COLORADO
Department of Health Care Policy & Financing

Regional Accountable Entities (RAEs)
for the Colorado Accountable Care Collaborative

# Fiscal Year 2023–2024 PIP Validation Report

*for*

# Health Colorado, Inc. Region 4

*April 2024*

*This report was produced by Health Services Advisory Group, Inc. for the Colorado Department of Health Care Policy & Financing.*

HSAG HEALTH SERVICES ADVISORY GROUP

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# Acknowledgements and Copyrights

# 1. Executive Summary

Pursuant to 42 CFR §457.1250, which requires states' Medicaid managed care programs to participate in external quality review (EQR), the State of Colorado, Department of Health Care Policy and Financing (the Department) required its Regional Accountable Entities (RAEs) to conduct and submit performance improvement projects (PIPs) annually for validation by the State's external quality review organization (EQRO). Health Colorado, Inc. Region 4, referred to in this report as HCI R4, holds a contract with the State of Colorado for provision of healthcare services for Health First Colorado, Colorado's Medicaid program.

The purpose of a PIP is to achieve, through ongoing measurements and interventions, significant improvement sustained over time in performance indicator outcomes that focus on clinical or nonclinical areas. For this year's 2023–2024 validation, HCI R4 submitted two PIPs: *Follow-Up After Emergency Department Visits for Substance Use [FUA]* and *Social Determinants of Health (SDOH) Screening*. These topics addressed Centers for Medicare & Medicaid Services' (CMS') requirements related to quality outcomes—specifically, the quality, timeliness, and accessibility of care and services.

The clinical *FUA* PIP addresses quality, timeliness and accessibility of healthcare and services for members ages 13 years and older with a diagnosis of substance use disorder (SUD) or any diagnosis of drug overdose. The topic, selected by HCI R4 and approved by the Department, was supported by historical data. The PIP Aim statement is as follow: "Does implementing a deliberate, iterative performance improvement process result in increased rates for members 13 years and older who follow-up after an emergency department visit for Substance Use Disorder (SUD) from 26.06% to 29.19% by June 30, 2025?"

The nonclinical *SDOH Screening* PIP addresses quality and accessibility of healthcare and services for HCI R4 members by increasing awareness of social factors that may impact member access to needed care and services. The nonclinical topic was mandated by the Department. The PIP Aim statement is as follows: "Does implementing a deliberate, iterative performance improvement process result in increased rates of screening for SDOH among behavioral health utilizers in RAE 4 from 2.91% to 3.18% by June 30, 2025?"

Table 1-1 outlines the performance indicators for each PIP.

**Table 1-1—Performance Indicators**

| PIP Title | Performance Indicator |
|---|---|
| *FUA* | The percentage of emergency department (ED) visits for members ages 13 years and older with a principal diagnosis of SUD or any diagnosis of drug overdose for which a follow-up visit occurred within 7 days of an ED visit. |
| *SDOH Screening* | The percentage of members with at least one behavioral health service who were screened for the four SDOH domains: food insecurity, housing instability, transportation needs, and utility difficulties. |

# 2. Background

## Rationale

The Code of Federal Regulations at 42 CFR Part 438—managed care regulations for the Medicaid program and Children's Health Insurance Program (CHIP), with revisions released May 6, 2016, effective July 1, 2017, and further revised on November 13, 2020, with an effective date of December 14, 2020—require states that contract with managed care health plans (health plans) to conduct an EQR of each contracting health plan. Health plans include primary care case management entities (PCCM entities). The regulations at 42 CFR §438.358 require that the EQR include analysis and evaluation by an EQRO of aggregated information related to healthcare quality, timeliness, and access. Health Services Advisory Group, Inc. (HSAG), serves as the EQRO for the Department —the agency responsible for the overall administration and monitoring of Colorado's Medicaid program. Beginning in fiscal year (FY) 2018–2019, the Department entered into contracts with RAEs in seven regions throughout Colorado. Each Colorado RAE meets the federal definition of a PCCM entity.

In its PIP evaluation and validation, HSAG used the Department of Health and Human Services, CMS publication, *Protocol 1. Validation of Performance Improvement Projects: A Mandatory EQR-Related Activity*, February 2023 (CMS Protocol 1).[1-1] HSAG's evaluation of the PIP includes two key components of the quality improvement (QI) process:

1. HSAG evaluates the technical structure of the PIP to ensure that HCI R4 designs, conducts, and reports the PIP in a methodologically sound manner, meeting all State and federal requirements. HSAG's review determines whether the PIP design (e.g., PIP Aim statement, population, sampling methods, performance indicator, and data collection methodology) is based on sound methodological principles and could reliably measure outcomes. Successful execution of this component ensures that reported PIP results are accurate and capable of measuring sustained improvement.
2. HSAG evaluates the implementation of the PIP. Once designed, a RAE's effectiveness in improving outcomes depends on the systematic data collection process, analysis of data, and the identification of barriers and subsequent development of relevant interventions. Through this component, HSAG evaluates how well HCI R4 improves its rates through implementation of effective processes (i.e., barrier analyses, interventions, and evaluation of results).

The goal of HSAG's PIP validation is to ensure that the Department and key stakeholders can have confidence that the RAE executed a methodologically sound improvement project, and any reported improvement is related to, and can be reasonably linked to, the QI strategies and activities conducted by the RAE during the PIP.

[1-1] Department of Health and Human Services, Centers for Medicare & Medicaid Services. *Protocol 1. Validation of Performance Improvement Projects: A Mandatory EQR-Related Activity*, February 2023. Available at: https://www.medicaid.gov/medicaid/quality-of-care/downloads/2023-eqr-protocols.pdf. Accessed on: Mar 18, 2024.

## Validation Overview

For FY 2023–2024, the Department required health plans to conduct PIPs in accordance with 42 CFR §438.330(b)(1). In accordance with §438.330 (d), RAE entities are required to have a quality program that (1) includes ongoing PIPs designed to have a favorable effect on health outcomes and beneficiary satisfaction and (2) focuses on clinical and/or nonclinical areas that involve the following:

- Measuring performance using objective quality indicators
- Implementing system interventions to achieve improvement in quality
- Evaluating effectiveness of the interventions
- Planning and initiating of activities for increasing or sustaining improvement

To monitor, assess, and validate PIPs, HSAG uses a standardized scoring methodology to rate a PIP's compliance with each of the nine steps listed in CMS Protocol 1. With the Department's input and approval, HSAG developed a PIP Validation Tool to ensure uniform assessment of PIPs. This tool is used to evaluate each of the PIPs for the following nine CMS Protocol 1 steps:

**Table 2-1—CMS Protocol Steps**

| Protocol Steps | |
|---|---|
| **Step Number** | **Description** |
| 1 | Review the Selected PIP Topic |
| 2 | Review the PIP Aim Statement |
| 3 | Review the Identified PIP Population |
| 4 | Review the Sampling Method |
| 5 | Review the Selected Performance Indicator(s) |
| 6 | Review the Data Collection Procedures |
| 7 | Review the Data Analysis and Interpretation of PIP Results |
| 8 | Assess the Improvement Strategies |
| 9 | Assess the Likelihood that Significant and Sustained Improvement Occurred |

HSAG obtains the data needed to conduct the PIP validation from HCI R4's PIP Submission Form. This form provides detailed information about HCI R4's PIP related to the steps completed and evaluated for the 2023–2024 validation cycle.

Each required step is evaluated on one or more elements that form a valid PIP. The HSAG PIP Review Team scores each evaluation element within a given step as *Met*, *Partially Met*, *Not Met*, *Not Applicable*, or *Not Assessed*. HSAG designates evaluation elements pivotal to the PIP process as critical elements. For a PIP to produce valid and reliable results, all critical elements must be *Met*.

In alignment with CMS Protocol 1, HSAG assigns two PIP validation ratings, summarizing overall PIP performance. One validation rating reflects HSAG's confidence that the RAE adhered to acceptable methodology for all phases of design and data collection and conducted accurate data analysis and interpretation of PIP results. This validation rating is based on the scores for applicable evaluation elements in steps 1 through 8 of the PIP Validation Tool. The second validation rating is only assigned for PIPs that have progressed to the Outcomes stage (Step 9) and reflects HSAG's confidence that the PIP's performance indicator results demonstrated evidence of significant improvement. The second validation rating is based on scores from Step 9 in the PIP Validation Tool. For each applicable validation rating, HSAG reports the percentage of applicable evaluation elements that received a *Met* score and the corresponding confidence level: *High Confidence*, *Moderate Confidence*, *Low Confidence*, or *No Confidence*. The confidence level definitions for each validation rating are as follows:

1. **Overall Confidence of Adherence to Acceptable Methodology for All Phases of the PIP (Steps 1 Through 8)**

   - *High Confidence*: High confidence in reported PIP results. All critical evaluation elements were *Met*, and 90 percent to 100 percent of all evaluation elements were *Met* across all steps.
   - *Moderate Confidence*: Moderate confidence in reported PIP results. All critical evaluation elements were *Met*, and 80 percent to 89 percent of all evaluation elements were *Met* across all steps.
   - *Low Confidence*: Low confidence in reported PIP results. Across all steps, 65 percent to 79 percent of all evaluation elements were *Met*; or one or more critical evaluation elements were *Partially Met*.
   - *No Confidence*: No confidence in reported PIP results. Across all steps, less than 65 percent of all evaluation elements were *Met*; or one or more critical evaluation elements were *Not Met*.

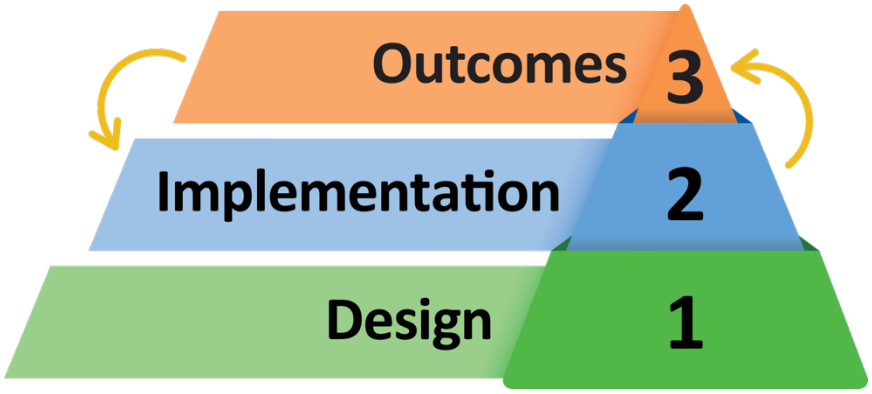
2. **Overall Confidence That the PIP Achieved Significant Improvement (Step 9)**

   - *High Confidence*: All performance indicators demonstrated *statistically significant* improvement over the baseline.
   - *Moderate Confidence*: One of the three scenarios below occurred:
     - All performance indicators demonstrated improvement over the baseline, **and** some but not all performance indicators demonstrated *statistically significant* improvement over the baseline.
     - All performance indicators demonstrated improvement over the baseline, **and** none of the performance indicators demonstrated *statistically significant* improvement over the baseline.

  - Some but not all performance indicators demonstrated improvement over baseline, **and** some but not all performance indicators demonstrated *statistically significant* improvement over baseline.
- *Low Confidence*: The remeasurement methodology was not the same as the baseline methodology for at least one performance indicator **or** some but not all performance indicators demonstrated improvement over the baseline and none of the performance indicators demonstrated *statistically significant* improvement over the baseline.
- *No Confidence*: The remeasurement methodology was not the same as the baseline methodology for all performance indicators **or** none of the performance indicators demonstrated improvement over the baseline.

Figure 2-1 illustrates the three stages of the PIP process—i.e., Design, Implementation, and Outcomes. Each sequential stage provides the foundation for the next stage. The Design stage establishes the methodological framework for the PIP. The activities in this section include development of the PIP topic, Aim statement, population, sampling techniques, performance indicator(s), and data collection processes. To implement successful improvement strategies, a strong methodologically sound design is necessary.

**Figure 2-1—Stages of the PIP Process**




Once HCI R4 establishes its PIP design, the PIP progresses into the Implementation stage. This stage includes data analysis and interventions. During this stage, HCI R4 evaluates and analyzes its data, identifies barriers to performance, and develops interventions targeted to improve outcomes. The implementation of effective improvement strategies is necessary to improve outcomes. The Outcomes stage is the final stage, which involves the evaluation of statistically, clinically, or programmatically significant improvement, and sustained improvement based on reported results and statistical testing. Sustained improvement is achieved when performance indicators demonstrate statistically significant improvement over baseline performance through repeated measurements over comparable time periods. If the outcomes do not improve, HCI R4 should revise its causal/barrier analysis processes and adapt QI strategies and interventions accordingly.

