NICE National Institute for Health and Care Excellence

Chronic kidney disease in adults

Quality standard
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Contents

This standard is based on CG182 and TA48.

This standard should be read in conjunction with QS72, QS15, QS13, QS66, QS76, QS87, QS100, QS99 and QS6.

Introduction and overview

This quality standard covers identification, assessment and clinical management of chronic kidney disease (CKD) in adults including the management of established renal failure.

It has been revised to ensure alignment with the updated NICE guideline on chronic kidney disease (NICE guideline CG182), which replaced the original development source (NICE guideline CG73) for this quality standard. NICE quality standards are revised when minor amendments are needed to ensure consistency with updated NICE and NICE-accredited source guidance or to address overlap between quality standard topics.

Quality statements 11–15 in this quality standard have been replaced by statements 2–6 in renal replacement therapy services (NICE quality standard 72).

Introduction

Chronic kidney disease describes abnormal kidney function and/or structure. It is common, frequently unrecognised and often exists together with other conditions (for example, cardiovascular disease and diabetes). The Health Survey for England 2009 estimated that the prevalence of adult CKD in England was around 13%. The risk of developing CKD increases with increasing age, and some conditions that coexist with CKD become more severe as kidney dysfunction advances. CKD is usually characterised by an asymptomatic period, which is potentially detectable. Tests for detecting CKD are both simple and widely available and there is evidence that treatment can prevent or delay progression of CKD, reduce or prevent the development of complications, and reduce the risk of cardiovascular disease. In cases where progression cannot be prevented, CKD may progress to established renal failure, requiring life-saving dialysis or kidney transplant.

Chronic kidney disease in adults often exists together with other conditions (for example, cardiovascular disease and diabetes) and when advanced, carries a high risk of mortality. This quality standard describes markers of high-quality, cost-effective care that, when delivered collectively, should contribute to improving the effectiveness, safety and experience of care for adults with chronic kidney disease in the following ways:

- Preventing people from dying prematurely.
- Enhancing quality of life for people with long-term conditions.
- Helping people to recover from episodes of ill health or following injury.
- Ensuring that people have a positive experience of care.
- Treating and caring for people in a safe environment and protecting them from avoidable harm.

The NHS Outcomes Framework 2011/12 is available from www.gov.uk.

Overview

The quality standard for CKD in adults requires that services should be commissioned from and coordinated across all relevant agencies encompassing the whole CKD care pathway. An integrated approach to provision of services is fundamental to the delivery of high quality care to people with CKD.

Unless otherwise stated, the term CKD in this quality standard describes collectively stages 1 to 5 of CKD. See development sources for details.

List of statements

Statement 1. People with risk factors for CKD are offered testing, and people with CKD are correctly identified.

Statement 2. People with CKD who may benefit from specialist care are referred for specialist assessment in accordance with NICE guidance.

Statement 3. People with CKD have a current agreed care plan appropriate to the stage and rate of progression of CKD.

Statement 4. People with CKD are assessed for cardiovascular risk.

Statement 5. People with higher levels of proteinuria, and people with diabetes and microalbuminuria, are enabled to safely maintain their systolic blood pressure within a target range 120–129 mmHg and their diastolic blood pressure below 80 mmHg.

Statement 6. People with CKD are assessed for disease progression.

Statement 7. People with CKD who become acutely unwell have their medication reviewed, and receive an assessment of volume status and renal function.

Statement 8. People with anaemia of CKD have access to and receive anaemia treatment in accordance with NICE guidance.

Statement 9. People with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months, receive unbiased personalised information on established kidney failure and renal replacement therapy options.

Statement 10. People with established renal failure have access to psychosocial support (which may include support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

In addition, quality standards that should also be considered when commissioning and providing a high-quality CKD service are listed in related NICE quality standards.

Quality statement 1: Identification

Quality statement

People with risk factors for CKD are offered testing, and people with CKD are correctly identified.

Quality measure

Structure

Evidence of local arrangements to ensure that people with risk factors for CKD are identified and offered testing and that all people receiving testing for CKD are tested and diagnosed in accordance with NICE guidance.

Process

a) Proportion of people with risk factors for CKD who receive testing.

Numerator – the number of people in the denominator receiving testing for CKD.

Denominator – the number of people with risk factors for CKD.

b) Proportion of people tested for CKD who are tested and diagnosed in accordance with NICE guidance.

Numerator – the number of people in the denominator tested and diagnosed in accordance with NICE guidance.

Denominator – the number of people tested for CKD.

Outcome

Increase in the total number of people correctly diagnosed with CKD.

Consideration should be given to comparing the number of people diagnosed with CKD with estimated prevalence figures.

What the quality statement means for each audience

Service providers ensure that systems are in place to offer testing to people with risk factors for CKD, and that all testing and diagnosis is carried out in accordance with NICE guidance.

Healthcare professionals ensure they offer testing to people with risk factors for CKD and carry out all testing and diagnosis in accordance with NICE guidance.

