



Department of the Environment

MARYLAND SCRAP TIRE ANNUAL REPORT – Fiscal Year 2014 –

Prepared by:

Land Management Administration

Prepared for:

Senate Education, Health and Environmental Affairs Committee

House Environment and Transportation Committee

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MARYLAND DEPARTMENT OF THE ENVIRONMENT
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Executive Summary

Introduction

This is the Fiscal Year (“FY”) 2014 Scrap Tire Annual Report as required by Environment Article, Section 9-275(b), Annotated Code of Maryland, which is prepared for the standing committees of the Maryland General Assembly. The report addresses Maryland’s Scrap Tire Program activities as undertaken by the Maryland Department of the Environment (“the Department” or “MDE”) and the Maryland Environmental Service (“MES”) from July 2013 through June 2014, and describes activities for the coming year.

Accomplishments and Results

- Maryland generated an estimated 5.9 million scrap tires in FY 2014 that were managed in the following manner: recycled or used as fuel in Maryland (62 percent) and exported to other states for disposal, recycling, or use as fuel (38 percent).
 - Maryland’s licensed scrap tire facilities processed 6.7 million scrap tires in FY 2014, including 3.6 million Maryland-generated scrap tires and 3.1 million scrap tires imported from out-of-State.
 - Approximately 82 percent of the scrap tires processed in Maryland were recycled and 18 percent were used as supplemental fuel in cement plants and waste-to-energy facilities.
 - Since the inception of the Scrap Tire Program in 1992, over 10.6 million scrap tires have been recovered from 977 stockpile cleanup sites.
 - During FY 2014, a total of 23 illegal scrap tire stockpile sites were cleaned up and approximately 12,163 scrap tires were removed.
 - 100 percent of all stockpile site cleanups accomplished in FY 2014 were achieved by administrative enforcement, without using the Used Tire Cleanup and Recycling Fund (“the Fund”).
 - A total of 591 new scrap tire licenses were issued.
 - A total of 53 scrap tire licenses were renewed.
 - At the end of FY 2014, there were a total of 3,107 valid Maryland scrap tire licenses.
 - MDE inspectors performed 671 scrap tire site inspections/investigations.
-

Financial Statement Summary

- ★ The Environment Article, Section 9-275, Annotated Code of Maryland, provides the Department with the responsibility for administering the Fund.
- ★ The Fund is generated through the collection of an eighty cent (\$0.80) per tire recycling fee on the first sale of any new tire in the State.
- ★ Gross tire fee revenues to the Fund (\$3,646,322.73) were slightly higher (3 percent) in FY 2014 than in FY 2013.
- ★ Table I summarizes the Scrap Tire Program expenditures for FY 2014.

**Table I – Maryland Used Tire Cleanup and Recycling Fund
FY 2014 Revenues and Expenditures**

Fund Balance (7/1/2013)	\$ 4,607,357.81
Add Open Prior Year Encumbrances	<u>\$1,627,247.50</u>
Adjusted Beginning Balance	<u>\$6,234,605.31</u>
FY 2014 Revenues	
Gross Used Tire Fees Revenues after Comptroller Adjustment	\$3,646,322.73
Cost Recovery	\$0.00
Total Revenue for FY 2014	<u>\$3,646,322.73</u>
FY 2014 Expenditures	
Scrap Tire Program Expenses	(\$871,342.67)
Land Management Administration Expenses	(\$586,416.04)
Department Expenses	(\$0.00)
Department Indirect Costs	(\$373,423.57)
Stockpile Cleanups	(\$652,431.30)
MES Projects and Administration	(\$0.00)
Prior FY Encumbrance Payments	<u>(\$595,777.92)</u>
Total FY 2014 Expenditures	<u>(\$3,079,391.50)</u>
 Total Open Encumbrances	 <u>(\$1,866,537.48)</u>
Total Fund Balance (6/30/2014)	
	<u>\$4,934,999.06</u>

* Note: Revenue collected from scrap tire penalties is deposited into the Maryland Clean Water Fund, not the Used Tire Cleanup and Recycling Fund. Scrap tire penalties for FY 2014 were \$3,120.00.

Legislative Update

- ✓ Section 9-275(a) of the Environment Article, Annotated Code of Maryland also allows the Department to use up to 50 percent of the revenues received by the Fund in FY 2010, and each fiscal year thereafter, for administrative expenses of the Department.
 - ✓ The Department used \$586,416.04 of the revenues received by the Fund in FY 2014 for administrative expenses of the Land Management Administration.
-

Overview

This report has been prepared for the Senate Education, Health, and Environmental Affairs Committee and the House Environment and Transportation Committee, as required by the scrap tire law, to advise the Standing Committees of the Department's progress in implementing the law and ensuring the proper management of scrap tires in Maryland. This report includes additional information about the program and future activities.

The Scrap Tire Recycling Act established a mechanism for the cleanup of scrap tire stockpiles and for the collection, transportation, and recycling or processing of all scrap tires that are generated annually in Maryland. The Act established the Fund to support the Scrap Tire Program.

- ❖ The Department uses the Fund for administration of the program, licensing activities, stockpile cleanups, enforcement/compliance, remedial actions, and for the development and distribution of public information concerning scrap tire issues.
- ❖ Under the Department's authorization, MES may use portions of the Fund to implement and oversee programs established as part of a scrap tire recycling system and other projects that reduce, recover, and/or recycle scrap tires.

