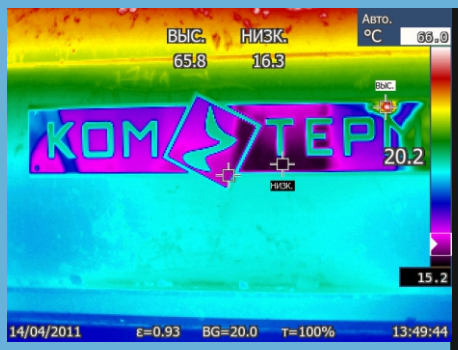
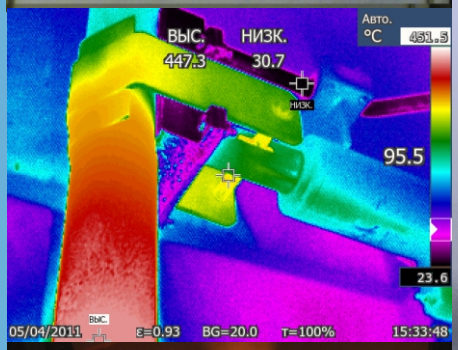
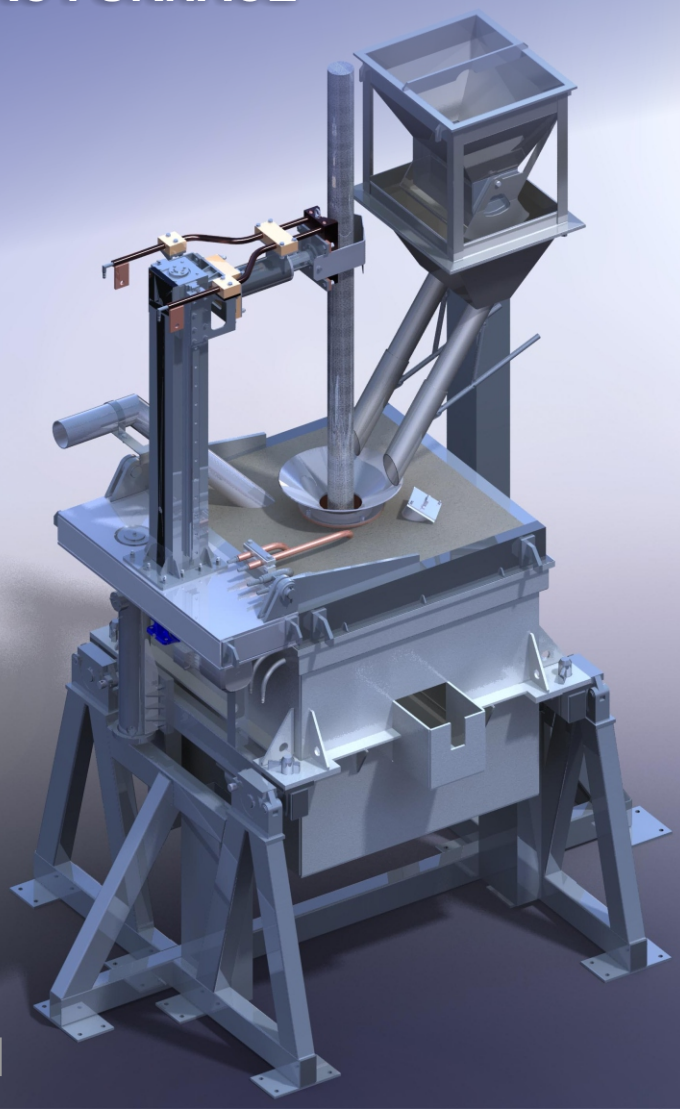




Purpose of furnace:

- **Melting of ferrous materials:** steel, cast **iron;**
- **Melting of non-ferrous metals:** aluminium, copper;
- **Ferroalloys:** reduction, refining;
- **Melting of complex addition alloys;**
- **Industrial waste processing** with extraction of valuable components;
- **Melting of silicon**

DP-0.1 SMALL ALL-PURPOSE ELECTRIC ARC FURNACE



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Parameters of the DP-0.1 furnace

capacity	140 кВА	250 кВА
supply network voltage	380 В	380 В
diameter of roof electrode	75(100)мм	100(150)мм
weight of equipment, without lining	4000кг	5000кг.