Commissioners ensure they commission services that offer testing to people with risk factors for CKD, and that all testing and diagnosis is carried out in accordance with NICE guidance.

People who are at particular risk of CKD are offered tests for CKD (see patient information for further details).

People with CKD are tested and correctly diagnosed with the condition.

Source guidance

- Recommendations on investigation of CKD are contained within section 1.1 and recommendation 1.2.2 of chronic kidney disease (NICE guideline CG182).

Data source

Structure

Local data collection.

Process

a) Local data collection.

Quality and Outcomes Framework (QOF) indicator DM 13: the percentage of patients with diabetes who have a record of microalbuminuria testing in the previous 15 months (exception reporting for patients with proteinuria).

QOF indicator DM 22: the percentage of patients with diabetes who have a record of estimated glomerular filtration rate (eGFR) or serum creatinine testing in the previous 15 months.

QOF indicator MH 4: the percentage of patients on lithium therapy with a record of serum creatinine and thyroid stimulating hormone in the preceding 15 months.

The National Diabetes Audit also collects data on albuminuria and creatinine testing in people with diabetes.

b) Local data collection.

Outcome

Local data collection for stages 1 and 2.

QOF indicator CKD 1: the practice can produce a register of patients aged 18 years and over with CKD (US National Kidney Foundation: Stage 3 to 5 CKD).

Definitions

Chronic kidney disease (NICE guideline CG182) states that testing for CKD using eGFRcreatinine and albumin:creatinine ratio (ACR) should be offered to people with any of the following risk factors:

- diabetes
- hypertension
- acute kidney injury
- cardiovascular disease (ischaemic heart disease, chronic heart failure, peripheral vascular disease or cerebral vascular disease)
- structural renal tract disease, recurrent renal calculi or prostatic hypertrophy
- multisystem diseases with potential kidney involvement, for example, systemic lupus erythematosus
- family history of end-stage kidney disease (GFR category G5) or hereditary kidney disease
- opportunistic detection of haematuria.

The new section 1.1 in chronic kidney disease (NICE guideline CG182) contains additional recommendations to provide clarification on measurement of kidney function using GFR and how to ensure values are correctly interpreted. Also amended recommendations on tests to detect and identify proteinuria and who should be tested for CKD are within this section.

Equality and diversity considerations

An ethnicity correction factor is required for reporting GFR values for people of African-Caribbean ethnicity to ensure correct diagnosis and assessment.

Correct identification and assessment of older people requires added caution. Although CKD prevalence is higher in older populations, an eGFR in the range 45–59 ml/min/1.73 m^2, if stable over time and without any other evidence of kidney damage, in people aged over 70 years, should be considered unlikely to be associated with CKD-related complications.

This statement may not address under-identification in groups who are under-represented on primary care registers, such as homeless people and people who rarely visit their GP.

Quality statement 2: Specialist referral

Quality statement

People with CKD who may benefit from specialist care are referred for specialist assessment in accordance with NICE guidance.

Quality measure

Structure

Evidence of local arrangements to ensure that people with CKD who may benefit from specialist care are referred for specialist assessment in accordance with NICE guidance.

Process

Proportion of people with CKD in defined at-risk groups who are referred for specialist assessment.

Numerator – the number of people in the denominator referred for specialist assessment.

Denominator – the number of people with CKD in defined at-risk groups.

An audit standard of less than 100% should be expected for this process measure, to allow for cases where the practitioner considers it is not in the best interests of the person concerned to be referred.

What the quality statement means for each audience

Service providers ensure that systems are in place to refer people with CKD who may benefit from specialist care, for specialist assessment, in accordance with NICE guidance.

Healthcare professionals ensure they refer people with CKD who may benefit from specialist care for specialist assessment in accordance with NICE guidance.

Commissioners ensure they commission services that refer people with CKD who may benefit from specialist care for specialist assessment in accordance with NICE guidance.

People with CKD who may benefit from specialist care are referred for specialist assessment (see patient information for further details).

Source guidance

- Chronic kidney disease (NICE guideline CG182) recommendations 1.2.2 and 1.5.2.

Data source

Structure

Local data collection.

Process

Local data collection.

The UK Renal Registry collects data from renal services on referral source and date.

Definitions

Chronic kidney disease (NICE guideline CG182) recommends that people with CKD in the following groups should normally be referred for specialist assessment:

- GFR less than 30 ml/min/1.73 m^2 (GFR category G4 or G5), with or without diabetes
- ACR 70 mg/mmol or more, unless known to be caused by diabetes and already appropriately treated
- ACR 30 mg/mmol or more (ACR category A3), together with haematuria
- sustained decrease in GFR of 25% or more, and a change in GFR category or sustained decrease in GFR of 15 ml/min/1.73 m^2 or more within 12 months
- hypertension that remains poorly controlled despite the use of at least 4 antihypertensive drugs at therapeutic doses (see also hypertension [NICE guideline CG127])
- known or suspected rare or genetic causes of CKD
- suspected renal artery stenosis.

