

From the Editor-in-Chief

Improving Communication: A New Standardized Nomenclature for Kidney Function and Disease

Beth Ulrich, EdD, RN, FACHE, FAONL, FAAN



Clear communication between health care professionals and between health care professionals and their patients is a critical component of high-quality patient care. Yet, in our specialty, we use many terms – often interchangeably and inconsistently (e.g., renal failure, kidney disease, chronic renal insufficiency, artificial kidney, renal replacement therapy, nephrology, end stage

renal disease), which can hinder our communication and effectiveness.

Communication

TeamSTEPPS, an evidence-based program of teamwork that has been widely implemented in a variety of health care settings, describes communication as “the lifeline of a well-functioning team” and notes that it “serves as a coordinating mechanism for teamwork” (Agency for Healthcare Research and Quality [AHRQ], 2019b, ‘TeamSTEPPS Teamwork Skills’ section). Communication is defined as “a process whereby information is clearly and accurately conveyed to another person using a method that is known and recognized by all involved” with the outcome “a shared understanding, between the sender and receiver(s) of the information conveyed” (AHRQ, 2019b, Communication Is section). Effective communication between health care professionals requires health care professionals both within and across professions to speak the same clinical language. Effective communication between health care professionals and patients and their families requires health care professionals to use language that can be clearly understood by laymen (not medical jargon) and take into account the health literacy of the lay person with whom they are communicating.

Kidney Disease: Improving Global Outcomes (KDIGO) Nomenclature for Kidney Function and Disease

For over a decade, the international organization Kidney Disease: Improving Global Outcomes (KDIGO) has developed evidence-based clinical guidelines for the diagnosis and treatment of kidney disease. In 2019,

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KDIGO convened an international Consensus Conference with the goals of “standardizing and refining the nomenclature used in the English language to describe kidney function and disease, and developing a glossary that could be used in scientific publications” and “to facilitate communication within and across disciplines and between practitioner and patient communities to ultimately improve outcomes through clarity and precision” (Levey et al., 2020, p. 1118).

The guiding principles of the conference were that the revised nomenclature would be patient-centered, precise, and consistent with KDIGO guidelines (KDIGO, 2020). Prior to the conference, KDIGO held focus groups with patients and caregivers to determine the impact of the terms currently used to describe kidney function and disease. Four themes emerged from the focus groups: they were frustrated by ambiguous language; it was hard to make sense of the prognostic terms, such as the level of kidney function; a preference that terms that provoke and exacerbate undue trauma (such as “end stage”) not be used; and preferred terms that mobilize self-management.

Recommendations

The conference resulted in five main recommendations, which were published in May 2020:

- (i) to use “kidney” rather than “renal” or “nephro-” when referring to kidney disease and kidney function;

Journal Philosophy Statement

The Nephrology Nursing Journal is a refereed clinical and scientific resource that provides current information on a wide variety of subjects to facilitate the practice of professional nephrology nursing. Its purpose is to disseminate information on the latest advances in research, practice, and education to nephrology nurses to positively influence the quality of care they provide.

The Nephrology Nursing Journal is designed to meet the educational and information needs of nephrology nurses in a variety of roles at all levels of practice. It also serves as a resource for non-nephrology nurses. Its content expands the knowledge base for nephrology nurses, stimulates professional growth, guides research-based practice, presents new technological developments, and provides a forum for review of critical issues promoting the advancement of nephrology nursing practice.

KDIGO Definition and Classification of Chronic Kidney Disease (CKD)

CKD is defined as abnormalities of kidney structure or function for greater than three months, with implications for health. CKD is classified based on cause, GFR category (G1-G5) and albuminuria (A1-A3).

Prognosis of CKD by GFR and albuminuria category

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Prognosis of CKD by GFR and albuminuria categories: KDIGO 2012

				Persistent albuminuria categories, description and range		
				A1	A2	A3
				Normal to mildly increased	Moderately increased	Severely increased
				<30 mg/g <3 mg/mmol	30–300 mg/g 3–30 mg/mmol	>300 mg/g >30 mg/mmol
GFR categories (ml/min/1.73 m ²), description and range	G1	Normal or high	≥90			
	G2	Mildly decreased	60–89			
	G3a	Mildly to moderately decreased	45–59			
	G3b	Moderately to severely decreased	30–44			
	G4	Severely decreased	15–29			
	G5	Kidney failure	<15			

green, low risk (if no other markers of kidney disease, no CKD); yellow, moderately increased risk; orange, high risk; red, very high risk.

Source: KDIGO, 2013. Reprinted with permission.

