

Michaelis Combustor® Fixed Bed Furnace:

Main data:

Kind of waste	<ul style="list-style-type: none"> • Domestic waste • Industrial waste • Chemical residues • Hospital waste • Solid • Paste-like up to 30% moisture content • Incineration of liquid waste
Amount of waste	<ul style="list-style-type: none"> • 10 – 5300 kg/h
Calorific value of waste	<ul style="list-style-type: none"> • 1 – 45 MJ/kg
Density of waste	<ul style="list-style-type: none"> • 50 – 1250 kg/m³

Features:

- **Simple and rigid construction:** use of standard units
- **Incineration without grate:** absolutely sterile ashes by a complete burnout in the combustion chamber
- **Post-combustion chamber:** elimination of odour and organic matters
- **Low heat emission:** additional-leaf furnace structure
- **Refractory lining:** wear resistant and heat storing refractory lining, low surface temperature of the furnace
- **Low required space:** two-stage incineration, integrated in one housing, compact construction
- **Easy operability:** automatic function control, large firing and ash discharging openings, optionally automatic charging and ash discharging systems
- **Low maintenance costs:** all important components are clearly arranged and easy to access
- **Mobile incineration system:** installation in ISO standard containers
- **Made in Germany quality:** long-life cycle

Technical Data:

Type	Cd 1	Cd 2	Cd 3	Cd 4	Cd 5	Cd 6	Cd 7	Cd 8	Cd 9
Capacity kg/h	20	35	50	75	100	150	200	250	300
Thermal capacity kW	70	125	175	265	350	525	700	875	1050
<u>Main combustion chamber:</u>									
Temperature °C	600 - 1200	600 - 1200	600 - 1200	600 - 1200	600 - 1200	600 - 120	600 - 1200	600 - 1200	600 - 1200
Residence time of waste Minutes	30 – 60	30 – 60	30 – 60	30 – 60	30 – 60	30 – 60	30 – 60	30 – 60	30 – 60
<u>Postcombustion chamber:</u>									
Temperature °C	800 – 1200	800 - 1200	800 - 1200	800 - 1200	800 - 1200	800 - 1200	800 - 1200	800 - 1200	800 - 1200
Residence time of flue gas Seconds	> 2	> 2	> 2	> 2	> 2	> 2	> 2	> 2	> 2
Measurements: L x W x H m	1,8 x 1,2 x 1,5	1,9 x 1,3 x 1,5	2,0 x 1,5 x 1,6	2,1 x 1,6 x 1,8	2,3 x 1,7 x 2,0	2,5 x 1,9 x 2,1	2,8 x 2,0 x 2,3	3,1 x 2,2 x 2,5	3,4 x 2,4 x 2,7

- 1) Each incineration system will be adapted to the local requirements by Michaelis. The data indicated on the table are reference values.
- 2) The data are calculated with a calorific value of 12.500 kJ/kg and a moisture content less than 10%
- 3) With the composition of the waste the indicated data will also change
- 4) Bigger systems on request