



**i8-140**  
**General Incinerator**

The i8-140 is one of our mid-sized models that can be used for a variety of applications. Large enough to offer impressive burn rates and batch sizes, while still being small enough to fit all our mobile options. The i8-140 features a top loading design with a large opening for bulky waste items.



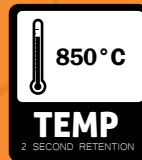
#### Industry Leading Insulation

Coretex<sup>®</sup> insulation is a specially formulated substrate containing various levels of material that ensure almost all of the heat generated within our incinerators stays inside them - increasing performance and efficiency to another level.



#### Rigid, Long Lasting Construction

All our incinerators are constructed from British made high quality 4mm mild steel plate. They are fully welded for maximum strength by our time-served coded welders. Meaning you get years of trouble-free operation.



#### Fully Compliant Range

Each of our incinerators has been tested to exacting standards ensuring they meet all required guidelines. They are CE declared to BS E7N4 6-2:1997 (industrial thermo processing equipment – part 2). This machine can reach in excess of 850°C in the secondary chamber and also retains the gases for the 2 seconds required.



#### Plug and Play CE-2 Control Panel

Completely re-designed and built in-house since 2017. Our control panels now feature:

- IP65 weatherproof
- User friendly
- Robust Components
- 316 Stainless thermocouples
- Separate primary / secondary control



#### Why we use Castable Refractory Linings

- Our latest low cement castable technology has a higher strength and volume stability than the conventional castable.
- It has excellent resistance to thermal cycling
- This castable has fast firing characteristics engineered - so is more robust in the initial firing / commissioning stage and in continued service.

## Key Parts of our Incinerator

### Dual HT Thermocouple

Allow independent control of primary and secondary temperatures via the control panel.

### Chimney Stack

Stainless steel stack for longevity. Minimum 3m stack height required. Fitted with dispersion cap as standard.

### Low NOx Burners

These are some of the cleanest, most efficient burners available today. These can be supplied as gas or oil fired.

### Secondary Chamber

Retains and re-burns the exhaust gases for minimum of 2 seconds at 850°C to meet EU guidelines.

### Primary chamber

Chamber designed for maximum air flow and circulation which in turn improves efficiency and total burn time.

### Ash door

All models now feature a 'floating' ash door design that is rigid and can be opened safely.



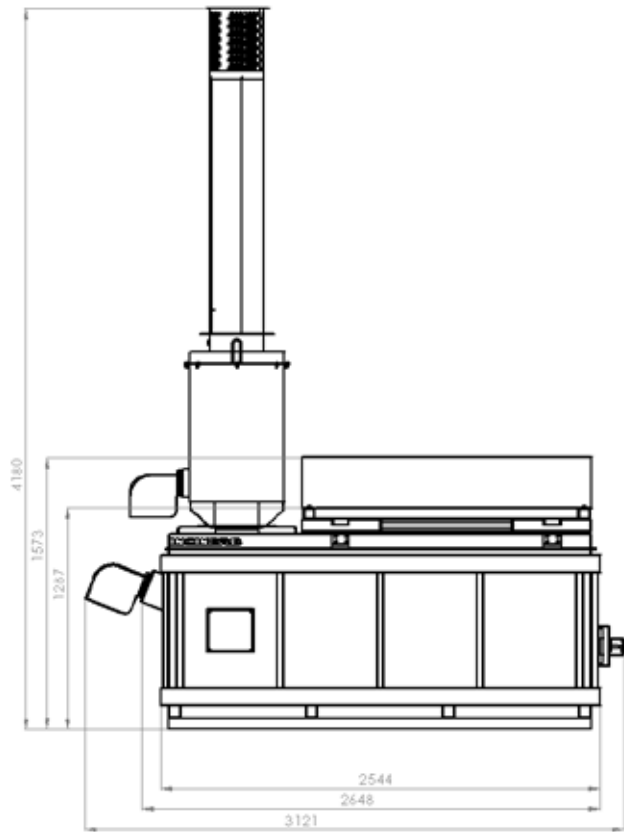
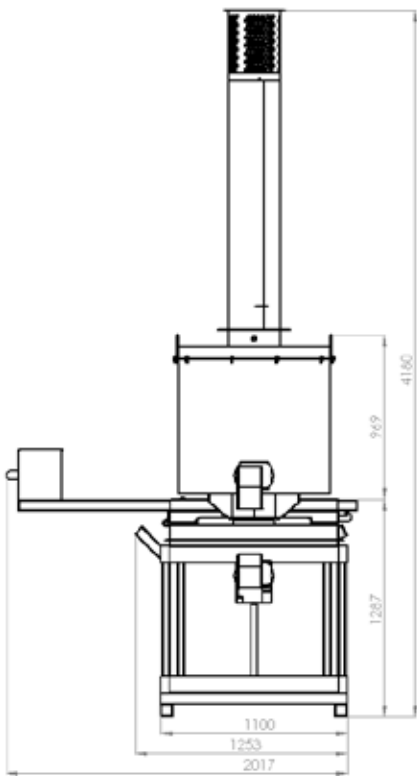
## How incineration works:

