

Energy Savings Performance Contract



October 2018

Case for Change

- MARTA has improved its financial performance and realized cost savings in many areas

However;

- Internal infrastructure upgrades compete with modernization of core business operations
- Execution of multiple projects can be very expensive and long

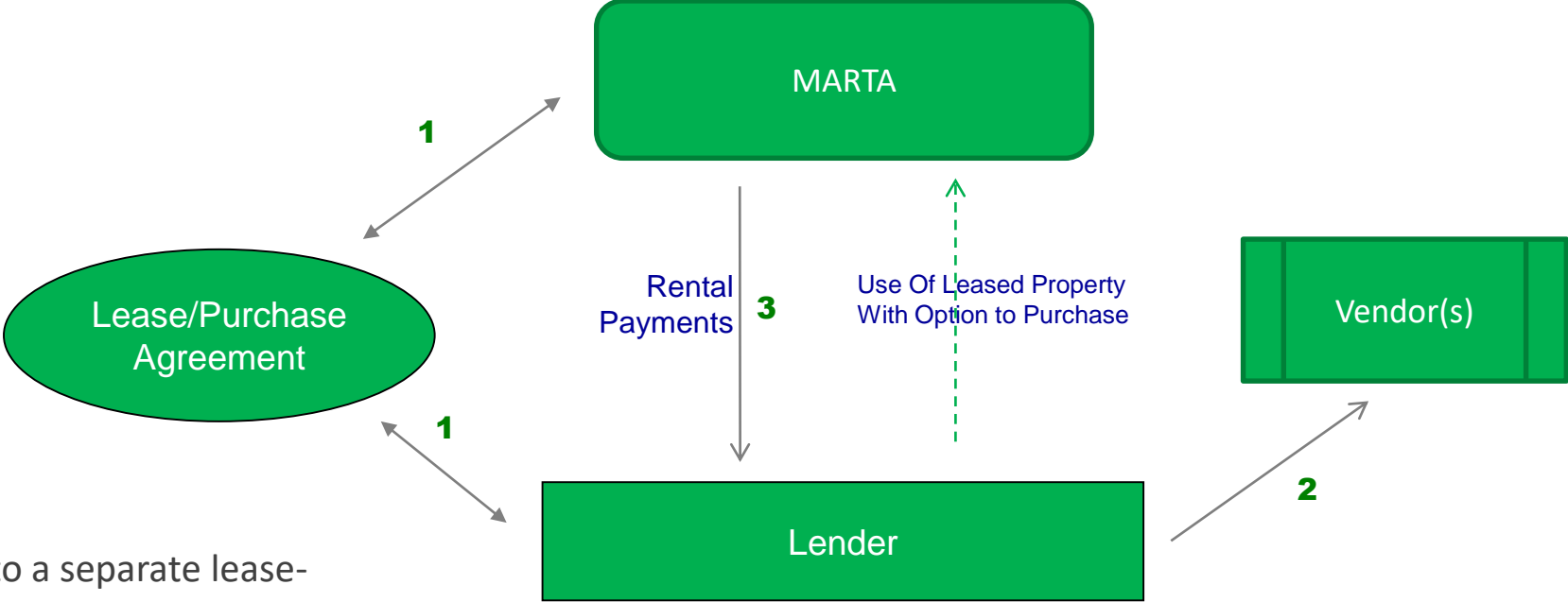


Energy Savings Performance Contract

- An ESPC is a contract between an agency and an energy service company (ESCO)
- Public agencies can procure energy and water savings, renewable energy solutions and facility improvements with no up-front **capital** costs
- ESPC streamlines multiple projects into one to gain efficiencies in cost and schedule
- MARTA's ESPC was developed as a tax-exempt capital lease agreement



A tax-exempt capital lease is a simple transaction conducted between 3 parties . . .

