

CMS Hospital Readmissions Reduction Program (HRRP) - An Overview

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About eQHealth Solutions

- The Centers for Medicare & Medicaid Services leads a national health care quality improvement program.
 - It's the largest federal program dedicated to improving health quality at a local level.
- The program is implemented locally by an independent network of QIOs in each state and territory.
- eQHealth has served as the Medicare QIO in Louisiana for over 25 years.
- We are a free resource for meeting the requirements of CMS Quality Reporting programs and improving quality & safety of patient care and care transitions.

Objectives

- Gain an understanding of the Hospital Readmission Reduction Program for FY 2013 (HRRP) - measures, methodology, interventions – related resources.
- Generate action in your organization and community to reduce preventable readmissions.

Changes Are Upon Us!

Patient Protection & Affordable Care Act (PPACA) March 2010

- FY2013 – Hospital Value-Based Purchasing
 - Section 3001 PPACA
 - Final Rule May 2011
 - Proposed Rule OPPS July 2011
- FY2013 – Hospital Readmissions Reduction Program
 - Section 3025 PPACA
 - As amended by Section 10309 of the PPACA
 - Final Rule IPPS August 2011
 - Proposed Rule IPPS April 2012
- FY2014 – Hospital-Acquired Conditions Penalties
 - Section 3008 PPACA
 - Final Rule IPPS August 2011

Patient Protection & Affordable Care Act (PPACA)

Searchable Document

<http://www.readmissionssummit.com/>

Changes Are Upon Us!

Sometimes I feel like the light at the end of the tunnel is an oncoming train.

-Charlie Brown

Change Timeline

- MedPac 2007 *“Report to Congress: Promoting Better Efficiency in Medicare”*¹
- March 2010: Affordable Care Act² required implementation of Hospital Readmission Reduction Program (HRRP) (Section 3025)
 - As amended by Section 10309
- August 2011: Final Rule for Changes to the IPPS/LTCH PPS for FY2012¹

Aligning Payment with Outcomes in Reform

Objectives / Goals

Patient Protection & Affordable Care Act (PPACA) March 2010

- Create culture of transparency and leadership
- Focus on evidence-based care
- Level of payment adjustment within hospital's control
- Payment based on prior performance
- Benchmark against peers to gauge impact
- Coordination with physicians key
- Re-think business case for services and technologies

30-Day Readmission Measures

Selection of Readmission Measures

- Selection of applicable conditions
- Definition of “readmission”
- Measures for the applicable conditions chosen for readmission
- Methodology for calculating the Excess Readmission Ratio
- Public reporting of the readmission data
- Definition of “applicable period”

30-Day Readmission Measures

- Acute Myocardial Infarction 30-day Risk-Standardized Readmission Measure
- Heart Failure 30-day Risk-Standardized Readmission Measure
- Pneumonia 30-day Risk-Standardized Readmission Measure

Performance Period

FY 2013

July 1, 2008 – June 30, 2011

Aligning Payment with Outcomes in Reform

Section 1886(q)(5)(E) of the Act defines

“readmission” as:

In the case of an individual who is discharged from an applicable hospital, the admission of the individual to the same or another applicable hospital within a time period specified by the Secretary from the date of such discharge.

Insofar as the discharge relates to an applicable condition for which there is an endorsed measure....such time period (i.e., 30 days) shall be consistent with the time period specified for such measure.

30-Day Readmission Measures

- Transfers are excluded as they are considered multiple contiguous hospitalizations in a single episode of acute care.
 - The readmission for transferred patients is assigned to the hospital that ultimately discharges the patient to a non-acute care setting, e.g., home or SNF
- Patients receiving hospice or palliative care are not excluded.

Aligning Payment with Outcomes in Reform

Scenario: Patient admitted for Acute MI; transferred to another acute care hospital on patient/family request.

Result: Transfer to other acute care hospital does not count as a readmission and is not counted against index hospital.

30-Day Readmission Measures

- Admissions for CABG & PTCA may be “staged” or are typically scheduled readmissions for AMI patients and are not counted as readmissions for those discharges.
 - UNLESS the principal discharge diagnosis for the readmission is one of the following diagnoses that are not consistent with a scheduled readmission: HF, AMI, unstable angina, arrhythmia, and cardiac arrest.
- No such exclusions exist for HF and PN patients.

Aligning Payment with Outcomes in Reform

Scenario: Patient admitted for Acute MI; readmitted within 30 days for CABG. Diagnoses do not include HF, (new) AMI, unstable angina, arrhythmia or cardiac arrest.

