQMs from providers using JHIE and are exploring using JHIE to submit data to the CQMR.
TA to Practices for EHRs and MU	CHA provides Technical Assistance to practices for EHR adoption/workflow optimization, but uptake has been limited. JHIE is providing some assistance in HIE connectivity and Direct.
Other	**Local Provider Directory:** • JHIE includes a provider directory based on user enrollment and clinical results attribution expected to be compliant with anticipated HPD standards. • CHA maintains a provider directory within EZCap
Barriers to Implementation of HIT Tools/ Services	• Use of disparate EHRs within the CCO. • Lack of access to clinical data, needed for analytics and care management. • Ongoing changes within CHA, including training and setup of new employees (primarily case managers) on JHIE. Case managers access a variety of tools (dual eligible tools through Atrio, etc.) and need 3 monitors to do so. • Pushback from practices due to drastic workflow changes associated with implementing a new application. • JHIE and its partners would like to include access to the Prescription Drug Monitoring Program data to support efforts to reduce inappropriate prescribing and abuse of prescription drugs.
Barriers to Behavioral Health Information Sharing	JHIE and its partner CCOs would like mental health agencies in their network to be able to contribute data to JHIE's community health record for patient search, but data management concerns resulting from the sensitivity of mental/behavioral health information (and the potential co-mingling of that information with physical health data) present challenges. Identify the barriers/challenges CHA experiences in sharing behavioral health data (including mental health, substance abuse, and addictions): _X__ Confusion over compliance with state or federal laws ____ State or federal laws prohibit the type of sharing I want/need to do ___ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). _X__ Concerns over privacy and confidentiality protection for the patient _X__ Concerns over liability if information you share is later improperly shared ____ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

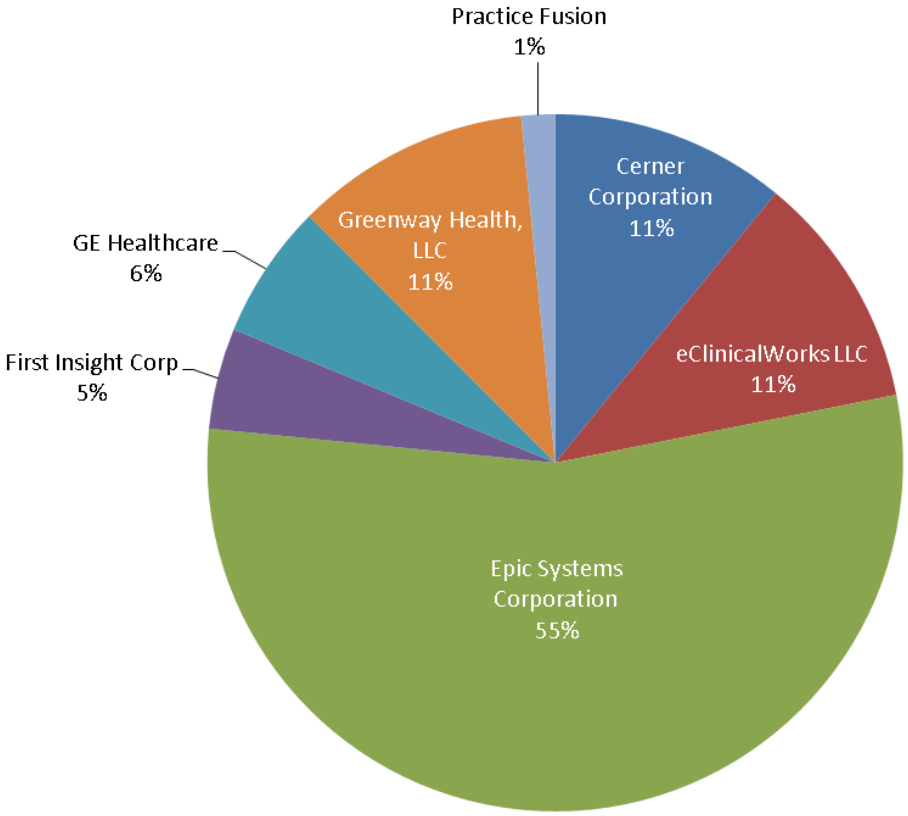
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Sky Lakes Medical Center	Meditech	Stage 1	Feed is live for ED and inpatient data—receiving notifications to printer.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Certified EHR Technology Products Cascade Health Alliance

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 64 unique providers affiliated with Cascade Health Alliance CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 7 different EHRs in use within the CCO.



Columbia Pacific CCO HIT/HIE Profile

28,850 members[1]

CCO Description:

- Services members in Tillamook, Clatsop, Columbia and five zip codes in Douglas County
- 29 contract primary care clinics sites, 13 mental health/addictions sites, and 4 hospitals within its service area
- Majority of primary care clinics are licensed FQHCs or RHCs; a smaller proportion of the Medicaid population is served by small clinics and independent practitioners within the CCO
- Over 40% of members are empaneled to two clinics: OHSU Scappoose and Coastal Family Health Center
    - Both clinics are PCPCH Tier 3 clinics and have OCHIN's Epic certified electronic health record (EHR) and participate in Meaningful Use
- Due to the Affordable Care Act and Medicaid expansion, Columbia Pacific CCO (CPCCO) grew 70%.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination	Quality Improvement, Population Management, Data and Analytic Tools
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	CareAccord	
Product Name		SAS Business Intelligence Software
Comment	Exploring pilot projects with CareAccord	Claims-based analytic reporting, ideally expanding to incorporate clinical information

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	Overall, Columbia Pacific anticipates leveraging state HIT/HIE efforts and expects to work toward a CCO-specific technology roadmap. **Health Information Exchange:** • Patient information is shared across physical health care teams that are using Epic EHR (including FQHCs using OCHIN's Epic) via Epic CareEverywhere. • Columbia Pacific is interested in exploring approaches for supporting information sharing with behavioral health providers and other members of the care team including with their behavioral health partner, the Great Oregon Behavioral Health Inc. (GOBHI) (see Direct secure messaging below). **Direct Secure Messaging[2]:** Columbia Pacific is considering how to support and facilitate the use of Direct secure messaging,

[1] As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

	including considering Direct secure messaging pilots around physical and behavioral health information sharing using CareAccord. **Hospital Notifications[3]:** CPCCO has a strong interest in EDIE and PreManage, as it has patients that seek care at hospitals outside of the CCO network, including OHSU and hospitals in Washington state. The CCO has been engaged in some ad hoc notifications of providers related to ED follow up, which PreManage would replace. **Care Management and CCO-Provided Information to Provider/Care Teams:** The CCO is interested in supporting transitions of care workflow with primary care providers, when their patients are discharged from the hospital, for example. The CCO plans to utilize the hospital notifications obtained via PreManage to assist with care management, including its care coordination efforts and support for providers. CPCCO would like to be able to provide clinics with reports that would allow for follow-up with specific patients. Patient-level information would need to be extracted from the EHRs in order to be actionable, rather than current aggregate metrics reporting.

Quality Improvement, Population Management, Data and Analytics Tools	• CareOregon supports Columbia Pacific CCO with claims-based analytic reporting through SAS Business Intelligence software, using data warehouse to store claims and administrative data.
	  • In 2013, GOBHI mental health claims were incorporated into the data warehouse and made available in SAS BI.
	  • Current reporting capability includes aggregate reporting for CCO level data, provider level data, and member level data for demographics, utilization, and gaps in care
	• Partnership with OCHIN to report capability for clinical data

Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** The high penetration of Epic and use of OCHIN's Epic installation in particular, has allowed for the reliance on OCHIN as the current strategy. **Longer-term CQM Strategy:** The CCO intends to utilize the statewide CQMR service for Medicaid reporting instead of standing up its own comparable technology.
Technical Assistance to Practices for EHRs and Meaningful Use	CPCCO is currently providing EHR technical assistance to clinics through our PC3 collaborative as well as when the practice coach provides one-to-one assistance as well. When working on clinical process and workflow improvement, how to document and code the activity in the EHR is always one aspect of the process we discuss and guide clinics through. We are currently looking into Scribes however no firm decision has been made yet.
Patient Engagement through HIT	Supporting clinic-based initiatives to encourage the use of MyChart.
Telehealth	Interested in and exploring various telehealth opportunities including specialty apps (e.g., tele-dermatology), virtual specialists, telemedicine after hours care, and Project ECHO (tele-mentoring).
Other	**Local Provider Directory:** CareOregon maintains a provider directory in its internal administrative systems.

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

Barriers to Implementation of HIT Tools/ Services	• Providers in rural areas are serving many more of the CCO's members due to Medicaid expansion, and layering changes or new expectations (such as new metrics) on top of this much new growth is difficult for providers. • HIT tools for providers, such as PreManage hospital notifications, are more likely to be used if a clinic's entire patient panel is supported by the HIT tool. • A lack of access to clinical data. In need of patient-level actionable information. • A number of additional small practices use other (non-Epic) EHR systems that do not have the same HIE capabilities • Current lack of understanding among clinics/providers in optimal use of Epic's CareEverywhere.
Barriers to Behavioral Health Information Sharing	Integration of Behavioral Health clinical data with physical health clinical data will be an ongoing challenge as the county Mental Health providers use differing software/ EHR platforms. Identify the barriers/challenges Columbia Pacific experiences in sharing behavioral health data (including mental health, substance abuse, and addictions): __X_ Confusion over compliance with state or federal laws __X_ State or federal laws prohibit the type of sharing I want/need to do __X_ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). __X_ Concerns over privacy and confidentiality protection for the patient __X Concerns over liability if information you share is later improperly shared __X Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

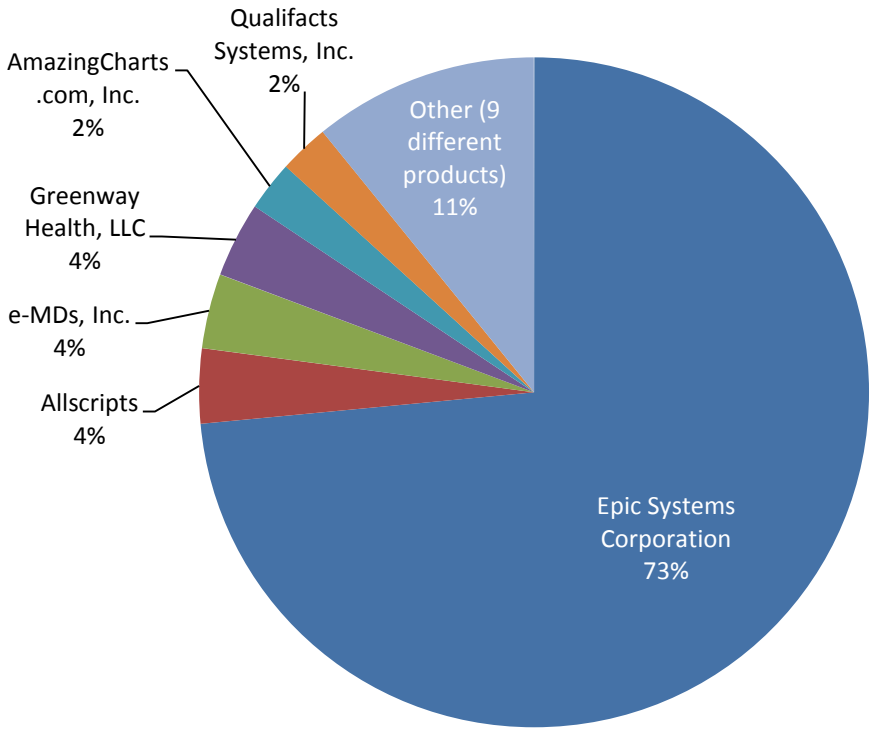
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Columbia Memorial Hospital	CPSI	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.
Providence Seaside Hospital	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Lower Umpqua Hospital	Healthland	Stage 1	Feed is live for ED and inpatient data—receiving notifications to printer.
Tillamook Regional Medical Center	Cerner	Stage 1	Feed is live for ED data—receiving notifications to fax.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top Certified EHR Technology Products for Columbia Pacific CCO

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 83 unique providers affiliated with Columbia Pacific CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 15 different EHRs in use within the CCO. The top 6 products are in use by 74 unique providers.



Eastern Oregon CCO HIT/HIE Profile

46,701 members[1]

CCO Description:

- Service area covers 12 counties in rural eastern Oregon, the land mass of which is more than 50,000 square miles, representing over 52% of the land area in the State of Oregon.
- There are 57 widely dispersed clinics and individual providers: 24 are certified as Rural Health Clinics (RHCs), 6 as Federally Qualified Health Centers (FQHCs). Twenty-four of EOCCO's contracted clinics within the 12 counties of EOCCO are PCPCHs. An additional Twenty-two (22) clinics that boarder the EOCCO geography are certified.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination	Quality Improvement, Population Management, Data and Analytic Tools	
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name			SAS
Product Name		Provider Portal	Data Store
Comment	Exploring how to support clinics with Direct secure messaging	Being developed/offered by Moda Health (Q2 2015). Reporting: quality, utilization, rosters, etc.	Includes risk analysis tool

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	EOCCO has developed a regional HIT/HIE strategy that focuses on leveraging state HIT/HIE services and otherwise relies largely on technology resources developed and provided by Moda Health. EOCCO plans to contract with a vendor to provide technical assistance, who would work in conjunction with the Innovator Agent as needed to engage providers around HIT efforts. **Health Information Exchange:** (see Direct secure messaging, below) **Direct Secure Messaging[2]:** The CCO sees significant value in getting providers and other care team members (e.g., public health, social services, corrections, etc.) in their network enrolled in CareAccord or other Direct secure messaging so they can exchange information and communicate amongst themselves. The CCO is interested in pilot testing use cases across a diverse care team. The CCO itself uses Moda Health's own secure email service and does not currently intend on utilizing Direct secure messaging separately.

[1] As of 10/01/2014
http://www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

	Hospital Notifications[3]: Hospitals in the EOCCO service area are providing hospital notifications directly to many key CCO practices. EOCCO is considering whether PreManage would provide added value for their CCO or practices. **Care Management and CCO-Provided Information to Provider/Care Teams:** EOCCO plans to utilize a provider portal (expected in 2015) which is currently being developed and offered by Moda Health. It will provide reporting, including quality and utilization metrics, and patient rosters to providers. Currently this information is being provided via secure email.
Quality Improvement, Population Management, Data and Analytics Tools	• EOCCO/Moda's analytical capacity includes the ability to extract, transform and load data into a data store for analytic and reporting functions. This data store provides the foundation for the analytic team to assess information quickly and run various analytics against information about members and providers and to make recommendations surrounding members' care. • EOCCO Leverages the analytics capabilities of Moda Health who supplies: o a dedicated analyst o ad-hoc support from the larger Moda analytical team as needed o support by the full portfolio of Moda analytical tools and organizational knowledge • With Moda resources, the CCO is able to generate timely reports on cost, utilization, quality and trends and gaps in care (e.g., patients in need of screening). EOCCO produces reporting packages tailored for individual counties or provider groups to assist in finding opportunities to improve care and eliminate waste, for example. • EOCCO currently sends out provider report cards tracking performance by secure email. Moda is planning to distribute these provider report cards via their provider portal.. • Moda is considering expansion of their risk score tool to allow for the identification of members whose utilization rate they could influence. They are interested in becoming more sophisticated with respect to the stratification of their population. • In 4th quarter 2014 EOCCO began providing primary care practices a report of their top 15 utilizing members which includes the members prospective risk score. This information is provided with the report cards. This new report is an additional tool for providers to use to help manage the most costly members assigned to their clinic/practice. **Incorporating Clinical Data:** • EOCCO is highly interested in extracting clinical data from their providers' EHRs and are therefore in discussion with a vendor for these services, potentially in early 2015. • Building a process to store and analyze clinical information. It is anticipated that providers will deliver information in standard HL7 data format, which would allow for consistency and efficiency in information processing. EOCCO will then be able to run analytics against this information and validate the data against the utilization in claims data.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** • EOCCO continues to express concern about being able to meet the Year 2 depression screening CQM target. This is not due a technical barrier, but a workflow-related one, as many practices have not yet implemented the depression screening process into their clinical workflow. • The CCO is currently performing outreach to practices in an attempt to get them to incorporate proper depression screening processes into their EHR workflows. The focus

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	has been on the larger practices in order to ensure collection of sufficient data. • EOCCO is pursuing the collection of clinical and other HEDIS data for the purpose of expanding their data repository and improved reporting as well as providing practices with more meaningful and actionable reports. **Longer-term CQM Strategy:** The CCO and Moda are in discussions regarding their strategy for addressing the CCO incentive measures moving forward, which includes contracting with an outside vendor to provide analytics tools/capabilities and/or guidance around collecting and reporting on CQM data. • EOCCO is in discussions with vendors who could access various systems, review and assist with adjusting workflows, and collect clinical data directly out of the EHRs. • Note: any vendor solution will also be expected to support Moda performance/quality related initiatives outside of the CCO, e.g., HEDIS reporting.
Technical Assistance to Practices for EHRs and MU	CCO is embarking on a technical assistance program, which may include staff that goes out to support practices. Providing assistance with workflow modifications to facilitate the collection of clinical data is a priority. EOCCO plans to begin TA to assist with CQMs at their high-priority practices in early 2015.
Patient Engagement through HIT	EOCCO plans to expand the use of the MyModa member portal to the EOCCO population. The MyModa portal provides members customized on-line access to real time health information such as claims, eligibility, current PCP/Medical home assignment, the ability to search for network providers along with other health related tools and resources. We expect the portal to be available to the EOCCO population in 2015.
Telehealth	EOCCO providers have telehealth equipment and technology, but lack an implementation partner. They are very interested in telehealth and requested access to the OHA-sponsored telehealth inventory, once compiled.
Other	**Local Provider Directory:** EOCCO maintains a provider directory within their administrative systems.
Barriers to Implementation of HIT Tools/ Services	EOCCO's provider network contains many small practices. This presents challenges on multiple levels. Having many small practices on disparate systems complicates efforts to implement HIE or collect clinical data. This also makes the CCO's process of providing practice-level assistance around EHR workflows longer and more complex. • Small practice size is a barrier to increasing CQM collection. EOCCO is finding it challenging to get clinical data out of EHRs effectively, particularly with its rural providers. • There are over 25 different EHRs being used by practices in the CCO's region, and a lack of EHR interoperability. • Challenges related to geographical and logistical technology capabilities. • Some providers are waiting on vendors for needed MU Stage 2 updates, while those owned by hospitals/health systems are relying on their parent organization to proceed. EOCCO is finding it challenging to distribute provider report cards to practices and providers., It is difficult to get accurate, up-to-date e-mails for secure email distribution. Having an email address does not ensure distribution to the correct individual.
Barriers to Behavioral Health Information Sharing	Barriers/challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include: _X__ Confusion over compliance with state or federal laws ____ State or federal laws prohibit the type of sharing I want/need to do _X__ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not

	segment or separate data). _X__ Concerns over privacy and confidentiality protection for the patient ____ Concerns over liability if information you share is later improperly shared ____ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

