

Eco Clean Burner Corporation

Converting Waste Plastic to Clean Energy

Commercialization Priorities

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Gerald Driggs and Steve Taylor

ABOUT US

Eco Clean Burner Corporation

1. Business Sector: *Alternative Energy*
2. Current Status: *Start-up; early stage growth; commercialization*
3. Location: *Pittsburgh, PA (Sharpsburg – ARTEZ economic zone)*
4. Priorities: *Raise investment capital; secure early adopters*
5. Technology: *Operational prototype; emission testing completed; UL certification underway; exclusive North American license.*

BUSINESS BASICS

10 steps to
commercializing
an alternative
clean energy
product

1. Define Big Idea
2. Determine Opportunity
3. Create Product or Service
4. Target Customer
5. Penetrate Market
6. Declare Value Proposition
7. Create Awareness
8. Operate Business
9. Distribute Product
10. Support Customers

BUSINESS BASICS

Whoops! This assumes some things are in place.....

1. Defensible Business Plan
2. Capital Budget
3. Adequate Capital
4. Management Team
5. Operating Budget
6. Definition of Success

STEP #1

Define the **BIG IDEA**

Convert waste plastic to energy.

Commercialize a pioneering combustion and burner technology that uses waste plastic as its fuel source.



BIG IDEA

continued

The combustion technology provides this \$10 billion market the first commercially viable application that uses waste plastic as a clean and efficient fuel source.

- Create heat: that is used in traditional commercial boiler systems
- Create electricity: using steam driven generators
- Create savings: 30% cheaper than natural gas, heating oil and coal.
- Burn Clean: EPA testing shows burns cleaner than oil and coal and as clean as natural gas.
- Divert Waste: 2000 tons of waste plastic diverted from landfills each year.

Step #2

Determine the Opportunity

Businesses develop to satisfy:

- **NEED:** something that is essential to the survival of a person, family, business or community.
- **DESIRE:** something that an individual wants to have for pleasure, self esteem, or personal value.
- **REQUIREMENT:** something that is mandated, obligated, or otherwise required by an authority.

OPPORTUNITY continued

A unique combination of need, desire and requirement exist in the clean energy sector.

- **NEED:** low cost, clean energy alternatives are no longer optional.
- **NEED:** demand for alternative clean energy is outstripping supply.
- **NEED:** Americans generate 10.5 million tons of plastic waste a year but recycle only 2 or 3 %.
- **NEED:** waste plastic is choking landfills.

OPPORTUNITY continued

- **DESIRE:** markets for energy efficiency improvements have huge potential. For example, demands for commercial building efficiency in the United States could reach a cumulative total of \$160 billion by 2030.
- **DESIRE:** Americans generate 10.5 million tons of plastic waste a year but recycle only 2 or 3 %.
- **DESIRE:** Businesses are incented to reduce use of fossil fuels; sell back electricity to the grid; and invest in clean energy alternatives.

OPPORTUNITY

continued

Green

initiatives are being required by government, by large private and public institutions and by businesses.

- **REQUIRED:** federal and state-level legislation promotes, and even mandates, green building standards at the regional and local levels.
- **REQUIRED:** institutions are mandating reduction in the use of coal.
- **REQUIRED:** businesses are instituting sustainability initiatives.

OPPORTUNITY

continued

The unique combination of need, desire and requirement produce a substantial market opportunity.

- Conservative estimates show a total annual market potential of \$10 billion
- ECB 5-year business plan projections show gross sales growing from \$1.2 million in year one to \$25 million in year five
- Sweet spots: \$5 million to \$50 million small businesses with established green initiatives; NGOs; NPOs; and all businesses producing waste plastic in the course of doing business.

Step #3

Create viable products.

Eco Clean Burner Corporation manufactures and sells two related products.

- **Burners**: proven and innovative combustion technology used to create heat (energy) to drive commercial and industrial boiler systems and steam to drive generators to produce electricity.
- **Fuel**: selected waste plastic that is processed and granulated into a clean-burning, consumable fuel source that generates high margin recurring income.