# 3. Findings

## Validation Findings

HSAG's validation evaluates the technical methods of the PIP (i.e., the design, data analysis, implementation, and outcomes). Based on its review, HSAG determined the overall methodological validity of the PIP. Table 3-1 summarizes the health plan's PIPs validated during the review period with an overall confidence level of *High Confidence*, *Moderate Confidence*, *Low Confidence* or *No Confidence* for the two required confidence levels identified below. In addition, Table 3-1 displays the percentage score of evaluation elements that received a *Met* score, as well as the percentage score of critical elements that received a *Met* score. Critical elements are those within the PIP Validation Tool that HSAG has identified as essential for producing a valid and reliable PIP.

HCI R4 submitted two PIPs for the 2023–2024 validation cycle. The *FUA* PIP and the *SDOH Screening* PIP were evaluated for adhering to acceptable PIP methodology. The PIPs had not progressed to being evaluated for achieving significant improvement; therefore, the second validation rating was *Not Assessed*. HCI R4 resubmitted one of the two PIPs and received a final overall *High Confidence* level for both PIPs. Table 3-1 illustrates the initial submission and resubmission validation scores for each PIP.

**Table 3-1—2023–2024 PIP Overall Confidence Levels for HCI R4**

| PIP Title | Type of Review[1] | Overall Confidence of Adherence to Acceptable Methodology for All Phases of the PIP | | | Overall Confidence That the PIP Achieved Significant Improvement | | |
|---|---|---|---|---|---|---|---|
| | | Percentage Score of Evaluation Elements *Met*[2] | Percentage Score of Critical Elements *Met*[3] | Confidence Level[4] | Percentage Score of Evaluation Elements *Met*[2] | Percentage Score of Critical Elements *Met*[3] | Confidence Level[4] |
| *FUA* | Initial Submission | 100% | 100% | *High Confidence* | *Not Assessed* | | |
| | Resubmission | *Not Applicable* | | | *Not Assessed* | | |
| *SDOH Screening* | Initial Submission | 85% | 100% | *Moderate Confidence* | *Not Assessed* | | |
| | Resubmission | 100% | 100% | *High Confidence* | *Not Assessed* | | |

[1] **Type of Review**—Designates the PIP review as an initial submission, or resubmission. A resubmission means the MCO resubmitted the PIP with updated documentation to address HSAG's initial validation feedback.

[2] **Percentage Score of Evaluation Elements *Met***—The percentage score is calculated by dividing the total elements *Met* (critical and non-critical) by the sum of the total elements of all categories (*Met*, *Partially Met*, and *Not Met)*.
[3] **Percentage Score of Critical Elements *Met***—The percentage score of critical elements *Met* is calculated by dividing the total critical elements *Met* by the sum of the critical elements *Met*, *Partially Met*, and *Not Met*.
[4] **Confidence Level**—Populated from the PIP Validation Tool and based on the percentage scores.

The *FUA* PIP was validated through the first eight steps of the PIP Validation Tool and received a *High Confidence* level for adhering to acceptable PIP methodology. HCI R4 received *Met* scores for 100 percent of applicable evaluation elements in the Design (Steps 1–6) and Implementation (Steps 7–8) stages of the PIP.

The *SDOH Screening* PIP was also validated through the first eight steps of the PIP Validation Tool and received a *High Confidence* level for adhering to acceptable PIP methodology. HCI R4 received *Met* scores for all applicable evaluation elements in the Design and Implementation stages of the PIP.

Scores and feedback for individual evaluation elements and steps are provided for each PIP in Appendix B. Final PIP Validation Tools.

## Analysis of Results

Table 3-2 displays data for HCI R4's *FUA* PIP.

**Table 3-2—Performance Indicator Results for the *FUA* PIP**

| Performance Indicator | Baseline (7/1/2022 to 6/30/2023) | | Remeasurement 1 (7/1/2023 to 6/30/2024) | | Remeasurement 2 (7/1/2024 to 6/30/2025) | | Sustained Improvement |
|---|---|---|---|---|---|---|---|
| The percentage of ED visits for members ages 13 years and older with a principal diagnosis of SUD or any diagnosis of drug overdose for which a follow-up visit occurred within 7 days of an ED visit. | N: 410 | 26.1% | | | | | |
| | D: 1,573 | | | | | | |

N–Numerator D–Denominator

For the baseline measurement period, HCI R4 reported that 26.1 percent of ED visits for members ages 13 years and older who had a principal diagnosis of SUD or other diagnosis of drug overdose had a follow-up visit within seven days of an ED visit.

Table 3-3 displays data for HCI R4's *SDOH Screening* PIP.

**Table 3-3—Performance Indicator Results for the *SDOH Screening* PIP**

| Performance Indicator | Baseline (7/1/2022 to 6/30/2023) | | Remeasurement 1 (7/1/2023 to 6/30/2024) | | Remeasurement 2 (07/1/2024 to 6/30/2025) | | Sustained Improvement |
|---|---|---|---|---|---|---|---|
| The percentage of members with at least one behavioral health service who were screened for the four SDOH domains: food insecurity, housing instability, transportation needs, and utility difficulties. | N: 931<br>D: 31,955 | 2.91% | | | | | |

N–Numerator D– Denominator

For the baseline measurement period, HCI R4 reported that 2.91 percent of members with at least one behavioral health service were screened for the four SDOH domains.

## Barriers/Interventions

The identification of barriers through barrier analysis and the subsequent selection of appropriate interventions to address these barriers are necessary steps to improve outcomes. HCI R4's choice of interventions, combination of intervention types, and sequence of implementing the interventions are essential to the overall success in improving PIP rates.

Table 3-4 displays the barriers and interventions documented by the health plan for the *FUA* PIP.

**Table 3-4—Barriers and Interventions for the *FUA* PIP**

| Barriers | Interventions |
|---|---|
| Loss of referral application. | Revise behavioral health referral mechanism. |
| Pre-contemplative/Contemplative member. | Peer specialist on-site in ED. |
| Nonstandard messaging on intervention and referral. | Screening, Brief Intervention, and Referral to Treatment (SBIRT) protocol. |
| Social needs/lack of knowledge. | Care coordination/care navigator on-site in ED. |
| Physician preference/lack of knowledge. | Medication-Assisted Treatment (MAT) training/protocols. |

Table 3-5 displays the barriers and interventions documented by the health plan for the *SDOH Screening* PIP.

**Table 3-5—Barriers and Interventions for the *SDOH Screening* PIP**

| Barriers | Interventions |
|---|---|
| • Absence of data visibility on outreach volume.<br>• Competing priorities for care coordination workload. | Outreach monitoring and feedback. |

# 4. Conclusions and Recommendations

## Conclusions

For this year's validation cycle, HCI R4 submitted the clinical *FUA* PIP and the nonclinical *SDOH Screening* PIP. HCI R4 reported baseline performance indicator results for both PIPs, and both PIPs were validated through Step 8 (Design and Implementation). Both PIPs received a *High Confidence* level for adherence to acceptable PIP methodology in the Design and Implementation stages.

HSAG's PIP validation findings suggest a thorough application of the PIP Design stage (Steps 1 through 6) for both PIPs. A methodologically sound design created the foundation for HCI R4 to progress to subsequent PIP stages—collecting data and carrying out interventions to positively impact performance indicator results and outcomes for the project. In the Implementation stage (Steps 7 and 8), HCI R4 accurately reported performance indicator data and initiated methodologically sound improvement strategies for both PIPs. HCI R4 will progress to reporting Remeasurement 1 indicator results for both PIPs, and both PIPs will progress to being evaluated for achieving significant improvement for next year's validation.

## Recommendations

Based on the validation of each PIP, HSAG has the following recommendations:

- Revisit causal/barrier analyses at least annually to ensure timely and accurate identification and prioritization of barriers and opportunities for improvement.
- Use QI tools such as a key driver diagram, process mapping, and/or failure modes and effects analyses to determine and prioritize barriers and process gaps or weaknesses, as part of the causal/barrier analyses.
- Use Plan-Do-Study-Act (PDSA) cycles to meaningfully evaluate the effectiveness of each intervention. The RAE should select intervention effectiveness measures that directly monitor intervention impact and evaluate measure results frequently throughout each measurement period. The intervention evaluation results should drive next steps for interventions and determine whether they should be continued, expanded, revised, or replaced.

# Appendix A. Final PIP Submission Forms

Appendix A contains the final PIP Submission Forms that HCI R4 submitted to HSAG for validation. HSAG made only minor grammatical corrections to these forms; the content/meaning was not altered. This appendix does not include any attachments provided with the PIP submission.

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
## *Follow-Up After Emergency Department Visit for Substance Use (FUA)*
## for Health Colorado, Inc. (RAE 4)

| Demographic Information | |
|---|---|
| MCO Name: Health Colorado, Inc (RAE 4) | |
| Project Leader Name: Edward Arnold | Title: Performance Improvement Analyst |
| Telephone Number: 719-666-0540 | Email Address: edward.arnold@carelon.com |
| PIP Title: *Follow-Up After Emergency Department Visit for Substance Use* | |
| Submission Date: 10/31/23 | |
| Resubmission Date (if applicable): Not Applicable | |

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
## *Follow-Up After Emergency Department Visit for Substance Use (FUA)*
## for Health Colorado, Inc. (RAE 4)

**Step 1: Select the PIP Topic.** The topic should be selected based on data that identify an opportunity for improvement. The goal of the project should be to improve member health, functional status, and/or satisfaction. The topic may also be required by the State.

**PIP Topic:** Follow-Up After Emergency Department Visit for Substance Use: Ages 13 and older.

**Provide plan-specific data:**

Nationwide, rates of appropriate follow-up within seven (7) days of an Emergency Department (ED) visit for a substance use disorder or unintentional drug overdose are poor with reported rates for Medicaid HMO populations as low as 13.4% for CY2021 (www.NHQA.org). Performance on this measure among the Medicaid population in Colorado is slightly better on average with rates reported as 27.0% for CY22. Despite this higher performance and considering the significant negative outcomes associated with unmanaged substance abuse, there still remains substantial opportunity to improve the engagement of this population in the therapeutic environment.

Baseline performance was collected per guidance from the Department and HSAG for 7/1/22-6/30/23. Health Colorado, Inc (HCI/R4) elected to utilize the CMS Core Measure specifications for Follow-Up After Emergency Department Visit for Substance Use: Ages 13 and older (FUA) to facilitate bench-marking with national averages and align with a Behavioral Health Incentive Program (BHIP) measure.

- HCI members who had a qualifying ED encounter 7/1/22-6/30/23: 1,573.
- Number of these members with appropriate follow-up within 7 days: 410
- Baseline performance for Follow-up After ED Visit for Substance Use (7-day): 26.06%.

Analysis of the age groups for qualifying encounters and follow-ups is consistent with the size of these age ranges. Nearly all qualifying encounters are within the 18-64 year age group. Upon review of qualifying encounters. To better identify opportunities for improved performance on this measure, this data was reviewed to isolate encounters without qualifying follow-ups. The proportion of this group consisting of children and older adults both increased slightly, but still represents a small portion of the overall group. An additional analysis was conducted to identify if timely access to follow-up services may be a significant issue. Eligible ED encounters that completed a follow-up within thirty (30) days but not within seven (7) were reviewed. Reversing the previous observation, the proportion of children and older adults in this group is less than their representation in the overall measure group.

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Step 1: Select the PIP Topic.** The topic should be selected based on data that identify an opportunity for improvement. The goal of the project should be to improve member health, functional status, and/or satisfaction. The topic may also be required by the State.

This data was also analyzed to examine what substances are associated with this measure population in the region. Analysis reveals that alcohol-related ED encounters represent the largest portion of qualifying ED encounters with nearly half of all encounters (46.3%). The next most common diagnostic groups for ED encounters are stimulants (17.9%) & opioids (14.3%). No other diagnostic groups exceed 10% of the qualifying encounters. This result is consistent with anecdotal report from region EDs. Again, this data was reviewed to isolate encounters without qualifying follow-ups to identify potential opportunities to improve performance. The same three (3) diagnostic groups remain in the same hierarchy although there is a slightly greater representation for alcohol diagnoses. The additional analysis to identify if timely access to follow-up services may be a significant issue relative to the substance-related diagnostic group was conducted. The review of eligible ED encounters that completed a follow-up within thirty (30) days but not within seven (7) demonstrated a notable increase in the proportions of stimulant and opioid encounters in this group.

| Age Range | Percent of All Encounters (N=1,573) | Percent of Encounters Without Follow-up (N=983) | Percent of Encounters With 30-Day Follow-up (N=418) |
|---|---|---|---|
| Adult (18-64) | 94.15% | 93.5% | 95.8% |
| Child (13-17) | 3.12% | 3.2% | 2.7% |
| Older Adult (65+) | 2.73% | 3.4% | 1.5% |
| | | | |
| **Diagnostic Group (Not All Inclusive)** | | | |
| Alcohol (F10.XX) | 46.3% | 49.1% | 44.4% |
| Stimulants (F15.XX) | 17.9% | 16.5% | 21.1% |
| Opioids (F11.XX) | 14.3% | 11.4% | 18.3% |

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
## *Follow-Up After Emergency Department Visit for Substance Use (FUA)*
## for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 1: Select the PIP Topic.** The topic should be selected based on data that identify an opportunity for improvement. The goal of the project should be to improve member health, functional status, and/or satisfaction. The topic may also be required by the State.

