

/ Perfect Welding / Solar Energy / Perfect Charging



SHIFTING THE LIMITS



“IT’S NOT A QUESTION OF SIZE”

TRANSPOCKET 150 / 180

PROFESSIONAL TOOLS FOR PROFESSIONAL USERS

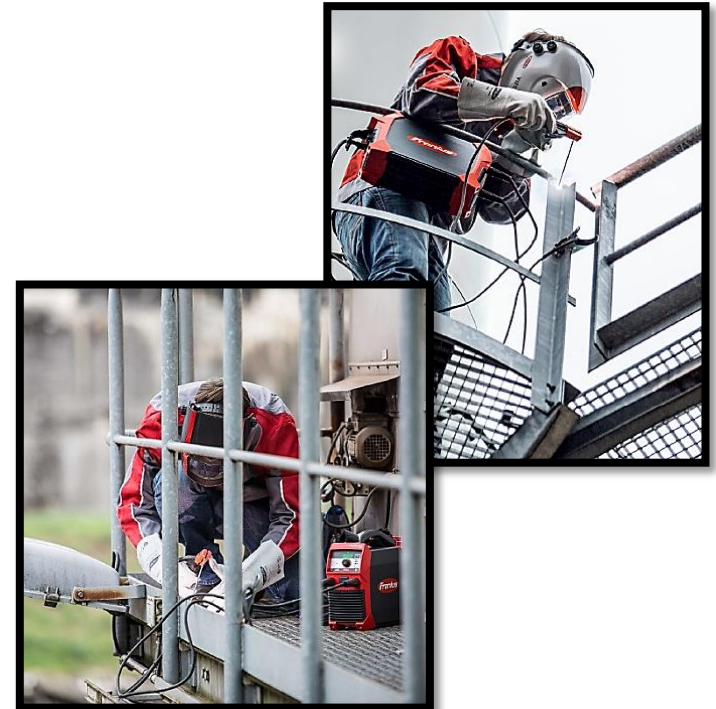
PROFESSIONAL TOOL FOR PROFESSIONAL USERS

/ Designed for manual applications

- / Workshops
- / Maintenance
- / Construction sites
- / Repair
- / Installation

/ Wider range of application areas thanks to

- / TIG variant
- / Multivoltage variant (TP 180)
- / RC variant (Remote Control)
- / VRD option
- / etc.



**Compact size and easy
handling combined with
maximum robustness and
reliability**

THE GOAL WHILE DEVELOPING THE NEW TP 150 / 180 WAS SIMPLE: *“TO MAKE THE GOOD BETTER.”*

OPERATION

- / Intuitive setting of all required welding parameters
- / Easy-to-read, recessed digital display

IGNITION

- / Precise ignition of all electrodes
- / Reduced electrode sticking

HOUSING

- / Robust
- / Compact
- / Stable
- / Ergonomic
- / Durable

WELDING PERFORMANCE

- / Extremely stable arc
- / No arc breaks
- / Minimal spattering

ENERGY CONSUMPTION

- / Energy-saving thanks to automatic switching off of the power source
- / Reduced power consumption
- / Minimal losses when using long mains leads

ADAPTABILITY

- / Easy changing of the mains cable/plug according to the place of use
- / Flexibility with regard to the available mains supply thanks to adjustable fuse protection

