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Tester with manual probes

What is MPT tester?

MPT – „Multi Purpose Tester“

- universal, open and customer oriented tester platform

- set of devices controlled by
- *funTEST* SW in order to meet the product test specification

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WHY funTEST?

- Easy to use
- Full control
- Adaptation to needs
- Many extensions

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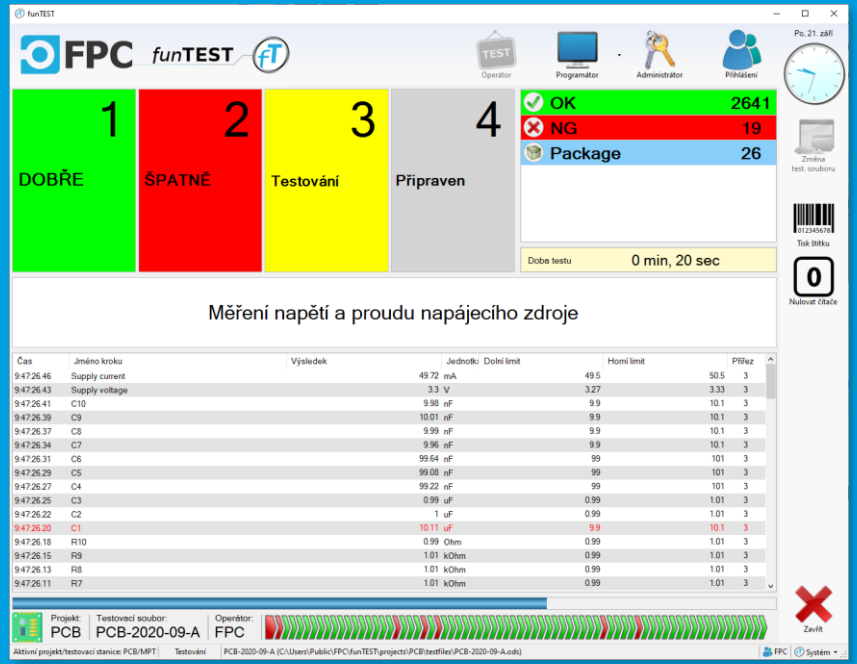
Optimal Characteristics

- Clear operator-interface
- Comfortable programming interface
- Unlimited process sequence control
- Open interface for HW device
- Customer solution in the form of plugins



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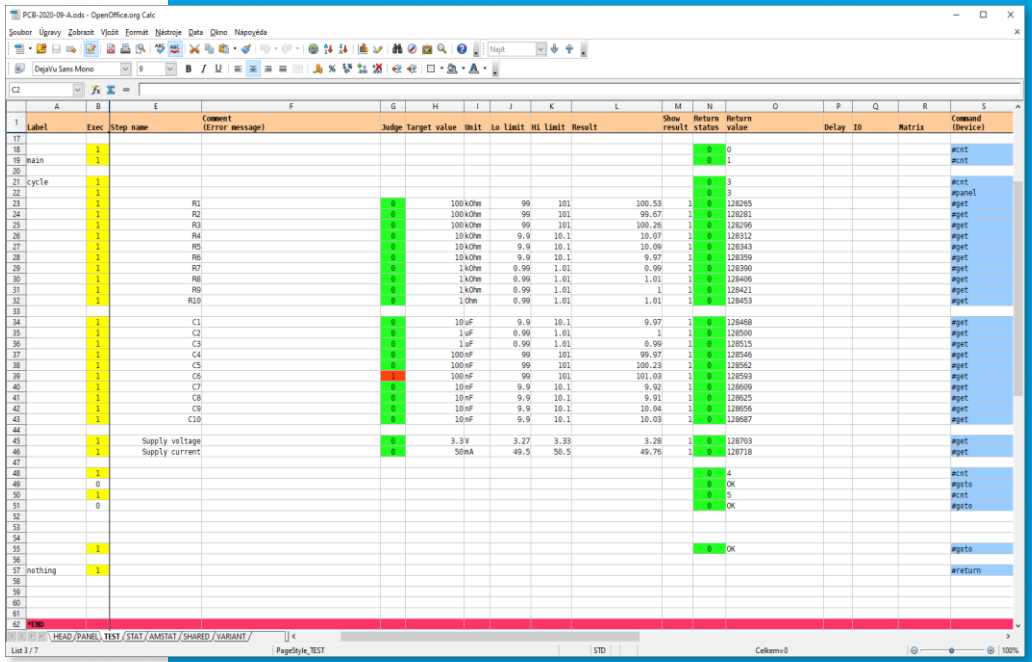
Easy programming