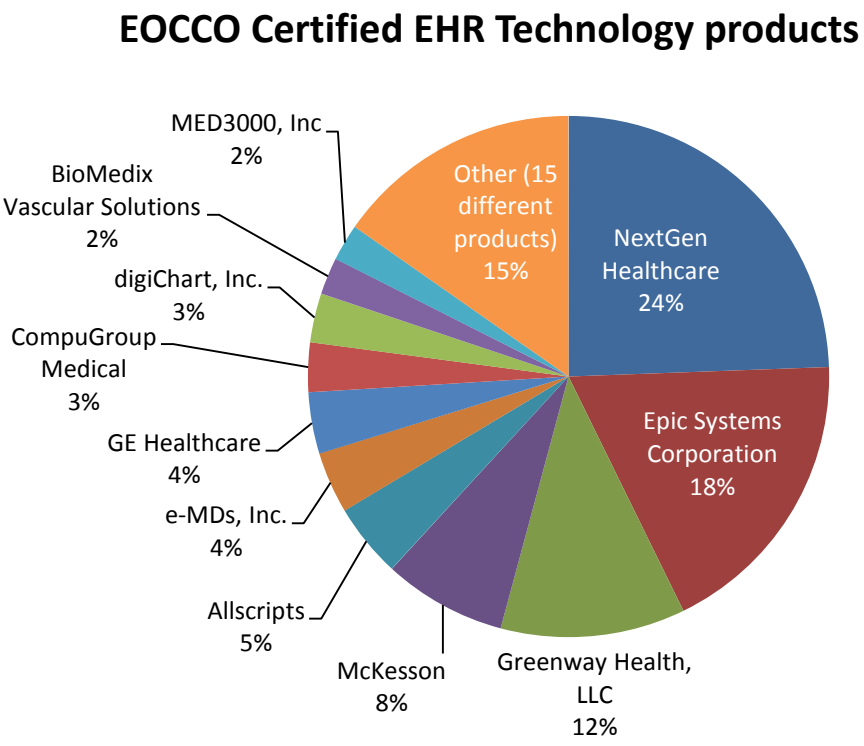
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Blue Mountain Hospital	Healthland	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.
Good Shepherd Medical Center	Meditech	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.
Grande Ronde Hospital	McKesson	Stage 1	Feed is live for ED and in patient data—receiving notifications to fax.
Harney District Hospital	McKesson	Stage 2	Feed is live for ED and inpatient data—receiving notifications to fax.
Lake District Hospital	CPSI	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Pioneer Memorial Hospital	Healthland	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.
St. Alphonsus Medical Center – Baker City	Cerner	AIU	Contract with vendor has been signed.
St. Alphonsus Medical Center – Ontario	Cerner	Stage 1	Contract with vendor has been signed.
St. Anthony Hospital	Meditech	AIU	Feed is live for ED and inpatient data—receiving notifications to fax.
Wallowa Memorial Hospital	Healthland	Stage 1	Feed is live for ED and inpatient data—receiving notifications to printer.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top Certified EHR Technology Products for EOCCO

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 131 unique providers affiliated with EOCCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 26 different EHRs in use within the CCO. The top 11 products are in use by 111 unique providers.



FamilyCare CCO HIT/HIE Profile

117,316 members[1]

CCO Description:

- Services Medicaid members in Clackamas, Multnomah, and Washington counties, and a small number in Marion.
- Primary care network providers are generally PCPs in small to medium-sized group practices and within FQHCs throughout the tri-county area (pre-2014 enrollment was 70% children).
- 74% of patients are assigned to Tier 3 Patient Centered Primary Care Homes (PCPCH).
- A significant number of FamilyCare providers' compensation will be tied to outcomes in 2015.
- Technology strategy involves supporting local entities that have developed their own HIT/HIE tools, while also developing and implementing centralized tools in two phases
    - Based on a gaps assessment, quickly procured best of breed tools to support care management, population management, utilization and analytics,
    - Longer term strategy – in 2015, select an integrated solution for sharing clinical information with the CCO's provider network to support patient care and population health

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination			Quality Improvement, Population Management, Data and Analytic Tools	
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	McKesson	CMT	TBD	Milliman	Inovalon
Product Name	VITAL	PreManage		MedInsight	Indices
Version	7.2	Complete		10.3	4.04
Comment	Care management system; attributes available clinical data with individual member records	Provider clinics have begun to establish direct connections with CMT for ED and inpatient notifications	Pursuing an integrated solution for sharing member information to support care delivery with the CCO's provider network	Analytics tool for utilization management and quality improvement; has ability to benchmark and compare performance from provider and population perspectives	Quality analytics platform with Medicare HEDIS tracking/reporting; will have ability to track many CCO measures

[1]As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Overall approach:** • FamilyCare has reported a trend in their region of provider groups (e.g., IPAs, ACOs) taking the lead in investing in, designing, and developing certain HIT/HIE-related tools and services on their own. These groups want to be able to assume risk and need the tools to support care and manage risk, and are thus investing in HIT/HIE. o Two major examples - an organization representing 22 pediatric practices and an association of large adult care practices outside of health systems have each invested in population management platforms, and want to connect to patient information within other provider, hospital, and CCO/health plan systems. • FamilyCare's strategy is to track such investments to understand providers' needs and the expectations or opportunities for FamilyCare to support provider groups and facilitate access to important member-level data for providers. Providing the right patient information to support practices and groups accepting risk is part of FamilyCare's strategy to recruit and retain providers. • In 2015, FamilyCare will select an integrated solution for care management and sharing member information to support care delivery with the CCO's provider network. An ideal solution would simplify data exchange (HIE) with providers and integrate information with the CCO's care management activities. Tools for member engagement will be part of this solution as will additional analytics and population health capabilities. **Health Information Exchange:** FamilyCare CCO's overall HIT/HIE strategy includes taking a decentralized approach, by supporting the development/adoption/use of HIT/HIE at the provider-level, and being a conduit of information to providers, but not serving as a central consolidator of information or services related to HIE. FamilyCare is an early adopter of the Emergency Department Information Exchange (PreManage) and will facilitate provider access to this information and integrate the data into care management and other operational processes. **Direct Secure Messaging[2]:** FamilyCare is interested in supporting the use of Direct secure messaging for sharing patient information between physical health providers and others such as CCO case management, home health, developmental screenings happening outside of pediatric practices, etc. **Hospital Notifications[3]:** FamilyCare has implemented the PreManage solution from CMT comprising both ED and inpatient notifications. As part of this service, provider clinics in FamilyCare's network have begun to establish direct connections with CMT for this data.

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	Care Management and CCO-Provided Information to Provider/Care Teams: In March 2013, FamilyCare licensed and implemented McKesson's VITAL system, for use internally by the CCO's care management teams. VITAL is a coordinated care management system for utilization, disease and case management. It includes clinical data and decision support tools integrating data from disparate sources and combining it into a single, member-centric workflow which enables use of one system in managing the health needs of each member. The tools support emergency room follow up and help reduce readmissions for hospital care: • The assessment tool supports case management staff working with the member to create a care plan and goals. • The disease monitoring tool sends alerts to care managers based on needs or gaps in care for members within certain chronic conditions.
Quality Improvement, Population Management, Data and Analytics Tools	FamilyCare has two tools for analytics, quality improvement, and population management (in addition to VITAL, described above): • In 2014, FamilyCare began implementing the Milliman MedInsight platform as an internal analytics tool for utilization management and quality improvement, which includes consolidated medical and pharmacy claims, prospective risk scoring, and CCO metrics tracking for provider performance. • Inovalon Indices is an analytics platform that FamilyCare will utilize for HEDIS tracking/reporting for their Medicare population, which may be applicable to other populations/initiatives in the future (e.g., quality reporting for Medicaid). This is a sophisticated tool that helps to identify gaps in care and prompt care teams when interventions are needed. • Longer term strategy – as described above, FamilyCare is pursuing an integrated HIT/HIE/analytics solution that can support shared care management/planning, clinical information sharing, member engagement and analytics, etc. **Incorporating Clinical Data:** • FamilyCare develops or participates in data warehousing initiatives to enable aggregation of clinical and claims information to inform conversations about quality, cost and value. FamilyCare has programmers on staff who develop point-to-point data sharing, although this is labor intensive. • FamilyCare has engaged a handful of labs, and is pursuing additional ones, in data sharing arrangements. One of their long-term goals is for lab data to be fed directly into VITAL and Inovalon where it can be used for analytics and CQMs.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** • For its OCHIN clients FamilyCare utilizes OCHIN-supplied aggregated data for CQM reporting. However, FamilyCare sees the most value reporting patient-level, actionable data. • For non-OCHIN clients, FamilyCare is pursuing a strategy of developing individual connections/interfaces to enable the collection of (individual-level) clinical data. The CCO commented that this process can be a tedious one-by-one effort to set up the customized connections, and perform the necessary patient attribution processes once the data is flowing. • As described above, FamilyCare is bringing lab data into VITAL and Inovalon for CQMs, and is developing the ability to obtain clinical quality data from the provider network. However practices have varying capacity to send clean, structured clinical quality information for state quality measures.

	Longer-term CQM Strategy: Investigating market options (as described above), and considering the state clinical quality metrics registry for data collection from providers.
Technical Assistance to Practices for EHRs and MU	OCHIN supports some key FamilyCare practices. FamilyCare is considering using OHA-sponsored technical assistance, however the amount of assistance available does not address the needs of FamilyCare's relatively large provider network.
Patient Engagement through HIT	FamilyCare is pursing strategies for connecting with members and engaging them in improving their health through HIT. This includes short-term implementation of stand-alone services for member communication and medium-term implementation of systems for members integrated with CCO databases. Longer-term solutions will be tightly connected with the care management system as part of the larger integrated systems strategy.
Telehealth	Lots of interest in telehealth, but no current activities. FamilyCare would like clarification on operational issues around telehealth such as billing, what constitutes a visit, etc.
Other	PH Tech, FamilyCare's third-party claims administrator (TPA), offers web-based tools through the Clinical Information Manager "CIM" system for FamilyCare practices related to eligibility and prior authorization requests. **Local Provider Directory:** FamilyCare maintains a provider directory (Applied Statistics & Management, Inc.'s "MDStaff") within their administrative systems, and provider information is included in their case management program, McKesson VITAL. An online provider directory is also available to all members and providers on FamilyCare's website.
Barriers to Implementation of HIT Tools/ Services	• Challenging to identify when and what are the right investments for the CCO to make related to supporting health information exchange, given the investments that local provider groups and health systems are making. • FamilyCare's network is changing – more adult-focused practices. Providing the right patient information to support practices and groups accepting risk is part of FamilyCare's strategy to recruit and retain providers. • Obtaining clinical quality metrics data is tedious, and there are challenges with managing patient attribution for the provider, because in some cases their EHR is not linked to their practice management system, and assigned PCP is not tracked in EHRs. Some complexity around providers ensuring that submitted information only goes to the appropriate health plan. Providers will want more automated (and reliable) patient attribution once they are taking on risk. • Some providers do not utilize EHR technology, and/or are not able to share patient information outside their organization or connect to an HIE. FamilyCare faces challenges related to assisting providers to become ready and willing to participate in HIE. • Difficult for some clinics to see the value of altering their workflows to accommodate CQM reporting requirements. • Providers are being asked to consume and share data with payers, hospitals, peers, government, and an increasing number of complex risk sharing entities. In the Portland Metro area, providers frequently work with multiple CCO's. Coupled with what is expected to be relatively low Meaningful Use Stage 2 technology adoption, requiring them to transmit CQM data to multiple CCO's could increase overhead even further and make caring for Medicaid patients less attractive.
Barriers to	Barriers /challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include:

Behavioral Health Information Sharing	_x_ Confusion over compliance with state or federal laws ___ State or federal laws prohibit the type of sharing I want/need to do ___ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). ___ Concerns over privacy and confidentiality protection for the patient _x_ Concerns over liability if information you share is later improperly shared ___ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

(Hospitals in the CCO's service area)

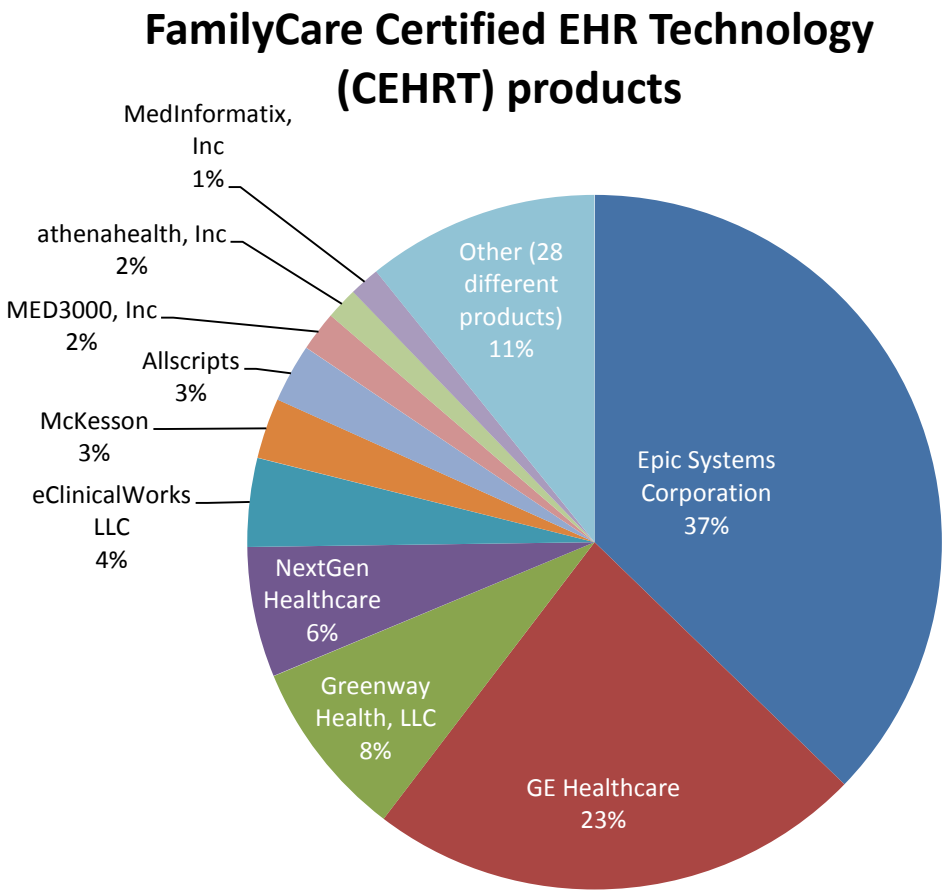
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Adventist MC	Cerner	Stage 1	Feed is live for ED data—receiving notifications by fax.
Kaiser • Sunnyside MC • Westside MC	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Legacy • Emanuel MC • Good Samaritan MC • Meridian Park MC • Mount Hood MC	Epic	Stage 2	Feed is live for ED and inpatient data—receiving notifications to EMR.
Oregon Health & Science University	Epic	Stage 1	Feed is live for ED data—receiving notifications to EMR.
Providence • Milwaukie MC • Portland MC • St. Vincent MC • Willamette Falls MC	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Tuality • Forest Grove Hospital • Healthcare	Cerner	Stage 2	Feeds are live for ED and inpatient data—receiving notifications by Fax.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top 10 Certified EHR Technology Products for FamilyCare

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 1138 unique providers affiliated with FamilyCare that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 38 different EHRs in use within the CCO. The top 10 products are represented in the chart, which are in use by 1015 unique providers.



Health Share CCO HIT/HIE Profile

238,517 members[1]

CCO Description:

- The state's largest CCO serving members in Clackamas, Multnomah, and Washington counties.
- Delivers services through its risk accepting entities (RAEs) and partners including the following: CareOregon, Kaiser Permanente, Providence Health Plan, Tuality Health Alliance, Clackamas County Mental Health, Multnomah County Mental Health, Washington County Mental Health, Access Dental Care, Capital Dental Care, CareOregon Dental, Family Dental Care, Kaiser Permanente Dental, Managed Dental Care of Oregon, ODS Community Health Dental Plan, Willamette Dental Group, and Access2Care. Health Share's contracted provider network exceeds 17,000 providers.
- More than 60% of Health Share's members receive physical health care services from one of 11 provider organizations, all of which have implemented Meaningful Use certified EHRs: Adventist Health, Clackamas County Health Department, Kaiser Permanente, Legacy Health System, Multnomah County Health Department, Neighborhood Health Center, OHSU, Providence Health and Services, Tuality Healthcare, and Virginia Garcia Memorial Health Center in the context of more than 120 related practices, most of which are PCPCH certified.
- Technology strategy involves coordinating across local entities that have developed their own HIT/HIE tools, while also developing and implementing centralized HIT including
  - an electronic data interchange infrastructure supporting the bi-directional secure exchange of data between OHA, Health Share, and its partners,
  - a Provider Portal enabling web-based and programmatic member eligibility inquiries, and
  - a robust data aggregation, analysis, and reporting solution ("the Big Kahuna").

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination		Quality Improvement, Population Management, Data and Analytic Tools	
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	RAEs employ Epic, Certify, Medicity, Cerner*	Collective Medical Technologies	Internally/Self-developed	
Product Name		EDIE, PreManage, PopIntel	The Big Kahuna, PopIntel	
Comment	*In addition to developing and leveraging its centralized HIT solutions, Health Share supports and facilitates alignment across the HIT tools that its partners and providers use. Examples include standardized or aligned configuration and use of Epic CareEverywhere, Epic MyChart OpenNotes, EHR-agnostic Discharge Summaries, etc.			

