



Measure Information

This document contains the information submitted by measure developers/stewards, but is organized according to NQF's measure evaluation criteria and process. The item numbers refer to those in the submission form but may be in a slightly different order here. In general, the item numbers also reference the related criteria (e.g., item 1b.1 relates to sub criterion 1b).

Brief Measure Information

NQF #: 2706

Corresponding Measures:

De.2. Measure Title: Pediatric Peritoneal Dialysis Adequacy: Achievement of Target Kt/V

Co.1.1. Measure Steward: Centers for Medicare & Medicaid Services

De.3. Brief Description of Measure: Percentage of pediatric (< 18 years old) peritoneal dialysis patient-months whose delivered peritoneal dialysis dose was a weekly Kt/Vurea ≥ 1.8 (dialytic + residual)

1b.1. Developer Rationale: The dose of dialysis is used to estimate the ability of peritoneal dialysis to clear the blood of accumulated toxins. In the adult population, outcome studies have shown an association between dose of hemodialysis in terms of small solute removal and clinical outcomes. Studies have shown a Kt/V of 1.8/week or greater in adult PD patients was associated with better serum albumin levels[1] and improved survival [2]. The ADEMEX did not show clinical benefit with in weekly Kt/V doses exceeding 1.7/week in adult CAPD patients [1].

Pediatric PD adequacy targets should be no lower than existing adult PD adequacy targets since generally, pediatric patients' greater metabolic demands require higher adequacy targets in terms of small solute clearance. No equivalent large scale clinical trials have been conducted in the pediatric peritoneal dialysis population but smaller scale observational studies support the association between delivered peritoneal dialysis dose and patient outcomes including the potential for improved growth [3].

1. Paniagua R, Amato D, Vonesh E, et al. "Effects of increased peritoneal clearances on mortality rates in peritoneal dialysis: ADEMEX, a prospective, randomized, controlled trial." *Journal of the American Society of Nephrology: JASN* (2002) 13:1307-20. PMID: 11961019.
2. Lo WK, Lui SL, Chan TM, et al. "Minimal and optimal peritoneal Kt/V targets: Results of an anuric peritoneal dialysis patient's survival analysis." *Kidney International* (2005) 67:2032-8. PMID: 15840054.
3. Rees L, Feather S, Shroff R. "Peritoneal Dialysis Clinical Practice Guidelines for Children and Adolescents." *British Association of Pediatric Nephrology* (2008).

S.4. Numerator Statement: Number of patient months in the denominator in which delivered peritoneal dialysis dose was a weekly Kt/Vurea ≥ 1.8 (dialytic + residual, measured in the last 6 months)

S.6. Denominator Statement: To be included in the denominator for a particular reporting month, the patient must be on peritoneal dialysis for the entire month, be < 18 years old at the beginning of the month, must have had ESRD for greater than 90 days at the beginning of the month, and must be assigned to that facility for the entire month.

S.8. Denominator Exclusions: Exclusions that are implicit in the denominator definition include

- 1) Patients not on peritoneal dialysis for the entire month
- 2) Adult patients (≥ 18 years old)
- 3) All patients who have had ESRD for <91 days, and
- 4) Patients not assigned to the facility for the entire month

There are no additional exclusions for this measure.

De.1. Measure Type: Outcome: Intermediate Clinical Outcome

S.17. Data Source: Claims, Registry Data

S.20. Level of Analysis: Facility

IF Endorsement Maintenance – Original Endorsement Date: Oct 02, 2015 **Most Recent Endorsement Date:** Oct 24, 2019

IF this measure is included in a composite, NQF Composite#/title:

IF this measure is paired/grouped, NQF#/title:

De.4. IF PAIRED/GROUPED, what is the reason this measure must be reported with other measures to appropriately interpret results? N/A

1. Evidence, Performance Gap, Priority – Importance to Measure and Report

Extent to which the specific measure focus is evidence-based, important to making significant gains in healthcare quality, and improving health outcomes for a specific high-priority (high-impact) aspect of healthcare where there is variation in or overall less-than-optimal performance. **Measures must be judged to meet all sub criteria to pass this criterion and be evaluated against the remaining criteria.**

1a. Evidence to Support the Measure Focus – See attached Evidence Submission Form

[2706_Evidence.docx](#)

1a.1 For Maintenance of Endorsement: Is there new evidence about the measure since the last update/submission?

