

# GRAND HAVEN BOARD OF LIGHT & POWER

## Commercial & Industrial Energy Efficiency Program

### 2017 Incentive Application

Ready to start your project? Follow these 3 simple steps.

#### Step #1: Request Pre-Approval

To ensure that your project is eligible and to reserve funds, please complete, sign and submit:

1. The Pre-Approval Agreement (found on page 2 of this application), completed and signed.
2. The worksheet(s) that are applicable to your project, completed (found on pages 4-10 of this application).
3. Itemized quote/proposal with model numbers from your contractor.
4. If this project is for new construction, please check the New Construction box in the Building Use section on page 2.
5. All Projects are subject to inspection before and/or after work is performed.
6. All projects must receive a reservation letter before work is performed.

#### Step #2: Complete Your Project

If your project meets the pre-approval criteria, you will receive a letter indicating funds have been reserved. Following the specifications listed in this application, install your equipment within 90 days. Applications that are not completed within 90 days from the date on the acceptance letter are subject to cancellation. All equipment must be installed and operational within 90 days of the date on the acceptance letter or by November 30, 2017, whichever date comes first.

#### Step #3: Get Your Cash Incentive

Once your project is complete, it's time to request your cash incentive. Within 30 days of project completion, you must submit:

1. The Payment Approval Agreement (found on page 3 of this application), completed and signed, and
2. The itemized invoice(s) for materials and any applicable external labor costs, including the following:
  - Contractor's name and contact information
  - Customer's name and contact information
  - Date of invoice
  - Line item cost for each product
  - Quantities of each product
  - Complete product model numbers
  - Labor (and other) expenses listed separately from product costs
  - Total invoice amount

**Please submit your documents one of three ways:**

**Fax** 517-203-0658

**Email** [energysmart@franklinenergy.com](mailto:energysmart@franklinenergy.com)

**Mail** Energy Smart – Grand Haven BLP  
1400 Abbot Road, Suite 400  
East Lansing, MI 48823



# 2017 Energy Smart Commercial & Industrial Program

## Pre-Approval Agreement

### Pre-Approval Agreement – Step #1

Please complete and submit this page, along with the appropriate worksheet(s) and quotes with model numbers from your contractor, *before you begin your project*. If you plan to install the equipment yourself (as opposed to hiring a contractor to do so), please submit a quote/proposal for the cost of the equipment from a supplier or distributor. If your project meets the pre-approval criteria, you will receive a letter indicating the funds have been reserved. You can then proceed with completing your project, as described in Step #2 on page 1 of this application.

|   |  |   |              |                                   |          |
|---|--|---|--------------|-----------------------------------|----------|
| Name of Business  |  | Phone                                   |              | Email                             |          |
| Mailing Address   |  | City                                    |              | State                             | ZIP Code |
| Installation Address  |  | City                                    |              | State                             | ZIP Code |
| Annual Hours of Operation   |  | Grand Haven BLP Electric Account Number |              | Taxpayer ID # (SSN/FEIN or Payee) |          |
| Building Use (Please Check One): <input type="checkbox"/> <b>New Construction</b><br><input type="checkbox"/> Office <input type="checkbox"/> Retail <input type="checkbox"/> Warehouse <input type="checkbox"/> Restaurant <input type="checkbox"/> Grocery Store/Supermarket<br><input type="checkbox"/> Manufacturing <input type="checkbox"/> Lodging <input type="checkbox"/> School (K-12) <input type="checkbox"/> School (College) <input type="checkbox"/> Healthcare Facility <input type="checkbox"/> Other/Miscellaneous  |  |   |              |                                   |          |
| How did you learn about the program? <input type="checkbox"/> My Utility <input type="checkbox"/> Utility Website <input type="checkbox"/> Online Ad <input type="checkbox"/> Mail/Bill Insert <input type="checkbox"/> Event <input type="checkbox"/> Contractor <input type="checkbox"/> Newspaper <input type="checkbox"/> Radio   |  |   |              |                                   |          |
| Name of Supplier/Distributor  |  |   | Contact Name |                                   |          |
| Name of Installing Contractor   |  |   | Contact Name |                                   |          |
| Address   |  | City                                    |              | State                             | ZIP Code |
| Contractor Phone  |  | Contractor Email                        |              |                                   |          |
| <b>Certifications and Signature</b><br>I hereby certify that: 1. The information contained in this application is accurate and complete. 2. All rules of this incentive application have been followed. 3. I have read and understand the Terms and Conditions included with this document. I agree to verification of equipment installation which may include a site inspection by a program or utility representative. I understand that I am not allowed to receive more than one incentive from this program on any piece of equipment. I hereby agree to indemnify, hold harmless and release the utility from any actions or claims in regard to the installation, operation and disposal of equipment (and related materials) covered herein, including liability from any incidental or consequential damages. |  |   |              |                                   |          |
| Customer Signature  |  |   |              | Date Submitted                    |          |
| Print Customer Name   |  |   |              | Estimated Completion Date         |          |

### Please submit your documents one of three ways:

**FAX**  
517-203-0658

**EMAIL**  
energysmart@franklinenergy.com

**MAIL**  
Energy Smart – Grand Haven BLP  
1400 Abbot Road, Suite 400  
East Lansing, MI 48823



## 2017 Energy Smart Commercial & Industrial Program Payment Approval Agreement

### Payment Approval Agreement – Step #3

Please complete and submit this page, along with your itemized invoice(s), within 30 days of project completion.