In summary, this analysis suggests that engaging members coping with alcohol-related conditions represents the greatest opportunity to improve performance on this measure, followed by stimulant and opioid-related conditions. In turn, access to treatment services for stimulant and/or opioid-related conditions could be reviewed to determine what may be the cause for delays in this populations engaging in services.

**Describe how the PIP topic has the potential to improve member health, functional status, and/or satisfaction:**

Substance use has a significant impact on health outcomes for individuals as well as health system utilization. The Center for Medicare & Medicaid Services (CMS) established the Follow-up After Emergency Department Visit for Substance Use (FUA) measure as an assessment of an evidence-based outcome for this population. More than one-tenth of ED visits in the USA were related to SUD and these individuals were more likely to return to the ED within 72 hours, more likely to be admitted to the hospital, and more likely to be admitted to the intensive care unit (ICU) (Zhang et al., 2021). Individuals who do not receive follow-up care after ED visits are more likely to return to the ED and experience worsening of their conditions (Croake et al., 2017). In addition to this evidence for the importance of follow-up after an ED visit for SUD, there is evidence that the problem is growing. From 2014 to 2018, ED visits made by adults with alcohol and substance use disorders increased by 30 percent and hospitalizations among patients with those disorders increased by 57 percent (Suen, 2022). Taking action now has the potential to reverse this trend by impacting HCI members.

1. Zhang X, Wang N, Hou F, Ali Y, Dora-Laskey A, Dahlem CH, McCabe SE. Emergency Department Visits by Patients with Substance Use Disorder in the United States. West J Emerg Med. 2021 Aug 19;22(5):1076-1085.

2. Croake S, Brown JD, Miller D, Darter N, Patel MM, Liu J, Scholle SH. Follow-Up Care After Emergency Department Visits for Mental and Substance Use Disorders Among Medicaid Beneficiaries. Psychiatr Serv. 2017 Jun 1;68(6):566-572.

3. Suen LW, Makam AN, Snyder HR, Repplinger D, Kushel MB, Martin M, Nguyen OK. National Prevalence of Alcohol and Other Substance Use Disorders Among Emergency Department Visits and Hospitalizations: NHAMCS 2014-2018. J Gen Intern Med. 2022 Aug;37(10): 2420-2428.

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Step 2: Define the PIP Aim Statement(s).** Defining the Aim statement(s) helps maintain the focus of the PIP and sets the framework for data collection, analysis, and interpretation.

**The statement(s) should:**

- Be structured in the recommended X/Y format: "Does doing X result in Y?"
- The statement(s) must be documented in clear, concise, and measurable terms.
- Be answerable based on the data collection methodology and indicator(s) of performance.

**Statement(s):**

Does implementing a deliberate, iterative performance improvement process result in increased rates for members 13 years and older who follow-up after an Emergency Department visits for Substance Use Disorder (SUD) from 26.06% to 29.19% by June 30, 2025?

1.

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Step 3: Define the PIP Population.** The PIP population must be clearly defined to represent the population to which the PIP Aim statement(s) and indicator(s) apply.

**The population definition must:**

- Include the requirements for the length of enrollment, continuous enrollment, new enrollment, and allowable gap criteria.
- Include the age range and the anchor dates used to identify age criteria, if applicable.
- Include all inclusion, exclusion, and diagnosis criteria used to identify the eligible population.
- Include a list of diagnosis/procedure/pharmacy/billing codes used to identify the eligible population, if applicable. Codes identifying numerator compliance should not be provided in Step 3.
- Capture all members to whom the statement(s) applies.
- Include how race and ethnicity will be identified, if applicable.
- If members with special healthcare needs were excluded, provide the rationale for the exclusion.

**Population definition:** Members aged 13 and older with an ED visit that includes a principal diagnosis of substance use disorder (SUD), or any diagnosis of drug overdose.

**Enrollment requirements (if applicable):**

Length of Enrollment: 31 days minimum

Continuous Enrollment: Date of the ED visit through 30 days after the ED visit (31 total days) with no allowable gaps.

**Member age criteria (if applicable):** Age 13 or older on the date of the ED visit. Anchor date for age is date of ED visit.

**Inclusion, exclusion, and diagnosis criteria:**

Inclusion: An ED visit with a principal diagnosis of SUD or any diagnosis of drug overdose on or between July 1 of the previous year and May 31 of the following year where the beneficiary was age 13 and older on the date of the visit. Value Sets from 2023 CMS Adult and Child Core Measure (FUA) at Attachment A & B.

Exclusion: ED visits that result in an inpatient stay and ED visits followed by an admission to an acute or nonacute inpatient care setting on the date of the ED visit or within the 30 days after the ED visit, regardless of the principal diagnosis for the admission. (An ED or observation visit billed on the same claim as an inpatient stay is considered a visit that resulted in an inpatient stay.) Exclude beneficiaries in hospice or using hospice services anytime during the measurement year. If a beneficiary has more than one ED visit in a 31-day period, include only the first eligible ED visit after applying relevant exclusions.

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| |
|---|
| **Step 3: Define the PIP Population.** The PIP population must be clearly defined to represent the population to which the PIP Aim statement(s) and indicator(s) apply.<br><br>**The population definition must:**<br>◆ Include the requirements for the length of enrollment, continuous enrollment, new enrollment, and allowable gap criteria.<br>◆ Include the age range and the anchor dates used to identify age criteria, if applicable.<br>◆ Include all inclusion, exclusion, and diagnosis criteria used to identify the eligible population.<br>◆ Include a list of diagnosis/procedure/pharmacy/billing codes used to identify the eligible population, if applicable. Codes identifying numerator compliance should not be provided in Step 3.<br>◆ Capture all members to whom the statement(s) applies.<br>◆ Include how race and ethnicity will be identified, if applicable.<br>◆ If members with special healthcare needs were excluded, provide the rationale for the exclusion. |
| **Diagnosis/procedure/pharmacy/billing codes used to identify the eligible population (if applicable):** Denominator specifications in accordance with 2023 CMS Core Measure: Follow-Up After Emergency Department Visit for Substance Use (FUA-AD, FUA-CH) (Attachment C, D) and Value Sets (Attachment A, B). |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 4: Use Sound Sampling Methods.** If sampling is used to select members of the population (denominator), proper sampling methods are necessary to ensure valid and reliable results. Sampling methods must be in accordance with generally accepted principles of research design and statistical analysis. If sampling was not used, please leave table blank and document that sampling was not used in the space provided below the table.

**The description of the sampling methods must:**

- Include components identified in the table below.
- Be updated annually for each measurement period and for each indicator.
- Include a detailed narrative description of the methods used to select the sample and ensure sampling methods support generalizable results.

| Measurement Period | Performance Indicator Title | Sampling Frame Size | Sample Size | Margin of Error and Confidence Level |
|---|---|---|---|---|
| | | | | |

**Describe in detail the methods used to select the sample:** Sampling was not used in this PIP.

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
## *Follow-Up After Emergency Department Visit for Substance Use (FUA)*
## for Health Colorado, Inc. (RAE 4)

**Step 5: Select the Performance Indicator(s).** A performance indicator is a quantitative or qualitative characteristic or variable that reflects a discrete event or a status that is to be measured. The selected indicator(s) must track performance or improvement over time. The indicator(s) must be objective, clearly, and unambiguously defined, and based on current clinical knowledge or health services research.

**The description of the Indicator(s) must:**

- Include the complete title of each indicator.
- Include the rationale for selecting the indicator(s).
- Include a narrative description of each numerator and denominator.
- If indicator(s) are based on nationally recognized measures (e.g., HEDIS, CMS Core Set), include the year of the technical specifications used for the applicable measurement year and update the year annually.
- Include complete dates for all measurement periods (with the month, day, and year).
- Include the mandated goal or target, if applicable. If no mandated goal or target enter "Not Applicable."

| | |
|---|---|
| *Indicator 1* | **Follow-Up After Emergency Department Visit for Substance Use (FUA)** |
| | **This indicator is endorsed by the National Committee for Quality Assurance (NCQA) as a CMS Core Measure. This illustrates the validity of this indicator as a measure of impact on this at-risk population. Use of this national standard specification also allows comparison with similar insured populations across the nation. (2023 Child and Adult Resource and Technical Specifications will be used.)** |
| **Numerator Description:** | Number of members aged 13 and older with a qualifying follow-up visit within 7 days of an ED visit with a principal diagnosis of substance use disorder (SUD), or any diagnosis of drug overdose, (8 total days). |
| **Denominator Description:** | Number of members aged 13 and older with an ED visit that includes a principal diagnosis of substance use disorder (SUD), or any diagnosis of drug overdose. |
| **Baseline Measurement Period** | 07/01/2022 to 06/30/2023 |
| **Remeasurement 1 Period** | 07/01/2023 to 06/30/2024 |
| **Remeasurement 2 Period** | 07/01/2024 to 06/30/2025 |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Step 5: Select the Performance Indicator(s).** A performance indicator is a quantitative or qualitative characteristic or variable that reflects a discrete event or a status that is to be measured. The selected indicator(s) must track performance or improvement over time. The indicator(s) must be objective, clearly, and unambiguously defined, and based on current clinical knowledge or health services research.

**The description of the Indicator(s) must:**

- Include the complete title of each indicator.
- Include the rationale for selecting the indicator(s).
- Include a narrative description of each numerator and denominator.
- If indicator(s) are based on nationally recognized measures (e.g., HEDIS, CMS Core Set), include the year of the technical specifications used for the applicable measurement year and update the year annually.
- Include complete dates for all measurement periods (with the month, day, and year).
- Include the mandated goal or target, if applicable. If no mandated goal or target enter "Not Applicable."

| | |
|---|---|
| **Mandated Goal/Target, if applicable** | N/A |
| *Indicator 2* | **[Enter Indicator title]** |
| | **[Insert a narrative description, and the rationale for selection, of the indicator. Describe the basis on which the indicator was developed, if internally developed.]** |
| **Numerator Description:** | |
| **Denominator Description:** | |
| **Baseline Measurement Period** | MM/DD/YYYY to MM/DD/YYYY |
| **Remeasurement 1 Period** | MM/DD/YYYY to MM/DD/YYYY |
| **Remeasurement 2 Period** | MM/DD/YYYY to MM/DD/YYYY |
| **Mandated Goal/Target, if applicable** | |
| **Use this area to provide additional information.** | |

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
## *Follow-Up After Emergency Department Visit for Substance Use (FUA)*
## for Health Colorado, Inc. (RAE 4)

**Step 6: Valid and Reliable Data Collection.** The data collection process must ensure that data collected for each indicator are valid and reliable.

**The data collection methodology must include the following:**

- Identification of data elements and data sources.
- When and how data are collected.
- How data are used to calculate the indicator percentage.
- A copy of the manual data collection tool, if applicable.
- An estimate of the reported administrative data completeness percentage and the process used to determine this percentage.