- Based on spreadsheets
- Sequences
- Easy editation
- Canned commands



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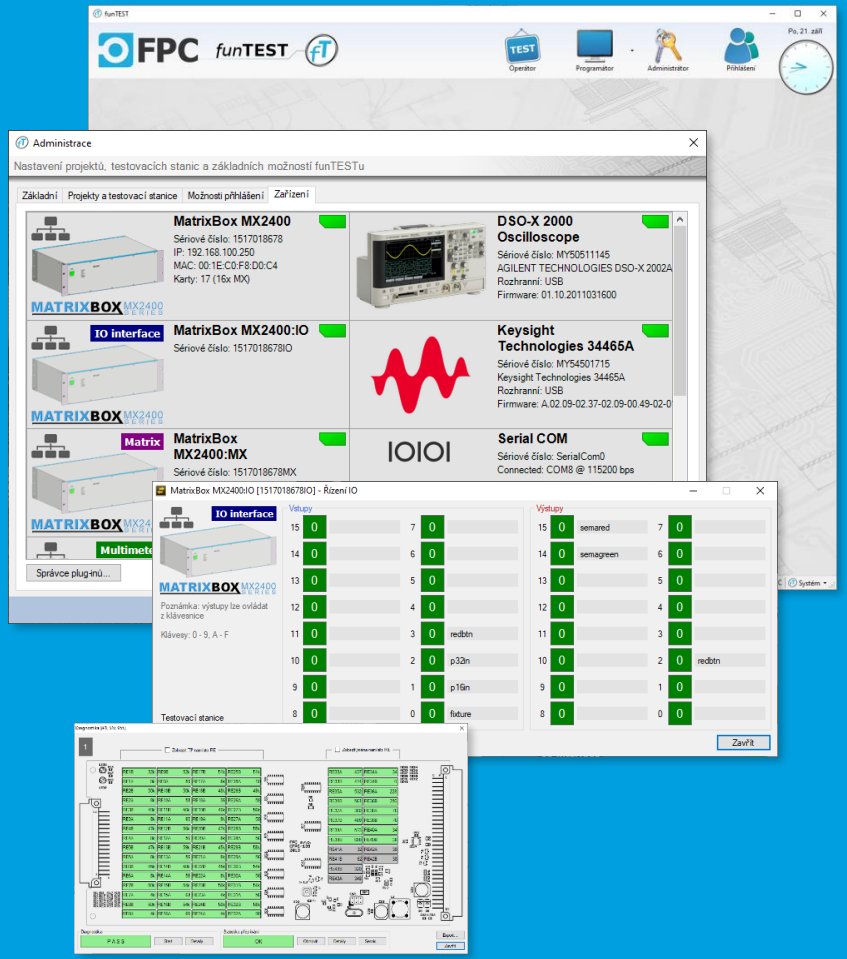
Wide hardware support

- Equipped basic package
- (I/O, DMM, converters, cameras, ...)
- Optional plugins
- Tuning and graphical control



