[00:00:00] START VIDEO

AUTOMATED VOICE

The broadcast is now starting. All attendees are in listen only mode.

KENDRA MORRISON

Good morning. This is Kendra Morrison with EPA Region 8. I'd like to welcome you to Scrap Tire Reuse and Recycling. This webinar is being hosted by the U.S. Environmental Protection Agency, Region 8 Office in Denver, Colorado, to provide a forum for information exchange

[00:00:38]

about topics of interest on scrap tire reuse and recycling to states, our nation's tribes, and other interested stakeholders. We are very happy to have you participating today. At the end of 2003, the U.S. generated approximately 290 million scrap tires. Markets now exist for about 80% of scrap tires, a significant increase from nearly 20 years ago. Scrap tires are consumed by a variety of scrap tire markets including tire derived fuel, civil engineering

[00:01:08]

and ground rubber applications, and other smaller markets. These markets vary across the U.S. There are many successes in scrap tire management by both states and tribes. However, while scrap tire stockpile abatement has progressed significantly over time, there are still stockpiles, and tires are still landfilled or monofilled. In some parts of the Western U.S. and in rural areas, geographic and population factors have impacted management and the reuse and recycling of tires

[00:01:38]

in states and in Indian country. Distance between population centers, large land availability, low tipping fees, changing markets, local supply sufficiency, and limited resources challenge the ability to and increase costs to transport tires to potential markets for reuse and recycling. Today you will be learning about how to address the challenges of recycling scrap tires in rural areas. You will also hear about collaborative efforts that are promoting and advancing the recovery

[00:02:08]

and beneficial use of scrap tires, and addressing issues of concern with their management. We hope this information will be useful for your own scrap tire management programs and activities. Before I introduce today's speakers, I'd like to provide a special thanks to



Dusti Johnson of the Montana Department of Environmental Quality for her contributions to development of this webinar. I would now like to turn the line over to Tommie Jean Valmassy from Tetra Tech to go over the call logistics.

TOMMIE JEAN VALMASSY

Thanks Kendra. Good morning everyone.

[00:02:38]

Thank you so much for being here. I just want to go over a few logistics related to the webinar. We're very happy to have you here today. Your lines are muted, but we do encourage you to participate and the best way to do that is to use the question box. We have three separate presentations done by four presenters. After each presentation, we've set aside some time for question and answer. So you can type in your questions at any time and then we'll be reading those aloud on the line. If we can't get to your question

[80:80:00]

today, we will try to follow up with an email within the weeks after the webinar. I'm sending you a note now where you can download a copy of the presentations today. You can do that now to follow along or you can do that afterwards just if you would like to have them for reference. So all the presentations are posted so that you can refer to them. There is a "raise your hand" feature on this webinar. However, those are really difficult for us to respond to. So the best thing to do whether your question is about the content or you're having

[00:03:38]

technical issues, just go ahead and type a question into the question box. I also want to let you know that we really appreciate feedback on these events. So after the event a little tray is going to pop up for you. There are only five or six questions. If you could take a moment right then to answer the survey questions, we would really appreciate that. So, again, if you have any other questions or issues please go ahead and type those into the box. Your lines are muted and the slides are moved for you today. There could be

[00:04:08]

as much as a 7 to 10 second delay when the slide is moved and when you see it just depending on your web connection. So just keep in mind a slight delay is normal. All right, thanks very much and I'll hand it back over to Kendra to introduce our speakers.

KENDRA MORRISON

Thanks, Tommie Jean. Today, we have four great speakers lined up. The first speaker is Michael Blumenthal. Michael will provide



information about the challenges of recycling tires in rural areas and some possible solutions to those challenges. He will also tell you a little bit about his organization and its role in assisting the nation with market

[00:04:38]

development. Mark Schuknecht and Elizabeth Hoover will talk about EPA's National Tire Workgroup activities. And our final speaker, George Faison, will talk specifically about EPA's efforts to identify non-hazardous secondary materials that are solid waste for the purposes of establishing new standards for Sections 112 and 129 of the Clean Air Act in an upcoming rulemaking. After each speaker, we'll pause and answer some questions. We will also have a little time at the end of the session for your questions. So thanks for participating and we'll go ahead

[00:05:08]

and get started. Our first speaker, Michael Blumenthal, was appointed Executive Director of the Rubber Manufacturers Association, Scrap Tire Management Council in October 1990. In 2007, Michael was promoted to Vice President of the Rubber Manufacturers Association. Michael has led the tire manufacturers' efforts to expand the viable markets for scrap tires. These efforts include researching and writing market studies, compendiums on air emission issues. ASTM Standards for

[00:05:38]

ground rubber, engineering guidelines for civil engineering applications and standard guidelines for tire-derived fuel. Michael also led the effort that revised National Fire Protection Agency guidelines for outdoor storage of scrap tires. Michael has authored over 75 articles and peer-reviewed papers and is widely quoted in the tire and recycling industry publications. Michael has also served on seven state scrap tire advisory committees. Before joining the Council Michael was employed by

[80:06:08]

Malcolm Pirnie, Incorporated where he worked on several scrap tire projects. Michael began his work with scrap tires when he was employed by Oxford Energy where he worked on the project management for two dedicated scrap tire-to-energy facilities. Michael earned a Master of Business Administration from the City University of New York, a Master of Science from Michigan State, and his Bachelor of Science from Purdue. Thank you and welcome, Michael.

