

**MEMORANDUM**

INLUC  
Agenda Item No. 3(G)

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**TO:** Honorable Chairman Joe A. Martinez  
and Members, Board of County Commissioners

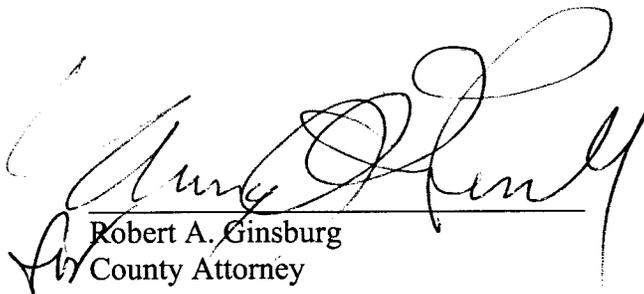
**DATE:** May 10, 2005

**FROM:** Robert A. Ginsburg  
County Attorney

**SUBJECT:** Resolution directing the  
County Manager to implement  
recommendations of the  
Miami-Dade Conservation  
Committee

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The accompanying resolution was prepared and placed on the agenda at the request of Commissioner Katy Sorenson.



Robert A. Ginsburg  
County Attorney

RAG/bw



# MEMORANDUM

(Revised)

**TO:** Honorable Chairman Joe A. Martinez  
and Members, Board of County Commissioners

**DATE:** June 7, 2005

**FROM:** Robert A. Ginsburg  
County Attorney

**SUBJECT:** Agenda Item No.

Please note any items checked.

- "4-Day Rule" ("3-Day Rule" for committees) applicable if raised
- 6 weeks required between first reading and public hearing
- 4 weeks notification to municipal officials required prior to public hearing
- Decreases revenues or increases expenditures without balancing budget
- Budget required
- Statement of fiscal impact required
- Bid waiver requiring County Manager's written recommendation
- Ordinance creating a new board requires detailed County Manager's report for public hearing
- Housekeeping item (no policy decision required)
- No committee review

RESOLUTION NO. \_\_\_\_\_

RESOLUTION DIRECTING THE COUNTY MANAGER TO IMPLEMENT THE RECOMMENDATIONS OF THE MIAMI-DADE COUNTY RESOURCE CONSERVATION COMMITTEE (MDRCC); ESTABLISHING POLICIES AND GUIDELINES TO FURTHER WASTE REDUCTION, RECYCLING, AND ENVIRONMENTALLY PREFERABLE PURCHASING (EPP) ACTIVITIES IN COUNTY DEPARTMENTAL OPERATIONS

**WHEREAS**, the Board approved Resolution Number R-374-03 establishing the Miami-Dade Resource Conservation Committee to make recommendations on waste reduction, recycling, and environmentally preferable purchasing activities within County departmental operations; and

**WHEREAS**, the attached report entitled "Summary Report for Recycling and Environmentally Preferable Purchasing for the Period of April 1, 2003 – March 31, 2004" contained several recommendations and initiatives to help further the County's progress in these activities; and

**WHEREAS**, implementation of these recommendations will facilitate Miami-Dade County in meeting and exceeding the mandates of the Florida Solid Waste Act of 1988, Florida Statute 403.7065 relating to procurement of products or material with recycled content, and the Comprehensive Development Master Plan as it relates to reduction of solid waste and as it relates to establishment of products and/or materials created from recycled wastes,

**NOW, THEREFORE, BE IT RESOLVED BY THE BOARD OF COUNTY COMMISSIONERS OF MIAMI-DADE COUNTY, FLORIDA**, that this Board hereby directs the County Manager to implement the recommendations of the Miami-Dade County

Resource Conservation Committee as provided in the report attached hereto and referenced above, and to provide a report to the Board of County Commissioners within 90 days detailing the actions taken as it relates to the implementation of these recommendations in substantially the form attached hereto and made a part hereof.

The foregoing resolution was sponsored by Commissioner Katy Sorenson and offered by Commissioner \_\_\_\_\_, who moved its adoption. The motion was seconded by Commissioner \_\_\_\_\_, and upon being put to a vote, the vote was as follows:

- |                               |                          |
|-------------------------------|--------------------------|
| Joe A. Martinez, Chairman     |                          |
| Dennis C. Moss, Vice-Chairman |                          |
| Bruno A. Barreiro             | Dr. Barbara Carey-Shuler |
| Jose "Pepe" Diaz              | Carlos A. Gimenez        |
| Sally A. Heyman               | Barbara J. Jordan        |
| Dorrin D. Rolle               | Natacha Seijas           |
| Katy Sorenson                 | Rebeca Sosa              |
| Sen. Javier D. Souto          |                          |

The Chairperson thereupon declared the resolution duly passed and adopted this 7<sup>th</sup> day of June, 2005. This resolution shall become effective ten (10) days after the date of its adoption unless vetoed by the Mayor, and if vetoed, shall become effective only upon an override by this Board.

MIAMI-DADE COUNTY, FLORIDA  
BY ITS BOARD OF  
COUNTY COMMISSIONERS

HARVEY RUVIN, CLERK

Approved by County Attorney as  
to form and legal sufficiency. 

Thomas H. Robertson

By: \_\_\_\_\_  
Deputy Clerk



## MEMORANDUM

**TO:** Honorable Katy Sorenson, Vice Chair  
Board of County Commissioners

**DATE:** August 3, 2004

**FROM:** George M. Burgess  
County Manager

**SUBJECT:** Request for Information Regarding  
Purchase of Recycled/Environmentally  
Friendly Products

The Summary Report provides a snap shot of information collected for each of the requested categories: Recycling, Recycled Content Purchasing, and Environmentally Preferable Purchasing. Each of these categories themselves has a more detailed summary report that is attached as an addendum behind the overall Summary Report. As is mentioned in this Report, the figures presented are the best available approximations due to the fact that departments do not traditionally track this information and this is the first time it has been requested. The information requested from departments for this report will now be requested on an annual basis, and the data in this report will serve as the baseline upon which future results will be compared.

Please advise if you require any additional information at this time.

cc: Pedro G. Hernandez, P.E., Assistant County Manager  
Corinne Brody, Special Assistant, Strategic Management Initiatives  
Alex Muñoz, Assistant County Manager  
Susanne Torriente, Assistant County Manager  
John Renfrow, Director, DERM  
Theodore G. Lucas, Director, DPM

**Summary Report for Recycling and Environmentally Preferable Purchasing  
For the Period of April 1, 2003 – March 31, 2004**

The information contained in this Summary Report is being provided in response to the information requested in the March 10, 2004 Memorandum from Commissioner Sorenson, concerning the County's recycling and Environmentally Preferable Purchasing (EPP) activities. In an effort to gather data in a more consistent format, and to facilitate more accurate reporting now and in the future, DERM staff developed reporting forms with specific instructions, along with a database to allow processing of the data into various reporting categories. A "Reporting" package was created and distributed by the County Manager's Office to all County departments, instructing them to electronically provide to DERM the information requested in the Memorandum. The information submitted by the departments has been entered into the database and results have been tabulated for various aspects of these activities. This information will now be requested from departments on an annual basis, with the reporting cycle coinciding with Earthday, April 22<sup>nd</sup>, since that is the day Resolution #374-04 was passed.

It is important to note that most of these numbers are approximations, rather than exact amounts, and in most cases are probably lower than the actual figures. Factors contributing to this include the following:

- This is the first time this information is being requested and departments have not historically tracked these measures and activities, resulting in incomplete information from some departments. DERM will work with individual departments during the next reporting cycle, to refine the reporting structures.
- The past several contracts for mixed paper recycling were problematic. There were several interruptions in service over the past 3 years due to contractor business closings during term of contract, as well as a lack of submittal of reports from the contractor.

