Client: City of Zhongshan

Project: Solid Waste Management Strategy

CLIENT

The City of Zhongshan is located in the south of the Pearl Delta in Guangdong Province, People's Republic of China. It is near Guangzhou, Hong Kong and Macau.

The City has a population of approximately 1.8 million people.

BACKGROUND

The City of Zhongshan, like much of southern mainland China, has experienced rapid economic growth in recent years. Rapid urbanisation and industrial expansion have led to a significant increase in the volume of waste generated within Zhongshan. This has placed severe pressure on the City's existing waste collection and disposal systems and in some cases resulted in environmental degradation and unsanitary conditions.

PROJECT OBJECTIVES

To review existing solid waste management facilities and practices.
To identify any critical hazards or risks associated with current solid waste management.

☐ To identify cost-effective practices and technologies for improving the management of solid waste in Zhongshan.

KEY ACTIVITIES

Earth Systems worked closely with the City's Environment Protection Bureau and Sanitation Department in undertaking this project.

The project addressed all major sources of solid waste in Zhongshan including urban waste, industrial and commercial waste and biomedical waste.

Key activities included:

Comprehensive review of existing practices and identification of environmental hazards and public health risks associated with these practices.
Characterisation of the major waste streams, including the identification of hazardous waste sources.
Identification and evaluation of alternative technologies and strategies for improving waste minimisation, recycling, treatment and disposal.
Evaluation of the feasibility of establishing a central incinerator for the thermal destruction of waste and recovery of materials and energy.
Preparation of industrial waste minimisation case studies.

OUTCOMES

Nearly forty recommendations to improve the management of solid waste in Zhongshan were provided in the strategy. These recommendations together with the findings of the study were formally presented to an advisory committee established by the City comprising eminent government, industry and community representatives.