



LEED for Existing Buildings Certification

Crescent Ridge Corporate Center I

11100 Wayzata Blvd
Minnetonka, MN 55305

Environmental Impact of Real Estate



40-50% Greenhouse Gas Emissions
40% Natural Resources & Energy Consumption
25% Waste Generated
15% Fresh Water Consumed

6B Square-feet of annual new construction

150M Metric tons embodied construction emissions

25M Metric tons of future carbon emissions / year



300B+ Square-feet of existing buildings

2.2B Metric tons of carbon emissions / year

Environmental Impact Equivalency

2.2B = 2.1B =

Metric Tons Carbon Emissions / year from real estate

Acres of U.S. Forests required to sequester that much carbon



945

Yellowstones



1,725

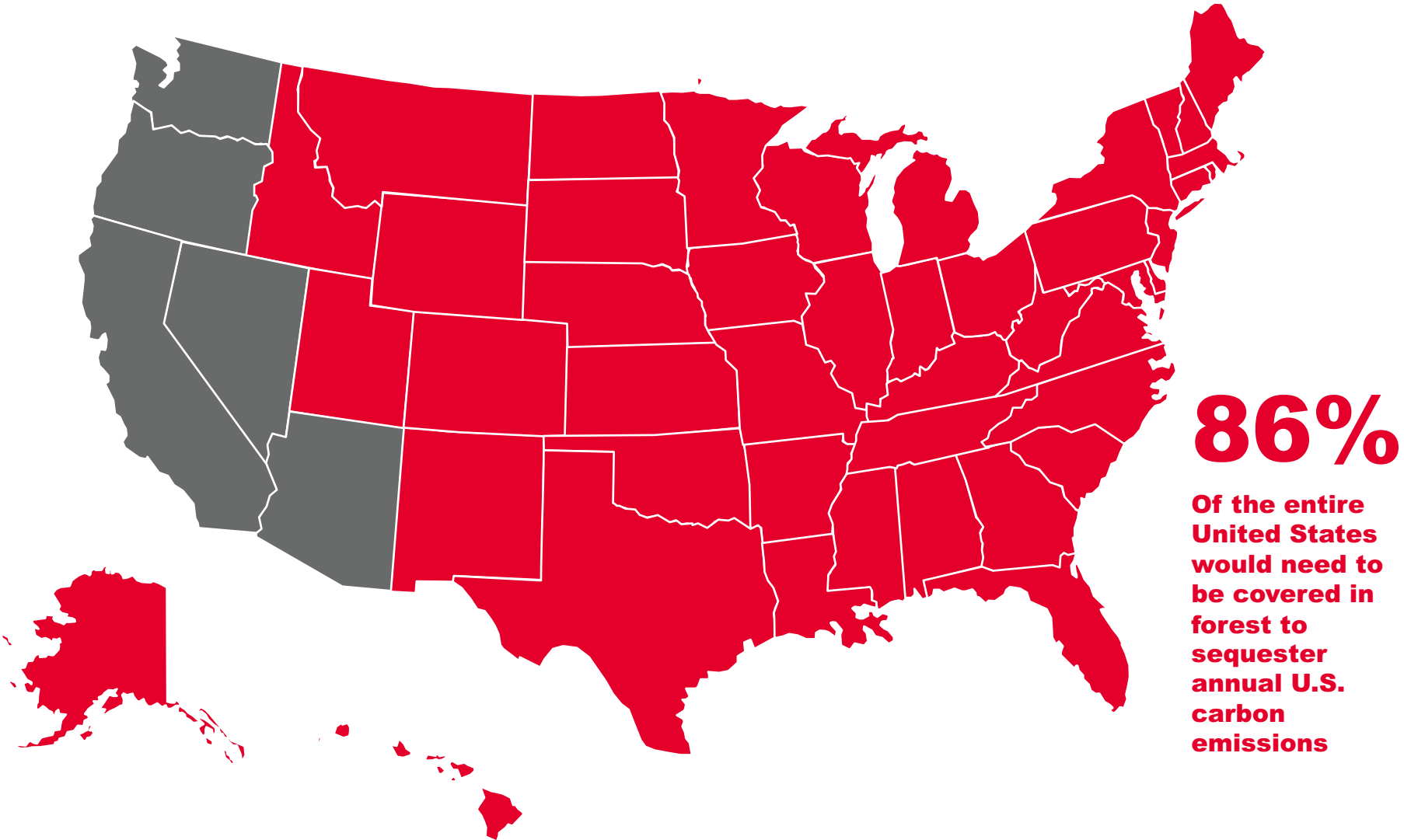
Grand Canyon National Parks



2,808

Yosemites

Environmental Impact Equivalency



86%

Of the entire United States would need to be covered in forest to sequester annual U.S. carbon emissions