This Summary provides some of the more significant figures obtained from information submitted by County departments for their recycling and purchasing initiatives during the requested period of April 1, 2003 to March 31, 2004. The complete Summary Reports containing more detailed information are attached as an addendum.

**RECYCLING**

Recycling is a way to divert wastes from final disposal by reprocessing them to remove and utilize valuable components as a feedstock or raw material in the manufacturing of new products. There are numerous items recycled by County departments, from paper products, to carpet, to fleet maintenance materials. The table below provides information about those items that are recycled in relatively large volume during the reporting period. As shown, in some instances revenue is generated and in some instances there are costs incurred. For the subset of items listed below, there is a net gain of approximately \$175,000.00. Overall, the County saved approximately \$108,000.00 through its entire recycling activities (see the attached full report for more details and a comprehensive listing).

Recycled Item	Quantity	Units	Revenue (+) or Cost (-) **
Batteries (Alkaline & Rechargeable)	21,150	lbs.	-\$ 14,735.79
Vehicle Batteries	1,497	batteries	+\$ 17,186.58
Carpet	105,137	lbs.	-\$ 26,284.25
Fluorescent Lamps	42,134	bulbs	-\$ 22,176.50
Fuel	554,368	gallons	+\$ 203,348.00
Paper (white office)	>770,838	lbs.	-\$ 7,448.36
Scrap Metal	819,875	lbs.	+\$ 10,935.00
Used Oil	106,266	gallons	+\$ 13,996.63
<b>Total For Items In Chart</b>			<b>+\$ 174,821.31</b>

\*\* In the chart above, "Revenue," with a (+) in front of the number, indicates that the County was paid to recycle this item and "Cost," with a (-) in front of the number, signifies that the County paid to have that item recycled

It is important to note a few issues here:

- Not all departments provided information for costs/revenues to correspond to the volumes of recycled items reported; therefore these costs/revenues may be understated, both in the chart above and in the overall report.
- The volume of white office paper recycled over the past year since Resolution 374-03 was passed has been estimated from data supplied from March to May, 2004, by the current recycling contractor, Eco Paper Recycling Corporation. It is anticipated that these figures will increase over the next year as the Resource Conservation Committee promotes paper recycling to County employees and departments, and as long as the current contractor continues to provide good service.
- Disposal and recycling of electronics, particularly components associated with computer systems, is quickly becoming an important and problematic issue nationwide. Although several departments indicated transference of these items to the County Store for final disposition, this issue should be investigated further.

### **RECYCLED-CONTENT PURCHASES**

Products that are designated as containing "recycled content" are those items that are partially or wholly manufactured from a material that has been collected from a waste product and reprocessed to serve as a "raw" material in the finished product. The County spent approximately \$2,000,000.00 on the purchase of recycled-content products. Of these overall purchases, approximately \$1,050,000.00 was spent on recycled-content items available through the GSA Supply Catalogue. There are over 100 items listed in the Catalogue that are made of recycled content materials. During this reporting period, overall expenditures on GSA supplies from the Catalogue totaled \$7,113,538.50. Therefore, the recycled-content purchases comprised

approximately 15% of the overall GSA Catalogue purchases. Most of the items listed in the chart below are office supplies available in the Catalogue.

Item	Quantity	Units	Expenditures
Calendar Books/Planners	9,589	Items	\$ 39,392.80
Storage Boxes	8,040	Items	\$ 102,912.00
Carpet	10,000	Sq. Yds.	\$ 241,787.00
Clipboards	2,737	Items	\$ 7,428.35
Monthly Planner Desk Pads	15,269	Items	\$ 14,505.55
File Folders	10,781	Boxes	\$ 63,937.20
Classification & Budget Folders	4,612	Boxes	\$ 106,122.25
Recycled-content Paper	18,211	Cases	\$ 623,567.27
Expanding Pocket Files	28,181	Items	\$ 17,568.25
Paper Towels	8,719	Cases	\$ 99,655.03
Toilet Paper	8,408	Cases	\$ 230,272.45
<b>Total for Items in Chart</b>			<b>\$ 1,547,148.15</b>

It is important to note a few issues here:

- The GSA catalogue is currently the standard source for the purchase of office supplies and therefore is the primary means of informing County staff of items available with recycled content. The most current edition available is the 1999 – 2001 catalogue.
- There is no direct equivalent recycled-content paper available for the virgin 8.5 X 11 in., 24 lb. Laser paper (Item P-1531). The closest comparable paper is the 30% post-consumer recycled content, 8.5 x 11 in., 20 lb. photocopier (general purpose) paper. It is approximately \$10.00 cheaper per case than the virgin paper, but is also a lighter weight, and therefore may not be a suitable substitute in all instances.
- The virgin 8.5 x 11 in., 20 lb. photocopier paper is approximately \$2.00 per case cheaper than the equivalent (8.5 x 11 in., 20 lb.) 30% post-consumer recycled-content copier paper, which may be a disincentive for purchasing it. This cost difference may, in part, be due to purchasing volumes.
- The total expenditures in paper (virgin & recycled-content) reported during this period were \$2,065,956.00. Therefore, the recycled-content paper purchases comprised approximately 30% of this overall purchase. These figures include paper used by GSA at the print shop and copy center, as well as paper used at the Data Center located within the Emergency Operations Center, where numerous large reports are printed out on a daily basis.

**ENVIRONMENTALLY PREFERABLE PURCHASING (EPP)**

Environmentally Preferable Purchasing, or EPP, is described as “the purchase of products or services that have a lesser or reduced effect on human health and the environment when compared with competing products or services that serve the same purpose.” The information provided for this category does not lend itself as well to database tabulation. Therefore, the table below provides brief descriptions. From the information provided by departments, it is estimated that the County saved over \$2,200,000.00 through EPP initiatives.

<b>Initiative</b>	<b>Dept.</b>	<b>Annual \$ Savings</b>	<b>Environmental Benefit</b>
The required Annual Bond Holders Book Report is distributed on CD rather than hard copy, as previously done.	Finance	\$ 16,000.00	Reduced paper usage for this report by 50% and reduces pollutants associated with paper production.
Transitioned from traditional film cameras to digital cameras	DERM	\$ 42,000.00	Resources conserved and pollution prevented from production and developing of film.
Heavy-duty tires are recapped up to 3 times, prior to final disposal.	GSA	\$1,141,552.00	Reduced energy and natural resource (oil) usage by recapping old tires instead of manufacturing new tires. Also saves landfill space.
PuraDYNE oil filters installed on most heavy duty equipment	GSA	\$ 18,480.00	Oil consumption reduced by 50% and oil filters usage reduced by 66%
Waste water treatment plants recover 29,376,000 KW/Yr of Methane gas generated from the wastewater treatment process for use as a fuel on-site	WASD	\$1,013,472.00	Makes use of a waste product, methane, that is a “Global Warming Gas”, and avoids pollution produced from other sources of energy such as electricity.
<b>Total Savings for These Initiatives</b>		<b>\$2,231,504.00</b>	

The table above highlights those EPP initiatives that have provided the County with a significant cost savings, as well as the environmental benefits associated with them. There are other EPP initiatives implemented that may not necessarily save money, but provide other significant benefits in addition to the environmental benefits. For example, each year DERM purchases recycled plastic content T-shirts for its Baynanza Bay Clean-up Day. One of primary benefits in addition to the environmental benefits is that the T-shirts serve as an educational tool, to help teach the public participants at the event about the importance of recycling and buying recycled. Another initiative that was implemented several years ago was to include criteria in janitorial cleaning contracts supporting the use of safer, less toxic cleaning chemicals. This not only benefits the environment, but also promotes healthier and safer buildings, benefiting both the cleaning staff, as well as the County employees and public entering these buildings.

