DOI: https://doi.org/10.15407/techned2018.05 . 112

PULSE POWER SUPPLY FOR MICRO RESISTANCE WELDING WITH THE LINK OF POWER REGULATION IN CONTINUOUS MODE

Journal	Tekhnichna elektrodynamika
Publisher	Institute of Electrodynamics National Academy of Science of Ukraine
ISSN	1607-7970 (print), 2218-1903 (online)
Issue	No 5, 2018 (September/October)
Pages	112 – 115

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In this paper, a topology of pulse power supply for micro resistance welding machine with the link of power regulation in continuous mode is suggested: the pulse converter generates the main part of the output power, when the small-power linear converter compensates the pulsations. The mathematical models of the circuit principal units are created. The high accuracy of welding pulses generation of power supply is confirmed through simulation. It is shown that the power pulsation in load is more than five times reduced, while the high efficiency of the power supply is kept. References 5, figures 5.

Key words: micro resistance welding, pulse power supply, continuous control mode, modular structure.

Received: 05.03.2018
Accepted: 03.05.2018
Published: 16.08.2018

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