Scrap Tire Stockpile Cleanups

Objective

The Department's Scrap Tire Cleanup Objective for FY 2014, to initiate the planning and cleanup process for 100 percent of illegal scrap tire stockpile sites identified during the year, was accomplished. During FY 2014, the Scrap Tire Program continued oversight of cleanup and recovery of the remaining 387,855 scrap tires identified in stockpiles at the end of FY 2013, along with those scrap tires from 26 stockpiles newly identified during the year. In order to achieve this goal, the following strategies may be undertaken:

- ✖ The initial employment of administrative enforcement procedures to persuade property owners to remove stockpiles using their own resources.
- ✖ Use of the Fund to clean up stockpile sites only when administrative enforcement efforts were unsuccessful.
- ✖ Targeting efforts toward eliminating all scrap tire stockpile sites.
- ✖ Seeking cost recovery from responsible parties for Department expenses incurred at sites that are not eligible for exemption from paying cost recovery.

Accomplishments

Since the inception of the Scrap Tire Program in 1992, over 10.6 million scrap tires have been recovered from completed and ongoing stockpile cleanup sites.

During FY 2014, the Scrap Tire Program successfully completed cleanup of 23 illegal scrap tire stockpiles, consisting of approximately 12,163 scrap tires. These sites were located in 12 of the State's 24 jurisdictions and ranged in size from 22 to 4,775 scrap tires (see Table II for a list of stockpile cleanups completed during FY 2014). The Scrap Tire Program also initiated the planning and cleanup process for the 26 illegal scrap tire stockpile sites newly identified during FY 2014.

All of the scrap tire stockpile cleanups in FY 2014 occurred without using the Fund. One-hundred percent (100 percent) of all stockpile abatements completed in FY 2014 used the administrative approach.

Table II – Scrap Tire Cleanup Sites Completed in FY 2014

Site Name	County	Initial Number of Scrap Tires
Pulaski Tire Service, Inc./Rosedale	BA	4,775
Brickhead Road/Gambrills	AA	2,200
Pechin/Sudlersville	QA	1,500
Prince George's County/Fairmount Heights	PG	1,000
Straight Line Auto Body/Elkridge	HO	520
Baker Park East, LLC/Frederick	FR	302
A & S Real Estate, LLP/District Heights	PG	300
Marshall/Cambridge	DO	241
Smith/Westminster	CA	195
Nanney/Jessup	AA	167
Nusic/Elkton	CE	103
Saleker/Libertytown	FR	102
AK Cedar Chase, LLC/Clinton	PG	100
Morgan/Sharpsburg	WA	100
Smith/Bishopville	WO	100
Peterson/Elkton	CE	97
Raley/Capitol Heights	PG	74
Taylor Contractors/Easton	TA	65
Ewing/Easton	TA	60
Meck/Port Deposit	CE	50
Pinder-Bass/Linkwood	DO	50
Stultz/Union Bridge	CA	40
Allen/Jefferson	FR	22
TOTAL SCRAP TIRES REMOVED		12,163

FY 2015 Ongoing Stockpile Cleanups

New stockpile sites are continually being identified for cleanup in Maryland. A total of 57 stockpile sites are targeted for either continuation of cleanup efforts or completion during FY 2015. This represents the majority of known scrap tire stockpiles throughout Maryland. Most of

the stockpiles will be cleaned up using administrative efforts and enforcement actions because funding is limited for State-funded cleanups. Table III details the scrap tire cleanups continuing during FY 2015.

Table III – Scrap Tire Stockpile Cleanups Pending or Ongoing in FY 2015

Site Name ^	County	Legislative District	Initial Number of Scrap Tires
Boehm/Crownsville	Anne Arundel	33	214,400
Tyler Towing/Clarksville	Howard	13	61,376
Mt. Airy Auto & Truck Parts, LLC/Mt. Airy	Frederick	4A	15,000
Howard 2/Reisterstown	Baltimore	4	10,000
Zepp/Pasadena	Anne Arundel	31	10,000
Insley/Cambridge #2	Dorchester	37B	6,655
Gough/Lusby	Calvert	29C	6,000
G & TL Smith Contracting LLC/Chesapeake	Calvert	27B	5,000
Ewings Used Cars & Parts, Inc./Middle River	Baltimore	7	4,500
Alston/Capitol Heights	Prince George's	24	4,000
Johns-Gibbs/Marydel	Caroline	36	3,050
Johns-Gibbs/Marydel	Caroline	36	3,050
Harpers/Elkton	Cecil	36	3,000
Tilghman/Easton	Talbot	37B	3,000
Leopar/Joppa	Harford	34A	3,000
Spargo Enterprises, Inc./Capitol Heights	Prince George's	24	3,000
Prince George's County/Capitol Heights	Prince George's	24	2,500
Lieske/Perryman	Harford	34A	2,000
Tower Terra, LLC/Brandywine	Prince George's	27A	2,000
Mike's Works, LLC/Lusby	Calvert	29C	1,500
DNR/Mardela Springs	Wicomico	37B	1,000
Allen/Harwood	Anne Arundel	33B	1,000
Danny's Service/Havre de Grace	Harford	35A	1,000
McIntyre/Huntingtown	Calvert	27B	1,000
Tucker Enterprises, LLC/Clarksville	Howard	13	800
Bare/Manchester	Carroll	5A	600
Szymanski/Rock Hall #2	Kent	36	600
Carter/Nanjemoy	Charles	28	500
Decatur/Cumberland	Allegany	1C	500
Munson/Waldorf	Charles	28	500