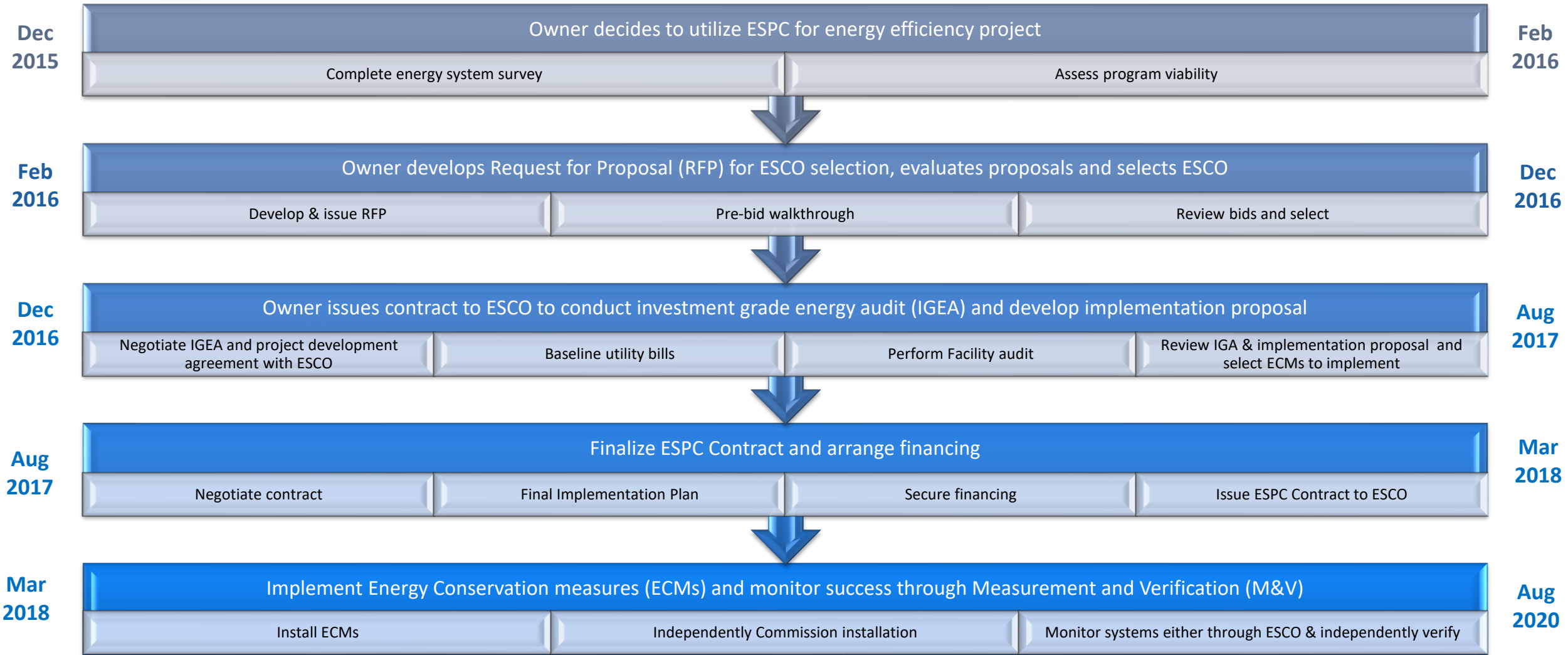


- 1. MARTA & Lender enter into a separate lease-purchase agreement
- 2. Lender pays Vendor(s)
- 3. MARTA pays Lender over the finance term

With MARTA as the borrower, lower cost tax-exempt financing is available.