**Data Sources (Select all that apply)**

| | | |
|---|---|---|
| [ ]Manual Data<br>Data Source<br>[ ] Paper medical record abstraction<br>[ ] Electronic health record abstraction<br>Record Type<br>[ ] Outpatient<br>[ ] Inpatient<br>[ ] Other, please explain in narrative section.<br><br>[ ] Data collection tool attached (required for manual record review) | [ X ] Administrative Data<br>Data Source<br>[ X ] Programmed pull from claims/encounters<br>[ ] Supplemental data<br>[ ] Electronic health record query<br>[ ] Complaint/appeal<br>[ X ] Pharmacy data<br>[ ] Telephone service data/call center data<br>[ ] Appointment/access data<br>[ ] Delegated entity/vendor data _____<br>[ ] Other _____<br><br>Other Requirements<br>[ X ] Codes used to identify data elements (e.g., ICD-10, CPT codes)- please attach separately.<br>[ X ] Data completeness assessment attached.<br>[ ] Coding verification process attached. | [ ] Survey Data<br>Fielding Method<br>[ ] Personal interview<br>[ ] Mail<br>[ ] Phone with CATI script<br>[ ] Phone with IVR<br>[ ] Internet<br>[ ] Other<br>_____<br><br>Other Survey Requirements:<br>Number of waves: _____<br>Response rate: _____<br>Incentives used: _____ |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

| **Step 6: Valid and Reliable Data Collection.** The data collection process must ensure that data collected for each indicator are valid and reliable.<br>**The data collection methodology must include the following:**<br>◆ Identification of data elements and data sources.<br>◆ When and how data are collected.<br>◆ How data are used to calculate the indicator percentage.<br>◆ A copy of the manual data collection tool, if applicable.<br>◆ An estimate of the reported administrative data completeness percentage and the process used to determine this percentage. | | |
|---|---|---|
| | Estimated percentage of reported administrative data completeness at the time the data are generated: 97.12 % complete.<br><br>Data Completeness Calculation (Attachment E): Baseline performance was calculated using the monthly claims & encounter data feed available 60 days from the last date of the performance period. Accordingly, data completeness calculation was performed to estimate the average data completeness available at the 60 day point. 90-day lag is the end point established by the Department for final performance measure calculations<br><br>- Claims processed between 1/1/22 and 12/31/22 were included in this sample for calculation as it represented a period that all claims would have been resolved at the time of calculation.<br><br>- Dental claims were excluded as they were the only claim type not included in value sets associated with PIP performance measures<br><br>- Denominator: Count of all-inclusive claims processed in the timeframe above<br><br>- Numerator at 90 days: Count of all-inclusive claims processed in time frame above that were completed in 90 days following the date of submission | |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| |
|---|
| **Step 6: Valid and Reliable Data Collection.** The data collection process must ensure that data collected for each indicator are valid and reliable.<br>**The data collection methodology must include the following:**<br>◆ Identification of data elements and data sources.<br>◆ When and how data are collected.<br>◆ How data are used to calculate the indicator percentage.<br>◆ A copy of the manual data collection tool, if applicable.<br>◆ An estimate of the reported administrative data completeness percentage and the process used to determine this percentage. |

| | | |
|---|---|---|
| | - Numerator at 60 days: Count of all-inclusive claims processed in time frame above that were completed in 60 days following the date of submission<br>- Numerator was divided by Denominator and expressed as a percentage | |

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
## *Follow-Up After Emergency Department Visit for Substance Use (FUA)*
## for Health Colorado, Inc. (RAE 4)

| In the space below, describe the step-by-step data collection process used in the production of the indicator results: |
|---|

**Data Elements Collected:**

- Member ID
- ED Date
- Age
- Denominator Revenue Code
- Denominator Service Code
- Denominator Diagnosis Code
- Denominator Provider Number
- Denominator Rendering Provider
- Follow-up Date
- Follow-up Service Code
- Follow-up Revenue Code
- Follow-up Diagnosis Code
- Follow-up POS Code
- Follow-up NDC Code
- Follow-up Provider Number

**Data Collection Process:**

Data from submitted claims and encounters will be used in conjunction with the FUA FFY 2023 Child and Adult Resource and Technical Specification as well as the FFY 2023 Adult and Child Core Set HEDIS Value Set Directory to identify qualifying events and exclusions.

1. Denominator: Identify ED visits for members aged 13 and older with a principal diagnosis of SUD or any diagnosis of drug overdose on or between July 1st and May 31st.
2. Denominator: Identify exclusions which include ED visits that result in inpatient stays, admission to acute or nonacute inpatient care setting on or within 30 days after the ED visit, or members in or using hospice anytime during the measurement period.
3. Denominator: Identify members who had more than one ED visit in a 31-day period and only include the first eligible visit.

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| In the space below, describe the step-by-step data collection process used in the production of the indicator results: |
|---|
| 4. Denominator: Identify members who were not continuously enrolled on the date of the ED visit through 30 days after the ED visit (31 days total) with no gaps and exclude these ED visits.<br>5. Numerator: Identify follow-up visits or pharmacotherapy dispensing events within 7 days after the ED visits (8 total days) including visits and pharmacotherapy events that occur on the dates of the ED visit.<br>6. Percentage of members who received a follow-up visit within 7 days after an ED visit with a principal diagnosis of substance use or any diagnosis of drug overdose: Divide the numerator by denominator to calculate the percentage of members who received a follow up within 7 days of the ED visit. |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Step 7: Indicator Results.** Enter the results of the indicator(s) in the table below. For HEDIS-based/CMS Core Set PIPs, the data reported in the PIP Submission Form should match the validated performance measure rate(s).
Enter results for each indicator by completing the table below. *P* values must be reported to four decimal places (i.e., 0.1234). Additional remeasurement period rows can be added, if necessary.

**Indicator 1 Title: Follow-Up After Emergency Department Visit for Substance Use (7-day)**

| Measurement Period | Indicator Measurement | Numerator | Denominator | Percentage | Mandated Goal or Target, if applicable | Statistical Test Used, Statistical Significance, and *p* Value |
|---|---|---|---|---|---|---|
| 07/01/2022 to 06/30/2023 | Baseline | 410 | 1573 | 26.1% | N/A for baseline | N/A for baseline |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 1 | | | | | |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 2 | | | | | |

**Indicator 2 Title: [Enter title of indicator]**

| Time Period | Indicator Measurement | Numerator | Denominator | Percentage | Mandated Goal or Target , if applicable | Statistical Test, Statistical Significance, and *p* Value |
|---|---|---|---|---|---|---|
| MM/DD/YYYY–MM/DD/YYYY | Baseline | | | | N/A for baseline | N/A for baseline |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 1 | | | | | |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 2 | | | | | |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Step 7: Data Analysis and Interpretation of Results.** Clearly document the results for each indicator(s). Describe the data analysis performed, the results of the statistical analysis, and a narrative interpretation of the results.

**The data analysis and interpretation of indicator results must include the following for each measurement period:**

- Data presented clearly, accurately, and consistently in both table and narrative format.
- A clear and comprehensive narrative description of the data analysis process, the percentage achieved for the measurement period for each indicator, and the type of two-tailed statistical test used. Statistical testing *p* value results must be calculated and reported to four decimal places (e.g., 0.1234).
- Statistical testing must be conducted starting with Remeasurement 1 and comparing to the baseline. For example, Remeasurement 1 to the baseline and Remeasurement 2 to the baseline. For purposes of the validation, statistical testing does not need to be conducted between measurement periods (e.g., Remeasurement 1 to Remeasurement 2).
- Discussion of any random, year-to-year variations; population changes; sampling errors; or statistically significant increases or decreases that occurred during the remeasurement process.
- A statement indicating whether factors that could threaten (a) the validity of the findings for each measurement period, including the baseline, and (b) the comparability of each remeasurement period to the baseline was identified. If there were no factors identified, this must be documented in Step 7.

**Baseline Narrative:**

Baseline data was collected in accordance with 2023 CMS Core Measure Specifications for the Follow-up After Emergency Department Visit For Substance Use (FUA) measure for the measurement period July 1, 2022, through June 30, 2023 (SFY22-23) for Medicaid members in RAE 4 (Health Colorado, Inc.) The total population included 1,573 eligible member-ED encounters for substance use or drug overdose. Of this population, 410 completed an appropriate follow-up within 7 days of the ED visit. This resulted in a completion rate of 26.1%.

The goal established was formulated using a 2-tailed normal distribution with a p-value of 0.05 using baseline sample size.

Code to calculate measure performance was written by Data, Analytics & Reporting (DAR) staff to match CMS measure specifications. The reporting period for the baseline (i.e., SFY22-23) does not match the HEDIS specification (i.e., CY22) and a certified HEDIS measure engine was not able to be utilized. As this measure is a new BHIP measure in SFY23-24, HCI has not had the opportunity to validate member-level data with the Department and there is potential for minor coding or data source inconsistencies.

**Baseline to Remeasurement 1 Narrative:**

**Baseline to Remeasurement 2 Narrative:**

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*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
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**Step 8: Improvement Strategies**. Interventions are developed to target and address causes/barriers identified through the use of quality improvement (QI) processes and tools.

The documentation of Step 8 is organized into the following three sections:

A. Quality Improvement (QI) Team and Activities Narrative Description
B. Barriers/Interventions Table: Prioritized barriers and corresponding intervention descriptions
C. Intervention Worksheet:
   - Intervention Description
   - Intervention Effectiveness Measure
   - Intervention Evaluation Results - Clinical and Programmatic Improvement
   - Intervention Status

**A. Quality Improvement (QI) Team and Activities Narrative Description**

**QI Team Members:**

Edward Arnold- Clinical Quality Audit Analyst, Sr
Michaela Smyth- Clinical Quality Audit Analyst, Sr
John Mahalik- Director, Quality Management
Kaylanne Chandler- Director of Care Management Operations
Christine Anderson- Health Promotion Manager
Brian Hill- Medical Director
Michael Clark- Data Analytics and Reporting
Melissa Schuchmann- Business Information Analyst II
Teresa Braden- VP of Quality/Chief Quality Officer, Chief of Medicine
Amelia Vigil- Director of Medical Staff Services, Parkview Medical Center
Brad Roberts- Medical Officer, Pueblo Department of Public Health & Environment
LeAnna Pacheco- Vice President of Quality Improvement and Project Management, Health Solutions
Teah Miller- Vice President of Specialty Services, Health Solutions

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*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
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**Step 8: Improvement Strategies**. Interventions are developed to target and address causes/barriers identified through the use of quality improvement (QI) processes and tools.

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C. Intervention Worksheet:
   - Intervention Description
   - Intervention Effectiveness Measure
   - Intervention Evaluation Results - Clinical and Programmatic Improvement
   - Intervention Status

Kristi Spinuzzi- Clinical Care Coordinator, Parkview Medical Center

Melanie Vigil- Project Manager, Parkview Medical Center

Shanalee Ourso- Lead Behavioral Health Evaluator, Parkview Medical Center

**QI process and/or tools used to identify and prioritize barriers:**

One or more of the following process improvement methods/tools may be used during the PIP. The key driver diagram created by the PIP team is found at Attachment F.

- Identify Aim Statement
- Assemble QI team.
- Brainstorm
- Process Mapping
- Key Driver Diagram
- Failure Modes & Effects Analysis
- PDSA Cycle

**B. Barriers/Interventions Table:** In the table below, list interventions currently being evaluated, and barrier(s) addressed by each intervention. For each intervention, complete a Step 8 Intervention Worksheet. The worksheet must be completed to the point of intervention progression at the time of the annual PIP submission.

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*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Step 8: Improvement Strategies**. Interventions are developed to target and address causes/barriers identified through the use of quality improvement (QI) processes and tools.

The documentation of Step 8 is organized into the following three sections:

A. Quality Improvement (QI) Team and Activities Narrative Description
B. Barriers/Interventions Table: Prioritized barriers and corresponding intervention descriptions
C. Intervention Worksheet:
   - Intervention Description
   - Intervention Effectiveness Measure
   - Intervention Evaluation Results - Clinical and Programmatic Improvement
   - Intervention Status

| Intervention Title | Barrier(s) Addressed |
|---|---|
| Revise Behavioral Health Referral Mechanism | Loss of referral application |
| Peer Specialist on-site in Emergency Department | Precontemplative/Contemplative member |
| Screening, Brief Intervention, Referral to Treatment (SBIRT) protocol | Non-standard messaging on intervention and referral |
| Care coordinator/care navigator on-site in Emergency Department | Social needs / Lack of Knowledge |
| Medication Assisted Treatment (MAT) training/protocols | Physician preference/Lack of knowledge |

**C. Intervention Worksheet: Intervention Effectiveness Measure and Evaluation Results**
Complete a Step 8 Intervention Worksheet for each intervention currently being evaluated. The worksheet must be completed to the point of intervention progression at the time of the annual PIP submission.

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
## *Social Determinants of Health (SDOH) Screening*
## for Health Colorado, Inc. (RAE 4)

| Demographic Information | | |
|---|---|---|
| MCO Name: Health Colorado, Inc (RAE 4) | | |
| Project Leader Name: Edward Arnold | Title: Performance Improvement Analyst | |
| Telephone Number: 719-666-0540 | Email Address: edward.arnold@carelon.com | |
| PIP Title: *Social Determinants of Health (SDOH) Screening* | | |
| Submission Date: 10/31/23 | | |
| Resubmission Date (if applicable): 1/2/24 | | |

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
### *Social Determinants of Health (SDOH) Screening*
### for Health Colorado, Inc. (RAE 4)

**Step 1: Select the PIP Topic.** The topic should be selected based on data that identify an opportunity for improvement. The goal of the project should be to improve member health, functional status, and/or satisfaction. The topic may also be required by the State.

**PIP Topic:** Social Determinants of Health (SDoH) Screening Among Behavioral Health (BH) Utilizers

**Provide plan-specific data:**

Although individual providers certainly identified and addressed SDoH when they impacted an individual plan of care, Health Colorado, Inc (HCI/R4) only comprehensively implemented SDoH screening throughout a specific portion of the HCI membership (i.e., members receiving care coordination services as part of a full intake assessment) in SFY22-23. Regarding the calculation of the denominator for this PIP, HCI monitored BH utilization as part of a Key Performance Indicator (KPI) in SFY22-23.

R4 members who had a BH encounter 7/1/22-6/30/23: 31,955.

Number of these members screened for SDoH (Housing, Food, Transportation, Utilities): 931

Baseline performance for SDoH screening: 2.91%.