MICHAEL BLUMENTHAL

Thank you. I appreciate all of that. Good morning everybody.

[00:06:38]

We'll get started. The topic is management of tires in the rural



area. Next slide. And, basically a little bit about the Rubber Manufacturers Association. As you heard, we began our activities focused on scrap tires in 1990 and began as the Scrap Tire Management Council. The Council and the RMA have pretty much always been the same entity. We are sponsored by all eight of the

[00:07:08]

tire manufacturers. We work with non-governmental organizations, general public, all government agencies and the marketplace to help accomplish the goals of finding markets for tires as well as the abatement of all the tires that are out there. The next slide that you'll see is the logos from our eight members. They have been supporters of our activities from day one. Getting

[00:07:38]

right into the issue of tires in the rural area, which is slide four, the things you have to look at when you're dealing with tires in the rural sector is as mentioned typically it is a relatively small-scale population density in those areas. There are long distances between these population centers, and quite often

[80:80:00]

the schedule at which these tires are picked up is less than you would find in the urban areas just because there aren't that many tires picked up. Because of the lack of the numbered tires out there, there probably is not sufficient market capacity for more than one viable tire collector and tire processor. And often we find

[00:08:38]

that there are insufficient numbers for what we consider largescale markets. Typically, we would suggest that you need one and a half million tires a year to really start to enjoy the economy at the scale for tire efficiencies. Quite often, that is difficult to obtain in these rural areas. And the haulers and processors have to compete against lots of open space where people can dump. And it's cheap,

[00:09:08]

it's easy. There are some economic incentives to do so. Unfortunately, we have seen a fair amount of that, and because of the size of the space and the population that's out there, often there is a fairly limited ability to enforce the regulations. What we also find on the next slide is that in the rural sectors often times the tires from the urban sectors are

[00:09:38]

stockpiled out there. Once again, because there is ample space it's a lot less expensive to do so. And we have found that the majority of the large piles of tires have been in the rural sector. Even on the East Coast, you found places off the beaten track out in the woods certainly in the western part of the country there's lots of open space and land is relatively inexpensive.



[00:10:08]

So this is where we find them, and we also found that because they're out there it's a fairly significant problem with mosquito infestation. As a matter of fact, this has caused a number of states back in the late '80s to create their scrap tire legislation because of the human health problems that were associated with mosquito infestation. And

[00:10:38]

in the worst cases, we find that if and when there is a fire in one of these large piles, the resources in the rural sector are not adequate to fight these fires. We saw this in a number of different cases where you have volunteer fire departments, small budgets and there is a real lack of the sophisticated equipment needed to fight one of these tire fires. We saw it certainly in the rural sectors in California where

[00:11:08]

it took them a couple of weeks to bring this specialized equipment in. We also find that in the next slide that in the rural sector because you don't have specialists working on the scrap tire issue, a lot of entrepreneurs go out there. You know, we call them dreamers and schemers. It's perhaps a little unfair but it tends to fit the bill and they will come out to the rural sector.

[00:11:38]

They will approach a county with what they call a win-win situation. They promise jobs, and tax revenues. They ask for an industrial development bond and either donational land or tax relief. And they claim that they can bring in jobs and they bring in revenue, and they want to make that area the center of bringing in all of these tires often saying that they can solve their

[00:12:08]

problems. We have found that often times this is highly questionable technology. They claim there's a major scrap tire crisis when in reality our markets are better than all but one. And they often show reams of revenue projections, which to me is a clear sign that the company doesn't know what they're doing. Next page. Often times they come up with a lot of these technologies.

[00:12:38]

We see that the pyrolitic technology is a very common one out there turning garbage into oil, and helping more Americans in taking garbage and making goals out of it. We find that a good number of tire processors out there are trying to bail tires. They say we can use every tire in a five-state region. We can use 110 million tires, but all we need is...and they give them this wish list. When you hear or see

[00:13:08]



anything like that 99 times out of a hundred or a 100 times out of a hundred it is a one-way ticket to a future event in a scrap tire pile. Unfortunate, but we have certainly seen it. Next slide. As I mentioned, these areas are often targeted due to a lack of knowledge about the realities in this, in the scrap tire industry. The county recycling coordinator is not well versed in these topics,

[00:13:38]

and it's perceived to be easier to exert political pressure on the mayors, on the county executives, on the board, what have you, because there is a greater need for outside income, and they're willing to make tradeoffs. Now, that may not be true but that is the perception. What we have seen in cases like this when companies do get the permission to start bringing tires in is that they actually start to create

[00:14:08]

new piles, and then when the project does not work out, they tend to walk away and the county is left basically holding the bag. We've seen this time in and time out, and it's not limited to just counties. States have gotten involved with this, Indian reservations have gotten involved with this, and it is an ongoing issue. And even today, we still hear stories about it. Some of the

