

## FINANCING CASE STUDY

# Financing Gives Garage a Breath of Fresh Air

## Ventilation Overhaul Improves Indoor Air Quality and Saves Money

### THE CHALLENGE

When half of the ventilation fans at the 111 East Chestnut Parking Garage reached the end of their useful life, the Garage Association had to act quickly to maintain indoor air quality (IAQ). Constrained by budget, the Garage Association brought in HVAC contractor Midwest Mechanical to assess the situation and find the most economical solution.

### THE SOLUTION

Midwest Mechanical found that while a **simple replacement** could fix the immediate IAQ issues, a more **comprehensive solution** would both save the Garage Association money (over \$37,000 per year) and deliver superior ventilation. Aware of the budget constraints, Midwest Mechanical had to do two things: first, demonstrate why the more expensive option was better; and, second, find a way for the Garage Association to pay for it.

Midwest Mechanical partners with Noesis. Noesis specializes in helping its partners sell their projects through online project scenario analysis coupled with payment plans to ensure customers can buy the right solution. Working with Noesis, Midwest Mechanical compared the two scenarios to convince the Garage Association to pursue the more robust solution. Next, through Noesis, Midwest Mechanical offered monthly payment plans that would allow the Association to purchase the solution they wanted.

### THE RESULTS

After reviewing the analysis and the monthly payment options the Garage Association discovered that despite the higher price, the more comprehensive project's monthly costs were half of the less expensive option – all because of the savings realized from energy efficiency (see table below). As a result, the Garage Association chose to move forward with the comprehensive solution.

### PROJECT SUMMARY

In addition to new direct fired Make Up Air Systems to effectively ventilate/heat the garage, a new digital control system with temperature sensors and CO detectors will be installed throughout the parking garage. Exhaust and Supply (heated) air will modulate based real time need, as opposed to 24/7 operation.

### SCENARIO SUMMARY

**Noesis compared financing of the two project scopes. The simple replacement was cheaper, but had a lower IRR and actually had a higher monthly payment (\$2,201) than the comprehensive solution (\$899).**

	Simple Replacement	Comprehensive Solution
Project Cost	\$137,025	\$204,925
Annual Savings	\$8,000	\$37,970
Internal Rate of Return (IRR)	3.2%	20.7%
Monthly Payment	(\$2,767)	(\$4,782)
Monthly Savings	\$667	\$3,164
Net Monthly Cost	(\$2,201)	(\$899)

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