



SAVE ENERGY, CUT COSTS, IMPROVE COMFORT, REDUCE CARBON

Save 20-50% on heating & cooling costs in
**Manufacturing & Engineering
Facilities with Airius**

The world leaders in Destratification technology



www.airius.co.uk

Destratification is recommended by The Carbon Trust*

SAMSUNG

3M

BAE SYSTEMS



rotork



ALSTOM



LUSH FRESH HANDMADE COSMETICS

SIEMENS



QinetiQ



ArdaghGroup

Tube Engineers Ltd
Tube Design, Manipulation and Fabrication



Honeywell

RICOH



Nova Laboratories Ltd



Rolls-Royce



impress GROUP



BAXI



Manufacturing & Engineering

Airius are world leaders in destratification fan technology and have the largest range of fan units, suitable for any manufacturing or engineering application.

Tyco Manufacturing Plant

Architects, building owners and facility managers who work with large industrial buildings are under growing pressure to seek solutions which not only save energy and money, but also help achieve their green business goals.

In response to this Airius destratification systems are being increasingly turned to as the most cost-effective method to reduce HVAC costs and carbon emissions by 20% - 50% (or more when used in facilities with process heat), whilst also ensuring comfortable conditions are maintained for staff in order to sustain productivity.



Factories



Workshops



Engineering

3

Airius destratification fans work simply and inexpensively alongside all types of HVAC equipment to improve your energy management by balancing temperatures, reducing both heating and cooling costs by between 20% to 50% or more and create gentle air movement throughout the internal space.

Airius are World leaders in destratification fan technology and have the largest range of fan units that can be installed into both open and suspended ceilings and are suitable for any manufacturing or engineering building application, such as:

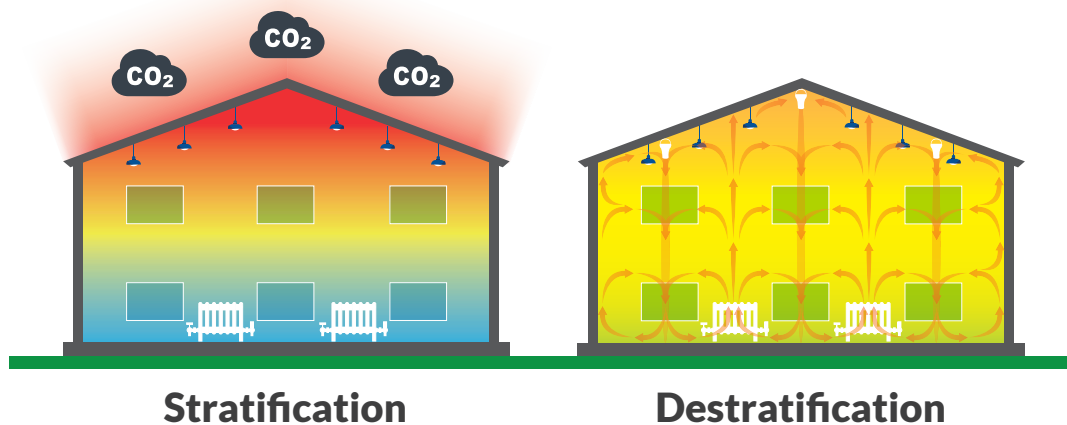
- Factories
- Manufacturing Plants
- Workshops
- Production Facilities
- Warehousing & Distribution Centres
- Flex Buildings
- R & D Facilities
- Light Assembly Buildings
- Automotive Engineering
- Truck Terminals

How it works

Thermal stratification affects all buildings and has been labelled as *“the single biggest waste of energy in buildings today.”* - DTE Energy.

Hot, lighter air rises towards the ceiling. Cool air falls to the floor. This causes a dramatic temperature difference between the floor and ceiling and results in HVAC systems over-delivering on both heating and/or cooling to overcome the effects of thermal stratification.

Consequently, energy bills are much higher and internal environments rarely meet expectations.



Airius destratification fans are installed at ceiling height and send air down to the floor in a tight, slow-moving column.

When this air reaches the floor, it radiates 360° outwards until it meets a vertical surface and/or air coming from neighbouring Airius fans and then it rises back up towards the ceiling.