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** • For organizations using Epic EHR, CareEverywhere has been configured to enable optimal health information exchange (HIE) among providers using Epic EHRs. • Supports private enterprise HIEs. Most hospital-based delivery systems contracted with

[1] 9/15/2014 www.oregon.gov/oha/healthplan/DataReportsDocs/September2014CoordinatedCareServiceDeliverybyCounty.pdf

	Health Share have implemented private, enterprise HIEs such as Certify, Medicity, and Cerner while some rely upon interface engines such as Mirth, Cloverleaf, and eGate to exchange health information between internal and external systems for the benefit of related stakeholders. • Patient information is shared across physical health care teams that are either using Epic EHR and/or within a hospital-based delivery system, as described above. • Health Share is exploring approaches for supporting information sharing with behavioral health providers and other members of the care team. **Direct Secure Messaging[2]:** Some providers utilize Direct secure messaging to exchange secure messages with other providers as well as patients. Health Share is considering how to support and facilitate this more broadly, including considering Direct secure messaging pilot around behavioral health information sharing potentially using CareAccord. **Hospital Notifications[3]:** As is true in other parts of the State, Health Share providers are beginning to leverage EDIE and many expect to use Pre-Manage when available. **Care Management and CCO-Provided Information to Provider/Care Teams:** One of Health Share RAEs, CareOregon, shares information with relevant providers and intervention teams about Health Share members engaged in one or more intervention programs aimed at high utilizers of health care services in order to better coordinate and manage care. In this context, information is shared via **PopIntel**, an internally developed web-based centralized care coordination registry for teams to manage their intervention cohort and collect relevant data about intervention processes and outcomes.
Quality Improvement, Population Management, Data and Analytics Tools	**The "Big Kahuna":** Health Share's data aggregation, analysis, and reporting solution , known as the "Big Kahuna," aggregates and correlates information at a member-level sourced from 32 distinct data feeds, maintaining more than 500 data elements per member, totaling more than 100,000,000 data elements refreshed monthly within a data warehouse. The solution has been in use for 16 months and sheds light on: Health Share's members: demographics, RAE assignment, chronic conditions, their utilization of healthcare services and related costs; providers' performance; prescribed medications; Quality Improvement Project (QIP) and Performance Improvement Project (PIP) outcomes; and key performance indicators. Forty distinct "slicers" predicated on member-specific attributes enable analysis of sub-populations. Member-level data enables population risk management, health management, and care coordination. • The solution offers a variety of functions, including, but not limited to: receiving and reporting on CQM data, risk-stratifying and tracking member populations, and managing population health. It o is based on administrative data and CQM data o can drill down to member-level details

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	○ identifies CCO metrics ○ allows for sub-population analysis and drill-down • This solution will provide CQM reporting capabilities for year 2 and beyond, and also give providers the ability to track practice-level CQM scores. • Clinical data: the Big Kahuna incorporates data from a variety of sources, including clinical metrics data aggregated at the provider level (see below). **PopIntel** (described under "Information Sharing" above) supports analysis and evaluation of targeted interventions.
Clinical Quality Measure (CQM) Collection and Reporting	• Health Share looks forward to receiving and aggregating data for the CQMs through the QRDA standard, as it will enable the CCO to calculate the actual CQM measures in-house instead of at the actual practices themselves. • For Year 1 CQM reporting, Health Share utilized aggregate practice level data (Numerator/Denominator), in structured, CSV format from 11 organizations. • Health Share is concerned that the opportunity costs of further expanding the infrastructure to collect and report on CQMs using new technology (i.e., requiring organizations to report CQM data using QRDA standards) may disrupt providers' efforts to achieve MU stage 2. To that end, Health Share does not plan to implement any new technologies/methods for reporting Year 2 metrics
Technical Assistance to Practices for EHRs and MU	OCHIN is providing technical assistance to some Health Share providers with OCHIN Epic EHR. Partner organizations and larger integrated health systems are providing technical assistance support to practices.
Patient Engagement through HIT	• Most large provider organizations actively participate in the NW OpenNotes Consortium sponsored by We Can Do Better and either have or will shortly enable OpenNotes features within their respective patient portal solutions – e.g. Epic MyChart. • Interested in leveraging a "backbone" similar to CareEverywhere for consumer access across the Health Share population – currently My Chart is a portal tethered to a single clinic or practice. Would like a single point of consumer access facilitated through Epic Lucy.
Telehealth	**Project ECHO**: Expanding Primary Care Capacity with Telementoring • Focused on management of psychiatric meds in primary care for adults. • Lead: OHSU dept. of psychiatry. Partnering with OHSU telemedicine • Implementation to date enthusiastically embraced by contracted healthcare providers
Other	• Health Share provides an internal electronic data interchange infrastructure supporting the bi-directional secure exchange of member-related data between OHA, Health Share, and its numerous partners including RAEs. • Health Share provides a Provider Portal enabling web-based and programmatic member eligibility inquiries • Health Share and its RAEs maintain provider directories within their administrative systems, EHRs and private enterprise HIEs, and a provider directory for analytics exists within the Big Kahuna
Barriers to Implementation of HIT Tools/ Services	• Health Share has opted to table certain discussions for HIT/HIE enhancements at the community level in order to avoid disrupting efforts happening at the individual entity/organization level (e.g., coordinating EDIE Plus/PreManage implementation, or building connections between private enterprise HIEs and/or EHR systems). • Difficulty for the provider community to understand what the common credentialing database is. Health Share suggested that more visible marketing efforts towards providers

	be launched in parallel to the development of the service itself.
Barriers to Behavioral Health Information Sharing	Barriers are limited to 42 CFR Part 2 restrictions governing PHI related to substance abuse treatment. However, challenges regarding the electronic sharing of behavioral health information are numerous including: _x__ Confusion over compliance with state or federal laws _x__ State or federal laws prohibit the type of sharing I want/need to do _x__ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). _x__ Concerns over privacy and confidentiality protection for the patient _x__ Concerns over liability if information you share is later improperly shared _x__ Lack of proper consent forms from the patient

CCO Provider Environment

Hospital Engagement in HIT

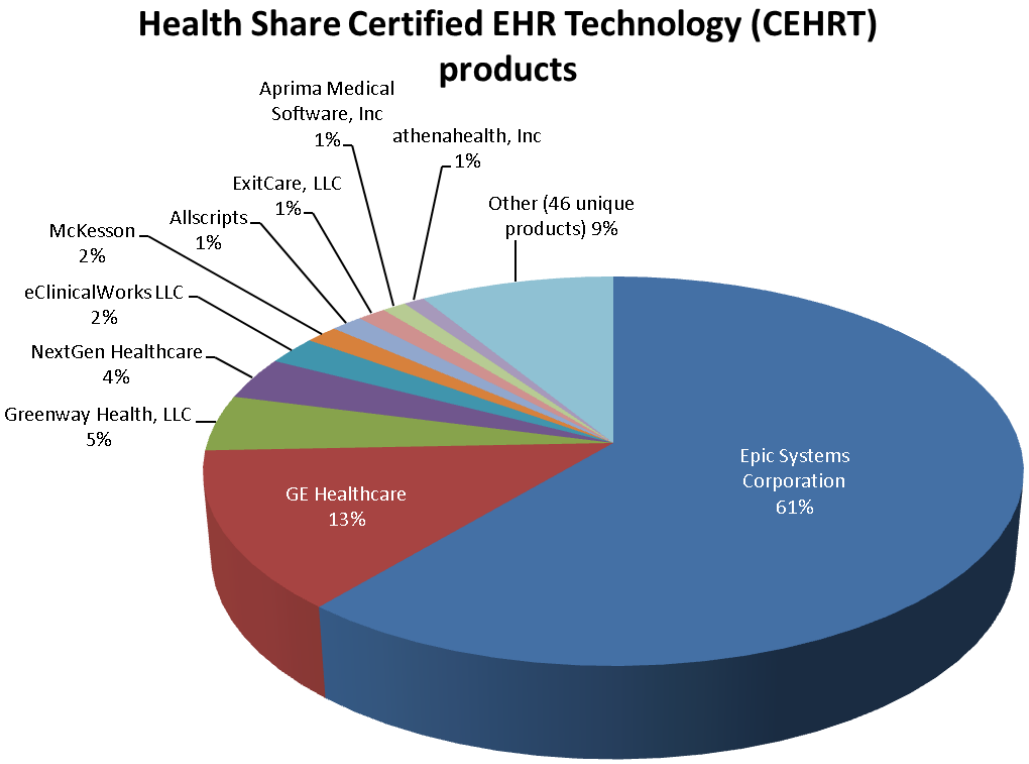
Hospital Name	Direct Secure Messaging Flat File Participation (as of 12/2014)	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Adventist MC	Anticipated	Cerner	Stage 1	Feed is live for ED data—receiving notifications by fax.
Kaiser • Sunnyside MC • Westside MC		Epic	Stage 1	Feed is live for ED inpatient data—receiving notifications to EMR.
Legacy • Emanuel MC • Good Samaritan MC • Meridian Park MC • Mount Hood MC	Currently participating	Epic	Stage 2	Feed is live for ED inpatient data—receiving notifications to EMR.
Oregon Health & Science University	Currently participating	Epic	Stage 1	Feed is live for ED data—receiving notifications to EMR.
Providence • Milwaukie MC • Portland MC • St. Vincent MC • Willamette Falls MC		Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Tuality • Forest Grove Hospital • Healthcare	Currently participating	Cerner	Stage 2	Feeds are live for ED and inpatient data—receiving notifications by Fax.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top 10 Certified EHR Technology Products for Health Share CCO

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 2,553 unique providers affiliated with Health Share that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 56 different EHRs in use within the CCO. The top 10 products are represented in the chart, which are used by 2,328 unique providers.



Intercommunity Health Network (IHNCCO) HIT/HIE Profile

57,132 members[1]

CCO Description:

- InterCommunity Health Network CCO was formed in 2012 by local public, private, and non-profit partners to unify health services and systems for Oregon Health Plan (Medicaid) members in Benton, Lincoln, and Linn Counties.
- Samaritan Medical Clinics provide primary care services to 70% of CCO membership. Other providers in the IHNCCO primary care network include IPAs, FQHCs and several independent primary care clinics.
- IHNCCO is affiliated with Samaritan Health Services as its parent corporation which includes other health care providers via its hospital/health system.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination	Quality Improvement, Population Management, Data and Analytic Tools
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	InterSystems	IBM
Product Name	HealthShare	Cognos Data Marts, Business Intelligence, Query Studio
Version	Cache: 2014.1.3 HealthShare modules: Core: 12.07 Linkage/Index: 13.04 Clinical viewer: 12.0	
Comment	Regional Health Information Collaborative (RHIC) will collect patient data from various sources, organize it, and make it available to providers within a provider clinical viewer	Analytic solutions

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** • IHNCCO is currently participating in the collaborative development of a regional health information exchange tool, known as the Regional Health Information Collaborative (RHIC). o RHIC will collect patient data from various sources (EHRs, claims, others), organize it, and make it available and easily accessible to providers at the point of care within a provider clinical viewer. The vision is for there to be a link within the EHRs to allow for single sign-on access into RHIC. o The clinical viewer will provide a quick overview of patient information (organized within specific categories, such as allergies, latest visits, etc.) with the ability to drill

[1]As of 10/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

	down to the depth of detail the provider needs. o IHNCCO selected InterSystems as the vendor at the end of May. IHNCCO developed an Implementation Project Plan in August 2014. Contract was signed on October 8th and IHNCCO expects to conduct a pilot in fall/winter 2014/5. o Following a successful pilot, IHNCCO will add Epic data from Lincoln and Benton counties supplied by OCHIN, Linn county data from their Raintree EHR, and AllScripts data from The Corvallis Clinic into RHIC in early 2015. • IHNCCO aims to bring myriad data into RHIC to support care coordination o IHNCCO has assembled a Delivery System and Transformation committee within RHIC including members from long-term care, public health, county health, mental health community, and dental. They are using this forum to help identify the data needs that RHIC may be able to address. o IHNCCO is sponsoring a pilot with the long-term care communities across Linn, Benton, and Lincoln counties including all 5 hospitals. It involves LTC partners providing follow-up care for members discharged from any participating hospital within 24 hours. Several issues have come to light including a lack of information regarding when the member is going to be discharged and their insurance (e.g., only 25% were IHNCCO members who are the only patients for whom IHNCCO can pay). The plan is to have all of the data feed into RHIC. The hospitals that have been successful in implementing this program have documented particularly low readmission rates as well as a lower risk across their population. • Samaritan Health Services has promoted the use of Epic CareLink with its participating providers. o Several providers have begun to use the product; future efforts will focus on expanding the use of this product. o All IHNCCO Case Managers have been trained and use Epic CareLink. Plans are in development for case managers to educate providers on ways to access available information within Epic CareLink. **Direct Secure Messaging[2]:** • IHNCCO's major provider partners will have Direct secure messaging in their EHRs (e.g., OCHIN, Samaritan). • RHIC could have Direct capabilities, but IHNCCO has not yet determined when they will initiate this. **Hospital Notifications[3]:** The IHNCCO reported that emergency departments in their region have faced some operational barriers in integrating EDIE capabilities into EHR workflows. The IHNCCO plans to have discussions about their potential use of PreManage after they have received and analyzed additional feedback from ED managers around the value of EDIE. • Samaritan chose to receive EDIE notifications via fax. They are in the process of determining

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	the utility of the information at the point of care. • IHNCCO met internally and with emergency departments to discuss leveraging EDIE and evaluate PreManage and it was found neither service would be beneficial to assisting with IHNCCO members. **Care Management and CCO-Provided Information to Provider/Care Teams:** • (See RHIC description above)
Quality Improvement, Population Management, Data and Analytics Tools	• IHNCCO has multiple analytical solutions available for in-house analytics staff (e.g., utilizing Cognos data marts, Business Intelligence, and Query Studio, as well as Crystal Reports server and reports). o Currently have an analytics department of 5 staff, as well as access to Samaritan Health Services Information Services staff, for programming and development services, and occasionally work with contracted vendors to provide additional analytical capability. • Future phases of the RHIC will support federal, state and local quality reporting initiatives as well as other population health analysis and reporting, evidence-based clinical notices and alerts, and improved population health management capabilities. • Continuing work to expand internal analytic capabilities o Staff recruiting and training, implementing procedures and policies to ensure data integrity, etc. o IHNCCO is engaging in discussions with their community partners regarding the most meaningful way to risk-stratify their patient population. They have determined that one risk-stratification method will not suffice for their entire member population. o IHNCCO is also interested in identifying the socio-economic factors they can affect. **Incorporating Clinical Data:** RHIC integrates various types of data from numerous sources, including clinical data extracted from EHRs.
Clinical Quality Metrics (CQM) Collection and Reporting	Lack of HIE across the provider network makes it particularly complex and burdensome to collect CQM data. **Current CQM Strategy:** • IHNCCO leveraged the Samaritan Health Services system for reporting on CQMs in Year 1, and plans to do so again for Year 2. **Longer-term CQM Strategy:** • RHIC may be used as a tool for reporting on CQMs in the future (beyond Year 2), but details around such functionality have not yet been envisioned.
Technical Assistance to Practices for EHRs and MU	IHNCCO provider network may receive TA already from within their organizations - Samaritan supports its providers, as does OCHIN.
Telehealth	IHNCCO has a high interest in telehealth: • IHNCCO is in the early stages of a telehealth pilot implementing KANNACT at Corvallis clinic o Involves giving tablets to high-risk individuals and surrounding them with 24/7 high-performance health team to improve their care. o The goal of the program is to keep high-risk members out of the inpatient setting, if possible, to cut down those costs.

Other	**Local Provider Directory:** IHNCCO maintains a provider directory within their administrative system and will include one in RHIC.
Barriers to Implementation of HIT Tools/ Services	• Rural and diverse provider community. The hospital system, county health departments, and larger clinics manage data in disparate EMR systems. • Lack of a standardized and central data repository for patient health information across the provider network (RHIC is meant to address this, at least in part). • Some providers can only send and receive data files (e.g., Excel spreadsheets), unable to share data in HL7 standardized formats. • IHNCCO's provider network has some clinics with broadband connectivity limitations in parts of their region, mainly in rural areas and away from the I-5 corridor (e.g., Lincoln county). • The CCO expressed some concerns about meeting the Year 2 (and beyond) for depression screening CQM requirements, indicating they've faced challenges getting providers to adjust their workflows to be able to properly collect/report on data for the depression screening measure. • The long-term governance model/strategy of the RHIC HIE system is under development. • IHNCCO is considering how to include important data in RHIC for the full care team, but is finding concerns/uncertainty about data sharing policies and adequate consent procedures to allow for the sharing of data: o Connecting homecare members into the remaining care community, o Connecting with the educational and penal systems. o Foster children are of significant concern; developmental screenings happening in multiple locations but not getting back to the PCP. • IHNCCO has been engaged in a pilot with Benton county involving the real-time connection of three facilities to allow for the monitoring of who is assigned to the members. PCP reconciliation between the plan, provider records, and provider providing services is only 33% correct. The goal of the pilot is to reconcile the information, for which they have found that member involvement is needed.
Barriers to Behavioral Health Information Sharing	The IHNCCO identified a disconnect between behavioral/mental health EHRs and RHIC. CCO attributes challenges to differing incentives/motivations between the behavioral and physical medicine communities. Barriers/challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include: __X__ Confusion over compliance with state or federal laws __X__ State or federal laws prohibit the type of sharing I want/need to do __X__ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). __X__ Concerns over privacy and confidentiality protection for the patient __X__ Concerns over liability if information you share is later improperly shared __X__ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

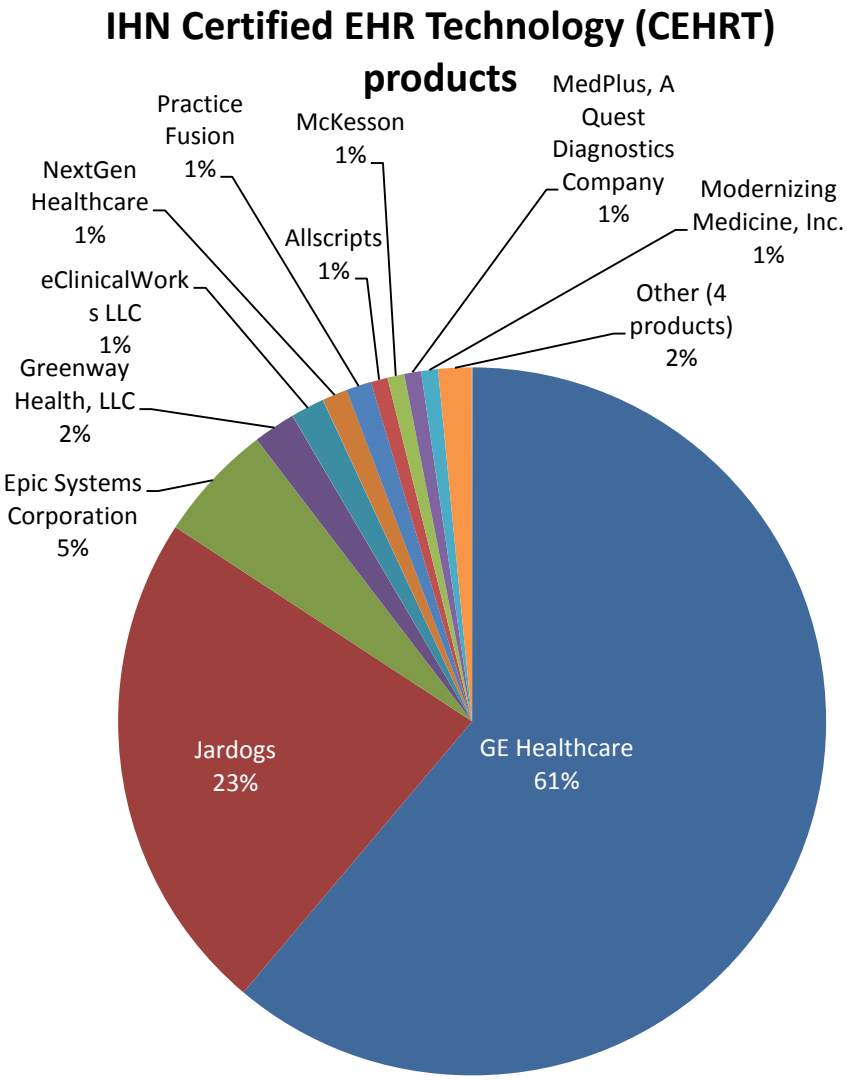
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Samaritan • Albany General • Lebanon • North Lincoln • Pacific Communities • Samaritan Regional	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top Certified EHR Technology Products for IHNCCO

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 260 unique providers affiliated with IHN CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 15 different EHRs in use within the CCO. The top 11 products are represented in the chart, which are in use by 256 unique providers.



