

The BCM - Body Composition Monitor (and alternative technologies identified during scoping) for fluid management in people with chronic kidney disease having dialysis

The BCM - Body Composition Monitor (Fresenius Medical Care) is used to monitor the hydration status of a person with chronic kidney disease who is undergoing either haemodialysis or peritoneal dialysis. The device uses bioimpedance spectroscopy to estimate the amount of fluid in a person's body and help determine how much fluid should be removed during dialysis. If too little fluid is removed it can accumulate in tissue causing swelling and shortness of breath, and can also lead to a greater risk of cardiovascular complications. Removal of too much fluid will lead to dehydration, which can cause cramps, dizziness, tiredness and loss of residual renal function. In current UK practice clinical judgement is used to determine the amount of fluid to remove during dialysis. This is based on physical indicators such as blood pressure and symptoms of overhydration or dehydration. It is claimed that the use of a BCM - Body Composition Monitor can provide a more accurate estimate of a person's hydration status than clinical judgement alone. Use of the BCM - Body Composition Monitor may help to maintain optimum fluid status and reduce complications associated with overhydration or dehydration. Potential benefits of this may include reduced use of antihypertensive medication, a reduced risk of cardiovascular complications, reduced symptoms such as post-dialysis fatigue and also reduced hospital admissions. The NICE Diagnostics Assessment Programme will assess the clinical and cost-effectiveness of the BCM - Body Composition Monitor (and other alternative technologies identified during scoping) in order to make recommendations on their use in the NHS.