|   |      |                            |                               |
|---|------|----------------------------|-------------------------------|
| Name of Business  |      |                            |                               |
| Total Project Cost  |      | Total Incentives Requested | Pre-Approval Incentive Amount |
| Mailing Address   |      | City                       | State                         |
|   |      |                            | ZIP Code                      |
| Installation Address  |      | City                       | State MI                      |
|   |      |                            | ZIP Code                      |
| Print Name  | Date |                            | Installation Completion Date  |
| <b>Certifications and Signature</b><br>I certify that I am an eligible Grand Haven Board of Light & Power (Grand Haven BLP) electric utility customer and that the efficiency measures in this application were installed in this facility in 2017. I certify that I have read and complied with the Terms and Conditions of this application. By submitting this application, I understand that this facility may be inspected by employees or contractors/subcontractors of Grand Haven BLP to verify installation of any and all measures applied for in this application and that the project follows all program guidelines. |      |                            |                               |
| Customer Signature (Must Be Same Person Who Signed Pre-Approval Agreement)  |      |                            |                               |

**OPTIONAL:** Complete section below **ONLY** if incentive is to be paid to a third-party other than the customer.

|   |  |  |  |               |          |
|---|--|--|--|---------------|----------|
| Make Payable To   |  | Contact Name   |  | Contact Phone |          |
| Mailing Address   |  | City   |  | State         | ZIP Code |
| Taxpayer ID # (SSN/FEIN or Payee)   |  | Tax Status (Please Check One):<br><input type="checkbox"/> Corporation <input type="checkbox"/> Tax Exempt <input type="checkbox"/> Individual <input type="checkbox"/> Other: |  |               |          |
| Print Name  |  |  |  | Date          |          |
| <b>Certifications and Signature</b><br>I am authorizing the payment of the incentive to the third party named above, and I understand that I will not be receiving the incentive payment. I also understand that my release to a third party does not exempt me from the program requirements outlined in the Terms and Conditions. |  |  |  |               |          |
| Customer Signature (Must Be Same Person Who Signed Pre-Approval Agreement)  |  |  |  |               |          |

Please submit your documents one of three ways:

**FAX**  
517-203-0658

**EMAIL**  
energysmart@franklinenergy.com

**MAIL**  
Energy Smart – Grand Haven BLP  
1400 Abbot Road, Suite 400  
East Lansing, MI 48823



# 2017 Energy Smart Commercial & Industrial Program

## Lighting Worksheet

### Lighting Worksheet (one-for-one unit replacement)

All lighting projects are required to comply with the IESNA recommended lighting levels or local code.

| Measure                                   | Specs  | Quantity | \$ / Unit      | Total |
|---|--|----------|----------------|-------|
| <b>Screw-In Lamps</b>                     |  |          |                |       |
| CFL (less than 30W)                       | Replace an incandescent lamp with ENERGY STAR® CFL |          | \$1.50 / Lamp  |       |
| CFL (between 30W and 115W)                |  |          | \$5 / Lamp     |       |
| Specialty CFL (Dimmable, 3-Way, Flood)    |  |          | \$8 / Lamp     |       |
| LED Lamp (replacing 1–49W incandescent)   | Replace an incandescent lamp with ENERGY STAR LED  |          | \$4 / Lamp     |       |
| LED Lamp (replacing 50–79W incandescent)  |  |          | \$10 / Lamp    |       |
| LED Lamp (replacing 80–100W incandescent) |  |          | \$15 / Lamp    |       |
| LED Lamp replacing screw base CFL         |  |          | \$2 / Lamp     |       |
| LED MR16 Lamp (less than 10W)             |  |          | \$5 / Lamp     |       |
| LED PAR Lamp (less than 20W)              |  |          | \$12.50 / Lamp |       |

|                          |  |  |                   |  |
|--------------------------|--|--|-------------------|--|
| <b>Interior Fixtures</b> |  |  |                   |  |
| LED Downlight Fixture    | Replace incandescent lamped fixture with fixture designed for pin-based CFLs or LED. |  | \$20 / Fixture    |  |
| LED Exit Signs           | Replacement or retrofit of an incandescent or fluorescent exit sign with LED.        |  | \$12.50 / Fixture |  |

|  |                         |                     |                   |  |
|--|-------------------------|---------------------|-------------------|--|
| <b>Interior Linear Fluorescent Custom Lighting</b>   |                         |                     |                   |  |
| Incentives are eligible for replacement of interior linear fluorescent fixtures/retrofits (i.e.: T12 to HPT8). <b>Incentives are \$0.05/kWh and \$0.08/kWh for LED.</b><br>Payback Period must be greater than or equal to one (1) and less than or equal to eight (8) years to receive the incentive.<br>All new fixtures and retrofits must be ENERGY STAR, DesignLights Consortium®, or CEE <sup>SM</sup> listed. |                         |                     |                   |  |
| Existing Fixture:  | Watts/Fixture:          | Quantity:           |                   |  |
| Proposed Fixture:  | Watts/Fixture:          | Quantity:           |                   |  |
| <input type="checkbox"/> Check here if proposed fixture(s) are LED.  | Annual Operating Hours: |                     |                   |  |
| <b>Total:</b>  |                         | <b>Watts Saved:</b> | <b>Incentive:</b> |  |
| Existing Fixture:  | Watts/Fixture:          | Quantity:           |                   |  |
| Proposed Fixture:  | Watts/Fixture:          | Quantity:           |                   |  |
| <input type="checkbox"/> Check here if proposed fixture(s) are LED.  | Annual Operating Hours: |                     |                   |  |
| <b>Total:</b>  |                         | <b>Watts Saved:</b> | <b>Incentive:</b> |  |

|  |    |
|--|----|
| Lighting Worksheet Incentive Subtotal, page 4: | \$ |
|--|----|