PRODUCTS

The Eco Clean solution is a clean energy source in that it can be retrofitted into 90% of existing commercial hot water heating systems with minimal disruption.



PRODUCT

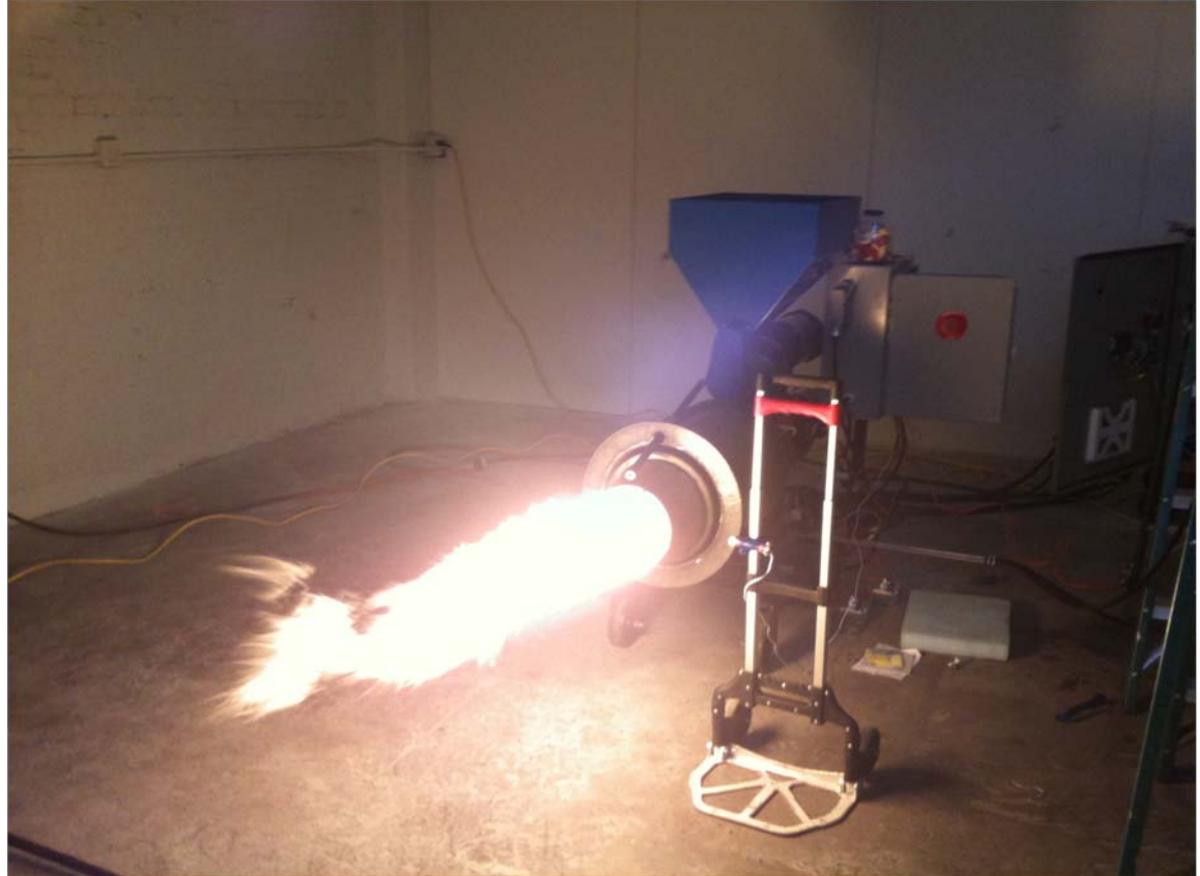
continued

400,000 and 800,000 Btu units operational

1.2 million Btu units in development

Six years of research and development in the technology

Partnered with Penn State University – 5 yrs.



