



### Mission

In order to develop sustainable and equitable patterns of local and global resource use, Brown University will minimize its energy use, reduce negative environmental impacts and promote environmental stewardship. Brown will use the opportunities created by these actions to further its educational, research and service missions.



The Office of Sustainability is committed to achieving sustained energy and environmental performance. This requires an ongoing, integrated and systematic approach to resource management including assessing performance, setting goals, creating an action plan, and tracking and communicating results.

### **Quick Facts**



**39** 

Brown University Dining Services sourced food from 26 local farm-to-fork farmers and 13 local suppliers.



**36.4%** 

of material was diverted from the landfill through recycling, donations, composting and other means.



282,260

shuttle trips were taken by Brown University staff, faculty and students.



**50** 

trees were planted on Brown's campus.



394,800

pounds of clothing, furniture and other materials were donated to charitable organizations.



18

courses were offered for credit through the Institute at Brown for Environment and Society.

# Table of Contents





30

Community

Engagement

**Executive Summary** 



06

**Educating Our Future Leaders** 



10

Sustainability in Operations



**36** 

**Our Path Forward** 



**39** 

Acknowledgments

### **Executive** Summary



Fiscal Year 2018 served as a catalyst for the Office of Sustainability to make significant strides across campus and to focus on identifying ways in which the University can look beyond past goals and prepare for strategic planning in FY19. While we continue to make progress on lowering our greenhouse gas emissions, currently standing 28.2 percent below 2007 levels, we now focus on a broader goal of identifying ways in which the University can improve efficiency and drastically reduce its reliance on fossil fuels.

This year, President Christina Paxson formed two sustainability committees, whose charge was to determine the technological feasibility, financial costs and potential target date for purchasing renewable electricity and setting goals for Scope 1 and 2 emissions. The committees have made headway in identifying a path to address Scope 1, 2 and 3 emissions. The committees will continue to work throughout FY19 to finalize the University's approach to transforming the way it procures and utilizes energy.

Facilities Management's Office of Sustainability continued to expand its reach across campus in areas such as waste diversion, procurement and student engagement. We continued to work toward: meeting our goal of 50 percent waste diversion by 2020; identifying ways in which the University can procure goods and services more responsibly; and, most importantly, increasing and diversifying engagement with the Brown community to normalize sustainability in everyday operations, conversations and decisions.

We hope you enjoy the following report and encourage you to contact our office at sustainability@brown.edu with any questions or comments.

Jessim Bury

**Iessica Berry** Director, Office of Sustainability Facilities Management

### **FY18** Milestones



#### Throughout 2017:

Work continued on campus thermal efficiency project.



#### → Winter 2017-18:

**Environmental Health and Wellness** working group instituted a standard to eliminate flame retardants from all furniture, mattress and fabric furnishing purchases.



#### ⇒Summer 2018:

Launch of special waste program to collect batteries, small electronics and small printer cartridges across campus.



#### **Summer 2017:**

Fall 2017:

President Paxson convened

· commitments at Brown. ...

committees to assess sustainability

Departmental Sustainability Program launched at the Warren Alpert Medical School.



#### **Spring 2018:**

Associate Professor Stephen Porder appointed to newly created position of assistant provost for sustainability.



Division of Grounds and students from Sustainable Food Initiative redesigned and enhanced the Young Orchard student garden.



#### **Spring 2018:**

# **Educating Our Future Leaders**

Student interns in the sustainability office look over the student garden outside of Young Orchard dorm.



rown continues to offer a variety of educational opportunities that focus on sustainability.

#### Institute at Brown for Environment and Society

The Institute at Brown for Environment and Society (IBES) supports research to understand the interactions between natural, human and social systems. Teaching programs prepare future leaders to envision and build a just and sustainable world. IBES cultivates strong research in five disciplinary areas: conservation science, land change science, climate science, environmental health, and institutions and human behavior.

#### **Program for Environmental and Civic Engagement**

Over the past year IBES has launched a Program for Environmental and Civic Engagement (PECE). The effort, led by Assistant Provost for Sustainability Stephen Porder, seeks to increase Brown's involvement in the local and regional conversation around issues of environment. In the past year PECE

provided funding for several environmentally focused entrepreneurial efforts (in collaboration with the Nelson Center for Entrepreneurship), launched a podcast ("Possibly") focused on the possibility of sustainability and provided money to convene local leaders around issues of sea-level rise, storm water management and urban sustainability in Providence.