9

It is believed that there are additional EPP initiatives currently being implemented, but since many individuals do not fully understand the concept of Environmentally Preferable Purchasing, they do not realize that they are implementing these types of projects. DERM staff and the Miami-Dade Resource Conservation Committee intend to follow up with departments to better educate them on the concept, and help departments better identify those projects that fall under this category.

### **THE MIAMI-DADE RESOURCE CONSERVATION COMMITTEE**

As per Resolution #374-03, the Miami-Dade Resource Conservation Committee is tasked with several responsibilities associated with the promotion and implementation of waste reduction, recycling and Environmentally Preferable Purchasing activities. Unfortunately, during the past year, the Committee fell short of several of its goals for these initiatives because of the problems encountered with the paper recycling contracts. The majority of Committee time was spent on the administrative tasks associated with vendor non-performance and the creation and implementation of a new bid for paper recycling services. As a result, there was very little promotion or progress with these initiatives. DERM and Committee representatives will work with GSA and the Department of Procurement Management to determine other alternatives for handling these administrative tasks and resolve this issue.

### **SUMMARY & RECOMMENDATIONS**

This project has provided an excellent learning experience for all involved. It has made all of the departments more aware of their activities and progress in waste reduction, recycling, and Environmentally Preferable Purchasing. It has brought these initiatives to the forefront, which can help provide the impetus for making further progress in these areas, and has provided a rough baseline upon which to measure future success. It has also helped identify some problem areas in reporting and implementation that can now be addressed, as well as additional opportunities that can be pursued by County departments.

Based on the experience and information gathered during this project, DERM staff will continue to work with the Miami-Dade Resource Conservation Committee to further the County's progress in its waste reduction, recycling, and Environmentally Preferable Purchasing goals. Some of the initiatives to achieve this goal include:

- 1) Ensure that there is an equivalent recycled-content paper available for the virgin 8.5 x 11 in., 24 lb. Laser paper. Although the recycled-content 8.5 x 11 in., 20 lb. photocopier paper can be utilized in most applications where the virgin 24 lb. Paper is used, this would facilitate a higher usage of the recycled-content paper.
- 2) Require all departments to purchase recycled-content paper for all standard office uses, allowing for exceptions when virgin paper must be utilized for special reasons. Because of the volume of paper purchased by Miami-Dade County, this should facilitate reduced prices for recycled-content paper.

- 3) Have the appropriate department(s) conduct a systematic review and verification of all items available in the GSA catalogue (and on-line listing) that contain recycled-content materials, to determine which items truly are available in recycled content. Once this has been determined, identify these items more clearly and promote them as the preferred choice. If possible, also establish a system to insure that when recycled-content items are specified, that is what is shipped to the department.
- 4) Assign the administrative duties of service and contract management for the recycling services to the appropriate department(s) and/or individuals, allowing the Committee more time to identify and promote additional waste reduction, recycling, and EPP opportunities.
- 5) Establish a formal policy for County departments to transition to digital cameras from traditional film cameras.
- 6) Establish a formal policy for County departments to properly handle, recycle, and dispose of electronic equipment. This will help the County proactively address anticipated future restrictions on disposal of these wastes into landfills, and help prevent the County from incurring liabilities associated with improper disposal of these wastes.

The Resource Conservation Committee will also be identifying additional opportunities and recommendations in the coming year.



**Summary of  
Items Collected for Recycling**

sorted by:

- 1 - department
- 2 - year
- 3 - GSA contract

prepared on:

7/14/2004

prepared by:

Miami-Dade County  
Resource Conservation Committee

# 2004 RCC Report on Department Recycling

Reporting Period: 4/1/2003 - 3/31/2004

Recycled Item	Quantity	Revenue	Reg	ID
Aluminum cans	0 pounds	\$0.00	<input type="checkbox"/>	2
Batteries (alkaline)	582 pounds	(\$147.40)	<input type="checkbox"/>	6
Batteries (rechargeable)	20,727 pounds	(\$14,433.39)	<input checked="" type="checkbox"/>	14
Batteries (vehicle)	1,497 each	\$17,186.58	<input checked="" type="checkbox"/>	29
Cardboard	48 96-gal cntnr	\$0.00	<input type="checkbox"/>	4
Cardboard	4,150 pounds	(\$1,493.04)	<input type="checkbox"/>	4
Carpet	105,137 pounds	(\$26,284.25)	<input type="checkbox"/>	37
Coolant/Antifreeze	1,703 gallons	\$917.00	<input checked="" type="checkbox"/>	13
Drum: 30-gal empty	64 each	\$0.00	<input type="checkbox"/>	38
Drum: 55-gal empty	1,625 each	\$0.00	<input type="checkbox"/>	20
Electronics (mixed)	2,346 each	\$5,501.00	<input type="checkbox"/>	36
Electronics: monitors	6 each	\$0.00	<input type="checkbox"/>	11
Electronics: not monitors	2 each	\$0.00	<input type="checkbox"/>	12
Fluorescent Lamps	46,538 each	(\$22,176.50)	<input checked="" type="checkbox"/>	9
Fuel	554,368 gallons	\$203,348.00	<input checked="" type="checkbox"/>	35
Mixed Recyclables			<input type="checkbox"/>	8
Newspaper	0 pounds	\$0.00	<input type="checkbox"/>	5
Oily wastewater	4 55-gal drum	\$324.17	<input checked="" type="checkbox"/>	28
Pallets	1,503 each	(\$2,507.35)	<input type="checkbox"/>	21
Paper (mixed)	30 96-gal cntnr	\$0.00	<input type="checkbox"/>	7
Paper (mixed)	4,600 gallons	\$0.00	<input type="checkbox"/>	7
Paper (mixed)	400 cu ft	\$0.00	<input type="checkbox"/>	7
Paper (mixed)	174,200 pounds	\$59.20	<input type="checkbox"/>	7
Paper (white office)	192 96-gal cntnr	\$0.00	<input type="checkbox"/>	1
Paper (white office)	770,838 pounds	(\$9,721.76)	<input type="checkbox"/>	1
Refrigerant (R12)	1 30-lb gas tan	(\$910.00)	<input checked="" type="checkbox"/>	30
Refrigerant (R134)	7 30-lb gas tan	(\$849.90)	<input checked="" type="checkbox"/>	31
Scrap metal (aluminum)	1,620 pounds	\$755.00	<input type="checkbox"/>	26
Scrap metal (copper, wiring)	2,255 pounds	\$2,076.00	<input type="checkbox"/>	25
Scrap metal (ferrous)			<input type="checkbox"/>	27
Scrap metal (mixed)	9 each	\$0.00	<input type="checkbox"/>	24
Scrap metal (mixed)	324 tons	\$10,080.00	<input type="checkbox"/>	24
Scrap metal (mixed)	141,400 pounds	\$855.00	<input type="checkbox"/>	24
Shop gloves (white cotton)	130,000 each	\$0.00	<input type="checkbox"/>	39
Shop rags/towels	146 55-gal drum	(\$7,154.00)	<input type="checkbox"/>	18
Shop rags/towels	31,200 each	\$0.00	<input type="checkbox"/>	18
Shop Rags/Towels	6,392 each	\$0.00	<input type="checkbox"/>	33

13

<b>Recycled Item</b>	<b>Quantity</b>	<b>Revenue</b>	<b>Reg</b>	<b>ID</b>
Solvent (mineral spirits)	14,400 gallons	\$0.00	<input checked="" type="checkbox"/>	16
Tires	21 tons	(\$1,550.25)	<input type="checkbox"/>	19
Tires	1,505 each	(\$644.50)	<input type="checkbox"/>	19
Toner Cartridges (copier)	240 each	\$0.00	<input type="checkbox"/>	23
Toner Cartridges (mixed)	2,760 each	\$2,698.16	<input type="checkbox"/>	3
Toner Cartridges (printer)	230 each	\$0.00	<input type="checkbox"/>	22
Used oil	106,266 gallons	\$13,996.63	<input checked="" type="checkbox"/>	10
Used oil filters	789 55-gal drum	(\$39,240.00)	<input checked="" type="checkbox"/>	15
White goods	89,200 pounds	\$223.00	<input type="checkbox"/>	40
		<b>\$130,907.40</b>		