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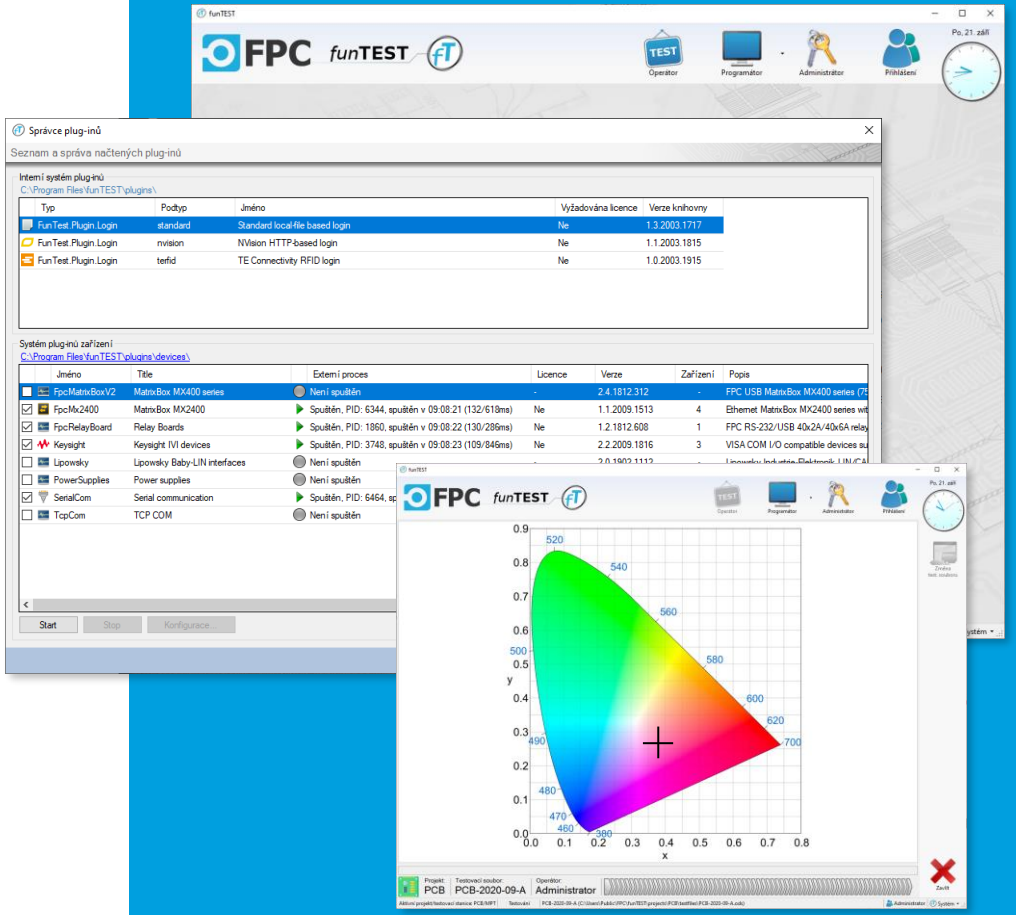
Extendability