Do not remove any existing information. If there have been any changes to evidence, the Committee will consider the new evidence. Please use the most current version of the evidence attachment (v7.1). Please use red font to indicate updated evidence.

No

1b. Performance Gap

Demonstration of quality problems and opportunity for improvement, i.e., data demonstrating:

- considerable variation, or overall less-than-optimal performance, in the quality of care across providers; and/or
- Disparities in care across population groups.

1b.1. Briefly explain the rationale for this measure (e.g., how the measure will improve the quality of care, the benefits or improvements in quality envisioned by use of this measure)

If a COMPOSITE (e.g., combination of component measure scores, all-or-none, any-or-none), SKIP this question and answer the composite questions.

The dose of dialysis is used to estimate the ability of peritoneal dialysis to clear the blood of accumulated toxins. In the adult population, outcome studies have shown an association between dose of hemodialysis in terms of small solute removal and clinical outcomes. Studies have shown a Kt/V of 1.8/week or greater in adult PD patients was associated with better serum albumin levels [1] and improved survival [2]. The ADEMEX did not show clinical benefit with in weekly Kt/V doses exceeding 1.7/week in adult CAPD patients [1].

Pediatric PD adequacy targets should be no lower than existing adult PD adequacy targets since generally, pediatric patients' greater metabolic demands require higher adequacy targets in terms of small solute clearance. No equivalent large scale clinical trials have been conducted in the pediatric peritoneal dialysis population but smaller scale observational studies support the association between delivered peritoneal dialysis dose and patient outcomes including the potential for improved growth [3].

1. Paniagua R, Amato D, Vonesh E, et al. "Effects of increased peritoneal clearances on mortality rates in peritoneal dialysis: ADEMEX, a prospective, randomized, controlled trial." *Journal of the American Society of Nephrology: JASN* (2002) 13:1307-20. PMID: 11961019.

2. Lo WK, Lui SL, Chan TM, et al. "Minimal and optimal peritoneal Kt/V targets: Results of an anuric peritoneal dialysis patient's survival analysis." *Kidney International* (2005) 67:2032-8. PMID: 15840054.

3. Rees L, Feather S, Shroff R. "Peritoneal Dialysis Clinical Practice Guidelines for Children and Adolescents." *British Association of Pediatric Nephrology* (2008).

1b.2. Provide performance scores on the measure as specified (current and over time) at the specified level of analysis. (*This is required for maintenance of endorsement. Include mean, std dev, min, max, interquartile range, scores by decile. Describe the data source including number of measured entities; number of patients; dates of data; if a sample, characteristics of the entities include.*) *This information also will be used to address the sub-criterion on improvement (4b1) under Usability and Use.*

Analysis of CROWNWeb and Medicare Claims data from January 2017 to December 2017 found a total of 31 facilities with at least 11 eligible patients. The data indicated the mean percentage of pediatric patients with PD adequacy measurements that achieved the

target at least once in six months was 71.3% (SD=21.2%). Distribution: Min=17.5%, Max=95.3%, 25th percentile = 59.0%, 50th percentile =76.4%, 75th percentile = 88.3%. A description of the data is included in questions 1.1-1.7 under “Scientific Acceptability”.

1b.3. If no or limited performance data on the measure as specified is reported in 1b2, then provide a summary of data from the literature that indicates opportunity for improvement or overall less than optimal performance on the specific focus of measurement.

N/A

1b.4. Provide disparities data from the measure as specified (current and over time) by population group, e.g., by race/ethnicity, gender, age, insurance status, socioeconomic status, and/or disability. (This is required for maintenance of endorsement. Describe the data source including number of measured entities; number of patients; dates of data; if a sample, characteristics of the entities included.) For measures that show high levels of performance, i.e., “topped out”, disparities data may demonstrate an opportunity for improvement/gap in care for certain sub-populations. This information also will be used to address the sub-criterion on improvement (4b1) under Usability and Use.

Given that the number of facilities included in the calculation in 1b.2 is only 31, the sample was determined to be too small to display meaningful data to assess disparities.