[00:14:38]

possible ways to deal with these issues ... Next slide. Most of these rural areas' landfills are the central collection point for just about all discards. Tires often find themselves at the landfill because that's the place to take the tires to. There are a number of different uses for the tires at the landfills. You can bring in a machine

[00:15:08]

and shred the tires there on site. There are five different ways to use tires in landfill applications. I'm not referring to actually putting the tires into the landfill as a discard, but using the tire shred in the building of the landfill. And we do have a course where we can train landfill operators on this, and one of the offers that I will make at the end is that we are happy to help

[00:15:38]

you on this. It can save money. It can save resources and if there isn't enough capacity out there, as a last resort you can always shred as landfill. We do suggest to process the tires because as most of you are aware the hollow shape of a tire will trap landfill gas and over time will float to the surface of a landfill, which is not what you really want. In the next slide you'll see that the impact of landfilling tires, there really is no

[00:16:08]

environmental issue with the landfilling of tires. So we have least cost disposal options. It gets rid of the problem. I'd rather see tires



processed and put in the landfills than in piles because in piles, you do get mosquitoes, and on occasion, you get fires. So it's the lesser of all the evils. On the negative side there is no market that can compete with landfilling the tires because it's the least costly disposal option, and it will disallow the development of any markets

[00:16:38]

in that region, and it's a decision, you have to look at carefully. Some of the other possible market solutions. Develop local collection capacity in the Department of Public Works. And they need to be picked up and dropped off some place. There needs to be a critical number of tires for any kind of efficient tire processing. But tires can be used in road construction, in

[00:17:08]

unpaved roads they work well as an under base, frost protection, side slope stabilizers and all kinds of fill material. The next slide on the Civil Engineering Applications. Tire bales are fairly common out there. They began in the mid 1980s. It is used in the Southwest. Our statement on tire bailing is not recycling. It is neither good nor bad. It's a form of

[00:17:38]

tire processing. It really comes down to what you're going to do with those tires bales. And we've seen that they have been used in several good applications. But all of those have a P.E. stamp on it. We also suggest on the next slide that the counties, the regions, the towns start to buy recycled, but the mulch, buy the playground cover used tire shred that is in septic field medium, are very viable markets out there. We also

[00:18:08]

suggest doing a regional project where you do tend to gain the economy of scale. On the next slide if you're finding that tire dumping is a problem in your area, we do suggest that you alert your law enforcement officials. And contact the state agencies. Think about having amnesty days. They do tend to get rid of a good number of tires and solve a lot of problems. Use local tires for local projects and publicize these projects.

[00:18:38]

It will get people to participate and, of course, talk to the retailers because they do have the ability to control who picks those tires up, and that's part of the equation. The next slide. One of the things that I was asked to talk about were agricultural, mining and off road tires. Actually, I found that there are three states that do regulate them. North Carolina also regulates them. They are large. They are difficult to

[00:19:08]

process. They don't fit into the standard tire equipment. You do



need a hydraulic sheer to snip the tires into smaller pieces. Some of these tires have more steel than the truck tires. Mining tires are supposed to be, or I should say not disposed on public lands. Next slide. If it is possible store them,

[00:19:38]

it's possible to use tires in some form of civil engineering applications as tire-derived aggregate. There is something called a tub grinder. It's a piece of equipment. It will make very rough shreds. A lot of exposed steel but it will reduce the size of these tires. It may be one of the only effective systems out there to size reduce them. Mining tires are often used for livestock feeders or wind breaks. It's a very common

[00:20:08]

use for them. So as they recap, piles and dumping of tires are not generally from the local sources because of the lack of numbers. Dumping can be a local problem if there is no enforcement and if there are no other disposal options out there. The types of solutions that you get depend upon the system of disposal and the resources available. There is no one

[00:20:38]

answer. The next slide. I would suggest thinking about and allowing the storage and use of tires at landfills. I think that's a very viable market. Think about smaller scale projects. Think about regional projects. Consider on regional projects some sort of cooperative agreement where you can use a mobile machine. Talk to the Department of Public works about the end uses. Educate the public about

[00:21:08]

the dangers of dumping tires. There are a number of resources out there certainly the State regulatory agencies. Our organization, the RMA, is very happy to work with states or counties or regions on developing a game plan as well as on these educational workshops. EPA Region 5 has a booklet out there on anti-dumping. You have the EPA Resource Conservation Challenge, which you will hear about later, and the Small Business Administration

[00:21:38]

can help to get loans for the equipment that you would use in some of these projects. Next slide. As we mentioned, we have on our website information on all the state tire programs, descriptions of markets, leachate data, information on preventing the fires, and on the safety of using rubber in playgrounds. As I mentioned, we have a series of workshops to use the tires

[00:22:08]

in landfill construction, road construction, fuel, any of these applications. We're happy to work with the states or with the



region and if anybody is interested in doing this, please let me know. The last slide has my contact information, and I would be happy to work with any or all of you on this. And the other interesting thing I want to point out is that up in Canada

[00:22:38]

a number of the Region 8 states do border Canadian provinces, they have taken a very aggressive approach to off-road tires and mining tires. If there is an interest in working on this topic, I can certainly talk to my Canadian counterparts. I believe there would be a lot of interest in these cross border workshops. So I would like to put that on the table. I apologize for running through this quickly, but I'm

[00:23:08]

trying to keep the schedule on time. So if you do have any questions or want any more information, you have my email. I would be very happy to supply whatever information that you are asking for. And with that, I think you very much for your attention, and for your participation. Good day.