Quality statement 3: Planning care

Quality statement

People with CKD have a current agreed care plan appropriate to the stage and rate of progression of CKD.

Quality measure

Structure

a) Evidence of local arrangements to ensure that people with CKD have a current agreed care plan appropriate to the stage and rate of progression of CKD (verbal or written), including an advance care plan for end of life care where appropriate.

b) Evidence of local arrangements to ensure that renal units that are able to use PatientView promote access to it using verbal and written information.

c) Evidence of local arrangements to collect, analyse and act upon patient questionnaires of how informed patients are and how informed they feel following renal-related appointments.

Process

a) Proportion of people with CKD who have a current agreed care plan appropriate to the stage and rate of progression of CKD.

Numerator – the number of people in the denominator with a current agreed care plan appropriate to the stage and rate of progression of CKD.

Denominator – the number of people with CKD.

b) Proportion of people with CKD needing end of life care including those receiving conservative management of established kidney failure, who have a jointly agreed advance care plan.

Numerator – the number of people in the denominator with a jointly agreed advance care plan.

Denominator – the number of people with CKD needing end of life care including those receiving conservative management of established kidney failure.

What the quality statement means for each audience

Service providers ensure that systems are in place to develop current agreed care plans with people who have CKD appropriate to the stage and rate of progression of CKD, including an advance care plan for end of life care if appropriate.

Health and social care professionals develop and maintain current agreed care plans with people who have CKD that is appropriate to the stage and rate of progression of CKD, including an advance care plan for end of life care if appropriate.

Commissioners ensure they commission services that develop and maintain current agreed care plans with people who have CKD appropriate to the stage and rate of progression of CKD, including an advance care plan for end of life care if appropriate.

People with CKD receive information suitable for how advanced their condition is, which explains their condition and the care they will receive, and are involved in decisions about their current and future care.

Source guidance

- Overarching principles of NICE guideline CG114 (see 'Patient-centred care' section).
- The Renal Association clinical practice guideline: planning, initiating and withdrawal of renal replacement therapy, recommendation 6.3.

Data source

Structure

Local data collection.

Process

a) Local data collection. Contained within The Renal Association clinical practice guideline: planning, initiating and withdrawal of renal replacement therapy, audit measure 18.

Definitions

A care plan incorporates the provision of information on diagnosis and prognosis, multidisciplinary support, education for self care and how future care will be provided. It places emphasis on person-centred care and shared decision-making. A care plan is a process and may take a written, verbal or electronic form to include the following.

All stages:

- People should feel informed about what CKD is and how it affects them, what they need to do and why it is important for them to do this.
- Treatments available for CKD, and their advantages and disadvantages.
- Complications or side effects that may occur as a result of treatment or medication.
- What people can do to manage and influence their own condition.
- Information about the ways in which CKD and the treatment may affect people's daily life, social activities, work opportunities and financial situation, including benefits and allowances available.
- Information about how to cope with and adjust to CKD and sources of psychological support.
- Drugs that should be used with caution or at reduced dose in people with CKD.

Stages 4–5:

- Risks and benefits of renal replacement therapy options to ensure informed choice.
- Information about kidney transplantation, including preemptive transplantation.
- Importance of timely access placement for dialysis.
- End of life care, including a jointly agreed advance care plan.

People receiving conservative management of kidney disease:

- Supportive medical care (excluding dialysis and transplantation).
- Specialist palliative care.

A care plan is current and agreed when it relates to the most recent care delivered as well as forthcoming care that is planned, and when it reflects ongoing shared decision-making between healthcare professionals and the person with CKD.

PatientView enables people with CKD to access online information about their diagnosis, treatment, and latest test results. PatientView is only available from some UK renal units, and for patients who have chosen to participate.

NICE has produced information about NICE guidance, written specifically for patients, on chronic kidney disease and treating anaemia in people with chronic kidney disease.

A guide to implementing kidney care plans is available from NHS Kidney Care.

Equality and diversity considerations

All information about treatment and care should be culturally appropriate. It should also be accessible to people with additional needs such as physical, sensory or learning disabilities, and to people who do not speak or read English. People with CKD should have access to an interpreter or advocate if needed.

Uptake of PatientView is dependent on IT access and computer literacy and is only available in English. Some groups, particularly low-income households and people whose first language is not English may not be able to access PatientView. Additionally, PatientView is only available in some renal units. People unable to or choosing not to access PatientView should receive the same information from their renal unit via different means, such as a verbal discussion with a healthcare professional.

Quality statement 4: Cardiovascular risk

Quality statement

People with CKD are assessed for cardiovascular risk.

Quality measure

Structure

Evidence of local arrangements to ensure that people with CKD are assessed for cardiovascular risk.

Process

Proportion of people with CKD who are assessed for cardiovascular risk.

Numerator – the number of people in the denominator assessed for cardiovascular risk.