*Lighting Worksheet continues on page 5.*

**Pre-Approval Not Required**  
note indicated areas



# 2017 Energy Smart Commercial & Industrial Program

## Lighting Worksheet, Continued

### Lighting Worksheet (one-for-one unit replacement)

All lighting projects are required to comply with the IESNA recommended lighting levels or local code.

| Interior Linear Fluorescent Custom Lighting  |                         |                   |
|--|-------------------------|-------------------|
| Incentives are eligible for replacement of interior linear fluorescent fixtures/retrofits (i.e.: T12 to HPT8). <b>Incentives are \$0.05/kWh and \$0.08/kWh for LED.</b><br>Payback Period must be greater than or equal to one (1) and less than or equal to eight (8) years to receive the incentive.<br>All new fixtures and retrofits must be ENERGY STAR, DesignLights Consortium®, or CEE <sup>SM</sup> listed. |                         |                   |
| Existing Fixture:  | Watts/Fixture:          | Quantity:         |
| Proposed Fixture:  | Watts/Fixture:          | Quantity:         |
| <input type="checkbox"/> Check here if proposed fixture(s) are LED.  | Annual Operating Hours: |                   |
| <b>Total:</b>  | <b>Watts Saved:</b>     | <b>Incentive:</b> |
| Existing Fixture:  | Watts/Fixture:          | Quantity:         |
| Proposed Fixture:  | Watts/Fixture:          | Quantity:         |
| <input type="checkbox"/> Check here if proposed fixture(s) are LED.  | Annual Operating Hours: |                   |
| <b>Total:</b>  | <b>Watts Saved:</b>     | <b>Incentive:</b> |
| Existing Fixture:  | Watts/Fixture:          | Quantity:         |
| Proposed Fixture:  | Watts/Fixture:          | Quantity:         |
| <input type="checkbox"/> Check here if proposed fixture(s) are LED.  | Annual Operating Hours: |                   |
| <b>Total:</b>  | <b>Watts Saved:</b>     | <b>Incentive:</b> |

| Standard Wattage Tables for Linear Fluorescent |                       |                           |                       |                               |              |
|--|-----------------------|---------------------------|-----------------------|-------------------------------|--------------|
| Existing 4 Foot Linear Fluorescent Fixtures    |                       |                           |                       |                               |              |
|  | T8 F32                | T12 F40<br>34W Mag        | T12 F48<br>40W Mag    | T5 F28                        | T5 F54<br>HO |
| 1 Lamp   | 30                    | 43                        | 51                    | 33                            | 59           |
| 2 Lamp   | 59                    | 72                        | 82                    | 63                            | 117          |
| 3 Lamp   | 88                    | 115                       | 133                   | 96                            | 179          |
| 4 Lamp   | 115                   | 144                       | 164                   | 126                           | 234          |
| 6 Lamp   | 162                   | 216                       | 266                   | 192                           | 351          |
| 8 Lamp   | 230                   | 288                       | 328                   | 252                           | 468          |
| 10 Lamp  | 295                   | 360                       | 410                   | 315                           | 585          |
| 12 Lamp  | 345                   | 460                       | 492                   | 384                           | 702          |
| Existing 8 Foot Linear Fluorescent Fixtures    |                       |                           |                       |                               |              |
|  | T12 Mag<br>(60W lamp) | T12 Mag STD<br>(75W lamp) | T12 Mag<br>(95W lamp) | T12 HO Mag STD<br>(110W lamp) |              |
| 1 Lamp   | 75                    | -                         | 112                   | -                             |              |
| 2 Lamp   | 128                   | 173                       | 227                   | 257                           |              |
| Existing U Lamp Fixtures                       |                       |                           |                       |                               |              |
|  | T8 FU32               |                           | T12 FU40              |                               |              |
| 1 Lamp   | 29                    |                           | 43                    |                               |              |
| 2 Lamp   | 55                    |                           | 63                    |                               |              |
| 3 Lamp   | 81                    |                           | 115                   |                               |              |
| Existing 2 Foot Fluorescent Fixture            |                       |                           |                       |                               |              |
|  | T8 F17                |                           | T12 F20               |                               |              |
| 1 Lamp   | 18                    |                           | 25                    |                               |              |
| 2 Lamp   | 33                    |                           | 50                    |                               |              |
| 3 Lamp   | 47                    |                           | 71                    |                               |              |
| 4 Lamp   | 59                    |                           | 100                   |                               |              |

|   |           |
|---|-----------|
| <b>Lighting Worksheet Incentive Subtotal, page 5:</b> | <b>\$</b> |
|---|-----------|

*Lighting Worksheet continues on page 6.*



# 2017 Energy Smart Commercial & Industrial Program

## Lighting Worksheet, Continued

### Lighting Worksheet continued

All lighting projects are required to comply with the IESNA recommended lighting levels or local code.

