

# Managing a diverse and comprehensive recycling program at UMass Medical School

Suzanne Wood  
Sustainability & Energy Manager, UMass Medical School

November 8, 2018

# Overview of UMass Medical School

Located in Worcester, MA

3 million GSF on the main campus consisting of a combinations of biomedical research labs, healthcare, classrooms, and administrative space for the Medical School and our clinical partner UMass Memorial

Diverse campus population of approximately 8,000 faculty, staff, and students and roughly 10,000 daily visitors.

Our clinical partner UMass Memorial Health Care is the largest healthcare system in Central and Western MA with over 50 sites across the region



# Waste Diversion Programs at UMMS

## More than just single stream....

- Single stream recycling
- C&D
- Metal
- Electronic
- Bulk items/white goods
- Confidential Paper
- Pallet donation
- Pre-consumer food donation
- SWAP (surplus with a purpose) Shop

## Our programs, beyond the bins

- Communication and outreach
- Location of bins
- Develop Innovative Programs
- Audit, Audit, Audit
- Support Network



# Communication and Outreach – Signage



Developed area specific signage,  
that focused on images



# Communication and Outreach – web recourses and newsletter



Growing Green: Campus Sustainability



## Think before you trash it !

### Recycle

Reducing our overall waste stream by recycling is a major goal of our sustainability program. Our program is single-stream, meaning all recyclables can go in the same bin. Common recycleable categories include: clean non-HIPAA paper & cardboard, rigid plastics #1 – 7, glass & metal containers. Trash items include: styrofoam, flexible plastics, snack bags & wrappers, soiled paper, cardboard and food waste.



Download signs for your use:

- Recycle for offices
- Recycle for labs
- Recycle for cafeterias
- Recycle for clinical areas
- Common trash

### Reuse



SWAP, otherwise known as "Surplus With A Purpose," is an initiative that facilitates the reuse of equipment on campus.

UMass Medical School students, faculty and staff are encouraged to bring surplus office supplies, small furniture or laboratory equipment to SWAP Shops in Worcester on the main campus in room SS-320 of the main medical school building or in Shrewsbury at the South Street complex, room SS-13E497.

See what's in stock:  
[SWAP Shop in Worcester](#)  
[SWAP Shop at South Street](#)

### Other items we recycle

**Ink cartridges:** recycle ink and toner cartridges in one of three ways: 1) return by mail using manufacture supplied shipping label, 2) return to Office Max delivery personnel, 3) deposit in ink and toner recycling bin located on the trash docks.

**Electronics:** Computers, monitors, appliances, medical and research equipment can be recycled by depositing items in the cardboard bin on the main school/hospital trash dock.

**Batteries:** Rechargeable batteries and cell phones are recycled through Call2Recycle. Alkaline batteries are not recycled and can be deposited in the the regular trash.

**Food waste:** UMass Medical School is also diverting a significant portion of its organic waste, primarily pre-consumer food waste, to a local farm.

### Single Stream Process



Take a look inside the plant that processes recyclables from UMMS



## Recycling Rates Up Since 2013

When E.L. Harvey first took over waste and recycling management services for UMass Medical School and UMass Memorial Health Care, many areas did not have a formalized recycling program. See article, March 2018



## UMass Memorial Wins EPA Award

Every time someone drops a bottle, plastic container or magazine into the proper recycling bin, it makes a big difference. See article, February 2018.



## Popular Reuse Program Launches at South Street

After two years of success on the main campus, the SWAP Shop expands to the university's South Street complex in Shrewsbury. The grand opening was December 21. See article, December 2017



## New Look for Lab Recycling

Waste stream audits have shown that the research labs on campus do a good job recycling acceptable materials. A new awareness program will help those conscientious recyclers grow even greener. See article, March 2017.