PRODUCT

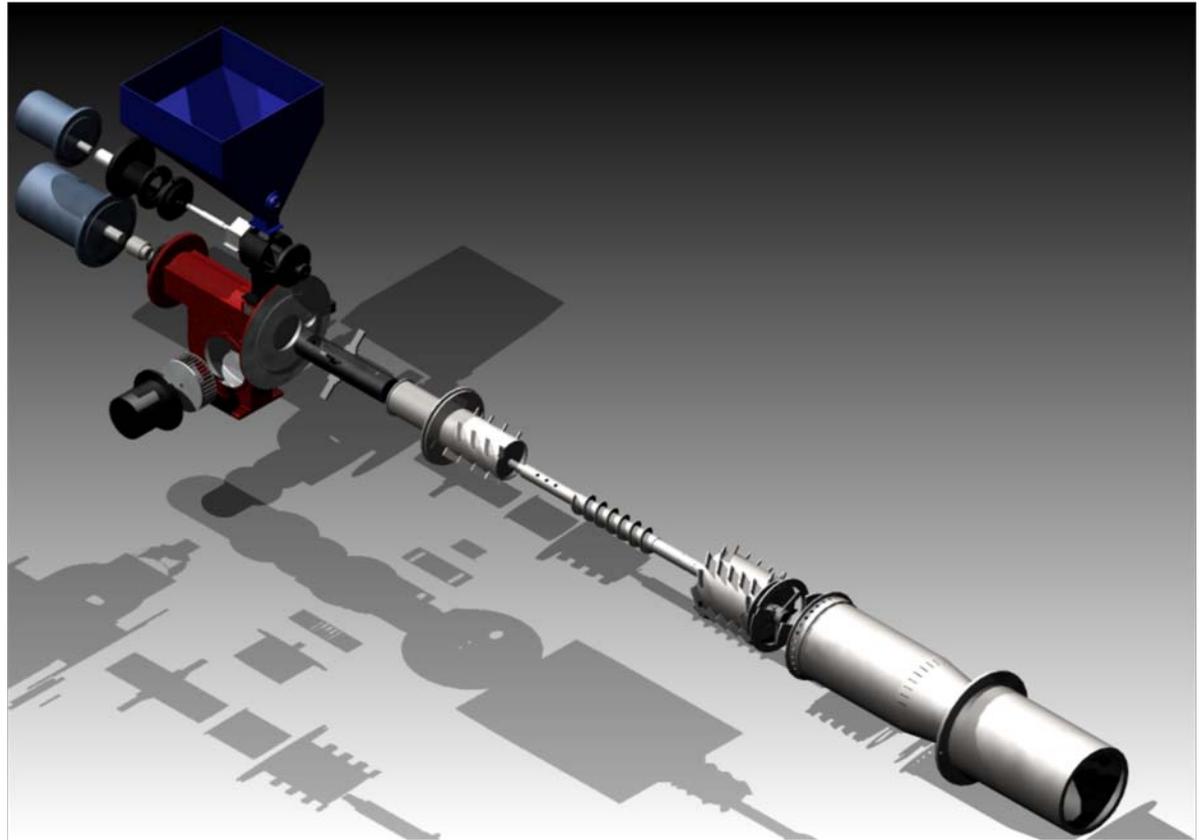
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IP PROTECTED

