PROGNOSTIC SIGNIFICANCE OF THE COEXISTENCE OF CHRONIC KIDNEY DISEASE AND HYPERBILIRUBINEMIA (CARDIOHEPATIC SYNDROME) IN PATIENTS WITH CHRONIC HEART FAILURE

Poster Contributions
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Backgrounds: Chronic kidney disease (CKD) is a risk factor for mortality in patients with chronic heart failure (CHF). On the other hand, hyperbilirubinemia (HB) as liver dysfunction was reported to be associated with poor outcome in CHF patients. However, no information is available on the long-term prognostic significance of the coexistence of CKD and liver dysfunction, so-called cardiohepatic syndrome, in CHF pts.

Methods and Results: We prospectively studied 150 consecutive stable outpatients with LV ejection fraction <40%. Laboratory tests were repeated every several months for the initial 12 months after the entry. Seventy patients had CKD (eGFR<60 ml/min/1.73m2) and 24 patients had HB (serum total bilirubin>1.1 mg/dl). During a mean follow-up period of 7.4±4.2 yrs, 44 patients had cardiac death (sudden death in 28 and pump failure death in 16 patients). Cardiac death was significantly frequently observed in CKD patients with than without HB (67% vs 21%, p=0.0018), although there was no significant difference in the incidence between non-CKD patients with and without HB. Adjusted hazard ratios for cardiac death, sudden death and pump failure death were 3.86 (95%CI 1.55 to 9.61), 4.06 (95%CI 1.09 to 15.17), and 3.67 (95%CI 1.03 to 13.08), respectively, in CKD patients with HB compared to those without HB.

Conclusions: The coexistence of CKD and hyperbilirubinemia would be a long-term prognostic marker in patients with mild to moderate CHF.