#### **Climate and Development Lab**

The Climate and Development Lab (CDL), founded in 2010 by Professor Timmons Roberts, David Ciplet and Guy Edwards, is a think tank based at IBES. The lab produces timely, accessible and influential research that informs a more just and effective climate change policy. Students work with leaders in government, civil society and the media to fill in important research gaps and generate ideas for action on climate change. The CDL provides students learning opportunities to effectively shape policy and explore the intersections between climate change, development and global governance.

In November 2017, members of the CDL attended the United Nations' climate change negotiations (COP23) in Bonn, Germany. Students supported the Least Developed Countries Group chair, Gebru Jember Endalew of Ethiopia, and worked with the U.N. Development Programme, the International Centre for Climate Change and Development, Climate Action Network International and Oxfam International. In collaboration with other groups, the lab hosted an event at the German Development Institute Interconnections Zone called "Transparency, Governance and Accountability for Mitigation and Adaptation— Perspectives and Experiences from Developing Countries."

#### **Academic Highlights**

- IBES awarded a total of \$58,000 to students to fund summer projects and internships that ranged from advancing rainforest restoration with Palmyra Atoll (owned by the Nature Conservancy) to working with Grow Smart Rhode Island to develop the organization's biennial briefing book.
- IBES Director Amanda Lynch, co-chair of the World Climate Research Programme, gave the keynote presentation at a key climate change meeting at the U.N.
- Lynch was elected as a member of the Norwegian Scientific Academy for Polar Research, the only scientific academy concentrating on the polar regions and related challenges within all scientific disciplines in an international perspective.
- The Program in Environmental Civic Engagement at IBES partnered with Rhode Island Public Radio to launch "Possibly," a podcast about environmental issues and solutions in Rhode Island and how they are linked to global issues.
- Graduate student Sarah Cooley received the Outstanding Student Paper Award at the December 2017 meeting of the American Geophysical Union in New Orleans. The paper demonstrates the usefulness of CubeSat satellite imagery for tracking changes in surface water at high latitudes, a benchmark for assessing environmental sensitivity to climate change.

#### **ENVIRONMENTAL STUDIES TRACKS**



Air, Climate and Energy



**Conservation Science and Policy** 



**Environment and Inequality** 



Land, Water and Food Security



Sustainability in Development



The creation of a new track on environment and inequality brings a crucial part of understanding the roots of our environmental issues, a window on who suffers and benefits from the distribution of "goods" and "bads," and why that matters for solving these complex problems.

—Timmons Roberts Ittleson Professor of Environmental Studies

# Sustainability in Operations



sustainability. As such, the University takes active steps to mitigate and help solve issues related to areas including waste, energy production, greenhouse gas emissions and environmental health. Brown aspires to divert 50 percent of its waste from Rhode Island's nearly full landfill by 2020 and aims to reduce its greenhouse gas emissions by 42 percent below 2007 levels by 2020.

Brown's commitment to sustainability is a shared responsibility and effort across all departments and offices. From the Division of Grounds maintaining green roofs to manage storm water, to Dining Services sourcing from local farms, to the Warren Alpert Medical School hosting a series of speakers on the intersection of health and climate change, we work across campus to promote and engage the community in building a more sustainable university.

"Green roof" of the Perry and Marty Granoff Center for the Creative Arts

## Highlight: Sustainability at South Street Landing

n FY18, after a large redevelopment project that reimagined the building using a holistic approach incorporating productivity, collaboration, health, wellbeing and sustainability, South Street Landing (SSL) opened its doors to more than 400 Brown staff members from 11 administrative departments.

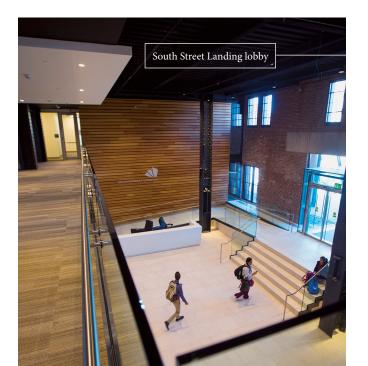
During renovation and continuing into daily operations, SSL functions in a way that promotes energy and water reduction, recycling and repurposing of material, and waste reduction. The building offers an environment that helps occupants exist sustainably, using alternative modes of transportation, working in natural lighting and composting food scraps.

