

APPLICATIONS

- > Piezo drive up to 2 channels
- > High accuracy positioning
- > High frequency application

KEY FEATURES

- > 360mA continuous output
- > 1.1A optional peak output current
- > [-20V;150V] output voltage range
- > Low noise SNR 85dB and THD 0.1%
- > Push pull configuration in option
- > Fully protected piezo amplifier
- > Building block for multi channel configuration

RELATED PRODUCT

- > Piezo actuators and stages
- > CTEC Powered benchtop case
- > CTEC Powered 19" subrack
- > UC45 / UC55 Controllers
- > SG75 / ECS75 sensors conditionners



NON CONTRACTUAL PICTURE

SPECIFICATIONS

| PARAMETER | TYPICAL VALUE | UNIT |
|---|-----------------------------------|------|
| > General | | |
| Function | Driver for piezoelectric actuator | |
| Number of channels | 1 ... 2 | |
| > Input | | |
| Control Input voltage | -1 ... +7.5 | V |
| Control Input impedance | 10 | kΩ |
| > Output | | |
| Output voltage | -20 ... +150 | V |
| Continuous peak output current ⁽¹⁾ | ±360 | mA |
| Maximum output load | 400 | μF |
| > Power amplifier | | |
| Peak output power | 165 | W |
| > Gain | | |
| Gain | 20 | V/V |
| Gain error | ±1 | % |
| Gain linearity error | 0.01 | % |

> Dynamic performance

| | | |
|--|-----------|-----|
| Small signal bandwidth (-3dB) ⁽²⁾ | 30 | kHz |
| Power bandwidth | See chart | Hz |
| THD | 0.1 | % |
| Signal to Noise Ratio ⁽³⁾ | 85 | dB |

> Protections

Overcurrent,
Overtemperature,
Overvoltage

ANNOTATIONS

Guaranteed in labs environment

(1) Electronically limited

(2) Unloaded

(3) Computed as RMS output signal / RMS output Noise floor. [1; 2]Hz

(4) Extended temperature under request

(5) no Dynamic Current Limitation for integrated Push Pull option

MISCELLANEOUS

| PARAMETER | TYPICAL VALUE | UNIT |
|--|-------------------|------|
| Mass | 1 | kg |
| Front face dimension | 10F wide, 3U high | |
| Warm up time | 15 | min |
| Cooling | Forced air | |
| Operating temperature range ⁽⁴⁾ | 0 ... 40 | °C |
| Storage temperature range | -10 ... 50 | °C |

INTERFACES

| | | |
|-----------------------|-----------------------------|--|
| Order input | BNC type | |
| Piezo actuator Output | LEMO EPL-00-250 | |
| DC Offset | 10-turn screw potentiometer | |
| DC Offset Range | -1 ... +7.5V | |
| Servo ON/OFF | Selector for control loop | |

INCLUDED ACCESSORIES

> Piezo actuator cable

Coax 1.5m - Lemo connector /
2x banana 1mm plug

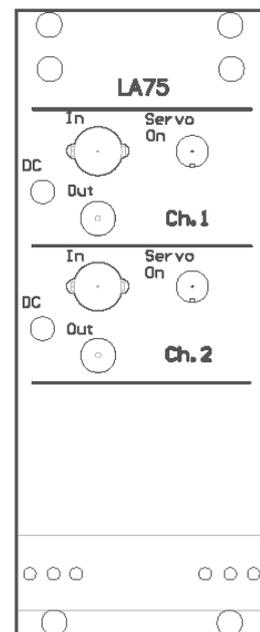
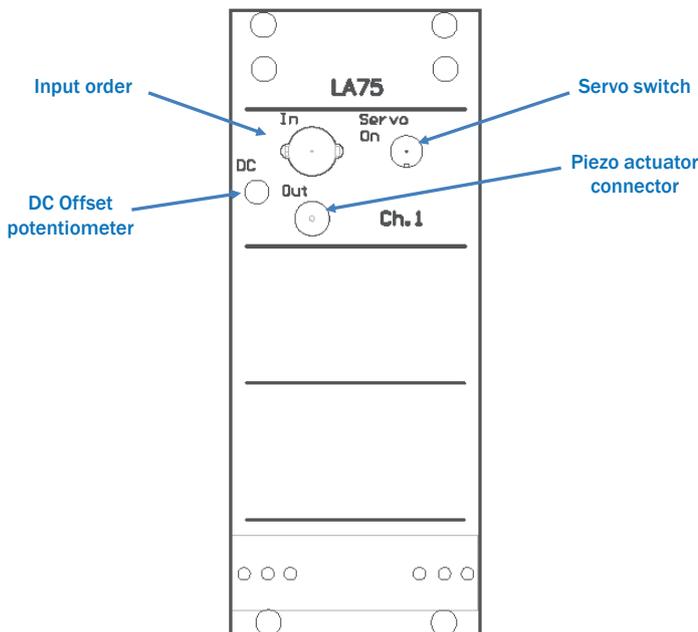
OPTIONS

- > **Push pull**
- > **Capability to drive push-pull piezo mechanisms**

| PARAMETER | TYPICAL VALUE | UNIT |
|---|---------------|------|
| Output DC voltage | 130 | V |
| DC error | ±0.25 | V |
| Average output current | ±360 | mA |
| Continuous peak output current ⁽⁵⁾ | ±360 | mA |
| Load regulation | 0.1 | % |

- > **Output connector** LEMO EPG-00-303
- > **UC55/UC65** Controller for position loop
See specific datasheet
- > **Piezo cable** Specific length on request
Please contact CTEC for more detail
- > **T LEMO** Able to connect 2 CTEC actuators in parallel
Please contact CTEC for more detail
- > **LEMO -BNC adapter** Converts LEMO to BNC connector

DRAWINGS



TYPICAL PERFORMANCE CHARACTERISTICS

