

12 V BLDC FAN MOTOR

MODEL 1P

at³

Arman Taghdis R&D

Condenser fan motor for refrigerators and freezers



- Knowledge-based company
- Annual capacity: 200,000 units
- Commercially proven since 2024

Purpose-built brushless DC motor for refrigeration airflow systems. Designed and manufactured by Arman Taghdis Research & Development.

PRODUCT SPECIFICATION

Nominal voltage	12 VDC
Minimum start voltage	6 VDC
Current at 12 V	0.15 A
Power at 12 V	1.8 W
Rated speed	2150 rpm
Shaft extension	41 mm
Rotation options	CW or CCW — dedicated variant
Ordering codes	AT3-1P-CW / AT3-1P-CCW

DESIGN & FUNCTION

● Three-phase sensorless BLDC architecture	● 3-wire interface: VCC / FG / GND	● Speed control by VCC input voltage
● Current-limit and thermal protection	● FG output: 4 pulses per revolution	● Operating input range: DC 6–15 V

ORDERING NOTE

CW and CCW are separate product variants and cannot be changed by rewiring. Ordering codes: AT3-1P-CW / AT3-1P-CCW. For integration review, provide the mounting envelope, fan load, lead-wire length and connector requirement.

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