The construction project preserved the historic integrity of the building and neighborhood while also reducing waste by repurposing building material. The wood seen throughout the common spaces was reclaimed from an old mill in Woonsocket, and the concrete block that once held the large turbines that powered the building was reused as an elevated lounge space. An old crane rail is now used to support beams, an innovative solution to reduce the amount of steel used during construction.

SSL was designed to encourage staff and visitors to actively reduce and divert waste. Compost stations are available in each pantry, reducing the amount of food and other organic material entering our landfill. Brown also invested in dishwashers and reusable plates, cups and utensils in each kitchen to reduce waste, and compostable coffee pods are used in lieu of single-use cups.

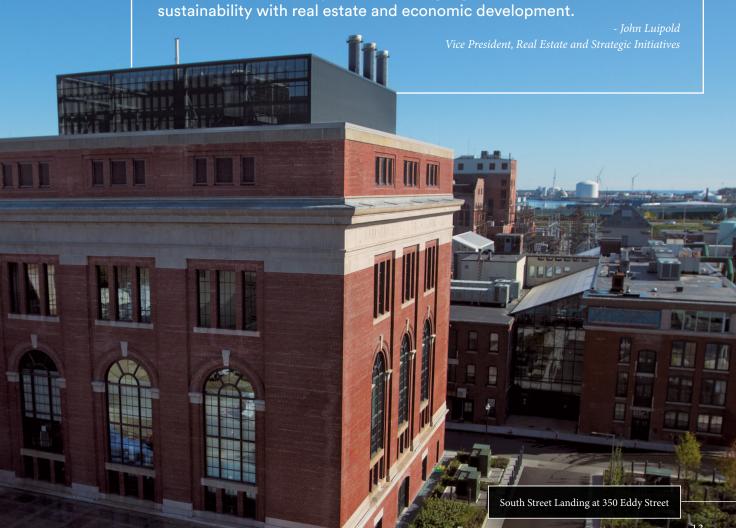
Brown made great strides to ensure South Street Landing is a water- and energy-efficient building. SSL capitalizes on the use of natural lighting in its office and meeting spaces, but when artificial lights are required, occupants enjoy efficient LED lights controlled by occupancy sensors. All toilets, urinals, faucets and showers are low flow.

The intentional way in which South Street Landing was constructed, the sustainability features it employs and the building's focus on the health and wellness of its occupants is a model for how Brown will renovate and construct buildings in the future.





South Street Landing serves as an example of how sustainability is incorporated into real estate development while enhancing occupant experience. Furthermore, Brown's investment in this abandoned and iconic historical building is part of the University's ongoing commitment to revitalize the Jewelry District and highlights the intersection of sustainability with real estate and economic development.



## Highlight: The Departmental Sustainability Program

he Departmental Sustainability Program (DSP) is a project led by the Office of Sustainability. Through this initiative, undergraduate interns work with Brown's academic and administrative departments to engage the Brown community in sustainability initiatives. The goal is to foster a culture of sustainability within individual departments, offices and schools by reporting baseline and trend data and then providing recommendations on how community members can improve their commitment to sustainability. The program also acts as a living lab where undergraduates are able to build important skills in communication, consulting and data analysis.

In FY18, the DSP launched at the Warren Alpert Medical School. In four phases—energy and water, waste, transportation and food—the office assessed the medical school's commitment to sustainability and collaborated with staff to provide the medical community with educational resources. As part of the program, the medical school began composting in student areas to improve the University's diversion rate. Multiple presentations were given to educate students, staff and faculty about proper waste-sorting practices. The Office of Sustainability and medical school stakeholders gained valuable insight into the practices, knowledge and mindsets of occupants in regards to different areas of sustainability.

A unique part of the DSP program at the medical school was the Climate and Health Speaker Series organized by the Office of Sustainability. The goal of the first event was to emphasize the role medical students play as future health professionals in thinking about community health, including climate change, in a broader sense. The event also sought to clarify the connections between climate and health and to galvanize medical students, faculty and staff into action on sustainability in their personal lives and at the medical school itself. The November event, "Climate, Health and Resilience," included Jessica Berry, Laura Bozzi (climate and health manager for the Rhode Island Department of Health) and Curt Spalding (former EPA Region 1 director and former executive director of Save the Bay).