1b.5. If no or limited data on disparities from the measure as specified is reported in 1b.4, then provide a summary of data from the literature that addresses disparities in care on the specific focus of measurement. Include citations. Not necessary if performance data provided in 1b.4

N/A

2. Reliability and Validity—Scientific Acceptability of Measure Properties

Extent to which the measure, as specified, produces consistent (reliable) and credible (valid) results about the quality of care when implemented. **Measures must be judged to meet the sub criteria for both reliability and validity to pass this criterion and be evaluated against the remaining criteria.**

2a.1. Specifications The measure is well defined and precisely specified so it can be implemented consistently within and across organizations and allows for comparability. eMeasures should be specified in the Health Quality Measures Format (HQMF) and the Quality Data Model (QDM).

De.5. Subject/Topic Area (check all the areas that apply):

Renal, Renal : End Stage Renal Disease (ESRD)

De.6. Non-Condition Specific(check all the areas that apply):

De.7. Target Population Category (Check all the populations for which the measure is specified and tested if any):

Children, Populations at Risk

S.1. Measure-specific Web Page (Provide a URL link to a web page specific for this measure that contains current detailed specifications including code lists, risk model details, and supplemental materials. Do not enter a URL linking to a home page or to general information.)

N/A

S.2a. If this is an eMeasure, HQMF specifications must be attached. Attach the zipped output from the eMeasure authoring tool (MAT) - if the MAT was not used, contact staff. (Use the specification fields in this online form for the plain-language description of the specifications)

This is not an eMeasure Attachment:

S.2b. Data Dictionary, Code Table, or Value Sets (and risk model codes and coefficients when applicable) must be attached. (Excel or csv file in the suggested format preferred - if not, contact staff)

Attachment Attachment: 2706_Code_List.xlsx

S.2c. Is this an instrument-based measure (i.e., data collected via instruments, surveys, tools, questionnaires, scales, etc.)? Attach copy of instrument if available.

No, this is not an instrument-based measure Attachment:

S.2d. Is this an instrument-based measure (i.e., data collected via instruments, surveys, tools, questionnaires, scales, etc.)? Attach copy of instrument if available.

Not an instrument-based measure

S.3.1. For maintenance of endorsement: Are there changes to the specifications since the last updates/submission. If yes, update the specifications for S1-2 and S4-22 and explain reasons for the changes in S3.2.

No

S.3.2. For maintenance of endorsement, please briefly describe any important changes to the measure specifications since last measure update and explain the reasons.

There have been no changes to the measure specifications since the last endorsement in 2015.

S.4. Numerator Statement (Brief, narrative description of the measure focus or what is being measured about the target population, i.e., cases from the target population with the target process, condition, event, or outcome) DO NOT include the rationale for the measure.

IF an OUTCOME MEASURE, state the outcome being measured. Calculation of the risk-adjusted outcome should be described in the calculation algorithm (S.14).

Number of patient months in the denominator in which delivered peritoneal dialysis dose was a weekly Kt/Vurea ≥ 1.8 (dialytic + residual, measured in the last 6 months)

S.5. Numerator Details (All information required to identify and calculate the cases from the target population with the target process, condition, event, or outcome such as definitions, time period for data collection, specific data collection items/responses, code/value sets – Note: lists of individual codes with descriptors that exceed 1 page should be provided in an Excel or csv file in required format at S.2b)

IF an OUTCOME MEASURE, describe how the observed outcome is identified/counted. Calculation of the risk-adjusted outcome should be described in the calculation algorithm (S.14).

Reporting months with weekly Kt/Vurea ≥ 1.8 (dialytic + residual) are counted in the numerator. If no weekly Kt/Vurea value is reported for a given patient in the reporting month, the most recent peritoneal dialysis weekly Kt/Vurea value in the prior 5 months is applied to the calculation for that month.

Missing, expired, and not performed are not counted as achieving the minimum weekly Kt/Vurea threshold.

If RRF is to be incorporated in the Kt/V calculation, this will be calculated using the urea clearance derived from 24 hour urine collection. Total body water (V) should be estimated by one of the following pediatric specific V approximation methods:

- Prediction equation based upon heavy water dilution

Males: $TBW = 0.10 (ht \times wt) 0.68 - 0.37 (wt)$

Females: $TBW = 0.14 (ht \times wt) 0.64 - 0.35 (wt)$

- Simplified V estimating equations derived from the above prediction equations:

Males: $TBW = 20.88 \times BSA - 4.29$

Females: $TBW = 16.92 \times BSA - 1.81$

- Sex specific normograms derived from the above prediction equations and published in KDOQI PD guidelines for the pediatric population update from 2006.