Denominator – the number of people with CKD.

What the quality statement means for each audience

Service providers ensure that people with CKD are assessed for cardiovascular risk.

Healthcare professionals ensure they assess people with CKD for cardiovascular risk.

Commissioners ensure they commission services that assess people with CKD for cardiovascular risk.

People with CKD are assessed for their risk of heart problems.

Source guidance

- The Renal Association clinical practice guideline: cardiovascular disease in CKD, recommendations 1.1 and 1.2.

Data source

Structure

Local data collection.

Process

Local data collection.

Definitions

The Renal Association clinical practice guideline: cardiovascular disease in CKD suggests recording the following as part of a cardiovascular risk assessment:

- angina and myocardial infarction
- previous coronary angioplasty or coronary artery bypass grafting
- stroke and transient ischaemic attack
- previous carotid artery surgery or angioplasty
- peripheral vascular disease or previous intervention
- cardiac failure
- arrhythmias (supraventricular and ventricular)
- diabetes
- ethnicity.

Healthy lifestyle factors including smoking, weight control and exercise should also be discussed.

Equality and diversity considerations

Cardiovascular risk is higher in some black and minority ethnic groups and this should be considered as part of an overall assessment of risk for cardiovascular disease.

Quality statement 5: Blood pressure control

Quality statement

People with higher levels of proteinuria, and people with diabetes and microalbuminuria, are enabled to safely maintain their systolic blood pressure within a target range 120–129 mmHg and their diastolic blood pressure below 80 mmHg.

Quality measure

Structure

Evidence of local arrangements to ensure that people with higher levels of proteinuria, and people with diabetes and microalbuminuria, are enabled to safely maintain their systolic blood pressure within a target range 120–129 mmHg and their diastolic blood pressure below 80 mmHg.

Process

a) Proportion of people with higher levels of proteinuria with a recording of blood pressure in the previous 9 months.

Numerator – the number of people in the denominator with a recording of blood pressure in the previous 9 months.

Denominator – the number of people with higher levels of proteinuria.

b) Proportion of people with diabetes and microalbuminuria with a recording of blood pressure in the previous 9 months.

Numerator – the number of people in the denominator with a recording of blood pressure in the previous 9 months.

Denominator – the number of people with diabetes and microalbuminuria.

Outcome

a) Proportion of people with higher levels of proteinuria with a recording of blood pressure in the previous 9 months, whose latest systolic blood pressure reading is in the range 120–129 mmHg and diastolic blood pressure below 80 mmHg.

Numerator – the number of people in the denominator with latest systolic blood pressure in the range 120–129 mmHg and diastolic blood pressure below 80 mmHg.

Denominator – the number of people with higher levels of proteinuria with a recording of blood pressure in the previous 9 months.

An audit standard of less than 100% is expected for outcome a) to account for measurement variability, intercurrent illness and to avoid any risks associated with overtreatment.

b) Proportion of people with diabetes and microalbuminuria with a recording of blood pressure in the previous 9 months, whose latest systolic blood pressure reading is in the range 120–129 mmHg and diastolic blood pressure below 80 mmHg.

Numerator – the number of people in the denominator with latest systolic blood pressure in the range 120–129 mmHg and diastolic blood pressure below 80 mmHg.

Denominator – the number of people with diabetes and microalbuminuria with a recording of blood pressure in the previous 9 months.

An audit standard of less than 100% is expected for outcome b) to account for measurement variability, intercurrent illness and to avoid any risks associated with overtreatment.

What the quality statement means for each audience

Service providers ensure that systems are in place to enable people with higher levels of proteinuria and people with diabetes and microalbuminuria to safely control their systolic blood pressure, typically within the target range 120–129 mmHg and their diastolic blood pressure below 80 mmHg.

Healthcare professionals ensure they enable people with higher levels of proteinuria and people with diabetes and microalbuminuria to safely control their systolic blood pressure, typically within the target range 120–129 mmHg and their diastolic blood pressure below 80 mmHg.

Commissioners ensure they commission services that enable people with higher levels of proteinuria and people with diabetes and microalbuminuria to safely control their systolic blood pressure, typically within the target range 120–129 mmHg and their diastolic blood pressure below 80 mmHg.

People with large amounts of protein in their urine are given support to help control their blood pressure.

People with diabetes and protein in their urine are given support to help control their blood pressure.

Source guidance

- Chronic kidney disease (NICE guideline CG182) recommendation 1.6.2.

Data source

Structure

Local data collection.

Process

Local data collection.

Outcome

Local data collection.

Definitions

Chronic kidney disease (NICE guideline CG182) recommends that in people with CKD and diabetes, and also in people with an ACR of 70 mg/mmol or more, aim to keep the systolic blood pressure below 130 mmHg (target range 120–129 mmHg) and the diastolic blood pressure below 80 mmHg.

All blood pressure targets should be based on clinical judgment and tailored to the individual taking into consideration other health conditions, medications and age.