TOMMIE JEAN VALMASSY

Thanks Michael. Well, we did have a few questions come in. So the RMA website you're talking about that's what is on the screen right now, the scraptire.org?

MICHAEL BLUMENTHAL

Yes, it's either that or it's R-M-A dot O-R-G

[00:23:38]

and then on the orange bar you'll see it will say scrap tires. You tap on that and it will take you right to our home page for all the information we have on scrap tires.

TOMMIE JEAN VALMASSY

Okay, great. So a couple more questions. Someone was saying that they thought tires floating up from a landfill were a myth and they thought they just needed to be cut in order to conserve usable space in the landfill. Can you address that?

[00:24:08]

Are there any studies about tires floating to the top?

MICHAEL BLUMENTHAL

Oh, I used to work at landfills and it is not a myth. Tires will definitely float through all the garbage and they'll even break through a Bentonite clay cap. I've seen it. I've seen it around the country. The reason that you want to cut the tire is two fold. One, to keep it from, to keep the gas from being trapped inside the hollow and causing it to float. And obviously the second one is



[00:24:38]

for conservation of air space. Tires will not decompose inside that landfill so they will not give back any of the landfill space. So you would want to rough shred those tires to take out all the air space so you can get more into that landfill.

TOMMIE JEAN VALMASSY

Okay. Another question. What is the RMA doing in the area of extended producer responsibility or product stewardship?

[00:25:08]

MICHAEL BLUMENTHAL

Right. There are a number of different ways to define EPR, Extended Producer Responsibility. Here in the U.S. we take a shared responsibility approach, and basically that means anybody and everybody who has any contact with that tire has some responsibility along the line. Certainly, the tire manufacturers have their fair share of responsibility and through

[00:25:38]

the RMA and preceding that to the Scrap Tire Management Council, we have been providing timely information on the markets, on technology, answering questions and providing the technical workshops. And we will continue to do that. We are working with the states, with the industry. If anybody has any questions, we hopefully have the information they are looking for. In this particular case, we would want to work with EPA Region 8 and with the state

[00:26:08]

on developing these markets. And, I would encourage you to think about having us come out there, have me come out there, and sit down and devise the game plan on how to set up these markets.

TOMMIE JEAN VALMASSY

Okay, great. A couple more questions before we move onto our next presenters. A couple people mentioned that border communities often have to deal with a used tire market or just different issues with tire

[00:26:38]

piles. And is there any work going on with Mexico right now as far as these tires?

MICHAEL BLUMENTHAL

Oh, the U.S./Mexico border. There is something called the Border 2012. It's a cooperative arrangement between U.S. EPA and the Mexican version of the EPA. RMA is one of the working partners there. We are working with the Mexican government on trying to find markets for the scrap tires there.



[00:27:08]

But as far as exporting tires from the U.S. into Mexico, that's a much bigger issue. Because of NAFTA, there is no restriction on shipping used tires across the border. There is a restriction on shipping waste tires or scrap tires across the border, but because they're sending used tires across the border, the shelf life of those things is

[00:27:38]

somewhere between five days and six months. So they are accumulating a greater number of scrap tires right along the border area. But that is a discussion for a different venue. I'm not trying to avoid it. I'm trying to say that it's a very large discussion. I'm happy to talk to anybody about it at any time, but there is a lot of complicating factors that go along with that one.

TOMMIE JEAN VALMASSY

Okay, well before we move on, just one clarifying question,

[00:28:08]

and we talked about some different resources and training courses. In general, are those resources available to tribes?

MICHAEL BLUMENTHAL

Yes. I mean, there is no expense for this. We do it at our own expense. Tribes, states, counties, regions if they're interested in developing markets or add different types of applications of management schemes,

[00:28:38]

let me know and I'll be happy to work with anybody on this.

TOMMIE JEAN VALMASSY

Okay, great. Thanks so much. If you still have more questions for Michael, go ahead and type those in and we'll make sure he gets those. But we're going to move onto our next presenter.

MICHAEL BLUMENTHAL

I do have one question for you. For me to mute my line, it's what, star six?

TOMMIE JEAN VALMASSY

Star, six.

MICHAEL BLUMENTHAL

Very good, thank you.

