



Scrap Tire Management Update

Michael Blumenthal
Vice President
Rubber Manufacturers Association

December 12, 2007



RMA Scrap Tire Activities

- Began in 1990
- Scrap Tire Management Council = RMA
- Sponsored by all RMA tire manufacturers
- Work with governments, scrap tire users, NGO's, general public to accomplish mission



RMA Scrap Tire Strategic Goals

- To promote the elimination of all scrap tire piles in an environmentally and economically sound manner
- To promote the management of all annually generated scrap tires in an environmentally and economically sound manner



RMA Scrap Tire Strategic Goals

- To seek public awareness of scrap tire management success
- To advocate for a legislative and regulatory environment that is conducive and supportive of the RMA scrap tire mission



RMA Tire Company Members





RMA Scrap Tire Market Report

- RMA conducts a biennial survey of scrap tire management in the U.S. and trends in the industry
- Most comprehensive source of scrap tire information available
- RMA surveyed state regulators and industry sources to obtain information
- Preparing to send out the questionnaire for the 9th Biennial report in early 2008



RMA Scrap Tire Market Report

- Features of the 2008 report
 - Updated market and stockpile data in both weight and units
 - Stockpile abatement history by state
 - Reevaluate weight of a ***Passenger Tire Equivalent (PTE)*** (currently at 22.5 pounds)
 - Reevaluate average tire weight (currently at 33 pounds)



Projected Market Outlook

- Overall percentage of tires going to end use markets likely to increase slightly (currently at 87%)
- Demand for TDF in South/Southeastern US is changing market dynamics (TDF being shipped from further distances than before)
- Marginal increases in most other regions



Projected Market Outlook

- Stockpiled tires reduced from 188 million to 150 – 140 million
- Several state scrap tire funds still being misused
- Quality, effectiveness and funding of state programs range widely
- Several states going through regulatory or legislative reviews/changes



Significant Stockpile Abatement

	2005	2007 (estimated)
New York	40 Million	20 Million
Ohio	4 Million	2.6 Million
Michigan	10 Million	10 Million
Pennsylvania	8 Million	4 Million



Regional Markets

- New England: Still strong TDF markets
- Mid-Atlantic: Weak, scattered markets
- Southeast: Strong TDF & GR markets
- Southwest: TDF in Texas & RAC in AZ; all other states are struggling



Regional Markets

- Midwest: Recently lost some TDF markets, Other markets available
- North Central: Few markets available
- Plains States: Not a strong market condition
- West Coast: TDF & GR strong, but ability to landfill tires hurts the markets



Projections for 2008 - 2009

- Demand for TDF should increase (ME, PA, IA, NE, SC)
- If TDA markets are to expand, western states must start using tire shreds
- Ground rubber markets should increase (infill/sport turf; molded/extruded products, playgrounds)



Factors Impacting the Markets

- Every major market has issues that must be addressed
- New uses raise new questions about tires
 - Precautionary principle
- Plethora of reports support both sides of all the arguments



NRDC v. EPA

- Court decision vacated two EPA air rules: boiler MACT standards and commercial and industrial solid waste incinerators (CISWI) definitions rule
- One of the issues in the case is how waste materials used for energy recovery, including tire-derived fuel (TDF), is regulated under the Clean Air Act



NRDC v EPA

- At issue is the question of how scrap tires are defined for purposes of regulations under Clean Air Act (CAA) sections 112 and 129
- Potentially, the use of any solid waste (including scrap tires) as a fuel would be regulated under Section 129 of the CAA. Section 129 is the waste incinerator regulations, which are more onerous than the regulation of Section 112 of the CAA, where TDF is now regulated



NRDC v EPA

- If TDF were regulated in this way, all indications are that industrial TDF users would choose to discontinue TDF use, rather than be regulated under CAA section 129
- RMA is part of an industrial coalition working to provide EPA with a proposal on how to define scrap tires relative for purposes of CAA section 129 that would preserve regulation of TDF under CAA section 112



NRDC v. EPA

- Neither RMA, nor any member of the coalition, is trying to limit, impinge or restrict how states regulate scrap tires, or any other solid waste material
- The goal is to preserve the status quo in the scrap tire marketplace with regard to TDF, while not negatively affecting any other aspect of state scrap tire management, regulation or enforcement



Tire-Derived Fuel

- Allegations persist about TDF causing increased dioxin, furan, VOC and metals emissions
- TDF is portrayed as a low-value added use for tires, wasting a resource
- Reality is that TDF emissions are environmentally sound and have a high ROI



Rubber Modified Asphalt

- Sentiment of many DOT's is that it still is doubles the cost of the road and does not last as long as regular asphalt
- R-M asphalt use limited to 6 states where R-M asphalt suppliers are well positioned
- State programs have not helped either; state's continue to subsidize R-M-A, which maintains myth of cost-inefficiency



Ground Rubber in Sport Surfacing

- Questions raised about potential “volatile” emissions (off-gassing)
- Recent laboratory tests indicates different leaching characteristics than 5-year, field studies
- Reported heating of surface a concern
- Supportive data is lacking



Ground Rubber in Playgrounds

- Concerns raised about volatile emissions
- Concerns about “latex”
- Concerns about leachate
- Concerns about not meeting ADA requirements
- Concerns about ingesting on rubber chips



Tire-Derived Aggregate

- Concerns remain about self-heating
- Many state's DOT's have restrictions on the use of recycled materials in road construction
- Some states consider TDA as a solid waste; limiting ability to store TDA
- Many contractor unfamiliar with TDA; adds risk and cost to projects



State Issues Impacting Markets

- Some states have no one assigned to focus on scrap tires
- Funds have been reduced or removed
- State policies still restrict some markets
- State grants to public entities not obtaining desired results
- Grants often used to production capacity, not developing demand



Recent Development

- Reemergence of devulcanization interests
 - Failed 8 years ago
- Recent surge of companies promoting pyrolysis
 - Turning tires into oil
- Renewed focus on producing “ultra-fine” ground rubber for paint, plastic and tire industries
 - First attempt at this market niche failed, causing a \$55 million loss



RMA Programs to Assist Markets

- TDF: coalition member working with other industry groups to assist EPA obtain data & information to address court decision
- Ground rubber: Working with NY, CA, trade associations & ASTM to address allegations on environmental & human health impacts on playgrounds and sport turf applications



RMA Programs to Assist Markets

- TDA: Coalition member (IRC) working with EPA to educate Federal/state staff on beneficial use determination. IRC working with AASHTO & FHWA to remove restrictions on use of industrial byproducts and recycled content materials



RMA Programs to Assist Markets

- State issues: RMA is on two state scrap tire task forces (OK, MI) and engaged in dialogue with other states on improve the market development, stockpile abatement, budgetary and regulatory processes (CA, NY, AL, GA, MA, NJ, PA, CO)
- RMA will continue to provide information on market conditions and trends



Conclusions

- Market development/protection of markets must be the top priority of states/industry
- Fees/funds for tire programs are needed, even after markets & stockpiles addressed
- States that end/raid tire programs will have to readdress scrap tires problems
- Stockpiles to level off to 140 million by 2008



Conclusions

- Tire funds should be used to reduce barriers and increase demand for products, not for purchase of products, demonstration projects or pilot projects
- Market solutions should be based on local or regional resources
- Stockpile abatement will continue but not at rate seen in 2004 and 2005



RMA Contact Information

Rubber Manufacturers Association

1400 K Street, N.W., Suite 900

Washington, DC 20005

(202) 682-4882

michael@rma.org

info@rma.org

Download the Full RMA 2006 Scrap Tire Market Report at:

http://www.rma.org/scrap_tires/