

# Energy Efficiency - Facilities



A=Already Doing, T=Testing On Small Scale, B=Budgeting For,  
 D=Done, L=Brought to Landlord's Attention, NA=Not Applicable

Action	Code	Date
Match HVAC and Lighting schedule to use. (ie. ensure lights are off when building is unoccupied, ensure exterior lights are off during day time, etc.)		
Adjust blinds or shades to let sun in, in winter -- temper in summer.		
Verify settings of utility clock and building systems clock for daylight savings (run 2x/year)		
Assure vents are free of obstructions.		
Check proper functioning of temperature/occupancy controls		
Set water heater to 110 - 120 degrees.		
Close off rooms that don't need heating or cooling.		
Reduce general overhead lighting by de-lamping, using task lighting where needed; taking advantage of natural light.		
Use fans to circulate warmed/cooled air.		
Perform scheduled maintenance on all units (Cleaning burners and a/c coils; Replacing and cleaning air filters; Checking ducts and pipe insulation for damage; Annual maintenance of furnace and boilers in fall; Clean refrigerator coils twice a year; Replace door gaskets of refrigerator if a dollar bill easily slips out when closed between the door 's seal; Check sprinklers, faucets & plumbing for leaks, etc.)		
Set office thermastats when occupied at 68° in winter and 78° in summer.		
Set thermostats on timers when unoccupied. Reduce temperature 5° in winter and increase temperature 5° in summer.		
Create or join a purchasing pool to lower costs for light bulbs, insulation, sink aerators, etc. for your building.		
Dust, clean bulbs and fixtures to increase light levels.		
Reduce condenser water temperature		
Optimize cooling tower fan speed		
Optimize chiller staging		
Minimize chiller cycling.		
Reduce chilled water speed		
Minimize outside air quantities		
Minimize exhaust quantities		
Match ventilation to number of occupants		
Raise chilled water set points		
De-energize exhaust fans and close dampers when unoccupied		
Make best use of economizer operation		
Eliminate simultaneous heating and cooling		
Reduce airflow in constant volume (CV) systems		
De-energize nonessential loads of pumping systems		

Verify proper flow of pumping systems		
Minimize losses in de-energized boilers		
Optimize boiler sequencing		
Ensure proper weatherization of building (i.e. doors and windows have tight seals; Insulate and/or coat windows to reduce heat gain/loss; outside walls are adequately insulated; caulk and insulate around electrical outlets, where service lines enter building, between wood and masonry, etc.)		
Centralize refrigerators by eliminating surplus and multiple small units.		
For south facing windows consider awnings, levelors or meco shades (lets light not UV in) to reduce heat capture in summer.		
Install aluminum reflectors in fluorescent fixtures.		
Install programmable thermostats that can be secured.		
Insulate hot water heater and pipes.		
Plant trees south of the building to increase shade, on west as a wind buffer or anywhere to offset emissions.		
Replace incandescent exit signs with ENERGY STAR LED fixtures.		
Replace overhead fluorescent fixtures with T-8 or T-5 lamps.		
Replace screw-in incandescent bulbs with ENERGY STAR compact fluorescent bulbs or LEDs.		
Ensure timers or sensors are installed where appropriate (i.e. outside lighting, restrooms and other spaces intermitantly used).		
Research and identify efficient operations/process equipment.		
Upgrade electronics and appliances to ENERGY STAR efficient models (don't forget high efficiency vending machines).		
Seal leaky ducts		
CV systems to VAV		
Install variable frequency drives.		
Install modulating burners (linkage-less)		
Up to 25% of electrical purchase is renewable energy (Green Power Tomorrow)		
26%-49% of electrical purchase is renewable energy		
100% of electrical purchase is renewable energy		
Contact FOE/City of Madison Engineering to arrange solar site assessment to determine efficacy of installing solar electric or solar hot water.		
Complete Solar site assessment.		
Install Solar Electric system.		
Install Solar Hot water.		
Install Solar tubes for increased natural lighting.		
Employees are aware of energy-efficiency practices specific to your company (i.e.. turn off office equipment, turn off lights when not in use, if HVAC system is running keeping windows closed, etc.)		
Employees are aware of energy savings measures your company are implementing.		