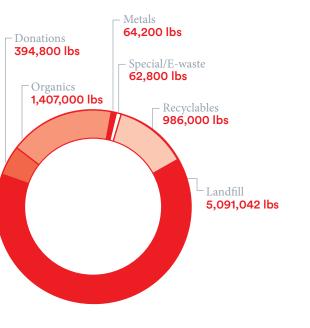
## A Year of Accomplishments: Waste, Dining Services, Grounds

he Office of Sustainability works with campus partners to collect and donate material to local charitable organizations. Our office's Clean Break Program (see page 32 for details) donated 32,796 pounds, or 16.3 tons of material. Three large Goodwill bins located on campus accumulated an additional 15.6 tons of miscellaneous material. Also contributing to diversion and donation efforts were the Office of Residential Life, which donated 165 tons of furniture and miscellaneous materials, and the Food Recovery Network, which donated just under 10 tons of food to local organizations. Brown Dining Services and the Office of Sustainability partnered in FY16 to adopt a robust composting program in campus dining facilities. This partnership resulted in over 570 tons of organic material going to a local composting facility in FY18.

#### **WASTE**



#### **BROWN'S WASTE STREAMS**

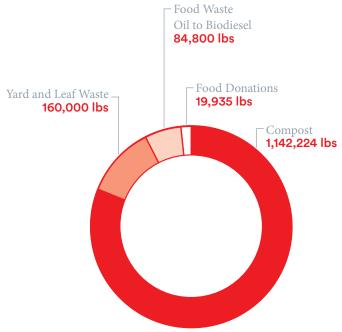




#### **ORGANICS DIVERSION AT BROWN**

The majority of our organics diversion at Brown is attributed to composting, the process of transforming organic materials such as food waste into a nutrient-rich, natural fertilizer. Composting has many benefits, including enriched soils, reduced contributions to landfills and decreased release of greenhouse gases into the atmosphere. As such, composting is an essential part of Brown's commitment to sustainability.

#### Organics Diverted from the Landfill



#### GROUNDS



13 street trees planted on campus.



Worked with Sustainable Food Initiative to revamp the student garden

80 tons of leaves collected off campus and donated to urban farms.

50 new trees and 100s of shrubs and perennials planted on campus.

8880

Brown's Grounds Division held a best practices symposium with Providence Parks. This work included field renovation of Fox Point and India Point Park.

#### **DINING SERVICES**

#### The Real Food Challenge

The Real Food Challenge leverages the power of youth and universities to create a healthy, fair and green food system. Brown considers all food purchasing decisions with four main criteria in mind: whether foods are local, ecological, fair and humane.

Currently 23 percent of Brown Dining Services' purchases meet the Real Food Challenge.

#### LOCAL

These foods and products can be traced to locally owned and operated, small and mid-size, farms, ranches, boats and businesses.

#### 23%









#### **FAIR TRADE**

Individuals involved in food production work in safe and fair conditions and receive fair compensation.

#### 2%





(Primary purchases include coffee and eggs.)

#### **ECOLOGICALLY** SOUND

Food producers conserve biodiversity and ecosystem resilience and preserve natural resources.

#### 6%



(Primary purchases include coffee and eggs.)

#### HUMANE

Animals have their mental, physical and behavioral needs met in a lowstress environment.

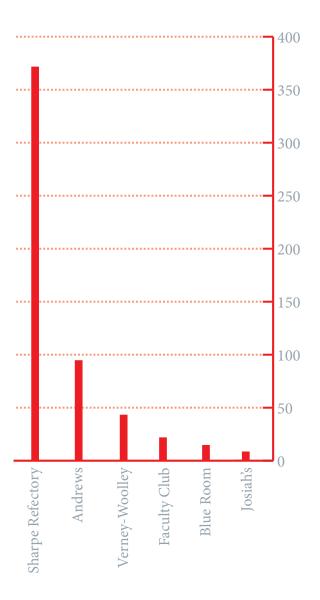
#### 14%





(Primary purchases include cage-free eggs and meat.)

#### Compost by Dining Hall (in tons)





Our food systems create 19-29 percent of global greenhouse gas emissions and account for 75 percent of the world's deforestation.... Sustainable food systems reduce chemical inputs, maximize growing potential on available land and often focus on local production and processing.... I've been impressed with Brown's commitment to purchasing local, organic and sustainably sourced food, and Dining Services' diligent effort to decrease food waste through food recovery and composting efforts.