**Notes (for all reports generated from this data set):**

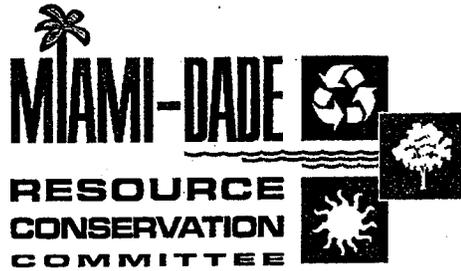
1- Not all departments submitted cost/revenue information for their recycling volumes, therefore cost/revenue amounts may be over/under stated

For more information contact:

*Nichole Hefty  
Chair  
Resource Conservation Committee*

*c/o  
Miami-Dade County  
Department of Environmental Resources Management  
Office of Sustainable Environment and Education  
33 SW 2 Avenue, Suite 1200  
Miami, FL 33130-1540*

*ph: (305) 372-6784*



## Summary of Recycled Content Items Purchased

sorted by:

- 1 - department
- 2 - year

prepared on:

7/14/2004

prepared by:

Miami-Dade County  
Resource Conservation Committee

2004 RCC Report on Department Recycled Content Purchasing

3

Reporting Period: 4/1/2003 - 3/31/2004

<input checked="" type="checkbox"/> Recycled Content Item	Quantity	Cost	GSA	ID
<input checked="" type="checkbox"/> "30 DAY ORGANIZER",plastic mylar surf	415 each	\$3,672.75	<input checked="" type="checkbox"/> Y-4264	105
<input checked="" type="checkbox"/> "Today Is" Wall Calendar Complete set	691 each	\$3,178.60	<input checked="" type="checkbox"/> Y-4262	103
<input checked="" type="checkbox"/> APMT.Books, weekly-minder, Hourly apm	5372 each	\$23,368.20	<input checked="" type="checkbox"/> W-2031	84
<input checked="" type="checkbox"/> Appointment Books,Monthly-Planner,	4217 each	\$16,024.60	<input checked="" type="checkbox"/> W-2032	85
<input checked="" type="checkbox"/> BOXES,STORAGE with Lids 15"x 12"x 1	8040 each	\$102,912.00	<input checked="" type="checkbox"/> B-500	28
<input checked="" type="checkbox"/> CALCULATOR PAPER ROLL ECONOM	7 each	\$223.65	<input checked="" type="checkbox"/> C-249	32
<input checked="" type="checkbox"/> Calendar base, plastic, black	589 each	\$824.60	<input checked="" type="checkbox"/> W-2436	90
<input checked="" type="checkbox"/> Calendar Refill, book style, 3"x3 3/4"	177 each	\$221.25	<input checked="" type="checkbox"/> Y-4210	98
<input checked="" type="checkbox"/> Calendar Refill, pad style, 5"x 8" for	64 each	\$179.20	<input checked="" type="checkbox"/> Y-4211	99
<input checked="" type="checkbox"/> Calendar refill,2 page book style	7032 each	\$3,516.00	<input checked="" type="checkbox"/> Y-4209	97
<input checked="" type="checkbox"/> Calendar, Refill double tiered calendar	575 each	\$1,955.00	<input checked="" type="checkbox"/> Y-4214	102
<input checked="" type="checkbox"/> Calendar, Refill for "3-Months-At-A-	1 each	\$8.60	<input checked="" type="checkbox"/> Y-4213	101
<input checked="" type="checkbox"/> Calendar, Refill for "Today Is" wall	210 each	\$966.00	<input checked="" type="checkbox"/> Y-4212	100
<input checked="" type="checkbox"/> CASH PAPER AXIOHM A758A THERMA	51 each	\$3,814.80	<input checked="" type="checkbox"/> C-216	31
<input checked="" type="checkbox"/> CASH REGISTER TAPE SINGLE PLY 4	1124 each	\$505.80	<input checked="" type="checkbox"/> C-074	30
<input checked="" type="checkbox"/> CD LABELER KIT REFILLS PHOTO QU	262 each	\$2,056.70	<input checked="" type="checkbox"/> C-684	36
<input checked="" type="checkbox"/> CD LABELER KIT REFILLS PHOTO QU	185 each	\$3,265.25	<input checked="" type="checkbox"/> C-685	37
<input checked="" type="checkbox"/> CLIPBOARD, LETTER Size, RECYCLED	2737 each	\$7,428.35	<input checked="" type="checkbox"/> C-816	38
<input checked="" type="checkbox"/> COMPUTER PAPER, BLANK FORMAT,	3460 each	\$64,154.50	<input checked="" type="checkbox"/> P-1518	75
<input checked="" type="checkbox"/> COMPUTER PAPER, GREEN BAR FOR	2366 each	\$66,680.60	<input checked="" type="checkbox"/> P-1517	74
<input checked="" type="checkbox"/> Daily appointment book, dated. Red Har	1449 each	\$5,288.85	<input checked="" type="checkbox"/> W-2024	82
<input checked="" type="checkbox"/> Dated Daily Reminder,one day per page	902 each	\$3,021.70	<input checked="" type="checkbox"/> Y-4381	94
<input checked="" type="checkbox"/> DESK ORGANIZER W/SIDE COMPART	639 each	\$5,207.85	<input checked="" type="checkbox"/> W-2440	92
<input checked="" type="checkbox"/> Desk Pad, Monthly Desk Planner, dated	15269 each	\$14,505.55	<input checked="" type="checkbox"/> W-3521	93
<input checked="" type="checkbox"/> Diary, Daily Reminder, 5-3/4" x 8-1/4"	2585 each	\$8,659.75	<input checked="" type="checkbox"/> Y-4382	95
<input checked="" type="checkbox"/> Diary, Daily Reminder, 7-11/16" x 12-1/8	1190 each	\$10,591.00	<input checked="" type="checkbox"/> Y-4383	96
<input checked="" type="checkbox"/> DISK/CD MAILERS W/FOAM LINING/RE	66 each	\$1,532.50	<input checked="" type="checkbox"/> E-510	39
<input checked="" type="checkbox"/> Double-Tier Desk Calendar- Complete U	684 each	\$4,446.00	<input checked="" type="checkbox"/> W-2042	87
<input checked="" type="checkbox"/> ERASER SANFORD MAGIC RUB FOR	580 each	\$225.30	<input checked="" type="checkbox"/> P-1691	78
<input checked="" type="checkbox"/> EXPANDING WALLETS, LEGAL SIZE, 3	3522 each	\$6,397.20	<input checked="" type="checkbox"/> E-612	41
<input checked="" type="checkbox"/> EXPANDING WALLETS, LETTER SIZE,	6932 each	\$11,594.25	<input checked="" type="checkbox"/> E-611	40
<input checked="" type="checkbox"/> FASTENERS, PRONG, 2 3/4" Center to	1888 each	\$2,171.20	<input checked="" type="checkbox"/> F-120	42
<input checked="" type="checkbox"/> FILE FOLDER , MANILA, Legal Size ,1/2"	335 each	\$2,293.65	<input checked="" type="checkbox"/> F-643	49
<input checked="" type="checkbox"/> FILE FOLDERS, 1/3 CUT, COLOR BLUE	766 each	\$6,760.70	<input checked="" type="checkbox"/> F-635	43
<input checked="" type="checkbox"/> FILE FOLDERS, YELLOW, LETTER SIZ	689 each	\$6,079.20	<input checked="" type="checkbox"/> F-638	46
<input checked="" type="checkbox"/> FILE POCKET, NON-EXPANSION, LEG	100 each	\$1,735.00	<input checked="" type="checkbox"/> F-787	58
<input checked="" type="checkbox"/> FILE POCKET, NON-EXPANSION, LETT	460 each	\$6,077.20	<input checked="" type="checkbox"/> F-786	57