Jackson Care Connect CCO HIT/HIE Profile

31,054 members[1]

CCO Description:

- 51 contract clinics and 2 hospital systems
- 2 primary care clinics are licensed FQHCs and the majority of the clinics are small private practices.
- Approximately 40% of JCC members are empaneled to the two FQHCs in Jackson County, La Clinica and Community Health Center. Both clinics are PCPCH Tier 3 clinics, have certified EHRs (OCHIN Epic) and participate in Meaningful Use.
- Jackson Care Connect is one of 4 Southern Oregon CCOs participating in the Jefferson Health Information Exchange (JHIE).
- Jackson Care Connect is also supporting Community Connected (C2) Network – led by the county agency, in partnership with 2 CCOs, education and social services stakeholders, to develop a database and system for coordinating and integrating information related to social services assessment and delivery in Jackson County

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination		Quality Improvement, Population Management, Data and Analytic Tools
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	Medicity	Vistalogic	SAS
Product Name			Business Intelligence software
Comment	Provided by Jefferson HIE	Provided by Community Connected Network for social service delivery	Claims-based analytic reporting

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	Jackson Care Connect is participating in the Jefferson Health Information Exchange (JHIE) which aims to provide the care team with access to patient-centered health information at the time and place of care to improve timeliness, quality and coordination of care. JHIE covers a three county region in Southern Oregon inclusive of Jackson, Josephine, and Klamath Counties, and recently added partnerships with a 5th CCO and providers in the Columbia River Gorge area. **Health Information Exchange:** • JHIE currently offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. These features support health information exchange and referrals among behavioral, physical, and dental health providers and with CCO Care Coordinators. • JHIE is in the process of implementing "phase 2" to include additional functions/services including clinical alerts, 30-day readmission alerts, patient search, and a consolidated clinical inbox to be accessible to any enrolled provider or CCO with a patient/member relationship. Patient matching and record location supports patient/provider attribution.

[1] As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

	EHR integration and connectivity will be supported as well, including single sign on for patient search of HIE, results delivery to the EHR and receipt of CCD/care summary to the EHR. • In addition, **c**linics who have implemented Epic have access to HIE through CareEverywhere. Jackson Care Connect is also supporting Community Connected (C2) Network – a committed group of organizations working together to change the way individuals access and receive social service support in Jackson County; startup funding supported by county and 2 CCOs; other partner organizations from social services, education sectors. Launch expected in 2015. Intersections with JHIE are under discussion. • Goals include: to support sharing of information and coordination of services amongst community partners, to provide tools to help integrate and coordinate the existing social service delivery infrastructure including identifying service providers for common clients, and to provide a mechanism to connect existing systems within social service, health care, and education sectors. • C2 database will include centralized contact registry, resource/referral module, onboarding tool, release of information module, record capabilities, survey/assessment module, auto-populating forms/summary sheets, integrated calendar and discussion forum, aggregate data reporting. **Direct Secure Messaging[2]:** • JHIE offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. • The JHIE Medicity HISP is DirectTrust accredited, and thus interoperable with CareAccord and other Direct secure messaging users across the state. JHIE participates in the flat file directory sponsored by OHA, to share Direct secure messaging addresses across Oregon organizations using accredited HISPs to support cross-organizational exchange. **Hospital Notifications[3]:** • JHIE will include hospital event notifications from its member hospitals (Asante, Providence, Sky Lakes, Mid-Columbia Medical Center) to JHIE members as part of "phase 2" and is contemplating connecting to PreManage to enable its members to send and receive hospital alerts from hospitals beyond the JHIE region across the state. **Care Management and CCO-Provided Information to Provider/Care Teams:** The CCO anticipates using JHIE data to inform care management and support provider information sharing through JHIE.
Quality Improvement, Population Management, Data and	• JCC and CareOregon have developed and implemented claims-based analytic reporting through SAS Business Intelligence software. • Current reporting capability includes aggregate reporting for CCO level data, provider level data, and member level data for demographics, utilization, and gaps in care. • Jackson County Mental Health shared behavioral/mental health data for members with SPMI in 2013; this will continue in 2014. In 2015, JCC plans to integrate mental health

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

Analytics Tools	claims for JCMH services into the JCC / CareOregon data warehouse which feeds into SAS BI. • During the 2014 calendar year, JCC will continue to explore the ability to expand reporting to other clinics using Epic. **Incorporating Clinical Data:** • Defining tools for data analytics and population health management are anticipated for 2015 with services available in 2016 through participation with JHIE. • CareOregon is exploring a partnership with OCHIN to create reporting capability for claims and clinical data.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** JCC has relied on OCHIN for their current CQM reporting strategy. **Longer-term CQM Strategy:** Utilizing JHIE is part of JCC's long-term strategy for CQM reporting. JHIE member CCOs will be able to collect CQMs from providers using JHIE and are exploring using JHIE to submit data to the CQMR
Technical Assistance to Practices for EHRs and MU	JCC is currently assessing CareEverywhere use and identifying any clinics/provider training needs.
Other	**Local Provider Directory:** JHIE includes a provider directory based on user enrollment and clinical results attribution expected to be compliant with anticipated HPD standards. In addition, JCC maintains a provider directory within their administrative systems.
Barriers to Implementation of HIT Tools/ Services	• Large number of private practices utilizing different EHRs and some without EHRs will continue to be a challenge until all providers are enrolled with JHIE. • Needing to educate providers on workflow and process changes needed to maximize effectiveness of current JHIE functionality. • Current lack of understanding among clinics/providers about optimal use of CareEverywhere. • Though metrics data are being collected in non-PCP environments (e.g., developmental screening (ASQ) data being collected within the educational environment), there is currently no EHR or other structured means by which to capture these data, particularly across the school-based health, behavioral health, and dental systems. This can lead to duplication of services (e.g., ASQ being collected numerous times across settings to meet assessment need and/or various agency or funder requirements) as well as underrepresented rates of achievement (e.g., ASQ being conducted on CCO member within school setting, but CCO metrics do not reflect this). • JCC has experienced challenges in getting some of the organizations in their region to share clinical (EHR) data for the purposes of CQM reporting. JCC perceives this to be primarily a political/relational barrier, and not necessarily a technical barrier. • For C2 and sharing individual-level data between non-health providers – many issues around FIRPA (laws regulating sharing of student data within the education system) and HIPAA arise. C2 and JHIE are sharing HIPAA resources. • JHIE and its partners would like to include access to the Prescription Drug Monitoring Program data to support efforts to reduce inappropriate prescribing and abuse of prescription drugs.
Barriers to Behavioral	Uncertainty among JCC staff as to how to best address the HIT and analytics needs of their mental/behavioral health clinics.

Health Information Sharing	• JCC experiences the disparity in EHRs for behavioral health as a challenge to population management, care coordination, and quality and analytics. In an effort to contribute to progress in this area, the CCO invested significant funds into an EHR for the two largest alcohol and drug treatment providers in their community. In addition, the CCO has requested TA for behavioral health EHRs, as not having TA support is a significant barrier. • JCC has requested guidance from the state regarding privacy, as its absence is a barrier to health information exchange and care coordination. They would like specific guidance regarding relevant state policies that could inform their efforts. • JHIE and its partner CCOs would like mental health agencies in their network to be able to contribute data to JHIE's community health record for patient search, but data management concerns resulting from the sensitivity of mental/behavioral health information (and the potential co-mingling of that information with physical health data) present challenges.

CCO Provider Environment:

Hospital Engagement in HIT

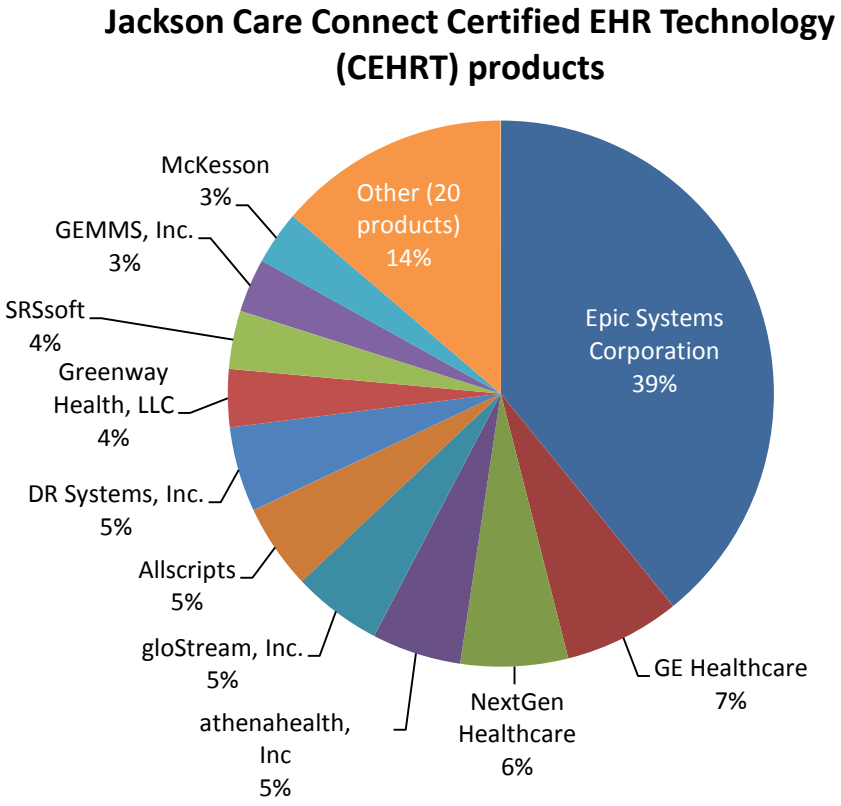
Hospital Name	EHR Vendor	Stage of Meaningful Use*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Asante Three Rivers Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Asante Ashland Community Hospital	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Asante Rogue Regional Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Providence Medford Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top Certified EHR Technology Products for Jackson Care Connect

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 378 unique providers affiliated with Jackson Care Connect CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 31 different EHRs in use within the CCO. The top 11 products, represented in the chart, are in use by 326 unique providers.



PacificSource Central Oregon CCO HIT/HIE Profile

52,137 members[1]

CCO Description:

- Services members in Crook, Deschutes, Jefferson and part of Klamath Counties.
- Majority of care takes place in the population hubs of Bend and Redmond.
- The region has a high rate of electronic health record (EHR) use in clinics and hospitals
- The CCO is supporting and planning to participate in Central Oregon Health Connect.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination			Quality Improvement, Population Management, Data and Analytic Tools	
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name		Collective Medical Technologies	IMA Technologies	Truven Health Analytics	Internally developed tools, SAS, Tableau, Microsoft BI
Comment	Provided through Central OR Health Connect	PreManage hospital notifications for entire CCO population	CaseTrakker Dynamo	Analytic tool for population management, analytics, etc.	Data marketplace, analytic tools for population health and engagement

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** The CCO is supporting and planning to participate in CO Health Connect, which operates a community data repository CO Health Connect. The goal for CO Health Connect is to function as a clinical tool for providers, and ultimately to support the CCO needs for clinical data. CO Health Connect covers the central Oregon region inclusive of Crook, Deschutes, Jefferson and part of Klamath counties. • COHIE's community data repository includes data from the majority of St. Charles medical groups and hospital, as well as lab and results data. • COHIE is in the process of working with its stakeholders to solidify its strategic plan and sustainable business model. • CO Health Connect is supported by partner organizations including: St. Charles Health System, PacificSource Community Solutions, Adaugeo Health Care, Central Oregon IPA, OCHIN, Mosaic medical clinic (an FQHC), and Bend Memorial Clinic. **Direct Secure Messaging[2]:** • CO Health Connect is considering options for Direct secure messaging, including potentially

[1] As of 9/15/2014 www.oregon.gov/oha/healthplan/DataReportsDocs/September2014CoordinatedCareServiceDeliverybyCounty.pdf

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

	working with RelayHealth (their vendor for CO Health Connect, who also operates a HISP). [RelayHealth and CareAccord are both nationally accredited within the same trust bundle (DirectTrust), allowing for the secure exchange of information.] • CareAccord would be available as an option for entities that are not using CO Health Connect. The CCO is interested in assisting long-term care organizations to get on CareAccord. **Hospital Notifications[3]:** CO Health Connect is planning to include hospital event notifications from the St. Charles Health System to all CO Health Connect members. The CCO has implemented the PreManage solution from CMT comprising both ED and inpatient notifications for the entire CCO population, enabling its members to send and receive hospital alerts from hospitals beyond the CO Health Connect region across the state. **Care Management and CCO-Provided Information to Provider/Care Teams:** • Primary care providers get care plan and progress/data, including information from the CCO. The CCO uses Truven for population management (see below), which informs the care management team within the CCO and supports the CCO connecting to the provider team. • In addition, CO Health Connect is working to establish the scope of work for supporting the CCO data needs for case management, operations management, and as a data source for analytics and population management efforts within the CCO's HIT tools (see description below).
Quality Improvement, Population Management, Data and Analytics Tools	<u>CCO-support for provider/network systems</u>: The CCO is working to support its provider groups by providing information on CCO members, referring high risk members for follow up, and supporting provider connections to CO Health Connect. Provider groups vary in their analytics capabilities: • Provider groups with EHRs have analytic capacity of varying degrees and types—some use analytics to meet the standard business operations and finances needs, others use analytics for data-driven decision-making and informing planning of internal operations and programs. • Two key partners, St. Charles Health System and Mosaic Medical have robust technological infrastructure, tools and staff to extract and analyze data, as well as to create and run reports. • Adaugeo Healthcare, which is a PCPCH provider, has been successful in their transitional care management initiative which involves a data analyst sifting through ED discharge notifications and identifies cases needing to be referred to nursing resources. The nurse immediately arranges a Transitional Care Management visit. The goal is that these members are seen at a primary care office within 48 hours. Physicians and patients alike have expressed satisfaction with this program. • Regionally, the Central Oregon Independent Practice Association (COIPA) is an analytical asset for COIPA providers who are located in both Central OR and Gorge regions. Their Health Quality Program Director performs several analytical tasks in that role. <u>CCO internal systems:</u> • Supported by a team of database, IT, and data modeling specialists, PacificSource actively applies data analytics in numerous areas with a goal of improving population health and engagement. The Analytics Department is able to create and run routine and ad hoc data

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	reports on member experiences, utilization and expenditure trends, and cost comparisons, as well as other data analyses. The IT department aims to enable self-service to allow end users to access a data marketplace, and quickly answer questions and gain insights into populations. • Specific tools/capabilities include: o Data Marketplace includes various cubes of data on claims, members, prescriptions, etc. o Truven is used to identify high risk populations and then the PacificSource team outreaches and connects members to the health team. o Tableau supports data visualization o Suite of self-developed tools, SAS, Microsoft BI support metrics, self-service reports and population management, etc. A Member 360 module provides a complete view of members for use in predictive modeling and "micro –targeting" in achieving health outcomes. **Incorporating Clinical Data:** PacificSource is seeking to incorporate clinical data in their internal analytics systems. In addition, the CCO is working with CO Health Connect to establish the scope of work for supporting the CCO data needs for case management, operations management, and as a data source for analytics and population management efforts within the CCO's HIT tools. • This will include role-based access to the community data repository in CO Health Connect, pushing hospital ADT data to the CCO, and providing the data to support the CCO's analytic capabilities. • Using the HIE to supply clinical data provides the CCO a one-stop place for labs, hospital data, and other clinical information, reducing the administrative burden and duplication of effort on the part of the CCO that they would otherwise face, for example, by working to establish data feeds from each lab or entity directly.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** PacificSource is working directly with practices to meet its CQM reporting requirements. They are able to leverage a small number of clinics to meet the population threshold, including their OCHIN clinics and other key practices. **Longer-term CQM Strategy:** The CCO is working with CO Health Connect to determine whether CO Health Connect is a viable and/or appropriate route for the management of clinical quality metrics.
Technical Assistance to Practices for EHRs and MU	Several of the key practices are supported already with technical assistance, such as OCHIN-supported practices, and the larger groups /health system practices. The CCO is interested in exploring state sponsored TA for practices.
Other	**Local Provider Directory:** PacificSource maintains a strong provider directory within their administrative systems; CO Health Connect includes a provider directory within its Relay Health platform.
Barriers to Implementation of HIT Tools/ Services	Data challenges: • Pressure to meet diverging regulatory and reporting requirements that compete for priority, time, resources, and employee bandwidth. • Clinics/providers need implementation training and technical assistance to help them get the data, coordinate the data, find the data, as well as learn to use new systems. • Looking for clinical data integration solution and a solution to manage clinical data. PacificSource operates across commercial and Medicare lines of business, in multiple states with multiple HIEs, and would like to find one consistent way to bring clinical data in.

	CQMs: • Not sure a goal of CMQ reporting for 100% of CCO population is feasible in current EHR/HIE environment – very cumbersome to retool each EHR interface when new CQMs are released. Technology needs to become flexible to adapt to measurement changes. • CQM reporting opens up workflow and quality considerations. Data quality is limited by workflow. Data relying on lab values is easiest to get and use. • Will be challenging to get CQM reporting in place beyond leveraging OCHIN and a small number of key practices who overall cover 60-70% of the CCO population. • Experiencing difficulty in engaging EHR vendors about getting certain information into the CCDA, even if the vendor's product is MU2 certified, causing concern regarding CQM reporting and effectiveness of relying on QRDA. EHR vendors "don't think you need it". HIE: • CO Health Connect and its partners identified several barriers or challenges relating to the following areas: interoperability and Meaningful Use, establishing an HIE business model, agreements/consent management, and Direct secure messaging. Direct secure messaging: • Many practices lack knowledge and understand regarding Direct secure messaging, the smaller of whom rely on their vendor to inform them. This is an opportunity for the state to support education and information about Direct secure messaging to providers.
Barriers to Behavioral Health Information Sharing	Barriers/challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include: __X__ Confusion over compliance with state or federal laws ____ State or federal laws prohibit the type of sharing I want/need to do __X__ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). __X__ Concerns over privacy and confidentiality protection for the patient __X__ Concerns over liability if information you share is later improperly shared ____ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

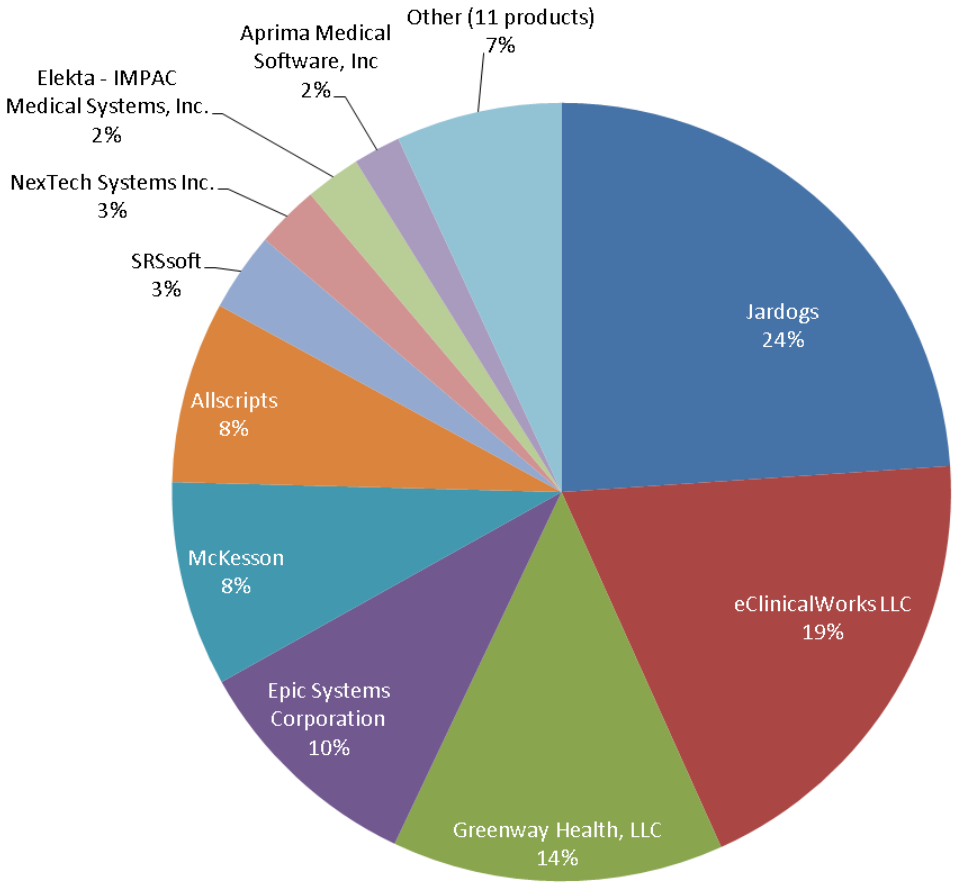
Hospital Name	Direct Secure Messaging Flat File Participation (as of 12/2014)	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Pioneer Memorial Hospital – Prineville		McKesson	Stage 1	The St. Charles feeds are live, as is Prineville – both are sending both ED and inpatient data. All are receiving notifications by print with the exception of Redmond which is receiving fax notifications.
St. Charles Medical Center – Bend	Currently participating	McKesson	Stage 1	
St. Charles Medical Center – Madras	Currently participating	McKesson	Stage 1	
St. Charles Medical Center – Redmond	Currently participating	McKesson	Stage 1	

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top 10 Certified EHR Technology Products for PacificSource Central Oregon CCO

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 305 unique providers affiliated with PacificSource Central Oregon CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 21 different EHRs in use within the CCO. The top 10 products are in use by 284 unique providers.