- (ii) to use “kidney failure” with appropriate descriptions of presence or absence of symptoms, signs, and treatment, rather than “end-stage kidney disease;”
- (iii) to use the KDIGO definition and classification of acute kidney diseases and disorders (AKD) and acute kidney injury (AKI), rather than alternative descriptions, to define and classify severity of AKD and AKI;
- (iv) to use the KDIGO definition and classification of chronic kidney disease (CKD) rather than alternative descriptions to define and classify severity of CKD; and
- (v) to use specific kidney measures, such as albuminuria or decreased glomerular filtration rate (GFR), rather than “abnormal” or “reduced” kidney function to describe alterations in kidney structure and function (Levey et al., 2020, p. 1118).

In addition, the conference developed a glossary of terms for kidney function and disease, kidney failure, AKDs, AKI/CKD, and kidney measures. Examples include to:

- Use “kidney failure” rather than “renal failure.”
- Use “kidney replacement therapy” rather than “renal replacement therapy.”
- Use “long-term” and “short-term” rather than “chronic dialysis” and “acute dialysis.” when describing the duration of dialysis because the terms “chronic” and “acute” refer to the duration of kidney disease.
- Use “acute kidney disease” and “acute kidney injury” rather than “acute renal failure” and “acute renal insufficiency.”
- Refer to the 2012 KDIGO AKI and CKD guidelines for modifications for children.
- Do not use the term “end stage.”

Additional Information

KDIGO Nomenclature

For additional information on the KDIGO Consensus Conference nomenclature for kidney function and disease, go to: <https://kdigo.org/wp-content/uploads/2018/10/Nomenclature-Conference-Report.pdf> (article with information on the conference recommendations and a detailed glossary with preferred terms, suggested abbreviations, rationales, and terms to avoid)

KDIGO Infographic

<https://files.constantcontact.com/320aa531801/6f5e97ef-716b-4a41-8c04-f015eb2b886a.pdf> (accompanying infographic)

KDIGO Clinical Guidelines

<https://kdigo.org/>

Nephrology Nursing Journal Style Guide

www.annanurse/nnj/

AHRQ TeamSTEPPS Communication

Agency for Healthcare Research and Quality (AHRQ). (2019b). TeamSTEPPS Fundamentals Course: Module 3. Communication. AHRQ.

<https://www.ahrq.gov/teamstepps/instructor/fundamentals/module3/igcommunication.html>

AHRQ Health Literacy Resources

<https://www.ahrq.gov/topics/health-literacy.html>

Conclusion

More effective communication among health care professionals and between health care professionals and patients and their families has the potential to improve patient outcomes. The recommended standardized nomenclature provided by KDIGO contributes to the use of a common clinical language. Many nephrology journals, including the *Nephrology Nursing Journal*, will be transitioning to the KDIGO nomenclature. The *Nephrology Nursing Journal Style Guide* (available at <https://www.annanurse.org/nnj/>) is an additional resource that addresses preferred terminology for other areas and commonly accepted terms, abbreviations, and acronyms. The use of these resources will contribute to the clear, concise, and complete communication needed to improve care, reduce errors, and save time and money.

Beth Ulrich, EdD, RN, FACHE, FAONL, FAAN
Editor-in-Chief

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KDIGO Nomenclature Visual Graphic




Why uniform nomenclature on kidney function and disease?

FOR CLINICIANS AND HEALTHCARE PROFESSIONALS


-  Reduces confusion and errors in clinical practice
-  Promotes consistency in research design, execution and communication
-  Raises public awareness




FOR PATIENTS

-  Facilitates communication between healthcare provider and patient
-  Takes into account patient preferences and his/ her needs/ values
-  Minimizes language ambiguity and mobilizes self-management and advocacy


GUIDING PRINCIPLES



Patient centered
Wording should not be demoralizing or stigmatizing




Precise
Wording should foster accurate communication





Consistent with KDIGO guidelines
Adoption of definition and wording should aid evidence-based practice and guideline implementation



Key Take-Home Points

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Use 'kidney' rather than 'renal' or 'nephro' when referring to kidney disease and kidney function


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Use 'kidney failure' with appropriate descriptions of presence or absence of symptoms, signs, and treatment
(rather than 'end-stage' disease since latter term is not patient-sensitive and connotes stigma)


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Use the KDIGO definition and classification of acute kidney diseases and disorders (AKD) and acute kidney injury (AKI)
(rather than alternative descriptions to define and classify severity of AKD and AKI; AKI stages (1, 2, 3) should be used to denote severity of AKI)


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Use the KDIGO definition and classification of CKD rather than alternative descriptions to define and classify CKD
(Ascertainment of CKD when GFR > 60 ml/min/1.73 m2 requires assessment for markers of kidney damage e.g., albuminuria. CKD should be classified according to cause and categories of GFR and albuminuria (CGA); severity of CKD should correspond to risk categories)


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Use specific kidney measures such as albuminuria or decreased GFR to describe Alterations in kidney structure and function, respectively
(rather than general descriptors such as 'abnormal' or 'reduced' kidney function)



Do not equate albuminuria or proteinuria as 'decreased kidney function' since they are markers of kidney damage

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