



REAL GEAR FOR REAL GAMERS

DC-DC



COUGAR LX
POWER SUPPLY UNIT

ULTRA-COMPACT FULLY MODULAR POWER SUPPLY



COUGAR World



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Introduction

Dear customer:

Thank you for choosing a COUGAR® power supply unit. Before the installation please read the manual below carefully. If you have any questions, please contact our customer service at <http://cougargaming.com/customersupport/>

Warnings and safety notes

The COUGAR® power supply units (PSUs) are built-in devices for computers, which may only be used in metal cases with a sufficient EMI shielding of at least 15 dB. The PSUs are only intended for home or office usage. For the installation in a PC case please use screws of the type 6#-32*6L only, which are provided in the package.

The PSU is protection class 1. The protective grounding conductor is connected directly to the metal case of the PSU. Make sure that the grounding conductor is fully connected to the system grounding (the PC case).

Never open the PSU cover. There is potential danger of life due to high voltage inside. The PSU should only be opened by an authorized technician. The manufacture warranty will be void, if the PSU is opened by an unauthorized person.

Do not work on the PSU or the PC as long as the main voltage is still connected. Switch the I/O button to position "0" and disconnect the power plug from the power network.

Protect the PSU against moisture.

The PSU is suitable for operation at 100-240V~/50-60 Hz and thus universally usable. The ambient temperature should not exceed 50°. Please ensure that there is sufficient ventilation of the entire system.

The leakage current must not exceed 3.5 mA.

Make sure during the installation of the PSU that the ventilation slots are not covered. Do not clog the ventilation slots of the PSU. Keep your PC away from direct heat sources such as radiators.

When using an extension cord and/or multiple sockets pay attention to the maximum through-connection ability in order to avoid short-circuits.

During the operation of the PSU pay attention to the maximum loads. The single loads and the total loads must not exceed to cross the values shown in output power table. Avoid the use of adapters, such as 4Pin Molex to 6+2Pin PCI-Express.

Technical details and special features

• Operating conditions

Working temperature: +10°C ~ +40°C

Storage temperature: -40°C~+70°C

Operating humidity (without condensation water): 20%~85% relative humidity

Storage humidity (without condensation water): 5%~95% relative humidity

• Output power

| Model Name | AC input | DC output | | | | | |
|---------------------|-----------------------------|-----------|-----|------|------|-------|-------|
| | | +3.3V | +5V | +12V | -12V | +5Vsb | Total |
| LX500 CGR BX-500 | 100-240Vac 50-60Hz 8-4A | 24A | 20A | 40A | 0.3A | 3A | 500W |
| | | 120W | | 480W | | | |
| LX600 CGR BX-600 | 100-240Vac 50-60Hz 10-5A | 24A | 20A | 49A | 0.3A | 3A | 600W |
| | | 130W | | 588W | | | |

• Connectors

| Connector | Main Connector | CPU Connector | Peripheral Connector | S-ATA Connector | PCI-E Connector |
|-----------|----------------|---------------|----------------------|-----------------|-----------------|
| Pin | 24(20+4)Pins | 8(4+4)Pins | 4 Pins | 5 Pins | 8(6+2)Pins |
| LX500 | 1 | 1 | 3 | 5 | 2 |
| LX600 | 1 | 1 | 3 | 6 | 4 |