KENDRA MORRISON

Okay, thank you, Michael for the valuable information



[00:29:08]

and also specifically the invitation to work with Region 8 based on market development. I'll go ahead and introduce our next speaker. He's Mark R. Schuknecht. Mark has worked for the Environmental Protection Agency for over 20 years within the Office of Solid Waste, which has recently become the Office of Resource Conservation and Recovery. Mark now works for the Resource Conservation and Sustainability Division, Industrial Materials Reuse Branch where he is the coordinator of the EPA Resource Conservation

[00:29:38]

Challenge Scrap Tire Workgroup. Mark is a registered and certified geologist with about 35 years experience in environmental geology, hydrogeology, and mining geology. He has written and published several professional papers now on the Internet. Mark graduated from the University of California State at Hayward in 1976 with a Bachelor of Sciences and Earth Sciences Physical Geology major. Thank you, Mark.

[80:30:08]

Mark, are you still on the line with us? Mark and Elizabeth you might be muted. Are you there?

[00:30:38]

TOMMIE JEAN VALMASSY

Hi Mark and Elizabeth. Unfortunately, we cannot hear you right now. So you can press star 6.

ELIZABETH HOOVER

I'm on the line.

TOMMIE JEAN VALMASSY

Okay. Let's see if Mark can be heard in a second here. If not, Elizabeth do you have a certain slide number and maybe we can jump to part of yours if you would like

[00:31:08]

or our other option is we can move onto George and come back to you guys, too. Sorry for the delay, folks. Kendra, should we just move onto George and come back to Mark and Elizabeth?

KENDRA MORRISON

Yes, we can do that. George, are you on the line?

GEORGE FAISON

Yeah, can you hear me okay?

KENDRA MORRISON

Yeah, I hear you great.



GEORGE FAISON

Great.

[00:31:38]

KENDRA MORRISON

I'll go ahead and present your bio to introduce you since you are available. George Faison is a Senior Environmental Protection Specialist with EPA's Office of Resource Conservation and Recovery in Washington D.C. In that position, he leads initiatives related to innovations and RCRA permitting, as well as coordinating programs for implementation of RCRA financial assurance and RCRA air programs. Currently, he is team leader for development of the rulemaking on Identification of Non-Hazardous Secondary Materials

[00:32:08]

that are Solid Wastes. George has over 25 years experience in implementation of RCRA and other environmental programs in both the government and private sectors. Prior to joining EPA, he directed regulatory compliance programs for Foster Wheeler Environmental, directed large complex CERCLA and RCRA remediation projects as a consultant to the Department of Defense, and developed innovative policies relating to management of mixed wastes as a consultant to the Department of Energy. George holds

[00:32:38]

a B.A. Degree from Guilford College, and a Masters in Public Administration and Environmental Policy from the American University in Washington, D.C. Thanks, George.

GEORGE FAISON

Great. Thank you very much. Can everybody see my slides?

TOMMIE JEAN VALMASSY

No, we don't see them yet.

GEORGE FAISON

Oh, really. Let's see. It's showing on line.

TOMMIE JEAN VALMASSY

Did you get the "see my application"

[00:33:08]

or screen?

GEORGE FAISON

Yeah.



TOMMIE JEAN VALMASSY

There we go.

GEORGE FAISON

Okay, it's up.

TOMMIE JEAN VALMASSY

Yes, it's up.

GEORGE FAISON

Great. Okay, great. Again, thank you. We're developing a proposed rule to identify which non-hazardous secondary materials are solid wastes when burned as fuel. I'm sorry this

[00:33:38]

is not forwarding either. Sorry about that. There we go. Sorry. Everybody have the slide?

TOMMIE JEAN VALMASSY

Yeah, we see the next one.

GEORGE FAISON

Great. I want to give you a little background of the rule. Talk about the Advanced Notice of Proposed Rulemaking

[00:34:08]

that came out in January especially as it relates to the scrap tires, and a little bit on where we go from here. In the rule used tires is one of the many secondary materials that we're assessing. Some of the other materials include used oil, biomass and coal refuse. The units to burn these secondary materials as fuels include industrial, commercial and institutional boilers and process heaters, cement kilns and power plants. We estimate there's about

[00:34:38]

196,000 units of these across the country. Now, most of these, like thousands are called the smaller area sources as opposed to the larger or major sources. We've got a lot of interest in these rules from the public and regulating community. It's a big deal because the differences in the Clean Air Act standards that we applied to the combustion of these secondary materials. Specifically, materials that are determined

[00:35:08]

to be a solid waste, and burn in the combustion units must be subject to Clean Air Act 129 Requirements. Materials that are not solid waste may be subject to Clean Air Act 112 Requirements. Those statutes specifically state in Section 129 that the solid waste definition is determined by the Administrator according to



RCRA. That's kind of why our office is doing it as opposed to the Air office. Clean Air Act 129 was added to the Clean Air Act

[00:35:38]

in the 1990 Amendments specifically to address solid waste incinerators. It's thought to be more stringent than Clean Air Act 112. Section 129 requires emission limitations for nine (9) non-specific pollutants including cadmium, carbon monoxide, dioxins/furans, hydrogen chloride, lead, mercury, NOX, SO2, particulates and opacity. RCRA also has explicit requirements for operator training, monitoring, preconstruction site assessments, and emission test requirements