Equality and diversity considerations

While not essential, self-monitoring of blood pressure can play a helpful role in blood pressure control. The precise equipment required for this can be quite expensive, which can disadvantage people in lower socioeconomic groups.

The relationship between creatinine generation and muscle mass means that ACRs, when used to characterise microalbuminuria, are interpreted slightly differently in men and women.

Quality statement 6: Progression

Quality statement

People with CKD are assessed for disease progression.

Quality measure

Structure

Evidence of local arrangements to ensure that people with CKD are assessed for disease progression.

Process

Proportion of people with CKD who are assessed for disease progression in accordance with current NICE guidance.

Numerator – the number of people in the denominator assessed for disease progression in accordance with current NICE guidance.

Denominator – the number of people with CKD.

What the quality statement means for each audience

Service providers ensure that systems are in place to assess people with CKD for disease progression.

Healthcare professionals ensure they assess people with CKD for disease progression.

Commissioners ensure they commission services that assess people with CKD for disease progression.

People with CKD are assessed to find out whether the disease is getting worse.

Source guidance

- Chronic kidney disease (NICE guideline CG182) recommendations 1.3.4, 1.3.5 and 1.3.6.

Data sources

Structure

Local data collection.

Process

Local data collection. Quality and Outcomes Framework (QOF) indicator CKD 6: the percentage of patients on the CKD register whose notes have a record of an albumin:creatinine ratio (ACR) (or protein:creatinine ratio [PCR]) test in the previous 15 months.

Definitions

Chronic kidney disease (NICE guideline CG182) recommends the following steps to identify the rate of progression of CKD:

- Obtain a minimum of 3 GFR estimations over a period of not less than 90 days.
- In people with a new finding of reduced GFR, repeat the GFR within 2 weeks to exclude causes of acute deterioration of GFR – for example, acute kidney injury or starting renin–angiotensin system antagonist therapy. [recommendation 1.3.4]

Chronic kidney disease (NICE guideline CG182) recommends awareness that people with CKD are at increased risk of progression to end-stage kidney disease if they have either of the following:

- a sustained decrease in GFR of 25% or more over 12 months or
- a sustained decrease in GFR of 15 ml/min/1.73 m^2 or more over 12 months. [recommendation 1.3.5]

Chronic kidney disease (NICE guideline CG182) recommends that when assessing CKD progression, extrapolate the current rate of decline of GFR and take this into account when planning intervention strategies, particularly if it suggests that the person might need renal replacement therapy in their lifetime. [recommendation 1.3.6]

Quality statement 7: Acute illness

Quality statement

People with CKD who become acutely unwell have their medication reviewed, and receive an assessment of volume status and renal function.

Quality measure

Structure

Evidence of local arrangements to ensure that people with CKD who become acutely unwell have their medication reviewed, and receive an assessment of volume status and renal function.

Process

Proportion of people with CKD presenting acutely unwell who have their medication reviewed, and receive an assessment of volume status and renal function.

Numerator – the number of people in the denominator having their medication reviewed and receiving an assessment of volume status and renal function.

Denominator – the number of people with CKD presenting acutely unwell.

What the quality statement means for each audience

Service providers ensure that a medication review and assessment of volume status and renal function is carried out in people with CKD who become acutely unwell.

Healthcare professionals review medication, and perform assessments of volume status and renal function for people with CKD who become acutely unwell.

Commissioners ensure they commission services that review medication, and perform assessments of volume status and renal function for people with CKD who become acutely unwell.

People with CKD who suddenly become unwell have their medication checked and are assessed to find out how well their kidneys are working.

Source guidance

- The Renal Association clinical practice guideline: Acute kidney injury, recommendation 3.1.

Data source

Structure

Local data collection.

Process

Local data collection.

Definitions

An acute illness is a disease with an abrupt onset and short course. In this context 'acutely unwell' is defined as an episode where the health of the person with CKD gets worse suddenly. This may or may not be related to CKD and applies to presentation in all healthcare settings, including both primary and secondary care.

Quality statement 8: Anaemia treatment

Quality statement

People with anaemia of CKD have access to and receive anaemia treatment in accordance with NICE guidance.

Quality measure

Structure

a) Evidence of local arrangements to ensure that people with anaemia of CKD have access to and receive anaemia treatment in accordance with NICE guidance.

b) Evidence of local agreed protocols defining roles and responsibilities of healthcare professionals in primary and secondary care for managing the treatment of people with anaemia of CKD.

Process

a) Proportion of people with anaemia of CKD with recorded haemoglobin less than or equal to 10 g/dl who are either receiving anaemia treatment or for whom there is a valid reason for it not being offered or taken up.

Numerator – the number of people in the denominator either receiving anaemia treatment or for whom there is a valid reason for it not being offered or taken up.

Denominator – the number of people with anaemia of CKD with recorded haemoglobin less than or equal to 10 g/dl.