• COMPACT SIZE: FOR ALL PC CASES

Its 140mm length suits most cases

• FULLY MODULAR POWER SUPPLY UNIT

Connect only the cables you need for less clutter and better airflow

• HDB FAN POWERED

Hydro Dynamic Bearing fan: Extended durability and lower noise levels

• FAN CURVE FINE TUNING

Advanced technology for better cooling quality

• IMPRESSIVE OPERATION AT 40°C

Powerful performance at 40°C/104°F ambient temperature

• 80-PLUS BRONZE CERTIFIED

Efficiency up to 88% power conversion for reducing your electricity bill

• COMPLIANT WITH ErP Lot 2013

Energy consumption in standby is <0.5W: Extremely eco-friendly

• SUPPORT FOR MULTI-GPU TECHNOLOGY

Supports PCI Express 3.0 graphic card with 6+2pin PCI-E connector

• ULTRA STABLE VOLTAGE OUTPUTS

DC to DC technology for enhanced voltage stability

• SINGLE +12V DC SOURCE

Massive outputs for high power devices

• STRONG SAFEGUARDS: OCP, OPP, OVP, UVP & SCP

Maximum safety for your key system components

• OPTIMIZED OVER CURRENT PROTECTIONS

Your components will operate stably and protected from any harm

Installation/accessories

Before you begin with the installation, please read the section „Warnings and safety notes.“

For the arrangement only use the supplied screws since these have the correct thread. You need a screwdriver for the correct arrangement.

The following parts are included within the delivery:

- Screws for the PSU assembly
- Power cord (Please only use the power cord which is included; low-quality cords can damage your PSU and your PC-system.)
- Brief instruction including Information about the warranty

Installation of the COUGAR® PSU:

- Place the PSU into its designated place within the case and fix it with the supplied screws.
- First insert the plugs for the mainboard supply (20/24 pin for MotherBoard, 4 pin and / or possibly 8 pin for CPU) into the respective slots.
- Connect the disk drives and if necessary the graphics cards to the PSU.
- Close the PC and ensure that the PSU power switch is set to the position "0".
- Connect the PSU to the power network using the supplied power cord. Using only the power cord provided in the package. Low quality power cord may damage the PSU and PC system!
- Turn on the PSU and then start your PC.

Protections

- **OCP (Overcurrent protection)**
If the current on a single line is higher than indicated, the PSU automatically switches off.
- **UVP (Under voltage protection)**
If the voltages fall below a certain tolerance value on the single lines, the PSU automatically switches off.
- **OVP (Over voltage protection)**
If the voltages increase above a certain tolerance value on the single lines, the PSU automatically switches off.
- **SCP (Short-circuit protection)**
In the case of a short-circuit this feature prevents damage to the core components of the PSU and its system components.
- **OPP (Over power protection)**
If the system is overloaded and requires more power from the PSU than it can perform, this protection function is activated.

Trouble shooting

Never work on the PSU yourself. Even long time after its deactivation, life-threatening voltages can still be present in the PSU. Repairs should only be made by authorized specialists.

Working at power sources can lead to life-threatening injuries. If there is smoke, cable damage or intrusion of liquids the PSU has to be immediately disconnected from the power network and must not be put into operation anymore afterwards.

Never open the PSU. It contains components, which can show high voltages even after long periods of deactivation.

Again, repairs should only be done by authorized specialists!

Problem: After the installation of the new PSU the system does not start.

Possible solutions:

- Check the power code and the power supply of the wall socket and/or multiple socket strip. Also check whether the multiple socket strip can supply the necessary power.
- Check all connections within the PC; maybe not all cables are correctly connected.
- Check the internal cable of the I/O-switch of the PC case to the mainboard.
- Check the components for possible short-circuits or defects.

Please also check the other components for compatibility. Often mainboard chipsets are not compatible with all memory and/or graphics card solutions. Contact the manufacturer of the component to get more information.

If your PSU still does not function even though you have checked sources of errors mentioned above, please get in touch with our customer service.

Advice

This product is not to be disposed in the regular household waste and must be brought to a collection-point for electrical and electronic devices for recycling. The symbol to the left refers to that and can be found on the product, in the manual or on the packaging. Materials can be recycled according to their description. With the reuse, the recycling or other forms of reutilization of old devices you make an important contribution to the protection of our environment. Please inquire the appropriate location of disposal from your local administration.



Warranty and information of the manufacturer

For further information of the warranty terms, please read the information of "Guarantee Terms and conditions for COUGAR Power Supply Units (PSU) of the LX-Series".

