

# Metro Transit Facilities Energy Conservation



## Transportation Committee

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Presented by

Robert Rimstad, P.E.

Metro Transit, Engineering and Facilities

# Sustainability Policy

The Policy of the Metropolitan Council is to conduct its own operations in a sustainable manner, when economically feasible.

# Sustainability Plan - Policy to Practice

- Meet energy goals
- Implement energy conservation
- Track energy use
- Implement renewable energy initiatives
- Initiate plan actions for water
- Initiate plan actions for solid and hazardous waste
- Monitor fleet improvements

## APTA Gold Recognition

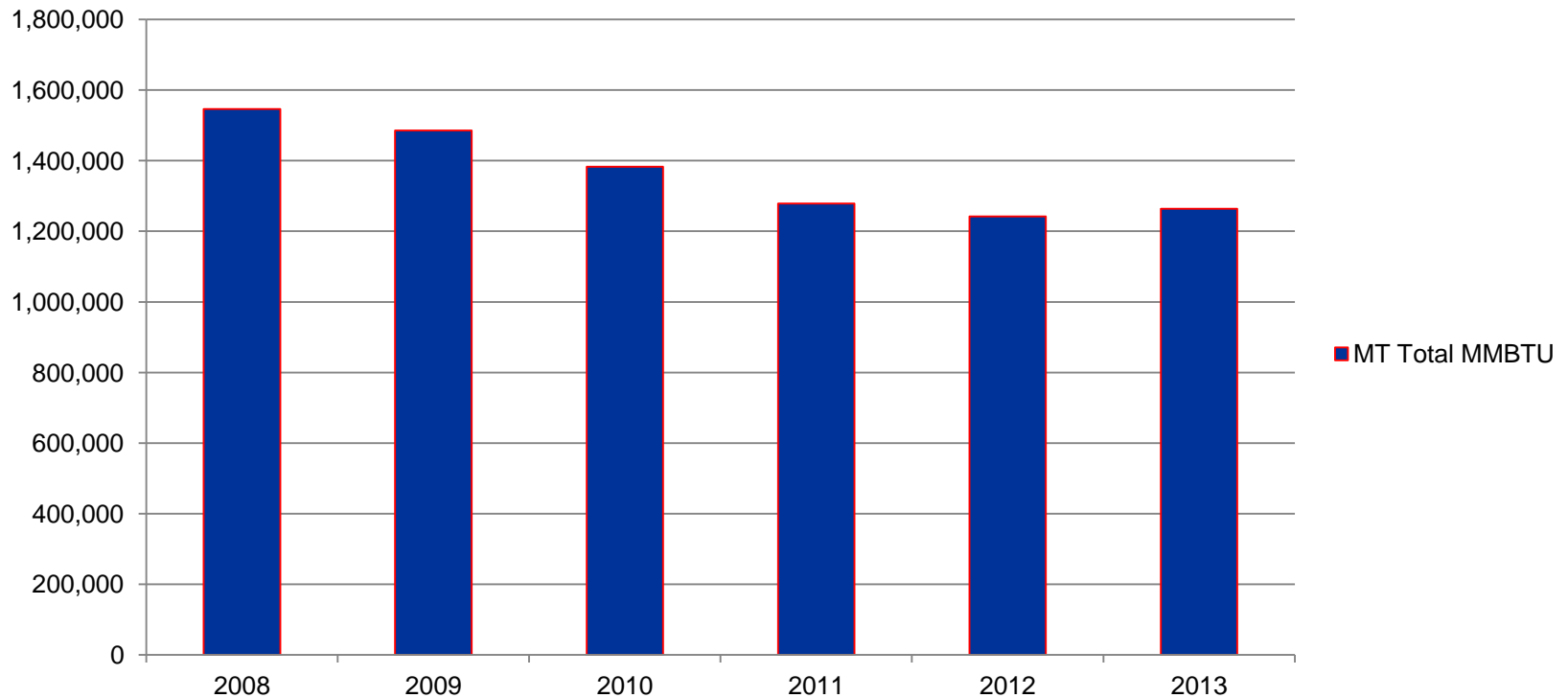
- Demonstrated on 14 indicators positive changes
- GHG emissions
- Water
- Bus fuel efficiency
- Utility consumption