PacificSource Columbia Gorge CCO HIT/HIE Profile

12,693 members[1]

CCO Description:

- Services members in Wasco and Hood River Counties.
- The CCO is located in a small community with a history of partnerships across organizations.
- The majority of members receive their primary care in 4 organizations: Mid-Columbia, One Community Health (FQHC), Columbia Gorge Family Medicine, and Providence,
- Due to the varied terrain in this region, Broadband and cell service connectivity are barriers outside of Hood River/The Dalles. Providers largely provide services at practices in The Dalles and Hood River, however a large portion of the population lives outside the cities.
- Pacific Source Columbia Gorge CCO is joining the 4 Southern Oregon CCOs participating in the Jefferson Health Information Exchange (JHIE).

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination		Quality Improvement, Population Management, Data and Analytic Tools	
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	Medicity	IMA Technologies	Truven Health Analytics	Internally developed tools, SAS, Tableau, Microsoft BI
Comment	Provided by Jefferson HIE	CaseTrakker Dynamo	Analytic tool for population management, analytics, etc.	Data marketplace, analytic tools for population health and engagement

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** The CCO is joining Jefferson Health Information Exchange (JHIE) which aims to provide the care team with access to patient-centered health information at the time and place of care to improve timeliness, quality and coordination of care. JHIE covers a three county region in Southern Oregon inclusive of Jackson, Josephine, and Klamath Counties, and recently added the Columbia River Gorge area. **Health Information Exchange:** • JHIE currently offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. These features support health information exchange and referrals among behavioral, physical, and dental health providers and with CCO Care Coordinators. • JHIE is in the process of implementing "phase 2" to include additional functions/services including clinical alerts, 30-day readmission alerts, patient search, and a consolidated clinical inbox to be accessible to any enrolled provider or CCO with a patient/member

[1]As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

	relationship. Patient matching and record location supports patient/provider attribution. EHR integration and connectivity will be supported as well, including single sign on for patient search of HIE, results delivery to the EHR and receipt of CCD/care summary to the EHR. The CCO is very interested in integrating and connecting social services and community health workers in a meaningful way, including DHS/local agencies, non-emergency medical transportation, long term care and behavioral health/DD residential care settings, schools and school based health centers, etc. Interested in understanding what systems may be in use by these organizations that could be leveraged by the CCO. The CCO has concerns around behavioral health information sharing (see barriers section below). **Direct Secure Messaging[2]:** • JHIE offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. • The JHIE Medicity HISP is DirectTrust accredited, and thus interoperable with CareAccord and other Direct secure messaging users across the state. JHIE participates in the flat file directory sponsored by OHA, to share Direct secure messaging addresses across Oregon organizations using accredited HISPs to support cross-organizational exchange. • PS Columbia Gorge CCO is considering how to support and facilitate Direct secure messaging more broadly and expressed an interest in ensuring that non-medical members of care teams have the ability to securely exchange information and communicate using Direct secure messaging. CareAccord would be available as an option for entities that are not using JHIE. **Hospital Notifications[3]:** • JHIE will include hospital event notifications from its member hospitals (Asante, Providence, Sky Lakes, Mid-Columbia Medical Center) to JHIE members as part of "phase 2" and is contemplating connecting to PreManage to enable its members to send and receive hospital alerts from hospitals beyond the JHIE region across the state. • PacificSource Gorge has a strong interest in EDIE and PreManage, as it commonly has patients that seek care at hospitals outside of the CCO network, including OHSU and hospitals in Washington state. **Care Management and CCO-Provided Information to Provider/Care Teams:** • The CCO's established community practices have care managers, so the primary care provider gets care plan and progress/data, including information from the CCO. The CCO uses Truven for population management (see below), which informs the care management team within the CCO and connecting to the provider team.
Quality Improvement, Population	CCO-support for provider/network systems: The CCO is working to support its provider groups by providing information on CCO members, referring high risk members for follow up, and supporting provider connections to JHIE. Provider groups vary in their analytics capabilities:

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

Management, Data and Analytics Tools	• The CCO's board has been having discussions around providing centralized data analytics and reporting solution/support as opposed to having each organization/practice doing these tasks themselves, and is considering various options. • Provider groups with EHRs have analytic capacity of varying degrees and types, such as analytics to meet the standard needs for business operations and finances, for data-driven decision-making and/or for informing internal operations and program planning. • Regionally, the Central Oregon Independent Practice Association (COIPA) is an analytical asset for COIPA providers who are located in both Central OR and Gorge regions. Their Health Quality Program Director performs several analytical tasks in that role. • Both FQHCs also have analytic capacity through employees who are able to extract, summarize, and analyze EHR data on a routine and ad hoc basis; and, because both FQHCs are on OCHIN's Epic platform, they benefit from having access to the reporting and analytic tools that OCHIN makes available to its users. <u>CCO internal systems:</u> • Supported by a team of database, IT, and data modeling specialists, PacificSource actively applies data analytics in numerous areas with a goal of improving population health and engagement. The Analytics Department is able to create and run routine and ad hoc data reports on member experiences, utilization and expenditure trends, and cost comparisons, as well as other data analyses. The IT department aims to enable self-service to allow end users to access a data marketplace, and quickly answer questions and gain insights into populations. • Specific tools/capabilities include: o Data Marketplace includes various cubes of data on claims, members, prescriptions, etc. o Truven is used to identify high risk populations and then the PacificSource team outreaches and connects members to health team. o Tableau supports data visualization o Suite of self-developed tools, SAS, Microsoft BI support metrics, self-service reports and population management, etc. A Member 360 module provides a complete view of members for use in predictive modeling and "micro –targeting" in achieving health outcomes. **Incorporating Clinical Data:** PacificSource is seeking to incorporate clinical data in their internal analytics systems. In addition, defining tools for data analytics and population health management are anticipated for 2015 with services available in 2016 through participation with JHIE. The CCO is interested in moving more toward clinical data and away from claims/administrative data for population management, metrics, etc., especially given the lag time with claims data which can make those data not actionable. "We want to get [data] further upstream to be able to impact care."
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** The CCO expects to be able to meet the CQM reporting requirements using either the JHIE platform and/or OCHIN's reporting solution with the One Community Health FQHCs (Hood River and The Dalles). Most key practices without current CQM reporting capabilities state that system upgrades have been scheduled and/or teams have been dedicated to develop clinical data reporting by the end of 2014. **Longer-term CQM Strategy:** Utilizing JHIE is part of the CCO's long-term strategy for CQM reporting. JHIE member CCOs will be

	able to collect CQMs from providers using JHIE and are exploring using JHIE to submit data to the CQMR.
Technical Assistance to Practices for EHRs and MU	CCO plans to assist with TA for HIE connectivity and Direct Secure messaging with funds from their transformation grant.
Telehealth	Interested in tracking telehealth opportunities. At least one hospital/health system in their area uses telemedicine and home health visits – where connectivity can be an issue. Like the idea of kiosks, which might work due to the concerns around Broadband connectivity in some parts of the Gorge.
Other	**EHR investment** – the CCO is funding an EHR for one of the County health departments **Local Provider Directory:** PacificSource maintains a strong provider directory within their administrative systems; JHIE includes a provider directory based on user enrollment and clinical results attribution expected to be compliant with anticipated HPD standards.
Barriers to Implementation of HIT Tools/ Services	• Clinics and providers across the network have a need for technical assistance to help them get, find, share, and use the information in the new system. • Looking for clinical data integration vendor and a solution to manage clinical data. PacificSource operates across commercial and Medicare lines of business, in multiple states with multiple HIEs, and would like to find one consistent way to bring clinical data in. • Change fatigue as a result of constant change in recent years and competing demands of multiple initiatives. • Provider organizations are at the mercy of their vendor for expanding interfaces, interoperability, and clinical quality reporting. Many have little or no influence in the direction the product goes. • Gorge CCO's provider network has some clinics with broadband issues outside of their metro areas (Hood River and The Dalles). • JHIE and its partners would like to include access to the Prescription Drug Monitoring Program data to support efforts to reduce inappropriate prescribing and abuse of prescription drugs.
Barriers to Behavioral Health Information Sharing	The CCO emphasized that behavioral health information should be shared as appropriate for care coordination. Concerns include providers focusing on metrics (including mental health assessment metric), misinformation about HIPAA/42 CFR Part 2. JHIE and its partner CCOs would like mental health agencies in their network to be able to contribute data to JHIE's community health record for patient search, but data management concerns resulting from the sensitivity of mental/behavioral health information (and the potential co-mingling of that information with physical health data) present challenges. Barriers/challenges experienced in sharing behavioral health data include: __X__ Confusion over compliance with state or federal laws ____ State or federal laws prohibit the type of sharing I want/need to do __X__ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). ____ Concerns over privacy and confidentiality protection for the patient __X__ Concerns over liability if information you share is later improperly shared __X__ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

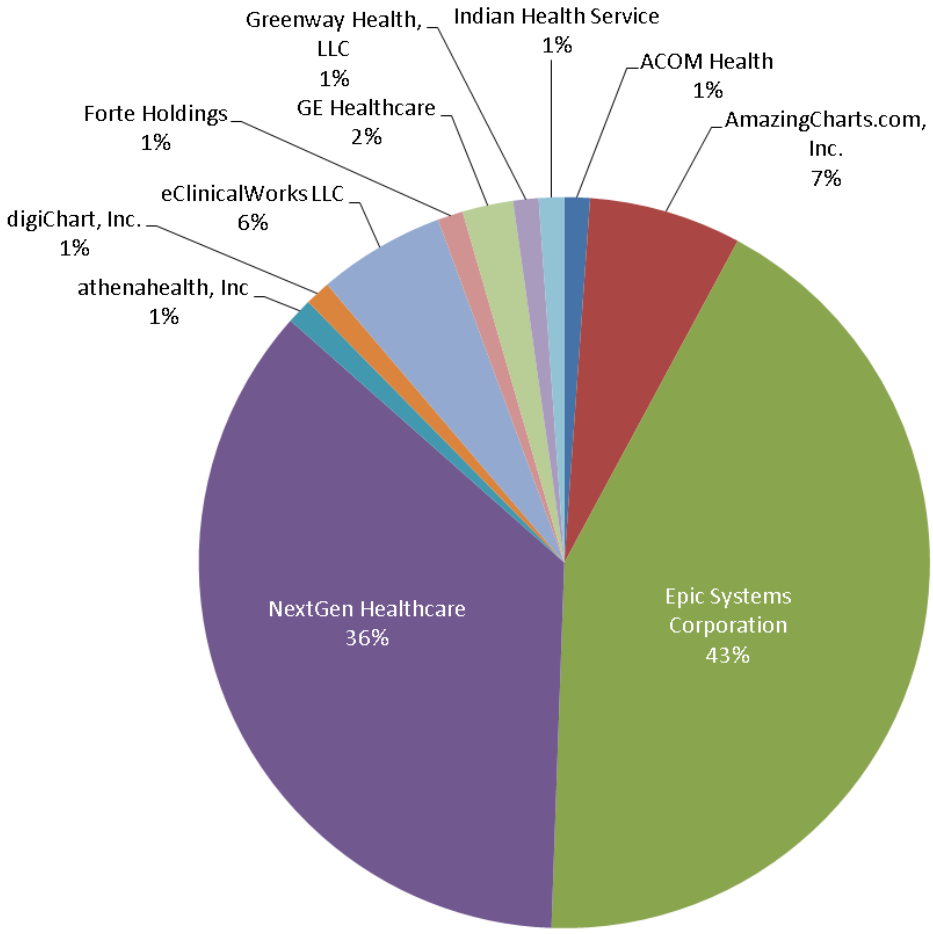
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Mid-Columbia Medical Center	Meditech, Iatric	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.
Providence Hood River Memorial Hospital	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Hospitals in Washington State (of particular interest to PacificSource Columbia Gorge CCO)	Varies	Varies	Nearly all hospitals in Washington are live for ED data and are receiving notifications**

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.
**As of January 2015, CMT has agreements with all of the Washington Hospitals. However, Skyline and Tri-State are not yet implemented. Also, Garfield and Cascade Medical Center Hospital are manual entry and are not set up for Notifications.

Certified EHR Technology Products for PacificSource Columbia Gorge

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 89 unique providers affiliated with PacificSource Columbia Gorge CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 11 different EHRs in use within the CCO.



PrimaryHealth of Josephine Co. CCO HIT/HIE Profile

11,408 members[1]

CCO Description:

- Services members in Josephine County and is made up of a multi-specialty group, two FQHCs and 6 one to two provider offices. Primary care provider locations include Grants Pass, Cave Junction and Medford.
- 90% of PrimaryHealth members are served in a Tier III PCPCH.
- PrimaryHealth is one of 4 Southern Oregon CCOs participating in the Jefferson Health Information Exchange (JHIE).

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination		Quality Improvement, Population Management, Data and Analytic Tools
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	Medicity	TBD	Inteligenz
Product Name			CCO Metrics Manager
Version			2.1
Comment	Provided by Jefferson HIE	Currently exploring a more robust case management solution	CCO metrics-oriented analytics

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	PrimaryHealth is participating in the Jefferson Health Information Exchange (JHIE) which aims to provide the care team with access to patient-centered health information at the time and place of care to improve timeliness, quality and coordination of care. JHIE covers a three county region in Southern Oregon inclusive of Jackson, Josephine, and Klamath Counties, and recently added partnerships with a 5th CCO and providers in the Columbia River Gorge area. **Health Information Exchange:** • JHIE currently offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. These features support health information exchange and referrals among behavioral, physical, and dental health providers and with CCO Care Coordinators. • JHIE is in the process of implementing "phase 2" to include additional functions/services including clinical alerts, 30-day readmission alerts, patient search, and a consolidated clinical inbox to be accessible to any enrolled provider or CCO with a patient/member relationship. Patient matching and record location supports patient/provider attribution. EHR integration and connectivity will be supported as well, including single sign on for patient search of HIE, results delivery to the EHR and receipt of CCD/care summary to the EHR. • The Grants Pass Clinic is currently using JHIE and Siskiyou Community Health Center is planning

[1] As of 10/01/2014
http://www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

	to enroll. • Case managers will utilize JHIE as an information source and as a tool for information exchange. **Direct Secure Messaging[2]:** • JHIE offers Direct secure messaging and a provider-to-provider closed-loop referral system through its technology vendor Medicity. • The JHIE Medicity HISP is DirectTrust accredited, and thus interoperable with CareAccord and other Direct secure messaging users across the state. JHIE participates in the flat file directory sponsored by OHA, to share Direct secure messaging addresses across Oregon organizations using accredited HISPs to support cross-organizational exchange. **Hospital Notifications[3]:** • JHIE will include hospital event notifications from its member hospitals (Asante, Providence, Sky Lakes, Mid-Columbia Medical Center) to JHIE members as part of "phase 2" and is contemplating connecting to PreManage to enable its members to send and receive hospital alerts from hospitals beyond the JHIE region across the state. • CCO receives both a 30-day Admit/Discharge/Transfer (ADT) list and a separate last 24-hour file from one of their hospitals. The 24-hour file is of greater value and is more often and broadly utilized than the 30-day data. **Care Management and CCO-Provided Information to Provider/Care Teams:** • The CCO is currently investigating a new case management tool/application. • PrimaryHealth has a secure email system that it uses to support some care coordination functions. o Using secure email to share information about high-risk patients. Though Direct secure messaging provides added value, getting the information-receiving entities enrolled with JHIE or CareAccord would require additional time and effort. o Receiving information regarding long-term care patients via secure email. Integrating this information with other systems has not yet been defined and is still in process.
Quality Improvement, Population Management, Data and Analytics Tools	As discussed in greater detail below, there is an evolving use of data by PrimaryHealth and their providers. Data Access/Availability and Analytic Tools • From their EZCap claims system, PrimaryHealth obtains a mapped data feed in addition to which encounter data files are obtained from MedImpact (pharmacy benefit manager) and PHTech (mental health claims manager). • PrimaryHealth has contracted with Inteligenz for their CCO Metrics Manager tool. The CCO Metrics Manager provides a data warehouse with web-based presentation layer, which reports on the status of target metrics, including gap analysis and gap closure workflow. The flexibility of the system allows users to further define criteria to generate custom reports to facilitate population health management. For example, CCO Metrics Manager compiles a 'high utilizer list' which is used by PrimaryHealth to identify potential

