

# CHALLENGER Lite



Remote PC terminals & HMIs  
for industrial productions areas



# CHALLENGER Lite

"The PC terminal for industrial production areas"

CHALLENGER 15 Lite

CHALLENGER 18 Lite



Pharmaceuticals



Chemistry



Food & Health



Automotive



Life Science



Machines



Incineration plants



other

The CHALLENGER Lite PC terminals are designed for a wide range of production areas.

The mouse/VGA/keyboard ports of a PC are connected to the appropriate inputs of our compact TCV2 Lite transmission card to ensure optimal image transfer. This transfers the data up to a maximum of 150 m to the CHALLENGER Lite on location (see Operational Principle). Conventional connecting lines between the PC and the transmission card, and from the twisted pair CAT 7 cable to the terminal, ensure the simplest and lowest-cost installation possible.

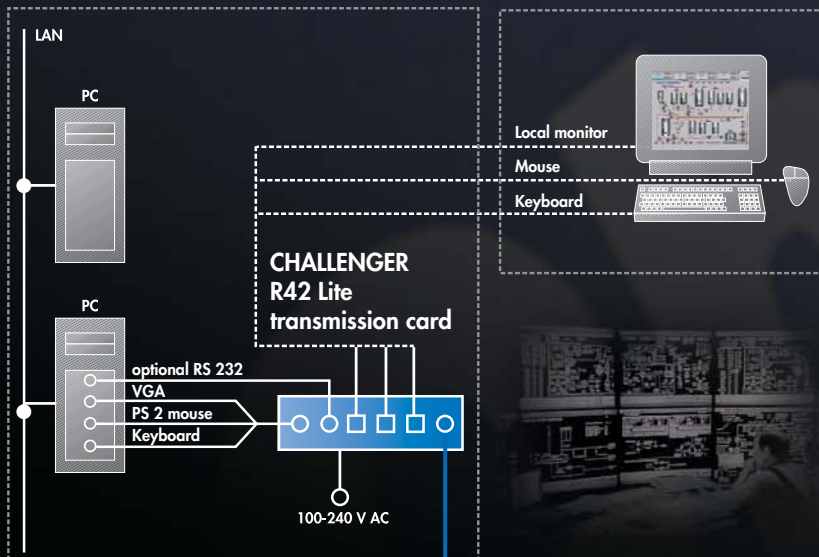
All the operation and visualization components such as the touch screen, card reader, fingerprint sensor, joystick for this have been designed as modular elements (protection class: IP 66 / Nema 4x) suitable for industrial use and can be integrated in a stainless steel enclosure without any problems.

## OPERATIONAL PRINCIPLE

Switchroom

Control room

Challenger Lite

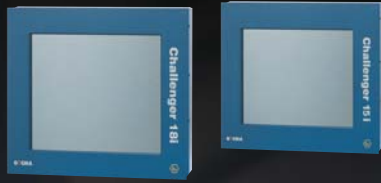


Data transfer via twisted pair up to 150m



# MODULAR COMPONENTS

## VISUALIZATION



### TFT Display

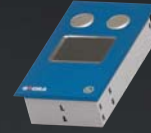
- Panel mount design
- Protection class IP 66 / Nema 4x
- 15" screen diagonal (up to XGA)
- 19" screen diagonal (up to SXGA)
- Capable of displaying more than 16 million colors
- Brightness up to 650 cd/m<sup>2</sup> (more on request)

## OPERATION



### Touch screen

- Panel mount design
- Protection class IP 66 / Nema 4x
- Resistive touch foil
- 5-wire technology (can be operated while wearing gloves or using a pen)
- Connection: RS 232 serial interface



### Touch pad

- Panel mount design
- Protection class IP 66 / Nema 4x
- Special resistive foil
- High-resolution up to 1000 lines/inch
- 2 push-buttons



### Joystick

- Panel mount design
- Protection class IP 66 / Nema 4x
- High-precision mouse guidance
- Wearless up to 15 million actuations
- Extremely low-maintenance
- 2 push-buttons



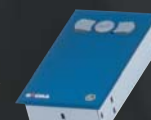
### Trackball

- Panel mount design
- Protection class IP 65 / Nema 4x
- 55 mm ball
- 2 push-buttons



### Keyboard

- Panel mount design
- Protection class IP 66 / Nema 4x
- 105 keys, IBM-compatible
- Standard layouts: German, English, French (further languages and special layouts on request)
- Resistant against most solvents



### Mouse

- Panel mount design
- Protection class IP 66 / Nema 4x
- 4-step pressure-sensitive mouse guidance
- 2 push-buttons

## IDENTIFICATION



"CFR 21 part 11"

### Card Reader

- Panel mount design
- Protection class IP 66 / Nema 4x
- Non-contact identification
- Mifare protocol as standard (others on request)
- Suitable for the majority of company IDs
- Connection: RS 232 serial interface



"CFR 21 part 11"

### Fingerprint Sensor

- Panel mount design
- Protection class IP 66 / Nema 4x
- Contact identification < 500 dpi
- Via C-MOS sensor
- Connection: RS 232 serial interface

## ENCLOSURE



FHP



## OPTIONS

- RS 232 interface
- Audio interface
- Universal video interface UVI
- Barcode scanner interface
- Adjustable image optimization via keyboard
- Emergency stop button

Configure your  
**CHALLENGER Lite** according  
to the features of your  
production plant

[www.GECMA.com](http://www.GECMA.com)

# TECHNICAL DATA

## Video

Resolution: max. 1,600 x 1,280 pixels  
Transfer range: 10 to 150 meters

## Keyboard / mouse

Interface/transfer: PS/2, Intellimouse

## RS 232 (optional)

- Transfer rate: 38,400 bit/s  
- Transferable signals: TxD, RxD, RTS, CTS, DTR, DSR

## Audio (optional)

Resolution: 18 bit digital  
- Sampling rate: 48 kHz  
- Bandwidth: 22 kHz  
- Microphone preamplification: 20 dB

## Enclosure (maximum values)

Dimensions: W x H x D in mm / weight in kg:  
Rack 42 Lite (transmission card): 210 x 45 x 225 mm / approx. 1.2 kg  
Rack 84 Lite (transmission card): 210 x 45 x 482 mm / approx. 1.3 kg

Transfer cable: CAT 7 recommended, CAT 5 and CAT 6 also possible

Power supply: 100 - 240 VAC 50/60Hz  
Rack 42 Lite / 84 Lite max. 20W (fuse 0.5A T)  
CHALLENGER Lite max. 70W (fuse 2A T)

Temperature range: - 10° C to + 55° C (extendable to - 30° C)  
Humidity: 10 % to 90 % relative humidity, not condensing

Operator interlock on local or remote side through integrated software.

## Do you require additional information?



Configurator



Products



News



Support

Technical drawings



Calls returned within 24 hours



Offer made within 48 hours



Delivery within the space of few weeks



Configure your Terminal under [www.GECMA.com](http://www.GECMA.com)

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