# Location of Recycling Bins

- Where possible, pair recycling and trash bins next to each other
- Provide consistency between floors so occupants know what to expect (i.e. always located in the elevator lobbies)
- In areas with high risk of contamination make recycling visible but not *too* convenient (avoided placing bins inside patient rooms or laboratories)



# Innovative Programs

## Centralized Trash Program

Centralized Trash is a university wide initiative to promote recycling in office areas by encouraging people to think about what is recyclable.

Locations that have moved to centralized trash give up their desk side trash in exchange for a recycling bin and the trash is moved to a centralized location(s) in the office.

You'll be surprised to find most of what you find in your office is recyclable!

### What can go in your recycling bin?

*Single stream recycling allows for paper, glass, metal, and plastics to go into one recycling bin*

- **Paper** newspaper, non confidential office paper, magazines – “if it rips, it recycles”
- **Empty paper products** coffee cups, soda cups, juice/milk cartons
- **Empty Ridges plastics** soda and water bottles, plastic cups, plastic to-go containers
- **Empty Glass Bottles**
- **Empty Metal Containers** tin cans, soda cans, foil, metal food trays

### What is not recyclable?

- **Styrofoam** containers, trays, cups
- **Soiled Paper Products** anything that has soaked up food residue grease, napkins, tissues
- **Flexible plastics and wrappers** plastic bag, chip bags, candy/granola bar wrappers
- **Food waste**



# Audits, Audits, Audits

## Annual Compactor Load Audits

- Conducted annually for both trash and recycling compactors
- Provides a snapshot of items that make up both streams
- Used to identify points of contamination and recycling opportunities

Material	Cardboard	Office Paper	Newspaper/	Bottles and	Other Plastics	Metal
	Percentage	Percentage	Percentage	Percentage	Percentage	Percentage
Waste		1%		2%		
Simple Stream	60%	15%	5%	5%	0%	5%
Simple Stream	80%	3%	2%	2%	3%	
Simple Stream	60%	10%	5%	10%	5%	
Waste	5%			5%		
Waste	10%			5%		
Waste				3%	2%	
Waste	2%	2%		1%		
Simple Stream	40%	10%	10%	20%	0%	0%
Simple Stream	65%	10%	5%	5%	5%	
Simple Stream	45%	5%	5%	15%	10%	
Simple Stream	35%	15%			10%	3%

## Quarterly Building Infrastructure Audits

- Evaluate building trash and recycling infrastructure at site and within buildings
- Visual audits of trash/recycling containers and compactors
- Used to identify points of contaminations, recycling opportunities, and where additional education/signage is needed.





# Support Network

- Resource Manager
  - Program support
  - Audits
  - Training
- Housekeeping/Environmental Building Services
  - Training
  - Infrastructure placement
  - Collection of trash/recycling
- Trash/Recycling Dock Material Handlers
  - Last line of defense to ensure trash/recycling ends up in the correct waste streams
- Recycling Champions
  - Peer to peer training
  - Feedback loop

# We've come a long way, but...

- Buy-in by staff –
  - we have some champions who are engaged, but most departments still do not have recycling champions or a consistent contact for communication
- Perception –
  - Trash and recycling are both collected in clear bags, which are placed into the same tilt cart and brought to the dock where they are placed in the appropriate containers/compactors – still this leads to confusion where staff thinks everything is going into the trash
- Compliance –
  - Hospital fire codes restrict where we can place recycling/trash bins and the sizes
  - Bins get moved or disappear
  - Department have bought their own bins to use as confidential paper recycling program which do not align with university/UMMHC recycling programs
- Broader Consistency Needed- Changing Markets
  - We hear “Styrofoam has a recycling symbol on it” or “I recycle this at home” a lot, so despite education on-campus lack of consistency from a broader perspective can be hard for staff to understand

# Questions???

Suzanne Wood, LEED AP  
*Sustainability & Energy Manager*  
Suzanne.Wood@umassmed.edu

[www.umassmed.edu/growinggreen](http://www.umassmed.edu/growinggreen)

 @UMassMedGreen

 @UMassMedSustainability