<input checked="" type="checkbox"/>	Folder, classification & budget report,	224 each	\$6,079.85	<input checked="" type="checkbox"/> F-991	61
<input checked="" type="checkbox"/>	FOLDER, CLASSIFICATION & BUDGET	438 each	\$11,935.50	<input checked="" type="checkbox"/> F-993	63
<input checked="" type="checkbox"/>	FOLDER, CLASSIFICATION & BUDGET	1978 each	\$45,910.90	<input checked="" type="checkbox"/> F-990	60
<input checked="" type="checkbox"/>	FOLDER, CLASSIFICATION & BUDGET	1972 each	\$42,196.00	<input checked="" type="checkbox"/> F-992	62
<input checked="" type="checkbox"/>	FOLDER, CLASSIFICATION & BUDGET	10 each	\$260.00	<input checked="" type="checkbox"/> F-994	64
<input checked="" type="checkbox"/>	FOLDER, PRESSBOARD, Legal size, 1/2	125 each	\$2,646.05	<input checked="" type="checkbox"/> F-998	68
<input checked="" type="checkbox"/>	FOLDER, PRESSBOARD, LEGAL size, 1	356 each	\$5,696.00	<input checked="" type="checkbox"/> F-997	67
<input checked="" type="checkbox"/>	FOLDER, PRESSBOARD, LETTER size,	1968 each	\$26,843.95	<input checked="" type="checkbox"/> F-995	65
<input checked="" type="checkbox"/>	FOLDER, PRESSBOARD, Letter size, 1/2	631 each	\$8,599.00	<input checked="" type="checkbox"/> F-996	66
<input checked="" type="checkbox"/>	HANGING FILE FOLDERS, BOX BOTTO	52 each	\$860.60	<input checked="" type="checkbox"/> F-649	52
<input checked="" type="checkbox"/>	INDEXES 10 TAB TABLE OF CONTENT	580 each	\$1,189.00	<input checked="" type="checkbox"/> B-235	27
<input checked="" type="checkbox"/>	LABEL, size, 3-1/2" x15/16", one-across	15 each	\$107.25	<input checked="" type="checkbox"/> L-450	69
<input checked="" type="checkbox"/>	Paper (recycled 30%): photocopier - 11x1	38 case/2500	\$972.60	<input checked="" type="checkbox"/> P-1592	11
<input checked="" type="checkbox"/>	Paper (recycled 30%): photocopier - 8.5x	7822 case/5000	\$197,506.15	<input checked="" type="checkbox"/> P-1590	9
<input checked="" type="checkbox"/>	Paper (recycled 30%): photocopier - 8.5x	159 case/5000	\$4,360.50	<input checked="" type="checkbox"/> P-1589	8
<input checked="" type="checkbox"/>	PAPER 1-PLY WHITE RECEIPT ROLL #	9 each	\$335.25	<input checked="" type="checkbox"/> C-080	29
<input checked="" type="checkbox"/>	PAPER TOWEL CEE FOLD, BLEACHED	718 each	\$9,337.55	<input checked="" type="checkbox"/> M-206	72
<input checked="" type="checkbox"/>	Paper towels, Cee Fold, natural, 2400/cs	2945 each	\$33,656.00	<input checked="" type="checkbox"/> M-204	70
<input checked="" type="checkbox"/>	PAPER, NOTEBOOK FILLER, RECYCL	547 each	\$774.25	<input checked="" type="checkbox"/> P-1871	76
<input checked="" type="checkbox"/>	PARTITION HANGING FILE SYSTEM, T	130 each	\$2,223.00	<input checked="" type="checkbox"/> F-794	59
<input checked="" type="checkbox"/>	Plan a month calendar. full year on both	1198 each	\$5,391.00	<input checked="" type="checkbox"/> Y-4263	104
<input checked="" type="checkbox"/>	Pocket weekly-planner 1 week on two	5751 each	\$18,115.65	<input checked="" type="checkbox"/> W-2033	86
<input checked="" type="checkbox"/>	POST-IT, Recycled, While you were out	266 each	\$1,875.30	<input checked="" type="checkbox"/> P-1912	80
<input checked="" type="checkbox"/>	POST-IT-NOTES 4" x 6" lined, YELLOW	1736 each	\$28,389.40	<input checked="" type="checkbox"/> P-1917	81
<input checked="" type="checkbox"/>	POST-IT-NOTES, YELLOW, 1 1/2" X 2",	3933 each	\$13,960.05	<input checked="" type="checkbox"/> P-1900	79
<input checked="" type="checkbox"/>	PROFESSIONAL APPOINTMENT BOOK	1 each	\$16.30	<input checked="" type="checkbox"/> W-2025	83
<input checked="" type="checkbox"/>	RECYCLED FILE Folders Color Green	731 each	\$6,454.30	<input checked="" type="checkbox"/> F-636	44
<input checked="" type="checkbox"/>	RECYCLED File Folders, Colored:Red	640 each	\$5,651.95	<input checked="" type="checkbox"/> F-637	45
<input checked="" type="checkbox"/>	RECYCLED PENCIL CUP, 2 3/4" x 4", B	560 each	\$997.95	<input checked="" type="checkbox"/> P-1890	77
<input checked="" type="checkbox"/>	RECYCLED Waste Basket, 14 Quart, BL	282 each	\$802.95	<input checked="" type="checkbox"/> W-2302	88
<input checked="" type="checkbox"/>	RECYCLED, CALCULATOR PAPERROL	9897 each	<del>\$2,474.25</del>	<input checked="" type="checkbox"/> C-300	33
<input checked="" type="checkbox"/>	RECYCLED, EASEL PAD, 27"x34", 50 sh	188 each	\$4,277.70	<input checked="" type="checkbox"/> P-1110	73
<input checked="" type="checkbox"/>	RECYCLED, FILE FOLDER, Manila, Leg	602 each	\$3,687.00	<input checked="" type="checkbox"/> F-642	48
<input checked="" type="checkbox"/>	RECYCLED, FILE FOLDER, LETTER SI	7018 each	\$33,010.40	<input checked="" type="checkbox"/> F-640	47
<input checked="" type="checkbox"/>	RECYCLED, FILE POCKET, EXPANDIN	6792 each	\$4,754.40	<input checked="" type="checkbox"/> F-783	56
<input checked="" type="checkbox"/>	RECYCLED, FILE POCKET, EXPANDIN	391 each	\$215.05	<input checked="" type="checkbox"/> F-781	54
<input checked="" type="checkbox"/>	RECYCLED, FILE POCKET, EXPANDIN	2165 each	\$1,299.00	<input checked="" type="checkbox"/> F-782	55
<input checked="" type="checkbox"/>	RECYCLED, FILE POCKET, EXPANDIN	18833 each	\$11,299.80	<input checked="" type="checkbox"/> F-774	53
<input checked="" type="checkbox"/>	RECYCLED, HANGING FILE FOLDER, L	3479 each	\$16,186.60	<input checked="" type="checkbox"/> F-645	50
<input checked="" type="checkbox"/>	RECYCLED, HANGING FILE FOLDERS,	2317 each	\$13,423.80	<input checked="" type="checkbox"/> F-646	51
<input checked="" type="checkbox"/>	REPORT COVER, LETTER SIZE, CLEA	1437 each	\$16,545.90	<input checked="" type="checkbox"/> B-134	25
<input checked="" type="checkbox"/>	REPORT COVER, LETTER SIZE, DOUB	866 each	\$7,324.10	<input checked="" type="checkbox"/> B-133	24
<input checked="" type="checkbox"/>	REPORT COVER, LETTER SIZE, DOUB	738 each	\$3,781.65	<input checked="" type="checkbox"/> B-135	26

