

■ Making simple changes to your lifestyle, such as losing weight and exercising regularly, can help to manage your kidney disease



What I tell my patients about **self-management**

Fergus Caskey MBChB
FRCP Consultant
Nephrologist¹ and
Medical Director²

Barnaby Hole MBBS
MRCP NIHR Academic
Clinical Fellow³

Sumira Riaz Dpsych
Specialist Health
Psychologist⁴

John Weinman PhD
Professor of Health
Psychology^{4,5}

Neil Turner
PhD FRCP Professor
of Nephrology⁶

¹ North Bristol NHS
Trust, Southmead
Hospital, Bristol

² UK Renal Registry,
Bristol

³ School of Clinical
Sciences, University
of Bristol

⁴ Atlantis Healthcare
Ltd, London

⁵ Institute of
Pharmaceutical
Science, King's
College London

⁶ University of
Edinburgh

Self-management of your healthcare and everyday life can help to prevent the progression of chronic kidney disease. However, many patients find it difficult to self-manage their condition. **Fergus Caskey** and colleagues provide advice on things you should think about

Chronic kidney disease (CKD) is a universally common health condition. One in ten people may have CKD, with it affecting one in two of those aged over 75 years in the UK.¹ The risk of developing kidney disease increases with age and is linked to other health conditions, such as heart disease, diabetes mellitus, anaemia and hypertension (high blood pressure). There are five stages of kidney disease; doctors will measure your estimated glomerular filtration rate (eGFR), which is a measure of how much waste fluid your kidneys are able to filter from the blood, to determine your stage. In a minority of cases, kidney disease can progress to end-stage renal disease, which may require renal replacement therapy; for example dialysis or a transplant. However, clinical research shows that self-managing kidney disease can improve overall health outcomes and reduce progression of the disease.¹

What is self-management and why is it important?

It is you who decides what you eat, whether you take your medicines and whether you exercise regularly. You also have control of things that could put your health at further risk, such as smoking. This day-to-day decision-making and behaviour is termed self-management.

As a patient, the daily management of your illness may involve a whole range of tasks. It is important to find ways to cope with the effects of your illness and its management on your life. You may need to make adjustments to your personal and working life to help you live with the illness, while trying to minimise its impact.

This is not always easy, however, and we know that around 40% of patients with long-term health problems, including kidney disease, do not take some or all of their medicines.² Even more find it difficult following other advice, such as that on physical activity and diet. Self-managing your kidney disease

can help prevent the progression of your condition; for example, controlling and monitoring your blood pressure can support the outcome of your disease.

How is high blood pressure linked to CKD?

As many as one in four of the UK general population have high blood pressure.³ It is one of the most common causes of kidney disease in the developed world. If you already have kidney disease, having high blood pressure increases the chances of it getting worse. Having kidney disease also increases the chance of developing high blood pressure.

We know that people with kidney disease are more likely to have heart attacks and strokes than the general population. The chance of developing these conditions increases as kidney function deteriorates, and heart attacks are the biggest cause of early death in people with kidney disease. Having high blood pressure further increases the chance of developing these diseases.

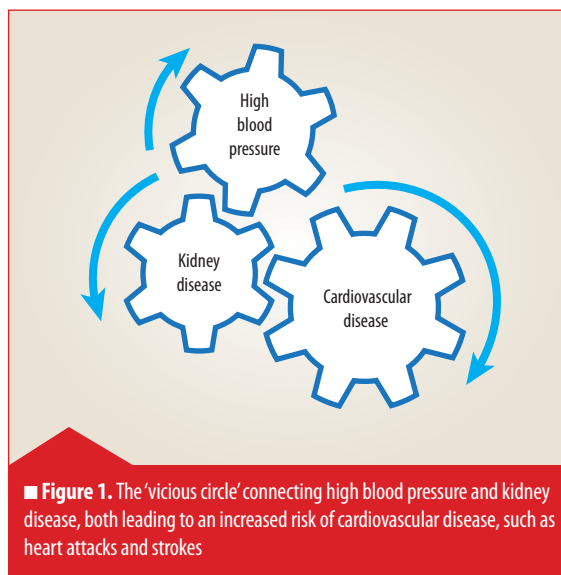
Because of the 'vicious circle' (see Figure 1) connecting high blood pressure and kidney disease, and as both conditions increase the risk of heart attacks and strokes, the majority of patients with kidney disease are recommended lifestyle changes and prescribed medical treatments to lower their blood pressure. There is strong evidence that treatment aimed at lowering blood pressure can slow the decline in kidney function and reduce the risk of having a heart attack or stroke. Treatment goals should be to achieve a blood pressure below 140/90 mmHg for all patients, and below 130/80 mmHg for those with diabetes or high levels of protein in their urine.⁴

What can I do to self-manage my hypertension?

You can manage your high blood pressure by making some simple changes to your lifestyle and taking your medications as prescribed. Lifestyle measures are free, safe and unlikely to result in side effects. Some people are able to avoid the need for medication by using lifestyle measures alone. Others are able to reduce the doses or the number of different medicines that are needed, even if they do not remove the need for them completely.

Lifestyle measures that have been shown to lower blood pressure include reducing salt intake, losing weight, exercising and cutting down on alcohol – in general, this is good advice for everyone, but is even more important if you have high blood pressure. Along with not smoking, these lifestyle measures are also known to reduce the chances of developing heart disease, diabetes and cancer.

The World Health Organization recommends a daily salt intake of less than 5 g,⁵ and this is



particularly important for most patients with kidney disease. Reducing your salt intake further is likely to lead to lowering of your blood pressure, although achieving this can be difficult.