Site Name [▲]	County	Legislative District	Initial Number of Scrap Tires
Beachwood North H.O.A./Sparrows Point	Baltimore	6	500
Frederick/Crownsville	Anne Arundel	33A	500
Glover/White Hall	Baltimore	5B	500
Turner Transit/Capitol Heights	Prince George's	24	500
Legore Bridge Road/Monocacy River	Frederick	4A	375
Baltimore City/Baltimore	Baltimore City	46	250
Rodenhauser/Bowie	Prince George's	23B	250
Square 743 Investors LP ETL/District Heights	Prince George's	25	250
Curry/Hyattsville	Prince George's	47	200
Reynolds/Elkton	Cecil	36	200
Sarver/Hill/Cumberland	Allegany	1B	200
Stanton/East New Market	Dorchester	37B	200
Words of Life Fellowship Church/Hyattsville	Prince George's	24	200
Deshong/Big Pool	Washington	6	150
Williamson/Mardela Springs/Dave's Towing	Wicomico	37B	102
2801-2803 52nd Avenue, LLC/Hyattsville	Prince George's	47	100
Anne Arundel County/Pasadena	Anne Arundel	2	100
Darley/Rising Sun	Cecil	34B	100
Lawhorn/Golts	Kent	36	100
Rigsby/Joppa	Harford	34A	100
Taylor/Princess Anne	Somerset	38A	70
McAleer/Dickerson	Montgomery	15	60
Lawson/Welcome	Charles	28	50
Hatten/Newark	Worcester	38B	50
Lexin NHA Associates, LLC/Hyattsville	Prince George's	20	50
Weaver/Indian Head	Charles	28	40
Gayle/Princess Anne	Somerset	38A	20
TOTAL SCRAP TIRES REMAINING TO BE REMOVED			375,748

▲ Sites listed in **bold** represent potential State funded cleanups.

State-Funded Cleanups

The following are descriptions of each of the State-funded scrap tire cleanups active during FY 2014.

Garner/Brandywine Scrap Tire Stockpile Cleanup – Located in Prince George’s County, this was one of the few remaining very large scrap tire dumps in Maryland. This stockpile consisted of approximately 1,135,160 tires in seven ravines on the property. In FY 2005, the Board of Public Works approved funding for the cleanup. Due to the inheritance exemption in the law, there is no cost recovery for this cleanup.

Status: Cleanup activities on the first ravine (Ravine #5) began in FY 2010 and were completed in June 2011. Cleanup of the remainder of the site (Ravines #1-4) began in June 2011 and was completed in June 2012, a year and a half ahead of schedule. Monitoring of tree growth will continue for five years, until 2017, to ensure that the site stabilization and restoration efforts are successful. The total cost for cleanup of the entire site, including permitting activities and project management, is estimated at \$10,509,118.00. MES has secured a loan from the Department’s Water Quality Financing Administration to help finance this cleanup.



A video documenting MDE and MES’s cleanup efforts is available online at <http://www.menv.com> by clicking on the “Garner Scrap Tire Cleanup Video” link.

Garner/Brandywine Cleanup



Aerial Photo of Entire Site During Cleanup

Garner/Brandywine Cleanup



Ravine 2 - Before Cleanup



Ravine 3 - Before Cleanup



Ravine 2 - During Cleanup



Ravine 3 - During Restoration



Ravine 1 - After Cleanup

Boehm/Crownsville Scrap Tire Stockpile Cleanup – This was the site of an old commercial landfill in Anne Arundel County that currently has approximately 214,400 scrap tires in ravines, both loose and partially buried in the ground.

Status: In November 2012, the Department commenced litigation against the owners to compel them to clean up the scrap tires or grant access to the State for the cleanup of the scrap tires, and to pay for all expenses incurred by the State related to the cleanup. The case was settled in February 2014, and the Department and property owners entered into a consent order that stipulates that the Department will clean up the scrap tires on site using the Fund and the property owners will place a portion of the property into an environmental trust. The design and permitting phase of the cleanup is currently underway. Scrap tire removal and site restoration activities are expected to take place during FY 2016.

Boehm/Crownsville Cleanup



Tyler Towing/Clarksville Scrap Tire Stockpile Cleanup – This property was used as a junkyard for decades in Howard County. There are estimated to be 61,376 scrap tires in stockpiles throughout the property. Some scrap tires are mixed with scrap metal, soil, and other solid wastes in a berm that roughly follows the property perimeter.

Status: All administrative and enforcement efforts by the Department have been exhausted, and the property owners have failed to remove and properly dispose of the scrap tires on the site. The Department is working with the Office of the Attorney General to pursue other cleanup and/or enforcement actions.

Cost Recovery Actions

- ♦ The Department continues to use the services of the Office of the Attorney General to handle scrap tire cost recovery actions (see Table IV for details).
- ♦ To date, 147 cleanups have been performed using the Fund.
- ♦ In total, 32 property owners have been pursued in cost recovery actions for cases in which the State used the Fund to initiate scrap tire cleanups since the inception of the program.
- ♦ Cost recovery actions have not been performed against:
 - 95 sites because they were on publicly owned property;
 - 11 sites because they qualified for the inheritance exemption;
 - 5 sites because the property owner passed away and the estate was closed before a cost recovery action could be completed;
 - 3 sites because the cost to pursue the case was higher than the cost recovery amount that could be sought; and
 - 1 site because the Department entered into a Consent Order with the property owners exempting the owners from cost recovery in exchange for placing a portion of the property into an environmental trust.
- ♦ To date, the Department has sought a total of \$3,088,508.90 from property owners and has collected a total of \$323,349.24 in cost recovery actions. Many of these cases are still in litigation or have been sent to the Central Collections Unit (“CCU”). Some cases were settled out-of-court for less than the amount originally sought due to the Defendant’s inability to pay.
- ♦ The Garner/Brandywine site (significantly completed in FY 2012, except for monitoring of restoration efforts) qualifies for the inheritance exemption. In accordance with a consent order, Boehm/Crownsville (currently in design and permitting phase) will be cleaned up using the Fund and the property owners will not be required to reimburse the Department. Therefore, cost recovery will not be sought for these sites.
- ♦ No cost recovery funds were collected in FY 2014.

