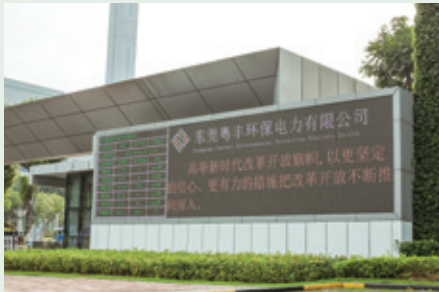


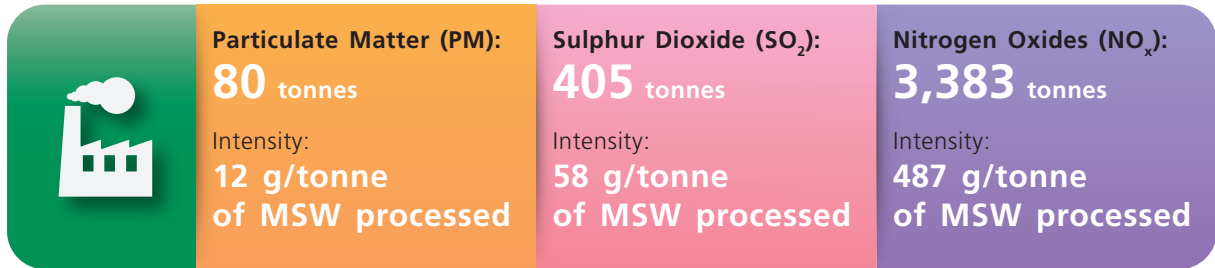


### Public Disclosure of Emissions Data

Adhering to the principle of information transparency within the Group, real-time flue gas emission data are displayed at the gate of each of our operating plants. Such information is also accessible via our corporate website to encourage public supervision, further demonstrating our unwavering commitments to our society and environment.



### Air Emission from Operating Projects in 2020



### WASTE MANAGEMENT

As one of the leading waste management operators, it is our responsibility to avoid generation of waste during our operation via efficient management measures and maximise recovery of useful materials. The majority of the wastes consist of fly ash from flue gas treatment, bottom ash from the incineration processes, and sludge from wastewater treatment processes. We adhere to the Group's *Operation Environmental Control Procedure* and *Production & Operation Management Procedure* for the control measures on all effluents, hazardous and non-hazardous waste resulting from our operations, thus reducing waste generation and pollution to surrounding environment. Nevertheless, we will continue to explore measures to further reduce waste generation in our daily operations and improve our waste management performance.

#### Fly Ash Treatment Measures

Fly ash contains high content of heavy metals and dioxins, therefore require specialised treatment and storage procedures in accordance with the *Standard for Pollution Control on Hazardous Waste Storage (GB18597-2001)*. As air is drawn through the baghouse, particulate matter from the combustion gases as well as chemicals added for air quality control including activated carbon and lime are removed and are then discharged from the bottom of the baghouse as fly ash. Chelating agent and cement are added to stabilise and solidify the fly ash before disposal at designated landfill as required by the *Standard for Pollution Control on Landfill Site of Municipal Solid Waste (GB16889-2008)*.



### Solid Waste Treatment Measures

Generation of bottom ash is imperative during the combustion process. In 2020, bottom ash consists of 92% of the total solid waste generated from the operation. Since bottom ash is a non-hazardous inert material, it is recovered to be used for the production of eco-bricks. The collection, transportation and treatment of bottom ash conform with the *Standard for Pollution Control on the Storage and Disposal Site for General Industrial Solid Wastes (GB18599-2001)*.

#### Production of Eco Bricks



Bottom ash is thoroughly mixed with cement, chelating agent, stone dust and sand, then compressed by a molding machine to produce eco-bricks.

#### Benefits:

- ✔ Does not require high-temperature combustion process
- ✔ High strength and durability
- ✔ Can be used for road paving or construction of brick wall



Bottom Ash Discharged from Incinerators

#### Metal Recovery



Scrap metals are sorted and separated from the bottom ash for recycling and further processing.

#### Benefits:

- ✔ Reduce GHGs emission and energy consumption for production of products using virgin materials
- ✔ Reduce exploitation of virgin metal resources for production process
- ✔ Encourage full utilisation of valuable natural resources
- ✔ Promote conservation of natural resources



### Sludge Treatment Measures

Apart from the fly ash and bottom ash generated during the incineration process, sludge is generated from the leachate treatment process within our WTE plants. By utilising sludge dewatering equipment, the excess water content in the sludge is removed and the sludge cake produced after treatment is sent back to the incinerator for thermal destruction whereas the separated wastewater undergoes leachate treatment process again.

Waste Generated from Operating Projects in 2020 <sup>a</sup>	
<p><b>Hazardous Waste</b></p> <p>Fly ash before stabilisation: 124,384 tonnes</p> <p>Other hazardous waste: 16 tonnes</p> <p><b>Total hazardous waste generated:</b> 124,400 tonnes</p> <p><b>Intensity:</b> 0.052 tonnes/MWh of electricity sold</p>	<p><b>Non-hazardous Waste</b></p> <p>Bottom ash: 1,517,896 tonnes</p> <p>General refuse: 413 tonnes</p> <p><b>Total non-hazardous waste generated:</b> 1,518,309 tonnes</p> <p><b>Intensity:</b> 0.629 tonnes/MWh of electricity sold</p>

Notes:

- a. Fly ash itself is a by-product of flue gas treatment that comprises the captured pollutants as well as the materials used for flue gas treatment such as lime and activated carbon. The amount of fly ash generated indicates the amount of pollutants removed from the air from our flue gas treatment system. Meanwhile, the generation of bottom ash depends on the inert content of incoming MSW, which is beyond Canvest's control.

### WASTEWATER TREATMENT

Removal of excess water content from incoming MSW prior to the incineration process is essential to ensure excellent burnout of the MSW. The leachate separated from MSW during this process is then delivered to the on-site leachate treatment plant, which is designed and operated to comply with *The Reuse of Urban Recycling Water — Water Quality Standard for Industrial Uses (GB/T19923-2005)* and *The Reuse of Urban Recycling Water — Water Quality Standard for Urban Miscellaneous Water Consumption (GB/T18920-2002)*. During the Reporting Period, the Operating Projects treated 711,717 tonnes of raw leachate with COD discharge reduction of approximately 23,137 tonnes.

**84%**

of our treated effluents are reclaimed to replenish circulatory cooling water, landscape irrigation water, and truck washing water in plants