

MHM · ACS SERIES

MHM Air Cooled Scroll Chiller

Packaged rooftop scroll chiller, 30–260 TR, R-410A, tandem compressors with 25% steps.

Origin: Assembled in Bangladesh (Shenzhen MHI components) ·

Category: Electric Chillers



COOLING

CAPACITY

30–260 TR

REFRIGERANT

R-410A

POWER SUPPLY

**415 V / 3 ph /
50 Hz**

COP (AHRI)

3.1–3.4

AMBIENT

RATING

up to 46 °C

WARRANTY

18 months

Overview

The MHM ACS series is a packaged air-cooled scroll chiller built for the flat rooftops of Bangladeshi textile, garment and pharmaceutical plants. Tandem scroll compressors on independent refrigerant circuits give four capacity steps, so the machine follows the dyeing or process load instead of cycling. The condenser uses hydrophilic-coated aluminium fins on copper tubes, sized for 45 °C ambient, and low-noise axial fans with EC option.

Every unit ships with a shell-and-tube evaporator, a microprocessor controller with Modbus RTU and a fully wired power panel, so on site only chilled-water pipes, power and the flow switch need to be connected. MHM stocks compressors, fan motors, contactors and controller boards in Dhaka, and the same team that installs the chiller runs the annual maintenance contract.

Design features

Hermetic scroll or semi-hermetic screw compressors

Low-vibration compressors with capacity staging keep part-load efficiency high across textile and pharma duty cycles.

Microprocessor controller with Modbus RTU

Leaving-water setpoint, alarms and run hours are readable on the panel and shared to a BMS over RS-485.

Electronic expansion valve

Stable superheat control at 25–100% load and during Dhaka summer ambient swings up to 42 °C.

Hydrophilic-coated condenser fins

Corrosion-resistant fins with 40% longer service life in humid, dusty rooftop conditions.

Phase and pressure protection

Phase-loss, reverse-phase, high/low pressure, anti-freeze and flow-switch interlocks as standard.

Factory run-tested

Every unit is charged, run-tested and tagged with a test certificate before dispatch.

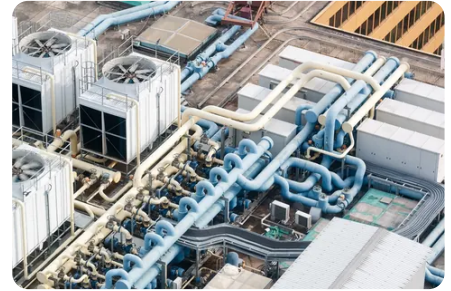
Typical applications

- Textile dyeing and finishing
- Garment washing plants
- Pharmaceutical HVAC
- Plastic injection moulding
- Commercial building comfort cooling
- Food processing halls

Technical data — ACS Series

Model	Capacity (TR)	Capacity (kW)	Input power (kW)	Compressors	Chilled water flow (m³/h)	L × W × H (mm)	Weight (kg)
MHM-ACS-030	30	105	36.2	2 × scroll	18.1	2250 × 1100 × 2050	1180
MHM-ACS-060	60	211	71.8	4 × scroll	36.3	3400 × 2200 × 2250	2350
MHM-ACS-090	90	316	106.4	6 × scroll	54.4	4600 × 2200 × 2250	3320
MHM-ACS-120	120	422	142.1	8 × scroll	72.6	5800 × 2200 × 2300	4210
MHM-ACS-180	180	633	214.6	12 × scroll	108.9	8300 × 2200 × 2300	6150
MHM-ACS-260	260	914	311.0	16 × scroll	157.3	11400 × 2250 × 2350	8600

Ratings at standard conditions stated in the facts above. Intermediate capacities, alternative voltages and special options on request; MHM selects the model for your load, ambient and water conditions.



Selection, installation and after-sales by MHM Engineering

Send your capacity, ambient / water conditions and site drawings to sales@mhmmachineries.com or call +880 1321-206755. Every MHM unit is commissioned by our own engineers and covered by an annual maintenance contract with genuine spares stocked in Dhaka.