> -Dawn King Director of Undergraduate Studies, IBES Senior Lecturer in Environment and Society



# A Year of Accomplishments: Energy

he Office of Sustainability, within Facilities Management, continuously works to support Brown's strategic plan, which highlights the theme of Sustaining Life on Earth and states: "Work on this theme will complement ongoing efforts to improve sustainability on campus."

In 2008 the University set a greenhouse gas emissions (GHG) goal of 42 percent reduction of 2007 levels by 2020. We continue to make progress on lowering our GHG emissions, which currently stand at 28.2 percent below 2007 levels (excluding new construction). This leaves us two years to meet our 2020 goal. We are confident we will meet this goal with the Thermal Energy Efficiency Project and continued significant investments in energy efficiency. Additionally, we have begun planning for new University GHG emission goals beyond 2020.

In FY18, \$2.5 million was spent on efficiency improvements. This investment resulted in approximately \$840,000 in National Grid utility incentive payments, an annual GHG emissions reduction of 1,872 tons and utilities savings of \$554,000.



## Highlight: The Thermal Energy Efficiency Project

he current campus central heating plant (CHP) is a steam-powered high-temperature system. The Thermal Energy Efficiency Project will convert the CHP to a medium-temperature hot water distribution system and eliminate steam distribution. The CHP components are nearly 50 years old and inefficient, especially at warmer outdoor conditions. As climate variability increases, with an overall trend of increased ambient temperature, the CHP must increase operational hours while running under inefficient infrastructure. Initial savings from the project will result from the reduction in radiant losses and higher plant efficiency at these lower temperatures.

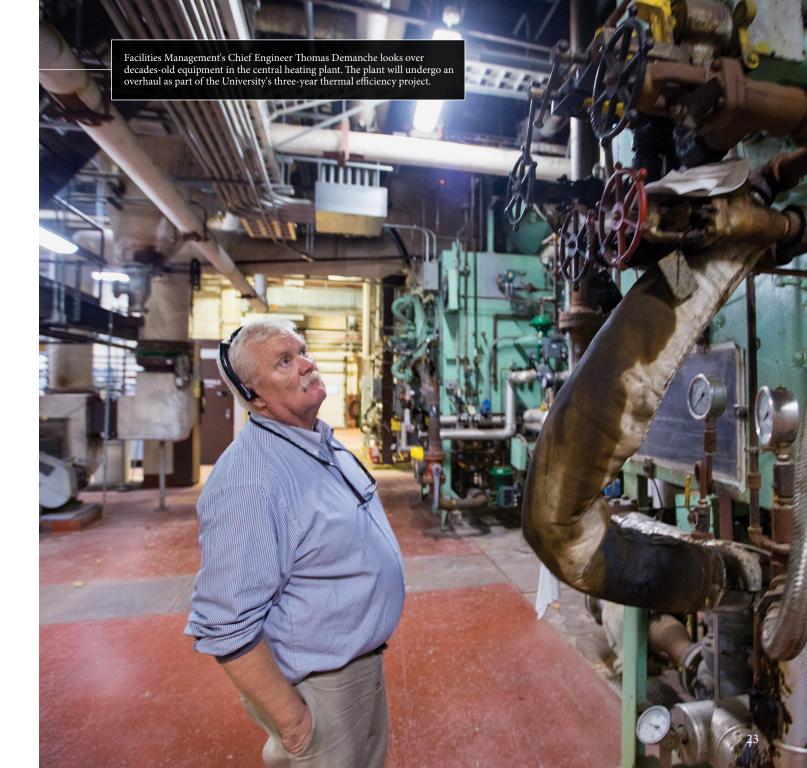
Upon completion in 2020, this three-year project is estimated to result in annual savings of over \$1 million in utility costs and a reduction in greenhouse gas (GHG) emissions by 5,000

tons. Additionally, the project is designed to enable longerterm system electrification, heat recovery energy distribution and service of lower temperature heating systems. The initial planning, equipment ordering and contractor staging of the first year of work was completed at the end of FY18.

Looking forward, the Thermal Energy Efficiency Project, along with planned energy conservation initiatives such as unoccupied laboratory ventilation, LED lighting, building ongoing commissioning and laboratory exhaust heat recovery, will contribute much of what we need in GHG reductions to meet our 2020 goal and maximize cost savings.

