RESTAURANT INCENTIVE WORKBOOK

ADD SAVINGS TO YOUR PLATE

Cut energy bills with cost-effective energy solutions

Energy Trust of Oregon understands that the non-stop pace of the restaurant business doesn't leave a lot of time for thinking about energy costs. But it could be time well spent when you consider that restaurants use approximately two-and-a-half times more energy per square foot than other commercial buildings, paying an average of $4 per square foot annually. More than 60 percent of the energy is used by equipment for food preparation, heating and cooling. Lighting, refrigeration and cleaning equipment eat up even more energy.

Energy Trust knows that reducing energy use by installing energy-efficient equipment and systems is one of the best ways to lower overhead costs and boost profit margins. With energy costs climbing at a rate of up to six to eight percent a year, investing in energy efficiency is a smart way to protect your business.

Energy Trust can help you capture these benefits and earn cash incentives for energy-efficient equipment and building practices with our special package of incentives for restaurants. Whether you're building a new space or kicking-off a major renovation, this option provides a simple way to identify the best energy solutions for your restaurant.

Energy Trust outreach managers can offer input and feedback as you make energy-related decisions and assist you in completing this workbook. If you have questions or need help getting started, contact the outreach manager listed here.

Name

Email

Phone Number

Energy Trust of Oregon

HOW TO USE THIS WORKBOOK

What is the restaurant incentive package?

The restaurant incentive package is a step-by-step, flexible process for selecting and purchasing the best energy-efficient equipment for your restaurant. The table below presents the incentive structure. Depending on your efficiency goals and the number of equipment or systems installed, your restaurant may qualify for a bonus incentive in addition to standard incentives. The more energy-efficient equipment or design options you select, the higher the bonus.

	NUMBER OF EQUIPMENT OPTIONS	INCENTIVES
BEST	6	Standard Incentive + 30% Bonus
BETTER	5	Standard Incentive + 20% Bonus
GOOD	3 or 4	Standard Incentive + 10% Bonus

Use this workbook throughout the course of your project to set efficiency targets, select equipment, estimate incentives and facilitate communications and decision making. Your Energy Trust outreach manager will work with you to maximize the energy efficiency of your building and make the most of our incentives.

STEP 1 Meet with your Energy Trust outreach manager to discuss efficiency targets and options.

STEP 2 Review the eligible equipment listed in this workbook.

STEP 3 Select equipment and provide required documentation.

Project Name

Square Footage

The following sections present the options for cooking equipment, appliances, lighting and heating ventilation and cooling systems, or HVAC, eligible for standard and bonus incentives. Please indicate the equipment you plan to install by completing the following tables.

ENERGY EFFICIENT COOKING EQUIPMENT

Most commercial kitchen appliances are energy-intensive. Select and install energy-efficient cooking equipment that meets the requirements outlined below to reduce your restaurant's utility bills. You may receive credit for two different pieces of equipment. For example, two ENERGY STAR fryers and one convection oven would count as two equipment options achieved for the overall bonus (see page two for further details).

Equipment Type	Requirements	No. of units	Make/Model	Standard Incentive	Good Incentive	Better Incentive	Best Incentive
Electric convection oven (full size)	ENERGY STAR®			$300/unit	$330	$360	$390
Electric convection oven (half size)	ENERGY STAR			$300/unit	$330	$360	$390
Gas convection oven (full size)	ENERGY STAR			$300/unit	$330	$360	$390
Electric hot food holding cabinet (full size)	ENERGY STAR			$400/unit	$440	$480	$520
Electric hot food holding cabinet (half size)	ENERGY STAR			$275/unit	$303	$330	$358
Gas fryer	ENERGY STAR			$800/unit	$880	$960	$1,040
Gas griddle	ENERGY STAR			$150/unit	$165	$180	$195
Electric steam cooker	ENERGY STAR			$1,300/unit	$1,430	$1,560	$1,690
Gas steam cooker	ENERGY STAR			$1,300/unit	$1,430	$1,560	$1,690

Required documentation

Please submit the following documentation to Energy Trust along with your incentive application:

- ☐ Invoices
- ☐ Cutsheets

Total Equipment Options Selected 0

Total Incentive $ 0

ENERGY STAR COMMERCIAL DISHWASHERS

Commercial dishwashers that have earned an ENERGY STAR rating are 25 percent more energy and water efficient than standard models. Reduce your restaurant's utility bills by selecting and installing at least ONE piece of energy-efficient dishwashing equipment that meets the requirements outlined.

