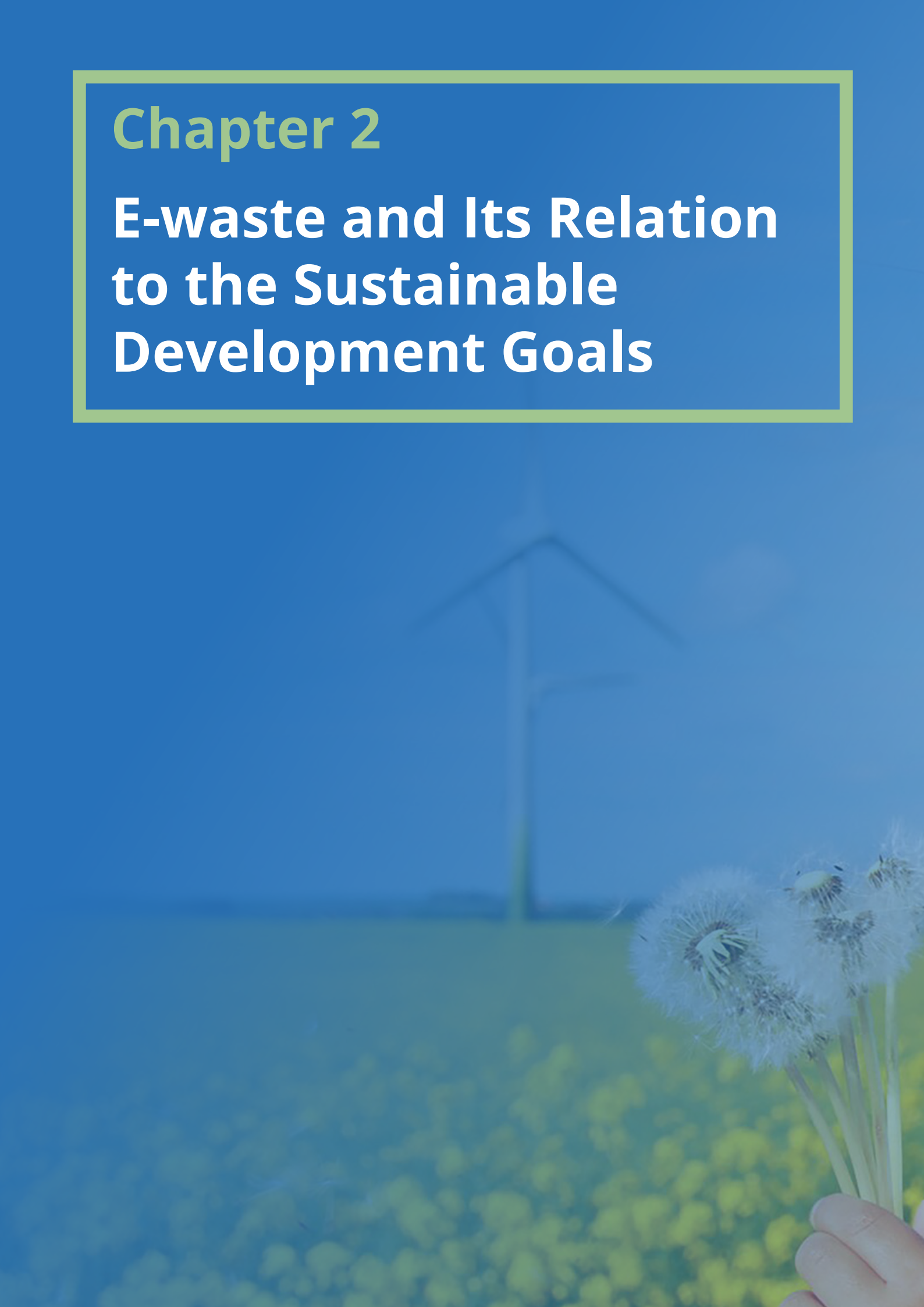


Chapter 2

E-waste and Its Relation to the Sustainable Development Goals





SUSTAINABLE DEVELOPMENT GOALS



In September 2015, the United Nations and all Member States adopted the ambitious 2030 Agenda for Sustainable Development. This new agenda identified 17 Sustainable Development Goals (SDGs) and 169 targets to end poverty, protect the planet, and ensure prosperity for all over the next 15 years. Increasing levels of e-waste, and improper and unsafe treatment, and disposal through incineration or in landfills pose significant challenges to the environment and human health, and to the achievement of the SDGs.