Crescent Ridge's Carbon Dioxide Contribution

4.15M

kWh

3,089

Metric Tons CO₂ / year

18,211

therms

97

Metric Tons CO₂ / year

ENERGY STAR® Statement of Energy Performance

93
ENERGY STAR® Score¹

Crescent Ridge Corporate Center I

Primary Property Type: Office
Gross Floor Area (ft²): 288,855
Built: 1999

For Year Ending: April 30, 2018
Date Generated: August 03, 2018

1. The ENERGY STAR score is a 1-100 assessment of a building's energy efficiency as compared with similar buildings nationwide, adjusting for climate and business activity.

Property & Contact Information		
Property Address Crescent Ridge Corporate Center I 11100 Wayzata Blvd Minnetonka, Minnesota 55305	Property Owner _____ () - _____	Primary Contact _____ () - _____
Property ID: 2772786		

Energy Consumption and Energy Use Intensity (EUI)			
Site EUI 55.7 kBtu/ft ²	Annual Energy by Fuel		National Median Comparison
	Electric - Grid (kBtu)	14,161,782 (89%)	
	Natural Gas (kBtu)	1,821,055 (11%)	National Median Source EUI (kBtu/ft ²)
			% Diff from National Median Source EUI
			-47%
Source EUI 161.7 kBtu/ft ²	Annual Emissions		
	Greenhouse Gas Emissions (Metric Tons CO ₂ /year)	2,688	