Losing weight leads to a decrease in blood pressure, but you do not have to reach a 'normal' body weight to see a benefit. Even small amounts of weight loss can be effective, but the more weight you lose, the lower your blood pressure will be. Evidence also suggests that regular exercise and drinking less alcohol can lower blood pressure.⁶

Despite the importance of reducing high blood pressure, about half of all patients do not have their blood pressure controlled to recommended levels. As many as one in four patients never pick up the first prescription for blood pressure medication and only one in five patients take their medications often enough to achieve a benefit.⁷

As high blood pressure does not usually cause symptoms, it is vital to understand the importance of blood pressure control, the value of lifestyle measures and how to get the best from your medications.

Potential barriers to self-management

There are many reasons why people may forget, or choose not, to take their medication or why they might not change their lifestyle. This is why treatments are often less effective in the real world than they are in clinical trials. The first step to overcoming your personal barriers is to understand what these might be. Efforts required to make a change can be overwhelming and you may begin to resist the need to change. This may be due to not knowing:

- What to do
- Why you need to make a change and why making a change will be a good thing
- What resources, groups or support services are available to help you find techniques that work for you.

If you can relate to these problems, it may be helpful to think about which small changes you could make to self-manage your condition. You may already have made, or be making, some of these changes, or you may be interested in trying some of them.

Examples include:

- Self-monitoring your blood pressure at home
- Taking care of your nutrition (diet and healthy eating)
- If you're a smoker, finding support to quit smoking
- Introducing physical activities; for example, five to ten minutes of daily exercise
- Taking your medicine as prescribed by your doctor
- Speaking to your healthcare team about what support you may require
- Joining PatientView (www.patientview.org)

Once you have recognised the area in which you would like to introduce a change, you need to begin to think about strategies or steps you need to take to make that change. You may come across obstacles or difficulties, which is normal. This is why starting with a small change will help build your confidence in making additional changes in self-managing your kidney disease.

How can I overcome some of these difficulties?

Getting into a routine

Developing a routine can be helpful in managing your kidney disease, because it encourages you to

plan more effectively; for example, setting manageable goals will help you to maintain a change. Developing a daily structure keeps you organised and you can break down your daily structure by time; for instance, morning, afternoon and evening. This will also remind you when to take your medication. Beginning this process may seem difficult, but eventually it will become habit.

Social support

Social support can come from friends, family, colleagues or others. It can be beneficial in many different ways, such as helping you to adjust to your condition, making treatment choices and reducing your fears or concerns related to the different support services available. Sharing your experiences with others who are going through a similar situation or listening to stories which you can relate to will help to reinforce your journey and help you to feel less isolated. You can obtain information about your local support services from your healthcare professional team.

Managing low mood

Several useful strategies can help you manage tensions and worries, both to prevent negative feelings and help when you're feeling stressed or down. Different people find different approaches work for them. Many meditation and relaxation apps, as well as a lot of online support, are available. Your GP may be able to recommend some that other people have found helpful. Some people benefit from counselling or therapy sessions, or occasionally from additional medicines.

Benefits of self-managing

Developing effective self-management techniques will have beneficial outcomes on your overall health and the progression of your kidney disease. Research suggests that people who self-manage their condition have an improved quality of life and are more in control of their condition. Managing your kidney disease will improve your confidence, expectations and long-term health outcomes ■

Declaration of interest

The authors declare that there is no conflict of interest.

References

1. National Kidney Federation. Chronic Kidney Disease (CKD). www.kidney.org.uk/help-and-information/medical-information-from-the-nkf/medical-info-ckd-info (last accessed 28/10/2015)
2. Sabaté E. *Adherence to long-term therapies: Evidence for action*. Geneva: World Health Organization, 2003
3. Egan BM, Zhao Y, Axon RN. US trends in prevalence, awareness, treatment, and control of hypertension, 1988-2008. *JAMA* 2010; **303**: 2043-2050.
4. Hedayati SS, Elsayed EF, Reilly RF. Non-pharmacological aspects of blood pressure management: what are the data? *Kidney Int* 2011; **79**: 1061-1070.
5. World Health Organization. Healthy diet. Fact sheet N°394. www.who.int/mediacentre/factsheets/fs394/en (last accessed 28/10/2015)
6. Burnier M, Pruijm M, Wuerzner G, Santschi V. Drug adherence in chronic kidney diseases and dialysis. *Nephrol Dial Transplant* 2015; **30**: 39-44.
7. Doulton TW, Farmer CK, Stevens PE. Self-management in chronic disease: clear benefits for blood pressure control in CKD. *Am J Kidney Dis* 2015; **66**: 12-14.

Key points

- Self-managing your kidney disease – for example, by controlling and monitoring your blood pressure – can have beneficial outcomes on your overall health and the progression of your kidney disease.
- High blood pressure is a common cause of kidney disease, while people with kidney disease are more likely to develop high blood pressure; both conditions increase the risk of having heart attacks and strokes.
- You can manage your high blood pressure by making some simple lifestyle changes and taking your medication as prescribed. Lifestyle measures shown to lower blood pressure include reducing salt intake, losing weight, exercising and cutting down on alcohol.
- Once you have recognised which changes you would like to introduce, you need to think about steps you need to take to achieve this. Starting with a small change will help build your confidence in making additional changes.
- Developing a routine and daily structure, getting social support from friends, family or colleagues, sharing your experiences with others in a similar situation, and strategies to manage tensions and worries can all be useful to help you manage your kidney disease.