A better understanding and more data on e-waste will contribute to the achievement of several goals of the 2030 Agenda for Sustainable Development. It will help address the SDGs related to environmental protection and health. It will also address employment and economic growth, since the sound management of e-waste can create new

areas of employment and drive entrepreneurship.

A better understanding and management of e-waste is closely linked to Goal 3 (Good health and Well-being), Goal 6 (Clean water and Sanitation), Goal 11 (Sustainable Cities and Communities), Goal 12 (Responsible Consumption and Production), Goal 14 (Life Below Water), and Goal 8 (Decent Work and Economic Growth).

E-waste, when treated inadequately, poses serious health issues since it contains hazardous components, including contaminating air, water, and soil, and putting people's health at risk. Dismantling processes that do not utilize adequate means, facilities, and trained people pose additional threats to people and the planet. These issues are addressed in the following SDGs:



Target 3.9 refers to the reduction of the number of deaths and illnesses caused by hazardous chemicals and air, water, and soil pollution and contamination. Target 6.1 seeks to achieve universal and equitable access to safe and affordable drinking water for all, and Target 6.3 aims to reduce pollution, eliminate dumping, and minimize release of hazardous chemicals and materials. Goal 14 refers to marine pollution and the protection of the marine ecosystem (Targets 14.1 and 14.2).

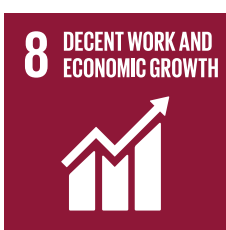


Target 11.6 aims to reduce the adverse per capita environmental impact of cities, by paying special attention to air quality and to municipal and other waste management. Since over half of the world's population lives in cities, rapid urbanization requires new solutions to address rising environmental and human health risks, especially in densely populated areas. Most e-waste will be generated in cities and it is particularly important to properly manage e-waste in urban areas, improve collection and recycling rates, and to reduce the amount of e-waste that ends up in dumpsites. The move towards smart cities and the use of ICTs for waste management offer new and exciting opportunities.



Similarly, Target 12.4 aims to achieve the environmentally sound management of chemicals and all waste throughout the life cycle, in accordance with agreed international frameworks, and to significantly reduce their release into air, water, and soil in order to minimize their adverse impacts on human health and the environment.

Target 12.5 aims to substantially reduce waste generation through prevention, reduction, repair, recycling, and reuse. An increasing number of people on the planet are consuming growing amounts of goods, and it is critical to make production and consumption more sustainable by raising awareness levels of producers and consumers, specifically in the area of electrical and electronic equipment.



SDG Target 8.3 aims to promote development-oriented policies that support productive activities, decent job creation, entrepreneurship, creativity, and innovation, and to encourage the formalization and growth of micro-, small-, and medium-sized enterprises.

Target 8.8 calls for the protection of labour rights and promotes safe and secure working environments for all workers, including migrant workers, particularly women migrants, and those in precarious employment. The sound management of e-waste can create new employment and contribute to economic growth in the recycling and refurbishing sector. Now, e-waste is often processed in the informal sector, and many e-waste disposal and recycling jobs are unsafe and not protected by formal regulation (Brett et al. 2009; Leung, et al. 2008). It is therefore necessary for countries to formalize the environmentally sound management of e-waste and to take advantage of the business opportunities it offers.