| Interior Lighting — All High Bay Lighting, 15 feet and above for ceiling height   |                     |                   |
|---|---------------------|-------------------|
| Incentives are eligible for replacing High Bay Fixtures with interior High Bay Linear Fluorescent (T5/T8), Induction or LED. Existing wattages used must come off of the Standard Wattage Table below. <b>Incentive is \$0.30 per Watt Reduced.</b> |                     |                   |
| Existing Fixture:   | Watts/Fixture:      | Quantity:         |
| Proposed Fixture:   | Watts/Fixture:      | Quantity:         |
| <b>Total:</b>   | <b>Watts Saved:</b> | <b>Incentive:</b> |
| Existing Fixture:   | Watts/Fixture:      | Quantity:         |
| Proposed Fixture:   | Watts/Fixture:      | Quantity:         |
| <b>Total:</b>   | <b>Watts Saved:</b> | <b>Incentive:</b> |

| Exterior Lighting  |                     |                   |
|--|---------------------|-------------------|
| Incentives are eligible for the replacement or retrofit of an exterior fixture with an induction, LED, or T8/T5 linear fluorescent fixtures which have a reduced input wattage of at least 40%. Incentives are per fixture and are based on the nominal lamp wattage of the original fixture. Incentive is for fixtures that operate less than 24 hours per day. Existing wattages must come off of the Standard Wattage Table below. <b>Incentive is \$0.35 per Watt Reduced.</b> |                     |                   |
| Existing Fixture:  | Watts/Fixture:      | Quantity:         |
| Proposed Fixture:  | Watts/Fixture:      | Quantity:         |
| <b>Total:</b>  | <b>Watts Saved:</b> | <b>Incentive:</b> |
| Existing Fixture:  | Watts/Fixture:      | Quantity:         |
| Proposed Fixture:  | Watts/Fixture:      | Quantity:         |
| <b>Total:</b>  | <b>Watts Saved:</b> | <b>Incentive:</b> |

| 24 Hour Lighting   |                     |                   |
|--|---------------------|-------------------|
| Incentives are eligible for the replacement or retrofit of a fixture with an induction, LED, or T8/T5 linear fluorescent fixtures which have a reduced input wattage of at least 40%. Incentives are per fixture and are based on the nominal lamp wattage of the original fixture. Incentives are available for fixtures that operate 24 hours per day. Existing wattages must come off of the Standard Wattage Table below. <b>Incentive is \$0.60 per Watt Reduced.</b> |                     |                   |
| Existing Fixture:  | Watts/Fixture:      | Quantity:         |
| Proposed Fixture:  | Watts/Fixture:      | Quantity:         |
| <b>Total:</b>  | <b>Watts Saved:</b> | <b>Incentive:</b> |
| Existing Fixture:  | Watts/Fixture:      | Quantity:         |
| Proposed Fixture:  | Watts/Fixture:      | Quantity:         |
| <b>Total:</b>  | <b>Watts Saved:</b> | <b>Incentive:</b> |


| Standard Wattage Table |         |               |         |                |         |
|------------------------|---------|---------------|---------|----------------|---------|
| Fixture                | Wattage | Fixture       | Wattage | Fixture        | Wattage |
| HID 50W                | 61      | F32T8 4-lamp  | 142     | Induction 50W  | 54      |
| HID 75W                | 95      | F32T8 6-lamp  | 224     | Induction 80W  | 86      |
| HID 100W               | 120     | F32T8 8-lamp  | 299     | Induction 100W | 105     |
| HID 150W               | 174     | F32T8 10-lamp | 366     | Induction 120W | 126     |
| HID 175W               | 194     | F32T8 12-lamp | 448     | Induction 150W | 158     |
| HID 200W               | 230     | T5HO 4-lamp   | 243     | Induction 200W | 210     |
| HID 250W               | 290     | T5HO 6-lamp   | 365     | Induction 250W | 263     |
| HID 400W               | 455     | T5HO 8-lamp   | 486     | Induction 300W | 320     |
| HID 750W               | 850     | T5HO 10-lamp  | 608     | Induction 400W | 440     |
| HID 1000W              | 1080    | T5HO 12-lamp  | 730     |                |         |

|   |    |
|---|----|
| Lighting Worksheet Incentive Subtotal, page 6:      | \$ |
| Lighting Worksheet Incentive Subtotal, page 5:      | \$ |
| Lighting Worksheet Incentive Subtotal, from page 4: | \$ |
| <b>Lighting Worksheet Incentive TOTAL:</b>          | \$ |



Controls Worksheet

| Measure                                      | Specifications   | Quantity | \$ / Unit           | Total |
|--|--|----------|---------------------|-------|
| <b>HVAC Controls</b>                         |  |          |                     |       |
| Programmable Thermostat (Gas Heat)           | Must control central AC and replace a non-programmable thermostat.   |          | \$20 / Unit         |       |
| Building Temperature Controls                | Must control central AC and replace a non-programmable building management system. The new system must offer time of day controls and a minimum temperature setback of 8 degrees (heating/cooling).  |          | \$45 / 1,000 sq ft  |       |
| Optimized Snow Melt Controls                 | Snow melt system must shut down completely when no precipitation is present. Controller must monitor forecasts and raise the slab temperature to 32 degrees F eight hours before expected precipitation. A slab moisture sensor must be used to signal controller to raise slab temperature to 40 degrees F when precipitation is present. |          | \$9 / 1,000 sq ft   |       |
| Occupancy Sensor Control for HVAC            | Installation of new controls to an existing EMS system which automatically switched the HVAC system to occupied and unoccupied mode based on occupancy sensors. Provide wiring schematic at the time of submitting pre-approval.   |          | \$30 / 1,000 sq ft  |       |
| Constant Volume AHU to VAV                   | Converting constant volume air handling system to a variable air volume. Must have reheat and supply at least four zones.  |          | \$450 / 1,000 sq ft |       |
| Air Side Economizer                          | Available for air handling units supplying air conditioning which have inoperable economizer controls.   |          | \$10 / 1,000 sq ft  |       |
| Critical Zone Reset Control                  | Available for existing VAV air handling systems which add critical zone reset (static pressure reset) controls. At a minimum, airflow at each VAV box must be monitored and adjust control sequences must be in accordance to ASHRAE 90.1.   |          | \$15 / 1,000 sq ft  |       |
| Hotel GREM Controls - A/C with Electric Heat | For sensors which automatically control HVAC equipment. Incentive is for new controls only and is offered per room installed.  |          | \$65 / Unit         |       |
| Hotel GREM Controls - A/C with Gas Heat      |  |          | \$10 / Unit         |       |