Equipment Type	Requirements	No. of units	Make/Model	Standard Incentive	Good Incentive	Better Incentive	Best Incentive
Commercial dishwasher, undercounter (high temp)	ENERGY STAR			$200/unit	$220	$240	$260
Commercial dishwasher, single tank door/upright (low temp)	ENERGY STAR			$400/unit	$440	$480	$520
Commercial dishwasher, single tank door/upright (high temp)	ENERGY STAR			$400/unit	$440	$480	$520
Commercial dishwasher, single tank conveyor (low temp)	ENERGY STAR			$500/unit	$550	$600	$650
Commercial dishwasher, single tank conveyor (high temp)	ENERGY STAR			$500/unit	$550	$600	$650

Required documentation

Please submit the following documentation to Energy Trust along with your incentive application:

- ☐ Invoices
- ☐ Cutsheets

Total Equipment Options Selected 0

Total Incentive $ 0

EFFICIENT DOMESTIC HOT WATER HEATING EQUIPMENT

A commercial kitchen requires hot water for cleaning, sterilization and cooking. This hot water is supplied by a domestic hot water system, which uses a significant amount of energy. You can reduce your energy bills by installing an efficient domestic hot water heater.

Equipment Type	Requirements	No. of units	Make/Model	kBtuh	Standard Incentive	Good Incentive	Better Incentive	Best Incentive
Condensing tank	91% thermal efficiency, EF				$2.50/kBtuh	$2.75	$3.00	$3.25
Tankless/ instantaneous water heater (<200 kBtuh)	0.82 EF, electric ignition				$2.00/kBtuh	$2.20	$2.40	$2.60
Tankless/ instantaneous water heater (≥200 KBtuh)	94% EF, electric ignition, condensing only				$2.75/kBtuh	$3.03	$3.30	$3.58

Required documentation

Please submit the following documentation to Energy Trust along with your incentive application:

- ☐ Invoices
- ☐ Cutsheets

VARIABLE FREQUENCY DRIVE ON KITCHEN EXHAUST HOOD

All commercial kitchens have significant amounts of idle cooking time when equipment is not in use. You can reduce the amount of energy used during these idle times by installing a variable frequency drive, or VFD, on exhaust vent hoods and make-up air units to vary the fan speed based on cooking demand. Exhaust hoods without a VFD use enormous amounts of energy because they operate at a high constant rate and require large amounts of replacement air to cool and heat the kitchen.

Equipment Type	Requirements	Total Hp (vent fan + make up air fan)	Standard Incentive	Good Incentive	Better Incentive	Best Incentive
Commercial vent hood with VFD	VFD installed on vent hood and make-up air unit. Total exhaust capacity ≤5,000 cfm	Contact program for eligibility	NA	NA	NA	NA

Required documentation

Please submit the following documentation to Energy Trust along with your incentive application:

- ☐ Invoices
- ☐ Cutsheets
- ☐ Mechanical schedule (or other way to verify motor horsepower)

HVAC EQUIPMENT

A large percentage of a restaurant's annual energy use is for HVAC equipment. Installing efficient HVAC equipment reduces the amount of natural gas and electricity your restaurant uses, so you save energy and money.

Equipment Type	Requirements	No. of Units	Standard Incentive	Good Incentive	Better Incentive	Best Incentive
Air Conditioning Units						
6 tons	CEE Tier 1, January 2012		$180	$198	$216	$234
7.5 tons			$225	$248	$270	$293
8.5 tons			$255	$281	$306	$332
10 tons			$300	$330	$360	$390
12.5 tons			$375	$413	$450	$488
15 tons			$450	$495	$540	$585
17.5 tons			$510	$561	$612	$663
20 tons			$600	$660	$720	$780
25 tons			$750	$825	$900	$975
Air to Air Heat Pump						
6 tons	CEE Tier 1, January 2012		$180	$198	$216	$234
7.5 tons			$225	$248	$270	$293
8.5 tons			$255	$281	$306	$332
10 tons			$300	$330	$360	$390
Economizer						
3 tons	Installed on a 3, 3.5 or 4 ton AC unit or heat pump		$210	$231	$252	$273
3.5 tons			$210	$231	$252	$273
4 tons			$210	$231	$252	$273

Total Equipment Options Selected 0

Total Incentive $ 0

ADDITIONAL INCENTIVES

Your New Buildings outreach manager can assist you in estimating incentive amounts for HVAC equipment not listed in this workbook and/or using the HVAC Calculator. Please contact them for further information.

