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KOGES 데이터 기반 분석 연구 프로세스 안내

Jong Hyun Jhee

Gangnam Severance Hospital, Korea, Republic of

In recent years, there has been a growing trend in medical research towards utilizing big data analytics. Big data refers to the massive amounts of structured and unstructured data generated by electronic health records, medical imaging, genetic testing, wearables, and other sources. On the other hand, cohort studies are a common and important type of observational study in medical research. A cohort study involves identifying a group of individuals who share a common characteristic or exposure, such as a particular disease, and following them over a period of time to observe the occurrence of outcomes of interest. Cohort studies can be prospective, where participants are enrolled and followed forward in time, or retrospective, where data is collected from past medical records or surveys. Cohort studies are particularly useful for investigating the relationship between risk factors and health outcomes, and for identifying potential causal associations.

The Korean genome and epidemiology study (KoGES) is a large prospective cohort study funded by the Korean government (National Research Institute of Health [NIH], Centers for Disease Control and Prevention and the Ministry of Health and Welfare, Korea). The aim of the KoGES was to establish a genome epidemiological study platform for the research community with a health database and biobank, to investigate the genetic and environmental etiology of common complex diseases in Koreans including DM, hypertension, obesity, metabolic syndrome, osteoporosis, cardiovascular disease, and cancer with long-term follow-up. The ultimate goal of the KoGES was to develop comprehensive and applicable health care guidelines for common complex diseases in Koreans, reduce the burden of chronic diseases and improve the quality of life. By utilizing KoGES study, it is possible to evaluate the associations between risk factors and prognosis of chronic kidney disease (CKD). In this lecture, utilizing and analyzing data from the KoGES study, specifically in relation to CKD, will be presented. The final goal of this lecture is to provide researchers with a more accessible and user-friendly approach to handling KoGES data.