As this air rises it entrains back into the descending column, which creates millions of tiny vortices, making the air move at the same speed throughout the whole interior space creating a balance of temperature.



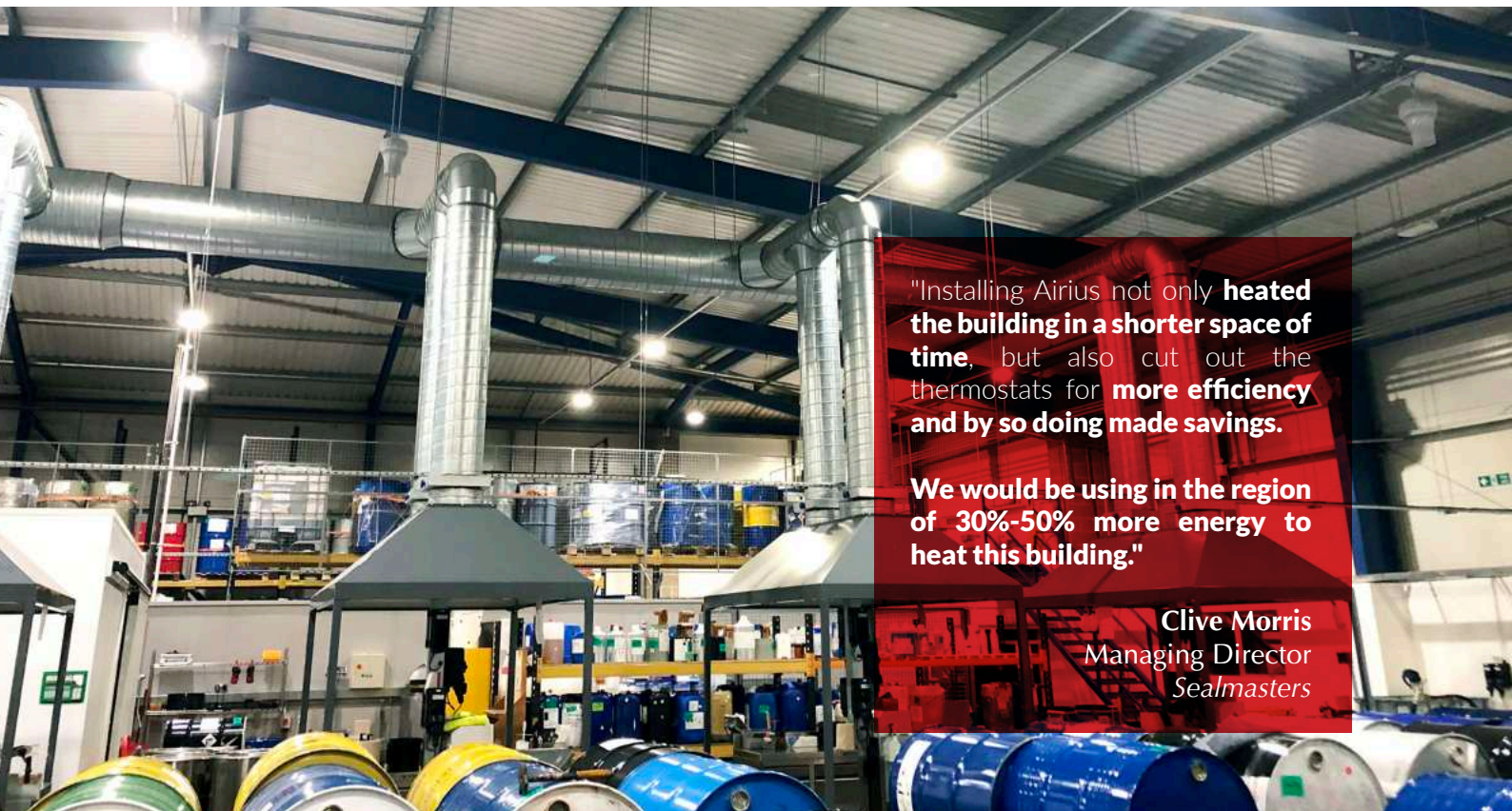
Features & Benefits

Airius destratification fans are the only brand to feature our patented multi-vane stator technology.