WELDING THAT IS MORE RELIABLE AND EFFICIENT THAN EVER BEFORE THANKS TO FIRST-CLASS TECHNOLOGY

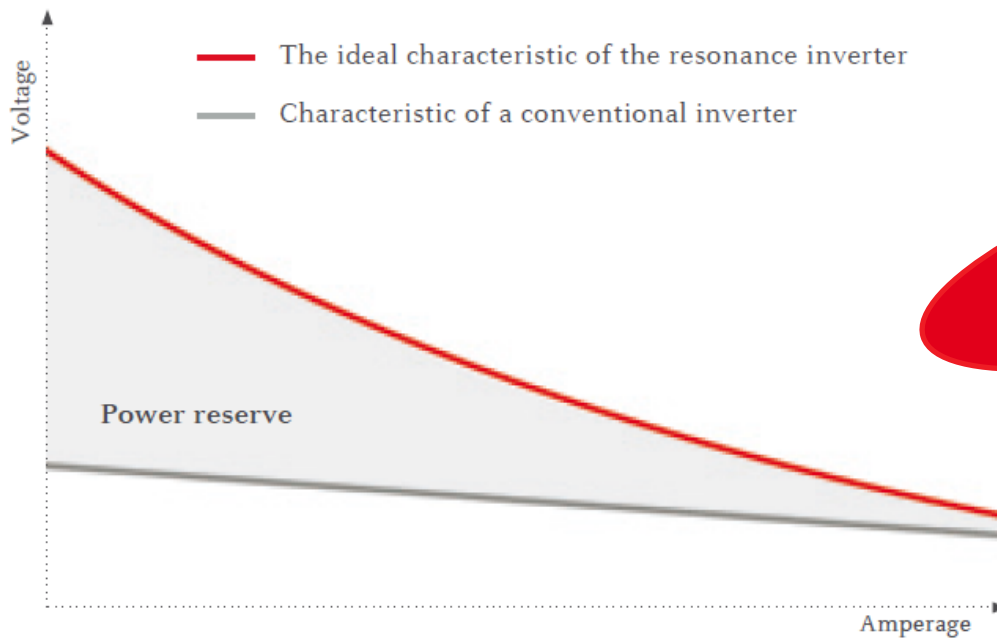
- / The **digital resonance inverter** ensures an **extremely stable arc and minimal spattering**.
- / **PFC technology** (Power Factor Correction) **saves energy**, enables the use of mains leads up to approx. 100 m and guarantees a more flexible input voltage range.
- / The **optimized ignition behavior** ensures **precise ignition and reduced electrode sticking**.



THE PERFECT WELDING RESULT



Thanks to the intelligent use of available power reserves, the power source behaviour adapts to the welding task



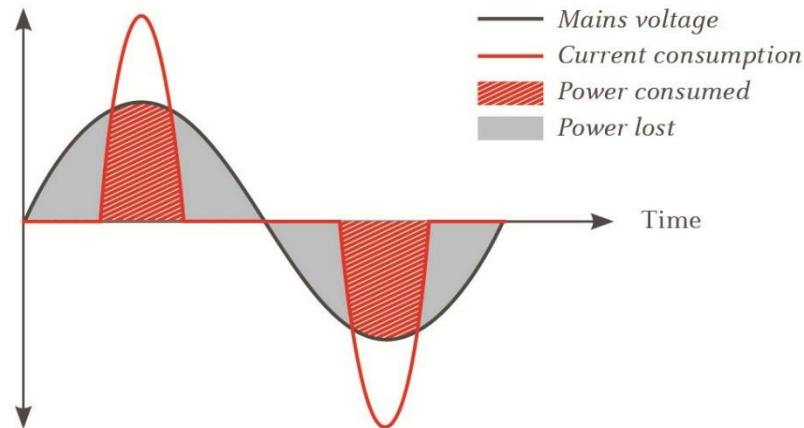
**Extremely stable arc
and minimal spattering**

With the **DIGITAL** resonant intelligence a faster control than on the well known resonant-inverter is possible.

MAXIMUM ENERGY EFFICIENCY

The adaptation of the current consumption to the mains voltage reduces losses (disturbances or reactive power) and improves the power factor.