S.6. Denominator Statement (Brief, narrative description of the target population being measured)

To be included in the denominator for a particular reporting month, the patient must be on peritoneal dialysis for the entire month, be < 18 years old at the beginning of the month, must have had ESRD for greater than 90 days at the beginning of the month, and must be assigned to that facility for the entire month.

S.7. Denominator Details (All information required to identify and calculate the target population/denominator such as definitions, time period for data collection, specific data collection items/responses, code/value sets – Note: lists of individual codes with descriptors that exceed 1 page should be provided in an Excel or csv file in required format at S.2b.)

IF an OUTCOME MEASURE, describe how the target population is identified. Calculation of the risk-adjusted outcome should be described in the calculation algorithm (S.14).

A treatment history file is the data source for the denominator calculation used for the analyses supporting this submission. This file provides a complete history of the status, location, and dialysis treatment modality of an ESRD patient from the date of the first ESRD service until the patient dies or the data collection cutoff date is reached. For each patient, a new record is created each time he/she changes facility or treatment modality. Each record represents a time period associated with a specific modality and dialysis facility. CROWNWeb is the primary basis for placing patients at dialysis facilities and dialysis claims are used as an additional source of information in certain situations. Information regarding first ESRD service date, death, and transplant is obtained from CROWNWeb (including the CMS Medical Evidence Form (Form CMS-2728) and the Death Notification Form (Form CMS-2746)) and Medicare claims, as well as the Organ Procurement and Transplant Network (OPTN).

S.8. Denominator Exclusions (Brief narrative description of exclusions from the target population)

Exclusions that are implicit in the denominator definition include

- 1) Patients not on peritoneal dialysis for the entire month
- 2) Adult patients (≥ 18 years old)
- 3) All patients who have had ESRD for < 91 days, and
- 4) Patients not assigned to the facility for the entire month

There are no additional exclusions for this measure.

S.9. Denominator Exclusion Details (All information required to identify and calculate exclusions from the denominator such as definitions, time period for data collection, specific data collection items/responses, code/value sets – Note: lists of individual codes with descriptors that exceed 1 page should be provided in an Excel or csv file in required format at S.2b.)

N/A

S.10. Stratification Information (Provide all information required to stratify the measure results, if necessary, including the stratification variables, definitions, specific data collection items/responses, code/value sets, and the risk-model covariates and coefficients for the clinically-adjusted version of the measure when appropriate – Note: lists of individual codes with descriptors that exceed 1 page should be provided in an Excel or csv file in required format with at S.2b.)

N/A

S.11. Risk Adjustment Type (Select type. Provide specifications for risk stratification in measure testing attachment)

No risk adjustment or risk stratification

If other:

S.12. Type of score:

Rate/proportion

If other:

S.13. Interpretation of Score (Classifies interpretation of score according to whether better quality is associated with a higher score, a lower score, a score falling within a defined interval, or a passing score)

Better quality = Higher score

S.14. Calculation Algorithm/Measure Logic (Diagram or describe the calculation of the measure score as an ordered sequence of steps including identifying the target population; exclusions; cases meeting the target process, condition, event, or outcome; time period for data, aggregating data; risk adjustment; etc.)

Denominator: For the reporting month, patients are included in the denominator if:

1. Patient modality is indicated as peritoneal dialysis during the entire month
2. Patient age as of the beginning of the reporting month is less than 18 years
3. Patient has had ESRD for greater than 90 days at the beginning of the month
4. Patient has been assigned to the facility for the entire month

Numerator:

For the reporting month, patients from the denominator are also included in the numerator if they have a weekly Kt/Vurea ≥ 1.8 .

If no weekly Kt/Vurea value is reported for a given patient in a month, the most recent peritoneal dialysis weekly Kt/Vurea value in the prior 5 months is applied to the calculation for that month.

S.15. Sampling (If measure is based on a sample, provide instructions for obtaining the sample and guidance on minimum sample size.)

IF an instrument-based performance measure (e.g., PRO-PM), identify whether (and how) proxy responses are allowed.

N/A

S.16. Survey/Patient-reported data (If measure is based on a survey or instrument, provide instructions for data collection and guidance on minimum response rate.)

Specify calculation of response rates to be reported with performance measure results.