EPA emissions tests show
no containments; no
residue

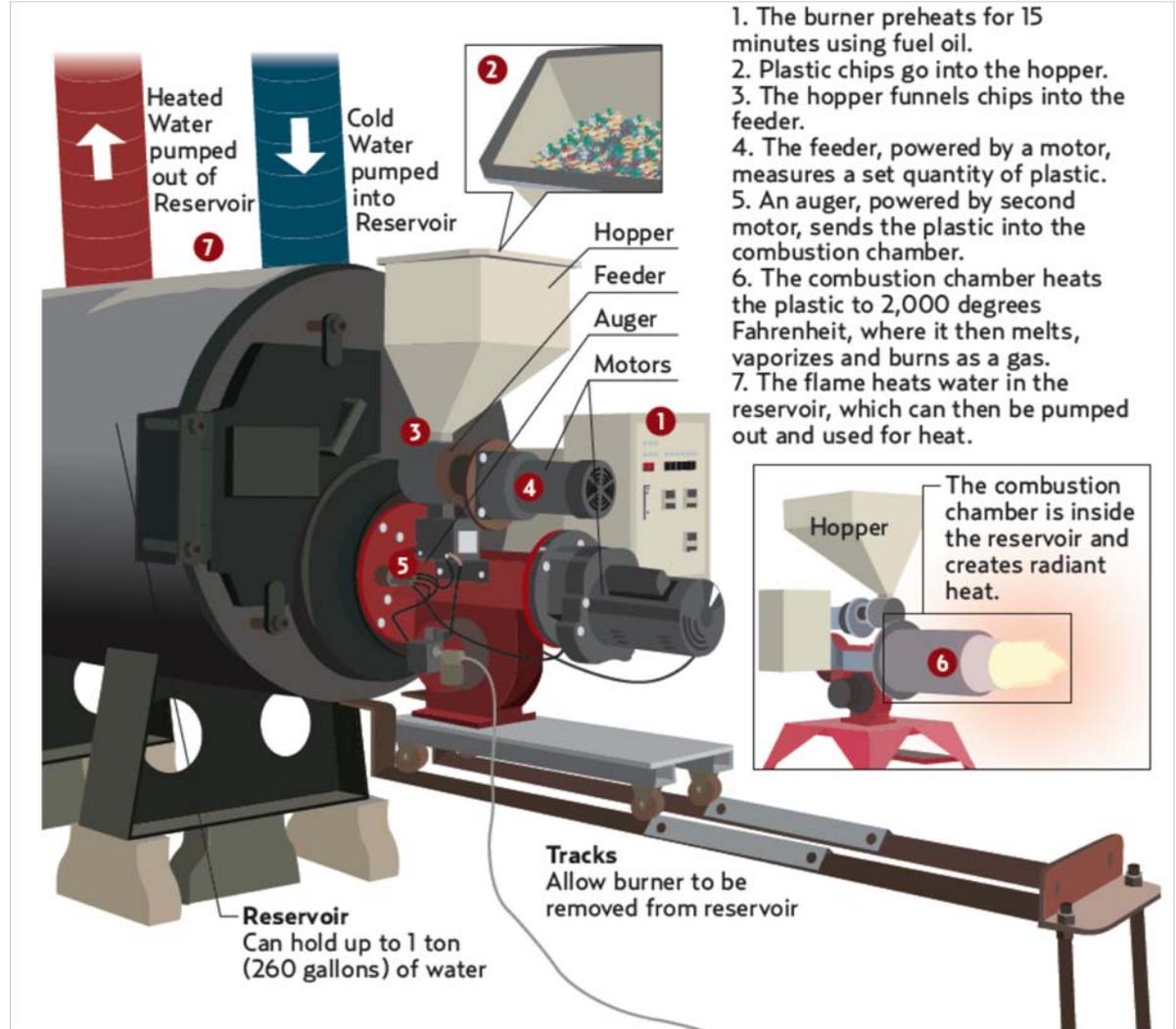
US patent pending

Exclusive North
American distribution
rights



PRODUCT ADVANTAGE

The Eco Clean model replaces an existing burner and makes use of all other components of the heating system with no interfaces required.



PRODUCT

continued

Fuel is derived from waste plastic through a certified acquisition, granulating, cleaning and testing process.

- Eco Clean is certified to use #1, #2 and #4 plastics
- NO #3 (PVC) plastics are used
- Plastics with fire retardants and metal fibers are NOT used
- Approved plastics are acquired; granulated to 2mm to 8 mm granules; clean and dried; and batch tested by independent third part laboratories.
- ECB manufacturers fuel and certifies fuel producers

Step #4

Targeting the customer

Eco Clean has created a “launch strategy” to capture a core group of early adopter customers and to leverage early successes.

