

The Renal Association

UK Renal Registry



Fistulas, lines and catheters for dialysis in England, Wales and Northern Ireland

Lay summary

For the full annual report chapter [click here](#) or visit www.renalreg.org/reports/2014-seventeenth-annual-report.

There are two forms of dialysis for kidney failure, haemodialysis and peritoneal dialysis. Haemodialysis requires a good flow of blood, which can only be achieved in one of three ways: using a fistula, a graft or a neckline. Peritoneal dialysis is quite different and relies on a plastic catheter sitting in the abdomen through which fluid is flushed. Fistulas, grafts, lines and catheters are all types of 'access' for dialysis.

Dialysis access is a topic of interest in kidney care as fistulas, grafts and peritoneal dialysis catheters are associated with fewer complications such as blood stream infections. Hence, guidelines promote the use of fistulas and grafts over necklines.

All 62 adult renal units in England, Wales and Northern Ireland were contacted for information about fistulas, grafts, lines and catheters used in 2013 and a response received from 57. You can see if your renal unit submitted data in the full report chapter.

In the responses received, 3,663 patients started dialysis on haemodialysis and 1,022 on peritoneal dialysis. The majority of new haemodialysis patients started dialysis with a neckline (58 out of every 100), with 41 starting on a fistula and 1 starting on a graft.

Large differences were noted between renal units in the techniques used to insert PD catheters.

In the patients that were already on dialysis prior to 2013, 12,671 were on haemodialysis and 2,126 were on peritoneal dialysis. For every 100 existing dialysis patients, 61 had a fistula, three had a graft, 21 had a neckline and 15 a PD catheter. These figures have been stable over the last three years (Figure 1).

In the patients new to dialysis there was a clear relationship between length of time known to a renal unit before starting dialysis and the type of their first dialysis access (Figure 2). For example if a

patient was known to a nephrologist for more than a year before they started dialysis they were more likely to have a fistula in place and useable for their first dialysis.

Similarly the percentage of patients who started with peritoneal dialysis was significantly lower amongst people known to a nephrologist for less than 90 days.

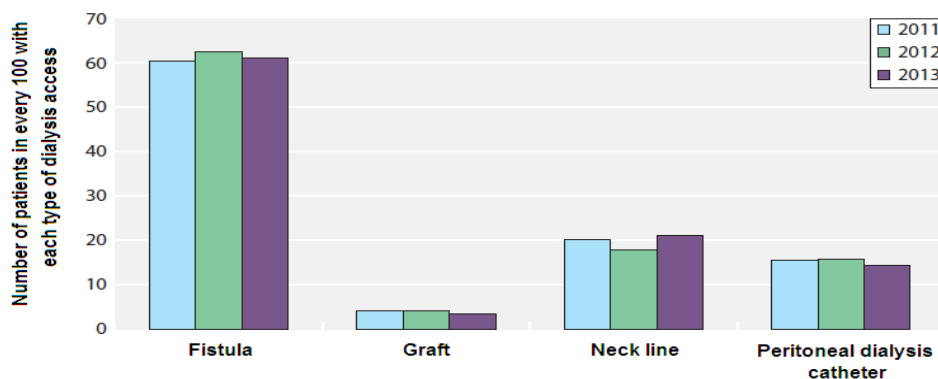


Figure 1. Number of patients in every existing 100 patients currently on dialysis using each type of dialysis access

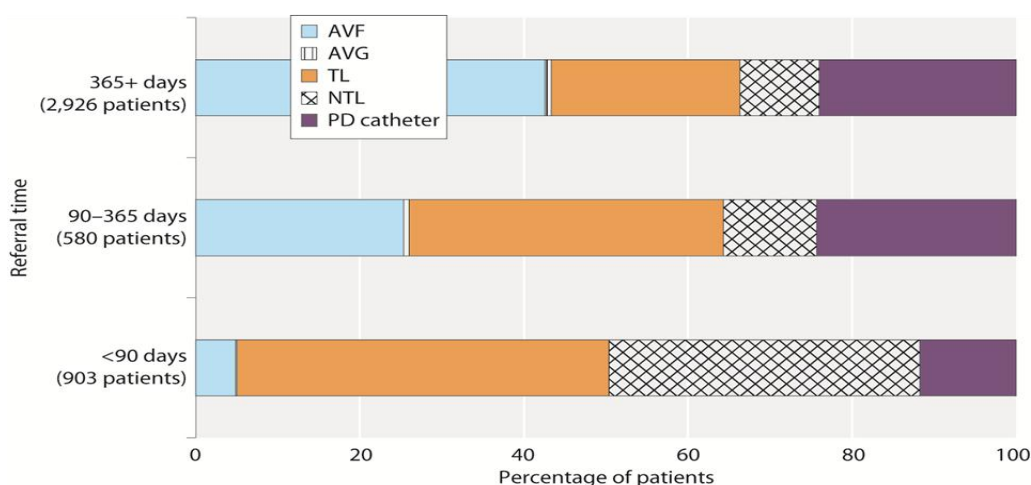


Figure 2. Type of first dialysis access (%) by referral time

AVF = fistula AVG = graft TL/NTL = neckline

Disclaimer

The UK Renal Registry collects information on patients in general. This lay summary was prepared in association with the UK Renal Registry’s Patient Council including representation from the British Kidney Patient Association and the National Kidney Federation. For individual assessment and advice please speak to your health care professional. For further detail on information contained in this lay summary, please visit www.renalregistry.org.