Fractional flow reserve as an indicator of coronary circulation with special reference to kidney function

Xaplanteris et al¹ reviewed physiological indicators via catheterization to know the level of coronary circulation. Among them, fractional flow reserve (FFR) value has been used for evaluating severity of coronary stenosis. As there was no information on the relationship between FFR and chronic kidney disease (CKD) in the article, I present some references.

Tebaldi et al² evaluated the effect of CKD on FFR value in patients with intermediate coronary stenosis. CKD was defined as creatinine clearance value ≤ 45 ml/min, and FFR positive was defined as ≤ 0.80 . Adjusted hazard ratios (HRs) (95% confidence intervals (CIs)) of diabetes and CKD for FFR positive were 1.07 (1.008-1.13) and 0.92 (0.87-0.97), respectively. In contrast, Mohandas et al³ reported a positive relationship between renal function and FFR. A standardized way of FFR measurements is important, and inconsistent results on the relationship between FFR and CKD would partly be explained by the procedure of measurement. Anyway, CKD information in relation to FFR value should be confirmed by further study.

Disclosure

There is no conflict of interest in this study.

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