**Insights in diabetes and chronic kidney disease care -
AI assisted integrated and person-centered management models**

**Dr Yau-Jiunn Lee**

**Honorary Chairman
Taiwan Association Of Clinical Diabetes**

**Abstract**

Taiwan faces one of the world’s highest rates of chronic kidney disease (CKD) and end-stage renal disease (ESRD), with dialysis prevalence topping global rankings since 2000. Over 11% of Taiwanese adults are affected by CKD, mainly due to diabetes and hypertension. Diabetic kidney disease (DKD) has emerged as the leading cause of ESRD, particularly as type 2 diabetes increases across East and Southeast Asia. To address this public health burden, Taiwan developed a comprehensive CKD care model focused on early detection, integrated management, and multidisciplinary collaboration. Since 2002, the Ministry of Health and Welfare has implemented the Early CKD Care Program for patients in stages 1–3a CKD. This program, funded by the National Health Insurance (NHI), offers regular screening, risk stratification, lifestyle counseling, medication review, and education, with follow-up every 3–6 months. Team-based care involving nephrologists, primary physicians, diabetes educators, dietitians, pharmacists, and case managers enhances coordination and adherence. In 2006, the Pre-ESRD Pay-for-Performance (P4P) program was added for stages 3b–5 CKD. It incentivizes timely nephrology referrals and standardized care using clinical pathways and decision-support tools integrated into electronic health records. Both programs have led to improved outcomes, including delayed dialysis, fewer hospitalizations, lower costs, and one of the lowest unplanned dialysis rates. The aging population, increasing rates of diabetes and metabolic syndrome, and improved survival among patients with CKD have contributed to the continued rise in dialysis cases. Though gaps remain in early-stage intervention and primary prevention, Taiwan’s approach highlights how structured, population-based kidney care—backed by universal insurance and interdisciplinary teams—can improve quality of life, reduce healthcare burdens, and serve as a global model for CKD and DKD management.