

## Red blood cell deformability in renal failure.

[Kikuchi Y](#), [Koyama T](#), [Koyama Y](#), [Tozawa S](#), [Arai T](#), [Horimoto M](#), [Kakiuchi Y](#).

### Abstract

Red blood cell deformability was measured in 74 cases of renal failure and diabetic nephropathy by means of a modified nuclepore membrane filter method. Low red blood cell deformability was observed in a certain proportion of the patients. In cases of renal failure only weak correlation was found between reduced red blood cell deformability and BUN as well as between reduced red blood cell deformability and creatinine level, while simultaneous changes in these variable were observed in several patients. The reduction in red blood cell deformability in cases of diabetic nephropathy slightly exceeded that in cases of renal failure and correlated with an increment in HbA1c content. The effects of uremic toxins were unclear in in vitro tests. The red blood cell deformability was impaired in nephrectomized rabbits.