Interdisciplinary Innovation and Vision in the HVAC

High energy costs in buildings are forcing the building owners, developers, fund and facility managers to find alternate energy efficiency methods while improving the indoor air quality and thus the comfort level of the room occupants.

High potentials for optimizing costs can be found in the HVAC systems when calculated over the total Life-Cycle-Cost (LCC) of a building incorporating planning through to facility management. This requires an accurate plan specifying an efficient technical operating method with optimized energy cost efficiency and comfort for the room occupants. In turn, the plan should be considered in any bidding process.

Multisensory equipment is an integral part of the LCC concept and should not be underestimated in its impact on energy efficiency. The possibility of customizing the requirements of the room occupants should be included in each specification of a building/room automation system. The following case study will explain how modern sensory systems can be used for investment and energy savings in various HVAC system.