Outcome

Proportion of people with anaemia of CKD receiving maintenance anaemia treatment who have haemoglobin levels within the typical aspirational range 10–12 g/dl.

Numerator – the number of people in the denominator with haemoglobin levels within the typical aspirational range 10–12 g/dl.

Denominator – the number of people with anaemia of CKD receiving maintenance anaemia treatment.

An audit standard of less than 100% is expected for this outcome to allow for patient preferences, other symptoms and comorbidities, underlying causes for poor response and patients who are in the induction phase of their treatment.

What the quality statement means for each audience

Service providers ensure that systems are in place to provide people with anaemia of CKD access to anaemia treatment in accordance with NICE guidance.

Healthcare professionals assess whether people with anaemia of CKD are likely to benefit from anaemia treatment in terms of quality of life, physical function or avoidance of blood transfusion and if so, offer people with anaemia of CKD treatment for their anaemia in accordance with NICE guidance.

Commissioners ensure they commission services that can provide people with anaemia of CKD access to anaemia treatment in accordance with NICE guidance.

People with anaemia of CKD (which is low levels of red blood cells due to CKD) are assessed to find out whether they are likely to benefit from anaemia treatment and, if suitable, receive anaemia treatment.

Source guidance

- Recommendations on the management of anaemia and assessment and optimisation of erythropoiesis are contained within sections 1.2 and 1.3 of NICE guideline CG114 (includes key priorities for implementation 1.3.1.1, 1.3.5.1, 1.3.8.1, 1.3.8.2, 1.3.8.5 and 1.3.12.1).

Data source

Structure

Local data collection. Contained within NICE guideline 114 audit criteria.

Process

Local data collection.

Outcome

Local data collection for patients not on dialysis. The UK Renal Registry collects data on pre-dialysis and post-dialysis haemoglobin levels from patients in renal units and the prescription of iron and erythropoietin stimulating agents (ESAs). Contained within NICE guideline 114 audit criteria, criterion 4.

Definitions

Anaemia treatment includes iron supplementation and ESAs.

NICE guideline CG114 recommends that treatment with ESAs is offered to people with anaemia of CKD who are likely to benefit in terms of quality of life and physical function and that age alone should not be a determinant for the treatment of anaemia of CKD. When determining individual aspirational haemoglobin ranges for people with anaemia of CKD, patient preferences, symptoms and comorbidities and the required treatment should all be taken into account.

To ensure that ESA treatment is clinically effective, consistent and safe, a patient-centred plan should be agreed between the prescriber and patient to include:

- continuity of drug supply
- flexibility of where the drug is delivered and administered
- lifestyle and preferences of the patient
- cost of drug supply
- desire for self-care where appropriate
- regular review of the plan in light of changing needs.

Equality and diversity considerations

This statement promotes equality by ensuring that all people, including people with comorbidities, which may include a significant number of older people, are not excluded from (a trial of) anaemia treatment if they are likely to benefit.

Quality statement 9: Preparing for renal replacement therapy

Quality statement

People with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months, receive unbiased personalised information on established kidney failure and renal replacement therapy options.

Quality measure

Structure

a) Evidence of local arrangements to ensure that people with progressive CKD whose estimated glomerular filtration rate (eGFR) is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months, receive unbiased personalised information on established kidney failure and renal replacement therapy options.

b) Evidence of local procedures to document the outcome of discussions with people with CKD about renal replacement therapy options, with reasons for the uptake of a particular modality.

c) Evidence of local arrangements to collect, analyse and act upon patient feedback on whether they felt that informed choice was available to them.

d) Evidence of local arrangements for provision and distribution of written materials on established kidney failure and renal replacement therapy options.

Process

a) Proportion of people with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months, known to renal services with progressive CKD for 3 months or more, who receive unbiased personalised information regarding established kidney failure and renal replacement therapy options.

Numerator – the number of people in the denominator receiving unbiased personalised information regarding established kidney failure and renal replacement therapy options.

Denominator – the number of people with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months, known to renal services with progressive CKD for 3 months or more.

b) Proportion of people on long-term dialysis who started dialysis in an unplanned way who receive unbiased personalised information regarding established kidney failure and renal replacement therapy options at the earliest opportunity.

Numerator – the number of people in the denominator receiving unbiased personalised information regarding established kidney failure and renal replacement therapy options at the earliest opportunity following dialysis start.

Denominator – the number of people on long-term dialysis who started dialysis in an unplanned way.

Outcomes

a) Proportion of people who start long-term renal replacement therapy via the modality which they initially selected.

Numerator – the number of people in the denominator receiving renal replacement therapy via the modality which they initially selected.

Denominator – the number of people starting long-term dialysis.

b) Proportion of people on long-term dialysis who are on peritoneal dialysis.

Numerator – the number of people in the denominator on peritoneal dialysis.

Denominator – the number of people on long-term dialysis.

c) Proportion of people on long-term dialysis who are on home haemodialysis.

Numerator – the number of people in the denominator on home haemodialysis.

