Impulse Transformers

IT 5413, IT 5425
TM 410, TM 510

Output voltage up to 40 kV

High slew rate

Cast-resin insulation

High reliability

The high-voltage impulse transformer IT 5413 is designed for triggering spark gaps, flash lamps etc. Typical applications are high-voltage impulse technology, laser- and plasma physics.

The impulse transformer IT 5425 and the transformer modules TM 410 and TM 510 are suitable for triggering Ignitrons.

The impulse transformer IT 5425 has a high insulating voltage between primary and secondary. It can be used with 10 kV= working voltage.

Technical specification:	**IT 5413**	**IT 5425**	**TM 410 / 510**
Input voltage	400 Vs	400 Vs	500 Vs
Open circuit output voltage	40 kVs	2000 Vs	2000 / 2500 Vs
Nominal ratio	1 : 100	1 : 5	1:4 1:5
Slew rate of output voltage, typically	20 kV / µs		
Primary stray inductance, typically	1.3 µH		
Test voltage: primary / secondary, 5 min	2500 V≈	10 kV≈	2500 V≈
Pulse capacitor to be discharged to the primary	0.5...2 µF	0.5...2 µF	0.5...2 µF
Dimensions	ca. 48 mm ∅ ca. 80 mm height		RM 14
Weight	300 g	300 g	120 g

The impulse transformers are exited by discharging a pulse capacitor to the primary winding. Several trigger modules suitable for exiting these pulse transformers are available:
TMS 2403, TMS 2403-1, MCT 5002, MCT 5004.