

Delivering Efficiency as a Service: The Metrus ESA

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Overview

- Metrus develops, finances, owns, and operates large-scale efficiency projects for Fortune 500 companies and major industrial customers.
- Metrus partners with leading ESCOs, contractors and lending partners to design, finance, construct and maintain projects.
- Metrus sells efficiency as a resource. We put our capital to work so our customers don't have to.
- Metrus has operational energy and water efficiency projects in 19 different states, resulting in savings over 1.1 billion kWh.









Metrus Sells Energy Efficiency

Financing:	Operations:	
 Fund 100% of project costs 	 Measure performance and savings 	
Own project assets	 Cover ongoing maintenance costs Identify new savings 	
 Monetize available incentives 		
	 Financing: Fund 100% of project costs Own project assets Monetize available incentives 	



Origins of the Metrus ESA

Power Purchase Agreement



Traditional Performance Contract



Efficiency Services Agreement

- Funds 100% of total project costs
- Third-party ownership of energy and water efficiency assets
- Pay-for-performance structure
- Covers construction, O&M, M&V
- Off-balance sheet accounting



Project Contracts

Two key contracts govern every project:

Efficiency Services Agreement (ESA) with customer



Efficiency Services Performance Contract (ESPC) with ESCO/contractor





Relationships

ESA

Metrus funds 100% of project cost, takes title to equipment, and pays for ongoing maintenance and monitoring. Customer pays service charge for realized savings.



ESPC

ESCO (contractor) designs project, installs efficiency equipment, and provides long-term maintenance and monitoring services.



Key Customer Benefits

FINANCIAL

- No capital outlay (cap-ex dollars can be invested in core business)
- Immediate positive cash flow through energy and water savings
- Pay-for-performance ESA removes risk
- Incorporates available utility incentives
- Preservation of debt capacity

OPERATIONAL

- Key equipment upgrades that increase resiliency and reliability
- Improved efficiency of building operations and systems
- Ongoing maintenance and monitoring services
- Flexibility to add new upgrades



Scope of Work

TYPICAL PROJECT PROFILE

- Integrated energy and water efficiency retrofits
- Project size is generally \$1-10 million
- ESA (project) term is generally 5-15 years



TYPICAL EFFICIENCY MEASURES

- Building automation and controls
- Lighting retrofits and controls
- Heating, ventilation and air conditioning (HVAC)
- Central plant systems
- Boiler replacement and system improvements
- Pumps, fans, motors, and drives
- Cogeneration (on-site electricity generation)
- Water efficiency measures



ESA – Service Charge

Service charge = (physical units of savings)
x (service rate, \$/unit) + operational savings



Savings created by:

- Year 1 service charge is ≤ avoided utility cost
- Fixed annual escalation is ≤ expected utility rate increase



Funding Options Comparison

Key Attributes	ESA	Lease	PACE ¹	Cash
100% third-party financing	Yes	Yes	Yes	No
Off balance sheet	Yes	No	No	No
Pay for performance	Yes	No	No	No
Ongoing services	Yes	Sometimes*	No	No
Ongoing measurement of services	Yes	Sometimes*	No	No
Ability to add new upgrades	Yes	No	No	No
Term (years)	5-15 years	5-15 years	5-20 years	N/A
Cost of capital	5-7%	4-6%	5-7%	WACC ²

(1) Property Assessed Clean Energy.

(2) Weighted average cost of capital.



Project Lifecycle





CASE STUDY

Parrish Medical Center

- 17 efficiency measures, including:
- LED lighting retrofit
- Chiller plan and AHU upgrades
- Demand control ventilation
- Building automation
- Steam trap replacements
- Water conservation



Total investment:

Million

\$6.1

Total annual savings:



Annual CO₂ savings:

8,316

Tons

CASE STUDY

Barrack Hebrew Academy

- New chiller replacement
- Building automation systems
- Boiler controls
- Chilled water plant upgrade
- Compressor replacement
- LED interior lighting retrofit

Total investment:

\$1.2

Million

Total annual savings:

THE REAL PROPERTY.

\$148,708

Annual CO₂ savings:

860

CASE STUDY

Bristol Hospital

- LED lighting retrofit
- Energy management system
- Power factor correction
- Stam trap replacements
- HVAC and AHU replacement
- Water efficiency



Total investment:

\$4.2

Million

Total annual savings:

\$525,000

Annual CO₂ savings:

1,320

Tons

Contact

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