|  |  |  |                      |  |
|--|--|--|----------------------|--|
| <b>Computer Controls</b>   |  |  |                      |  |
|  Network Power Management Software | New installation must allow centralized control at the server level of the power management settings (sleep mode and shutdown) of desktop computers on a distributed network and must report energy savings. |  | \$10 / PC controlled |  |

|  |  |  |                |  |
|--|--|--|----------------|--|
| <b>Lighting Controls</b>               |  |  |                |  |
| Occupancy Sensors which control ≤ 500W | Sensors which automatically turn lights on when occupancy is detected and automatically turn lights off when no movement is detected after a set length of time. Cannot be used in conjunction with instant start ballast.                           |  | \$20 / Sensor  |  |
| Occupancy Sensors which control > 500W |  |  | \$50 / Sensor  |  |
| Daylight Harvesting Sensor             | The controls can be on/off, stepped or dimming and must vary the light output based on the level of sunlight received. The floor plan and control schedule must be submitted. Cannot be used with occupancy sensor.                                  |  | \$0.09 / sq ft |  |
| Central Lighting Control               | For systems that utilize building automation to control the lights based on a set schedule. Incentive for occupancy sensors or daylight sensor controls cannot be received on the same fixtures. Control schedule and floor plans must be submitted. |  | \$0.06 / sq ft |  |

|   |    |                  |          |   |
|---|----|------------------|----------|---|
| <b>Variable Frequency Drives (VFD)</b>  |    |                  |          |   |
| Drives must be used in pumping or air handling applications related to HVAC or for process pumping applications. VFDs must be automatically controlled by a variable signal and have load diversity that will result in savings through motor speed variation. Redundant unit, back-up units and replacements of existing VFDs do not qualify. For the HVAC Fan and HVAC Pump incentives, the motor size must be ≤ 100 HP and the annual hours must be > 1,800 hours. For the Process Pump incentive, the motor size must be ≤ 50 HP and the annual hours must be > 2,000 hours. All other VFD projects will be calculated as a custom project (see page 10). |    |                  |          |   |
| VFD Application<br>(HVAC Fan, HVAC Pump or Process Pump)  | HP | Incentive Per HP | Quantity | Incentive Total<br>(HP x Incentive x Qty) |
|   |    | \$60.00 / HP     |          |   |
|   |    | \$60.00 / HP     |          |   |
|   |    | \$60.00 / HP     |          |   |

|  |           |
|--|-----------|
| <b>Controls Worksheet Incentive TOTAL:</b> | <b>\$</b> |
|--|-----------|



# 2017 Energy Smart Commercial & Industrial Program

## Compressed Air Worksheet

### Compressed Air Worksheet

| Measure   | Specs   | Quantity | \$ / Unit      | Total |
|---|---|----------|----------------|-------|
| <b>Compressed Air Equipment</b>   |   |          |                |       |
| VSD Air Compressor ( $\leq 300$ HP)   | Replacement of constant speed compressor with rotary screw compressor controlled by a VSD.                                |          | \$100 / HP     |       |
| Refrigerated Cycling Thermal Mass Air Dryer   | Available for replacing a non-cycling refrigerated air dryer of equal capacity.   |          | \$1 / SCFM     |       |
| Variable Speed Air Dryer  |   |          | \$1.50 / SCFM  |       |
| Dew-Point Sensor Control for Desiccant Dryer  | Available for replacing a desiccant dryer without a dew point sensor with a desiccant dryer with a dew point sensor.      |          | \$5 / SCFM     |       |
|  Engineered Nozzles | A new compressed air nozzle installed on an open pipe or tube.  |          | \$100 / Nozzle |       |
| Flow Controller   | The actual air compressor discharge pressure set point must be reduced by 5 psig, must be a minimum of 50 horsepower.     |          | \$1.50 / HP    |       |
| Variable Displacement Air Compressor  | New variable displacement screw compressor replacing a screw compressor with modulating or load/no load control.          |          | \$35 / HP      |       |
| Desiccant to Refrigerated Air Dryer   | New externally heated or blower purge air dryer replacing a desiccant dryer. Not allowed on inlet modulating compressors. |          | \$4 / SCFM     |       |
| Heat of Compression Air Dryer   | Waste heat from oil-free air compressor used to regenerate desiccant dryer.   |          | \$4 / SCFM     |       |
| Compressed Air Storage Tank   | Existing system must have less than 3 gal/cfm of storage. New storage tank must offer $\geq 5$ gal/cfm of storage.        |          | \$30 / CFM     |       |
| Air Compressor Outside Air Intake   | Ducted outside air must provide compressed air supply.  |          | \$8.50 / HP    |       |
| Low Pressure Drop Air Filters for Compressed Air  | New low pressure drop filter (PSID $\leq 1$ initial differential) replacing a standard coalescing filter.                 |          | \$5 / HP       |       |
| No-loss Drains – Compressed Air   | Replacing manual or timer drains.   |          | \$150 / Drain  |       |