Table IV – Initiated Cost Recovery Actions Through FY 2014

Site Name	County	Cleanup Year	No. of Scrap Tires	Amount Sought
Hughesville/Underwood	Charles	1996	720,000	\$1,015,299.72
Western Commercial/Smithburg	Washington	1996	505,500	\$770,174.47
Oak Hill Realty/Easton	Talbot	1997	158,325	\$375,294.16
Lofland/Sudlersville	Queen Anne's	1996	120,000	\$226,083.74
Snyder/Calvert	Cecil	1996	129,526	\$151,266.00
Tull/Federalsburg	Caroline	1997	61,688	\$104,586.00
Johnson/Sunderland	Calvert	2003	10,735	\$91,123.00
Howard/Crisfield	Somerset	2002	21,505	\$86,395.00
Insley/Cambridge	Dorchester	2002	20,747	\$60,908.91
Hustle Tire/Ingleside	Queen Anne's	1998	26,852	\$48,437.69
Dotson/Preston	Caroline	2000	24,000	\$26,403.70
Sproates/Golts	Kent	1998	6,825	\$26,118.75
Warfield/Bethlehem	Caroline	1997	14,338	\$24,596.24
Myers/Baltimore	Baltimore	2002	7,179	\$22,349.00
Williams/Vienna	Dorchester	2002	3,642	\$14,611.00
Elwood's Auto/Smithburg	Washington	2000	266,664	\$11,388.02
Husted/Crisfield	Somerset	2003	1,650	\$7,598.00
Clark/Choptank	Caroline	2004	2,007	\$5,495.00
Betts/Crisfield	Somerset	2002	922	\$3,877.00
Heath Salvage/Millington	Kent/Queen Anne's	2001	3,478	\$3,200.00
Thomas/Rhodesdale	Dorchester	2003	350	\$2,450.00
Joy & Morgan Developers/Temple Hills	Prince George's	2002	238	\$1,855.00
Truxon/Hillsboro	Caroline	2003	758	\$1,799.00
Goodyear/Elkton	Cecil	2003	1,013	\$1,200.00
McMannis/Cumberland	Allegany	1997	887	\$998.00
Carter/Queenstown	Queen Anne's	1998	1,117	\$982.00
Spencer/Golts	Kent	1997	230	\$950.00
Wilkinson/Oldtown	Allegany	2002	248	\$800.00
Holley/Collins Road	Somerset	1997	217	\$788.00
Lane/Princess Anne	Somerset	2003	300	\$750.00
Turner/White Hall	Harford	2003	500	\$500.00
Miller/Churchton	Anne Arundel	2004	16,000	\$231.50
Total Scrap Tires Removed			2,127,441	
Total Amount Sought (Through FY 2014)				\$3,088,508.90

Scrap Tire Projects

MES has the primary role in the planning and implementation of scrap tire projects to promote the development of new technologies for recycling scrap tires while reducing, recovering, and recycling scrap tires from stockpiles in Maryland.

Projects Initiated During FY 2014

Agricultural Scrap Tire Drop-Off Day Project

- MDE, in conjunction with MES, the Maryland Farm Bureau, Inc. (“MFB”), and the Anne Arundel Economic Development Corporation, initiated an Agricultural Scrap Tire Drop-Off Day in 15 Maryland counties (Anne Arundel, Baltimore, Calvert, Caroline, Carroll, Dorchester, Frederick, Garrett, Harford, Kent, Montgomery, Prince George’s, St. Mary’s, Washington, and Wicomico).
- The MFB helped coordinate events in the four counties that declined to participate in the FY 2013 events: Anne Arundel County (Department of Public Works), Baltimore County, Harford County, and Montgomery County. The MFB also helped advertise the event directly to farmers in some of the other participating counties.
- Although Anne Arundel County declined to participate in the Agricultural Scrap Tire Drop-Off Day Event, the Anne Arundel Economic Development Corporation continued to participate (their participation began in FY 2013) to provide an extended Agricultural Scrap Tire Drop-Off Day Event for local farmers.
- Approximately 3,846.52 tons of agricultural scrap tires (the equivalent of 384,652 passenger tires) were collected from farmers during this project.
- The cost of the Agricultural Scrap Tire Drop-Off Day Project was just under \$800,000.

Projects Continuing from Previous Years

Citizen and Agricultural Scrap Tire Drop-Off Day Project

- MDE, in conjunction with MES, the Maryland Farm Bureau, Inc., and the Anne Arundel Economic Development Corporation, initiated a Citizen and Agricultural Scrap Tire Drop-Off Day with 19 participating counties and Baltimore City.
- The events were held in the Spring and Fall of 2014.
- Four counties declined to participate: Anne Arundel County (Department of Public Works), Baltimore County, Harford County, and Montgomery County.
- Although Anne Arundel County declined to participate in the Citizen Scrap Tire Drop-Off Day Event, the Anne Arundel Economic Development Corporation participated to provide an Agricultural Scrap Tire Drop-Off Day Event for local farmers.

- Approximately 721.10 tons of citizens' scrap tires (the equivalent of approximately 72,110 passenger tires) were collected from citizens during the events.
- Approximately 452.72 tons of agricultural scrap tires (the equivalent of approximately 45,272 passenger tires) were collected from farmers during the events.
- The Citizen and Agricultural Scrap Tire Drop-Off Day Project used \$284,000 from the Fund.