Solar array at Rail Support Facility

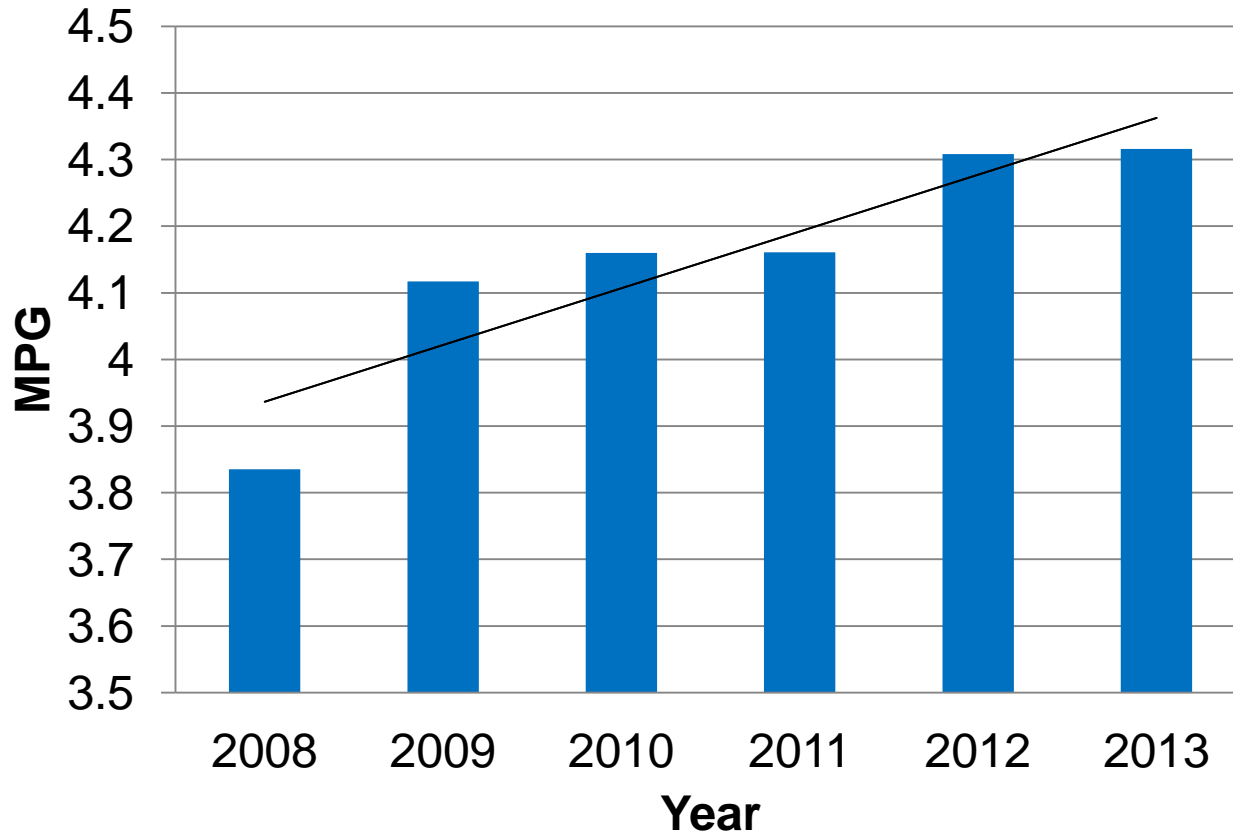
# 2008-2013 MT Total MMBTU

## Metro Transit Total MMBTU



\*Weather Normalized Facility Data

## Bus Fleet MPG Increasing (Revenue)



- A 1/10<sup>th</sup> improvement in miles per gallon for the fleet in 2012 would reduce the fuel used for the year by 157,841 gallons
- That is a savings of \$505,094

## 2013 Highlights

- Northstar Lighting Retrofit and Mech Upgrade
- Exterior lighting retrofit at EMTF and FTH
- Bottineau Blvd and Brooklyn Blvd P&R Lighting retrofit



New lights and sensors at Northstar, note 4/5 lights shown are off.

# Solar Power

2013

Rail Support Facility (4,618  
kWh 01/14 – 03-14)



2014

610 & Noble P&R



- RSF produces ~10% total electric use
- 610 produces ~ 25% total use



## 2014/2015 Projects

- Traction Power - Energy Storage Equipment
- Equipment - OHB Heating System
- Lighting – Continue exterior light conversion to LED
- FTH Façade Replacement



## 2014 Studies and Thrive 2040

- District Energy
- Water Usage
- Hazardous Waste
- Solid Waste
- CNG
- Thrive WG on Sustainability & Climate Change



HAZARDOUS WASTE	
FEDERAL LAW PROHIBITS IMPROPER DISPOSAL. IF FOUND, CONTACT THE NEAREST POLICE OR PUBLIC SAFETY AUTHORITY OR THE U.S. ENVIRONMENTAL PROTECTION AGENCY.	
GENERATOR'S INFORMATION:	
NAME _____	PHONE _____
ADDRESS _____	CITY _____ STATE _____ ZIP _____
MANIFEST _____	ACCUMULATION _____
TRACKING NO. _____	START DATE _____
EPA ID NO. _____	EPA WASTE NO. _____
STATE EPA NO. _____	
<small>U.S.T. PROPER SHIPPING NAME AND UN OR NA NO. WITH PRIOR</small> <b>HANDLE WITH CARE!</b>	



## 2014 Energy Goals

- Achieve 2014 utility cost of \$4.8 million.
  - Adding Green Line Operations, Stations, Target Field Station expansion and another P&R Ramp
- Average EUI of 80 kbtu/sf/yr.
- Install 40.75 kW additional solar capacity
- 2015 larger solar installations at support facilities, approximately 3 mega watts

# Questions?



Robert Rimstad, PE  
[robert.rimstad@metrotransit.org](mailto:robert.rimstad@metrotransit.org)  
612-349-7768