N/A

S.17. Data Source (Check ONLY the sources for which the measure is SPECIFIED AND TESTED).

If other, please describe in S.18.

Claims, Registry Data

S.18. Data Source or Collection Instrument (Identify the specific data source/data collection instrument (e.g. name of database, clinical registry, collection instrument, etc., and describe how data are collected.)

IF instrument-based, identify the specific instrument(s) and standard methods, modes, and languages of administration.

For the analyses supporting this submission, the measure is calculated using CROWNWeb as the primary data source for the Kt/V values used to determine the numerator. If a patient's Kt/V data are missing in CROWNWeb, Kt/V values from outpatient Medicare dialysis claims are used as an additional source for obtaining that information. Please see the attached data dictionary for a list of specific data elements that are used from each data source.

S.19. Data Source or Collection Instrument (available at measure-specific Web page URL identified in S.1 OR in attached appendix at A.1)

No data collection instrument provided

S.20. Level of Analysis (Check ONLY the levels of analysis for which the measure is SPECIFIED AND TESTED)

Facility

S.21. Care Setting (Check ONLY the settings for which the measure is SPECIFIED AND TESTED)

Other:Dialysis Facility

If other:

S.22. COMPOSITE Performance Measure - Additional Specifications (Use this section as needed for aggregation and weighting rules, or calculation of individual performance measures if not individually endorsed.)

N/A

2. Validity – See attached Measure Testing Submission Form

2706_testing_.docx

2.1 For maintenance of endorsement

Reliability testing: If testing of reliability of the measure score was not presented in prior submission(s), has reliability testing of the measure score been conducted? If yes, please provide results in the Testing attachment. Please use the most current version of the testing attachment (v7.1). Include information on all testing conducted (prior testing as well as any new testing); use red font to indicate updated testing.

Yes

2.2 For maintenance of endorsement

Has additional empirical validity testing of the measure score been conducted? If yes, please provide results in the Testing attachment. Please use the most current version of the testing attachment (v7.1). Include information on all testing conducted (prior testing as well as any new testing); use red font to indicate updated testing.

Yes

2.3 For maintenance of endorsement

Risk adjustment: For outcome, resource use, cost, and some process measures, risk-adjustment that includes social risk factors is not prohibited at present. Please update sections 1.8, 2a2, 2b1,2b4.3 and 2b5 in the Testing attachment and S.140 and S.11 in the online submission form. NOTE: These sections must be updated even if social risk factors are not included in the risk-adjustment strategy. You MUST use the most current version of the Testing Attachment (v7.1) -- older versions of the form will not have all required questions.

No - This measure is not risk-adjusted

3. Feasibility

Extent to which the specifications including measure logic, require data that are readily available or could be captured without undue burden and can be implemented for performance measurement.

3a. Byproduct of Care Processes

For clinical measures, the required data elements are routinely generated and used during care delivery (e.g., blood pressure, lab test, diagnosis, medication order).

3a.1. Data Elements Generated as Byproduct of Care Processes.

Generated or collected by and used by healthcare personnel during the provision of care (e.g., blood pressure, lab value, diagnosis, depression score)

If other:

3b. Electronic Sources

The required data elements are available in electronic health records or other electronic sources. If the required data are not in electronic health records or existing electronic sources, a credible, near-term path to electronic collection is specified.

3b.1. To what extent are the specified data elements available electronically in defined fields (i.e., data elements that are needed to compute the performance measure score are in defined, computer-readable fields) Update this field for **maintenance of endorsement**.

ALL data elements are in defined fields in a combination of electronic sources

3b.2. If ALL the data elements needed to compute the performance measure score are not from electronic sources, specify a credible, near-term path to electronic capture, OR provide a rationale for using other than electronic sources. For **maintenance of endorsement**, if this measure is not an eMeasure (eCQM), please describe any efforts to develop an eMeasure (eCQM).

3b.3. If this is an eMeasure, provide a summary of the feasibility assessment in an attached file or make available at a measure-specific URL. Please also complete and attach the NQF Feasibility Score Card.

Attachment:

3c. Data Collection Strategy

Demonstration that the data collection strategy (e.g., source, timing, frequency, sampling, patient confidentiality, costs associated with fees/licensing of proprietary measures) can be implemented (e.g., already in operational use, or testing demonstrates that it is ready to put into operational use). For eMeasures, a feasibility assessment addresses the data elements and measure logic and demonstrates the eMeasure can be implemented or feasibility concerns can be adequately addressed.