- Device integration (API)
- Customer SW options
- Open plugin-interface



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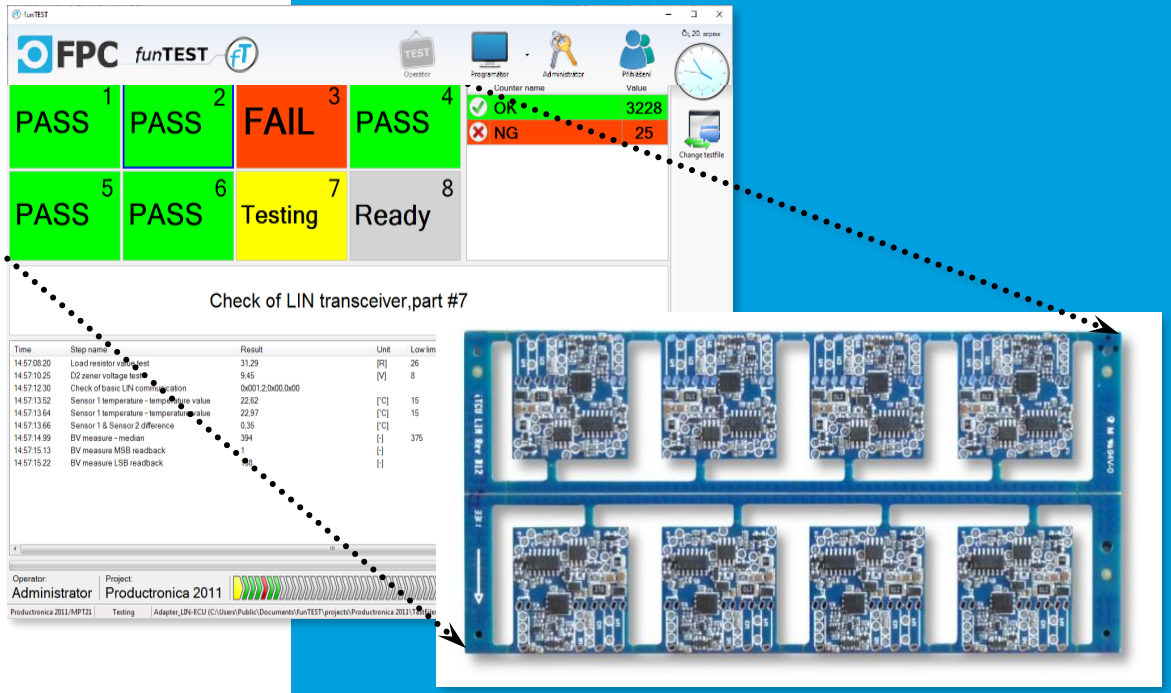
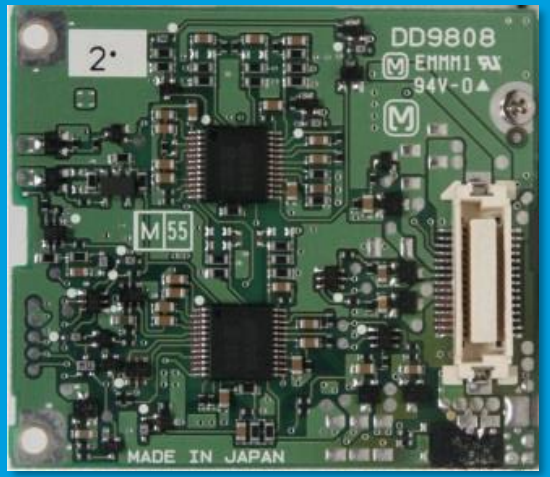
Optional modules

- Panel test
- Multitest
- Batch test
- Dummy test
- Shared config option



What a MPT tester can do?

- PCB and electronic product subassemblies tests
- Automatic programming of circuits
- Final product EOL tests
- Optical tests and controls
- Automatic testing and assembly processes with intermediate control in cooperation with PLC
- High-voltage tests



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What can a MPT tester look like?

- simplest option – operator's table with the devices and PC control
- complex option – 19" rack with interface for quick adapter replacement and contacting
- Customization, including possible connection to third-party devices, typically a connection to an In-Line handler

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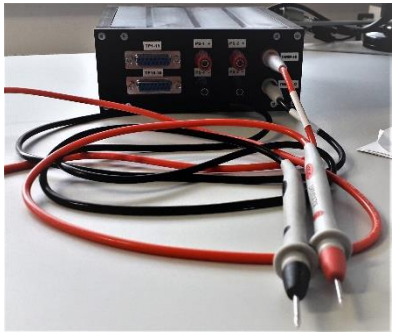
How to test small series?

Frequent objection: investment to bed-of-nails fixture is not economical for small series

FPC solution:
MPT with manual probes



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MPT with manual probes – test without the adapter

MPT with funTEST
+ modul with conectors and manual probes + foot pedal

Program block in funTEST
easy na intuitive steps

Spustit	Jméno procedur	Jméno měření	Instrukce pro obsluhu	Ilustrační obrázek	Minimum	Maximum	Jednotka	Násobitel	Nastavení přístroje	Retest	Uložit
1	infoDialog		Připojte testovaný výrobek dle obrázku	Connect1.jpg							
1	measDmm	Odpor R1	Přiložte sondy na tyto body a potvrďte	R1.jpg	1,2	1,5	kOhm	1,00E-03	RES 10000	1	1
1	measDmm	Odpor R2	Přiložte sondy na tyto body a potvrďte	R2.jpg	100	120	Ohm	1,00E+00	RES 1000	1	1
1	measDmm	Kapacita C1	Přiložte sondy na tyto body a potvrďte	C1.jpg	10	15	uF	1,00E+06	CAP 1E-4	1	1
1	measDmm	Kapacita C2	Přiložte sondy na tyto body a potvrďte	C2.jpg	100	150	nF	1,00E+09	CAP 1E-6	1	1
1	measDmm	Napeti V1	Přiložte sondy na tyto body a potvrďte	V1.jpg	3,2	3,3	V	1,00E+00	VOLT:DC 10	1	1
1	measDmm	Napeti V2	Přiložte sondy na tyto body a potvrďte	V2.jpg	1,2	1,3	V	1,00E+00	VOLT:DC 10	1	1
1	powerOn								VOLTAGE 3.6		
1	measPsuI	Napajeci proud			10	25	mA	1,00E+03		0	1
1	infoDialog		Připojte testovaný výrobek k programát	Connect2.jpg							
1	flashMcu	Programovani								1	1
1	powerOff										