Lincoln Square Greenhouse Gas Equivalency

www.epa.gov/energy/greenhouse-gas-equivalencies-calculator

3,186

Metric Tons CO₂ / year



682

Passenger cars



359K

Gallons of Gasoline



344

Average Homes



3.5M

Pounds of coal burned



3,753

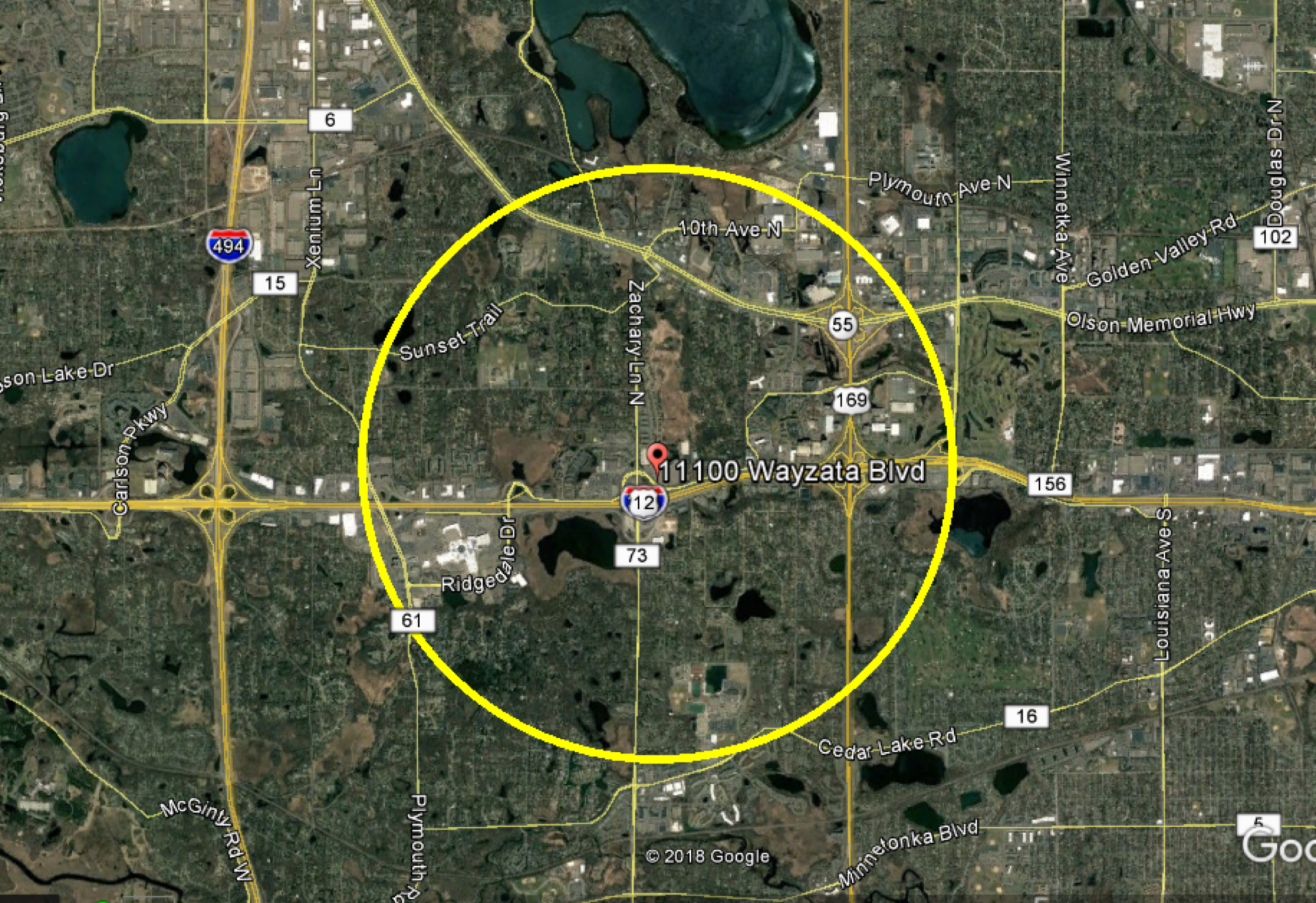
Acres of U.S. Forests



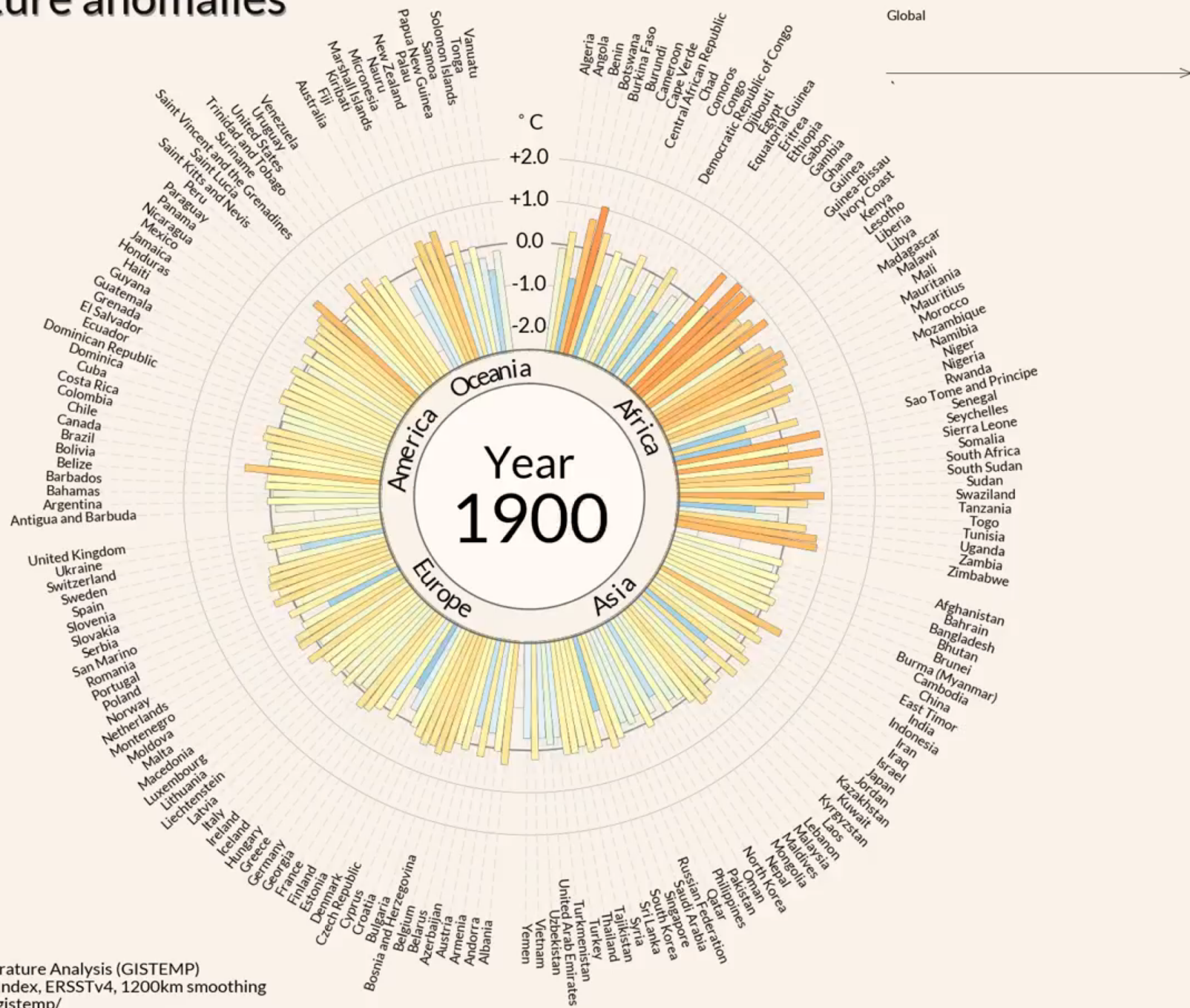
82,569

Tree seedlings grown for 10 years





Temperature anomalies



Data source:
 NASA GISS Surface Temperature Analysis (GISTEMP)
 Land-Ocean Temperature Index, ERSSTv4, 1200km smoothing
<https://data.giss.nasa.gov/gistemp/>
 Average of monthly temperature anomalies. GISTEMP base period 1951-1980.

But what does that look like...

San Francisco, CA



New York, NY

We are pursuing LEED Certification

What is it?

Leadership in Energy & Environmental Design



LEED addresses the complete lifecycle of buildings

HOMES

NEIGHBORHOOD DEVELOPMENT (IN PILOT)

COMMERCIAL INTERIORS

CORE & SHELL

NEW CONSTRUCTION

SCHOOLS, HEALTHCARE, RETAIL

EXISTING BUILDINGS
OPERATIONS & MAINTENANCE

BUILDING LIFECYCLE

DESIGN

CONSTRUCTION

OPERATIONS

LEED for Existing Buildings

LEED Credit Categories



- Requires Recertification every 5 years
- Total of 110 points available through green operation and maintenance practices
- 7 Categories of green operations
- We are pursuing **LEED Gold!**