3c.1. Required for maintenance of endorsement. Describe difficulties (as a result of testing and/or operational use of the measure) regarding data collection, availability of data, missing data, timing and frequency of data collection, sampling, patient confidentiality, time and cost of data collection, other feasibility/implementation issues.

If instrument-based, consider implications for both individuals providing data (patients, service recipients, respondents) and those whose performance is being measured.

Data collection is accomplished via CROWNWeb, a web-based and electronic batch submission platform maintained and operated by CMS contractors. Measures reported on DFC are reviewed on a regular basis by dialysis facility providers and rare instances of inaccurate or missing data are present based on comments reported in the DFC ticketing system.

3c.2. Describe any fees, licensing, or other requirements to use any aspect of the measure as specified (e.g., value/code set, risk model, programming code, algorithm).

N/A

4. Usability and Use

Extent to which potential audiences (e.g., consumers, purchasers, providers, policy makers) are using or could use performance results for both accountability and performance improvement to achieve the goal of high-quality, efficient healthcare for individuals or populations.

4a. Accountability and Transparency

Performance results are used in at least one accountability application within three years after initial endorsement and are publicly reported within six years after initial endorsement (or the data on performance results are available). If not in use at the time of initial endorsement, then a credible plan for implementation within the specified timeframes is provided.

4.1. Current and Planned Use

NQF-endorsed measures are expected to be used in at least one accountability application within 3 years and publicly reported within 6 years of initial endorsement in addition to performance improvement.

Specific Plan for Use	Current Use (for current use provide URL)

4a1.1 For each CURRENT use, checked above (update for maintenance of endorsement), provide:

- Name of program and sponsor
- Purpose
- Geographic area and number and percentage of accountable entities and patients included
- Level of measurement and setting

DFC:

Purpose: Dialysis Facility Compare helps patients find detailed information about Medicare-certified dialysis facilities. They can compare the services and the quality of care that facilities provide.

Geographic area: United States

Number of accountable entities: All Medicare-certified dialysis facilities who are eligible for the measure, and have at least 11 patients (due to public reporting requirements). For the most recent update to Dialysis Facility Compare (January 2019), 34 facilities had a score reported.

Patients included: All patients who meet the requirements to be included in the measure.

QIP:

Purpose: The ESRD QIP will reduce payments to ESRD facilities that do not meet or exceed certain performance standards. The measure was added to the program for PY2018. In PY2019, the QIP began reporting a comprehensive Kt/V measure, for which this the data used in this measure is counted. For the purposes of this review, we are considering this an active implementation of this measure.

Geographic area: United States

Number of accountable entities: All Medicare-certified dialysis facilities who are eligible for the measure, and have at least 11 patients (due to public reporting requirements). For the most recent QIP report (PY 2019), this was 6835 facilities. Since the QIP reports a comprehensive Kt/V measure, the number of facilities counted here is larger than for DFC.

4a1.2. If not currently publicly reported OR used in at least one other accountability application (e.g., payment program, certification, licensing) what are the reasons? (e.g., Do policies or actions of the developer/steward or accountable entities restrict access to performance results or impede implementation?)

N/A

4a1.3. If not currently publicly reported OR used in at least one other accountability application, provide a credible plan for implementation within the expected timeframes -- any accountability application within 3 years and publicly reported within 6

years of initial endorsement. *(Credible plan includes the specific program, purpose, intended audience, and timeline for implementing the measure within the specified timeframes. A plan for accountability applications addresses mechanisms for data aggregation and reporting.)*

N/A

4a2.1.1. Describe how performance results, data, and assistance with interpretation have been provided to those being measured or other users during development or implementation.

How many and which types of measured entities and/or others were included? If only a sample of measured entities were included, describe the full population and how the sample was selected.

Results of this measure are currently reported on Dialysis Facility Compare and in the ESRD Quality Incentive Program (via the comprehensive Kt/V measure described above). All Medicare-certified dialysis facilities are eligible for reporting in both programs (approximately 7,000 dialysis facilities). Each program has a helpdesk and supporting documentation available to assist with interpretation of the measure results.

The measure developer (UM-KECC) produces and distributes the DFC data under contract with CMS. Other CMS contractors calculate and distribute the ESRD QIP measure results.