#### GHG Reduction Plan and Progress (without new construction)





### A Year of Accomplishments: **Purchasing/Events and Environmental Health and Wellness**

#### **EVENT AND CONFERENCE SERVICES**

In FY18, University Event and Conference Services worked with departments across campus to make events at Brown more sustainable. At Family Weekend, giveaway items included journals made from pressed apples and families received commemorative pins that they could wear again instead of plastic name badges.

University Event and Conference Services has continued to push the use of online resources, such as the Brown Guidebook, for Commencement to reduce physical copies of the Commencement program. This year the office printed 25 percent fewer copies than in FY16.

The Brown Commencement Guidebook App

74% download increase in 2018

**Commencement Programs** 

16,000 printed copies in 2016 12,000

printed copies in 2018

#### **ENVIRONMENTAL HEALTH AND WELLNESS - FLAME RETARDANTS**

The Strategic Sustainability Planning Advisory Committee (SSPAC) on Environmental Health and Wellness worked throughout the year to assess the feasibility of eliminating furniture and fabric purchases that contain chemical flame retardants. The committee successfully implemented a purchasing policy in spring of 2018.





Our health is closely tied to the environment in which we live, work and play. We're all routinely and involuntarily exposed to low or moderate levels of thousands of potentially harmful chemicals through our food, water and air. Similarly, the design of our homes, offices, neighborhoods and communities can have profound effects on our health and through a wide range of pathways, including exposure to air or noise pollution, opportunities for physical activity, or access to parks and other forms of green space. Most of these challenges are beyond the influence of any single individual and require community-wide to national solutions.

> -Gregory Wellenius Director of the Center for Environmental Health and Technology Associate Professor of Epidemiology

24 25

# A Year of Accomplishments: Sustainable Building Design and Transportation

#### SUSTAINABLE BUILDING DESIGN

The Division of Applied Math building was awarded LEED gold certification from the U.S. Green Building Council. This certification recognizes that the building was constructed and operates in an environmentally sound manner. Examples of measures taken to earn the certification include:

- Addition of bike racks and storage as well as access to showers and changing facilities
- Use of roofing materials with a solar reflectance index that reduces the heat island effect and minimizes the impacts on microclimates and human and wildlife habitats
- Installation of low-flow shower heads, toilets and faucets
- Use of regional building materials to support the use of native resources and reduce the environmental impacts resulting from transportation





#### **TRANSPORTATION**

**Shuttle Rides** 

101,509

4,168

106,277

69,060

1,246

Daytime Shuttle Rides

SEAS Shuttle Rides

**Evening Shuttle Rides** 

OnCall Shuttle Rides

Other (e.g. Parking Ban and Commencement)

#### Safewalk

Safewalk is a program staffed by student employees who provide point-to-point walking escorts for their fellow community members on the Brown campus. Each two-

person team also patrols the campus, along the Brown safeRIDE shuttle route, acting as additional "eyes and ears" for community safety.



#### **RIPTA Bus Rides**



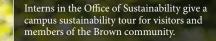
Average of **452** round-trip rides per day



**330,056** RIPTA rides for the year through the U-PASS program



RIPTA is **FREE** for the Brown community.





# **Community Engagement**

Brown is committed to supporting local institutions and organizations in Providence and surrounding areas while incorporating sustainability best practices. Efforts such as partnering with community organizations to collect and donate clothing and other items help Brown reach its goal of 50 percent diversion from the landfill while also supporting the needs of the local community. Brown is proud to work alongside its many partners and will continue to expand its work to ensure a more sustainable future.

#### **Highlight: The Clean Break Program**

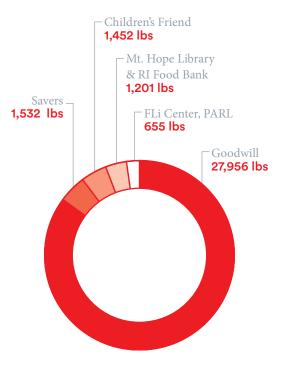
very May, thousands of Brown students leave campus for the summer break or to begin their post-college lives. This mass exodus means the University undergoes a spring cleaning of grand proportions. Students lighten their suitcases by donating clothing, housewares, electronics and books as part of the University's Clean Break Program.