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Made in China

COUGAR LX
POWER SUPPLY UNIT



Warranty Terms and Conditions for COUGAR Power Supply Units

Compucase gives an extended limited warranty of 12 months on COUGAR LX-Series Power Supply Units (PSU), beginning from the date the implied warranty (24 months) ends. During this period, defects in material or workmanship will be repaired or restored with spare parts. In case of a guarantee service, the customer should claim the COUGAR PSU at the retailer, where the PSU was bought, accompanied by a copy of the invoice and an error description. Compucase will only support directly if the retailer is not reachable repeatedly. In case of direct support by Compucase, the end user has to assure that the goods are packed properly and that he is in charge of all transportation costs.

Compucase's warranty does not cover any of the following:

- Damages due to acts of nature (e.g. Lightning, Water and Fire)
- Accessory or consequential damages that happened by using or not using the PSU
- Damages caused by misuse of the PSU or caused by negligence
- Loss of information or data, software or applications
- Damages caused by opening or modifying the PSU without previous accordance
- Damages caused by using or installing the PSU under conditions outside of the technical specifications

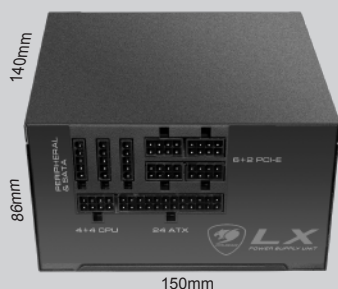
This warranty is valid only for the first end user or consumer and is restricted to the above named period.



www.cougargaming.com

Facebook: facebook.com/cougargaming

YouTube: youtube.com/user/COUGARGLOBAL



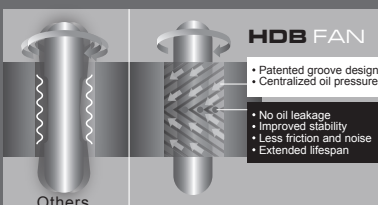
ADVANCED FULLY MODULAR CABLES
Connect only the cables you need:
Less cable clutter and friction, better airflow.



At 140mm length, LX is one of the most compact fully modular PSUs you will find on the market. This means it will fit in a wide range of cases, and give you additional flexibility for building your PC.

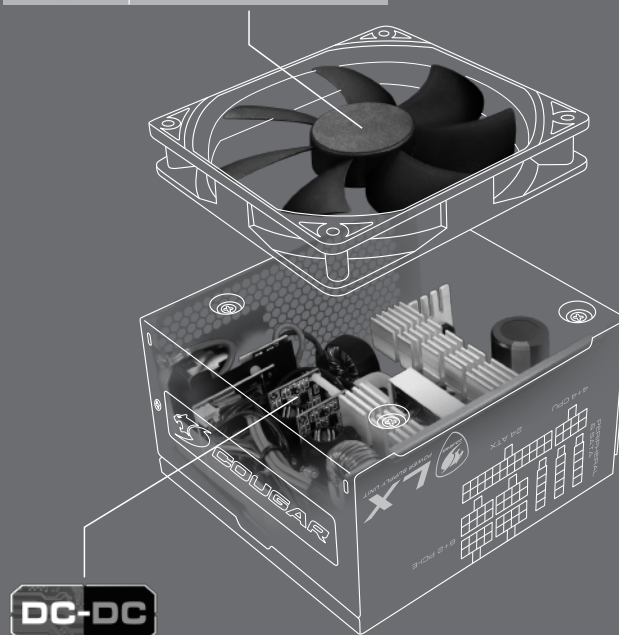


Cougar LX's 120mm HDB fan provides an optimized airflow with reduced vibration noise and extends the unit's lifespan.



BEST LIFESPAN

| LX HDB (HYDRO-DYNAMIC BEARING) 3 TIMES THE STANDARD LIFESPAN | | |
|---|-----------|------------|
| Standard | 40°C MTBF | |
| 50000 | 100000 | 150000 hrs |



DC-DC power conversion technology to regulate a stable voltage output for your PC's components.