4a2.1.2. Describe the process(es) involved, including when/how often results were provided, what data were provided, what educational/explanatory efforts were made, etc.

For DFC, the results are first reported to facilities via a closed preview period, where facilities can review their data prior to each of the quarterly updates of the public facing Dialysis Facility Compare website. These preview reports are posted on dialysisdata.org, where facilities can also find a detailed Guide to the Quarterly Dialysis Facility Compare Reports and other supporting documentation. Facilities can submit comments/questions about their results at any time, and can request patient lists for their facilities during the specified preview periods.

For the ESRD QIP, results are first reported to facilities via closed preview period on an annual basis; facilities can review their data prior to the results becoming public at the end of the calendar year. These preview reports are posted on qualitynet.org, where facilities can also find supporting documentation and can submit comments/questions about their results.

A measures manual that describes the calculations for both of these programs in detail is published on the CMS website: https://www.cms.gov/Medicare/Quality-Initiatives-Patient-Assessment-Instruments/ESRDQIP/06_MeasuringQuality.html

4a2.2.1. Summarize the feedback on measure performance and implementation from the measured entities and others described in 4d.1.

Describe how feedback was obtained.

For DFC, feedback can be provided any time through contacting the dialysisdata.org helpdesk. Preview periods allow for specific times for facilities review and comment on measure calculations, and provide an opportunity to request a patient list.

For the ESRD QIP, feedback can be provided any time through contacting the QIP helpdesk. Preview periods allow for specific times for facilities review and comment on measure calculations. Comments can also be submitted in response to the Notice of Proposed Rulemaking for each QIP payment year.

4a2.2.2. Summarize the feedback obtained from those being measured.

We reviewed the comments and questions submitted during the DFC preview periods that have taken place since the last maintenance (2016-present). Outside of questions about facility-specific results (such as questioning the Kt/V value on record for a particular patient), we receive a handful of questions each preview period regarding the measure specifications, such as the determination of dialysis modality.

Note that since UM-KECC is not the contractor responsible for the ESRD Quality Incentive Program, we do not have access to the detailed comments/requested that are submitted during the annual preview period for that program.

4a2.2.3. Summarize the feedback obtained from other users

We reviewed the public comments that were addressed in the ESRD QIP Final Rules (FRs) that have been published since the last endorsement (PY2019 – PY2022). Since PY 2019, the ESRD QIP has been reporting a combined Kt/V measure in order to allow for more reporting of data for pediatric and peritoneal dialysis patients. Most of the comments addressed in the rule have to do with

that decision. In the FR for PY 2019, there were also a number of questions about how the combined measure would be specified that were along similar lines to what is often asked via the DFC preview period.

4a2.3. Describe how the feedback described in 4a2.2.1 has been considered when developing or revising the measure specifications or implementation, including whether the measure was modified and why or why not.

The measure specifications have not been revised since the last maintenance cycle in 2015. Feedback received during DFC preview periods has resulted in more detailed and accurate documentation available to the public, primarily via the ESRD Measures Manual and the Guide to the Quarterly Dialysis Facility Reports.

Improvement

Progress toward achieving the goal of high-quality, efficient healthcare for individuals or populations is demonstrated. If not in use for performance improvement at the time of initial endorsement, then a credible rationale describes how the performance results could be used to further the goal of high-quality, efficient healthcare for individuals or populations.

4b1. Refer to data provided in 1b but do not repeat here. Discuss any progress on improvement (trends in performance results, number and percentage of people receiving high-quality healthcare; Geographic area and number and percentage of accountable entities and patients included.)

If no improvement was demonstrated, what are the reasons? If not in use for performance improvement at the time of initial endorsement, provide a credible rationale that describes how the performance results could be used to further the goal of high-quality, efficient healthcare for individuals or populations.

The following reports the performance scores for this measure at the yearly level for 2015 - 2017. This analysis demonstrates an increase in performance across three years for the measure as implemented on DFC.

Year 2015: N = 27, Mean = 55.6%, Std Dev = 29.7%, Min = 3.6%, Max = 97.3%

Year 2016: N = 30, Mean = 60.6%, Std Dev = 26.9%, Min = 7%, Max = 95.8%

Year 2017: N = 31, Mean = 71.3%, Std Dev = 17.5%, Min = 17.5%, Max = 95.3%

4b2. Unintended Consequences

The benefits of the performance measure in facilitating progress toward achieving high-quality, efficient healthcare for individuals or populations outweigh evidence of unintended negative consequences to individuals or populations (if such evidence exists).