Within this baseline period, a sizeable portion of the behavioral health utilizing population (27.36%) are also part of a care coordination cohort (i.e., Care Management, Care Navigation, Low Risk Care Coordination). This group represents a major opportunity to identify social needs as the care coordination staff is uniquely trained to not only connect members with needed resources, but also to facilitate self-management support through motivational interviewing and goal-setting. Unfortunately, this baseline data revealed that despite this significant overlapping population, many members in this group did not have the Care Coordination Intake initiated and of that smaller group that did, more than half had the intake terminated prior to the completion of the Full Intake that includes the full SDoH screening.

| | | % of BH Utilizers |
|---|---|---|
| R4 members who had a BH encounter | 31,955 | ---------- |
| R4 members who had a BH encounter AND in a Care Coordination Cohort | 8,742 | 27.36% |
| R4 members who had a BH encounter, in a Care Coordination Cohort, AND Care Coordination Intake Initiated | 1,793 | 5.61% |
| R4 members who had a BH encounter, in a Care Coordination Cohort, AND Full Care Coordination Intake Completed | 931 | 2.91% |

## *Appendix A*: State of Colorado 2023-24 PIP Submission Form
### *Social Determinants of Health (SDOH) Screening*
### for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 1: Select the PIP Topic.** The topic should be selected based on data that identify an opportunity for improvement. The goal of the project should be to improve member health, functional status, and/or satisfaction. The topic may also be required by the State.

**Describe how the PIP topic has the potential to improve member health, functional status, and/or satisfaction:**

Evidence shows that non-medical factors such as housing instability and food insecurity impact health care utilization and health outcomes (Kushel et al, 2001; Ma et al, 2008). Food insecurity has been shown to be more highly correlated with chronic illness than income (Gregory & Coleman-Jensen, 2017). Standardized screening tools to identify SDoH needs have been established and tested as part of the CMS Accountable Healthcare Communities model. Five years after implementation of this model, early results have reported that over a third of individuals screened identified at least one health-related social need. Although not part of this initial PIP cycle, through increased use of standardized screening tools and workflows it becomes possible to initiate potentially valuable interventions and connections to social supports that may address identified needs. HCI has a unique opportunity to impact our population of members through our diverse connections to community resources, partners and innovative programs supported through our community reinvestment grants. At a population level, increased screening for SDoH with the aggregation of results will further allow HCI to understand the complex needs across our region and potentially leverage existing partnerships or support new initiatives.

1. Kushel MB, Vittinghoff E, Haas JS. Factors associated with the health care utilization of homeless persons. JAMA 2001;285(2):200–6.
2. Ma CT, Gee L, Kushel MB. Associations between housing instability and food insecurity with health care access in low-income children. Ambul Pediatr 2008;8(1):50–7.
3. Gregory, CA & Coleman-Jensen, A. (2017). Food Insecurity, Chronic Disease, and Health Among Working-Age Adults. Economic Research Report No. (ERR-235) 31 pp.

*Appendix A*: State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 2: Define the PIP Aim Statement(s).** Defining the Aim statement(s) helps maintain the focus of the PIP and sets the framework for data collection, analysis, and interpretation.

**The statement(s) should:**

- Be structured in the recommended X/Y format: "Does doing X result in Y?"
- The statement(s) must be documented in clear, concise, and measurable terms.
- Be answerable based on the data collection methodology and indicator(s) of performance.

**Statement(s):**

Does implementing a deliberate, iterative performance improvement process result in increased rates of screening for Social Determinants of Health (SDoH) among behavioral health utilizers in RAE 4 from 2.91%.to 3.18% by June 30, 2025?

1.

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 3: Define the PIP Population.** The PIP population must be clearly defined to represent the population to which the PIP Aim statement(s) and indicator(s) apply.

**The population definition must:**

- Include the requirements for the length of enrollment, continuous enrollment, new enrollment, and allowable gap criteria.
- Include the age range and the anchor dates used to identify age criteria, if applicable.
- Include all inclusion, exclusion, and diagnosis criteria used to identify the eligible population.
- Include a list of diagnosis/procedure/pharmacy/billing codes used to identify the eligible population, if applicable. Codes identifying numerator compliance should not be provided in Step 3.
- Capture all members to whom the statement(s) applies.
- Include how race and ethnicity will be identified, if applicable.
- If members with special healthcare needs were excluded, provide the rationale for the exclusion.

**Population definition:** Distinct RAE 4 members who received at least one behavioral health service delivered in a primary care setting within the 12-month evaluation period or under the Capitated Behavioral Health Benefit within the 12-month evaluation period.

**Enrollment requirements (if applicable):**

Length of Enrollment: No minimum enrollment.

Continuous Enrollment: No continuous enrollment requirement.

**Member age criteria (if applicable):** No age limitation.

**Inclusion, exclusion, and diagnosis criteria:**

Inclusion: Enrollment in RAE 4 (Health Colorado, Inc.) on the last day of measurement period

**Diagnosis/procedure/pharmacy/billing codes used to identify the eligible population (if applicable):**

Members with either FFS claim for BH service ('90791','90832','90834','90837','90846','90847') or any encounter using the Capitated Behavioral Health Benefit.

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
### *Social Determinants of Health (SDOH) Screening*
### for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 4: Use Sound Sampling Methods.** If sampling is used to select members of the population (denominator), proper sampling methods are necessary to ensure valid and reliable results. Sampling methods must be in accordance with generally accepted principles of research design and statistical analysis. If sampling was not used, please leave table blank and document that sampling was not used in the space provided below the table.

**The description of the sampling methods must:**

- Include components identified in the table below.
- Be updated annually for each measurement period and for each indicator.
- Include a detailed narrative description of the methods used to select the sample and ensure sampling methods support generalizable results.

| Measurement Period | Performance Indicator Title | Sampling Frame Size | Sample Size | Margin of Error and Confidence Level |
|---|---|---|---|---|
| | | | | |
| | | | | |
| | | | | |
| | | | | |

**Describe in detail the methods used to select the sample:** Sample was not used in this PIP.

## *Appendix A:* State of Colorado 2023-24 PIP Submission Form
### *Social Determinants of Health (SDOH) Screening*
### for Health Colorado, Inc. (RAE 4)

**Step 5: Select the Performance Indicator(s).** A performance indicator is a quantitative or qualitative characteristic or variable that reflects a discrete event or a status that is to be measured. The selected indicator(s) must track performance or improvement over time. The indicator(s) must be objective, clearly, and unambiguously defined, and based on current clinical knowledge or health services research.

**The description of the Indicator(s) must:**

- Include the complete title of each indicator.
- Include the rationale for selecting the indicator(s).
- Include a narrative description of each numerator and denominator.
- If indicator(s) are based on nationally recognized measures (e.g., HEDIS, CMS Core Set), include the year of the technical specifications used for the applicable measurement year and update the year annually.
- Include complete dates for all measurement periods (with the month, day, and year).
- Include the mandated goal or target, if applicable. If no mandated goal or target enter "Not Applicable."

| | |
|---|---|
| *Indicator 1* | **Social Determinants of Health (SDoH) Screening Among Behavioral Health Utilizers** |
| | This internal indicator was created to capture the criteria indicated by HCPF/HSAG during statewide meetings (i.e., PIAC) and Technical Assistance (TA) call with HSAG. |
| **Numerator Description:** | Sum of **disti**nct members from the denominator who received a screening for Social Determinants of Health (SDoH) including all four (4) domains: Food insecurity, Housing, Utilities, Transportation within the 12-month evaluation period |
| **Denominator Description:** | Sum of **disti**nct members who received at least one behavioral health service delivered in a primary care setting within the 12-month evaluation period or under the Capitated Behavioral Health Benefit within the 12-month evaluation period. |
| **Baseline Measurement Period** | 07/01/2022 to 06/30/2023 |
| **Remeasurement 1 Period** | 07/01/2023 to 06/30/2024 |
| **Remeasurement 2 Period** | 07/01/2024 to 06/30/2025 |
| **Mandated Goal/Target, if applicable** | No mandated goal exists for this PIP measure. |
| *Indicator 2* | **[Enter Indicator title]** |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

**Step 5: Select the Performance Indicator(s).** A performance indicator is a quantitative or qualitative characteristic or variable that reflects a discrete event or a status that is to be measured. The selected indicator(s) must track performance or improvement over time. The indicator(s) must be objective, clearly, and unambiguously defined, and based on current clinical knowledge or health services research.

**The description of the Indicator(s) must:**

- Include the complete title of each indicator.
- Include the rationale for selecting the indicator(s).
- Include a narrative description of each numerator and denominator.
- If indicator(s) are based on nationally recognized measures (e.g., HEDIS, CMS Core Set), include the year of the technical specifications used for the applicable measurement year and update the year annually.
- Include complete dates for all measurement periods (with the month, day, and year).
- Include the mandated goal or target, if applicable. If no mandated goal or target enter "Not Applicable."

| | **[Insert a narrative description, and the rationale for selection, of the indicator. Describe the basis on which the indicator was developed, if internally developed.]** |
|---|---|
| **Numerator Description:** | |
| **Denominator Description:** | |
| **Baseline Measurement Period** | MM/DD/YYYY to MM/DD/YYYY |
| **Remeasurement 1 Period** | MM/DD/YYYY to MM/DD/YYYY |
| **Remeasurement 2 Period** | MM/DD/YYYY to MM/DD/YYYY |
| **Mandated Goal/Target, if applicable** | |
| **Use this area to provide additional information.** | |

## *Appendix A*: State of Colorado 2023-24 PIP Submission Form
### *Social Determinants of Health (SDOH) Screening*
### for Health Colorado, Inc. (RAE 4)

**Step 6: Valid and Reliable Data Collection.** The data collection process must ensure that data collected for each indicator are valid and reliable.

**The data collection methodology must include the following:**

- Identification of data elements and data sources.
- When and how data are collected.
- How data are used to calculate the indicator percentage.
- A copy of the manual data collection tool, if applicable.
- An estimate of the reported administrative data completeness percentage and the process used to determine this percentage.

**Data Sources (Select all that apply)**

| | | |
|---|---|---|
| [ ]Manual Data<br>Data Source<br>[ ] Paper medical record abstraction<br>[ ] Electronic health record abstraction<br>Record Type<br>[ ] Outpatient<br>[ ] Inpatient<br>[ ] Other, please explain in narrative section.<br><br>[ ] Data collection tool attached (required for manual record review) | [ X ] Administrative Data<br>Data Source<br>[ X ] Programmed pull from claims/encounters<br>[ ] Supplemental data<br>[ X ] Electronic health record query<br>[ ] Complaint/appeal<br>[ ] Pharmacy data<br>[ ] Telephone service data/call center data<br>[ ] Appointment/access data<br>[ ] Delegated entity/vendor data _____<br>[ ] Other _____<br><br>Other Requirements<br>[ X ] Codes used to identify data elements (e.g., ICD-10, CPT codes)- please attach separately.<br>[ X ] Data completeness assessment attached.<br>[ ] Coding verification process attached.<br><br>Estimated percentage of reported administrative data completeness at the time the data are generated: 97.12 % complete. | [ ] Survey Data<br>Fielding Method<br>[ ] Personal interview<br>[ ] Mail<br>[ ] Phone with CATI script<br>[ ] Phone with IVR<br>[ ] Internet<br>[ ] Other<br>_____<br><br>Other Survey Requirements:<br>Number of waves: _____<br>Response rate: _____<br>Incentives used: _____ |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**In the space below, describe the step-by-step data collection process used in the production of the indicator results:**

**Data Elements Collected:**

- Member ID
- Date of Service
- IPN BH Claim Status
- BH Encounter Status
- FFS Service Code
- Care Coordination Cohort
- Care Coordination Intake Status
- Care Coordination Intake Status Date

**Data Collection Process:**

In order to obtain the data for the performance improvement project Andrea Scott followed the steps below to obtain the data set. A mixture of submitted claims and encounters were used as the source for data during the 12 month measurement period.

1. Denominator – Determine all distinct members who received at least one behavioral health service delivered in a primary care setting within the 12-month evaluation period or under the Capitated Behavioral Health Benefit within the 12-month evaluation period. All ACC enrollees as of the last day of the measurement period were evaluated for BH visit within the primary care setting within the measurement period billed a Fee For Service (BH in PC Value Set at Attachment G), a BH encounter billed by a physical health managed care entity, or any BH encounter within the measurement period.
2. Numerator – Determine all members from denominator who received a full care coordination intake documented in Essette (HCI care coordination record) as the PRAPARE is included in this assessment. The PRAPARE questionnaire (National Association of Community Health Centers Inc, 2019) is a validated SDoH assessment tool at Attachment H. A cross-walk of questions from the PRAPARE to the full care coordination intake is at Attachment I.
3. Join the Denominator with the Numerator to calculate the screening percentage.

The baseline period for the denominator was determined using methodology similar to Colorado Key Performance Indicator (KPI) measure specification for Behavioral Health (BH) Engagement for the measurement period July 1, 2022, through June 30, 2023. This captured the "behavioral health utilizers" per HCPF/HSAG tasking.

