**Fan specialist ebm-papst has the right solution for the increasingly strict requirements regarding the efficiency of ventilation devices for residential buildings. In addition to high efficiency, new housed fans now feature convenient options for communication and operation and are also quieter than the industry standard.**

Special fans that control both air intake and exhaust are needed for room ventilation in both new and renovated buildings. Until now, fans with forward-curved impellers were used for central home ventilation units with and without heat recovery. But the proven RadiCal centrifugal fans with free-running backward-curved impellers deliver significantly better results for both efficiency and noise emission. Now ebm-papst has combined its proven RadiCal with an aerodynamically optimized scroll housing for use in central home ventilation units.

**Several benefits in practice**

The scroll housing with its round exhaust opening connects directly to the pipe fitting on the ventilation unit’s outlet, considerably reducing the usual flow losses while the air performance remains very pressure-insensitive and the efficiency increases by up to 34% compared to centrifugal blowers of the same construction. In addition, the noise level is reduced by 3.5 dB(A), as already confirmed in numerous tests. Installation-induced noises that arise during operation and are undesirable in living areas can also be reduced. The optional FlowGrid air inlet grill can be mounted on the intake side if needed. This results in agreeable acoustic characteristics as it minimizes unpleasant low-frequency sounds caused by obstructive fittings inside the unit. The fan is controlled and its operating data read out via the MODBUS RTU option.

**Plug & play system, ready to install**

The RadiCal centrifugal fans in 3D scroll housings are offered as ready-to-install plug & play solutions in size 190 with various output levels up to 170 W. They will be available from April 2017.



Fig. 1: The new RadiCal centrifugal fan in an aerodynamically optimized scroll housing, shown here with FlowGrid.

**Photo** ebm-papst

**Characters**  approx. 2,200, with headings and sub-headings

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**Link** [www.ebmpapst.com/radical4home](http://www.ebmpapst.com/radical4home)

**About ebm-papst**  
The ebm-papst Group is the world's leading manufacturer of fans and motors. Since it was founded, the technology company has continuously set global market standards. Developments have ranged from electronically controlled EC fans, through aerodynamic improvements of fan blades, on to the resource-conserving selection of materials, with sustainable materials being just one option.

In fiscal year 2015/16, the company achieved sales of almost €1.7 billion. ebm-papst employs approximately 13,000 people at 25 production sites (in Germany, China, the United States and elsewhere) and in 49 sales offices worldwide. Fans and motors from the global market leader can be found in many industries, including ventilation, air conditioning and refrigeration, household appliances, heating, automobiles and drive engineering.