Check to Select	Measure Description	Expected incentives
☐	HVAC equipment (AC/HP, VFD, AAHX)	
☐	DCV	
☐	Economizers	

Required documentation

Please submit the following documentation to Energy Trust along with your incentive application:

- ☐ Invoices
- ☐ Cutsheets
- ☐ Mechanical schedule and mechanical plans

EFFICIENT INTERIOR LIGHTING

Electric lighting uses a lot of energy. It is possible to cut this energy cost by installing efficient lighting equipment and controls. As an added benefit, cutting the amount of electric light your restaurant uses also reduces heat gain. This means you can use less air conditioning, and your space will be more comfortable for employees and guests.

INTERIOR LIGHTING POWER METHOD (2010 OEESC TABLE 505.5.2(A)) FROM COMCHECK				
Allowable Watts	Proposed Watts	% Better Than Code (Must be >= 10%)	Expected incentives	Required Documentation
		0%		• Invoices • ComCheck documentation • Lighting plans and lighting schedule or location • LED space lighting

ADDITIONAL INCENTIVES

If installing exterior lighting or controls beyond what is required by code, please use the New Buildings lighting calculator, available on our website.

Check to Select	Measure Description	Expected incentives	Required Documentation
☐	Exterior lighting		• Invoices • ComCheck documentation • Lighting plans and lighting schedule or location • LED space lighting
☐	Lighting controls		• Invoices • Lighting plans and lighting schedule or location

Please note: Energy Trust will conduct cost-effectiveness tests on lighting projects claiming a reduction in lighting power density, LPD, greater than 40 percent beyond what is required by code. As part of this process, we ask these projects to provide information on incremental costs. In addition, all projects that install LED products must submit additional documentation. Your outreach manager will facilitate this process and provide information and updates as necessary.

Total Equipment Options Selected 0

Total Incentive $ 0

SPECIAL MEASURES (FORM 520SM)

Special measures refer to design features that are not defined in this workbook but may qualify for incentives. Energy Trust will assess these on a case-by-case basis. Potential special measures for restaurants include:

- Energy-efficient walk-in cooler or freezer
- Gas conveyor oven
- Kitchen exhaust hood with heat recovery
- Others

Check to Select	Measure Description	Expected Incentive	Required Documentation
☐			• Pertinent schedules/contract drawings • Completed 520SM • Calculation • Incremental cost • Invoices
☐			
☐			

Total Equipment Options Selected 0

Total Incentive $ 0

INCENTIVE SUMMARY

Total number of expected equipment options	Equipment options needed to achieve next level	Expected bonus incentive tier and percentage
0	3	First tier not reached 0%

No. of equipment options	Category	Measure	Quantity	Estimated incentive
0	Cooking equipment	Convection oven	0	$ 0.00
		Hot food holding cabinet	0	$ 0.00
		Gas fryer	0	$ 0.00
		Gas griddle	0	$ 0.00
		Steam cooker	0	$ 0.00
0	Commerical dishwashers	Dishwasher - Undercounter	0	$ 0.00
		Dishwasher - Single tank door/upright	0	$ 0.00
		Dishwasher - Conveyor	0	$ 0.00
0	Hot water heating equipment	Condensing tank	0	$ 0.00
		Tankless water heater	0	$ 0.00
0	VFD on kitchen hood	VFD on kitchen hood	0	Contact program for eligibility
0	HVAC equipment	AC unit	0	$ 0.00
		Heat pump	0	$ 0.00
		HVAC - Other	0	$ 0.00
0	Economizer	Economizer	0	$ 0.00
0	DCV	DCV	0	$ 0.00
0	Lighting	Interior lighting power method	0	$ 0.00
		Exterior	0	$ 0.00
		Lighting controls	0	$ 0.00
0	Special measure	Special measure	0	$ 0.00
		Bonus	N/A	$ 0.00
		Total	0	$ 0.00

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