Result: The readmission is for a “staged” procedure and is not counted as a readmission for the index admission hospital.

Aligning Payment with Outcomes in Reform

Scenario: Patient is admitted to hospital with diagnosis of AMI, HF or PN. Interventions for patient education and follow-up not implemented. Patient is readmitted to same hospital within 30 days.

Result: Same-hospital readmission is counted for index hospital.

Aligning Payment with Outcomes in Reform

Scenario: Patient is admitted to hospital with diagnosis of AMI, HF or PN. Interventions for patient education and follow-up not implemented. Patient is readmitted to another hospital within 30 days.

Result: Other-hospital readmission is counted for index hospital.

Aligning Payment with Outcomes in Reform

Scenario: Patient is admitted to hospital with diagnosis of AMI, HF or PN. Patient receives in-hospital education and complete discharge instructions but no post-acute support and is readmitted to same or other hospital more than once within 30 days.

Result: Only one readmission is counted for the index hospital; a new 30-day period begins with a new index admission 31 days or more from original index admission discharge.

Aligning Payment with Outcomes in Reform

Scenario: Patient is admitted to hospital with diagnosis of AMI, HF or PN. Patient receives in-hospital education, complete discharge instructions, and post-acute support and is NOT readmitted to same or other hospital more than once within 30 days.

Result: No readmission is counted for index hospital.

Aligning Payment with Outcomes in Reform

NQF-Endorsed Readmission Measures define “readmission” as:

Occurring when a patient is discharged from the applicable hospital to a non-acute setting, e.g., home health, SNF, rehabilitation or home, and then is admitted to the same or another acute care hospital within a specified time period from the time of discharge from the index admission.

30-Day Readmission Measures

The NQF-endorsed Readmission Measures exclude the following:

- Hospitalizations for patients discharged against medical advice (AMA) – providers did not have the opportunity to deliver full care and prepare the patient for discharge.
- Hospitalizations for patients less than 65 years of age.

30-Day Readmission Measures

The NQF-endorsed Readmission Measures exclude the following:

- Hospitalizations for patients with an in-hospital death – not eligible for a readmission.
- Hospitalizations for patients without at least 30 days post-discharge enrollment in Medicare Fee-for-Service (FFS) – the 30-day readmission outcome cannot be assessed in this group.

Aligning Payment with Outcomes in Reform

Scenario: Patient admitted to hospital as inpatient and discharged to nursing home or home health agency engaged in community partnership with hospital. Patient and caregiver(s) receive appropriate education in hospital. Receiving nursing home or home health agency receives thorough discharge status information and orders for continued treatment. Patient completes smooth transition into community and is NOT readmitted to same or other hospital within 30 days.

Result: Index hospitalization is NOT counted for hospital.

Aligning Payment with Outcomes in Reform

Scenario: Patient with heart failure exacerbation admitted to hospital as inpatient and discharged to nursing home or home health agency NOT engaged in community partnership with hospital. Patient and caregiver(s) receive appropriate education in hospital. Discharge instructions for patient include daily weights. Receiving home health agency receives thorough discharge status information and orders for continued treatment, including daily weights. Home Health Agency has no HF patient protocol and does not check patient's daily weights log; patient is readmitted within 30 days to same or other hospital in acute exacerbation of heart failure.

Result: Readmission is counted for index hospital.

Aligning Payment with Outcomes in Reform

Scenario: Patient with pneumonia admitted to hospital as inpatient and discharged to nursing home NOT engaged in community partnership with hospital. Receiving nursing home receives thorough discharge status information and orders for continued treatment. Nursing home has no standing orders/intervention plan for UTI. Patient is readmitted to same or other hospital within 30 days with UTI and secondary diagnosis of pneumonia.

Result: Readmission is counted for index hospital.

Aligning Payment with Outcomes in Reform

Implement in-hospital and post-discharge interventions:

- Ensure patients are clinically ready to be discharged
- Reduce infection risk
- Reconcile medications
- Improve communication with community providers responsible for post-discharge patient care

Aligning Payment with Outcomes in Reform

Implement in-hospital & post-discharge interventions:

- Improve transitions of care along the continuum
- Ensure patients understand their care plans upon discharge
- Provide post-hospital support to patients without a post-acute care provider

“Applicable Hospital” Definition

- Effective for discharges from an “applicable hospital” beginning on or after October 1, 2012
- Applies to subsection (d) hospitals

Statutory definition of subsection (d) hospital contained in Section 1886(d)(1)(B) of the Act

Hospitals that are paid under the hospital inpatient prospective payment system (IPPS) and are located in one of the 50 states or the District of Columbia

- Or to a hospital that is paid under section 1814(b)(3) of the Act

“Applicable Condition” Definition

A condition or procedure selected by the Secretary among conditions and procedures for which readmissions...represent conditions or procedures that are high volume or high cost...and measures of such readmissions....have been endorsed by a contracted entity...and endorsed measures have exclusions for readmission that are unrelated to the prior discharge.

