

# MODULAR AIR-HANDLING UNITS







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#### WHY AEROMASTER XP?

The latest knowledge from field of projection, production and operation of air-handling devices are respected and used in maximal extent during projection, production and installation and following operation.

# PROGRESSIVE CONSTRUCTION - EXCELLENT THERMAL, NOISE AND INSTALLATION CHARACTERISTICS

- Unique frameless construction
- Unique totally smooth internal casing meets sanitary standards for all types
- Sandwich panels with 50 mm insulation provide high air soundproofness
- Original connecting of sections provides fast and easy installation
- Integrated sensors save costs for installation of measuring and control
- All internal electric devices have wiring places on external casing which notably simplifies and cheapens installation

# PARAMETERS - EUROPEAN STANDARD OF PARAMETERS ACCORDING TO EN 1886

mechanical parameters:

- Mechanical strength: D2 (M)
- Casing air leakage: L2 (M), (L1(M) as an option)
- Filter-bypass leakage: <0.5% (F9)

thermal parameters:

- Thermal transmittance: class T3
- Thermal bridging: class TB3

#### **OPERATION - CHEAP, COMFORTABLE AND SAFE**

- Energy savings thanks to heat recovery
- Easily filter replacement
- Easily removable and cleanable stainless drop eliminators

# PRACTICAL ACCESSORIES – SIMPLIFY INSTALLATION AND EMPROVE EASY OF MAINTENANCE

- Inspection window
- Internal lighting of fan sections
- Adjustable frame feet
- Condensate drain kits

#### SURFACE TREATMENTS - FOR ALL REQUESTS

- Zinc-coated, stainless, RAL and their combinations
- Stainless plate

#### **EXCELLENT CONTROL SYSTEMS**

Complex delivery including control system, i.e. frequency inverter, respectively VCS control unit

#### **CERTIFICATION**

- Pof comformity by authorized person TüV Süd Czech
- SZÚ approved for use in hygiene applications
- Certified quality management system according to ISO 9001

#### **EXTENDED GUARANTEE**

- Up to 5 year guarrantee
- Guaranteed quality of materials and components

#### PROMPTNÍ DODÁVKY – U NÁS VČETNĚ REGULACE

Delivery within 3 weeks of conclusion of the contract

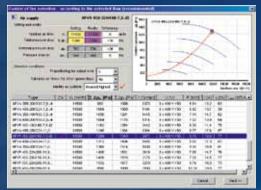
#### **UNIQUE SELECTION SOFTWARE - AEROCAD**

- Inconquerable graphical perfection at level of virtual reality (VRML)
- Unit simulation in real space with a scene
- Exports to 3D CAD systems (DXF) and exports to BMP
- Perfect exact calculations of all components
- Easy state and operation device simulations
- User definable extent of print-outs
- Unlimited number of active units in project



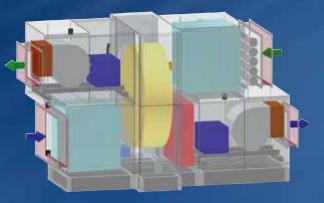
#### PERFECT AND COMPREHENSIVE SELECTION

Unique comprehensive graphical selection and calculation program AeroCAD is at your disposal when projecting AeroMaster XP units.

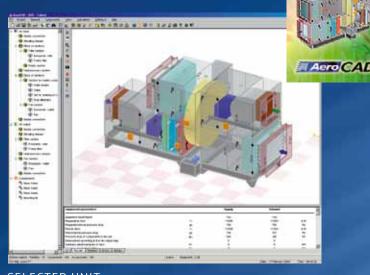


# CALCULATION OF FAN PARAMETERS

example of unit with rotary heat exchanger and water heating



example of unit with cross heat exchanger, water heating and cooling



**SELECTED UNIT** 

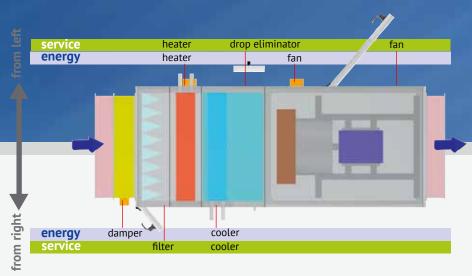


# **UNIQUE VARIABILITY OF SUPPLY CONNECTION**

Construction of AeroMaster XP units enables to combine side of supply connection with side of service access.

This option gives a designer a chance to optimally use the space of the machine room and the current supply distribution.

Side of service access is determined by air flow direction



# MODULAR AIR-HANDLING UNITS

D2 (M) CASING MECHANICAL STRENGTH

CASING AIR LEAKAGE L2 (M), (L1(M) OPTIONAL)

< 0,5% (F9) FILTER BYPASS LEAKAGE

T3 THERMAL INSULATION

THERMAL BRIDGING **TB3** 

-40 то +40°С OPERATING TEMPERATURE

Casing acoustic insulation (DB/octave band)  $16,1/125,\,19,1/250$  Hz, 27,0/500 Hz, 29,7/1 kHz, 30,2/2 kHz, 29,3/4 kHz, 33,2/8 kHz



#### MOTORIZED IMPELLERS



**CLEAN INTERNAL SURFACES** 





LABYRINTH CONNECTION OF PANELS



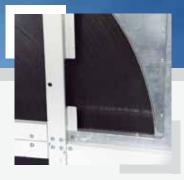




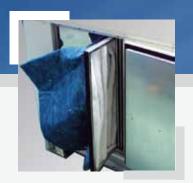




**HEAT RECOVERY** 



EASILY CHANGEABLE FILTERS



REMOVABLE DROP ELIMINATORS



# MODULAR AIR-HANDLING UNITS







WIRING TAKEN OUT TO WIRING BOXES



PARAMETRICALLY LINKED CONTROL









# AIR FLOW RATE AND PRESSURE LOSS



## SIZES AND DIMENSIONS



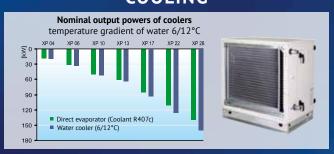
## **HEATING**



# **FILTRATION**



#### COOLING



## MIXING



#### **HEAT RECOVERY**



## **NOISE ATTENUATION**

