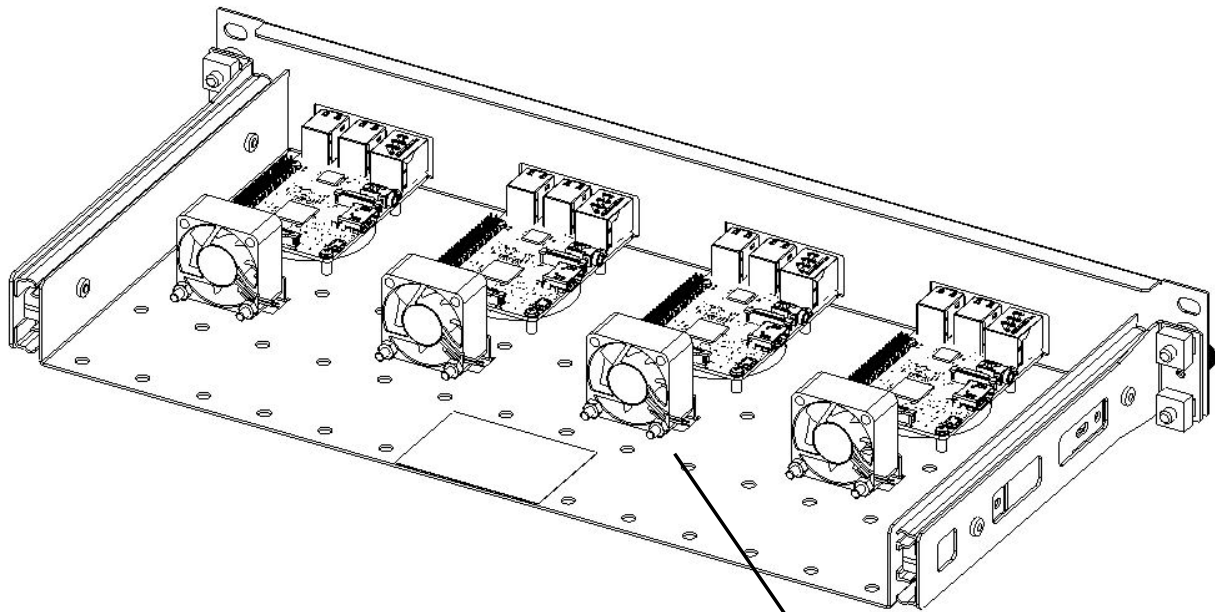


# **Assembly instructions**

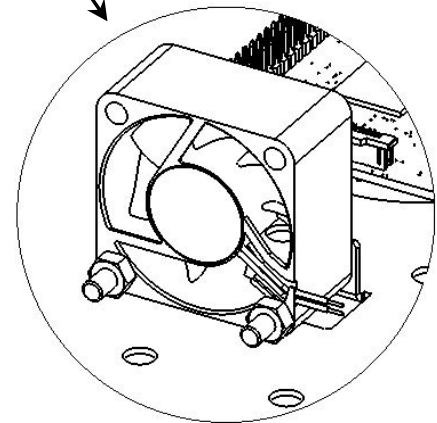
## **zr-fan-442n**





### **Fasten fan**

Fasten the fan(s) to the Rack Mount Kit using the mounting screws (included in the scope of supply).



# NF-A4x20 5V

## Noctua NF-A4x20 5V Premium Fan



### LOGISTIC DATA

Product name	Noctua NF-A4x20 5V
EAN	9010018100129
UPC	841500110123
Packaging dimensions (HxWxD)	210x150x34 mm
Weight incl. packaging	175 g
Warranty	6 years
Packaging unit	40 pcs
Packaging dimensions / unit (HxWxD)	395x380x380 mm
Weight incl. packaging / unit	8.70 kg

### SCOPE OF DELIVERY

NF-A4x20 5V premium fan
OmniJoin Adaptor
30cm extension cable
4x anti-vibration mounts
4x fan screws



Featuring advanced aerodynamic design measures such as Flow Acceleration Channels and Noctua's AAO frame, the NF-A4x20 5V is a dedicated 5V version of Noctua's highly optimised, premium quality quiet 40x20mm fan. Smooth Commutation Drive technology and Noctua's reference class SS02 bearings guarantee superb running smoothness and excellent long-term stability. Topped off with modular cabling, the OmniJoin™ Adaptor Set and 6 years manufacturer's warranty, the NF-A4x20 5V is a premium choice for demanding 5V applications.