While most fans use basic motors to churn air through space, Airius fans are equipped with industry-leading EBM Papst motors, which help to deliver incomparable levels of efficiency and longevity.

Main Benefits

- Optimises both heating and cooling
- 40%+ reduction in heating costs
- 40%+ reduction in CO₂ emissions
- Increases staff productivity
- Works with & reduces maintenance costs for ALL HVAC systems
- Recycles heat from processes, machinery, lighting and solar gain
- Significantly reduces heat loss through roof & roller/shutter doors
- Reduces building heat up time
- Increases lighting lifespan
- Stand alone or BMS integrated
- Vastly improves comfort levels
- 25%+ reduction in cooling costs
- Rapid ROI - Usually 8 - 18 months
- Minimal running costs (from £24/pa)
- Simple to install with no ducting required
- Reduces or eliminates condensation, corrosion & wet floors
- Easy retro installation or designed into new build specification
- Reduced machinery start up time
- Minimal maintenance required
- Eligible for grants/loans



"Installing Airius not only **heated the building in a shorter space of time**, but also cut out the thermostats for **more efficiency and by so doing made savings**."

We would be using in the region of 30%-50% more energy to heat this building."

Clive Morris
Managing Director
Sealmasters





Assured quality

Airius Destratification fans have been installed into many commercial, private, public and government buildings. Discover who we work with and what they have to say.

Customer testimonials

“The full cost of the Airius units is recouped within a matter of months – first winter savings of £62,251 measured against a total Airius system spend of £21,268!

Paul Mattin – Engineering Manager – Impress Group

“We installed the Airius system into the can assembly plant at our manufacturing site and **I am very pleased with the results** so far.

The heating system comes on far less than it used to and employees are now much warmer.

The overall savings = 45.07%. The full cost of the Airius units is recouped within a matter of months – first winter savings of £62,251 measured against a total Airius system spend of £21,268!”

“It was like having additional heaters in the area.

Paul Gale - Process Improvement Manager - Abbey Corrugated

“We installed the Arius destratification system in the production area of our Blunham site. **It was like having additional heaters in the area, working conditions were greatly improved.**

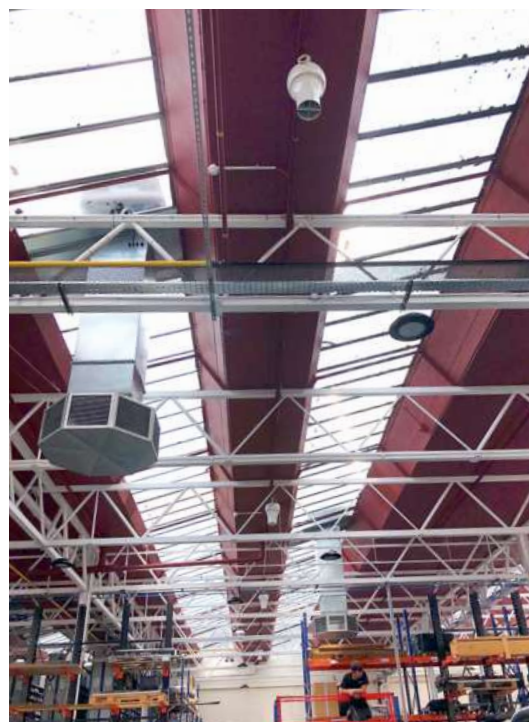
We have recently **gained re-accreditation of the Carbon Trust Standard** and this project has helped to improve our manufacturing area with minimal impact to our Carbon Footprint.”

“Our site saw significant energy savings.

Lee Davis – Group Health, Safety & Environmental Advisor - Farrow & Ball

“The system has been very useful in distributing heat to lower levels, thus helping to increase reliability of our sensitive labelling equipment during winter periods, where previously we had setting problems. **During summer months equally it circulates air for employee comfort** and is a quiet system.”

Our site saw significant energy savings supporting our ISO14001 accreditation, which I am sure the system played a part.”



“A fantastic saving on our gas utility bill per annum.

Mark Northy – Managing Director - Norco GRP Mouldings

"We now have Airius destratification fans in all of our main production facilities totaling 80,000ft². **Each installation was carried out professionally and to an excellent standard**, with the minimum of interruption to our very busy manufacturing facilities.