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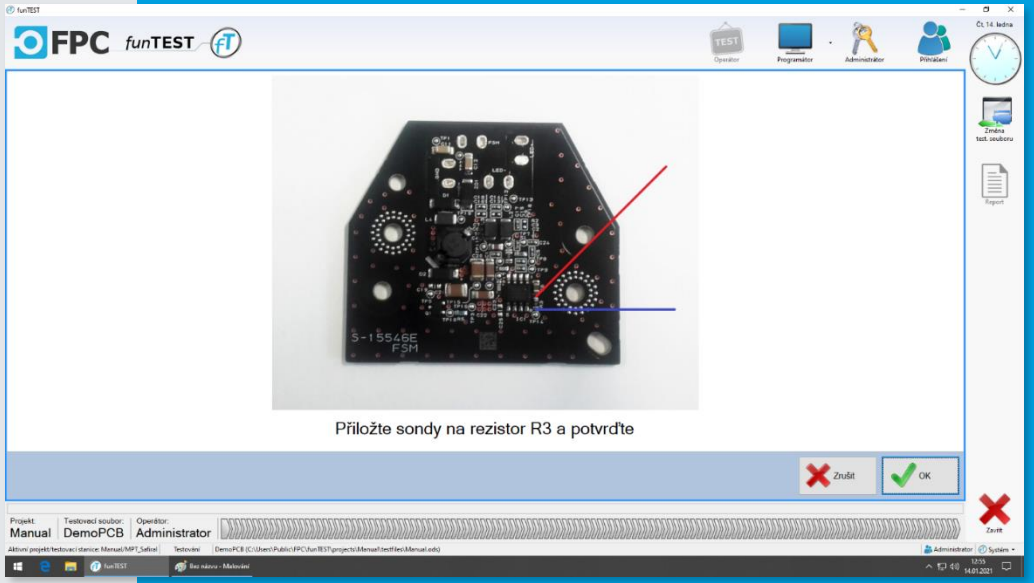
MPT with manual probes – test without the adapter

- „electronic guide“
- Pictures (photos) with positions for placing probes
- Text instructions
- Step confirmation with foot pedal