| Measure  | Specs      | Quantity | \$ / Unit | Total |
|--|------------|----------|-----------|-------|
| <b>Compressed Air Energy Audit and Leak Reduction</b>  |            |          |           |       |
| <p>Incentives are available for <b>the repair of a minimum of 50% of leaks documented in a leak audit</b> of a compressed air system which was performed by a qualified, independent contractor. The leak repairs can be completed by the customer or the contractor. The customer is responsible for presenting pre-approval evidence for needed leak repairs through a qualified compressed air audit and a spreadsheet which details each leak location, estimated leak volume and date of inspection. Upon completion of project, customer is responsible for presenting evidence of completed leak repair through leak repair tags and a spreadsheet detailing location, date of repair, leak volume repaired and person who completed each repair. Leak repair tags are expected to be left in place for a minimum of 30 days should a program personnel request a site visit for a post inspection and repair verification.</p> <p style="text-align: center;"><b>No leak reduction repairs can be started before written pre-approval is received.</b></p> |            |          |           |       |
| Compressed Air Leak Audit <b>AND</b> Repair of 50% of Documented Leaks   | See above. |          | \$15 / HP |       |

|  |           |
|--|-----------|
| <b>Compressed Air Worksheet Incentive TOTAL:</b> | <b>\$</b> |
|--|-----------|







**Mechanical Worksheet**

| Measure  | Specs       | Tons     | Quantity | \$ / Unit          | Total |
|--|-------------|----------|----------|--------------------|-------|
| <b>Central Packaged/Split System Replacement</b> |             |          |          |                    |       |
| Air Conditioning/ Heat Pump                      | < 5.4 Tons  | 14 SEER  |          | \$8 / (Tons x Qty) |       |
|  | < 20 Tons   | 12 EER   |          | \$8 / (Tons x Qty) |       |
|  | < 63.3 Tons | 10.3 EER |          | \$8 / (Tons x Qty) |       |
|  | > 63.3 Tons | 9.7 EER  |          | \$8 / (Tons x Qty) |       |

| Measure                         | Specs      | Tons                                  | Quantity | \$ / Unit  | Total |
|---------------------------------|------------|---------------------------------------|----------|------------|-------|
| <b>HVAC Chiller Replacement</b> |            |                                       |          |            |       |
| Air-Cooled                      | All Sizes  | ≤ 1.2 kW/Ton Full Load                |          | \$30 / Ton |       |
| Water-Cooled                    | < 150 Tons | ≤ 0.79 kW/ton & 0.49 kW/Ton Part Load |          | \$30 / Ton |       |
|                                 | < 300 Tons | ≤ 0.63 kW/ton & 0.44 kW/Ton Part Load |          | \$30 / Ton |       |
|                                 | > 300 Tons | ≤ 0.58 kW/ton & 0.44 kW/Ton Part Load |          | \$30 / Ton |       |

| Measure  | Specs  | Quantity             | \$ / Unit            | Total |
|--|--|----------------------|----------------------|-------|
| <b>Miscellaneous Equipment</b>                   |  |                      |                      |       |
| High-Frequency Battery Charger (Fork Lifts Only) | Minimum power conversion efficiency of 92%. Must replace either an existing Ferroresonant or a silicon controlled rectifier (SCR) charger. | Qty:<br># of Shifts: | \$100 / Unit / Shift |       |

| Measure                                   | Specs  | Quantity | \$ / Unit    | Total |
|---|--|----------|--------------|-------|
| <b>HVAC Chiller Maintenance</b>           |  |          |              |       |
| Air-Cooled & Water-Cooled Chiller Tune-Up | Chiller must be > 20 Tons. Eligible every 2 years. |          | \$350 / Unit |       |
| Condenser Coil Cleaning                   | Eligible every 3 years.                            |          | \$1 / Ton    |       |
| Cogged Belt Drive                         | Cogged belt replacing standard V-shaped belt.      |          | \$5 / HP     |       |
| Synchronous Belt Drive                    | Synchronous belt replacing standard V-shaped belt. |          | \$9 / HP     |       |

|  |  |  |  |    |
|--|--|--|--|----|
| <b>Mechanical Worksheet Incentive TOTAL:</b> |  |  |  | \$ |
|--|--|--|--|----|



## 2017 Energy Smart Commercial & Industrial Program

### Commercial Kitchen / Retail Worksheet

### Commercial Kitchen / Retail Worksheet

| Measure  | Specs       | Quantity | Product Information | \$ / Unit    | Total |
|--|-------------|----------|---------------------|--------------|-------|
| <b>Commercial Kitchen Systems</b>  |             |          |                     |              |       |
| ENERGY STAR® Steam Cooker  | ENERGY STAR |          | # of pans:          | \$600 / Unit |       |
| ENERGY STAR Commercial Refrigerator<br><i>Check one:</i> <input type="checkbox"/> Solid Door <input type="checkbox"/> Glass Door | ENERGY STAR |          | ft <sup>3</sup>     | \$100 / Unit |       |
| ENERGY STAR Commercial Freezer<br><i>Check one:</i> <input type="checkbox"/> Solid Door <input type="checkbox"/> Glass Door      | ENERGY STAR |          | ft <sup>3</sup>     | \$100 / Unit |       |
| ENERGY STAR Ice Machine  | ENERGY STAR |          | lbs/day             | \$400 / Unit |       |
| ENERGY STAR Fryer  | ENERGY STAR |          |                     | \$80 / Unit  |       |
| ENERGY STAR Hot Holding Cabinets   | ENERGY STAR |          | Size:               | \$200 / Unit |       |
| ENERGY STAR Dishwasher   | ENERGY STAR |          |                     | \$600 / Unit |       |

