1. Record Nr. UNINA9910734365403321 Application and analysis in fluid power systems / / edited by Massimo Titolo Rundo, Paolo Casoli Pubbl/distr/stampa [Place of publication not identified]:,: MDPI AG,, 2023 Descrizione fisica 1 online resource (286 pages) Disciplina 620.106 Soggetti Fluid power technology Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Sommario/riassunto This reprint focuses on the recent advances in fluid power technology reporting results in a wide range of applications. Studies concerning the developments of pumps both at constant and variable displacement are reported. Analyses are focused on the improvement of efficiency, control, design and pressure ripple reduction. About fluid power, several applications are investigated with the aim of reducing energy losses, in particular implementations in an excavator, a hybrid transmission and a system for agricultural solutions are described. Applications are studied focusing also on the effects of a particular load holding valve, and facing the relevant aspects of the condition monitoring, failure modes and effects analysis. The fluid power covers a very wide range of application as demonstrated by the paper concerning an exoskeleton device. Finally, a particular application concerning a gas pressure regulator with lower noise emission is

reported.