Although some assessment for SDoH occurs throughout the RAE within both physical health and behavioral health settings, the only setting where SDoH screening occurred during the baseline period consistently and with data aggregation is the population receiving care coordination services. The standardized HCI care coordination intake tool begins with the What Matters Index (WMI) as a high-level screening tool to identify potential health service's needs (Wasson, et al, 2018). If members screen positive on this tool or the care coordinator believes there would be value in completing the full intake assessment, the full intake tool is completed. A validated SDoH screening tool

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

| In the space below, describe the step-by-step data collection process used in the production of the indicator results: |
|---|
| (PRAPARE) is embedded within the full intake assessment. The PRAPARE tool and a crosswalk of questions from the PRAPARE to the HCI care coordination intake is found at Attachments F and G.<br>The distinct count of members from the denominator who had the full HCI care coordination intake completed comprised the numerator for the baseline calculation.<br>The goal established was formulated using a 2-tailed normal distribution with a p-value of 0.05 using baseline sample size.<br><br>National Association of Community Health Centers Inc, Association of Asian Pacific Community Health Organizations, Oregon Primary Care Association, et al. PRAPARE: Protocol for Responding to and Assessing Patient Assets, Risks, and Experiences. 2016. [Accessed September 5, 2019]. Available at: http://www.nachc.org/wp-content/uploads/2018/05/PRAPARE_One_Pager_Sept_2016.pdf.<br>Wasson JH, Ho L, Soloway L, Moore LG. Validation of the What Matters Index: A brief, patient-reported index that guides care for chronic conditions and can substitute for computer-generated risk models. PLoS One. 2018 Feb 22;13(2)<br>Data Completeness Calculation (Attachment D): Baseline performance was calculated using the monthly claims & encounter data feed available 60 days from the last date of the performance period. Accordingly, data completeness calculation was performed to estimate the average data completeness available at the 60 day point. 90-day lag is the end point established by the Department for final performance measure calculations<br>- Claims processed between 1/1/22 and 12/31/22 were included in this sample for calculation as it represented a period that all claims would have been resolved at the time of calculation.<br>- Dental claims were excluded as they were the only claim type not included in value sets associated with PIP performance measures<br>- Denominator: Count of all-inclusive claims processed in the timeframe above<br>- Numerator at 90 days: Count of all-inclusive claims processed in time frame above that were completed in 90 days following the date of submission<br>- Numerator at 60 days: Count of all-inclusive claims processed in time frame above that were completed in 60 days following the date of submission<br>- Numerator was divided by Denominator and expressed as a percentage |

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

**Step 7: Indicator Results.** Enter the results of the indicator(s) in the table below. For HEDIS-based/CMS Core Set PIPs, the data reported in the PIP Submission Form should match the validated performance measure rate(s).

Enter results for each indicator by completing the table below. *P* values must be reported to four decimal places (i.e., 0.1234). Additional remeasurement period rows can be added, if necessary.

**Indicator 1 Title: Social Determinants of Health (SDoH) Screening Among Behavioral Health Utilizers**

| Measurement Period | Indicator Measurement | Numerator | Denominator | Percentage | Mandated Goal or Target, if applicable | Statistical Test Used, Statistical Significance, and *p* Value |
|---|---|---|---|---|---|---|
| 07/01/2022 to 06/30/2023 | Baseline | 931 | 31,955 | 2.91% | N/A for baseline | N/A for baseline |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 1 | | | | | |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 2 | | | | | |

**Indicator 2 Title: [Enter title of indicator]**

| Time Period | Indicator Measurement | Numerator | Denominator | Percentage | Mandated Goal or Target, if applicable | Statistical Test, Statistical Significance, and *p* Value |
|---|---|---|---|---|---|---|
| MM/DD/YYYY–MM/DD/YYYY | Baseline | | | | N/A for baseline | N/A for baseline |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 1 | | | | | |
| MM/DD/YYYY–MM/DD/YYYY | Remeasurement 2 | | | | | |

## *Appendix A*: State of Colorado 2023-24 PIP Submission Form
### *Social Determinants of Health (SDOH) Screening*
### for Health Colorado, Inc. (RAE 4)

**Step 7: Data Analysis and Interpretation of Results.** Clearly document the results for each indicator(s). Describe the data analysis performed, the results of the statistical analysis, and a narrative interpretation of the results.

**The data analysis and interpretation of indicator results must include the following for each measurement period:**

- Data presented clearly, accurately, and consistently in both table and narrative format.
- A clear and comprehensive narrative description of the data analysis process, the percentage achieved for the measurement period for each indicator, and the type of two-tailed statistical test used. Statistical testing *p* value results must be calculated and reported to four decimal places (e.g., 0.1234).
- Statistical testing must be conducted starting with Remeasurement 1 and comparing to the baseline. For example, Remeasurement 1 to the baseline and Remeasurement 2 to the baseline. For purposes of the validation, statistical testing does not need to be conducted between measurement periods (e.g., Remeasurement 1 to Remeasurement 2).
- Discussion of any random, year-to-year variations; population changes; sampling errors; or statistically significant increases or decreases that occurred during the remeasurement process.
- A statement indicating whether factors that could threaten (a) the validity of the findings for each measurement period, including the baseline, and (b) the comparability of each remeasurement period to the baseline was identified. If there were no factors identified, this must be documented in Step 7.

**Baseline Narrative:**

Behavioral health utilizers were identified as the target population for SDoH screening. Behavioral health utilizers were defined as HCI members who had a behavioral health fee-for-service claim (90791, 90832, 90834, 90837, 90846, 90847) or any capitated behavioral health benefit encounter. A total of 31,955 HCI members utilized behavioral health services in the baseline period (July 1, 2022 – June 30, 2023). During the baseline period, 931 members in the behavioral health utilizer cohort were screened for SDoH needs as part of the full care coordination intake questionnaire for members receiving care coordination services. This resulted in a screening rate of 2.91% for the baseline period.

Upon review of the process for data collection, the only threat to validity of the baseline data was the potential for members to have declined to respond to individual questions on the PRAPARE tool (e.g., not willing to share issues with housing insecurity). HCI is working with our data team to be able to itemize and analyze individual question responses to determine if this represents a significant factor. If indicated, additional exploration for potential targeted training may be considered.

**Baseline to Remeasurement 1 Narrative:**

**Baseline to Remeasurement 2 Narrative:**

*Appendix A:* State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

**Step 8: Improvement Strategies.** Interventions are developed to target and address causes/barriers identified through the use of quality improvement (QI) processes and tools.

The documentation of Step 8 is organized into the following three sections:

A. Quality Improvement (QI) Team and Activities Narrative Description
B. Barriers/Interventions Table: Prioritized barriers and corresponding intervention descriptions
C. Intervention Worksheet:
   - Intervention Description
   - Intervention Effectiveness Measure
   - Intervention Evaluation Results - Clinical and Programmatic Improvement
   - Intervention Status

**A. Quality Improvement (QI) Team and Activities Narrative Description**

**QI Team Members:**

Edward Arnold- Clinical Quality Audit Analyst, Sr
Michaela Smyth- Clinical Quality Audit Analyst, Sr
John Mahalik- Director, Quality Management
Kaylanne Chandler- Director of Care Management Operations
Christine Anderson- Health Promotion Manager
Brian Hill- Medical Director
Michael Clark- Data Analytics and Reporting
Melissa Schuchmann- Business Information Analyst II

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*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 8: Improvement Strategies.** Interventions are developed to target and address causes/barriers identified through the use of quality improvement (QI) processes and tools.

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   - Intervention Effectiveness Measure
   - Intervention Evaluation Results - Clinical and Programmatic Improvement
   - Intervention Status

**QI process and/or tools used to identify and prioritize barriers:**

One or more of the following process improvement methods/tools may be used during the PIP. The key driver diagram created by the PIP team is found at Attachment J.

- Identify Aim Statement
- Assemble QI team.
- Brainstorm
- Process Mapping
- Key Driver Diagram
- Failure Modes & Effects Analysis
- PDSA Cycle

**B. Barriers/Interventions Table:** In the table below, list interventions currently being evaluated, and barrier(s) addressed by each intervention. For each intervention, complete a Step 8 Intervention Worksheet. The worksheet must be completed to the point of intervention progression at the time of the annual PIP submission.

| Intervention Title | Barrier(s) Addressed |
|---|---|
| Outreach Monitoring/Feedback | Absence of data visibility on outreach volume<br>Competing priorities for care coordination workload |

*Appendix A*: State of Colorado 2023-24 PIP Submission Form
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

Performance Improvement Projects

**Step 8: Improvement Strategies.** Interventions are developed to target and address causes/barriers identified through the use of quality improvement (QI) processes and tools.

The documentation of Step 8 is organized into the following three sections:

A. Quality Improvement (QI) Team and Activities Narrative Description
B. Barriers/Interventions Table: Prioritized barriers and corresponding intervention descriptions
C. Intervention Worksheet:
   - Intervention Description
   - Intervention Effectiveness Measure
   - Intervention Evaluation Results - Clinical and Programmatic Improvement
   - Intervention Status

**C. Intervention Worksheet: Intervention Effectiveness Measure and Evaluation Results**
Complete a Step 8 Intervention Worksheet for each intervention currently being evaluated. The worksheet must be completed to the point of intervention progression at the time of the annual PIP submission.

# Appendix B. Final PIP Validation Tools

The following contains the final PIP Validation Tools for HCI R4.

*Appendix B:* **State of Colorado 2023-24 PIP Validation Tool**
***Follow-Up After Emergency Department Visit for Substance Use (FUA)***
**for Health Colorado, Inc. (RAE 4)**

| Demographic Information | | | |
|---|---|---|---|
| **MCO Name:** | Health Colorado, Inc. (RAE 4) | | |
| **Project Leader Name:** | Edward Arnold | **Title:** | Performance Improvement Analyst |
| **Telephone Number:** | 719-666-0540 | **Email Address:** | edward.arnold@carelon.com |
| **PIP Title:** | *Follow-Up After Emergency Department Visit for Substance Use (FUA)* | | |
| **Submission Date:** | October 31, 2023 | | |
| **Resubmission Date:** | Not Applicable | | |

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 1. Review the Selected PIP Topic: The PIP topic should be selected based on data that identify an opportunity for improvement. The goal of the project should be to improve member health, functional status, and/or satisfaction. The topic may also be required by the State. The PIP topic:** | | | |
| 1. Was selected following collection and analysis of data.<br>*NA* is not applicable to this element for scoring. | C* | *Met* | |
| **Results for Step 1** | | | |
| **Total Evaluation Elements**** | **1** | **1** | **Critical Elements***** |
| *Met* | 1 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 2. Review the PIP Aim Statement(s): Defining the statement(s) helps maintain the focus of the PIP and sets the framework for data collection, analysis, and interpretation. The statement:** | | | |
| 1. Stated the area in need of improvement in clear, concise, and measurable terms.<br>*NA* is not applicable to this element for scoring | C* | *Met* | |
| **Results for Step 2** | | | |
| **Total Evaluation Elements**** | **1** | **1** | **Critical Elements**** |
| *Met* | 1 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 3. Review the Identified PIP Population: The PIP population should be clearly defined to represent the population to which the PIP Aim statement and indicator(s) apply, without excluding members with special healthcare needs. The PIP population:** | | | |
| 1. Was accurately and completely defined and captured all members to whom the PIP Aim statement(s) applied.<br>*NA* is not applicable to this element for scoring. | C* | *Met* | |
| **Results for Step 3** | | | |
| **Total Evaluation Elements**** | **1** | **1** | **Critical Elements**** |
| *Met* | 1 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a critical evaluation element.
** This is the total number of all evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 4. Review the Sampling Method: (If sampling was not used, each evaluation element will be scored *Not Applicable [NA]* ). If sampling was used to select members in the population, proper sampling methods are necessary to provide valid and reliable results. Sampling methods:** | | | |
| 1. Included the sampling frame size for each indicator. | | *NA* | |
| 2. Included the sample size for each indicator. | C* | *NA* | |
| 3. Included the margin of error and confidence level for each indicator. | | *NA* | |
| 4. Described the method used to select the sample. | | *NA* | |
| 5. Allowed for the generalization of results to the population. | C* | *NA* | |
| **Results for Step 4** | | | |
| **Total Evaluation Elements**** | **5** | **2** | **Critical Elements**** |
| *Met* | 0 | 0 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 5 | 2 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