Incineration is a waste treatment process that involves the combustion of organic substances contained in waste materials. Incineration and other high-temperature waste treatment systems are described as "thermal treatment". Incineration of waste materials converts the waste into ash, flue gas and heat. The ash is mostly formed by the inorganic constituents of the waste and may take the form of solid lumps or powder. In some cases, the heat generated by incineration can be used to generate electric power.

## Applications

Our versatile range of general incinerators are designed for a wide range of waste types. This particular model benefits from a extra wide top loading design and very simple operation process. Ideal as a stand-alone machine.

- Industrial waste applications (including RDF),
- Wood waste
- Mining/exploration/refugee camp waste
- Oil and gas industry waste applications
- Household waste,
- Oily filters
- Rags
- Plastics



### Technical Specifications

Combustion Chamber Volume (m3)	1.35m3	Average ash residue (%)	3%
Metal Thickness	4mm	Thermostatic Device	Yes
Burn Rate	up to 150kg per hour**	Shipping Weight	5500kg
Operational Temperature	850°C*	Dimensions (l, w, h)	2.55m x 1.1m x 4.19m
Gas Retention	2 secs	** Dependent on calorific value of waste and local conditions.	

### Average emissions / EU standards\*(On basic incinerators with secondary chamber)

Parameter (1/2 hr av)	Limits	Measured
Total dust	30 mg/m3	12 mg/m3
Sulphur dioxide	200 mg/m3	2,4 mg/m3
Nitrogen dioxide	400 mg/m3	60 mg/m3
Carbon monoxide	100 mg/m3	78,3 mg/m3

\*The above figures are guidelines ONLY.

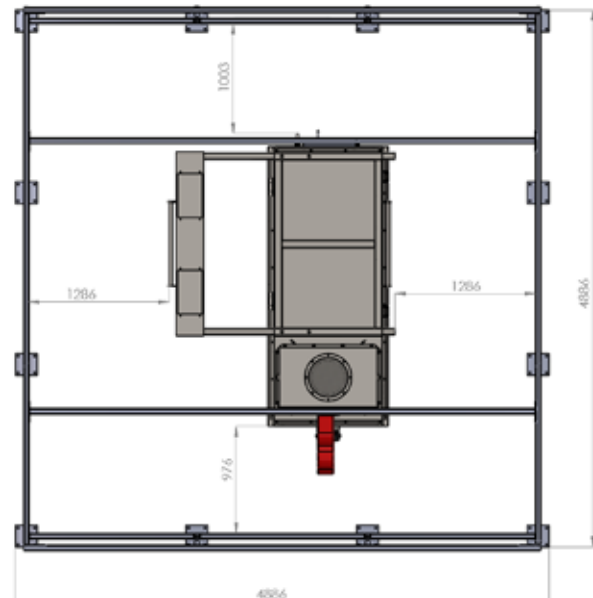
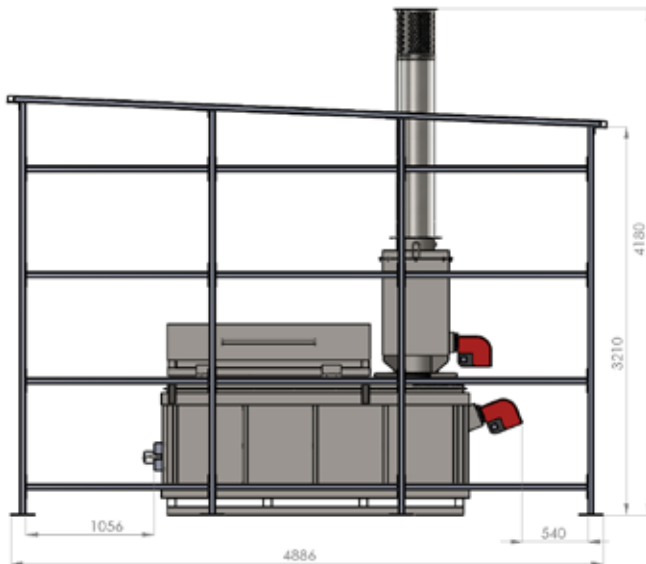
Actual emissions will depend on a number of factors including waste type, volume of waste, moisture content, fuel used and local environmental conditions.