Rubber-Modified Asphalt Project (Caroline County)

- This project demonstrates and encourages the use of rubberized asphalt products by public agencies and private contractors in Maryland.
- The rubberized asphalt is expected to show several advantages over traditional materials including increased flexibility and durability, and decreased slumping, reflective cracking, and noise.
- In FY 2007, MES worked with Talbot County to identify potential sites for rubber-modified asphalt installations; however, Talbot County did not provide MES with identified sites and paving schedules. Therefore, the project was moved to Caroline County.
- In FY 2009, the Department and MES began working with Midshore Regional Landfill, a cooperative effort between Kent, Caroline, Queen Anne's, and Talbot County governments. The project involved installation of rubber-modified asphalt ("RMA") in lieu of traditional paving materials as part of construction of the Midshore II Regional Landfill in Caroline County. The project targeted County, municipal, and/or landfill roads in several high/diverse use areas.
- In FY 2009, a portion of River Road in front of the Midshore II Regional Landfill near the Town of Ridgely in Caroline County was selected as the paving location.
- In October 2010, representatives from State and county government agencies and private contractors were invited to observe the manufacture of the rubberized asphalt mix and installation of the material on River Road.
- The rubber modified asphalt was installed in October 2010, in conjunction with construction of the Midshore II Regional Landfill, which opened on October 11, 2010.
- Upon completion of the installation in October 2011, informational signs were placed at the project site educating the public about the project and scrap tire recycling.
- The rubberized asphalt road section is being visually monitored for pavement condition every 6 months for 3 years (through October 2014).
- The first post-construction inspection was completed on March 1, 2011, and the pavement was observed to be in excellent condition.
- The second inspection was performed on November 4, 2011, and the pavement was again observed to be in excellent condition.
- The third inspection took place on May 8, 2013. The pavement appeared to be maintained in excellent condition, and does not show any evidence of

raveling, rutting, distortion, cracks, or major potholes. Three very small potholes were observed; however, they appear to be minimal and do not show any sign of deterioration. These small potholes should not cause any hazard to traffic safety. Therefore, immediate repair to the potholes was not recommended.

- The final inspection was performed on May 9, 2014. The pavement appeared to be in excellent condition, and did not show any evidence of raveling, rutting, distortion, cracks, or major potholes. Minor scratches and potholes that were observed in the past inspections did not seem to deteriorate or affect the condition of the adjacent RMA pavement areas.
- MES concluded that, overall, the RMA pavement on River Road has been in superior condition with no major deformation or cracking since the project was completed in 2010.
- The cost of this project was just over \$135,000 from the Fund.

Scrap Tire Projects Planned for FY 2015

The Scrap Tire Program will continue the Citizen and Agricultural Scrap Tire Drop-Off Day project that was initiated during FY 2013.

Licensing

Under Maryland law, Section 9-228 of the Environment Article, the Department is required to regulate scrap tire facilities and scrap tire haulers.

- ★ Facilities that collect or process scrap tires are required to obtain an appropriate license for their respective operations.
- ★ Scrap tire haulers are also required to obtain licenses for their activities.
- ★ This comprehensive licensing program allows for the efficient management of scrap tires:
 - *from* the point of generation,
 - *via* a licensed or approved transportation system, and
 - *to* a licensed or approved scrap tire facility for the transfer, collection, or processing of the scrap tires.

The Department issues the following types of scrap tire licenses and approvals:

- ✓ **Scrap Tire Recycler License** – For activities that convert scrap tires into a marketable product.
- ✓ **Scrap Tire Collection Facility License** – For operations that collect or accumulate scrap tires temporarily



on a site and transfer scrap tires to licensed or approved scrap tire facilities. There are three categories of collection facility licenses:

- **General License:** Sites with up to 50 scrap tires at any given time.
 - **Secondary License:** Sites with up to 1,500 scrap tires at any given time.
 - **Primary License:** Sites with more than 1,500 scrap tires at any given time.
- ✓ **Scrap Tire Hauler License** – For a person who, as a part of a commercial business, transports scrap tires in the State.
 - ✓ **Substitute Fuel/Tire Derived Fuel (TDF) Facility Approval** – For operations that use whole or chipped scrap tires to replace existing fuel sources.
 - ✓ **Solid Waste Acceptance Facility Approval** – For a permitted refuse disposal or acceptance facility that accepts scrap tires for collection or processing.
-

Licensing Accomplishments in FY 2014

- ❖ A total of 591 new and 53 renewal scrap tire licenses were issued (see Table V).

Table V – Scrap Tire Licenses in FY 2014

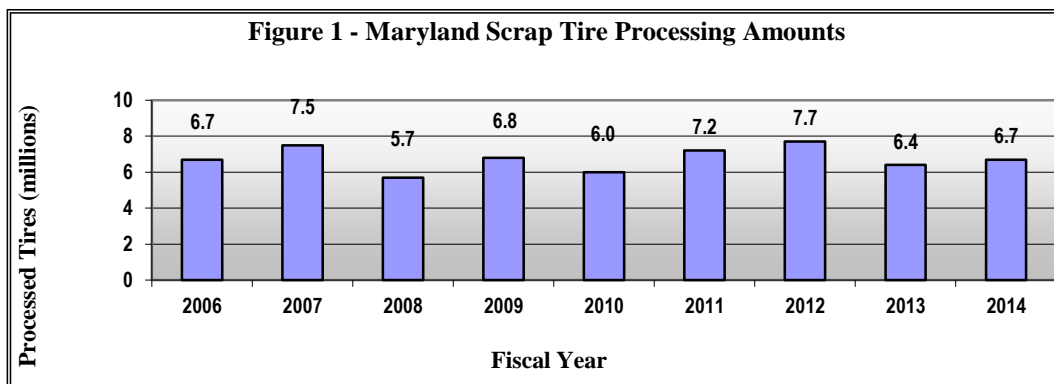
Type	New	Renewed	Total Issued (FY 2014)	Total Valid Licenses
General Collection	90	N/A	90	1,439
Secondary Collection	317	39	356	938
Primary Collection	0	0	0	2
Recyclers	0	0	0	4
TDF Facility	0	0	0	1
Solid Waste	2	1	3	4
Haulers	182	13	195	719
TOTAL	591	53	644	3,107