Payment Methodology¹

Section 1886(q)(1) of the Act

- Will be an amount equal to the product of the “base operating DRG payment amount” and the adjustment factor for the hospital for the fiscal year.
- “Base operating DRG payments” are reduced by an adjustment factor that accounts for excess readmissions.

Payment Methodology¹

Section 1886(q)(2) of the Act

- Defines the “base operating DRG payment amount” as “the payment amount that would otherwise be made under subsection (d)² for a discharge if this subsection did not apply.
- Reduced by any portion of such payment amount that is attributable to payments under paragraphs (5)(A), (5)(B), (5)(F), and (12) of subsection (d).

The paragraphs on this and the next slide refer to outlier payments, IME payments, DSH payments, and payments for low volume hospitals, respectively.

¹CMS-1518-F/1430-F: Final Rule for Changes to the IPPS/LTCH PPS for FY 2012

²Determined without regard to subsection (o) [the HVBP]

Payment Methodology¹

- Adjustment Factor

For an applicable hospital for a fiscal year is defined as equal to the greater of “(i) the ratio described in subparagraph (B) for the hospital for the applicable period [as defined in paragraph (5)(D)] for such fiscal year or (ii) the floor adjustment factor specified in subparagraph (C).

- Applicable Period

The period from which data are collected in order to calculate the various ratios and adjustments under the HRRP.

Payment Methodology¹

- **Ratio Used to Calculate Adjustment Factor**

Equal to 1 minus the ratio of – (i) the aggregate payments for excess readmissions².....; and (ii) the aggregate payments for all discharges³

- **Floor Adjustment Factor**

FY 2013 = 0.99

FY 2014 = 0.98

FY 2015 = 0.97

Payment Methodology¹

Excess Readmission Ratio

- A hospital-specific ratio based on each applicable condition.
- The ratio of “risk-adjusted readmissions based on actual readmissions” for an applicable hospital for each applicable condition, to the “risk-adjusted expected readmissions” for the applicable hospital for the applicable condition.

30-Day Readmission Measures

Methodology for Calculation of Excess Readmission Ratio

- Index hospitalizations
- Risk Adjustment
- Risk-Standardized Readmission Rate
- Data Sources
- Exclusion of certain readmissions

Payment Methodology¹

Hierarchical Logistic Modeling

- Analyzes data on all the patients discharged from all hospitals for a given condition that indicate for each patient what co-morbidities were present when the patient was admitted and whether or not the patient was readmitted.
- Calculates the amount of variation in hospital readmission rates overall – accounted for by variation across hospitals in patients' individual risk factors (age, other medical conditions).

A risk weight (beta-coefficient) is calculated for each patient risk factor at all hospitals.

Payment Methodology¹

Hierarchical Logistic Modeling

- Calculates the amount of variation in readmission rates accounted for by hospitals' contribution to readmission risk, after adjusting for differences in readmission due to differences in patients' risk factors.
- Estimates the amount by which a specific hospital increases or decreases patients' risk of readmission relative to an average hospital based on the hospital's actual readmissions relative to hospitals with similar patients.

Payment Methodology¹

Hierarchical Logistic Modeling

Hospital-Specific Readmission Effect

- The estimated amount each hospital contributes (or subtracts) from its patients' readmission risk compared to hospitals with similar patients.
- Used only in the numerator to estimate the adjusted actual readmissions.

Payment Methodology¹

Hierarchical Logistic Modeling

Hospital-Specific Readmission Effect

- The hospital-specific effect will be negative for a hospital above the national average (lower-than-average adjusted rates of readmissions).
- The hospital-specific effect will be positive for a hospital below the national average (higher-than-average adjusted rates of readmissions).
- The hospital-specific effect will be close to zero for an average hospital.

Payment Methodology¹

Hierarchical Logistic Modeling

Numerator of the Ratio Calculation – Adjusted Actual Readmissions

Calculated by estimating the probability of readmission for each patient at that hospital and summing all the hospital's patients to get the actual adjusted number of readmissions for that hospital.