[00:36:08]

that are thought they are thought to be more costly and not required under 112. It's also really important to note that 129 applies to all sources irrespective of whether they are major area sources. Whereas Clean Act Air 112 has discretion whether to regulate the smaller area sources. In addition to the kind of potential differences in standards, there is also kind of a real perception issue. We understand for facilities there is kind of a stigma

[00:36:38]

attached to burning solid waste that they don't want to be seen as it being a solid waste incinerator. So we found the perception is almost as important as the limits. Now, all this is stemming from a June 2007 DC Court of Appeals decision that vacated and remanded two Clean Air Act Rules, and those were the Commercial and Industrial Solid Waste Incineration Definitions Rule, what we call the CISWI Rule and the Boiler MACT Rule. Now, originally under CISWI and the Boiler MACT

[00:37:08]

Rules combustion units that burned solid waste for energy recovery were covered by applicable Clean Air Act 112 MACT standards as opposed to 129. The court came back and said, no EPA you've really got it wrong. The EPA erred on CISWI definitions rule by excluding units that combust solid waste for the purpose of energy recovery in the definition of solid waste incineration unit. The court pointed out that the Clean Air Act Statute unambiguously requires any unit that combusts

[00:37:38]

any solid waste to be regulated under 129. As a result of this court decision our office has determined through this upcoming rulemaking which non-hazardous secondary materials are or are not solid waste when used as fuels. As kind of a first step in making this determination we issued an Advance Notice of Proposed Rulemaking. It was published January 2nd of '09. That was out in the assessment.



[00:38:08]

The first thing the ANPRM did was to identify two key factors in determining the secondary materials of solid waste when used as fuels in combustion units. First, whether these materials have been discarded. Second, if they had been discarded, whether the materials had been processed to produce a legitimate fuel product. As I said, one of the key terms here is legitimate fuels. Under the ANPRM as criteria for legitimacy we kind of took

[00:38:38]

the criteria that we also used under the Subtitle C definition of solid waste rule, which you may be familiar with. The purpose of the legitimacy criteria is to avoid situations with facilities actually burning for disposal and not for energy recovery. To be legitimate, non-hazardous secondary materials must be handled as a valuable commodity of meaningful heating value, and can't contain contaminants that are significantly higher in concentration than traditional fuels.

[00:39:08]

The ANPRM next outlined categories of materials we currently do not consider to be solid waste when burned as fuels in combustion units. So they would not be subject to the 129 standards. Some of those are or the first one is traditional fuels, all fossil fuels, coal, oil, natural gas and what we call cellulosic biomass, which is wood and other materials. The second category is secondary materials used as legitimate fuels

[00:39:38]

and have not been previously discarded. An example of this, and again this is some of the ANPRM approach. It includes scrap tires that are managed pursuant to state tire collection programs. Now, the last category under the ANPRM that would not be solid waste is secondary materials that have been discarded but then processed into legitimate fuels. An example here, of course, would be scrap tires, which are discarded but then later processed into TDF chips.

[00:40:08]

Again, according to ANPRM the category that would be a solid waste are discarded tires from waste tire piles that are fed whole not chipped to combustion units such as cement kilns. And according to ANPRM, it's the solid waste that burn as energy recovery because they really haven't been processed into a fuel product. So again on this approach, and again this is the approach of the ANPRM, that scrap tires could be a solid waste from that depending on how it's handled.

[00:40:38]

Needless to say, we received a lot of comments. It's a bunch of comments from the states, of course, and administrative. RMA



was nice enough to comment. From the states several states commented that we need to be concerned with the management and materials prior to arriving at the combustion site. They felt that a designation at the federal level as to whether these materials are or are not solid waste could impact their ability to manage these materials pursuant to their solid waste management authority.

[00:41:08]

Something I would like emphasize, too, that's important to promote beneficial uses of secondary materials and the regulation of certain materials especially used tires under Clean Air Act 129 could have negative environmental impacts. I would like to just explain that they manage these materials such as tires as solid waste but exempt them from being waste via beneficial use determinations after arrival at the combustion facility. As I said, we had comments from a number of different

[00:41:38]

commenters and one commenter representing 100 environmental groups stated the approach in the ANPRM really wasn't consistent with RCRA and Clean Air Act requirements because it allowed combustion for energy recovery under 112 instead of 129. So based all the comments we gathered and other sources,

[00:42:08]

we have a couple of main issues that we're going to address in the rule. First of all, it's the impact that the rule will have on the State's ability to implement their own solid waste management programs. They said some states want to manage materials prior to arriving at the combustion site. Another issue that we're going to be considering in the proposal is whether materials that have been discarded can be adequately processed to convert the material into a non-waste product. Again, one of the most important

[00:42:38]

aspects of the upcoming rule is going to be this definition of processing, and how much and how is processing described. So that's going to be a really key component. Another issue we're going to consider is whether the rule could preferentially promote combustion of secondary materials over traditional recycling activities. As you know, EPA really promotes a waste management hierarchy starting off with waste reduction and recycling and