4b2.1. Please explain any unexpected findings (positive or negative) during implementation of this measure including unintended impacts on patients.

We have been encouraged by the magnitude of improvement in measure results after implementation noted in 4b1 above.

We have not been notified of documented unintended impacts on patients as a result of measure implementation.

4b2.2. Please explain any unexpected benefits from implementation of this measure.

None that we are aware of, other than facility improvements over the last three reporting periods as noted in 4b1 and commented on in 4b2.1

5. Comparison to Related or Competing Measures

If a measure meets the above criteria and there are endorsed or new related measures (either the same measure focus or the same target population) or competing measures (both the same measure focus and the same target population), the measures are compared to address harmonization and/or selection of the best measure.

5. Relation to Other NQF-endorsed Measures

Are there related measures (conceptually, either same measure focus or target population) or competing measures (conceptually both the same measure focus and same target population)? If yes, list the NQF # and title of all related and/or competing measures.

No

5.1a. List of related or competing measures (selected from NQF-endorsed measures)

5.1b. If related or competing measures are not NQF endorsed please indicate measure title and steward.

<p>5a. Harmonization of Related Measures The measure specifications are harmonized with related measures; OR The differences in specifications are justified</p> <p>5a.1. If this measure conceptually addresses EITHER the same measure focus OR the same target population as NQF-endorsed measure(s): Are the measure specifications harmonized to the extent possible?</p> <p>5a.2. If the measure specifications are not completely harmonized, identify the differences, rationale, and impact on interpretability and data collection burden.</p>
<p>5b. Competing Measures The measure is superior to competing measures (e.g., is a more valid or efficient way to measure); OR Multiple measures are justified.</p> <p>5b.1. If this measure conceptually addresses both the same measure focus and the same target population as NQF-endorsed measure(s): Describe why this measure is superior to competing measures (e.g., a more valid or efficient way to measure quality); OR provide a rationale for the additive value of endorsing an additional measure. (Provide analyses when possible.)</p>

<p>Appendix</p> <p>A.1 Supplemental materials may be provided in an appendix. All supplemental materials (such as data collection instrument or methodology reports) should be organized in one file with a table of contents or bookmarks. If material pertains to a specific submission form number, that should be indicated. Requested information should be provided in the submission form and required attachments. There is no guarantee that supplemental materials will be reviewed. No appendix Attachment:</p>
<p>Contact Information</p> <p>Co.1 Measure Steward (Intellectual Property Owner): Centers for Medicare & Medicaid Services Co.2 Point of Contact: Helen, Dollar-Maples, Helen.Dollar-Maples@cms.hhs.gov, 410-786-7214- Co.3 Measure Developer if different from Measure Steward: University of Michigan Kidney Epidemiology and Cost Center Co.4 Point of Contact: Casey, Parrotte, parrotte@med.umich.edu</p>
<p>Additional Information</p> <p>Ad.1 Workgroup/Expert Panel involved in measure development Provide a list of sponsoring organizations and workgroup/panel members' names and organizations. Describe the members' role in measure development. The TEP that provided face validity for this measure met in 2013 and was comprised of the following members:</p> <p>Deepa Chand, MD MHSA Akron Children's Hospital Medical Center</p> <p>Annabelle Chua, MD Baylor College of Medicine/Texas Children's Hospital</p> <p>Barbara Fivush, MD MHSA</p>

<p>Johns Hopkins Children's Center</p> <p>Joseph Flynn, MD MS University of Washington School of Medicine</p> <p>Bradley Warady, MD University of Missouri, Kansas City School of Medicine</p>
<p>Measure Developer/Steward Updates and Ongoing Maintenance</p> <p>Ad.2 Year the measure was first released: 2015</p> <p>Ad.3 Month and Year of most recent revision: 04, 2019</p> <p>Ad.4 What is your frequency for review/update of this measure? Annually</p> <p>Ad.5 When is the next scheduled review/update for this measure? 04, 2020</p>
<p>Ad.6 Copyright statement: N/A</p> <p>Ad.7 Disclaimers: N/A</p>
<p>Ad.8 Additional Information/Comments:</p>