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	outreach/case management members. • PrimaryHealth uses the CCO Metrics Manager for incentive metric progress monitoring, improvement planning, and bonus distribution. Their process has involved sending a list to each clinic with CCO metrics evaluation results informing them whether they have met relevant metrics. The distribution of incentive bonuses is tied to these results/reports. Clinics were rewarded for their performance on metrics. Incentive payment checks were hand-delivered with metrics evaluation results, including (but not limited to): o the quality metrics measures overall and per provider, with a comparison to other providers o advice on the coding for certain measures o gap list of patients needing screening o top 10 medical utilizers within the clinic's patient registry o diabetes registry • The CCO's primary key practice, Grants Pass Clinic, has requested to receive monthly dashboard reports on the incentive metrics in an electronic format. There seems to be an interest among the larger clinics to improve their metrics scores. o In general, medical clinics and providers are becoming accustomed to accessing, examining, and utilizing their data for the purpose of population management, decreasing their reliance on the CCO to fulfill this role. o Some examples of insights that have resulted from providers' newly developed relationship with data include: ▪ Congestive heart failure – providers were surprised at the unexpectedly high mortality rate when looking at the data ▪ Screenings in general – providers believed they were conducting adequate screenings and were surprised to learn of existing gaps o CCO is working with Grants Pass Clinic to increase the credibility of the data and ensure the metrics they track are credible and something that the provider can affect. o Providers becoming increasingly involved with and invested in their data and outcomes has fostered some healthy competition among them. • PrimaryHealth used a learning collaborative for the medical homes for training on data, This evolved into a leadership group that gathers to discuss data-related topics, including how to effectively and meaningfully distribute data to providers. **Incorporating Clinical Data:** Defining tools for data analytics and population health management are anticipated for 2015 with services available in 2016 through participation with JHIE.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy** • PrimaryHealth utilizes CCO Metrics Manager for a number of purposes related to CQM reporting, including educating practices about specific incentive metrics, and determining and distributing incentive bonuses. See more complete description above. • Most CCO members are seen at one of two clinics, both of whom were included in the Year 1 sample; the Year 2 sample will remain the same. **Longer-term CQM Strategy:** Utilizing JHIE is part of the CCO's long-term strategy for CQM reporting. JHIE member CCOs will be able to collect CQMs from providers using JHIE and are exploring using JHIE to submit data to the CQMR.
Technical Assistance to	Transformation funds have supported PrimaryHealth in providing technical assistance to Grants Pass Clinic, which serves 60% of the CCO's members. TA has included workflow modification

Practices for EHRs and Meaningful Use	guidance, as in developing a process for capturing the depression screening data that were being collected but not entered into the medical record. This involved a training program to assist nurses with keeping track of every depression screening. At the end of the day, the medical home assistant manually confirmed that the screenings were properly recorded. This approach leverages an assistant to take the burden off of the provider. Within the context of current clinic staffing levels, though there may be a need for TA, finding time to take advantage of it is challenging.
Patient Engagement through HIT	Grants Pass Clinic offers a secure patient portal on their website. This portal facilitates access to some medical records, scheduling and secure correspondence with primary care providers.
Telehealth	PrimaryHealth is currently working with OHSU and Asante Health Systems to facilitate Genetic Counseling via Telehealth in Josephine County.
Other	**Local Provider Directory:** The CCO maintains a provider directory within their administrative systems; JHIE includes a provider directory based on user enrollment and clinical results attribution expected to be compliant with anticipated HPD standards. **Support for Behavioral Health EHR** PrimaryHealth's chemical dependency treatment center, Choices, is collaborating with OnTrack addictions recovery center and community corrections on the implementation of an EHR/billing software called Echo. They are collaborating on forms development and various other aspects to simplify implementation as well as provide a community standard.
Barriers to Implementation of HIT Tools/ Services	• Prioritizing staff, coordinating system upgrades, and ensuring that data collection is consistent across providers is key. • Providers are currently involved in numerous healthcare transformation activities and therefore feeling overwhelmed and reluctant to engage in additional initiatives. • Bringing many people and systems together across a common platform to report clean, meaningful data takes time, work, and a lot of testing. • JHIE and its partners would like to include access to the Prescription Drug Monitoring Program data to support efforts to reduce inappropriate prescribing and abuse of prescription drugs.
Barriers to Behavioral Health Information Sharing	JHIE and its partner CCOs would like mental health agencies in their network to be able to contribute data to JHIE's community health record for patient search, but data management concerns resulting from the sensitivity of mental/behavioral health information (and the potential co-mingling of that information with physical health data) present challenges. Barriers/challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include: ____ Confusion over compliance with state or federal laws ____ State or federal laws prohibit the type of sharing I want/need to do ____ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). _X__ Concerns over privacy and confidentiality protection for the patient ____ Concerns over liability if information you share is later improperly shared _X__ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

Hospital Name	EHR Vendor	Stage of Meaningful Use*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Asante Three Rivers Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Asante Ashland Community Hospital	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Asante Rogue Regional Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Lower Umpqua Hospital	Healthland	Stage 1	Feed is live for ED and inpatient data – receiving notifications by printer.
Providence Medford Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Sky Lakes Medical Center	Meditech	Stage 1	Feed is live for ED and inpatient data—receiving notifications to printer.

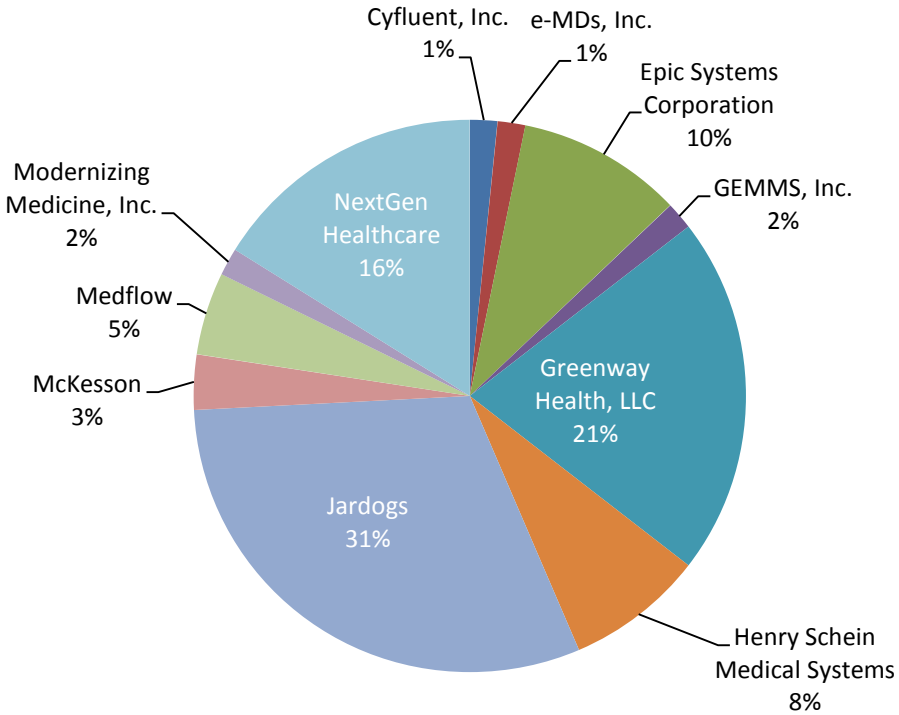
*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Certified EHR Technology Products for PrimaryHealth of Josephine County

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 62 unique providers affiliated with PrimaryHealth CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 11 different EHRs in use within the CCO.

PrimaryHealth CCO Certified EHR Technology (CEHRT) products



Trillium Community Health Plan CCO HIT/HIE Profile

92,020 members[1]

CCO Description:

- About 80% of members are assigned to one of four main medical groups: Community Health Center of Lane County, Lane Independent Primary Physicians, Oregon Medical Group, and PeaceHealth Medical Group
- 83% of members are assigned to Tier 3 PCPCH clinics.
- In addition to its Medicaid plan, Trillium operates a Medicare advantage plan, and became a PEBB plan in 2015.
- Trillium took major action in 2014 to address capacity for the expansion population, including supporting the creation of a new clinic, supporting expansions at 4 clinics, technical assistance for practice efficiencies, and other efforts.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination			Quality Improvement, Population Management, Data and Analytic Tools	
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	The Advisory Board	Collective Medical Technologies	(Trillium developed in-house)	Optum	SAS, IBM
Product Name	Crimson Care Management (CCM)	PreManage	Care Timeline	Impact Intelligence, Impact Pro	SAS, SPSS
Comment	Care management tool	In conversations with CMT about ED/inpatient notifications	Graphical representation of a member's medical history, for care team	Cost, utilization, and quality analysis and risk stratification based on claims	Supports in-house analytics

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** See Care Coordination section below. **Direct Secure Messaging[2]:** Not currently interested in leveraging Direct secure messaging given other efforts to share information with providers. **Hospital Notifications[3]:**

[1] As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

Trillium is currently receiving ED utilization and ADT notifications from the local hospitals, however these data are currently being hand-entered into Crimson (see "care management" section below). The CCO is in conversations with CMT about PreManage as a way to automate information collection into Crimson.

Care Management and CCO-Provided Information to Provider/Care Teams:
Trillium is completing its launch of the Crimson Care Management tool to support several care management projects.

- The tool:
  - includes actionable clinical information to support care management
  - provides providers and the CCO care managers a full picture of their patients or members, defined sub-populations, and individual patients through integrated data.
  - includes psychosocial risk factors when calculating patient risk and prioritizing tasks, giving care managers the information needed to act effectively.
  - targets various factors, depending on the member's specific situation.
- If there is a certain risk level associated with a member when they come in, they are further assessed and if warranted, are sent to Trillium's complex case management team and entered into the program within Crimson.
- When running a given "program" in Crimson, a particular population is identified for the purpose of setting up a protocol in the Crimson system to trigger alerts in order for that identified population to receive a call. "Basically, Crimson is programmed to perform interventions."
- Working with Crimson to customize the tools so they will set up programs/projects within the Crimson system and accurately identify members of the project.
- Projects/care management programs include:
  - The "Trillium Integration Incubator Project," (TIIP) in which the Crimson platform will be used as a case management tool in four PCP clinics that have a behavioral health physician(s) embedded in the clinic (integration), and four behavioral health clinics with an embedded PCP(s) (reverse-integration).
    - Trillium continues to examine and suggest improvements to clinic workflows. They have attempted to identify effective handoff protocols.
    - The CCO is also making progress with assessing the TIIP associated results, trends and outcomes.
  - Crimson has been rolled out to two county perinatal programs that are actively using and having a good experience with the program. The CCO is planning to use the data to examine and monitor: members with care plans (monitoring progress towards goals), prenatal care coordination, demographic information, as well as other information not available through claims.
  - Trillium has launched an internal perinatal program within Crimson which includes programs for (a) conditions related to pregnancy, (b) pregnancy involving chronic conditions, (c) postpartum, (d) tobacco cessation, and (e) Interfacing with the county programs.

Care Timeline is a tool developed by Trillium in house that presents providers with a graphical representation of a member's entire medical history.

- Trillium intends to roll this tool out first to ED providers and/or as a package with their Crimson Care Management tool (working with Crimson to develop use cases for integrating Care Timeline) for PCPs.
- The web-based application depicts every encounter the member as a dot on a graphical timeline. Users can select dots to have access to all the information for each claim including

	diagnoses, labs, etc.
	
	Member lists – Trillium also provides 'hot spotter lists' (which will eventually be part of Crimson solution), generated by Impact Intelligence (see description below), to each PCP and each BH practitioner.
	• Includes members who have any of the ACA conditions or are 10% riskiest
	  o Includes risk score, amount paid, ED visits, In-patient visits.
	  o Care management program will work with these members.
	• The list is viewed as critical information by some providers, who use the information to follow up with patients.

Quality Improvement, Population Management, Data and Analytics Tools	In addition to Crimson Care Management (described above), the CCO utilizes Optum's Impact Intelligence and Impact Pro to analyze cost, utilization and quality of both members and practitioners using claims. • Impact Intelligence and Impact Pro assign risk scores, quality indexes, episodes and confinements, allowing the CCO to assess the burden of disease, identify populations to target for complex case management and disease management. • Every single member gets risk assessed when loaded into the system. Risk scores are used for prioritizing care coordination. • Trillium uses Impact Intelligence to generate patient lists for providers (see description above), and Impact Pro to identify potential candidates for special case management programs. **Incorporating Clinical Data:** In 2014, Trillium also piloted bringing clinical (EHR) data into the Crimson tool: Community Health Center (CHC): EHR can pull data at patient level, excluding information as needed. Trillium conducted validation with the CHC last year before submitting data including comparing EHR reported numbers against what Trillium showed for basic claims data. CHC conducted a demo of their EHR functionality, identifying potential issues.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** Trillium has utilized EHR data extracted by and provided to Trillium by CHC. **Longer-term CQM Strategy:** Trillium expects to extract individual-level clinical data (including lab values, blood pressure, etc.) out of EHRs and integrate within Crimson, which would be available for pushing out to the CQMR.
Technical Assistance to Practices for EHRs and Meaningful Use	Trillium has been actively providing technical assistance to their practices in several ways. • The CCO has conducted training about meaningful use for their practitioners. • Trillium hired a community integrator to work with provider offices as well as provide a connection between the provider offices and Trillium. • Trillium encourages providers to use the data in their EHRs, rather than rely on the claims data the CCO has available. Trillium is a significant source of support for providers, offering IT and analytic resources to help them interface with their EHR vendor or work with their IT systems to set up reporting tools needed to pull relevant information out of their own system. • Trillium hired a Performance Metrics Coordinator whose job it is to make PCPs experts on the CCO metrics and to offer assistance to help meet them. This coordinator will assist with configuring EHRs, helping with workflow, etc. • Trillium implemented a Clinic Performance Assistance program, embedding Trillium employees at clinics to assist with data extraction from EHRs for the purposes in closing gaps in care. Currently there are eight Clinic Performance Assistants at 11 clinics. • Trillium convenes an HIT Group of providers, sharing information and providing support

Telehealth	Trillium allocated transformation funds for telehealth/telemedicine. The CCO is supporting a pilot telehealth program involving community health workers being given tablets/laptops for performing needs and health risk assessments. Based on the collected data, PCP can make a referral request for care coordination services. The care coordination team then assesses each case and determines the appropriate plan of action. Trillium is also in the research phase of a pilot project they funded which provides tablets/laptops to patients upon hospital discharge. This is to help ensure that when patients are discharged, they have the means by which to contact a care support person electronically for questions or help on medications or post discharge issues. The expectation is that this will help reduce hospital re-admittance. This project involves a partnership between Trillium, the hospitals and the home health agency with telemonitoring capability. Trillium has allocated up to $50,000 for Behavioral Health telemedicine implementation to support primary care medical home implementation and practice. We are particularly interested in behavioral health services integrated with primary care practices that are not able to imbed a clinical behavioral health provider as a part of team based care; in providing access to integrated behavioral health services provided by a clinician to members living in rural communities; in developing efficient consulting relationships with psychiatric prescribers and primary care providers; and in developing efficient use of psychiatric prescribers in outpatient behavioral health clinics.
Other	**Local Provider Directory:** Trillium has invested resources into developing and maintaining a provider directory within their administrative systems and their HIT tools including Crimson.
Barriers to Implementation of HIT Tools/ Services	• Disparate EHRs of which many are in the middle of reinstalling, reconfiguring, and/or changing data hosts. • Trillium has found that EHR workflows needed to properly collect CQM data are not consistent across disparate PCP clinics, and in some cases not implemented correctly at all. This is particularly a problem with capturing data for the depression screening measure. With regards to clinics that are part of a large health system, getting the workflows altered presents a greater challenge as the EHR workflows are set at the corporate level. Additionally, some providers do not follow all prescribed corporate workflows exactly. • The CCO expressed challenges related to dealing with weekly data dumps that Crimson sends to the CCO for various uses, including data manipulation through SAS. They are finding it difficult to perform verification of such a large amount of data each week. • Trillium has experienced difficulty in getting practices in their provider network to participate in surveys regarding Meaningful Use, CQMs, etc. • Trillium is experiencing some challenges with obtaining clean and complete data from Crimson. More specifically, they are having difficulties reading the data files and validating that the expected data is being accurately brought into its assigned location. • Challenging to identify who needs complex case management simply using logic and examining existing data. Though reviewing diagnoses to assist with this process is helpful, it is often insufficient. • Though there are no concerns regarding Broadband connectivity, the CCO community health works do occasionally experience wireless network coverage issues in rural areas. They have been using iPads to conduct surveys and have not been able to access online survey tool when needed.

CCO Provider Environment

Hospital Engagement in HIT

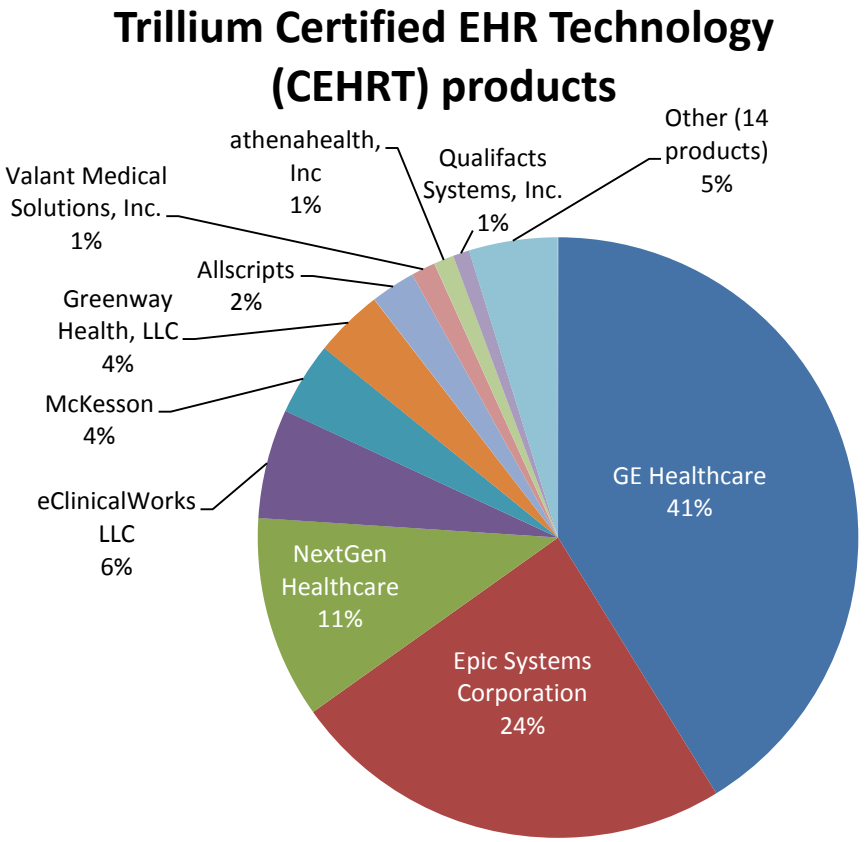
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Cottage Grove Community Hospital	Cloverleaf, Healthwise, MU Quality Manager, PeacehealthEHR	Stage 1	Feed is live for ED data—receiving notifications to printer.
Peace Harbor Hospital	Cloverleaf, Healthwise, MU Quality Manager, PeacehealthEHR	Stage 1	Feed is live for ED data—receiving notifications to printer.
Sacred Heart • River Bend • University District	Cloverleaf, Healthwise, MU Quality Manager, PeacehealthEHR	Stage 1	Feed is live for ED data—receiving notifications to printer.
McKenzie-Willamette Medical Center	Medhost	Stage 1	Contract with vendor signed—IT interface work in progress.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top 10 Certified EHR Technology Products for Trillium

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 459 unique providers affiliated with Trillium CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 24 different EHRs in use within the CCO. The top 10 products are represented in the chart, which are in use by 437 unique providers.