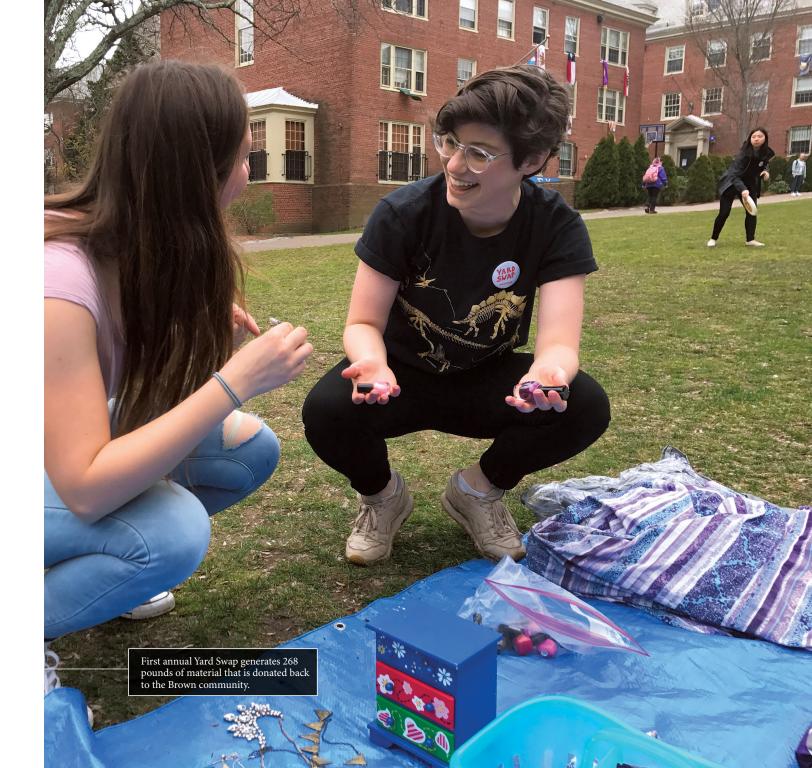
This year, our office, with the help of over 35 student volunteers and Custodial Services, partnered with eight campus and community organizations, increasing its partnerships and donated material. Donations such as bedding and cleaning supplies were given to the Providence Animal Rescue League to alleviate operational costs. Clothing and miscellaneous items went directly into the hands of students and community members in need through donations to Children's Friend, Brown's First-Generation College and Low-Income Student Center, Goodwill Industries and the Rhode Island Community Food Bank.

Brown is proud to work with Goodwill, which directs 90 percent of the revenue from donations into funding jobtraining programs for Rhode Island youth with disabilities and other challenges to employment. Brown is committed to supporting groups that give back to the community, including the Mt. Pleasant Library Friends, which raised over \$1,000 for adult and child enrichment programs, thanks to donations from the Clean Break Program.

In total, 32,796 pounds of material were donated to our partners and kept out of the landfill.

#### **Donation Amounts**





## Highlight: EmPOWER, the Hub for Environmental Student Groups

mPOWER is Brown's umbrella environmental organization, composed of member groups that address issues related to climate change, energy efficiency, food, waste, transportation, environmental justice and environmental literacy.

#### **MEMBER GROUPS INCLUDE:**

Sustainable Food Initiative (SuFI) | Food Recovery Network | Climate Action League | SCRAP | Green Events/EcoReps | Bikes@Brown | Rhode Island Student Climate Coalition (RISCC) | Environmental Justice@Brown

**50** 

college students convened for RISCC's conference to discuss the work they are doing on individual campuses to address climate change.

**30** 

Rhode Island politicians were convinced by RISCC students to sign the No Fossil Fuel Money Pledge through the students' work at the Rhode Island Sunrise Movement hub. **95** 

composting buckets were handed out by the student group SCRAP to Brown community members to encourage composting for staff, faculty and students.



Students from the Climate Action League audited television screens across campus to assess current energy consumption and ways to save. They concluded that if all campus TVs were shut off every night, the electricity savings would be the equivalent of powering three small homes.



In spring 2018, EcoReps launched its first plastic bag recycling drive and collected 115 plastic bags within four hours — all of which were recycled.

#### **Highlight: The Sustainability Tour**

In Spring 2017, interns from our office began planning a Brown tour that focuses on environmental sustainability inside and outside the classroom. Interns worked with professors from the Institute at Brown for Environment and Society, members of environmental student groups and staff from the Office of Sustainability, Grounds Division, Custodial Services, Design and Construction and the Transportation Office to highlight different parts of sustainability at Brown.

The tour launched in October 2017, with the pilot continuing until Thanksgiving. In the spring, the tour ran from early February until the end of April with growing attendance.