| Measure                                 | Specs  | Quantity | \$ / Unit              | Total             |
|---|--|----------|------------------------|-------------------|
| <b>Commercial Refrigeration Systems</b> |  |          |                        |                   |
| LED Grocery Case Lighting               | Replace T12 or T8 with LED lighting.   |          | \$35 / Door            |                   |
| Occupancy Sensor for LED Case Lighting  | Sensors which automatically turn on LED cooler lighting when motion is detected.   |          | \$10 / Door            |                   |
| Walk-In or Case Cooler/Freezer ECM      | Replacement of PSC or shaded pole motors with an ECM motor.  |          | \$50 / Motor           |                   |
| Cooler Strip Curtains                   | Installation of new curtains isolating a cold storage area.  |          | \$5 / ft <sup>2</sup>  |                   |
| Freezer Strip Curtains                  | Installation of new curtains isolating a freezer storage area.   |          | \$25 / ft <sup>2</sup> |                   |
| Cooler/Freezer Door Gaskets             | Installation of new gaskets to reduce air infiltration on a cooler or freezer door.  |          | \$3 / Linear Foot      |                   |
| Cooler Night Covers                     | Vertical covers designed for refrigerated display cases. Incentive is based on linear length of cooler and the time per day covers are used. | Ft       | Hr                     | \$1 / Foot / Hour |
| Anti-Sweat Heater Controls              | Controls which monitor relative humidity and turn off anti-sweat heaters when appropriate.   |          | \$80 / Door            |                   |
| High Speed Door (Cooler-Dock)           | High speed door replacing strip curtains between a cooler space and dock space.  |          | \$15 / Door            |                   |
| High Speed Door (Cooler-Freezer)        | High speed door replacing strip curtains between a cooler space and freezer space.   |          | \$70 / Door            |                   |
| High Speed Door (Freezer-Dock)          | High speed door replacing strip curtains between a freezer space and dock space.   |          | \$145 / Door           |                   |

| Measure   | Specs   | Quantity | \$ / Unit   | Total |
|---|---|----------|-------------|-------|
| <b>Miscellaneous Equipment</b>                          |   |          |             |       |
| Vending Machine Controller (For Cold Beverage Machines) | Retrofitting existing vending machines with beverage vending machine controllers. Must include a passive infrared occupancy sensor to turn off fluorescent lights and vending machine systems when surrounding area is unoccupied for 15 minutes or longer. Control logic should power on the machine at a minimum of every 2 hours to maintain proper product temperature. |          | \$50 / Unit |       |
| Low-Flow Pre-Rinse Sprayer (Electric Water Heat Only)   | Low-flow pre-rinse sprayer using less than 1.6 gallons per minute. Must replace a sprayer which uses 2.2 gallons per minute or more. Electric water heat only.  |          | \$25 / Unit |       |

|   |           |
|---|-----------|
| <b>Commercial Kitchen / Retail Worksheet Incentive TOTAL:</b> | <b>\$</b> |
|---|-----------|



### Custom Worksheet

These incentives are available to customers for energy-saving measures that are not covered by the prescriptive portion of the program. Custom incentives are based on the first-year energy (kWh) savings.

|  |   |
|--|---|
| When applying for pre-approval of a custom project, you <b>must</b> submit the following items: <ol style="list-style-type: none"> <li>1. Completed and signed Pre-Approval Agreement (page 2)</li> <li>2. Completed Custom Worksheet (below)</li> <li>3. Itemized quote/proposal for all related materials and any external labor</li> <li>4. Manufacturer's specification sheets for all equipment</li> <li>5. Custom calculations detailing the estimated energy savings</li> </ol> | <b>Custom Incentive Rate</b><br><b>\$0.08 / kWh</b> |
|--|---|

| Custom Project – Item 1 |                |                                 |
|-------------------------|----------------|---------------------------------|
| Before Retrofit         | After Retrofit | Electric Rate (\$ / kWh):<br>\$ |
|                         |                | Calculated Annual kWh Savings:  |
|                         |                | Project Cost:<br>\$             |
|                         |                | Payback Period*:                |
|                         |                | Calculated Incentive:<br>\$     |

\* Payback Period must be greater than or equal to one (1) and less than or equal to eight (8) years to receive the incentive.

$$\text{Payback period} = \frac{\text{Incremental Measure Cost}}{(\text{Annual kWh Saved} \times \text{Electricity Rate})}$$

| Custom Project – Item 2 |                |                                 |
|-------------------------|----------------|---------------------------------|
| Before Retrofit         | After Retrofit | Electric Rate (\$ / kWh):<br>\$ |
|                         |                | Calculated Annual kWh Savings:  |
|                         |                | Project Cost:<br>\$             |
|                         |                | Payback Period*:                |
|                         |                | Calculated Incentive:<br>\$     |

|  |                                   |    |
|--|-----------------------------------|----|
|  | <b>Total Custom Measure Cost:</b> | \$ |
| <b>Custom Worksheet Incentive TOTAL:</b><br>(Cannot exceed 50% of the total custom project cost) |                                   | \$ |

Note: Customer acknowledges and agrees that Customer cannot apply for, nor receive, incentives for the same product, equipment or service from more than one utility unless there are both electric and gas savings.