#### 40x20mm size

Compared to Noctua's award-winning NF-A4x10, the NF-A4x20 is twice as thick, which allows for increased static pressure performance and makes the NF-A4x20 ideal for demanding applications with high flow resistance.

#### 5V version

Many devices such as network or storage solutions use 5-volt 40mm fans. With the same operating voltage and the included OmniJoin™ Adaptor Set that makes it compatible with proprietary fan headers, the NF-A4x20 5V is ideal for replacing noisy or broken 5V 40mm fans.

#### AAO frame

Noctua's AAO (Advanced Acoustic Optimisation) frames feature integrated anti-vibration pads as well as Noctua's proprietary Stepped Inlet Design and Inner Surface Microstructures, both of which further refine the fan's performance/noise efficiency.

#### Inner Surface Microstructures

With the tips of the fan blades ploughing through the boundary layer created by the Inner Surface Microstructures, flow separation from the suction side of the blades is significantly suppressed, which results in reduced blade passing noise and improved airflow and pressure efficiency.

#### Stepped Inlet Design

Noctua's Stepped Inlet Design adds turbulence to the influx in order to facilitate the transition from laminar flow to turbulent flow, which reduces tonal intake noise, improves flow attachment and increases suction capacity, especially in space restricted environments.

#### SS02 bearing

The NF-A4x20 5V features the further optimised second generation of Noctua's renowned, time-tested SS0 bearing. With SS02, the rear magnet is placed closer to the axis to provide even better stabilisation, precision and durability.

#### Flow Acceleration Channels

The NF-A4x20 5V impeller features suction side Flow Acceleration Channels. By speeding up the airflow at the crucial outer blade regions, this measure reduces suction side flow separation and thus leads to better efficiency and lower vortex noise.

#### OmniJoin Adaptor Set

Many devices featuring 40mm fans use proprietary fan headers, so the NF-A4x20 5V comes with Noctua's OmniJoin Adaptor Set. Just cut the original fan's cable, fix it to the adaptor using the supplied cable connectors and you can plug the NF-A4x20 5V to proprietary fan headers!

#### Integrated Anti-Vibration Pads

Integrated Anti-Vibration Pads made from extra-soft silicone minimise the transmission of minute vibrations while maintaining full compatibility with all standard mounting systems and fan clips used on heatsinks.

#### 6-year manufacturer's warranty

Noctua fans are renowned for their impeccable quality and outstanding longevity. Like all Noctua fans, the NF-A4x20 5V features an MTTF of more than 150,000 hours rating and comes with a full 6-year manufacturer's warranty.

*Being a 5V fan, the NF-A4x20 5V cannot be run at 12V and will be damaged when used with typical 12V power sources such as PC motherboard fan headers.*

### SPECIFICATIONS

Dimensions	40x40x20 mm
Bearing	SS02
Connector	3-pin
Blade geometry	A-Series with Flow Acceleration Channels
Max. input power / voltage	0.5 W / 5 V
MTTF	> 150,000 h
NF-A4x20 5V	w/o adaptor
Max. rotational speed (+/-10%)	5000 RPM
Max. airflow	9.4 m³/h
Max. acoustical noise	14.9 dB(A)
Max. static pressure	2.26 mmH <sub>2</sub> O

Designed in Austria, Noctua's premium cooling components are internationally renowned for their superb quietness, exceptional performance and thoroughgoing quality. Having received more than 6000 awards and recommendations from leading hardware websites and magazines, Noctua's fans and heatsinks are serving hundreds of thousands of satisfied customers around the globe.

[www.noctua.at](http://www.noctua.at)