COMTERM SCIENTIFIC PRODUCTION COMPANY LLC tel./fax: (495) 366-32-34, tel.: (499) 748-95-65
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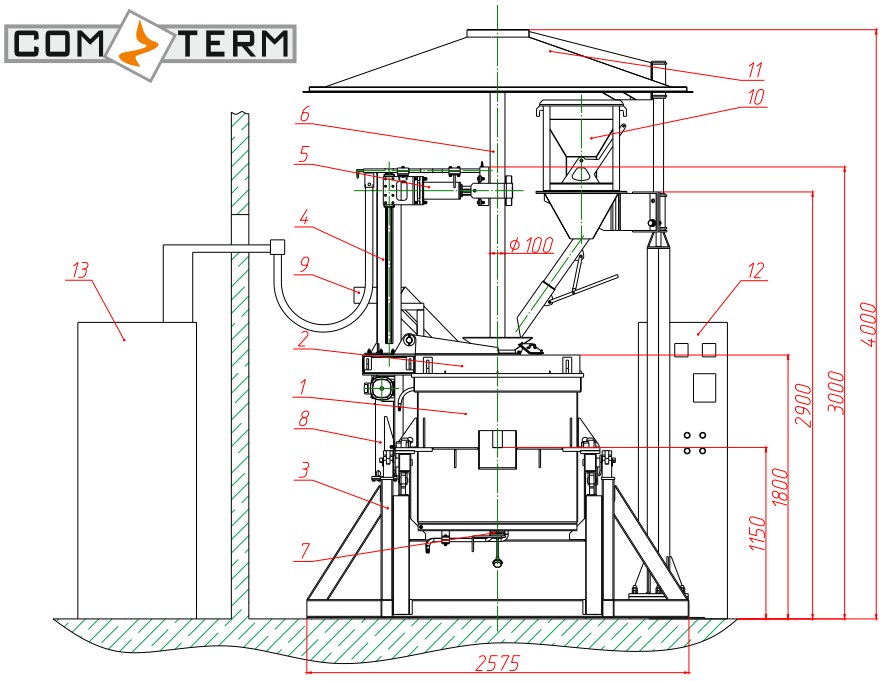
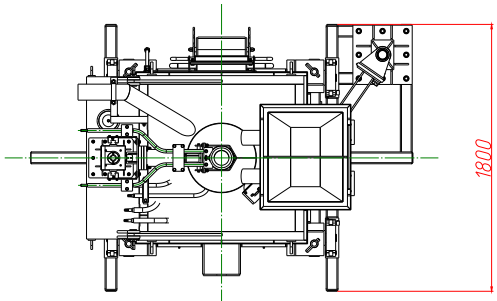


1 - Furnace tank
2 - Furnace roof
3 - Furnace tilting mechanism
4 - Electrode moving mechanism
5 - Electrode holder
6 - Roof electrode
7 - Bottom electrode
8 - Roof lifting and swinging mechanism
9 - Fume exhaust nozzle
10 - Loading mechanism
11 - Hood
12 - Control cabinet
13 - Power source



Features of the furnace:

1. Furnace can be manufactured to use direct or alternate current as requested by the Customer.
2. Power source is cost-efficient with wide performance capabilities enabling to perform energy-efficient melting at all stages of both remelting and melting.
3. Equipment configuration is selected to meet the Customer's requirements.
4. The use of changeable tanks (lined covers) allows to perform different processes in one and the same furnace without a time-consuming and expensive reconfiguration. The Customers may have covers of different shapes (cylindrical, cubical, conical, etc.) with linings for different processes. Maximum volume of working space is 0.35 sq.m.
5. Linings used: basic, acid, graphite, carbon, including skull lining.
6. Furnace's tank can be manufactured with or withour working door, depending on the technological process and the Customer's requirements.
7. The furnace uses unufied components by the leading manufacturers.
8. The original construction of the furnace tilting mechanism allows to tilt the furnace around the axis under the downchute and around the axis under the furnace's working door, thus preventing change in the trajectory of the flow during metal discharge and deslagging.
9. Electrode of 75 to 150 mm in diameter can be installed. Electrode holder is manufactured with self-centering of the electrode along the axis of the furnace. The electrode gripping mechanism is simple, reliable, controllable, and is located in the cold zone of the furnace.
10. The loading mechanism enables an even supply of granular materials around the electrode and provides for three types of loading: one-time, batch, or continuous loading.
11. The furnace is equipped with a modern control system which is similar to an industrial control system in its structure. It can be manufactured on the basis of controller manufactured by Siemens.
12. Additional research and technological equipment can be installed at the Customer's wish.

Technological parameters of the DP-0.1 furnace for melting metals

Melted metal	Load weight,kg	Meltdown period, min	Specific electric energy consumption, kW*h/t
Steel, cast iron	100 150 200	20 30 40	605 630 661
Aluminium and alloys	30 50 70	9 12 12	475 473 455
Copper and alloys	120 180 240	17 25 34	400 420 445

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