Health Colorado, Inc. (RAE 4) 2023-24 PIP Validation Tool
State of Colorado

B-5
HCI-R4_CO2023-24_PIP-Val_ED_Visit_Tool_F1_0224

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 5. Review the Selected Performance Indicator(s): A performance indicator is a quantitative or qualitative characteristic or variable that reflects a discrete event or a status that is to be measured. The selected indicator(s) should track performance or improvement over time. The indicator(s) should be objective, clearly and unambiguously defined, and based on current clinical knowledge or health services research. The indicator(s) of performance:** | | | |
| 1. Were well-defined, objective, and measured changes in health or functional status, member satisfaction, or valid process alternatives. | C* | *Met* | |
| 2. Included the basis on which the indicator(s) was developed, if internally developed. | | *N/A* | |

| Results for Step 5 | | | |
|---|---|---|---|
| **Total Evaluation Elements**** | **2** | **1** | **Critical Elements**** |
| *Met* | 1 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 1 | 0 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 6. Review the Data Collection Procedures: The data collection process must ensure that the data collected on the indicator(s) were valid and reliable. Validity is an indication of the accuracy of the information obtained. Reliability is an indication of the repeatability or reproducibility of a measurement. Data collection procedures included:** | | | |
| 1. Clearly defined sources of data and data elements collected for the indicator(s).<br>*NA* is not applicable to this element for scoring. | | *Met* | |
| 2. A clearly defined and systematic process for collecting baseline and remeasurement data for the indicator(s).<br>*NA* is not applicable to this element for scoring. | C* | *Met* | |
| 3. A manual data collection tool that ensured consistent and accurate collection of data according to indicator specifications. | C* | *N/A* | |
| 4. The percentage of reported administrative data completeness at the time the data are generated, and the process used to calculate the percentage. | | *Met* | |

| Results for Step 6 | | | |
|---|---|---|---|
| **Total Evaluation Elements**** | **4** | **2** | **Critical Elements**** |
| *Met* | 3 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 1 | 1 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Results for Step 1 - 6 | | | |
|---|---|---|---|
| **Total Evaluation Elements** | **14** | **8** | **Critical Elements** |
| *Met* | 7 | 5 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 7 | 3 | *NA* |
| | | | |

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 7. Review Data Analysis and Interpretation of Results: Clearly present the results for each indicator. Describe the data analysis performed, the results of the statistical analysis, and a narrative interpretation for each indicator. Through data analysis and interpretation, real improvement, as well as sustained improvement, can be determined. The data analysis and interpretation of the indicator outcomes:** | | | |
| 1. Included accurate, clear, consistent, and easily understood information in the data table. | C* | *Met* | |
| 2. Included a narrative interpretation of results that addressed all requirements. | | *Met* | |
| 3. Addressed factors that threatened the validity of the data reported and ability to compare the initial measurement with the remeasurement. | | *Met* | |

| Results for Step 7 | | | |
|---|---|---|---|
| **Total Evaluation Elements**** | **3** | **1** | **Critical Elements***** |
| *Met* | 3 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 8. Assess the Improvement Strategies: Interventions were developed to address causes/barriers identified through a continuous cycle of data measurement and data analysis. The improvement strategies were developed from an ongoing quality improvement process that included:** | | | |
| 1. A causal/barrier analysis with a clearly documented team, process/steps, and quality improvement tools. | C* | *Met* | |
| 2. Interventions that were logically linked to identified barriers and have the potential to impact indicator outcomes. | C* | *Met* | |
| 3. Interventions that were implemented in a timely manner to allow for impact of indicator outcomes. | | *Not Assessed* | |
| 4. An evaluation of effectiveness for each individual intervention. | C* | *Not Assessed* | |
| 5. Interventions that were adopted, adapted, abandoned, or continued based on evaluation data. | | *Not Assessed* | |

| Results for Step 8 | | | |
|---|---|---|---|
| **Total Elements**** | **5** | **3** | **Critical Elements***** |
| *Met* | 2 | 2 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Results for Step 7 - 8 | | | |
|---|---|---|---|
| **Total Evaluation Elements** | **8** | **4** | **Critical Elements** |
| *Met* | 5 | 3 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 9. Assess the likelihood that Significant and Sustained Improvement Occurred: Improvement in performance is evaluated based on evidence that there was improvement over baseline indicator performance. Significant clinical improvement in processes and outcomes OR significant programmatic improvement in processes and outcomes is evaluated based on reported intervention evaluation data and the supporting documentation. Sustained improvement is assessed after improvement over baseline indicator performance has been demonstrated. Sustained improvement is achieved when repeated measurements over comparable time periods demonstrate continued improvement over baseline indicator performance. For significant clinical or programmatic improvement, the MCO must include how it plans to sustain the improvement achieved beyond the current measurement period.** | | | |
| 1. The remeasurement methodology was the same as the baseline methodology. | C* | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| 2. There was improvement over baseline performance across all performance indicators. | | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| 3. There was statistically significant improvement (95 percent confidence level, $p < 0.05$) over the baseline across all performance indicators. | | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| 4. Sustained statistically significant improvement over baseline indicator performance across all indicators was demonstrated through repeated measurements over comparable time periods. | | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| **Results for Step 9** | | | |
| **Total Evaluation Elements**** | **4** | **1** | **Critical Elements***** |
| *Met* | 0 | 0 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |

* "C" in this column denotes a critical evaluation element.
** This is the total number of all evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

**Table B—1 2023-24 PIP Validation Tool Scores**
**for *Follow-Up After Emergency Department Visit for Substance Use* for Health Colorado, Inc. (RAE 4)**

| Review Step | Total Possible Evaluation Elements (Including Critical Elements) | Total *Met* | Total *Partially Met* | Total *Not Met* | Total *N/A* | Total Possible Critical Elements | Total Critical Elements *Met* | Total Critical Elements *Partially Met* | Total Critical Elements *Not Met* | Total Critical Elements *N/A* |
|---|---|---|---|---|---|---|---|---|---|---|
| 1. Review the Selected PIP Topic | 1 | 1 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 2. Review the PIP Aim Statement(s) | 1 | 1 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 3. Review the Identified PIP Population | 1 | 1 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 4. Review the Sampling Method | 5 | 0 | 0 | 0 | 5 | 2 | 0 | 0 | 0 | 2 |
| 5. Review the Selected Performance Indicator(s) | 2 | 1 | 0 | 0 | 1 | 1 | 1 | 0 | 0 | 0 |
| 6. Review the Data Collection Procedures | 4 | 3 | 0 | 0 | 1 | 2 | 1 | 0 | 0 | 1 |
| 7. Review Data Analysis and Interpretation of Results | 3 | 3 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 8. Assess the Improvement Strategies | 5 | 2 | 0 | 0 | 0 | 3 | 2 | 0 | 0 | 0 |
| 9. Assess the Likelihood that Significant and Sustained Improvement Occurred | 4 | *Not Assessed* | | | | 1 | *Not Assessed* | | | |
| **Totals for All Steps** | **26** | **12** | **0** | **0** | **7** | **13** | **8** | **0** | **0** | **3** |

**Table B—2 2023-24 Overall Confidence of Adherence to Acceptable Methodology for All Phases of the PIP (Step 1 through Step 8) for *Follow-Up After Emergency Department Visit for Substance Use* for Health Colorado, Inc. (RAE 4)**

| | |
|---|---|
| **Percentage Score of Evaluation Elements *Met**** | ***100%*** |
| **Percentage Score of Critical Elements *Met*** ** | ***100%*** |
| **Confidence Level***** | ***High Confidence*** |

**Table B—3 2023-24 Overall Confidence That the PIP Achieved Significant Improvement (Step 9) for *Follow-Up After Emergency Department Visit for Substance Use* for Health Colorado, Inc. (RAE 4)**

| | |
|---|---|
| **Percentage Score of Evaluation Elements *Met**** | ***Not Assessed*** |
| **Percentage Score of Critical Elements *Met*** ** | ***Not Assessed*** |
| **Confidence Level***** | ***Not Assessed*** |

* The percentage score of evaluation elements *Met* is calculated by dividing the total number *Met* by the sum of all evaluation elements *Met, Partially Met,* and *Not Met.* The Not Assessed and Not Applicable scores have been removed from the scoring calculations.
** The percentage score of critical elements *Met* is calculated by dividing the total critical elements *Met* by the sum of the critical elements *Met, Partially Met,* and *Not Met.*
*** Confidence Level: See confidence level definitions on next page.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Follow-Up After Emergency Department Visit for Substance Use (FUA)*
for Health Colorado, Inc. (RAE 4)

| EVALUATION OF THE OVERALL VALIDITY AND RELIABILITY OF PIP RESULTS | |
|---|---|
| **HSAG assessed the MCO's PIP based on CMS Protocol 1 to determine whether the MCO adhered to an acceptable methodology for all phases of design and data collection, and conducted accurate data analysis and interpretation of PIP results. HSAG's validation of the PIP determined the following:** | |
| ***High Confidence:*** | High confidence in reported PIP results. All critical evaluation elements were *Met*, and 90 percent to 100 percent of all evaluation elements were *Met* across all steps. |
| ***Moderate Confidence:*** | Moderate confidence in reported PIP results. All critical evaluation elements were *Met*, and 80 percent to 89 percent of all evaluation elements were *Met* across all steps. |
| ***Low Confidence:*** | Low confidence in reported PIP results. Across all steps, 65 percent to 79 percent of all evaluation elements were *Met*; or one or more critical evaluation elements were *Partially Met*. |
| ***No Confidence:*** | No confidence in reported PIP results. Across all steps, less than 65 percent of all evaluation elements were *Met*; or one or more critical evaluation elements were *Not Met*. |
| **Confidence Level for Acceptable Methodology:** | ***High Confidence*** |

| | |
|---|---|
| **HSAG assessed the MCO's PIP based on CMS Protocol 1 and determined whether the MCO produced evidence of significant improvement. HSAG's validation of the PIP determined the following:** | |
| ***High Confidence:*** | All performance indicators demonstrated *statistically significant* improvement over the baseline. |
| ***Moderate Confidence:*** | To receive *Moderate Confidence* for significant improvement, one of the three scenarios below occurred:<br>1. All performance indicators demonstrated improvement over the baseline, **and** some but not all performance indicators demonstrated *statistically significant* improvement over the baseline.<br>2. All performance indicators demonstrated improvement over the baseline, **and** none of the performance indicators demonstrated *statistically significant* improvement over the baseline.<br>3. Some but not all performance indicators demonstrated improvement over baseline, **and** some but not all performance indicators demonstrated *statistically significant* improvement over baseline. |
| ***Low Confidence:*** | The remeasurement methodology was not the same as the baseline methodology for at least one performance indicator **or** some but not all performance indicators demonstrated improvement over the baseline and none of the performance indicators demonstrated *statistically significant* improvement over the baseline. |
| ***No Confidence:*** | The remeasurement methodology was not the same as the baseline methodology for all performance indicators **or** none of the performance indicators demonstrated improvement over the baseline. |
| **Confidence Level for Significant Improvement:** | ***Not Assessed*** |

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Demographic Information | | | |
|---|---|---|---|
| **MCO Name:** | Health Colorado, Inc. (RAE 4) | | |
| **Project Leader Name:** | Edward Arnold | **Title:** | Performance Improvement Analyst |
| **Telephone Number:** | 719-666-0540 | **Email Address:** | edward.arnold@carelon.com |
| **PIP Title:** | *Social Determinants of Health (SDOH) Screening* | | |
| **Submission Date:** | October 31, 2023 | | |
| **Resubmission Date:** | January 2, 2024 | | |

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 1. Review the Selected PIP Topic: The PIP topic should be selected based on data that identify an opportunity for improvement. The goal of the project should be to improve member health, functional status, and/or satisfaction. The topic may also be required by the State. The PIP topic:** | | | |
| 1. Was selected following collection and analysis of data.<br>*NA* is not applicable to this element for scoring. | C* | *Met* | |
| **Results for Step 1** | | | |
| **Total Evaluation Elements**** | **1** | **1** | **Critical Elements***** |
| *Met* | 1 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 2. Review the PIP Aim Statement(s): Defining the statement(s) helps maintain the focus of the PIP and sets the framework for data collection, analysis, and interpretation. The statement:** | | | |
| 1. Stated the area in need of improvement in clear, concise, and measurable terms.<br>*NA* is not applicable to this element for scoring | C* | *Met* | |
| **Results for Step 2** | | | |
| **Total Evaluation Elements**** | **1** | **1** | **Critical Elements**** |
| *Met* | 1 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 3. Review the Identified PIP Population: The PIP population should be clearly defined to represent the population to which the PIP Aim statement and indicator(s) apply, without excluding members with special healthcare needs. The PIP population:** | | | |
| 1. Was accurately and completely defined and captured all members to whom the PIP Aim statement(s) applied.<br>*NA* is not applicable to this element for scoring. | C* | *Met* | |
| **Results for Step 3** | | | |
| **Total Evaluation Elements**** | **1** | **1** | **Critical Elements**** |
| *Met* | 1 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a critical evaluation element.
** This is the total number of all evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 4. Review the Sampling Method: (If sampling was not used, each evaluation element will be scored *Not Applicable [NA]* ). If sampling was used to select members in the population, proper sampling methods are necessary to provide valid and reliable results. Sampling methods:** | | | |
| 1. Included the sampling frame size for each indicator. | | *NA* | |
| 2. Included the sample size for each indicator. | C* | *NA* | |
| 3. Included the margin of error and confidence level for each indicator. | | *NA* | |
| 4. Described the method used to select the sample. | | *NA* | |
| 5. Allowed for the generalization of results to the population. | C* | *NA* | |
| **Results for Step 4** | | | |
| **Total Evaluation Elements**** | **5** | **2** | **Critical Elements**** |
| *Met* | 0 | 0 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 5 | 2 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

