BOSCH
Invented for life

Single Fire Coil P100-T

- **Max. 30 kV**
- **Max. 100 mJ**
- **Max. 1.7 kV/µs**
- **High energy coil**
- **Max. 8,000 1/min**

The P100-T is a transistorized coil (integrated power stage BIP 355) developed for engines needing immense spark energy and long sparks duration.

The P100-T has an integrated transistor and requires an ECU with internal ignition drivers.

The coil is designed for direct cylinder head mounting.

The coil benefits form series production ensuring robustness and low cost.

Application

Spark energy	≤ 100 mJ
Primary current	≤ 7.5 A
Operating temperature range at outer core	-20 to 140°C
Storage temperature range	-40 to 100°C
Max. vibration	≤ 400 m/s^2 at 5 to 2,500 Hz

Technical Specifications

Mechanical Data

Weight	353 g
Mounting	Screw fastening

Electrical Data

Primary resistance with wire	Incapable of measurement
Secondary resistance	Incapable of measurement
High voltage rise time	≤ 1.7 kV/µs
Max. high voltage at 1 MΩ || 10 pF	≤ 30 kV
Spark current	≤ 110 mA
Spark duration at 1 kV || 1 MΩ	≤ 1.9 ms
Noise suppression	Inductive
Suppression diode / EFU	Integrated
power stage	Integrated

Characteristic

Measured with power stage	BIP 355

Connectors and Wires

Connector	Bosch Compact
Mating connector	D 261 205 336-01
Pin 1	ECU Ignition signal
Pin 2	ECU_{Gnd}
Pin 3	$Engine_{Gnd}$
Pin 4	U_{batt}

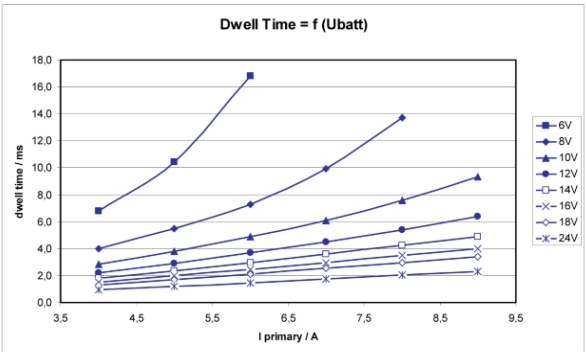
Various motorsport and automotive connectors are available on request.

Please specify the required wire length with your order.

Characteristic dwell times [ms]

U_{batt}	I primary					
	4.0 A	5.0 A	6.0 A	7.0 A	8.0 A	9.0 A
6 V	6.8	10.4	16.8			
8 V	4.0	5.5	7.3	9.9	13.7	
10 V	2.9	3.8	4.9	6.1	7.6	9.3
12 V	2.2	2.9	3.7	4.5	5.4	6.4
14 V	1.8	2.4	2.9	3.6	4.2	4.9
16 V	1.5	2.0	2.5	3.0	3.5	4.0
18 V	1.3	1.7	2.1	2.5	3.0	3.4
20 V	1.2	1.5	1.8	2.2.	2.6	2.9
22 V	1.0	1.3	1.6	2.0	2.3	2.6
24 V	0.9	1.2	1.5	1.8	2.0	2.3

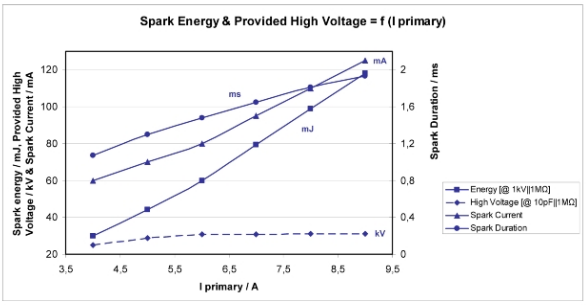
Measured values are without loom resistance. Loom resistance must be less than the primary resistance. The needed dwell time is to be verified through current measurement



Dwell time

Spark energy and provided high voltage

I prim.	Spark energy	-duration	-current	Hi voltage
4 A	29.8 mJ	1.07 ms	60 mA	24.9 kV
5 A	44.2 mJ	1.3 ms	70 mA	28.6 kV
6 A	60 mJ	1.48 ms	80 mA	30.7 kV
7 A	79.5 mJ	1.65 ms	95 mA	30.9 kV
8 A	98.9 mJ	1.81 ms	110 mA	31 kV
9 A	118 mJ	1.93 ms	125 mA	31 kV



Spark energy

Installation Notes

During mounting of the spark plug please pay attention that full clamping and proper contacts are made to ensure safe connection between coil and spark plug.

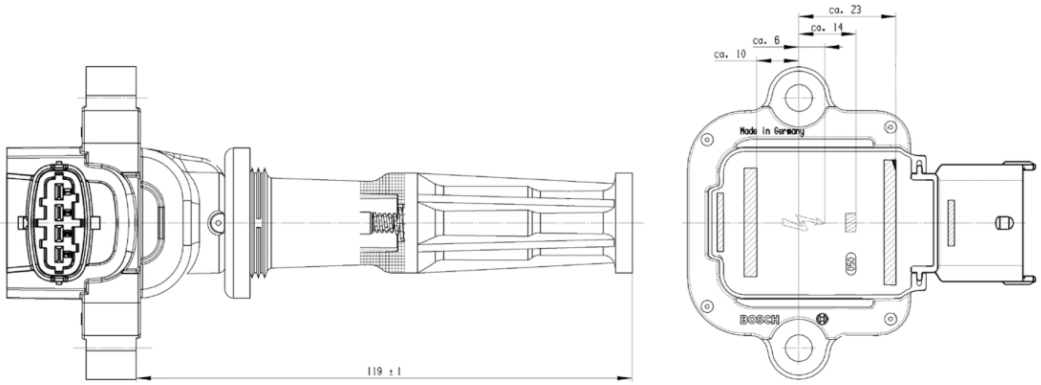
The P100-T has an integrated transistor and requires an ECU with internal ignition drivers with 10 to 20 mA current output.

For technical reasons the values of the coils may vary.

Please regard the specified limit values.

Please find further application hints in the offer drawing at our homepage.

Dimensions



Ordering Information

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T6788637451 | Cur: en-US, V33, 23 Aug 2011