<input checked="" type="checkbox"/>	Item	Quantity	Cost	Waste Code	ID
<input checked="" type="checkbox"/>	THREE (3) MONTH CALENDAR, 12" x 2	1114 each	\$5,180.10	W-2437	91
<input checked="" type="checkbox"/>	TOILET TISSUE, roll, wrapped, 2-ply,	1166 each	\$35,584.80	M-205	71
<input checked="" type="checkbox"/>	Waste Container, 44 GALLONS with lid	128 each	\$4,889.60	W-2310	89
<b>Sub-total:</b>			<b>\$1,048,621.75</b>		

<input checked="" type="checkbox"/>	Recycled Content Item	Quantity	Cost	GSA	ID
<input checked="" type="checkbox"/>	Business cards	10 box (unknow	\$105.00	<input type="checkbox"/>	22
<input checked="" type="checkbox"/>	Carpet	10000 sq yds	\$241,787.00	<input type="checkbox"/>	21
<input checked="" type="checkbox"/>	Empty 55-gal drum	1000 55-gal drum	\$0.00	<input type="checkbox"/>	18
<input checked="" type="checkbox"/>	Facial Tissue	345 box (unknow	\$127.65	<input type="checkbox"/>	115
<input checked="" type="checkbox"/>	Pallets (wooden)	750 each	\$2,437.50	<input type="checkbox"/>	113
<input checked="" type="checkbox"/>	Paper (recycled %): mixed lot	1 each	\$156,380.00	<input type="checkbox"/>	23
<input checked="" type="checkbox"/>	Paper (recycled 100%): printed reports, f	331 case/5000	\$43,000.00	<input type="checkbox"/>	13
<input checked="" type="checkbox"/>	Paper (recycled 30%): 18lb 8.5 x 11	9859.59961 case/5000	\$221,348.02	<input type="checkbox"/>	114
<input checked="" type="checkbox"/>	Paper towels	4856 case (unkno	\$52,793.48	<input type="checkbox"/>	15
<input checked="" type="checkbox"/>	Paper towels	200 case/12 roll	\$3,868.00	<input type="checkbox"/>	19
<input checked="" type="checkbox"/>	Playground Safety Surfacing	7200 sq ft	\$72,000.00	<input type="checkbox"/>	117
<input checked="" type="checkbox"/>	Shop Rags/Towels (laundered)	146 55-gal drum	\$0.00	<input type="checkbox"/>	16
<input checked="" type="checkbox"/>	Solvent (mineral spirits)	14400 gallons	\$0.00	<input type="checkbox"/>	118
<input checked="" type="checkbox"/>	Toilet paper	5742 case (unkno	\$150,062.65	<input type="checkbox"/>	14
<input checked="" type="checkbox"/>	Toilet paper	1500 case/96 cs	\$44,625.00	<input type="checkbox"/>	20
<b>Sub-total:</b>			<b>\$988,534.30</b>		

**Total: \$2,037,156.05**

Notes (for all reports generated from this data set):

- 1- shop rags are laundered and then "bought back" at zero cost
- 2-

For more information contact:

*Nichole Hefty  
Chair  
Resource Conservation Committee*

*c/o  
Miami-Dade County  
Department of Environmental Resources Management  
Office of Sustainable Environment and Education  
33 SW 2 Avenue, Suite 1200  
Miami, FL 33130-1540*

*ph: (305) 372-6784*





**Summary of  
Other Environmentally Preferable Purchasing**

sorted by:

- 1 - year
- 2 - department

prepared on:

7/14/2004

prepared by:

Miami-Dade County  
Resource Conservation Committee

22

Report:

**2004 RCC Report on Departments' Other EPP Activities**

Reporting Period: 4/1/2003 - 3/31/2004

**Replacement of Styrofoam with Paper Dining Products**

<u>Department:</u> CED	<u>Prior (avoided) Costs:</u>	\$45.25
<u>Contact:</u> J. Rony Trofort, Buyer	<u>Current Costs:</u>	\$38.00
	<u>Annual Savings:</u>	\$7.25

Description:

We substitute styrofoam cups and plates with paper products.

Environmental Benefits:

Decrease in toxic materials used

Barriers to Implementaion:

According to employees, when items are used in microwave, the wax-type coating is perceived to be melting. No problem with the plates

Recommendations:

24

**Recycled Content T-Shirts****Department:** DERM**Contact:** Susannah Troner; OSEE; (305) 372-6784**Prior (avoided) Costs:** \$25,937.00**Current Costs:** \$31,067.50**Annual Savings:** (\$5,130.50)**Description:**

As part of the promotional effort for its annual event "Baynanza", DERM provides participants that clean along the shorelines on Biscayne Bay Clean-up Day with t-shirts. These t-shirts are manufactured from 50% recycled polyester and 50% recycled cotton. Although there is an added cost, it is felt that it is important to demonstrate a commitment to the conservation of natural resources, particularly at an event of this kind.

This year 8,350 t-shirts were purchased (8,000 short sleeve various sizes; 350 long sleeve). The cost differential is approximately 20% or about \$0.62 per shirt.

**Environmental Benefits:**

Conservation of natural resources. Encouragement of market for recycled materials.

**Barriers to Implementaion:**

Additonal cost.

**Recommendations:**

**Replacement of Film with Digital Cameras****Department:** DERM**Prior (avoided) Costs:** \$44,000.00**Contact:** David Bromfield; Office of Sustainable  
Environment & Education; 305-372-6784;**Current Costs:** \$2,000.00**Annual Savings:** \$42,000.00**Description:**

DERM has implemented an informal program to replace its traditional film cameras with digital cameras. Cameras are utilized by many of staff members in the performance of their regular duties, including a variety of field inspection responsibilities. From a baseline year of 1999, expenses for film purchasing and development have been reduced from approximately \$44,000 per year to less than \$2,000 per year. This represents a savings of over 95%.

As technology has advanced, the payback period for the higher initial purchase price of the digital cameras has been dramatically reduced. In the year 2000, for cameras utilized for 1-2 rolls of 12-24 exposure film, the payback period was 1 to 1.5 years, based on a digital camera price of ~\$500. As superior digital cameras are now available (2004) for approximately half the price (\$250-\$300), the payback period is now less than a year.

There are also additional benefits incurred as the Department transitions to an EDMS system. Capturing images electronically helps to reduce the time and cost associated with digitizing (scanning) images.

**Environmental Benefits:**

The environmental benefits include resource conservation in the form of the elimination of film production as well as the elimination of chemicals necessary for film development.

**Barriers to Implementaion:**

A suitable IT infrastructure is required to facilitate the download of images from the camera to a computer workstation. The images can then be permanently stored electronically and printed as needed.

**Recommendations:**

In all Departments where a suitable IT infrastructure exists to make use of digital camera technology, an aggressive conversion program should be implemented.

### Hurricane Brochures

Department: DSWM

Contact:

Prior (avoided) Costs: \$0.00

Current Costs: \$0.00

Annual Savings: \$0.00

Description:

There were no purchases for brochures for the year in question however, when purchases are made the vendor GSA utilizes recycled paper when processing

Environmental Benefits:

Barriers to Implementaion:

Recommendations:

### Recycled Content Promotional Materials

Department: DSWM

Prior (avoided) Costs: \$0.00

Contact:

Current Costs: \$0.00

Annual Savings: \$0.00

Description:

The Dept. orders items such as pencil, crayons, Coloring books, e.t.c made of recyclable material, however for the year in question no purchases were made for such items. When purchases are made the vendor is chosen from an approved County listing from the Procurement Division.