[00:43:08]

burning for energy recovery and landfill at the bottom but we don't know for sure that our rule doesn't impact activities that are higher in the hierarchy. And finally, another issue is whether the rule will impact communities with environmental justice concerns. This is a major concern of environmental justice, a major initiative of our



administrator and we want to develop the analyses to ensure that communities with environmental justice concerns aren't inadequately

[00:43:38]

impacted. So in conclusion this is sort of uncharted territory for us since previously solid waste determinations have really been at the state levels. Most of the federal programs are almost all totally implemented by the states. I want to emphasize though that the solid waste definition for the purpose

[00:44:08]

of application of Clean Air Act 112 and 129, only this definition should not impact or affect any other types of management activities for the materials such as landfilling and composting. So now, we're currently assessing our options for the proposal based on the comments received and we're on schedule to get the proposal signed by April 15th of this year. The other two Clean Air Act rules that I mention the Boiler MACT and the CISWI rules are being re-proposed to establish standards under

[00:44:38]

112 and 129. They are on a court ordered schedule of April 15th. And since we're an integral part of those rules, we are effectively on a court ordered schedule as well. So I appreciate the feedback we've gotten so far and I hope they will closely monitor and assess the rule when it comes out in April. And this is their website here if you want additional information. Particularly they have a lot of raw material characterization papers that go in depth on how we can look at the material.

[00:45:08]

So that's it. Thank you very much.

TOMMIE JEAN VALMASSY

All right, thanks very much George and if you have more questions for George, you can go ahead and type those in. So just a couple things here. So are there still opportunities for people to comment and provide input or has that time period passed?

GEORGE FAISON

For the ANPRM that has passed. But as I said, the proposed rule will be issued on, or it will be signed

[00:45:38]

on April 15th, and it should be issued, published several days after that. So as soon as that comes out, then the opportunity for comment will begin again. We're also on schedule for issue of the final rule by mid-December. So the time frame for getting the proposal out is really short.



MARK SCHUKNECHT

Hello.

GEORGE FAISON

Yes?

TOMMIE JEAN VALMASSY

We hear you. Sorry, we still have George Faison with his presentation. Sorry, George, go ahead.

GEORGE FAISON

As I said, we are expecting

[00:46:08]

to have a 45-day comment period.

TOMMIE JEAN VALMASSY

I'm sorry. A 45-day comment period when the proposed rule comes out in April?

GEORGE FAISON

Right.

TOMMIE JEAN VALMASSY

Okay, and to keep on track about the best thing to do is just go to the website that you have posted there?

GEORGE FAISON

Yeah. It's reg.gov. It's all of the docket materials. The website should tell us when it would actually be signed and published.

TOMMIE JEAN VALMASSY

Okay, and one person wanted to know can you

[00:46:38]

spell out what the acronym CISWI stands for?

GEORGE FAISON

It's Commercial and Industrial Solid Wastes ... Let's see. I forget, too, sometimes. Commercial Industrial Solid Waste Incineration.

TOMMIE JEAN VALMASSY

Okay. Great. All right, well thank you so much for that. If you still have more questions for George you can go ahead and type those in and thanks for your patience while we kind of juggled around the

[00:47:08]

presentations. Now we're going to go back to Mark Schuknecht.



Mark, give me a moment and I'll pull up your presentation here.

MARK SCHUKNECHT

Okay, you can hear me this time, right?

TOMMIE JEAN VALMASSY

Yes.

MARK SCHUKNECHT

Good.

TOMMIE JEAN VALMASSY

Sorry for the trouble.

MARK SCHUKNECHT

Good morning everyone. Thank you for that introduction. We had some technical problems. Our lines were muted and we couldn't un-mute them and then the computer crashed. So we started all over again.

[00:47:38]

All right. I'm going to be presenting an introduction to the Resource Conservation Challenge better known as the RCC Scrap Tire Workgroup. I'll be going through these slides rather quickly, but at the end you can print out a copy for your records, and I suggest you do it because there's a lot of good contact information and because you've got telephone numbers and the group members and so forth. Next slide, please.

[00:48:08]

The three RCC goals are to first prevent pollution, promote reuse and recycling. Secondly, to reduce priority and toxic chemicals. And lastly, to

[00:48:38]

conserve energy and materials. The Scrap Tire Workgroup began in 2003 as part of one of the four RCC pillars. The Workgroup consists of a collaboration of about 85 members made up from the federal, state, industry and academic sectors. The Workgroup works primarily

[00:49:08]

via conference calls and emails and we have an annual meeting. Next slide, please. Reuse markets and data. The figure on the left is a bar graph showing a decrease in the total number of scrap tire piles and inversely an increase in the beneficial

[00:49:38]

reuse of tires between 1990 and 2007. On the right figure we show the reuse markets for scrap tires, 55% of all the scrap tires are being used as tire-derived fuel. 12% are being used in ground



rubber. So we have 16% and

[00:50:08]

12% are being used in civil engineering with a remaining 5% that is being comprised of others, which are exports, agriculture and things of that sort. And then lastly the remaining 12.5% is being landfilled as opposed to 100% of it being landfilled in 1990. Next slide, please. Major accomplishments of

[00:50:38]

the Scrap Tire Workgroup are to divert 85% of the newly generated tires to beneficial use by 2008. When describing this, I need to tell you that there are two sources for scrap tires. One is the newly generated scrap tire, that's the scrap tire that comes off of your tires each year as it hits the markets. So there is this new entry of scrap tires

[00:51:08]

into the market. And then there's the existing tire piles. So our first goal is to address the newly generated tires by diverting 85% to beneficial reuses by 2008 and we did that. And our second goal was to mediate 55% of the remaining tire piles by 2008 and we also reached that goal. I think these are really great accomplishments for our group.