ESPC Contracting Process



Energy System Survey



Metal halide lights



Exterior lights on in daylight

Energy System Survey



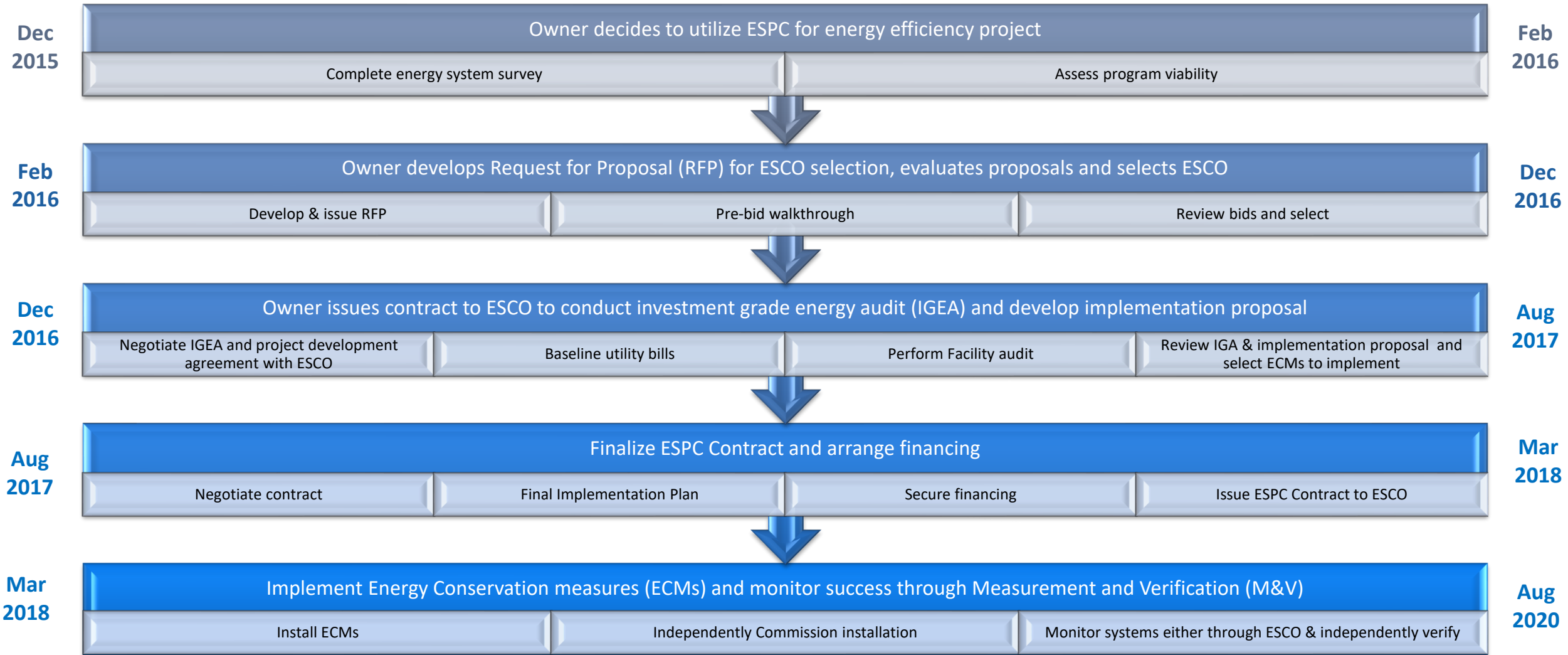
1,200 kW solar canopy at Laredo Bus Facility