VOLTAGE AND CURRENT CURVE WITHOUT PFC

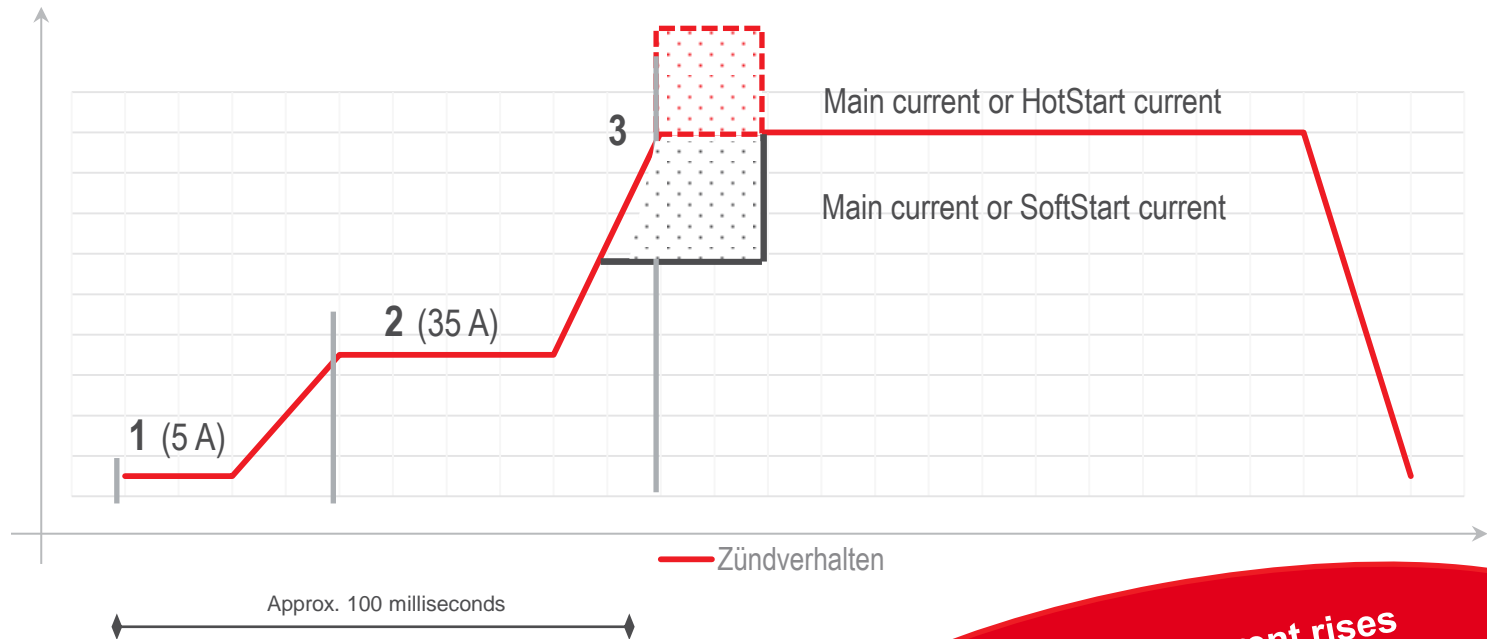


VOLTAGE AND CURRENT CURVE WITH PFC



Energy-saving, greater operating range due to the use of long mains leads with less losses, improved generator compatibility, higher welding current possible without tripping the circuit breaker

PRECISE IGNITION AND REDUCED ELECTRODE STICKING THANKS TO OPTIMISED IGNITION BEHAVIOUR



1 = Touch current

2 = Lift-off current

3 = Main current or HotStart/SoftStart current

The ignition current rises gradually, resulting in the precise ignition of all electrodes and reduced electrode sticking

MAXIMUM MOBILITY

TP 150



TP 180



/ Compact dimensions

/ TP 150 dimensions (l x w x h) – 365 x 130 x 285 mm

/ TP 180 dimensions (l x w x h) – 435 x 160 x 310 mm

/ Lightweight housing

/ TP 150 – 6.3 kg

/ TP 180 – 8.7 kg

/ New design concept for **easy and ergonomic handling**

/ Welding power-leads can be wound up on the device

/ Ergonomic handle

/ Shoulder strap

MAXIMUM RELIABILITY AND ROBUSTNESS EVEN UNDER HARSH OPERATING CONDITIONS

PROTECTED CONNECTION AND OPERATING AREA

ROBUST PLASTIC HOUSING CONSTRUCTION PROTECTS AGAINST ANY ENVIRONMENTAL INFLUENCES

IMPROVED TILTING STABILITY

- / Greater ground clearance with optimum protection of the electronics
- / Protection of the edges and prevention of wear