### Terms and Conditions

1. **Eligibility:** These incentives are offered by your Energy Smart utility to commercial and industrial electric customers installing energy efficient equipment only. For questions regarding eligibility, call 877-674-7281.
2. **Incentive Offer:** Energy efficient equipment subject to incentive from your Energy Smart utility must be installed and operational by November 30, 2017. Applicant has 90 days from the date of the acceptance letter to complete the proposed project. Applications that are not completed within 90 days are subject to cancellation. Additionally, invoice(s) related to the equipment upgrade must be submitted to Energy Smart within 30 calendar days of installation (completion) and no later than November 30, 2017. Please keep a copy for your records. Incentives are calculated based on prescriptive incentive rates and shall not exceed the total cost of equipment, labor, and other associated project costs.
3. **Project Documentation Requirements:** Customer will have to provide your Energy Smart utility with the documentation as listed in the instructions (page 1). If Customer does not provide the required project documents to Energy Smart at pre-approval and payment stages, the project may be disqualified from the program. The project may also be disqualified if pre-approval is not received, unless otherwise noted on the application.
4. **Energy Efficiency Improvement Qualifications:** Increased energy efficiency resulting from peak shaving, demand limiting, or operating schedule changes does not qualify. To qualify, lighting equipment must have a planned minimum usage of 1,800 hours per year. Non-lighting equipment must have a planned minimum usage of 1,500 hours per year. If Customer's equipment does not meet required usage hours per year, an incentive cannot be offered. If Customer has questions or concerns about above qualifications, Customer may contact Energy Smart to discuss.
5. **Incentive Limit:** Prescriptive and Custom project applications may receive or cumulate a maximum of \$20,000 combined per electric meter each calendar year. Incentives for measures can be up to 100% for Prescriptive projects and 50% for Custom projects of the total project cost of a specific measure but shall not exceed the incentives set by the your Energy Smart utility for each measure on the application Worksheet(s).
6. **Compliance:**
  - a. All projects must comply with applicable federal, state and local laws.
  - b. All equipment must be new or retrofitted with new components.
  - c. The purchase and installation of used equipment is not eligible for incentives. Existing equipment must be removed and/or permanently disconnected.
  - d. Equipment must meet specification requirements as defined in application Worksheets and Equipment Guidelines.
7. **Payment:** Approved Final Applications will receive payment within 45 calendar days of signed payment approval. Incomplete applications will either delay payments or result in denial of application approval. Your Energy Smart utility reserves the right to refuse payment and disqualify Customer from participating in the program if the customer or their contractor violates any program Terms and Conditions. The qualified equipment must be installed and operating for the rated life of the product(s) or for a period of three (3) years from receipt of rebate, whichever is more. If the qualified equipment is removed or replaced with less efficient equipment, or if Customer ceases to be a customer of your Energy Smart utility during the three (3) years, Customer shall refund a prorated amount of rebate dollars based on the time installed within thirty (30) days of receipt of notice from your Energy Smart utility.
8. **Inspection:** Energy Smart staff may conduct inspection(s) of the project site to survey existing conditions and/or newly installed equipment.
9. **Publicity:** Your Energy Smart utility reserves the right to publicize Customer's participation in this program, unless Customer specifically requests in writing otherwise.
10. **Program Discretion:** Incentives are available on a first-come, first-served basis. Incentive amounts and offerings are subject to change and/or termination without notice and at the discretion of your Energy Smart utility.
11. **Disclaimers:** Your Energy Smart utility:
  - a. does not endorse any particular manufacturer, product, labor or system design by offering this program;
  - b. is not responsible for any tax liability imposed on the customer as a result of the payment of incentives. Your Energy Smart utility is tax exempt;
  - c. does not expressly or implicitly warrant the performance of installed equipment or contractor's quality of work (contact your contractor for detailed warranties);
  - d. is not responsible for the proper disposal/recycling of any waste generated as a result of this project;
  - e. is not liable for any damage caused by the installation of the equipment and/or for any damage caused by the malfunction of the installed equipment.
12. **Indemnification:** Customer shall, to the fullest extent permitted by law, indemnify and hold harmless your Energy Smart utility, and their officers, agents and employees harmless from and against all losses and litigation expenses arising out of or resulting from the performance of work hereunder and caused, in whole or part, by any act or omission of Contractor. Your Energy Smart utility shall further be entitled to all cost (which include both internal and external) incurred in the process of enforcing this or any other provision under this Agreement. This provision is not intended and is not to be construed as a waiver of the defense of governmental immunity otherwise available nor is it construed as a waiver of the defense of governmental immunity otherwise available nor is it intended to grant third party beneficiary status to any person or entity.
13. **Governing Law:** This agreement is construed in accordance with Michigan law, without regard to conflict of laws, provisions, and venue is in Ottawa County, Michigan.
14. **Intellectual Property:** No rights in copyright, patents, trademarks, trade secrets, or other intellectual property are granted to contractor and/or subcontractor except as expressly provided under these Terms. Contractor and/or subcontractor will not register or use any mark and/or internet domain name that contains any Energy Smart intellectual property.