Energy System Survey

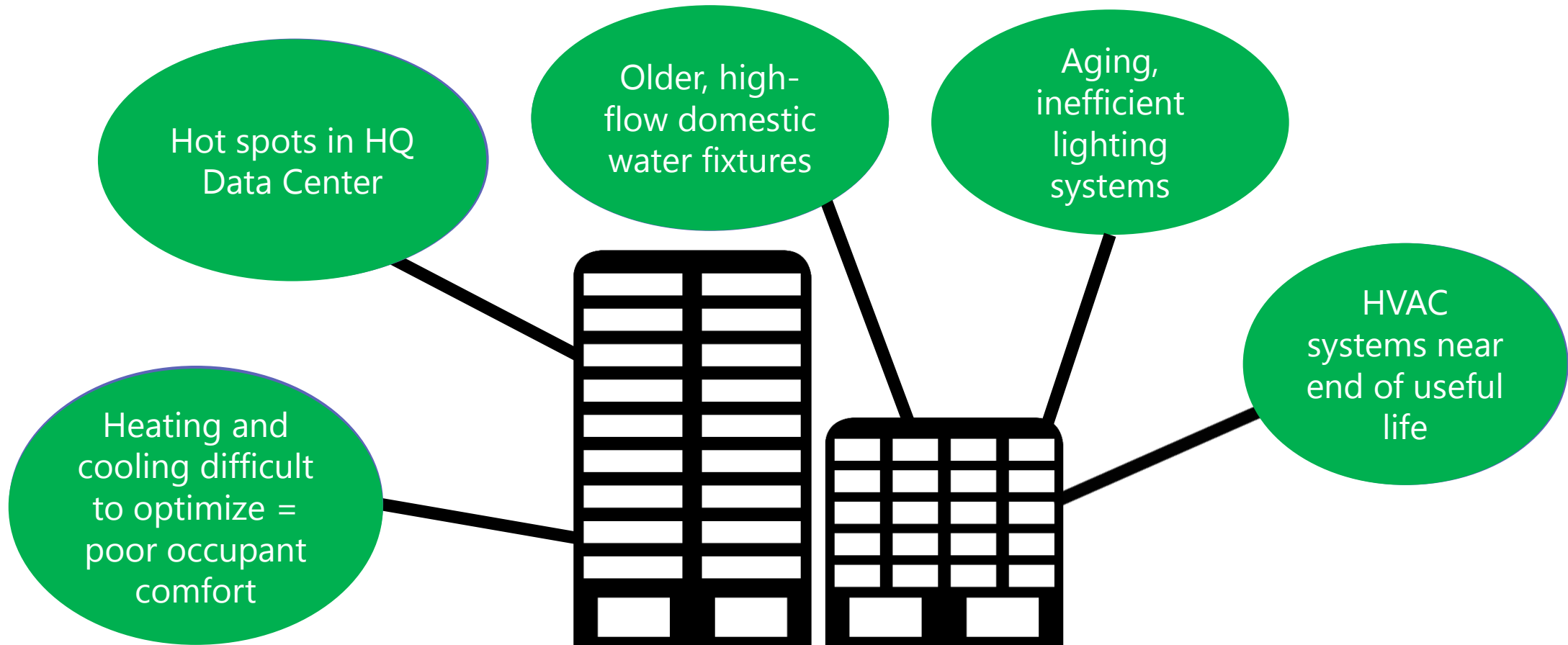


Chillers are at end of their useful life

ESPC Contracting Process



Investment Grade Audit Results



Energy & Water Conservation Measures Considered, not Implemented

- Data Center Upgrades
- Traction Power Energy Recovery System
- Renewable Energy - Solar Photovoltaic (PV) Arrays
- On-Demand NEW Cleaning Chemical Generation
- Non-Chemical and High Efficiency Cooling Tower Treatment



Energy and Water Conservation Measures Adopted



LED lighting upgrades

38 Rail Stations
17 Support Facilities
15 Gap Breaker Stations
24 Traction Power Substations

Electric sub-meters

21 Rail Stations



Mechanical system upgrades

4 Rail Stations
12 Support Facilities
11 Train Control Rooms



Building Automation System

14 Support Facilities

Water conservation measures

15 Support Facilities



Investment Grade Audit Results



Financial Overview

Project Savings

13.5%

Reduction in energy expenditures

\$3,784,975

Projected annual cost savings
(Energy + O&M)

\$64.3 Million

Total savings impact over a 17 years

Project Value

\$36.2 Million

Funding Mechanisms

Tax Exempt Lease Purchase

19 year loan through a lease purchase @ 2.92%



Financial and Environmental Impacts

This project will ultimately lower utility costs by over 13.5%, address deferred maintenance and improve occupancy comfort while offsetting costs with over \$64 Million in projected savings!



The projected annual energy savings of \$3.8M is equal to

3,787 passenger vehicles removed from the road per year

OR

19,134,597 pounds of coal burned per year



Project Accomplishments

Sustainability Goals Supported

- Substantial reduction in operating costs
- Reduce MARTA environmental impact

Operations Goals Supported

- Improve reliability of systems
- Upgrade aging equipment
- Improve operations visibility into remote systems

Financial Goals Supported

- Improvements made on a budget friendly basis
- Future repair and replacement costs averted



CURRENT STATE

Implement Energy Conservation measures (ECMs) and monitor success through Measurement and Verification (M&V)

Install ECMs

Independently Commission installation

Monitor systems either through ESCO & independently verify



Thank you