Environmental Benefits:

Barriers to Implementaion:

Recommendations:

28

**Electronic Data Management System (EDMS)****Department:** ERD**Prior (avoided) Costs:** \$0.00**Contact:** Ron Williamson, ERD Admin. Ops. Manager  
375-1388 (office) 375-2459 (fax)**Current Costs:** \$0.00**Annual Savings:** \$0.00**Description:**

For the past several years, ERD has been seeking ways to reengineer its business processes and utilize technology to deliver services in the most efficient cost effective and customer friendly manner possible and eliminate the use of paper to the greatest extent possible. There are several components to the EDMS technology:

**Imaging** - New paperwork for employee personnel files is currently being scanned, imaged and available for viewing on line (via web browser) and greatly limit the creation of hard (paper) copies.

**Computer Output to Laser Disc (COLD)** - All computer generated Personnel Change Documents will be automatically sent to the electronic Personnel Folder of each employee. We estimate there are approximately 50,000 of these documents produced each year. There are many other system generated paper forms that could be eliminated using this technology resulting in an approximate savings of an additional 60,000 documents for a total of over 100,000 documents annually.

**Backfiling** - This effort is scheduled to include backfiling all existing paperwork in The Personnel File Room which will convert over 5,000,000 documents into electronic format. Once complete, employee files will be available for viewing throughout the County, this information, currently vulnerable to damage or destruction (with no duplicate copies) by natural disaster or vandalism will be protected, and file room space throughout the County will be available for other uses.

**On Line Forms**

We are currently in development of an on-line PCD to replace the manually hand processed PCDs done today. This form will have an electronic work flow which will insure a proper routing and will automatically go to the employee's personnel folder again creating a significant savings in staff time.

**Time Collection** is a project in an embryonic stage but if implemented, will replace our paper time sheet (PAR) with electronic time capture. This will allow for a much greater accountability for time capture on the front end of the payroll process in addition to saving over 172,000 paper PAR forms annually.

**Environmental Benefits:**

Elimination of over 250,000 paper documents annually

**Barriers to Implementaion:****Recommendations:**

### Auto Tag Records Reduction & Recycling

Department: FIN

Contact: Peter Cam (305) 375-4232

Prior (avoided) Costs: \$0.00

Current Costs: (\$57.20)

Annual Savings: \$57.20

Description:

The Auto Tag Branch Agency Office of the Tax Collector's Division receives copies of all customer transaction receipts from the twenty-five private Auto Tag agencies located around Miami-Dade County. When transaction audit processes conducted by Branch Agency Account Clerks are complete, the receipts are no longer required to be kept as records. A company called Simco Recycling Corporation collects the paper receipts for recycling. Revenue of \$57.20 is returned to the Auto Tag Index Code and the storage space required for records is reduced.

Environmental Benefits:

Paper is recycled, not wasted.

Barriers to Implementaion:

Recommendations:

**Cash Management Division Reports**

Department: FIN  
Contact: Gisela Guth (305)-375-5134

<u>Prior (avoided) Costs:</u>	\$1,800.00
<u>Current Costs:</u>	\$900.00
<u>Annual Savings:</u>	\$900.00

Description:  
Cash Management tries to email and post reports on the Division website instead of printing hard copies for circulation. These reports when viewed by the Division are not printed but viewed online. When "On Demand" becomes available, two daily reports will be put on that system instead of a daily hard copy. The intention for later this year is to email the monthly Cash Management Portfolio to various departments instead of sending hard copies by inter-office mail. It is projected that this will save \$900 /yr by 2005 when it will be fully implemented.

Environmental Benefits:  
Paper usage and the associated environmental impacts have been reduced by 50%.

Barriers to Implementaion:

Recommendations:

**CD Distribution of Bondholders Book**

<u>Department:</u> FIN	<u>Prior (avoided) Costs:</u> \$32,000.00
<u>Contact:</u> Peter Cam (305) 375-4232	<u>Current Costs:</u> \$16,000.00
	<u>Annual Savings:</u> \$16,000.00

Description:  
The Bondholders Book is an annual report to bondholders required on all bonds issued after Sept 15 1995, that updates all operating statistical data of those outstanding bonds according to Securities and Exchange Commisions rule 15 c2-12. The amount of paper used to produce this report has been reduced by 50% by utilizing an electronic format, Compact Discs (CD), for distribution.

Environmental Benefits:  
Paper usage and the associated environmental impacts have been reduced by 50%.

Barriers to Implementaion:

Recommendations:  
This process should be continued in the future and extended to 80% of all major reports produced. The Finance Department is researching into many areas to drastically reduce the volume of paper that we produce and circulate within the Department.

32

### CD Distribution of Comprehensive Annual Financial Report

Department: FIN

Contact: Peter Cam (305) 375-4232

Prior (avoided) Costs: \$20,000.00

Current Costs: \$10,000.00

Annual Savings: \$10,000.00

Description:

The Comprehensive Annual Financial Report summarizes the County's Finances, pursuant to State law. The amount of paper used to produce this report has been reduced by 50% by utilizing an electronic format, Compact Discs (CD), for distribution.

Environmental Benefits:

Paper usage and the associated environmental impacts have been reduced by 50%.

Barriers to Implementaion:

Recommendations:

This process should be continued in the future and extended to 80% of all major reports produced. The Finance Department is researching into many areas to drastically reduce the volume of paper that we produce and circulate within the Department.

**Environmentally Preferable Custodial Cleaning Chemicals****Department:** GSA**Prior (avoided) Costs:** \$0.00**Contact:** Nichole Hefty; DERM; (305) 372-6784**Current Costs:** \$0.00**Annual Savings:** \$0.00**Description:**

Working in cooperation GSA, DERM, and DPM have developed "boiler-plate" language for use in contracts for custodial supplies and/or services. Custodial chemicals often can contain toxic constituents and can be an issue of concern for storage, usage by custodial staff, and employees and the public that may occupy spaces that have been cleaned utilizing these chemicals. The contract language specifies certain criteria for physical properties, chemical constituents, and hazard ratings that must be met. Currently DERM has reviewed several Material Safety Data Sheets and worked with the custodial service provider for the Stephen P Clark Center to lower the toxicity of cleaners used on site.

This language has been utilized in several (~7) subsequent contracts that are pending review for verification. There are currently national standards that are being reviewed as a replacement for the locally drafted contract language. In addition, education for all involved is an important aspect of this program that will be pursued in the future.

There is no information available on cost savings as this is simply one requirement of a larger service contract with many variables.

**Environmental Benefits:**

Less toxic chemicals are stored and used, thereby lowering the risks for custodial staff, and employees and the public.

**Barriers to Implementaion:**

Training is necessary for successful adoption, especially for custodial staff.

**Recommendations:**

Continue to include this language in custodial service contracts. Review and implement national standards as appropriate. Provide resources for training.

### Retreading of Heavy Duty Tires

Department: GSA  
Contact: Olga Diaz, Acting Director

Prior (avoided) Costs: \$1,668,436.00  
Current Costs: \$526,784.00  
Annual Savings: \$1,141,652.00

Description:

Heavy duty tires are recapped at least three times. When they are no longer serviceable they are sold to Pelar for \$1.00 each.

Recap tire savings \$1,160,000 (5800 tires recapped during study period).  
[UPDATE: 7,176 tires recapped at a cost of \$526,784; cost savings vs new tires of \$1,141,652]

11,470 non-resuable tires disposed of by contractor (Herrera tire - tires sent to landfill in Port St. Lucie)  
Reuse of County tire casings saves \$89,051 (plus savings of using recapped tires)

Retreading (recapping) is the process whereby selected and inspected worn tires, called casings, receive a new tread. The worn tread is buffed away, and a new tread is bonded to the tire body in a process very similar to the manufacture of a new tire.

Environmental Benefits:

Energy use savings in new tire production vs recapping.  
Tire disposal in environmentally beneficial manner.

