

Imperative Energy supplies industry-leading bioenergy solutions (heat, steam and electricity) by building biomass plants at client sites, offering System Supply & Install and Energy Supply Contracts.

Business challenge

- The Company needs to assess the viability, costs and benefits of a proposed renewable energy project before financial resources are allocated

Environmental problem company addresses

- In order to slow down climate change, we need to move beyond fossil fuels to carbon-free energy sources, including:
 - Biomass
 - Geothermal
 - Hydropower
 - Landfill methane / anaerobic digester gas
 - Nuclear
 - Solar
 - Wind
- The Company is a leader in biomass energy project development

Carbon Leaf Solution

- Completed economic feasibility assessment for a potential Combined Heat and Power (CHP) project that would use biomass resources to generate renewable energy
- Collected annual energy usage data (electricity, hot/cold water) for business park tenants adjacent to proposed site
- Used load profile to determine “best match” for energy technology solution
 - gasifiers
 - steam boilers
 - steam turbine/generators
- Met with local utility to determine grid connectivity and pricing
- Collected and analyzed data on biomass resource availability and costs
- Quantified government support for:
 - job creation
 - economic development
 - renewable energy generation
- Completed financial model and sensitivity analysis by varying inputs / assumptions