Umpqua Health Alliance CCO HIT/HIE Profile

26,432 members[1]

CCO Description:

- Geographically more than an hour from any larger city, resulting in a variety of primary care practices: sole practitioners, group practices, rural clinics, and FQHCs. There is one community hospital in the area.
- 65% of members are served in rural clinic and FQHC clinics settings; the rest are seen by small 1 - 2 doctor practices.
- Majority of members are assigned to practices that are either certified PCPCHs or in the process of becoming certified.
- 92% of providers are using a certified EHR.
- Umpqua Health Alliance CCO formed out of the Douglas County IPA (DCIPA) Medicaid managed care organization. In 2013, DCIPA partnered with the hospital system to form a new parent company, Architrave, which has several components, including owning several practices, providing support for the CCO, owning an IT subsidiary which owns/operates Umpqua One Chart (community-wide EHR), and contracting with Inteligenz for analytic tools.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination	Quality Improvement, Population Management, Data and Analytic Tools	
Status	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	GE Centricity	Inteligenz	Inteligenz
Product Name	Umpqua One Chart	Architrave 2.1 (aka Inteligenz 2.1)	CCO Metrics Manager
Version	2014 certified		
Comment	Community-wide Electronic Health Record	Analytics and data mining	Population health management

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** • Umpqua's community-wide GE Centricity EHR tool, Umpqua One Chart, operates as a community health record for the Douglas county area. The EHR is utilized by the vast majority of providers in their community, and includes data on more than 85% of the CCO's members. The EHR is available to both physical and mental/behavioral health providers. • Established connections to share information from four local labs (Quest, OML/Peace Health, Labcorp, and Mercy) and radiology providers at Mercy Medical Center, and have bidirectional exchange set up with Oregon's immunization registry, ALERT. • Umpqua has had capability to export and import a care summary in CCD format since 2010. **Direct Secure Messaging[2]:**

[1] As of 10/01/2014
http://www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

	Direct secure messaging is available via Umpqua's HISP, Surescripts. However, the CCO reports that there is infrequent occasion to use it, given the high percentage of providers using One Chart and the fact that the hospital's EHR interfaces with Umpqua One Chart. Rather than use Direct, they 'flag' each other, which is also used for communication between providers and the hospital. **Hospital Notifications[3]:** In collaboration with local hospital Mercy Medical Center, Umpqua One Chart developed bridging of pertinent ER and admission documentation. **Care Management and CCO-Provided Information to Provider/Care Teams:** [See description below under population management]
Quality Improvement, Population Management, Data and Analytics Tools	Umpqua employs two Inteligenz products: • Architrave 2.1 is an analytics and data mining tool that extracts, analyzes, and reports on clinical and claims-based data in their data warehouse. o The tool calculates retrospective and prospective risk scores, diagnoses, prescription drugs use, costs, and premium received and spent. o Data can be grouped by age, disease, registry, provider, and eligibility o Umpqua uses the resulting reports to work with providers. In addition, they help Umpqua identify high-risk patients so they can dedicate case managers to the highest risk people. o Umpqua has used the tool for the last year, and staff are still learning how to use it for population management. • CCO Metrics Manager is a claims-based population health management product from Inteligenz focused specifically on the CCO incentive measures. The tool allows Umpqua to track CQM performance across patients, providers, clinics, etc., and identify areas that need improvement. o One example of Umpqua's use of the tool for assisting them in meeting a CCO metric involves well-child visits, which are to occur once a year. The Metrics Manager allows Umpqua to identify who across their population is subject to that measure as well as who has met the measure (by patient, by doctor, by plan, by address). Umpqua has a team of navigators who then work with the providers to encourage and support their efforts for getting the visits done. For example this support team has relevant information about foster children's need for completing a dental visit, mental health visit, and medical visit within 60 days of entering foster care. o Umpqua staff hand-delivered incentive payment checks to providers, during which visit she also asked them to help by doing well child visits. The payment was significant enough to warrant attention and ensuing cooperation. • The two tools have enabled Umpqua to maximize their performance on metrics. o They can use the Inteligenz tools within the EMR, with relevant information populating the chart. o The CCO has added additional internal metrics for next year, including specialty provider metrics.

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	o The analytic and predictive abilities of Architrave 2.1 will continue to be fine-tuned, based on population healthcare and individual case management needs. • Umpqua learned that no system off the shelf would do the things they needed to do as a CCO in Oregon, and so they worked to develop the solution they needed. Umpqua considers themselves an 'information company' as they "have Information coming in and better information going out." **Incorporating Clinical Data:** • Architrave 2.1 is in the process of being programmed to mine clinical data in the required CCO metrics format. • Clinical data can be collected from any provider utilizing Umpqua One Chart, as long as the data is captured in the correct discreet format. This data can be fed into a data warehouse, and then extracted utilizing a proprietary database mining tool developed by Inteligenz.
Clinical Quality Metrics (CQM) Collection and Reporting	• The CCO is in good shape technologically to be able to report on the CQM measures in Year 2. Similar to Year 1, Umpqua will report on CQMs using clinical data that is fed into Umpqua's database from Umpqua One Chart. • Umpqua credits their relative success of achieving CCO incentive metrics to having everybody in the community on the same EHR system. • The CCO was able to work in a new workflow for depression screening into the latest One Chart upgrade in 2014. They built in a PHQ-2, PHQ-9, AUDIT, DAST, and SBIRT screenings into the system.
Technical Assistance to Practices for EHRs and Meaningful Use	Umpqua has dedicated resources to assisting providers with meeting Meaningful Use. They track each provider's progress toward MU1 and MU2, including what their MU status is likely to be for this attestation year. The CCO is investing considerable effort into ensuring providers are well prepared for attestation. They have also invested resources into the IT aspect by confirming that their system is ready to help facilitate the process of providers receiving credit for their accomplishments, while not actually helping providers attest. • Umpqua has inquired regarding the state's role in and expertise with MU. They are interested in receiving any information the state has available on MU. • Umpqua has engaged Sage, a computer consultant group knowledgeable about MU. They plan to discuss next steps, including the most effective ways to support the providers.
Patient Engagement through HIT	Umpqua One Chart currently includes a limited-feature patient portal. Though Umpqua considered working together with Mercy to create a community patient portal, after some review it was decided to improve and optimize their current Kryptiq patient portal.
Telehealth	• Developing a CAHPS survey tablet application to allow patients to complete the survey in the waiting room. • Umpqua has provided mental health Skype sessions, but the patients seemed generally unsatisfied with the experience.
Other	**Local Provider Directory:** Umpqua maintains a provider directory within their administrative systems including within the Inteligenz tools.
Barriers to Implementation of HIT Tools/ Services	• A few providers are on alternate EMR systems and a smaller few not on any EMR, leaving approximately 13% of members for whom data is not being collected. • Increased demand on providers to collect and enter data has become a major barrier as there are ever growing and conflicting requirements. • Need for implementation of workflows to ensure entry of consistent and accurate data. • General challenges getting information from disparate systems, like OHSU, or the VA in Portland. The CCO is interested in any state-coordinated efforts that help Umpqua One Chart connect to external systems around the state.

	• Umpqua pointed out the financial burden on smaller providers who may need to work with their EHR vendor or other folks to configure their systems to produce clinical quality metrics
Barriers to Behavioral Health Information Sharing	Umpqua would like clarification concerning 42 CFR Part 2, specifically regarding what is and is not allowable. For example, can they treat depression the same way they treat diabetes in their EHR? The CCO would like to know what information they can and cannot share.

CCO Provider Environment:

Hospital Engagement in HIT

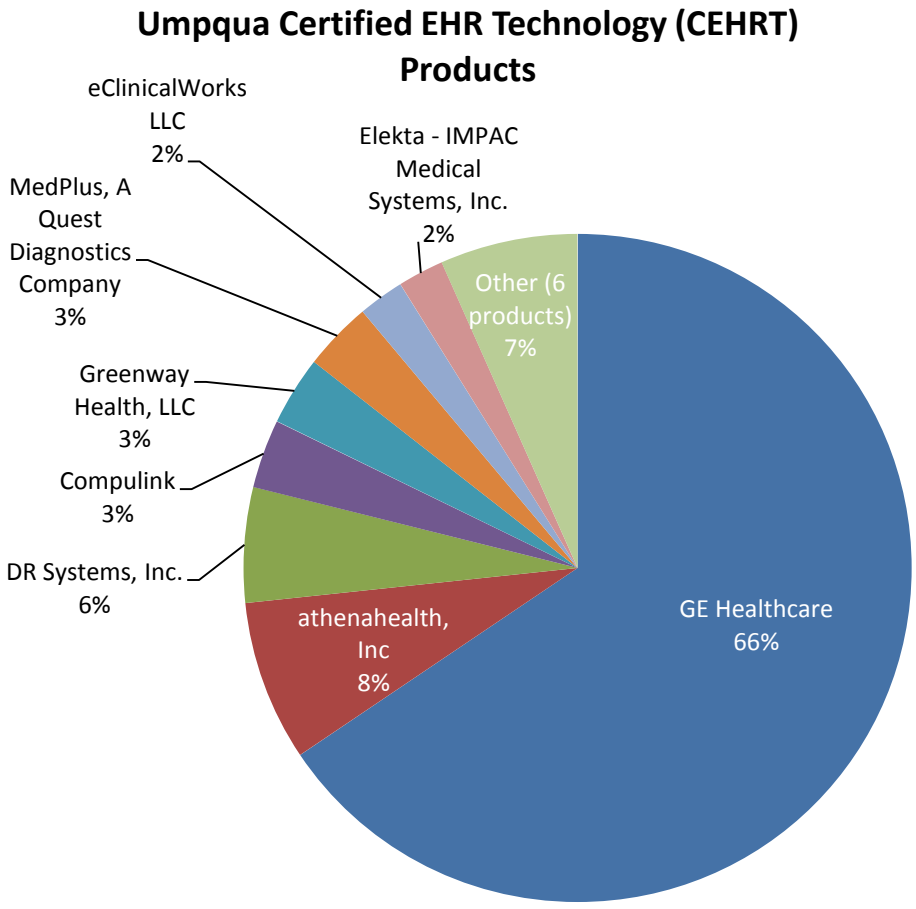
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Mercy Medical Center	Meditech	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top Certified EHR Technology Products for Umpqua Health Alliance

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 90 unique providers affiliated with Umpqua Health Alliance CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 14 different EHRs in use within the CCO. The top 8 products are represented in the chart, which are in use by 84 unique providers.



Western Oregon Advanced Health (WOAH) CCO HIT/HIE Profile

21,341 members[1]

CCO Description:

- Over 80% of members are managed by a few large group practices, serving members in North Bend, Coquille, Myrtle Point, Bandon, Gold Beach, and Coos Bay.
- The Waterfall Clinic, a small FQHC, serves approximately 5% of member population.
- The CCO evolved from a physician-owned IPA.
- The region experiences some challenges with broadband connectivity (i.e., geographical limitations). Reaching some rural communities is difficult.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination		Quality Improvement, Population Management, Data and Analytic Tools
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☒ Planning/Developing ☐ Not Pursuing
Vendor Name	TBD	TBD	Milliman
Product Name			Patient Relationship Manager (PRM)
Version			Gen 1: launched Gen 2: in development
Comment	Solution in development to exchange clinical data in concert with the Milliman solution	Coordination with Bay Area Hospital HIE efforts through participation in governance: BACIA	Analytics, quality metrics, population/ care management solution

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** The Bay Area Community Informatics Agency (BACIA) is a governance and policy-making body, coordinating health information exchange efforts across Coos Bay and the Southern Oregon Coast. Participants in BACIA include: Bay Area Hospital, North Bend Medical Center, Bay Clinic, Southwest Oregon IPA, and WOAH CCO. Soon to include South Coast Orthopedics and Waterfall Clinic. BACIA and WOAH have brought together the relevant partners and established trust and a shared commitment, which they feel is essential to the success of a community-oriented venture around HIE. • In 2007, BACIA started with an investment in the Medicity HIE solution, and decided in 2013, to replace this solution with a combination of solutions operated by the hospital and CCO, which are under development. • Bay Area Hospital is implementing Mobile MD, which will offer a number of enhancements to their provider workflow, as well as a patient portal for their EHR. The hospital may expand to the full HIE component offered by Mobile MD over time.

[1]As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

	• WOAH expects to add an HIE component to its Milliman Patient Relationship Manager (PRM) solution (see description below). The PRM tool is having a significant impact on how the community HIE evolves. BACIA/WOAH are considering the possibility of having WOAH as the focal point for the community HIE and case managers across the community becoming principal users. **Direct Secure Messaging[2]:** The WOAH solution and BACIA efforts do not currently support Direct secure messaging, although the hospital and providers in their community that seek meaningful use incentives will need to employ it. Further exploration of the role that Direct secure messaging and CareAccord might play may be warranted. **Hospital Notifications[3]:** WOAH expects to be receiving clinical data into the PRM tool from the regional hospital in the next few months, and are interested in the potential to bring PreManage data into their tool. BACIA representatives expressed interest in exploring whether PreManage may relate to their HIE efforts in the future. **Care Management and CCO-Provided Information to Provider/Care Teams:** • WOAH envisions using the Milliman PRM tool to support provider workflows, and ultimately the care management model using PRM could be used more broadly than Medicaid in the community. • Care Coordinator reports and PCP/Provider Management Reports offer EHR-like information about patients. Offers a new way to view patients and brings to the care provider's attention patients they may not have been considering.
Quality Improvement, Population Management, Data and Analytics Tools	The PRM Gen 1 tool includes predictive analytics/risk assessment, care coordinator and PCP/Provider management reports, quality metrics and care gaps information, and business intelligence tools. • A principal goal of the PRM is to ensure that the CCO or provider is able to communicate with patients/customers, to be able to impact their decision making at the time that they are about to make a decision that may be adverse to their health. • Another goal is efficiency of care, ensuring the tool can quickly and easily inform the CCO or provider about where/how to prioritize efforts across a population or patient panel • Milliman Advanced Analytics are used to risk-stratify patients in order to target case management with a goal of reducing potential volatility of risk/cost across a population, not merely high cost patients. This process involves: (1) benchmarking against the average, (2) discovering where the highest risk is and identifying the portion that is controllable, (3) examining healthcare expense volatility and potentially avoidable healthcare expenses (rather than average cost), (4) patients with the greatest area of potentially avoidable costs are ranked as a priority for additional ambulatory care management (not based on 'risk-factors').

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	• The PRM tool helps the CCO and providers target which patients they should actively manage, and then assists in identifying what issues should be actively targeted for each patient, including what has been avoidable historically. • Data currently used in the PRM tool are claims/administrative data including prescriptions (mental health prescriptions and prescriptions for which the patient paid with cash are not included). PRM Gen 2 would include clinical data integration and aggregation. **Incorporating Clinical Data:** WOAH is evaluating the PRM Gen 2 tool, which includes clinical data.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** WOAH is working directly with its provider network for CQM reporting, not through the PRM tool at this time. **Longer-term CQM Strategy:** Depends on their decision about whether to implement Milliman's PRM Gen 2 product, which would incorporate clinical data and calculate CQMs.
Technical Assistance to Practices for EHRs and MU	In an effort to strengthen provider relations, WOAH plans to establish several best practices to help improve clinic workflow and outcomes.
Telehealth	WOAH is supporting the following telehealth initiatives: • Providers who have left the community but are still interested in providing behavioral health through videochat • A multi-discipline, non-profit entity overseeing a feasibility study cataloging the location of the telehealth medicine equipment and developing a plan for its use • PeaceHealth's telehealth project: consult care
Other	WOAH maintains a provider directory within their administrative systems including within their PRM tool.
Barriers to Implementation of HIT Tools/ Services	• Experienced, trained IT staff and analysts are difficult to hire and retain. Some outsourcing efforts by community partners have resulted in frustration and lack of performance. A multitude of competing demands (e.g., every IT department in the region is extremely taxed by EHR adoption/upgrades, MU2 deadlines, and other state and federal requirements). • One challenge of the CCO taking a more central role in managing the community HIE is that there are different needs for the hospital than for the CCO. For example, the hospital is working around provider workflow to ensure consistent metrics and data, and the CCO is focused on population management. o Other areas that would need development were the PRM tool to become more central in the community include questions regarding the management of access to patient information; the means by which case managers would coordinate data; and clarification regarding data needs. • WOAH indicated they faced challenges with CQM reporting in Year 1 on both the front-end (requisite physician workflows) and back-end (extracting the data). Lack of consistent workflows that allow for accurate reporting of data.
Barriers to Behavioral Health	Barriers/challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include: ____ Confusion over compliance with state or federal laws ____ State or federal laws prohibit the type of sharing I want/need to do

Information Sharing	__x__ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). ____ Concerns over privacy and confidentiality protection for the patient ____ Concerns over liability if information you share is later improperly shared __x__ Lack of proper consent forms from the patient __x__ Other: Mental Health providers use a record that is significantly different from the medical EHR.

CCO Provider Environment:

Hospital Engagement in HIT

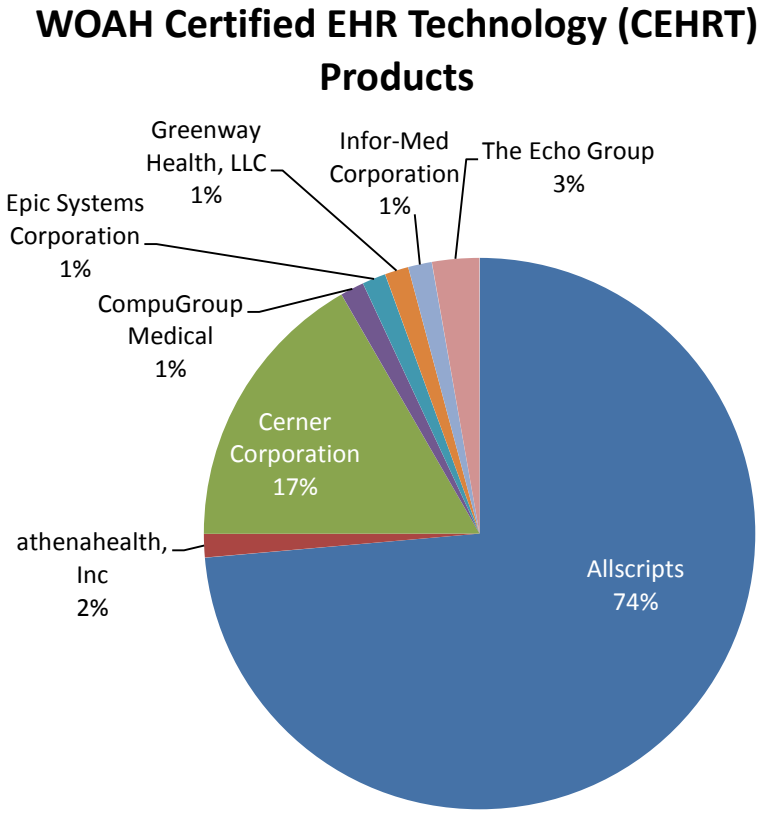
Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Bay Area Hospital	Siemens	Stage 1	Feed is live for ED and inpatient data—receiving notifications to printer.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Certified EHR Technology Products for Western Oregon Advanced Health

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 72 unique providers affiliated with WOAH CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 8 different EHRs in use within the CCO.



