

1. Record Nr.	UNINA9910583366703321
Titolo	Sustainable food waste-to-energy systems // edited by Thomas Trabold, Callie W. Babbitt
Pubbl/distr/stampa	London : , : Academic Press, , [2018] ©2018
ISBN	0-12-811158-5
Descrizione fisica	1 online resource (xiii, 294 p.)
Classificazione	52.16.08
Disciplina	363.7280943
Soggetti	Refuse and refuse disposal - Environmental aspects food waste waste disposal soft energy energy conversion
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di bibliografia	Includes bibliographical references and index
Nota di contenuto	Chapter 1. Introduction Chapter 2. Waste resources in the food supply chain Chapter 3. Conventional pathways for food waste utilization and disposal Chapter 4. Sustainable waste-to-energy technologies -- chemical and biochemical Chapter 5. Sustainable waste-to-energy technologies -- thermochemical Chapter 6. Environmental aspects of food waste-to-energy conversion Chapter 7. Economic aspects of food waste-to-energy system deployment Chapter 8. Policy and regulatory considerations Chapter 9. Waste-to-energy system logistics and deployment Appendix A: Physical and chemical properties of selected food wastes Appendix B: Biomethane potentials of selected food wastes Appendix C: Sources of food waste resource and conversion data</p>
Sommario/riassunto	Sustainable Food Waste-to-Energy Systems assesses the utilization of food waste in sustainable energy conversion systems. It explores all sources of waste generated in the food supply chain (downstream from agriculture), with coverage of industrial, commercial, institutional and residential sources. It provides a detailed analysis of the conventional pathways for food waste disposal and utilization, including composting, incineration, landfilling and wastewater treatment. Next,

users will find valuable sections on the chemical, biochemical and thermochemical waste-to-energy conversion processes applicable for food waste and an assessment of commercially available sustainable food waste-to-energy conversion technologies. Sustainability aspects, including consideration of environmental, economic and social impacts are also explored. The book concludes with an analysis of how deploying waste-to-energy systems is dependent on cross-cutting research methods, including geographical information systems and big data. It is a useful resource for professionals working in waste-to-energy technologies, as well as those in the food industry and food waste management sector planning and implementing these systems, but is also ideal for researchers, graduate students, energy policymakers and energy analysts interested in the most recent advances in the field.