Green/White Roof & Stormwater Management



Sustainable Construction Management



Reduced Water Consumption



Green Cleaning Program



Enhanced Recycling Program



Outdoor Air Testing and Measurement



Refrigerant Management



Energy Efficient Lighting



Sustainable Procurement Strategies



Tenant Engagement and Education



Indoor Air Quality Testing



ENERGY STAR Benchmarking



Utilities Management



Alternative Transportation



Exterior Maintenance



Water Efficient Landscaping

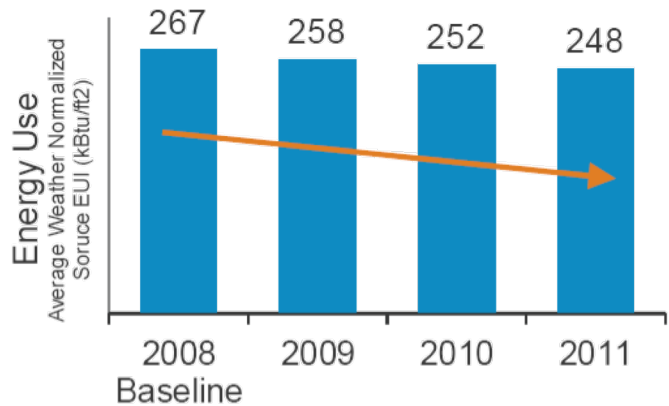


Preventative Maintenance

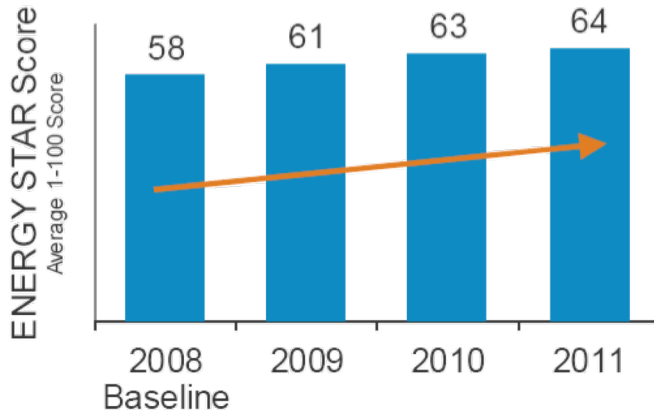


Energy Management System

ENERGY STAR Certification



7% Savings



6 point increase

Crescent Ridge is ENERGY STAR rated with a score of **93**

We are in the top 10% of buildings across the country



Over the years, the average score for buildings across the U.S. has gone up

Your Impact on Energy Consumption

- Turn it off
 - Lights
 - Computers
 - Monitors
 - Printers
- Install occupancy sensors in all offices, conference rooms and workrooms
- Utilize day lighting when possible
- Purchase ENERGY STAR or EPEAT rated equipment
- “Smart Plugs”
- Unplug it



#CWpowerfulideas

YOU SNOOZE, YOU LOSE

TURN YOUR COMPUTER OFF.

Turning your computer off vs. snooze mode can save **64** kilowatts per year.

With **77** million Americans working at a computer, that's a lot of energy.

cushmanwakefield.com

CUSHMAN & WAKEFIELD

Green Cleaning

THE GO-TO LOGOS

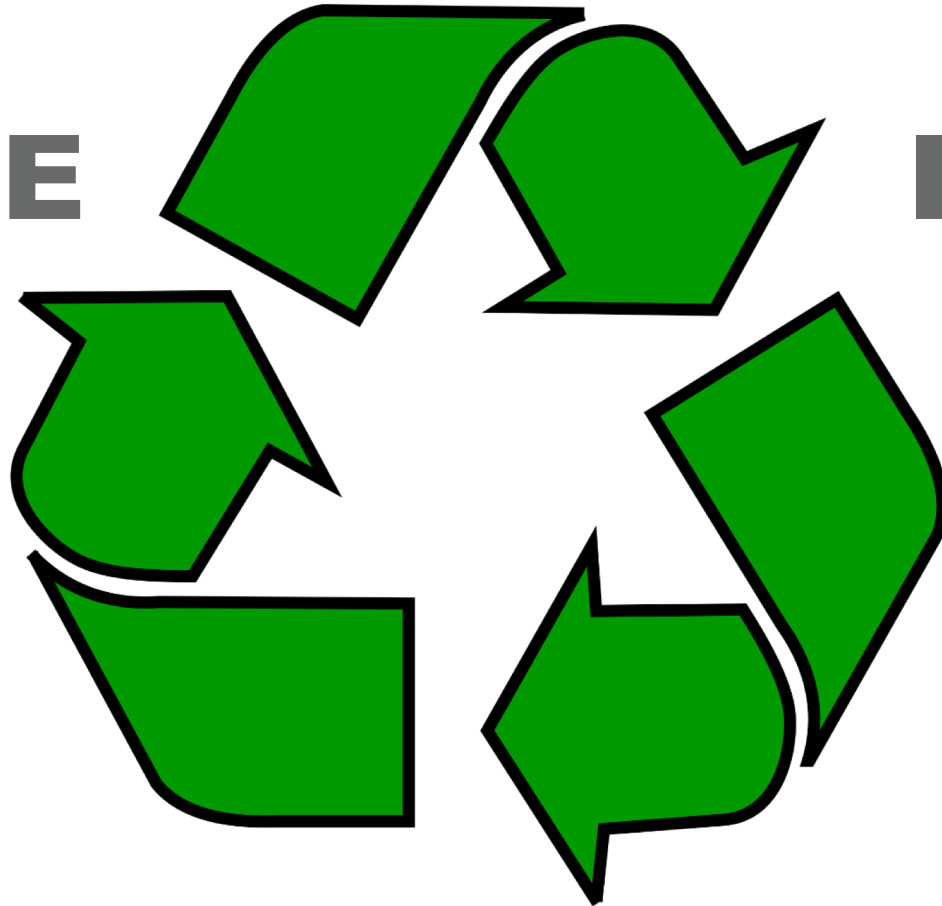
Look for these when purchasing
green cleaning products