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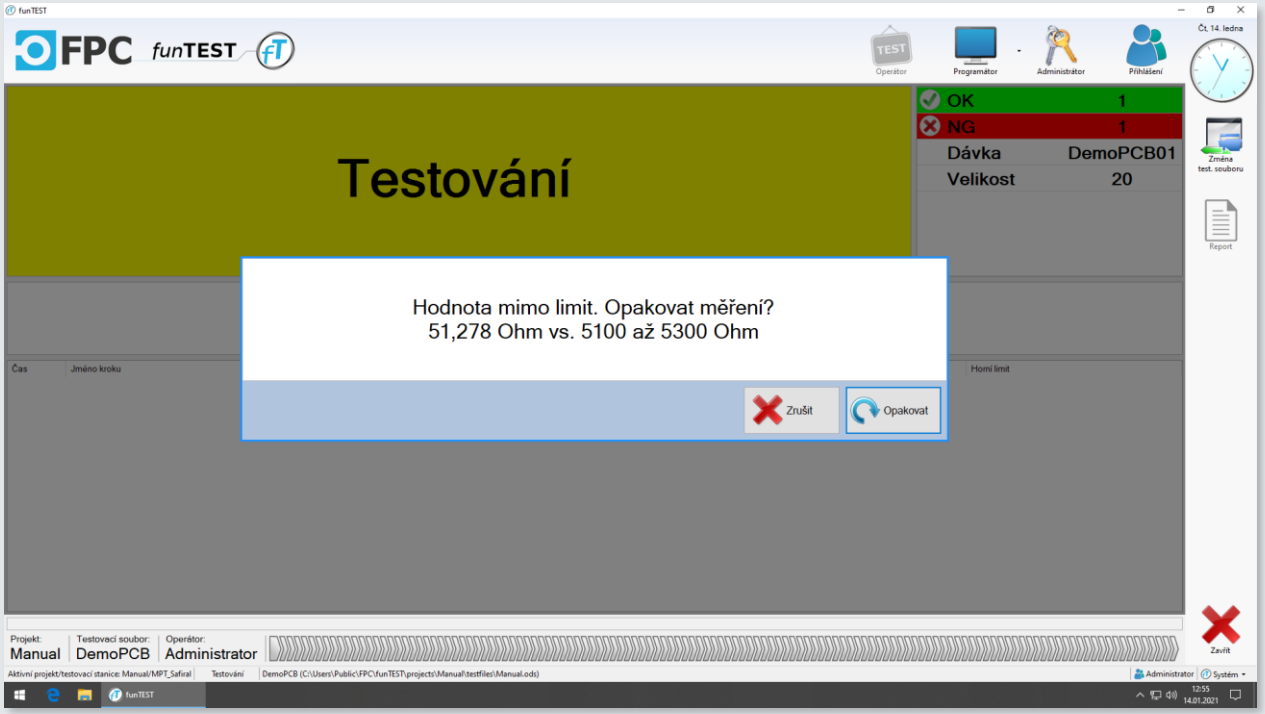
MPT with manual probes – test without the adapter



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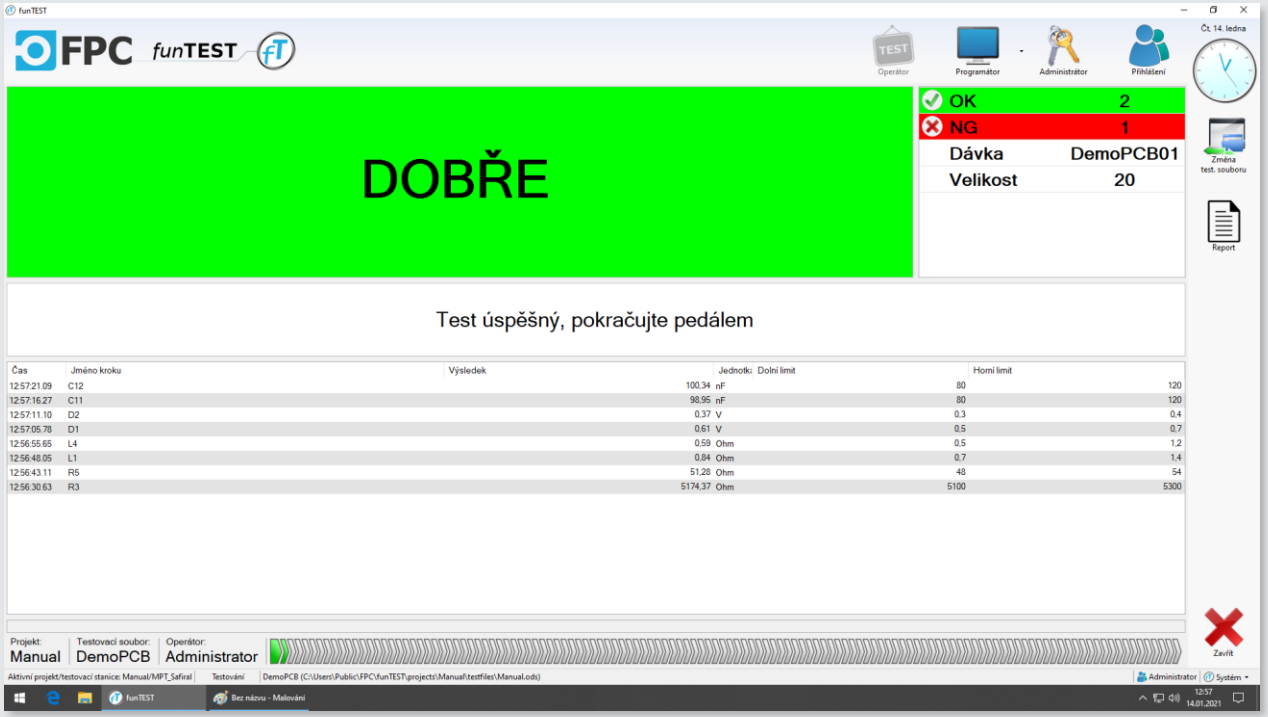
MPT with manual probes – test without the adapter



