1. Record Nr. UNINA9910427731703321 Autore Eiliv Lund Titolo Advancing Systems Epidemiology in Cancer - Exploring Trajectories of Gene Expression Scandinavian University Press (Universitetsforlaget), 2020 Pubbl/distr/stampa **ISBN** 82-15-04119-1 Descrizione fisica 1 electronic resource (187 p.) Inglese Lingua di pubblicazione **Formato** Materiale a stampa Livello bibliografico Monografia This book introduces systems epidemiology, which is a new scientific Sommario/riassunto discipline borne by novel technologies. These have opened up the potential for studies of temporal changes in the carcinogenic process and the response of the immune system, all measured as functional genomics: gene expression, microRNA and methylation. Systems epidemiology is an integrated approach based on epidemiological methods with biobanks designed for studies of the trajectories or curves of functional genomics moving from before diagnosis, at diagnosis and postdiagnostic. It demands new epidemiological designs, the globolomic one, new statistical methods for description and analyses of time changes and incorporating basic knowledge from reductionist experiments and clinical outcomes including molecular

biomarkers of cancer tissue and normal tissues.