

Mobile Flash Butt Rail Welding Machine K1067 (for railway switches)

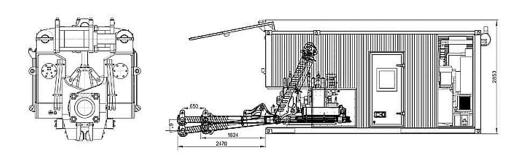


Rail-welding machine K1067 is designed for contact butt welding of railroad crosses with welded rail ends to railroad rails and railroad rails to each other, as well as for welding in hard-to-reach places.

K1067 is also used for welding rails that are placed at a close distance from each other on railways and subway lines.

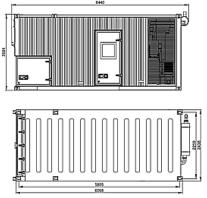
A container with the rail welding equipment:

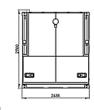
- K1067 welding machine with a flash-remover for one rail profile specified by the customer
- Crane-manipulator
- Pumping station
- Diesel-generator
- Cooling post
- Control cabinets of the welding machine and complex
- A warranty set of spare parts, tools and accessories.



The container is equipped with a closed section for the generator, hydraulic station, control system and cooling system. To place the welding machine and crane-manipulator in transport position the container is equipped with an open loading platform. The fuel tank capacity is 400 liters.







The auxiliary electrical equipment designed for voltage of 24V includes the main accumulator battery (batteries) of 24V with a minimum 170Ah capacity, battery disconnect switch and charging device for the accumulator batteries.

Lighting consists of hinged spotlights on side surfaces of the container, two spotlights for the welding machine, internal lighting of the generator section and also internal lighting of section with the welding machine.

The welding machine:

The base of the complex is the K1067 mobile welding machine. It's designed for contact butt welding of railway switches with welded rail ends to railway rails and railway rails between themselves, as well as for welding in

hard-to-reach places. The welding machine control system is based on the SIEMENS programmable controller. The welding machine is equipped with the WeldReg computerized system for monitoring of welding.



repairing the railway track.

The K1067 welder is equipped with more powerful welding transformers that allows welding at more hard modes, i.e. increased welding current and welding voltage, implementation of the pulsed flashing mode, reduction of time and near joint area of rail heating, all that provides the qualitative welding of rails made of high alloyed steels.

Application of pulsed flashing allows reducing heating time of rail ends to be welded and therefore reducing substantially the welding time up to 100 seconds, reducing the size of rail metal flashed during welding up to 30 mm. Increased power of the machine and reduced machine welding time gave an opportunity to increase productivity, to provide energy saving and welding of difficult-to-weld rails, and also to use new technologies while building and







The welding machine complies with the European standards on safety and has a confirmation of compliance with the European Directives: 2014/30/EU, 2006/42/EC and 2014/35/EU.

The control system complies with the requirements of the international standards

The welding machine provides welding of standard rails as well as head-hardened and high alloy steel rails. To avoid errors/faults due to manual work the welding machine (head) positions rails with the required angle and position. The welding machine can operate both on right and left rail.

The welding process is controlled automatically with the SIEMENS PLC.

The 3G module is available for remote monitoring of the complex operation if there is a 3G coverage on site (the Buyer performs connection to the local Internet access provider).

The programs for welding of different rail types and profiles are stored in the controller memory. The machine is equipped with a computer with the appropriate software installed to record welding parameters and results of welding with the function of automatic welding parameters evaluation (comparison with the rated data).



Specifications

	K1067
Section of rails to be welded, mm²	6400-10000
Rated mains voltage, V	400
Mains frequency, Hz	50
Maximum output at welding of rails with 8200 mm², weld/h	13
Oil pressure in the hydraulic system, MPa	21
Clamping force, kN (at pressure of 20MPa in the hydraulic system)	1500
Upsetting force, kN (at pressure of 20MPa in the hydraulic system)	600
Power at 50% DC, kVA, not less	182
Transformation ratio of welding transformers	64
Machine welding time of rails (for UIC 60 rails), s, max	110
Stroke of the welding machine (of upset cylinders), mm	100
Diesel-generator power, kVA	400
Load-carrying capacity of the crane-manipulator, kg	4000
Crane-manipulator turning angle in horizontal plane, within	±35°
Outreach change of sliding section, within, mm	0-860
Overall dimensions of the complex, mm: length width height	6640 2438 2700
Weight of the container with the equipment, kg, max	15200