LONGER SERVICE LIFE DUE TO ROBUST INNER LIFE

- / All components are assigned a specific place of a function carrier
- / Protection of components from damage
- / Quick replacement of PC boards and components
- / Improved, targeted air flow inside the device
- / Reduced contamination of the PC boards

OPTIMISED FIN ELEMENTS

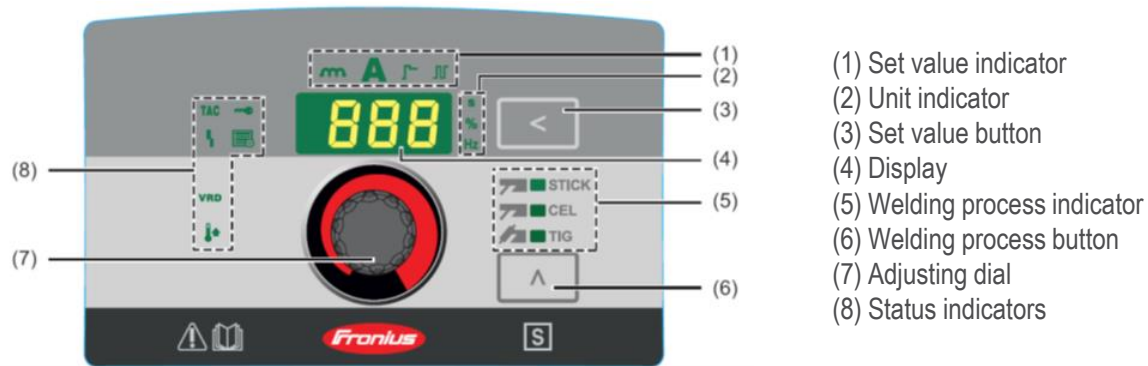
- / Better protection against moisture
- / Optimised cooling for a longer duty cycle
- / Integrated dust filter for a better protection of the electronics
- / IP23-Protection



CONTROL PANEL INCLINED TOWARDS THE USER WITH A SIMPLE SEVEN-SEGMENT DISPLAY PROVIDES COUNTLESS OPTIONS



- / Protected area with maximum user-friendliness
- / Simple layout
- / Intuitive operation
- / Extremely easy to read
- / Setup menu in the background with numerous settings, e.g. SoftStart/HotStart, anti-stick, dynamic, time shutdown, 2-step/4-step mode etc.



ADDITIONAL SETTINGS

tSd

Energy-saving thanks to
automatic switching off of the
power source

“tSd” time shutdown parameter

- / Automatic switch-off
 - / The ECO parameter automatically switches the machine off after a specified time
 - / Automatic energy savings for customers
 - / Switches off the power module - no open circuit voltage is emitted during this time

FUS

Flexibility with regard to the
available mains supply

“FUS” parameter

- / Fuse protection
 - / Adjusts the fuse protection for the machine
 - / Host of customer benefits: fuse protection can be adapted to differing mains fuse protections at the deployment site
 - / Can be adjusted according to machine or mains variant

WE'VE THOUGHT OF EVERYTHING...

GENERATOR-COMPATIBLE

Incl. overvoltage protection of up to 400 V without damage

USB UPDATES

Protected inside the housing – allows special processes to be updated and system information to be read easily



SUITABLE FOR CEL-ELECTRODES

Specially selectable operating mode for Cel electrodes for perfect welding results

EASY CHANGING OF MAINS CABLE / PLUG ON MV VARIANTS

Easy and quick changing of the mains cable/plug according to the place of use due to a water-tight, lockable plug connection on the back side of the machine (Fronius Power Plug)



OPTIONAL TMC CONNECTION SOCKET

For TIG welding torches with U/D function and remote control



TP 180 MV VARIANT

120-230 V -20% / + 15%

COMPLIANCE WITH ALL RELEVANT STANDARDS

CE, UL/CSA, CCC etc.