Green
Cleaning
Program



Waste Diversion

REDUCE



REUSE

RECYCLE/COMPOST



Accepted Items

PAPER

- Flattened Cardboard
- Cups & Containers
- Milk, Juice & Soup Cartons
- Newspapers/Magazines
- Books/Phone Books
- Junk Mail & Office Paper
- (all items clean & empty)*
- *No Tissue*



PLASTIC

- Bottles, Cups, Containers & Lids
- (all items clean & empty)*
- *No Plastic Bags*
- *No Foam Polystyrene*
- *No Straws or Utensils*



METAL

- Steel & Aluminum
- Bottles/Cans/Containers
- (all items clean & empty)*
- *No Paint Cans*



GLASS

- Glass Bottles / Jars
- (all items clean & empty)*
- *No Windows or Ceramics*



What is NOT Recyclable?



E-waste, Batteries, Light Bulbs, and Furniture

- **What is e-waste?**
 - Anything that plugs in
 - TVs, computers, phones, printers, etc
 - Don't throw them in the trash! The property team can help dispose these items
- **What to do with batteries and light bulbs:**
 - Don't throw them away!
 - Hazardous materials must be stored and removed separately from other wastes by a vendor licensed to handle them
 - The property team can help dispose these items
- **What to do with furniture:**
 - Contact the Property Management team for proper disposal

How can you help?

Recycle/Reporting

- Ensure your team is properly recycling
- Connect with Property Management for waste disposal questions and information

Utilize Alternative Transportation

- Take the bus, bike, or walk
- Carpool when driving to work

No Smoking within 25 Feet of ALL Entrances

Be Water and Energy Conscious!

- Turn energy-drawing items off when you leave
- Don't leave the water running



Internal Engagement

Form a Sustainability Team

- Imparts Responsibility
- Professional Development

Develop Engagement Strategies

- Internal Tracking
- Regular Updates/Newsletter
- Organization-wide meetings

Make it Competitive

- Gamify it!
- Make it fun and competitive
- <http://coolclimate.berkeley.edu/calculator>

34

Tons CO₂ / year

27%

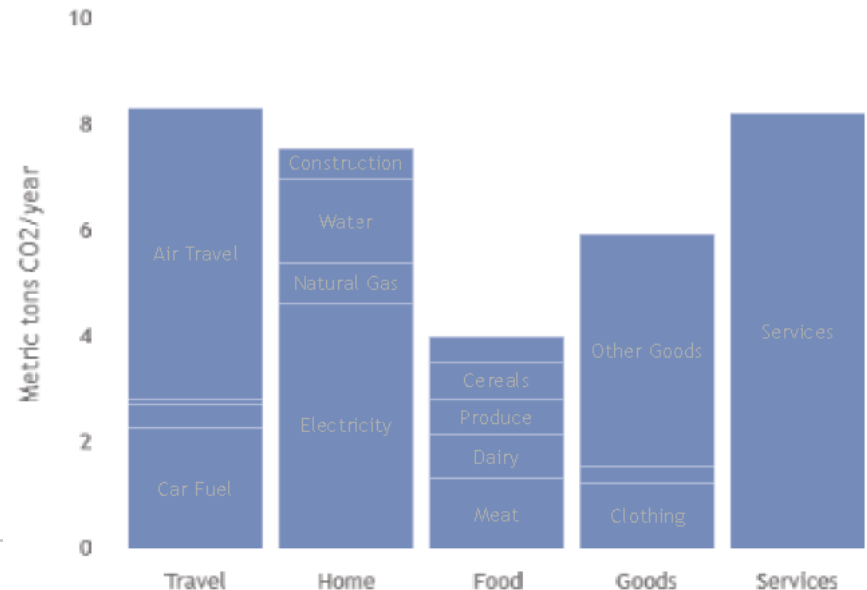
Better than average DC household with similar occupants and income

