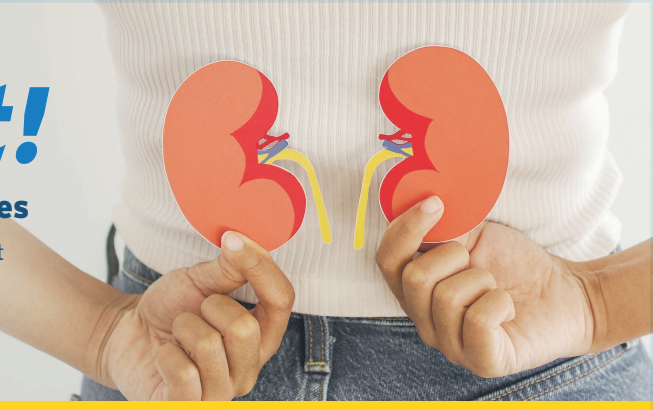
ADVERTORIAL

Kidney Alert!

From warning signs to winning strategies



You might have noticed the "eGFR" result in your blood test report. It's important to know what that number means for your kidneys. If you're wondering about your kidney health, don't worry – it's normal to have questions. Let's dive into this together!

Do you know your eGFR numbers?

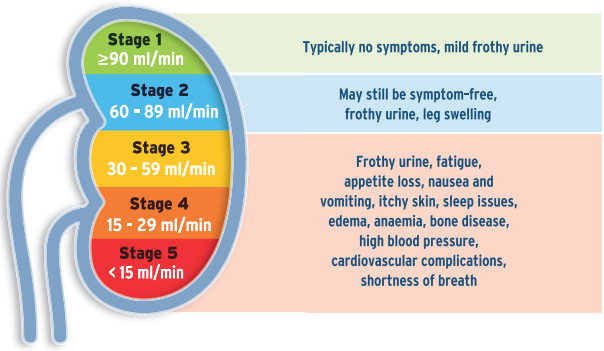
"In Malaysia, chronic kidney disease (CKD) is most often caused by diabetes and hypertension. Other contributors include glomerulonephritis, urinary tract obstructions, and genetic disorders like polycystic kidney disease," explains Dr Ng. Dr Jananee also added that obesity, sedentary lifestyle and excess use of over-the-counter medication and some traditional medication are also risk factors for CKD.

The kidneys are one of the most important organs in the body. Dr Ng explains that these unassuming bean-shaped organs not only removes waste in the form of urine, but also plays a role in regulating blood pressure, balancing fluids and electrolytes, red blood cell production, and maintaining healthy bones.

"It is not possible to assess the initial decline in kidney function through symptoms,"cautioned Dr Jananee. Determining how well the kidneys are functioning is done through blood and urine tests. A blood test is used to determine the estimated glomerular filtration rate (eGFR) while the urine test checks for protein leakage into the urine (urine albumin-to-creatinine ratio - uACR). Other components usually covered in a kidney function test include urea, creatinine, sodium and potassium, calcium and phosphate levels.

eGFR is determined from serum creatinine levels and adjusted based on age and gender, and in some cases, ethnicity. Factors that may affect the eGFR readings include muscle mass, hydration status and use of certain medications. "A 60-year-old patient generally exhibits a lower eGFR level than a younger individual due to the natural decline of kidney function with age." shared Dr Jananee.

Figure 1: eGFR levels and stages of chronic kidney disease



Decoding eGFR and CKD staging

In CKD, the kidney gradually experiences loss in function over time. By definition, CKD is diagnosed when eGFR remains below 60 mL/ min/ 1.73 m^2, or if there is persistent kidney damage, for more than three months. eGFR levels and degree of protein leakage into the urine (proteinuria) are factors taken into account when staging CKD (Figure 1). In the early stages, CKD is typically asymptomatic. Symptoms typically begin to occur around Stage 3 with mild changes to the urine, such as frothy urine due to proteinuria. "Due to this, early detection is important to slow CKD progression," stressed Dr Jananee.

"As the disease progresses, patients may experience fatigue, anaemia, or bone mineral issues. In advanced stages of CKD (Stage 3 and onwards) nausea, swelling and edema become more apparent," shared Dr Ng. In the later stages of CKD (Stage 4 and 5), cardiovascular issues and shortness of breath are also a concern. Eventually, CKD will lead to the complete loss of kidney function, causing the patient to require dialysis or a kidney transplant.

Keeping the kidneys happy

Dialysis is the final option for a majority of CKD patients that have reached end stage kidney disease. The impact of dialysis is not just financial but it can also have a mental and social burden on the patients and their loved ones. With this in mind, our experts Dr Ng and Dr Jananee recommend annual medical check-ups, especially if one is above 40 years of age. For those with risk factors such as diabetes and hypertension, they recommend that check-ups be done at least twice a year.

Slowing eGFR decline begins with healthy habits. Our experts advise that diabetes and hypertension should be properly controlled, to keep hydrated, stop smoking, and get adequate exercise. Adopting a kidney-friendly diet, like the Mediterranean diet, which is low in sodium, with a focus on plant-based proteins, can reduce stress on the kidneys.

KETOANALOGUE THERAPY (KAT)

Preserving kidney function in CKD with KAT

In addition to medication that manages blood pressure and blood sugar levels, for patients with CKD, adopting a low protein diet (LPD) is critical. A LPD reduces kidney burden and thus, helps preserve eGFR. "Patients adhering to a LPD may also benefit from ketoanalogue therapy (KAT), which helps maintain nutritional balance without burdening the kidneys," shared Dr Ng.

Studies show that incorporating KAT into CKD treatment helps delay the progression of CKD to dialysis by slowing down eGFR decline. In a recent study, use of KAT in combination with a LPD, helped diabetic CKD patients maintain their eGFR levels, similar to those without CKD. By adhering to treatment plans and working closely with their healthcare providers, patients with CKD can slow the progression of their CKD, and hence, delay the onset of dialysis.

Kidney tips from our experts

Dr Ng Yong Muh, Consultant Nephrologist

- Early intervention can make all the difference in preventing complications and maintaining long-term health
- CKD rarely causes symptoms in its early stages, thus earning the name "silent disease"
- Many individuals only become aware of kidney problems once significant damage has already occurred
- Routine screening - especially for at-risk groups - is not just important, but life-saving

Dr Jananee Sivaraman, Consultant Nephrologist

- Take time to do a full medical check-up if you're above 40 years old. If you have risk factors for CKD, the earlier the better
- Make sure to eat healthy food and exercise regularly
- Don't abuse over-the-counter medication and/ or traditional medication
- If you're interested in trying out a herbal preparation, always refer to your healthcare provider first