POWER SOURCE VARIANTS

TP 150

TP 180

Standard

RC (Remote Control)

- / TMC socket for use with remote control

TIG

- / Integrated gas solenoid valve, TMC socket
- / TIG pulsing, TAC, Up / Down function, 2-step / 4-step mode
- / Touchdown ignition
- / TP 180: 220 A



MV (Multi Voltage)

- / Increased mains voltage range 120-230V -20/+15%
- / **Fronius Power Plug**: water-tight, lockable plug connection for mains cable / plug variants
- / UL-/CSA certificate

TIG MV (Multi Voltage)

TP 150 – TECHNICAL HIGHLIGHTS

Power consumption

20% less*
(5.52 kVA)

TOLERANCE

- 20% / +15%
@ max. output

Duty cycle

35% (150A)

EFFICIENCY

88% (90A)

Open circuit
voltage

96 V

Degree of protection

IP 23

TP150 - TECHNICAL DATA

TP 150	
Mains voltage - 20% / +15%	1x 230 V
Cos phi	0.99
Efficiency	88%
Primary power consumption	max. 5.52 kVA
Welding current range (230V)	10 – 150 A
Welding current range TIG (230V)	10 – 150 A
Welding current @ (230V) MMA/TIG	
10 min / 40 °C 35% d.c.	150 A
10 min / 40 °C 100% d.c.	90 A
Open circuit voltage	96 V
Working voltage	20.4 – 26.0 V
Working voltage, TIG	10.4 – 16.0 V
Degree of protection	IP 23
Dimensions L/W/H	365 / 130 / 285 mm
Weight	6.3 kg



TP 180 – TECHNICAL HIGHLIGHTS

Power consumption

30% less*
(5.75 kVA)

TOLERANCE

- 20% / +15%
@ max. output

Duty cycle

40% (180A)

EFFICIENCY

89% (120A)

Open circuit
voltage

101 V

Multi Voltage

120 – 230 V

TP 180 (MV) - TECHNICAL DATA

	TP 180	TP 180 MV
Mains voltage - 20% / +15%	1x 230 V	1x 230
Mains voltage MV -20% / +15%	-	1x 120
Cos phi	0.99	0.99
Efficiency	89%	89%
Primary power consumption	max. 5.75 kVA	2.28 kVA – max. 5.75 kVA
Welding current range (230V)	10 – 180 A	10 – 180 A
Welding current range TIG (230V)	10 – 220 A	10 – 220 A
Welding current @ (230V)		
10 min / 40 °C 40% d.c.	180 A	180 A
10 min / 40 °C 100% d.c.	120 A	120 A
Welding current @ (120V / 20A)		
10 min / 40 °C 40% d.c.	-	120 A
10 min / 40 °C 100% d.c.	-	90 A
Open circuit voltage	101 V	101 V
Working voltage	20.4 – 27.2 V	20.4 – 27.2 V
Working voltage, TIG	10.4 – 18.8 V	10.4 – 18.8 V
Degree of protection	IP 23	IP 23
Dimensions L/W/H	435 / 160 / 310 mm	435 / 160 / 310 mm
Weight	8.9 kg	8.9 kg



TIG WELDING TORCHES

/ Welding torches

ITEM NUMBER	DESIGNATION
4,035,978	TTG 1600A FS/TL/4m
4,035,979	TTG 1600A FS/UD/4m TMC
4,035,862,635	TTG 1600A S/B25/4m system
4,035,989	TTG 2200A F/UD/4m TMC
4,001,549	Adapter Bayonet 25mm ² /50mm ² (for TP150)

Abbreviations:

- / FS = **F**ronius **S**mall (bayonet with internal gas)
- / TL = **T**igger **L**ess
- / UD = **U**p-/**D**own
- / TMC = **T**ig **M**ulti **C**onnector (robust socket for the availability of all functions)
- / S = **G**as-valve torch
- / B25 = **B**ayonet **25** mm² with external gas



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SHIFTING THE LIMITS

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