The main benefits for us are **vastly improved air circulation, balance of temperature throughout the buildings, low running costs, silent and stress free operation and of course a fantastic saving on our gas utility bill** per annum.

I would highly recommend Airius systems for all factory and warehouse environments."

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“Overall a very good investment.

Alan Niven – Director - Whittaker Engineering

"Since the installation we have had a warmer more constant temperature in the workshops and comments from the machinists stating that **the air temperature is better for working in**. The thermostat fitted to the heaters has also been turned down and thus **giving us saving on fuel used**.

Overall a very good investment."

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“I would recommend Airius highly.

Andrew Cowling – Director - Britannia Food Ingredients

"Prior to installation **we had a 20°C temperature differential** over the 11 meter high hot room, **since installation the temperature differential has dropped to 4°C**.

The fans are very quiet and have very low power consumption and **I would recommend Airius highly."**



“The Airius units are very effective.

Peeyush Kurian – Engineer - Rotork

“The Airius destratification units installed on the shop floor of our Bath site are very effective.

Airius have made it possible to provide better heating without installing new heaters and **without increasing temperature levels on existing heaters."**

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“We would be using in the region of 30%-50% more energy to heat this building.

Clive Morris – Managing Director - Sealmasters

"Installing Airius not only **heated the building in a shorter space of time**, but also cut out the thermostats for more efficiency and by so doing made savings.

We would be using in the region of 30%-50% more energy to heat this building."

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“Airius fans improved our staff comfort & productivity.

Paul Wallace – Lead Engineer - Amazon Filters

"We fitted Airius units to remove the hotspots in our manufacturing area. **They were simple, quick to fit and resolved the problem instantly**.

The Airius fans improved our staff comfort & productivity. I would highly recommend the Airius product!"

Discover more

See our full list of 65+ customer testimonials on our website at www.airius.co.uk/testimonials

Lush Cosmetics

Factory Facility

Lush Retail Ltd contacted Airius to address the uncomfortable low temperatures and expensive costs for heating at their factory facility in Poole, Dorset.

Originally it was estimated that this site would benefit from a minimum energy saving of 35%, however a far greater saving was achieved of over 60% following installation of the Airius system.

Key Points:

- **ROI = 26 days**
- 61% energy saving on heating system
- Significantly improved comfort
- Recycles heat from processes & machinery
- Also improves cooling during summer
- Airius rolled out across the Lush network



HEATING

Ardagh Group

Manufacturing Plant

Impress Metal Manufacturing, now owned by the Ardagh Group, installed Airius destratification into their 3,000m² metal manufacturing plant in Norwich to help reduce heating costs.

Following installation they benefitted from a saving of over 45%, repaying their investment 3 times over in the first winter they were installed.

Key Points:

- **45% saving on heating costs**
- Payback in one winter season
- Occupant comfort significantly improved
- Heat loss through roof significantly reduced
- Marked reduction in CO₂ emissions
- Reduced plant heat-up time



HEATING

Siemens Transport

Rail Maintenance Facility



Siemens Transportaion Systems contacted Airius to address the high energy costs in their Acton Rail Maintenance Shed.

After installaion comfortable conditions were quickly achieved, yet the workload from the HVAC system was significantly reduced, so much so that the system paid for itself in under 18 months.

Key Points:

- **£12,106 savings in first year**
- Return on interest within 18 months
- Immediate improvement in comfort
- Reduced wear and tear on HVAC system
- Improved staff productivity
- 75 tonnes reduction in CO₂ emissions

Norco Composites

Flagship Production Facilities



To respond to increasing energy costs Norco GRP installed the Airius destratification system in their 7,500m² main production facilities in Poole, Dorset.

The Airius system was able to immediately recirculate heat which had accumulated at high level to reduce demand on the HVAC system, cutting costs significantly and improving comfort for staff.

Key Points:

- **"Fantastic saving on our utility bill"**
- Vastly improved airflow circulation
- Balanced temperatures throughout
- Silent operation with no noise disturbance
- Simple integration with BMS system
- Stress-free turnkey installation

V3.0



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Middle-East & Asia**

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