Scrap Tire Markets and Market Development

Market Analysis

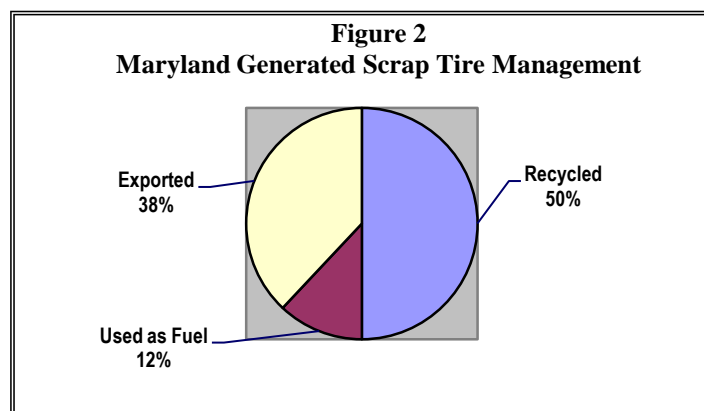
- ❖ All licensed scrap tire facilities and haulers are required to submit semi-annual reports to the Department. Reports must include:
 - The origin and number of scrap tires received, collected, or processed at the facility.

- Identification of scrap tire haulers transporting the scrap tires, quantities in number or weight, and facility information for where the scrap tires were deposited.
- ❖ There is no data available on actual amounts of scrap tires generated, so an estimate based on population is used. Based on the assumption that scrap tires are generated at a rate of one tire per person per year, the most recent census numbers were used to estimate that 5.9 million scrap tires were generated in Maryland during FY 2014. The actual number of scrap tires generated could vary (up or down) from the estimate due to factors such as economic conditions, special government programs, product recalls, etc.
- ❖ During FY 2014, the State's scrap tire processing facilities managed approximately 6,747,364 scrap tires generated from Maryland and out-of-State facilities.
 - ✱ This represents a 5 percent increase from the previous year. (See Figure 1). The 6,747,364 scrap tires processed include approximately 54 percent (3,636,294) Maryland generated and 46 percent (3,111,070) imported scrap tires.
 - ✱ Of the 6,747,364 scrap tires processed, approximately 82 percent (5,521,522) were recycled, a 3.5 percent decrease from the percentage reported in FY



2013. The remaining 18 percent (1,225,842) were used as fuel.

- ✱ Approximately 50 percent (2,928,356) of the estimated 5.9 million Maryland-generated scrap tires were recycled in Maryland facilities and 12 percent (707,938) were used as fuel in Maryland facilities during FY 2014. The remaining 38 percent of the scrap tires (2,263,706) were exported. (See Figure 2).
- ✱ Emanuel Tire Company (Maryland's largest scrap tire recycling facility) in Baltimore City processed 4,911,114 scrap tires in FY 2014, a 4 percent



- decrease from the number processed in FY 2013 (5,104,962).
- ✖ The Harford Waste-to-Energy Facility processed 578,938 scrap tires during FY 2014, a 13 percent increase from the number of scrap tires processed during FY 2013 (510,979).
- ✖ During FY 2014, Holcim US, Inc. (formerly the St. Lawrence Cement Company) in Washington County processed approximately 645,204 scrap tires, a 40 percent increase from the reported quantity (461,109 scrap tires) in FY 2013.
- ✖ K & K Tire, Inc. in Anne Arundel County processed 212,300 scrap tires in FY 2013, a 4 percent increase from the 204,000 scrap tires processed in FY 2013.
- ✖ The Auston Tire Recycling facility in Harford County processed 398,108 scrap tires in FY 2014, an increase of 166 percent from the 149,677 scrap tires processed in FY 2013.
- ✖ Wheelabrator Baltimore LP in Baltimore City processed 1,610 scrap tires in FY 2014, a 45 percent decrease from the 2,909 scrap tires processed in FY 2013.
- ✖ Fort Detrick in Frederick County processed 90 scrap tires in FY 2014, a 61 percent increase from the 56 scrap tires processed in FY 2013.

Maryland's Scrap Tire Flow and Destinations

- ▶ The overall amount of scrap tire processing (6,747,364 scrap tires) increased 5 percent from the reported processing for FY 2013 (6,433,692 scrap tires). Two of the Maryland processing facilities decreased their processing of scrap tires (Emanuel by 4 percent and Wheelabrator by 45 percent), decreasing their processing in FY 2014 by a combined total of 195,147 scrap tires. The ratio of scrap tires that were recycled versus used as fuel in Maryland decreased 3 percent during FY 2014.
- ▶ Overall, the scrap tire generation, processing, and handling of the estimated 5.9 million Maryland scrap tires follow the traditional trends, although the percent of Maryland scrap tires exported to other states appears to have decreased from 42 percent in FY 2013 to 38 percent in FY 2014: 2,928,356 scrap tires were recycled, approximately 2,263,706 scrap tires were exported, and the remaining 707,938 scrap tires were used as fuel. The apparent decrease in the number of Maryland generated scrap tires exported to other states is based on the assumption that 5.9 million scrap tires were generated in Maryland. That figure is estimated by assuming that one scrap tire is generated for every resident in Maryland each year, based on the most current census data.
- ▶ Continued emphasis needs to be given to market development of scrap tire products and processed raw materials. The Department worked with MES and the private sector to develop a “best practices” manual to encourage engineers and designers to incorporate the use of scrap tire-derived products into civil engineering projects. The manual advises the design engineer of

possible uses for engineering materials derived from scrap tires, including the use of tire chips in drainage layers. The guidance will increase the utilization of these materials, and using alternatives will help conserve natural resources, such as gravel and crushed stone. The manual is available free of charge online at the Department's website at:

http://www.mde.state.md.us/programs/Land/RecyclingandOperationsprogram/ScrapTire/Documents/www.mde.state.md.us/assets/document/Guidance_Manual_For_Scrap_Tires.pdf.

