

SCRAP TIRE MANAGEMENT IN RURAL AREAS

Michael Blumenthal
Vice President
Rubber Manufacturers Association
Washington, DC
EPA Region 8 Webinar

Scrap Tire Management in Rural Areas



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 Tire Company Members



















- Small-scale generation of scrap tires
 - Less frequent collection service due to rate of generation & distance to be traveled
 - Insufficient numbers for +1 viable processor
 - Insufficient numbers for large-scale markets
 - Ample space to dump
 - Limited enforcement capabilities



- Scrap tires generated in urban areas: stored (stockpiled) in rural area
- Majority of large stockpiles in rural areas
- Mosquito infestation a major concern
- In case of fire, counties lack resources to fight fires
 - Volunteer fire departments
 - Limited budgets
 - Lack of specialized training



- Targets for "Dreamers & Schemers"
 - Approach county with "win-win" opportunity
 - Promise jobs and tax revenue
 - Ask for IDB/donation of land or tax relief
 - Claim their technology can "solve the problem"
 - Often questionable technology
 - Claim that there is a major scrap tire crisis
 - Has spread sheets to show their projections



- Common "Dreamers & Schemers"
 Approaches to Managing Scrap Tires:
 - > Pyrolyzing tires: turning garbage into oil
 - Tire processors/balers: We can use every tire...
 - ➤ Big numbers: We will process 10 million...
- All we need is....



- Targets for "Dreamers & Schemers"
 - Often targeted due to perceived lack of knowledge of situation
 - County recycling coordinator often not well versed in scrap tire technologies
 - Perceived easier to exert political pressure
- Results in new piles being formed & loss of funds



Possible Solutions

- If scrap tires are collected at landfills, use on-site
 - Portable shredders
 - 5 possible applications at landfills
 - Can save resources/reduce costs
 - Last resort: rough shred and landfill (where allowed)



Impacts of Landfilling Scrap Tires

- No environmental issues shreds tires (+)
- Least cost disposal option (+)
- Gets rid of the problem (+)
- No end use market can compete (-)
- Disallows market development (-)



Possible Solutions

- Develop local collection capacity (DPW)
 - Pick up dumped tires/possible drop off site
 - Needs critical mass for applications
 - Use tires in road construction
 - Frost protection
 - Side slope stabilizers (whole tires)
 - Lightweight backfill
 - Embankment fill



Civil Engineering Applications

- Tire Bales
 - Began in mid 1980's
 - Used in Southwest USA (NM/TX)
- Tire baling is not recycling: not good or bad: it's a form of tire processing
- Regulatory agencies looking for "engineered" projects (P.E. stamp)



Possible Solutions

- Buy recycled products
 - Mulch
 - Playground cover
 - Septic field drainage medium
- Do regional projects
 - Gains economy of scale



If Dumping is a Problem

- Alert law enforcement officials
- Contact state regulatory agency
- Have amnesty days
- Use local tires for local projects: publicize project
- Talk to retailers



Ag, Mining and Off Road Tires

- Only 2 states regulate these tires (AZ, MN)
- Difficult to processes; do not fit into standard tire shredding equipment
- Need hydraulic sheers to "snip"
- Have more steel than some truck tires
- Mining tires are supposed to be disposed on public lands



Ag, Mining and Off Road Tires

- If possible to store safely & can find portable system to process, shreds can then be used as TDA
- Tub grinders generate very rough shreds with exposed steel
- Mining tires typically used for livestock feeders or wind-breaks



Recap

- Piles/dumping of tires not generally from local sources
- Dumping can be local problems if no enforcement or limited & costly disposal options
- Solutions dependent upon system of disposal & resources available



Recap

- Think about allowing storage and use of tires at landfills
- Think about small-scale projects
- Think about regional projects
- Consider a mobile shredder
- Talk to DPW about end uses
- Educate public about dangers of dumping



Resources

- State regulatory agency
- Rubber Manufacturers Association
- EPA Region 5 Anti-dumping booklet & Stockpile abatement information
- EPA Resource Conservation Challenge
- Small Business Administration



Resources

- On RMA/Scrap Tire web site
 - Comprehensive 'matrix' of each state's scrap tire program
 - Description of markets for scrap tires
 - Leachate data
 - Prevention/fighting of scrap tire fires
 - Playground safety information



RMA Resources

- Training Courses
 - Tire shreds used in landfill construction
 - Tire shreds used in road construction
 - Use of TDF
 - Scrap tire fire prevention/fire fighting tactics
 - RMA presence at public hearings/meetings



Contact Information

Michael Blumenthal Rubber Manufacturers Association 1400 K Street NW Washington, DC 20005 202 682 4882

Michael@rma.org

WWW.SCRAPTIRE.ORG