- ECB spent 12 months identifying a core group of early adopters
- One adopter from each of five major sectors with access to their own waste plastic:
 1. A large state university
 2. A major plastic manufacturer
 3. A major medical supply manufacturer
 4. A national soft drink manufacturer
 5. A large NPO with statewide influence
- Financial incentives to encourage multi-year fuel contracts

EARLY ADOPTERS

Candidates

Leverage Strategy

Closed Loop Systems

Reference Accounts

Validate Market

Position for Growth

SECTOR	Description
Plastic Manufacturer	\$4 billion company with 60 plants nationwide .
Medical Supply Manufacturer	Worldwide market-leading manufacturer and distributor of high tech medical devices.
Food and Beverage Manufacturer	Worldwide leader in production, bottling and distribution of soft drinks.
Government Agency	Regional leader in community development efforts.
Educational Institution	Major land-grant university in the Northeastern US.

LAUNCH STRATEGY

\$1 million equity
investment

\$328,000 state grant

Generates cash flow

Validates market
acceptance

Gets Eco Clean
operational

- 12-month early adopter plan ready to go!
- \$1.1 million in sales projections
- Closed loop systems in five locations - major customers
- Positioned for growth and expansion
- Produces positive net income

Step 5: MARKET

Create a way to penetrate the market effectively and cost efficiently.

Eco Clean sells each early adopter a “package deal” consisting of :

Fuel processing

Burner units

Professional Services

Research and
Development

- Early adopters provide waste plastic for fuel processing from *their operations*
- Eco Clean charges a processing and certification fee for fuel per pound
- Burner units are purchased and installed
- Eco Clean monitors all aspects of installation
- Analysis is conducted to confirm cost savings and other benefits
- Pre-payment arrangements provide cash flow assistance to Eco Clean

Step #6 Value Proposition

Determine the “promise of benefit” that ECB is making to its customers.

Declare a strong value proposition that provide a benefit to each customer that does business with ECB.

- Cost Savings
- Conversion of waste plastic into clean fuel
- Compliance with clean energy mandates
- Diversion of plastic from landfills
- Clean emissions
- Uninterrupted access to fuel
- Certified fuel

Step #7 Awareness

Create a viral marketing effort to get maximum exposure with minimal cost.

Leverage the successes of the early adopters within their sectors to create a second set of adopters; a third set; and so on.

- Incentivize each early adopter to identify at least 5 key contacts within each of their circles of influence that ECB can approach with success stories.
- Produce *placement documents* that can be circulated through established publications targeted to the influencers in each sector.
- Circulate well-produced video and audio stories through social networks, web sites and distribution outlets like You Tube.
- Provide materials showing documented results that each early adopter can use internally.

Step #8 Operations

**Create an efficient
and well-run
operation.**

- **Maintain low staff count**
- **Cross train all employees**
- **Identify strong consultant team to provide expert guidance**
- **Create a solid group of strategic partners**
- **Attract strategic investors**

Step #9 Distribution

Create an efficient and well-run distribution system.

- Create regional fuel processing facilities
- Maximize relationships with providers of waste plastic
- Identify strong consultant team to provide expert guidance
- Create a solid group of strategic partners

Step #10 Customer Support

Use technology effectively to proactively serve customers.

- Incorporate a definition of success for each customer
- Integrate technology into burner units to *communicate* with customers
- Ensure that each early adopter is regularly reviewed and supported

Active Partners

Financial

Legal

Governmental

Strategic

Morrison Fiduciary Advisors

Frank Brunette

Gary Zentner

Cohen & Grigsby Law Firm

David Kalson

GIS Associates, Inc

Daniel Rihn

Peter Madaus

Westmoreland Community Action

Tay Waltenbaugh

Jack Brown

Contact Information

- **Gerald Driggs – 412.680.1602**
- **Steve Taylor – 412.901.4799**
- **www.PlasticToPower.com**