Figure 3 – Scrap Tire Flow in FY 2014

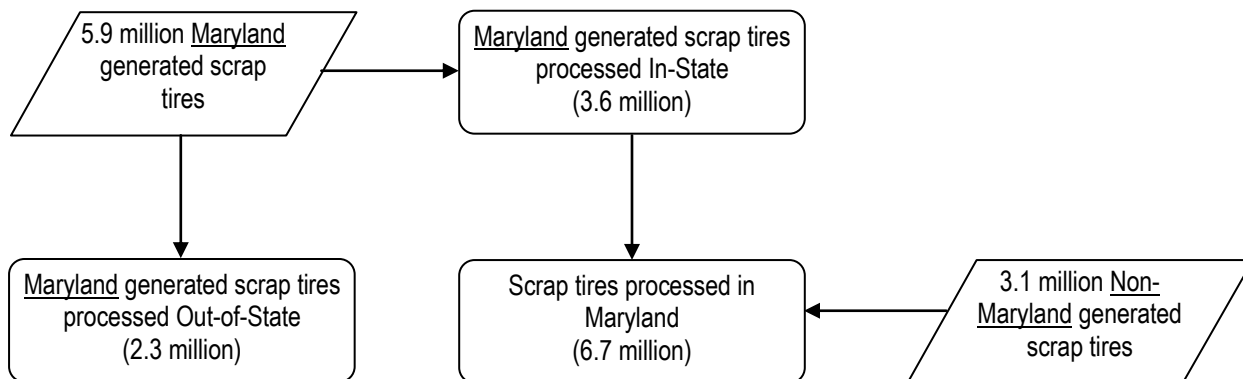


Table VI – Maryland Licensed Scrap Tire Processing Facilities

Facility Name/Type	Location	Operation	Telephone	Tires Processed in FY 2014
Emanuel Tire Company/ Recycler	1300 Moreland Ave Baltimore MD 21216	The company has been processing scrap tires for the last four decades. The operation converts scrap tires into 1 to 2 inch size tire chips.	(410) 947-0660	4,911,114
Holcim US, Inc. (formerly St. Lawrence Cement Co.)/ TDF	1260 Security Road Hagerstown MD 21741	The operation utilizes tire chips as a supplemental fuel in its cement kiln to generate up to 35 percent of the process heat needed to convert the raw material into cement.	(301) 739-1150	645,204
Harford Waste-to-Energy Facility/ Incinerator	1 Magnolia Road Joppa MD 21085	The facility processes up to 360 tons per day of municipal solid waste with a scrap tire content of up to 72 tons per day. Steam is generated at the facility to generate electricity for Aberdeen Proving Ground Army facility.	(410) 679-6200	578,938
Auston Tire Recycling/ Recycler	1202 Pauls Lane Joppa MD 21085	Processes scrap tires into products, such as rubber mulch material for landscaping or playgrounds.	(410) 335-1016	398,108
K & K Tire, Inc./ Recycler	816 Oregon Avenue Linthicum MD 21090	Processes scrap tires into products, such as rubber mulch material for landscaping or playgrounds.	(410) 636-2002	212,300

Facility Name/Type	Location	Operation	Telephone	Tires Processed in FY 2014
Wheelabrator Baltimore LP (BRESKO)	1801 Annapolis Road Baltimore MD 21230	The facility has been approved to burn scrap tires with municipal solid waste.	(410) 234-0808	1,610
Fort Detrick	393 Beasley Road Frederick MD 21702	The facility burns scrap tires with solid waste and medical waste.	(301) 619-2323	90
A2Z Scrap Tire Recycling Facility	250 S. Kresson Street, Baltimore, MD 21224	The facility has been approved to process scrap tires into products, such as rubber mulch material for landscaping or playgrounds.	(410) 679-8877	0
Frederick/Carroll WTE	4549 Metropolitan Court, Frederick, MD 21704	The facility has been approved to burn scrap tires with municipal solid waste.	(410) 333-2730	0
TOTAL				6,747,364

Compliance and Enforcement Activities

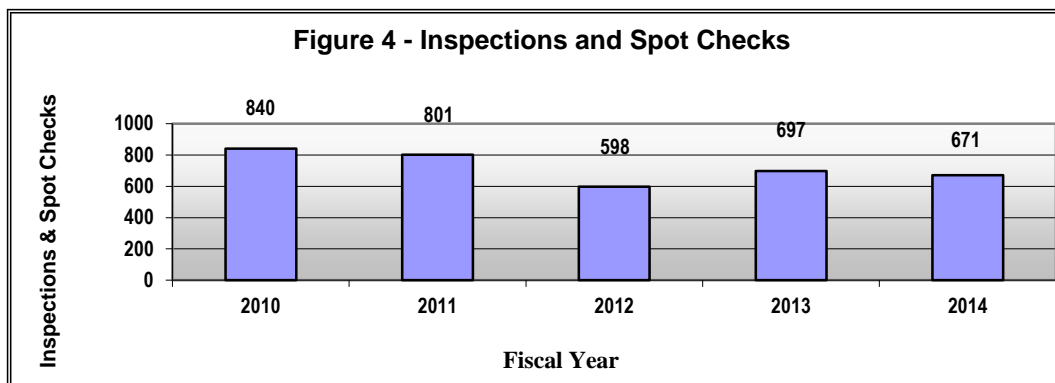
The goal of the Department's compliance and enforcement activities is to ensure that all of Maryland's licensed scrap tire facilities, scrap tire haulers, and scrap tire stockpiles are in full compliance with the scrap tire law, regulations, and license conditions.

