

# Priority Topic: RENAL FAILURE

## Key Features:

An overview document/tool for primary care: [Making Sense of CKD: A Concise Guide for Managing Chronic Kidney Disease in the Primary Care Setting](#)

1. In patients with [chronic renal failure](#), ensure they are [aware](#) of their [diagnosis](#) and its [implications](#).

### *What you should study:*

- ✓ [Educating Patients about CKD: The Path to Self-Management and Patient-Centered Care – CJASN – April 2016](#)
- ✓ [About chronic kidney disease: A guide for patients . \*\*Not a guide for clinicians as such, but I find It useful for patients to understand complex concepts in simpler words\*\*](#)
- ✓ [Talking With Your Patients About Kidney Disease \(including video\) – NIDDK](#)

2. In any patient, [mitigate](#) the risks of [precipitating renal failure](#) when [investigation](#) and [treatment combinations](#) are likely to be [harmful](#) (e.g. metformin and contrast dye, bowel preparation).

### *What you should study:*

- ✓ [Acute Kidney Injury: A Guide to Diagnosis and Management \(consult \*\*Management\*\* section and Table 5\) AAFP 2012](#)
- ✓ [Metformin and intravenous contrast \(short article\) CMAJ-JAMC 2013](#)
- ✓ [Canadian Association of Radiologists: 2011 Consensus Guidelines for the Prevention of Contrast-Induced Nephropathy \(more in-depth but key elements](#)

are well addressed)

- ✓ [Optimal and Safe Bowel Preparation for Colonoscopy](#) (consult [Chronic kidney disease](#) section) – Clinical Endoscopy Journal 2013

### 3. When [prescribing drugs](#) to a patient in [renal failure](#):

- Determine [drug safety](#) (e.g. interactions, dose adjustments, metabolic considerations).
- [Adjust doses](#) when appropriate (e.g. ACE inhibitors, angiotensin II receptor blockers, metformin, allopurinol, antibiotics, low molecular weight heparin, direct oral anticoagulants).
- [Monitor the impact](#) of the drug on the renal function more frequently.

### **What you should study:**

- ✓ [Drug Dosing Adjustments in Patients with Chronic Kidney Disease](#) AAFP 2007
- ✓ [Study Identifies Drugs of Concern for Patients with CKD](#) AAFP 2020
- ✓ [The Chronic Kidney Disease \(CKD\) Clinical Pathway](#) – Medical Management section, including drop-down menu *Common drugs that may require renal dose adjustment* and *Common drugs that may have nephrotoxic effects*

### 4. Advise patients with existing [moderate or severe renal failure](#) to pay close attention to [hydration](#) (e.g. when travelling, elderly patients in hot weather, when ill) to [avoid exacerbating](#) their condition.

### 5. Advise patients with [existing renal failure](#) to [avoid certain over-the-counter treatments](#) (e.g. NSAIDs, herbals, supplements) as they may [worsen](#) their condition.

### What you should study:

- ✓ [Drug Dosing Adjustments in Patients with Chronic Kidney Disease AAFP 2007](#) (see **Other Medications** section at the end of the article)
- ✓ [Herbal Supplements and Kidney Disease](#) (see **Which herbal supplements should I avoid if I have kidney disease?** Section)

6. In patients with [moderate or severe renal failure](#) , provide [anticipatory guidance](#) that if they become [ill](#) and [cannot maintain fluid intake](#) they should:

- [Stop](#) certain [medications](#) promptly (e.g. ACE inhibitors, diuretics).
- Seek prompt [reassessment](#).

### What you should study:

- ✓ [The Chronic Kidney Disease \(CKD\) Clinical Pathway – Medical Management](#) section including drop-down menu [Sick day Medication List](#)

7. In a patient with an [exacerbation of their renal failure](#) (acute on chronic renal failure):

- [Correct factors](#) (e.g. hydration, pneumonia, congestive heart failure, urinary retention).
- [Stop drugs](#) that might be [aggravating](#) the situation (e.g. ACE inhibitors, metformin).
- Determine the [appropriateness of restarting medications](#) , once renal function has [stabilized](#).

### **What you should study:**

- ✓ Acute Kidney Injury: A Guide to Diagnosis and Management AAFP 2012
- ✓ Chronic Kidney Disease in Adults – Identification, Evaluation and Management BCGuidelines.ca 2019 (see *Appendix C*, how to proceed in AKI and with underlying CKD)

8. Monitor patients with renal failure periodically, as some patients will worsen over time.

### **What you should study:**

- ✓ Approach to the detection and management of chronic kidney disease – CFP Journal 2018 (see Fig. 1 *Algorithm for identifying, detecting, and managing chronic kidney disease*)

9. For patients with renal failure, determine, based on patient factors and local resources, if and when consultation is required (e.g. progressive renal failure, bone disease, refractory anemia, mild renal failure in a young person).

### **What you should study:**

- ✓ Chronic Kidney Disease: Detection and Evaluation AAFP 2017 (see **Indications for Nephrology Referral** section)
- ✓ Approach to the detection and management of chronic kidney disease – CFP Journal 2018 (see Box 1)
- ✓ Le suivi du patient atteint d'insuffisance rénale chronique FMOQ 2002 (see *Quand faut-il adresser le patient en néphrologie?* Section)

10. Ensure those involved in [consultant care](#) of patients with [renal failure](#) are aware of other [important health considerations](#) that may [affect decision making](#) around [treatment](#) (e.g. patient preferences, frailty, malignancy, consideration of dialysis in patients with cognitive impairment).

***What you should study:***

- ✓ [Barriers to Education and Shared Decision Making in the Chronic Kidney Disease Population: A Narrative Review – Can J Kidney Health Dis. 2018](#)