Denominator – the number of people on long-term dialysis.

Transplantation uptake is addressed in the NICE quality standard for renal replacement therapy services, see quality statement 2: Transplantation – pre-emptive and quality statement 3: Transplantation – on dialysis.

What the quality statement means for each audience

Service providers ensure they provide people with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months, with unbiased personalised information on established kidney failure and renal replacement therapy options.

Healthcare professionals provide unbiased personalised information on established kidney failure and renal replacement therapy options to people with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months.

Commissioners ensure they commission services that provide unbiased personalised information on established kidney failure and renal replacement therapy options to people with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months.

People with advanced CKD that is getting worse and/or whose kidneys are likely to fail within 12 months receive information specific to their situation about their condition and possible treatment options.

Source guidance

- The Renal Association clinical practice guideline: planning, initiating and withdrawal of renal replacement therapy, recommendation 3.1.

Data source

Structure

Local data collection.

Process

Local data collection. Contained within The Renal Association clinical practice guideline: planning, initiating and withdrawal of renal replacement therapy, audit measures 7–9.

Outcome

Local data collection. Hospital Episode Statistics (HES) contains data on compensation for renal failure. The Office of population censuses and survey classification of surgical operations and procedures (OPCS-4) code for this is X40, with subcategories 0–9. The UK Renal Registry collects data on renal treatment modality.

Definitions

People with progressive CKD whose eGFR is less than 20 ml/min/1.73 m^2, and/or who are likely to progress to established kidney failure within 12 months, includes people who start dialysis in an unplanned way and people with failing kidney transplants. All people in these groups should have access to unbiased personalised information on established renal failure and renal replacement therapy options.

Information should, as part of a care plan, include:

- transplantation
- home haemodialysis
- peritoneal dialysis
- haemodialysis
- conservative management.

It should also enable patients to make an informed decision about their treatment. A care plan is defined in quality statement 3: planning care.

Equality and diversity considerations

All information about treatment and care should be culturally appropriate. It should also be accessible to people with additional needs such as physical, sensory or learning disabilities, and to people who do not speak or read English. People with CKD should have access to an interpreter or advocate if needed.

Quality statement 10: Psychosocial support

Quality statement

People with established renal failure have access to psychosocial support (which may include support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

Quality measure

Structure

Evidence of local arrangements to ensure that people with established renal failure have access to psychosocial support (which may include support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

Process

Proportion of people with established renal failure who receive psychosocial support (which may include support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

Numerator – the number of people in the denominator receiving psychosocial support (which may include support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

Denominator – the number of people with established renal failure.

What the quality statement means for each audience

Service providers ensure that systems are in place to provide people with established renal failure access to psychosocial support (including support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

Health and social care professionals provide people with established renal failure with access to psychosocial support (which may include support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

Commissioners ensure they commission services that provide people with established renal failure access to psychosocial support (which may include support with personal, family, financial, employment and/or social needs) appropriate to their circumstances.

People with established renal failure can obtain help and support with personal, family, financial, employment and social problems related to their condition.

Source guidance

- The Renal Association clinical practice guideline: planning, initiating and withdrawal of renal replacement therapy, recommendation 5.2.

Data source

Structure

Local data collection.

Process

Local data collection.

Definitions

Renal services should inform people with CKD about external support services and groups where available, as well as providing psychosocial support within the renal service itself. This may or may not include access to a dedicated counsellor.

Using the quality standard

It is important that the quality standard is considered alongside current policy and guidance documents listed in the development sources section.

Commissioning support and information for patients

NICE has produced a support document to help commissioners and others consider the commissioning implications and potential resource impact of this quality standard. Information for patients using the quality standard is also available on the NICE website. A full commissioning guide on early identification and management of chronic kidney disease in adults that supports the local implementation of NICE guidance is also available.

Quality measures

The quality measures accompanying the quality statements aim to improve the structure, process and outcomes of healthcare. They are not a new set of targets or mandatory indicators for performance management.

Expected levels of achievement for quality measures are not specified. Quality standards are intended to drive up the quality of care, and so aspirational achievement levels are likely to be 100% (or 0% if the quality statement states that something should not be done). However, it is recognised that this may not always be appropriate in practice taking account of patient safety, patient choice and clinical judgement and therefore desired levels of achievement should be defined locally.

We have indicated where national indicators currently exist and measure the quality statement. National indicators include those developed by the NHS Information Centre through their Indicators for Quality Improvement Programme. For statements where national quality indicators do not exist, the quality measures should form the basis for audit criteria developed and used locally to improve the quality of healthcare.

For further information, including guidance on using quality measures, please see what makes up a NICE quality standard.

Diversity, equality and language

During the development of this quality standard, equality issues were considered.

Good communication between health and social care professionals and people with CKD is essential. Treatment and care, and the information given about it, should be culturally appropriate. It should also be accessible to people with additional needs such as physical, sensory or learning disabilities, and to people who do not speak or read English. People with CKD should ave access to an interpreter or advocate if needed.