Health Colorado, Inc. (RAE 4) 2023-24 PIP Validation Tool
State of Colorado

B-5
HCI-R4_CO2023-24_PIP-Val_SDOH_Tool_F1_0224

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 5. Review the Selected Performance Indicator(s): A performance indicator is a quantitative or qualitative characteristic or variable that reflects a discrete event or a status that is to be measured. The selected indicator(s) should track performance or improvement over time. The indicator(s) should be objective, clearly and unambiguously defined, and based on current clinical knowledge or health services research. The indicator(s) of performance:** | | | |
| 1. Were well-defined, objective, and measured changes in health or functional status, member satisfaction, or valid process alternatives. | C* | *Met* | |
| 2. Included the basis on which the indicator(s) was developed, if internally developed. | | *Met* | |

| Results for Step 5 | | | |
|---|---|---|---|
| **Total Evaluation Elements**** | **2** | **1** | **Critical Elements**** |
| *Met* | 2 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 6. Review the Data Collection Procedures: The data collection process must ensure that the data collected on the indicator(s) were valid and reliable. Validity is an indication of the accuracy of the information obtained. Reliability is an indication of the repeatability or reproducibility of a measurement. Data collection procedures included:** | | | |
| 1. Clearly defined sources of data and data elements collected for the indicator(s).<br>*NA* is not applicable to this element for scoring. | | *Met* | |
| 2. A clearly defined and systematic process for collecting baseline and remeasurement data for the indicator(s).<br>*NA* is not applicable to this element for scoring. | C* | *Met* | |
| 3. A manual data collection tool that ensured consistent and accurate collection of data according to indicator specifications. | C* | *N/A* | |
| 4. The percentage of reported administrative data completeness at the time the data are generated, and the process used to calculate the percentage. | | *Met* | |

| Results for Step 6 | | | |
|---|---|---|---|
| **Total Evaluation Elements**** | **4** | **2** | **Critical Elements**** |
| *Met* | 3 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 1 | 1 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Results for Step 1 - 6 | | | |
|---|---|---|---|
| **Total Evaluation Elements** | **14** | **8** | **Critical Elements** |
| *Met* | 8 | 5 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 6 | 3 | *NA* |
| | | | |

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 7. Review Data Analysis and Interpretation of Results: Clearly present the results for each indicator. Describe the data analysis performed, the results of the statistical analysis, and a narrative interpretation for each indicator. Through data analysis and interpretation, real improvement, as well as sustained improvement, can be determined. The data analysis and interpretation of the indicator outcomes:** | | | |
| 1. Included accurate, clear, consistent, and easily understood information in the data table. | C* | *Met* | |
| 2. Included a narrative interpretation of results that addressed all requirements. | | *Met* | The health plan included a description of data collection and calculation methodology in the Baseline Narrative section of Step 7; this documentation can be included in Step 6, as part of the data collection process. The health plan should revise the Step 7 Baseline Narrative documentation to provide a brief description of the baseline indicator results reported in the Step 7 table. The Baseline Narrative should specifically state the baseline indicator rate. When the health plan reports remeasurement results for future annual validation cycles, the narrative description should also include a discussion of the change in indicator results from baseline to each remeasurement, whether the change was an improvement, and whether the change was statistically significant.<br><br>**Resubmission January 2024:** The health plan revised the Baseline Narrative and addressed the initial feedback. The validation score for this evaluation element was changed to *Met*. |
| 3. Addressed factors that threatened the validity of the data reported and ability to compare the initial measurement with the remeasurement. | | *Met* | As part of the Baseline Narrative in Step 7, the health plan should report whether any factors were identified that threatened the validity of the baseline indicator results. If no factors were identified, a statement of this fact should be included in the Baseline Narrative. If factors were identified, a brief description of the factors and steps taken to address the identified factors should be included in the narrative.<br><br>**Resubmission January 2024:** The health plan revised the Baseline Narrative and addressed the initial feedback. The validation score for this evaluation element was changed to *Met*. |

**Results for Step 7**

| Total Evaluation Elements** | 3 | 1 | Critical Elements*** |
|---|---|---|---|
| *Met* | 3 | 1 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 8. Assess the Improvement Strategies: Interventions were developed to address causes/barriers identified through a continuous cycle of data measurement and data analysis. The improvement strategies were developed from an ongoing quality improvement process that included:** | | | |
| 1. A causal/barrier analysis with a clearly documented team, process/steps, and quality improvement tools. | C* | *Met* | |
| 2. Interventions that were logically linked to identified barriers and have the potential to impact indicator outcomes. | C* | *Met* | |
| 3. Interventions that were implemented in a timely manner to allow for impact of indicator outcomes. | | *Not Assessed* | |
| 4. An evaluation of effectiveness for each individual intervention. | C* | *Not Assessed* | |
| 5. Interventions that were adopted, adapted, abandoned, or continued based on evaluation data. | | *Not Assessed* | |

| Results for Step 8 | | | |
|---|---|---|---|
| **Total Elements**** | **5** | **3** | **Critical Elements***** |
| *Met* | 2 | 2 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

* "C" in this column denotes a *critical* evaluation element.
** This is the total number of *all* evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Results for Step 7 - 8 | | | |
|---|---|---|---|
| **Total Evaluation Elements** | **8** | **4** | **Critical Elements** |
| *Met* | 5 | 3 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |
| | | | |

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| Evaluation Elements | Critical | Scoring | Comments/Recommendations |
|---|---|---|---|
| **Performance Improvement Project Validation** | | | |
| **Step 9. Assess the likelihood that Significant and Sustained Improvement Occurred: Improvement in performance is evaluated based on evidence that there was improvement over baseline indicator performance. Significant clinical improvement in processes and outcomes OR significant programmatic improvement in processes and outcomes is evaluated based on reported intervention evaluation data and the supporting documentation. Sustained improvement is assessed after improvement over baseline indicator performance has been demonstrated. Sustained improvement is achieved when repeated measurements over comparable time periods demonstrate continued improvement over baseline indicator performance. For significant clinical or programmatic improvement, the MCO must include how it plans to sustain the improvement achieved beyond the current measurement period.** | | | |
| 1. The remeasurement methodology was the same as the baseline methodology. | C* | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| 2. There was improvement over baseline performance across all performance indicators. | | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| 3. There was statistically significant improvement (95 percent confidence level, $p < 0.05$) over the baseline across all performance indicators. | | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| 4. Sustained statistically significant improvement over baseline indicator performance across all indicators was demonstrated through repeated measurements over comparable time periods. | | *Not Assessed* | The PIP had not progressed to the point of being assessed for improvement. |
| **Results for Step 9** | | | |
| **Total Evaluation Elements**** | **4** | **1** | **Critical Elements***** |
| *Met* | 0 | 0 | *Met* |
| *Partially Met* | 0 | 0 | *Partially Met* |
| *Not Met* | 0 | 0 | *Not Met* |
| *NA* | 0 | 0 | *NA* |

* "C" in this column denotes a critical evaluation element.
** This is the total number of all evaluation elements for this step.
*** This is the total number of critical evaluation elements for this step.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

**Table B—1 2023-24 PIP Validation Tool Scores for *Social Determinants of Health Screening* for Health Colorado, Inc. (RAE 4)**

| Review Step | Total Possible Evaluation Elements (Including Critical Elements) | Total *Met* | Total *Partially Met* | Total *Not Met* | Total *N/A* | Total Possible Critical Elements | Total Critical Elements *Met* | Total Critical Elements *Partially Met* | Total Critical Elements *Not Met* | Total Critical Elements *N/A* |
|---|---|---|---|---|---|---|---|---|---|---|
| 1. Review the Selected PIP Topic | 1 | 1 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 2. Review the PIP Aim Statement(s) | 1 | 1 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 3. Review the Identified PIP Population | 1 | 1 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 4. Review the Sampling Method | 5 | 0 | 0 | 0 | 5 | 2 | 0 | 0 | 0 | 2 |
| 5. Review the Selected Performance Indicator(s) | 2 | 2 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 6. Review the Data Collection Procedures | 4 | 3 | 0 | 0 | 1 | 2 | 1 | 0 | 0 | 1 |
| 7. Review Data Analysis and Interpretation of Results | 3 | 3 | 0 | 0 | 0 | 1 | 1 | 0 | 0 | 0 |
| 8. Assess the Improvement Strategies | 5 | 2 | 0 | 0 | 0 | 3 | 2 | 0 | 0 | 0 |
| 9. Assess the Likelihood that Significant and Sustained Improvement Occurred | 4 | *Not Assessed* | | | | 1 | *Not Assessed* | | | |
| **Totals for All Steps** | **26** | **13** | **0** | **0** | **6** | **13** | **8** | **0** | **0** | **3** |

**Table B—2 2023-24 Overall Confidence of Adherence to Acceptable Methodology for All Phases of the PIP (Step 1 through Step 8) for *Social Determinants of Health Screening* for Health Colorado, Inc. (RAE 4)**

| | |
|---|---|
| **Percentage Score of Evaluation Elements *Met* *** | ***100%*** |
| **Percentage Score of Critical Elements *Met* **** | ***100%*** |
| **Confidence Level***** | ***High Confidence*** |

**Table B—3 2023-24 Overall Confidence That the PIP Achieved Significant Improvement (Step 9) for *Social Determinants of Health Screening* for Health Colorado, Inc. (RAE 4)**

| | |
|---|---|
| **Percentage Score of Evaluation Elements *Met* *** | ***Not Assessed*** |
| **Percentage Score of Critical Elements *Met* **** | ***Not Assessed*** |
| **Confidence Level***** | ***Not Assessed*** |

* The percentage score of evaluation elements *Met* is calculated by dividing the total number *Met* by the sum of all evaluation elements *Met, Partially Met,* and *Not Met.* The Not Assessed and Not Applicable scores have been removed from the scoring calculations.
** The percentage score of critical elements *Met* is calculated by dividing the total critical elements *Met* by the sum of the critical elements *Met, Partially Met,* and *Not Met.*
*** Confidence Level: See confidence level definitions on next page.

*Appendix B:* State of Colorado 2023-24 PIP Validation Tool
*Social Determinants of Health (SDOH) Screening*
for Health Colorado, Inc. (RAE 4)

| EVALUATION OF THE OVERALL VALIDITY AND RELIABILITY OF PIP RESULTS | |
|---|---|
| **HSAG assessed the MCO's PIP based on CMS Protocol 1 to determine whether the MCO adhered to an acceptable methodology for all phases of design and data collection, and conducted accurate data analysis and interpretation of PIP results. HSAG's validation of the PIP determined the following:** | |
| ***High Confidence:*** | High confidence in reported PIP results. All critical evaluation elements were *Met*, and 90 percent to 100 percent of all evaluation elements were *Met* across all steps. |
| ***Moderate Confidence:*** | Moderate confidence in reported PIP results. All critical evaluation elements were *Met*, and 80 percent to 89 percent of all evaluation elements were *Met* across all steps. |
| ***Low Confidence:*** | Low confidence in reported PIP results. Across all steps, 65 percent to 79 percent of all evaluation elements were *Met*; or one or more critical evaluation elements were *Partially Met*. |
| ***No Confidence:*** | No confidence in reported PIP results. Across all steps, less than 65 percent of all evaluation elements were *Met*; or one or more critical evaluation elements were *Not Met*. |
| **Confidence Level for Acceptable Methodology:** | ***High Confidence*** |

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| **HSAG assessed the MCO's PIP based on CMS Protocol 1 and determined whether the MCO produced evidence of significant improvement. HSAG's validation of the PIP determined the following:** | |
| ***High Confidence:*** | All performance indicators demonstrated *statistically significant* improvement over the baseline. |
| ***Moderate Confidence:*** | To receive *Moderate Confidence* for significant improvement, one of the three scenarios below occurred:<br>1. All performance indicators demonstrated improvement over the baseline, **and** some but not all performance indicators demonstrated *statistically significant* improvement over the baseline.<br>2. All performance indicators demonstrated improvement over the baseline, **and** none of the performance indicators demonstrated *statistically significant* improvement over the baseline.<br>3. Some but not all performance indicators demonstrated improvement over baseline, **and** some but not all performance indicators demonstrated *statistically significant* improvement over baseline. |
| ***Low Confidence:*** | The remeasurement methodology was not the same as the baseline methodology for at least one performance indicator **or** some but not all performance indicators demonstrated improvement over the baseline and none of the performance indicators demonstrated *statistically significant* improvement over the baseline. |
| ***No Confidence:*** | The remeasurement methodology was not the same as the baseline methodology for all performance indicators **or** none of the performance indicators demonstrated improvement over the baseline. |
| **Confidence Level for Significant Improvement:** | ***Not Assessed*** |