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MPT with manual probes – test without the adapter

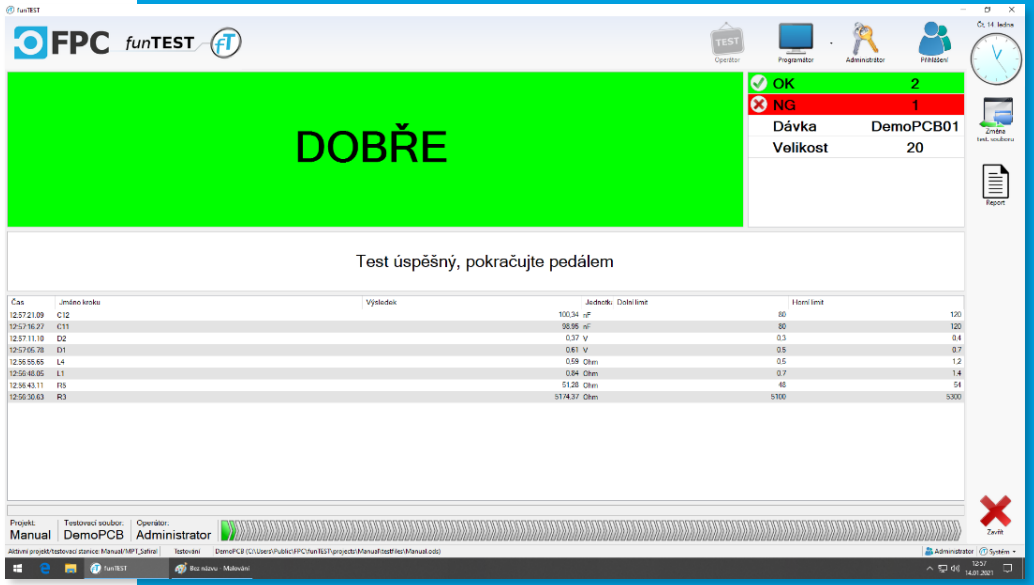
Test report
Created: 14.01.2021 13:04:05 by Administrator
Product: DemoPCB
Batch: DemoPCB01 (4 pcs)

Serial number: 2

Test step	Measured value	Unit	Result
R3	5192,8	Ohm	Pass
R5	51,25	Ohm	Pass
L1	0,83	Ohm	Pass
L4	0,59	Ohm	Pass
D1	0,61	V	Pass
D2	0,37	V	Pass
C11	98,94	nF	Pass
C12	98,94	nF	Pass

MPT with manual probes – test without the adapter

- MPT with funTEST
- automation, visualization
- Reduction of operator qualification requirements
- Recording of test results
- report for the customer
- FPC service
- Easy addition of an adapter when production increases



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MPT with manual probes – test without the adapter

- FPC service
- Tester proposal after the consultation with the customer – parameters according to needs
- Installation and activation of the tester
- Installation at customer‘s place, connection to the database
- Sample test programs
- *funTEST* training

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Who already uses MPT testers from FPC?

- **100** satisfied customers from all over the world
- **400** installations from simple to complex testers, including automated lines and carousels
  automatizovaných linek a karuselů
- companies from EMS, Automotive, Industry, Aerospace, Wire Harness fields of application

Test equipment purchased from FPC s.r.o.

Contact persont: Luboš Bejček / e-mail:
lubos.bejcek@fpc.cz

FPC
Test Equipment for Electronics and Wiring

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We are looking forward to our cooperation.

SAFIRAL s.r.o.

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