Corporate Culture

- Brand-Integration
- Get all levels involved
- Sustainability reports

Develop Internal Policies

- Zero-Waste
- Green Purchasing
- Teleworking

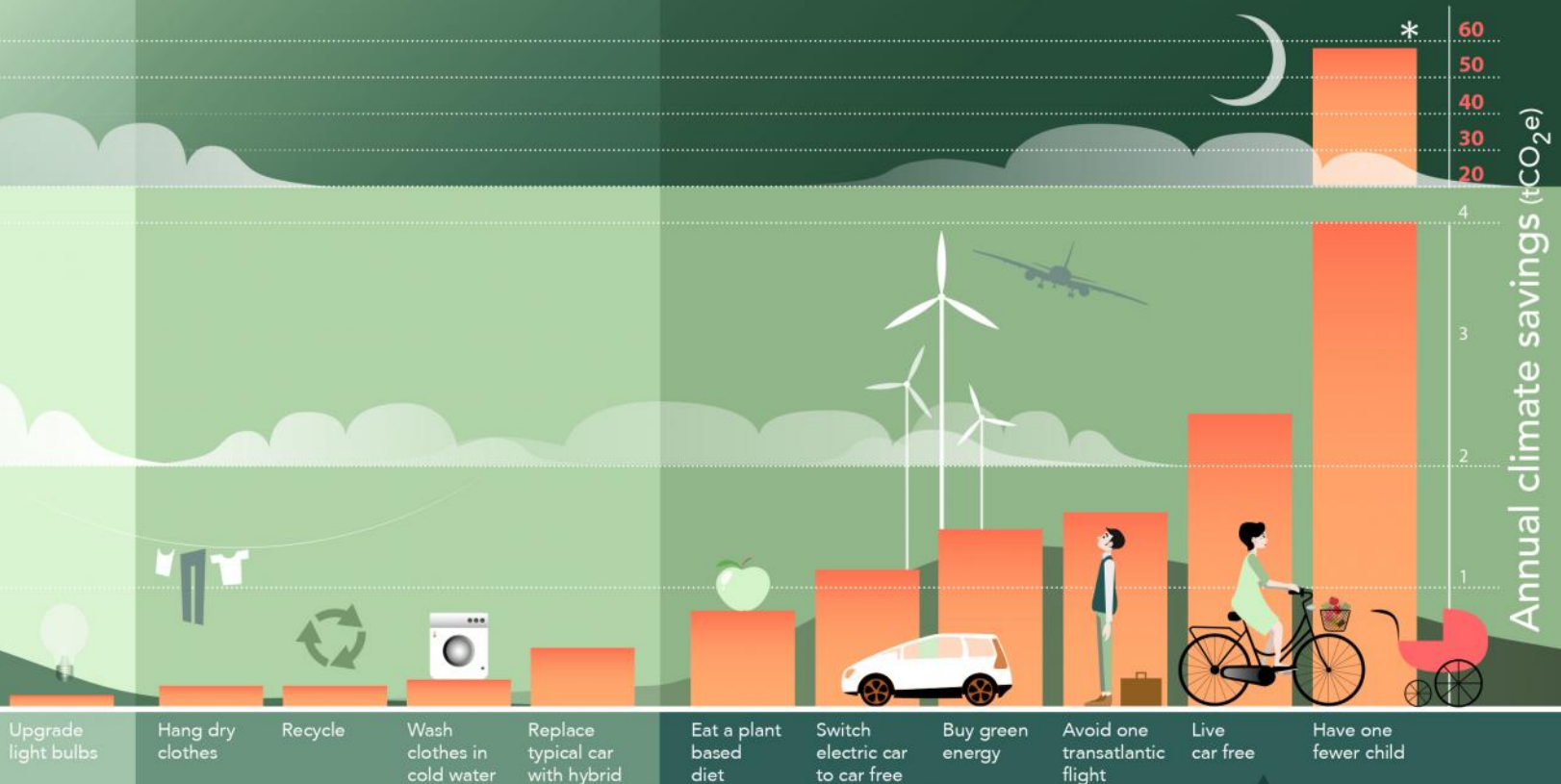


Your Contribution to Climate Change?

Personal choices to reduce your contribution to climate change

* Cumulative emissions from descendants; decreases substantially if national emissions decrease.

Average values for developed countries, based on current emissions.



Low Impact

< 0.2 tCO₂e

Moderate Impact

0.8-0.2 tCO₂e

High Impact

> 0.8 tCO₂e

Seth Wynes & Kimberly Nicholas, 2017, Environmental Research Letters



Questions?

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