1. Record Nr. UNINA9910253985303321 Autore Stehlik Petr Titolo Up-to-Date Waste-to-Energy Approach: From Idea to Industrial Application / / by Petr Stehlik Pubbl/distr/stampa Cham:,: Springer International Publishing:,: Imprint: Springer,, 2016 **ISBN** 3-319-15467-2 Edizione [1st ed. 2016.] Descrizione fisica 1 online resource (110 p.) Collana SpringerBriefs in Applied Sciences and Technology, , 2191-530X Disciplina 338.476628 Soggetti Renewable energy sources Refuse and refuse disposal Environmental economics Renewable and Green Energy Waste Management/Waste Technology **Environmental Economics** Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Description based upon print version of record. Nota di bibliografia Includes bibliographical references. Nota di contenuto Introduction -- Conceptual Approach -- Investment Planning based on NERUDA System -- WtE as Integrated Items - - REGION and EVELINE systems -- Selection of Convenient Technology -- Subsystems, Equipment and Other Aspects -- Computational Support --Conclusions. . Sommario/riassunto Putting forward an up-to-date Waste-to-Energy approach which combines experience, sophisticated modelling and technical-economic analysis, this book examines the current need for the maximum utilization of energy from wastes and the associated environmental impacts. With waste incinerators and industrial plants producing large amounts of pollutants, municipalities and also smaller decentralized operations are beginning to focus on waste research. The principal advantage of utilizing research results is the ability to apply a complex approach "from idea to industrial implementation" with respect to the needs of the market established via thorough market analysis. This

book builds upon this locus with an original approach based on considering geographical aspects, the specifics of regions/micro-

regions, and technological units and/or equipment. Key areas discussed and analyzed areas within the text include: strategic planning of locations of energy sources according to the nature of the respective region or micro-region, types and amounts of wastes, logistics, etc. using own original mathematical models; consideration of on-site processing of various types of waste and taking into account the character of the region (agricultural, industrial etc.); tailor-made technologies for energy recovery from various types of wastes, implementation of own technologies with original elements, and support for environmental protection based on advanced flue gas (i.e. off-gas in the case of incineration) cleaning methods.