Willamette Valley Community Health CCO HIT/HIE Profile

100,574 members[1]

CCO Description:

- Served by about 62 primary care practices, which includes two Federally Qualified Health Centers (FQHCs), and many practices are members of the Mid-Valley IPA (MVIPA).
- Of the primary are practices, 38 have achieved at least Tier 1 PCPCH status, with 22 practices at Tier 3.
- Over 80% of the practices are very small with 4 providers or less. There is one large practice of over 40 providers and a handful of medium-sized practices with 10-15 providers.
- MVIPA hosts NextGen EHR for many of its members.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination	Quality Improvement, Population Management, Data and Analytic Tools
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing
Vendor Name	Collective Medical Technologies	Arcadia Solutions
Product Name	PreManage	Community Data Warehouse
Comment	In conversations with CMT about bringing ED and inpatient notifications to their community.	Working in conjunction with community partners

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	**Health Information Exchange:** Health care stakeholders in the community have considered a regional community solution to HIE in the past, and the CCO and its HIT committee continues to be interested in how best to support a community HIE solution, however, there are no concrete plans for a community-wide HIE currently . **Direct Secure Messaging[2]:** Although WVCH promoted Direct secure messaging and a significant number of organizations have registered with CareAccord, many of these folks are not using CareAccord at this time, in some cases because it is not embedded in their EHR/workflow. As providers need to meet Meaningful Use, many will use a HISP embedded in their EHR, including the MVIPA members using MVIPA's NextGen (with Mirth as the HISP). The CCO commented that CareAccord is likely to be most useful for providers not seeking to meet Meaningful Use, and those that do not have an EHR.

[1] As of 10/01/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

	Hospital Notifications[3]: Though hospital data will be included in the Community Data Warehouse (see description below), WVCH is not otherwise engaged in providing hospital notifications to PCPs. WVCH is in the process of exploring options for bringing PreManage to its community. **Care Management and CCO-Provided Information to Provider/Care Teams:** WVCH expects that Case Managers will likely be primary users of the Community Data Warehouse tool (see description below) for reaching out to patients, creating reminders, and metrics, among other uses.
Quality Improvement, Population Management, Data and Analytics Tools	Community Data Warehouse: An overarching goal for the CCO is to connect clinical data from disparate EHRs, hospital data, pharmacy data, and health plan claims data for use at the point of care for primary care providers, and case management staff to help with care coordination and the health care decision making process. To that end, WVCH is proceeding with the Community Data Warehouse, a pilot project involving the development and implementation of a population health management, data aggregation, and analytics tool. This effort will be a proof of concept for the CCO board to consider whether to implement more fully. • The Warehouse is spearheaded by Silverton Health in collaboration with Yakima Valley Farm Workers, independent of WVCH. WVCH decided to adopt the Warehouse as its own in a pilot phase, as the Warehouse project met many of the CCO's HIT objectives, with the exception of HIE capabilities. In addition, the Warehouse project was underway, with the vendor, Arcadia, selected and agreements/governance established. • The project currently comprises over 15% of WVCH's member population – and is scalable should the CCO want to expand after the initial implementation. • Participants in the project include a hospital and approximately ten PCP clinics using at least two different types of EHR software/versions. • The tool is expected to integrate hospital, ambulatory EHR, pharmacy, and claims data. • One of the key objectives of the Community Data Warehouse project is to improve analytic capability at a community level. o Existing analytic capability is generally limited by the measurement and reporting capabilities provided by the EHR vendors. Some practices have developed additional reporting capabilities in-house or via MVIPA. **Incorporating Clinical Data:** The expectation is that clinical EHR data will be integrated into the Community Data Warehouse for a variety of purposes.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** • WVCH intends to leverage capabilities provided by the participating practices' EHR systems (primarily MVIPA's NextGen providers) for Year 2 CQM measurement and reporting. • WVCH indicated a concern that they won't have a complete year of data for the depression screening measure for Year 2, as the NextGen EHR systems were not upgraded to include the ability to enter a depression screening until July 31st, 2014. **Longer-term CQM Strategy:** WVCH does not yet know what level of clinical information will be supported by the Data Warehouse project, and how it might support the CCO incentive metrics moving forward.

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

Technical Assistance to Practices for EHRs and MU	• The CCO is exploring ways to increase the efficiency of EHRs including the use of Scribes for their veteran providers. • MVIPA provides technical assistance to providers using NextGen EHR. In fact, O-HITEC subcontracted with MVIPA to deliver TA services.
Other	**Local Provider Directory:** WVCH maintains a provider directory within their administrative systems. The collaborative will maintain provider information in the Community Data Warehouse.
Barriers to Implementation of HIT Tools/ Services	• WVCH is aware that providers do not experience EHRs as increasing their productivity, efficiency, or cost savings, bringing the value of EHRs into question. • WVCH is interested in supporting dental care use of EHRs and HIT. The CCO ascertained that dental care providers are lagging behind physical health in terms of EHR adoption, although dental providers are eligible for the EHR incentive program and certified dental EHRs exist. The CCO expects to closely monitor and support efforts in this area. • The majority of practices are primarily dependent on the measurement and reporting capabilities inherent to their EHR systems and do not have the resources to develop improved data analytic capabilities on their own. • Each new measurement and reporting requirement brings with it the necessity to evaluate and enact data entry workflows, which result in structured data being available for reporting purposes. EHR system usability is a constant barrier to reliable data entry and therefore accurate measurement. • While the Community Data Warehouse project will provide WVCH with population management, care coordination, quality, and analytics capabilities, it does not address the CCO's HIE and/or query-response needs. • WVCH expressed concerns regarding making significant investment in HIE given challenges related to interoperability, including the limitations of CCDA integration, and challenges related to message delivery via Direct secure messaging.
Barriers to Behavioral Health Information Sharing	Barriers/challenges experienced in sharing behavioral health data (including mental health, substance abuse, and addictions) include: __X__ Confusion over compliance with state or federal laws ____ State or federal laws prohibit the type of sharing I want/need to do __X__ Our organization's technology system does not have the technical interfaces and applications needed to exchange sensitive data (e.g., EHRs do not segment or separate data). __X__ Concerns over privacy and confidentiality protection for the patient __X__ Concerns over liability if information you share is later improperly shared ____ Lack of proper consent forms from the patient

CCO Provider Environment:

Hospital Engagement in HIT

Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Salem Hospital	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
West Valley Hospital	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.
Santiam Memorial Hospital	Healthland	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.
Silverton Hospital	Meditech, Optuminsight	Stage 1	Feed is live for ED and inpatient data—receiving notifications to printer.

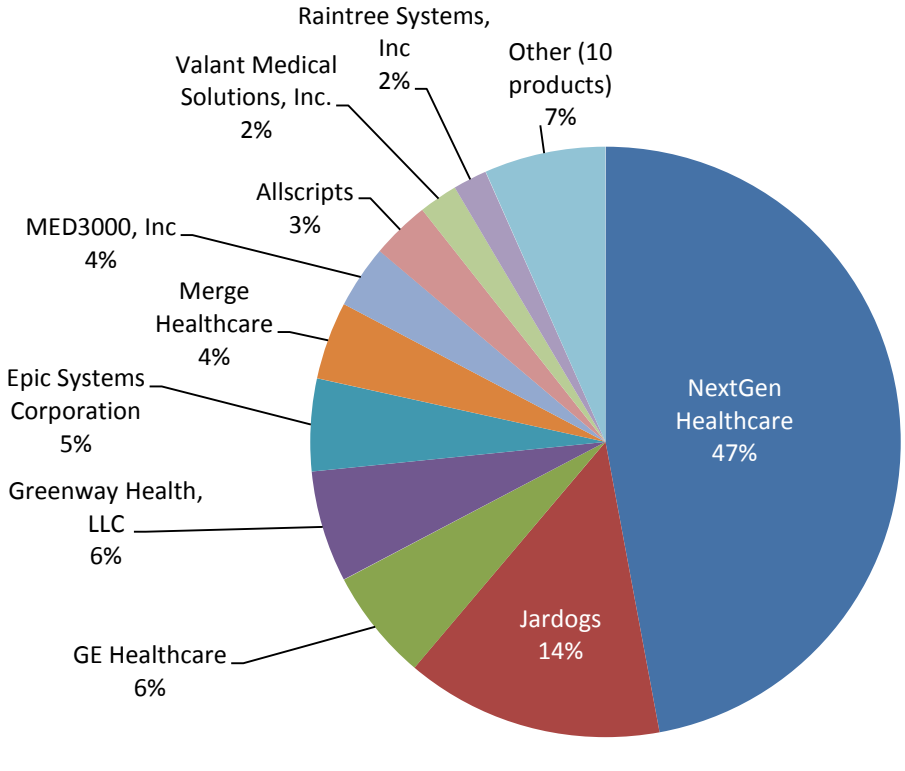
*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top 10 Certified EHR Technology Products for Willamette Valley Community Health

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 376 unique providers affiliated with WVCH CCO that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 20 different EHRs in use within the CCO. The top 10 products, represented in the chart, are in use by351 unique providers.

WVCH Certified EHR Technology (CEHRT) Products



Yamhill CCO HIT/HIE Profile

24,661 members[1]

CCO Description:

- Two major hospital systems: Providence Medical Group Newberg and Willamette Valley Medical Center (WVMC) McMinnville with closely affiliated primary care and specialty care clinics with largely employed providers;
- One large independent primary care clinic: Physicians Medical Center (McMinnville) seeing a majority of pediatric patients.
- One FQHC: Virginia Garcia serving a large portion of Spanish speakers and adults.
- Remainder of Yamhill CCO network: small independent primary care and specialty care clinics.
- Yamhill County DHHS supplies the majority of behavioral health services.
- Yamhill CCO formed out of community partners and is supported by a partnership with CareOregon who provides administrative foundation and support.
- Prior to the CCO forming, the majority of Medicaid members were fee for service.
- Yamhill CCO was awarded the Early Learning Hub for their region.

Pursuit of HIT Initiatives

	Health Information Exchange and Care Coordination		Quality Improvement, Population Management, Data and Analytic Tools		
Status	☐ Currently supporting ☒ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing	☒ Currently supporting ☐ Planning/Developing ☐ Not Pursuing
Vendor Name	The Advisory Board	Collective Medical Technologies	The Advisory Board	The Advisory Board, Milliman	SAS
Product Name	Crimson Care Management (CCM)	PreManage	Crimson Care Registry (CCR)	Crimson Population Risk Management (CPRM)	Business Intelligence Software
Comment	Care management tool	Hospital notifications	Identifies gaps in care	Population management, Risk stratification, with Milliman analytic support	Claims-based analytic reporting (provided by CareOregon)

[1]As of 10/2014
www.oregon.gov/oha/healthplan/DataReportsDocs/October%202014%20Coordinated%20Care%20Service%20Delivery%20by%20County.pdf

Description of HIT/HIE Initiatives

Information Sharing and Care Coordination	Overall, the CCO is investing in a suite of tools within the Crimson Care Ambulatory tool, which was selected in part because one local hospital had invested in it, and two major clinics are already connected. The suite has three tools – 2 that Yamhill CCO is implementing (CPRM and CCR – see next section below), and 1 that the CCO is considering (CCM) for care management. **Health Information Exchange:** See "Care Management" section below **Direct Secure Messaging[2]:** The CCO has not engaged in many conversations around using Direct for their CCO needs, and is using a secure email service when necessary. However, Yamhill CCO has identified radiology (echocardiogram) image transfer type platform as a significant need, which could be supported by Direct secure messaging/CareAccord. **Hospital Notifications[3]:** One clinic already receives a daily feed of emergency department visits for their patients, but it is limited to their area (one hospital). YCCO is supportive of EDIE and is interested in exploring the integration of PreManage into the Crimson Care Management tool. **Care Management and CCO-Provided Information to Provider/Care Teams:** The CCO is exploring the possibility of implementing the Crimson Care Management (CCM) tool, which would include more real-time, actionable clinical information to support care management. With Crimson Care Management, providers and the CCO care managers get a full picture of their patients or members, defined sub-populations, and individual patients through integrated data. Crimson includes psychosocial risk factors when calculating patient risk and prioritizing tasks, giving care managers the information needed to act effectively. See below for a description of the Crimson Care Registry and Crimson Population Risk Management tools which also support providers in care delivery and managing their populations. For example, Yamhill CCO's aim is that behavioral health services providers could utilize the CPRM tool for case management and to facilitate the coordination of services.
Quality Improvement, Population Management, Data and Analytics Tools	The CCO invested in the Crimson Care Registry (CCR) and Crimson Population Risk Management (CPRM) tools. • The Crimson Care Registry component allows for gathering/aggregating/sharing of clinic level EHR data to identify gaps in care and specific health data points in the population (e.g., identifying members in need of colorectal cancer screening). The CCR can also produce the three CQM CCO metrics. • The Crimson Population Risk Management tool pools, processes (by Milliman), and analyzes medical claims data from CareOregon and OHA to risk stratify and score members to allow for the identification of members with high medical costs. • YCCO considers the Crimson PRM tool a critical component of developing alternative payment models. Their strategy has involved using the CPRM to risk score members

[2] Direct secure messaging provides a HIPAA-compliant way to encrypt and send any attachment of patient information electronically, for example, shared care plans, patient histories, and more sophisticated attachments such as x-rays and echocardiograms. As EHRs evolve in 2014 to meet federal Meaningful Use requirements, Direct secure messaging will be a core service within each EHR and national standards will support interoperability between Direct secure messaging providers (HISPs).

[3] Hospital notifications fill information gaps around expensive transitions of care by providing real-time alerts to providers, health plans, CCOs and health systems when their patients are seen in the Emergency Department, are admitted to inpatient care, or discharged from the hospital.

	assigned to various clinics, and then base the global budget those clinics receive for that population on the risk score of the members. • Yamhill CCO supports the Community Hub, which is a referral-based program to which any provider can refer members they feel are high utilizers in order to establish a relationship with a community health worker. The Crimson Population Risk Management tool is being considered for integration into the Community Hub program that works with high-utilizers of ED and may be used as a way to identify high-risk score members for inclusion in the Community Hub. Care Oregon supports Yamhill CCO with claims-based analytic reporting is conducted via SAS Business Intelligence software, including metrics and dashboards for the CCO to use. • Current reporting capability includes aggregate reporting for CCO level data, provider level data, and member level data for demographics, utilization, and gaps in care **Incorporating Clinical Data:** • The Crimson software includes the capacity to include EMR data within their analytics.
Clinical Quality Metrics (CQM) Collection and Reporting	**Current CQM Strategy:** CCO relied on OCHIN for the Year 1 CQM submission. However, given the increases in the required population on which to report, this approach will likely not suffice for Year 2. CCO is exploring a multi-pronged approach, including the use of Crimson Care Registry as well as OCHIN and Providence, to meet the needed percentages. **Longer-term CQM Strategy:** The vision for longer term reporting is that data would be collected in, and reported from, the Crimson Care Registry to the CQMR.
Telehealth	• Yamhill CCO is pursuing a teledermatology pilot, as part of their participation in OHA/Transformation Center's Council of Clinical Innovators. Due to the lack of access to dermatology care, they are bringing a teledermatology provider into the community which involves putting an iTouch in primary care exam rooms to support teledermatology consults during a primary care visit. The remaining challenge is to resolve billing for such a service. • Partners within the Yamhill CCO community previously utilized tele-mental health. • Yamhill CCO supports and encourages providers' use of the *Oregon Psychiatric Access Line about Kids* (Opal-K), which provides free, same-day child psychiatric phone consultation to primary care clinicians in Oregon. • Additional telehealth/telemedicine being considered include after hours crisis intervention and services within the CCO pain clinic.
Other	**Common Core Referral/Early Learning:** YCCO sponsors the Yamhill County Early Learning Hub. They were the only CCO in the state that applied and was awarded the status and is therefore under some scrutiny regarding how CCO is approaching the integration of early childhood interventions. The CCO already had a Common Core Referral process in place for the Maternal Child Health (MCH) population. That is, any provider or (non-profit) entity in the community that sees a child, family, or pregnant woman of concern, they only need to fill out the basic common core referral form and fax it to the CCO. The CCO then conducts an assessment and determines the services available to meet the needs. The process is low-tech (handled via paper and fax) and includes basic information, but is very effective in getting individuals the assistance they need. **Local Provider Directory:** Yamhill CCO maintains a provider directory within their administrative systems and Crimson systems.

Barriers to Implementation of HIT Tools/ Services	• Presence of multiple EHR systems across the provider network. • Crimson integration administrative barriers include lack of clinic interest in participating and lack of staff to devote to the process. • Clinic staff stretched thin dealing with technical and regulatory requirements. • Current CCO staffing limitations, specifically the lack of technology and/or analytics-dedicated employees. YCCO is exploring the possibility of hiring a data/analytics staff person. • YCCO has experienced challenges with getting some providers organizations involved with Crimson. This has been due in part to concerns regarding HIPAA including having correct business agreements that identify who would have access to the data and lack of clarity regarding acceptable 'pushing and pulling' of data between organizations (i.e., what information is acceptable to share). • Once the data was pooled from CareOregon and OHA and processed by Milliman, they found a significant rate of duplicate records in Crimson. A data validation effort ensued, involving a joint effort between Crimson and Milliman. • Starting ACO in McMinnville being run through Regence (Regence Active Care – devoted to fostering ACOs). They have 123 patients already enrolled. The challenge with this is that Regence has their own HIT/HIE platform (Lumeris). This adds to the complexity of establishing a community-wide HIT/HIE infrastructure. • Uncertainty among CCO staff as to the status of dental practices with regards to Meaningful Use and other state HIT/HIE goals/metrics.

CCO Provider Environment:

Hospital Engagement in HIT

Hospital Name	EHR Vendor	Stage of Meaningful Use Achieved*	Emergency Department Information Exchange (EDIE) Status (as of 5/2015)
Willamette Valley Medical Center	Meditech	Stage 1	Feed is live for ED and inpatient data—receiving notifications to fax.
Providence Newberg Medical Center	Epic	Stage 1	Feed is live for ED and inpatient data—receiving notifications to EMR.

*Note: Stage of Meaningful Use is based on most recent Medicaid payments as of 04/15 and Medicare payments as of 12/14.

Top Certified EHR Technology Products for Yamhill Service Area

(in use by eligible professionals receiving Medicare or Medicaid EHR Incentives)

There were 180 unique providers in Yamhill CCO's servicing area that received payments for either the Medicaid or Medicare EHR Incentive Programs from 2011 – Nov 2014. If multiple payments were received, CEHRT represented in data is based on the most recent information. There are a total of 16 different EHRs in use within the CCO. The top 11 products are represented in the chart, which are in use by 175 unique providers.