Payment Methodology¹

Hierarchical Logistic Modeling

The Estimated Probability of Readmission for Each Patient

- Hospital-specific probability of readmission relative to the probability of readmission at an average hospital.
- Intercept – probability of readmission for each patient when the value of all patient risk factors is zero.
- Probability of readmission contributed by each of the patients' risk factors (risk adjustment coefficients multiplied by the patient's risk factors, X).

Payment Methodology¹

Numerator: Adjusted Actual Readmissions

Step 1:

Calculate each patient's predicted
probability of readmission = $1 / 1 + e^{-Z_a}$

$$Z_a = \text{hospital-specific effect} + X\beta$$



Intercept + Risk-Adjustment Coefficients

Step 2:

To get the numerator result add all patients' predicted probability
of readmission.

Payment Methodology¹

Hierarchical Logistic Modeling

Denominator of the Risk-Standardized Ratio

Calculation – Expected Readmissions

At an average-quality hospital treating the same patients – sums the probability of readmission for each patient at an average hospital.

Payment Methodology¹

Hierarchical Logistic Modeling

The Expected Readmissions for each patient

- Calculated by using the same intercept term for all hospitals (as with the numerator).
- The increase or decrease in the probability of readmission contributed by each of the patients' risk factors.
 - ✓ Risk adjustment coefficients multiplied by the patient's risk factors, X

Payment Methodology¹

Denominator: Expected Readmissions

Step 1:

Calculate each patient's expected probability

of readmission = $1 / 1 + e^{-Z_e}$

$$Z_e = X\beta$$



Intercept + Risk-Adjustment Coefficients

Step 2:

To get the denominator result add all patients' expected probabilities of readmission.

Payment Adjustment Calculator

The Advisory Board Company:

<http://www.advisory.com/Research/Health-Care-Advisory-Board/Multimedia/Video/2011/Calculate-the-impact-of-readmissions-penalties-on-your-hospital>

Unintended Consequences

- Premature discharge of patients
- Providers avoiding certain types of patients with higher-acuity conditions and likely to be readmitted
- Increased pressure on emergency room physicians not to readmit patients within the 30-day window
- Systematic shifting, diversion, delays in care

30-Day Readmission Measures

Public Reporting

- The risk-standardized readmission ratio is then multiplied by the national crude rate of readmission for the given condition to produce a risk-standardized readmission rate (RSRR).
- Change from “better than”, “same as”, “worse than” to numerical rate.

Expansion of Conditions

Secretary of HHS is authorized to expand the list of applicable conditions for the Hospital Readmissions Reduction Program beginning FY 2015 (section 1886(q)(5)(B) of the Act).

CMS will collaborate with stakeholders to assess the impact of expanding the list of applicable conditions as 2015 approaches.

CMS Programs Supporting Readmission Reduction

Community-Based Care Transitions Program (CCTP)

- Section 3026 of the PPACA
- CMS funded
- Hospital & Community-Based Organization (CBO) must partner

Partnership for Patients

Public-private partnership to assist in improving the quality, safety, and affordability of healthcare

Medicare Quality Improvement Organization (QIO)

Integrating Care for Populations & Communities

Resources

eQHealth Solutions Integrating Care for Populations & Communities

<http://louisianaqio.eqhs.org/>

Partnership for Patients (Improving Care Transitions)

<http://www.healthcare.gov/compare/partnership-for-patients/safety/index.html>

CMS Acute Inpatient PPS - FY 2012 IPPS Final Rule Home page

<https://www.cms.gov/AcuteInpatientPPS/FR2012/list.asp>

(Links accessed 09.27.2011)

Resources

**Medicare Payment Advisory Commission (MedPAC) *June 2007*
*Report to Congress (Chapter 5)***

http://www.medpac.gov/documents/Jun07_EntireReport.pdf

**“QualityNet News” for links to IPPS and OPPS Notice of Proposed
Rulemaking**

<http://www.qualitynet.org/>

**QualityNet: Specifications Manual for National Hospital Quality
Measures**

[http://www.qualitynet.org/dcs/ContentServer?c=Page&pagename=Qnet
Public%2FPage%2FQnetTier2&cid=1141662756099](http://www.qualitynet.org/dcs/ContentServer?c=Page&pagename=Qnet
Public%2FPage%2FQnetTier2&cid=1141662756099)

(Links accessed 09.27.2011)

<http://louisianaqio.eqhs.org>

Questions?

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