The Sustainability Tour introduces prospective and current students, faculty, staff and community members to sustainability initiatives at Brown, including composting and recycling, LEED-certified buildings, academic engagement, local food and alternative living options. The tour guides

share their experiences with sustainability at Brown and how students can get involved inside and outside the classroom.

The Sustainability Tour was marketed on campus through Today@Brown and to prospective students through the Brown admission website. Attendees who filled out the feedback form said the tour provided them with new information about sustainability at Brown. Of the prospective students who filled out the feedback form, 100 percent said the tour influenced their opinion about coming to Brown.

Our office will continue to offer the Sustainability Tour and share information with current and prospective students, staff and faculty about Brown's commitment to sustainability and how to get involved.







e expect FY19 to be a banner year for Facilities Management's Office of Sustainability and sustainability on campus.

In early FY19 the Office of Energy and Environmental Initiatives was renamed the Office of Sustainability to reflect the breadth of sustainability that extends beyond energy and environment and recognize the social and economic factors associated with the office's mission. The office will undergo a significant restructuring and rebranding, which will enhance the visibility and resources available to take on expanding the office's reach in a strategic and long-term manner.

Additionally, an exciting collaboration of administrators and academics will occur in FY19, as Associate Professor Stephen Porder has been appointed assistant provost for sustainability. We look forward to Stephen collaborating with the Office of Sustainability to more fully integrate academics and

research into sustainability planning and decision-making. This new position, along with Professor Leah VanWey, associate provost for academic space, will enhance the office's work with stakeholders in developing a University Strategic Sustainability Plan — a public-facing, University commitment to sustainability that will identify the University's sustainability mission, fundamental principles, goals and implementation strategy.

This plan is expected to include a tractable and quantifiable approach to sustainability and define scope, indicators, metrics and accountability. As the strategic plan is being developed, the urgent call for addressing emissions and waste reduction and diversion will not cease. In parallel with strategic planning, FY19 will be focused on: procuring renewable sources for electricity; decarbonizing campus operations; assessing, quantifying and proposing Scope 3 emissions protocol; and continued implementation of the waste management plan, including standardization of waste infrastructure and putting a special waste program in place. The Office of Sustainability is enthusiastic for the coming year, and we look forward to working across the University, and beyond, to reinforce and enhance Brown's standing as an example of sustainability in the greater community.

### **Acknowledgments**





he Office of Sustainability would like to acknowledge, first and foremost, the contributions and efforts of the Office of Sustainability interns and EmPOWER students, whose commitment to various sustainability initiatives provides the University with valuable insight and resources to elevate sustainability initiatives across campus. The success of the Office of Sustainability is hinged on collaboration with departments, staff and faculty that directly contribute to sustainability efforts at Brown.

## We would like to acknowledge and thank the following partners:

- Leah VanWey, Associate Provost for Academic Space, Professor of Environment and Society and Sociology
- Stephen Porder, Assistant Provost for Sustainability, Associate Professor of Ecology and Evolutionary Biology and Fellow in the Institute at Brown for Environment and Society
- Longer Term Sustainability Study Committee
- South Street Landing Operations Planning Committee
- Brown Dining Services
- Office of Transportation and Parking Services
- School of Professional Studies

- The Warren Alpert Medical School of Brown University
- Office of University Communications
- Office of Government Relations and Community Affairs
- C.V. Starr Program in Business, Entrepreneurship and Organizations
- Office of Residential Life
- Brown Purchasing Services
- Brown Real Estate and Auxiliary Housing Office
- Environmental Health & Safety

70% FSC certified wood/fiber and/or post-consumer input | 10% recycled | Green E certified Clean Energy certified 41



The 20th century saw humanity make extraordinary strides towards well-being, including dramatic improvements in food production, medical care and access to energy. In so doing, however, humans have become a dominant force in the earth system, which, as a consequence, is changing at an unprecedented rate and threatening the successes of the past. Slowing, stopping and, eventually, reversing these changes is perhaps the most pressing challenge we have ever faced. As an institution that has existed for 250 years, and which hopes to educate students and citizens for the next 250, we have to take a leadership role in the sustainable management of the earth system. We need to lead by example, lead by teaching and lead by innovating. This is at the core of Brown's mission.

> -Stephen Porder Assistant Provost for Sustainability Associate Professor of Ecology and Evolutionary Biology and Environment and Society