Strategies for Compliance and Enforcement Actions in FY 2014

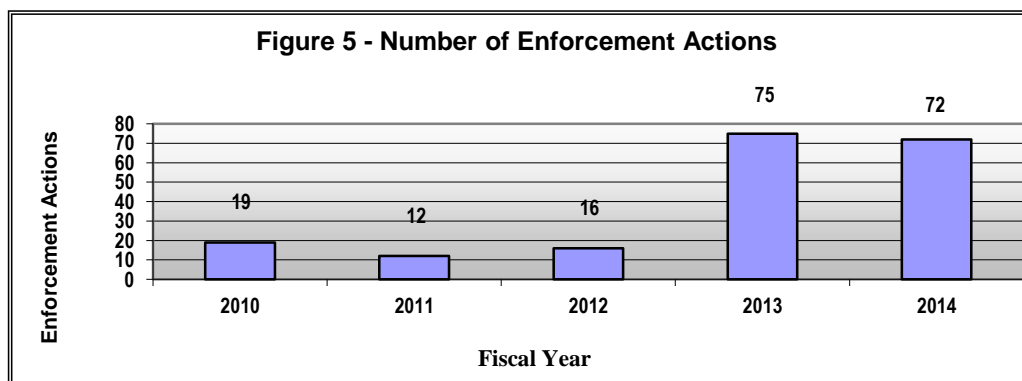
- ✦ Continued to maintain the quality of compliance and enforcement activities and routinely perform site inspections and investigations.
- ✦ Maintained inspection, compliance assistance, and enforcement actions of scrap tire licensees to discourage illegal scrap tire stockpiles.
- ✦ Continued coordinating with the State Fire Marshal's Office to ensure that plans for tire recycling and storage facilities meet applicable fire prevention standards and have adequate provisions for fighting fires should they occur.
- ✦ Continued identification and cleanup of illegal scrap tire stockpiles.

Accomplishments in FY 2014

- ♦ A total of 671 scrap tire investigations and inspections were conducted (See Figure 4).



- ♦ There was a slight decrease (4 percent) in the number of scrap tire inspections conducted in FY 2014 to 671 from 697 in FY 2013. The reported inspection coverage rate of 15 percent in FY 2014 is a 6 percent decrease from the coverage rate of 16 percent reported in FY 2013. Scrap tire inspections are performed by inspectors in the Solid Waste Program.
- ♦ The percentage of inspected facilities in significant compliance was 86 percent during FY 2014, the same as the compliance rate reported in FY 2013.
- ♦ A total of 96 significant violations were resolved, a 39 percent decrease from the number (157) resolved in FY 2013.
- ♦ The number of compliance assistance actions rendered decreased from 9 in FY 2013 to 0 in FY 2014.
- ♦ The Scrap Tire Program issued 72 enforcement actions during FY 2014 consisting of 72 penalties and other actions. Two referrals were made to the Office of the Attorney General for possible criminal enforcement action (See Figure 5).



- ♦ Table VII displays the FY 2014 enforcement data as reported in the annual *MDE Enforcement & Compliance Report*.

Table VII – Scrap Tire Compliance and Enforcement in FY 2014

PERFORMANCE MEASURE	TOTAL
PERMITTED SITES/FACILITIES	
Number of permits/registrations issued	644
Number of permits/registrations in effect at fiscal year end	3,107
OTHER REGULATED SITES/FACILITIES	
Stockpiles to be cleaned up	57
INSPECTIONS	
Number of sites inspected (“inspected” defined as at the site)	461

PERFORMANCE MEASURE			TOTAL
Number of sites audited but not inspected (places where MDE reviewed submittals but did not go to the site)			2,127
Number of sites evaluated for compliance (sum of the two measures above, same as #11 on the prior charts)			2,588
Number of inspections, spot checks (captures number of compliance activities at sites)			671
Number of audits (captures number of reviews of file/submittals for compliance)			3,551
Number of inspections, audits, spot checks (sum of the two measures above)			4,222
COMPLIANCE PROFILE			
Number of inspected sites/facilities with significant violations			69
Percentage of inspected sites/facilities with significant violations			14%
Inspection coverage rate (number of sites inspected/coverage universe)*			15%
SIGNIFICANT VIOLATIONS			
Number of significant violations involving environmental or health impact			29
Number of significant violations based on technical/preventative deficiencies			69
Number of significant violations carried over awaiting disposition from previous fiscal year			55
Total number of significant violations (sum of the three measures above)			153
DISPOSITION OF SIGNIFICANT VIOLATIONS			
Resolved			96
Ongoing			57
ENFORCEMENT ACTIONS			
Number of compliance assistance rendered			0
	Administrative	Civil/Judicial	Total
Number of show cause, remedial, corrective actions issued	0	0	0
Number of stop work orders	0	0	0
Number of injunctions obtained	0	0	0
Number of penalty and other enforcement actions	72	0	72
Number of referrals to Attorney General for possible criminal action			2
PENALTIES			
Amount of administrative or civil penalties obtained (\$ collected in FY)			\$3,120

* Coverage rate above is computed as the total number of sites inspected and dividing that by the total number of permits/licenses in effect.

Conclusion

The Maryland Scrap Tire Program continues to monitor cleanups, ensures compliance with licensing requirements, and oversees facilities' compliance. During FY 2014, the Scrap Tire Unit increased the number of licenses issued, the number of compliance audits performed, and the number of enforcement actions taken. These increased enforcement efforts have resulted in increased compliance by the regulated community, as evidenced by fewer illegal scrap tire stockpiles to be cleaned up and a lower total number of significant violations.