Development sources

Evidence sources

The documents below contain clinical guideline recommendations or other recommendations that were used by the TEG to develop the quality standard statements and measures.

Anaemia management in people with chronic kidney disease. NICE guideline CG114 (2011; NHS Evidence accredited).

Chronic kidney disease: early identification and management of chronic kidney disease in adults in primary and secondary care. NICE guideline CG182 (2014; NHS Evidence accredited).

Anaemia management in people with chronic kidney disease. NICE guideline CG39 (2006) (now replaced by NICE guideline CG114).

Guidance on home compared with hospital haemodialysis for patients with end-stage renal failure. NICE technology appraisal 48 (2002).

The Renal Association (2011) Clinical practice guideline: acute kidney injury.

The Renal Association (2011) Clinical practice guideline: vascular access for haemodialysis.

The Renal Association (2010) Clinical practice guideline: assessment of the potential kidney transplant recipient.

The Renal Association (2010) Clinical practice guideline: cardiovascular disease in CKD.

The Renal Association (2010) Clinical practice guideline: peritoneal dialysis.

The Renal Association (2009) Clinical practice guideline: haemodialysis.

The Renal Association (2009) Clinical practice guideline: peritoneal access.

The Renal Association (2009) Clinical practice guideline: Planning, initiating and withdrawal of renal replacement therapy.

Policy context

It is important that the quality standard is considered alongside current policy documents, including:

Department of Health (2010) The NHS Outcomes Framework 2011/12.

Department of Health (2009) Achieving excellence in kidney care: delivering the National Service Framework for Renal Services.

Department of Health (2007) Second progress report on the Renal NSF.

Department of Health (2005) National Service Framework for Renal Services – part two: chronic kidney disease, acute renal failure and end of life care.

Department of Health (2004) National Service Framework for Renal Services: part one – dialysis and transplantation.

Definitions and data sources

The classification system recommended in section 1.2 of chronic kidney disease (NICE guideline CG182) is referred to throughout this quality standard. References included in the definitions and data sources sections can be found below:

Hypertension: management of hypertension in adults in primary care. NICE guideline CG34 (2006).

Association of Public Health Observatories, including CKD prevalence estimates.

Health Protection Agency.

Hospital Episode Statistics.

National Kidney Care Audits for vascular access and patient transport.

NHS Indicators for Quality Improvement.

NHS Kidney Care.

Office of Population, Censuses and Surveys Classification of Surgical Operations and Procedures 4th revision (OPCS-4).

Quality and Outcomes Framework indicators.

PatientView.

The National Diabetes Audit.

The UK Renal Registry.

National renal data set from the Information Standards Board for Health and Social Care (release 2010 v2.2).

Related NICE quality standards

Renal replacement therapy services (2014) NICE quality standard 72

Patient experience in adult NHS services (2012) NICE quality standard 15

End of life care for adults (2011) NICE quality standard 13

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Changes after publication

April 2015: Minor maintenance.

November 2014: Quality statements 11–15 in this quality standard have been replaced by quality statements 2–6 in the NICE quality standard for renal replacement therapy services.

This quality standard has been revised to ensure alignment with the updated NICE guideline on chronic kidney disease (NICE guideline CG182), which has replaced the original development source (NICE guideline CG73) for this quality standard.

In particular, note that:

- the definitions for statement 1 have been updated in line with the recommendations in section 1.1
- the definitions for statement 2 have been updated in line with recommendations 1.5.2
- the definitions for statement 5 have been updated in line with recommendations 1.6.2
- the definitions for statement 6 have been updated in line with recommendations 1.3.41.3.6.

For more information about the changes to the guideline, see the update information section in the NICE guideline on chronic kidney disease.

August 2013: Minor maintenance.

April 2013: Hyperlinks in Policy context section updated to reflect the Department of Health website move.

About this quality standard

NICE quality standards are a set of specific, concise statements and associated measures. They set out aspirational, but achievable, markers of high-quality, cost-effective patient care, covering the treatment and prevention of different diseases and conditions. Derived from the best available evidence such as NICE guidance and other evidence sources accredited by NHS Evidence, they are developed independently by NICE, in collaboration with NHS and social care professionals, their partners and service users, and address three dimensions of quality: clinical effectiveness, patient safety and patient experience.

The methods and processes for developing NICE quality standards are described in the quality standards process guide.

This quality standard has been incorporated into the NICE chronic kidney disease and anaemia management in chronic kidney disease pathways.

We have produced a summary for patients and carers.

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Supporting organisations

Many organisations share NICE's commitment to quality improvement using evidence-based guidance. The following supporting organisations have recognised the benefit of the quality standard in improving care for patients, carers, service users and members of the public. They have agreed to work with NICE to ensure that those commissioning or providing services are made aware of and encouraged to use the quality standard.

- British Kidney Patient Association
- British Renal Society
- National Kidney Federation
- Renal Association