All our incinerators' chambers are lined with high grade refractory concrete rated to 1600C. Our secondary chamber technology prevents dioxins from cracking into smaller but more reactive molecules, this is known as de novo formation.

This can be especially apparent in the presence of heavy metals, which can act as a catalyst.

The prevention method can be explained as follows: system design forces the micro particulates to pass through a flame curtain, this burns harmful emissions, gas remnants are then retained in the secondary chamber, through thermal decomposition, and complex, controlled air distribution to ensure a clean odourless emission.

# Site Preparation



## Sheltered

Ideal weather protection for equipment and operator. Our shelters are designed for easy and quick installation on a standard reinforced concrete slab.

Certain regions require some sort of shelter from adverse weather conditions or localised problems. Our products are used in diverse locations from the freezing camps of Antarctica to sweltering temperatures of Sierra Leone.



## Containerised

Containerisation is the most feasible and viable option in contrast to the construction of on-site facilities and housing structures, eliminating the man power and costs involved.

The units arrive complete with electrical power generators and fuel tank with further customization available to suit all needs, regardless of local resources available. The system is available in 10ft, 20ft, and 40ft containers, depending on capacity and optional requirements.



## Trailer-mounted

The trailer is rated to carry up to 2700kg, therefore there is plenty of additional space to carry extra items of equipment including generator sets, fuel and any other equipment. Chassis, framework and panels are galvanized for maximum durability.

These trailers have been built to withstand the rigours of the construction industry. The beam axle system features sealed, specialised wheel bearings and powerful auto-reverse brakes and is unequalled for strength and durability.



All containers supplied are ISO 6346 certified, so they can be used for the shipping and housing of incinerators and any other related equipment.

## CE DECLARATION.



### **MACHINE LISTED BELOW HAS BEEN TESTED BY MANUFACTURER IN FACTORY BEFORE DISPATCH**

PRODUCTION DATE: 2018  
CONFORMS TO ALL SAFETY NORMS WHEN USED ACCORDINGLY  
“CE DECLARATION OF CONFORMITY”  
“CE DECLARATION DE CONFORMITE”  
“CE DECLARACION OF CONFORMIDAD”  
“CE ATTESTATO DI CONFORMITA”  
“EG- KONFORM IT A TSEKRLARUNG”

**INCINER8 LTD, UNIT 2, CANNING ROAD INDUSTRIAL ESTATE, CANNING ROAD,  
SOUTHPORT PR9 7SN, UNITED KINGDOM**

Has declared that the machinery described:  
Declares que les machines descrites:  
Declaramos que la maquinaria descrita:  
Dichiara che la macchina di seguito descrito:  
Bestatigt daB die hierunter beschreibt Maschine:  
Model (Modele; Modelo; Modello; Modell) :

## CE INCINERATOR I8-140 C/W Eco Flam Burners

### **1.BS EN 746-2:1997**

(industrial thermo-processing equipment – part 2. Safety requirements for combustion and handling systems)

### **2.Low Voltage Directive 73/23/EEC**

Directive Basse Tension  
Directive Baja Tension  
Direttiva Sulla Bassa Tensione  
Niedrige Sapnnung – Richtlinie Diretivas

### **3.EMC Compatibility Regulation 89/336/EEC**

Directive CEM  
Directiva CEM  
Direttiva Compatibilita Elettromagnetica  
Elektromanetische Vereinbarkeit – Richtlinie Directive EMC

### **4.Machinery Directive 2006/42/EC (including amendment)**

Directive Securite Machines  
Directiva Seguridad Maquinas  
Direttiva Macchine  
Maschinen – Richtlinie Directiva De Maquinario

### **5. (EC) No 1005/2009 on substances that deplete the ozone layer**



[www.inciner8.com](http://www.inciner8.com)

INCINER8 Ltd is one of the largest suppliers of incinerators throughout the world. Manufacturing in a factory in Southport and shipping out products through our dedicated sales team & Global Dealership Network.

An experienced team of researchers, designers and engineers have made INCINER8 an innovator in the waste sector, achieving two Queens Awards and many regional business awards.

Our hand engineered machines can process municipal, medical and animal waste streams, providing the best solutions to waste problems around the world.



Certificate No. 6596



## Speak to the Experts

Our technical sales team are always on hand to answer any questions you may have.

Call +44 1704 884020 or email [sales@inciner8.com](mailto:sales@inciner8.com)