(Tires are basically petrochemical products. It takes 22 gallons of oil to manufacture one new truck tire. Since most of that oil is found in the tire casing which is reused in the retreading process, only 7 gallons of oil are needed to retread that same tire. A fleet using as few as 100 tires a year can save 1500 gallons of oil annually, while substantially reducing the number of casings that end up in the landfills. Ref: www.retread.org)

Barriers to Implementaion:

Recommendations:

85

**Use of Bypass Oil Filter System in Heavy Equipment**

<u>Department:</u> GSA	<u>Prior (avoided) Costs:</u>	\$0.00
<u>Contact:</u> Olga Diaz, Acting Director	<u>Current Costs:</u>	\$0.00
	<u>Annual Savings:</u>	\$18,480.00

Description:

The puraDYN oil filtration system has been installed on most heavy equipment.

According to the manufacturer, the puraDYN Bypass Oil Filtration System continuously cleans the lubricating oil by removing 100% of solid contaminants, as well as removing liquid contaminants. puraDYN systems are designed to work in conjunction with the full-flow filter, removing the smaller solid contaminants as well as water and fuel.

Oil consumption has been reduced by 50% and the use of regular filters by 66%. Waste oil is picked up by Perma-Fix and we get paid \$0.15 per gallon collected. Puradyne filters and other waste oil filters are picked up in 55-gallon drums by EMC at a cost of \$150.00 per drum. (Oil spill socks and contaminated Quick Dry are picked up in 55-gallon drums by Cliff Berry at a cost of \$150.00 per drum.)

Oil savings \$18,480; Filter savings ?;

Environmental Benefits:

Oil consumption has been reduced by 50% and the use of regular filters by 66%.  
Waste oil recycled for other industrial uses.  
Filters, oil spill socks, and contaminated quick dry disposed of in environmentally secure process.

Barriers to Implementaion:

Recommendations:

### Replacement of Styrofoam with Paper Dining Products

<u>Department:</u> MDAD	<u>Prior (avoided) Costs:</u> \$4,200.00
<u>Contact:</u> James Decesare (305)876-7206	<u>Current Costs:</u> \$12,100.00
	<u>Annual Savings:</u> (\$7,900.00)

Description:

The Department replaced the use of styrofoam cups and plates with paper cups and plates.

Environmental Benefits:

Styrofoam products are not biodegradable, when discarded it clogs landfills for centuries, where it takes up more space than paper. Once in the environment, Styrofoam quickly crumbles into particles that persist indefinitely on land and in waterways where it is readily available to wildlife, posing deadly threats to animal digestive and pulmonary systems. Its environmental threats are compounded if it finds its way to a municipal incinerator where it is reduced to airborne toxic chemicals that cannot be fully trapped by pollution control devices and may filter toxicity into food.

Barriers to Implementaion:

Increased expense.

Recommendations:

The most obvious solution is to use paper products

**Biodegradable Class "A" Firefighting Foam**

<u>Department:</u> MDFR	<u>Prior (avoided) Costs:</u> \$0.00
<u>Contact:</u> Anita Eichenbaum (786) 331-4232	<u>Current Costs:</u> <u>\$21,576.25</u>
	<u>Annual Savings:</u> \$0.00

Description:  
Firefighting concentrate 3%. This is a biodegradable mixture of foaming and wetting agents.

Environmental Benefits:  
Biodegradable friendly to environment

Barriers to Implementaion:

Recommendations:

38

**Biodegradable Class "B" Firefighting Foam**

Department: MDFR

Prior (avoided) Costs: \$0.00

Contact: Anita Eichenbaum (786) 331-4232

Current Costs: \$19,250.00

Annual Savings: \$0.00

Description:

Firefighting concentrate. AFFF/ATC (3%/6%) This is a biodegradable mixture of foaming and wetting agents.

Environmental Benefits:

Biodegradable friendly to environment

Barriers to Implementaion:

Recommendations:

**Latex Paints****Department:** MDFR**Prior (avoided) Costs:** \$0.00**Contact:** Anita Eichenbaum (786) 331-4232**Current Costs:** \$0.00**Annual Savings:** \$0.00**Description:**

No longer use oil based paint. When we are done with the paint, if there is a small amount of paint or paint residue remaining in a container, sawdust is added to the container. The sawdust absorbs the paint and the sawdust is then properly disposed

**Environmental Benefits:**

Volatile solvent emissions are reduced/eliminated.

**Barriers to Implementaion:****Recommendations:**

**Use of Bypass Oil Filter System**

Department: MDFR

Contact: Anita Eichenbaum (786) 331-4232

Prior (avoided) Costs: \$0.00

Current Costs: \$0.00

Annual Savings: \$0.00

Description:

Newly purchased fire trucks come with a puraDYN system which saves on oil, filters and disposal. Many existing trucks were converted to the puraDYN System previously.

According to the manufacturer, the puraDYN Bypass Oil Filtration System continuously cleans the lubricating oil by removing 100% of solid contaminants, as well as removing liquid contaminants. puraDYN systems are designed to work in conjunction with the full-flow filter, removing the smaller solid contaminants as well as water and fuel.

Environmental Benefits:

Barriers to Implementaion:

Recommendations:

41

**Landfill Gas Purchase**Department: WASDPrior (avoided) Costs: \$0.00Contact:Current Costs: \$0.00Annual Savings: \$190,000.00Description:

An MOU has been signed under which the WASD South District Wastewater Treatment Plant will acquire and utilize a continuous supply of at least 350 CFM of landfill gas from the DSWM South Dade Landfill. WASD has agreed to pay DSWM 35% of the net quarterly savings (avoided energy costs, etc.) after recovery of initial design and construction expenditures.

Preliminary estimates are that energy savings may total over \$190,000 per year, providing a payback period of about 3 years. Actual fiscal performance will vary with fluctuating traditional source energy costs.

The time to complete construction is estimated as approximately 2 years.

Environmental Benefits:

Landfill gas is recovered for reuse avoiding detrimental environmental impacts due to venting or flaring.

The utilization of resources from "traditional" energy sources are avoided, along with the associated harvesting, refinement/conversion, and distribution impacts.

Barriers to Implementaion:

This project is the result of several years of discussion and study.

Recommendations:

The volume of landfill gas utilized may be increased depending on reliable availability and demand.

## Wastewater Methane Gas Recovery and Use

Department: WASD

Prior (avoided) Costs: \$1,013,472.00

Contact:

Current Costs: \$0.00

Annual Savings: \$1,013,472.00

Description:

WASD Waste Water Treatment Plants recovered approximately 29,376,000 KW / Yr worth of methane gas generated by waste treatment process. This gas has an approximate value of \$1,013,472.00. The gas is used as fuel for engines in operation.

Environmental Benefits:

Avoids the production and use of another source of fuel. Methane gas is a global warming gas.

Barriers to Implementaion:

Recommendations:

**Weed and Feed, Turf Builder**

Department: WASD

Contact: Sherry Negahban

Prior (avoided) Costs: \$0.00

Current Costs: \$0.00

Annual Savings: \$0.00

Description:

Reduce the usage of Herbicides to only three times a year.

60% savings

Environmental Benefits:

Reduction of chemicals being introduced into the environment and being handled by staff.

Barriers to Implementaion:

Recommendations:

44

**Xeriscape Landscaping**

<u>Department:</u> WASD	<u>Prior (avoided) Costs:</u>	\$0.00
<u>Contact:</u> Sherry Negahban	<u>Current Costs:</u>	\$0.00
	<u>Annual Savings:</u>	\$0.00

Description:  
Reduce the amount of water used to water the landscape at water and wastewater facilities.

Environmental Benefits:  
~ 75% less water usage;  
Reduced usage of pesticide, fertilizer, etc.

Barriers to Implementaion:

Recommendations:

Sum \$2,419,537.95

For more information contact:

Nichole Hefty  
Chair  
Resource Conservation Committee

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46