[00:51:38]

Below I have some examples of some of that remediation in two different sites in before, during and after photographs to help illustrate those points. Next slide, please. The Scrap Tire Workgroup consists of five committees. The five committees are the Goals Committee, Civil Engineering Committee, Ground Rubber Committee,

[00:52:08]

Rubberized Asphalt Committee, and lastly the Tire Derived Fuel Committee. We will discuss separately each of these five committees next. At this point I would like to introduce the chair of the Scrap Tire Workgroup, Elizabeth Hoover, who is going to present the next three sections. Elizabeth.

ELIZABETH HOOVER

Thank you, Mark. Good morning,

[00:52:38]

everyone. The first presentation will be ... The first presentation dealing with the Workgroup will be for the Goals Committee. The purpose of the Goals Committee is to develop and coordinate a mission or plan of action for the Workgroup. Next slide, please. The Goals Committee currently has twelve members including myself. And, on this slide you see the names of all the Goals Committee members.

[00:53:08]



Next slide, please. The Workgroup has two traditional numerical goals and the first traditional numerical goal is to increase by 5% the scrap tires diverted to beneficial uses by 2012 using the year 2009 data as a benchmark. Next slide, please. The second

[00:53:38]

goal is to reduce tire piles 65% by the year 2012 using 2003 data as the benchmark. Next slide, please The Workgroup has a number of market support goals and the market support goals are strive to support all market sectors and sub sectors; post information on pertinent

[00:54:08]

websites and develop fact sheets; foster higher uses by discouraging tire monofilling, landfilling and land reclamation; encourage careful review of proposed technologies with a history of unsuccessful operations; seek to identify champions and encourage participation of all states on the Workgroup; encourage use of ASTM Standards for tire rubber applications and

[00:54:38]

use average tire weight in place of passenger tire equivalent, or PTE, for measurement of tire generation and market data. Next slide please. If you would like to contact me regarding any of the additional information on the Goals Committee, this slide contains my contact information. I would be pleased to provide you any information I can.

[00:55:08]

Next slide, please. The next presentation is on the Civil Engineering Committee. The Civil Engineering Committee is chaired by Todd Marvel of the Illinois EPA. Next slide. The Civil Engineering Committee is composed of 13 members who includes the Chairman and this slide will show you

[00:55:38]

all of the Committee members. Next slide, please. Beneficial use of tire shreds in civil engineering applications is defined as the use of scrap tires usually shreds in lieu of conventional construction materials. Tire shreds are used as a substitute for gravel, sand and lightweight fill materials.

[00:56:08]

Today, shreds used in this manner are referred to as tire-derived aggregate or TDA. Next slide, please. Why use tire shreds? Tire shreds have properties that civil engineers need. They are lightweight having only a third of the weight of soil. They have good thermal insulation, which is eight times better than that of soil.

[00:56:38]

Good drainage, ten times better than that of soil. And they are compressible. Use of tire shreds in civil engineering applications



was first used in road construction. Construction guidelines were developed in 1996, and ASTM Standards were developed in 1997. Next slide, please. Why use tire shreds?

[00:57:08]

They're light weight and low earth pressure are very beneficial where there is poor soil structure such as in weak foundation soils. They increase slope stability, reduce settlement, and provide landslide stabilization. Tire shreds can improve engineering performance, and they're often the least cost alternative. Next slide.

[00:57:38]

Tire shreds are also used as drainage materials in landfills, back fill and gas dimming systems, alternative daily cover, liners for certain types of landfills, and as landfill cap closure material. Next slide. Tire shreds are used in lightweight fill for highway embankments, retaining wall backfills,

[00:58:08]

as septic fill drainage medium, vibration attenuation for rail lines, and perhaps in the future, we'll even see tire shreds being used as earthquake damping. Next slide. Major Civil Engineering Committee accomplishments include a water quality and environment toxicology study that was completed in November of

[00:58:38]

2006, and a Tire-Derived Aggregate Civil Engineering Applications Compendium completed in the summer of 2007. And on this slide you'll see that we provided a link in which you can access a copy of the Tire Derived Aggregate Study. Next slide, please. Major ongoing Committee projects include development of a DVD

[00:59:08]

that illustrates the legitimacy of tire-derived aggregates used in civil engineering applications. This project is in progress, and it's scheduled to be completed in the spring 2010. The DVD will educate stakeholders and encourage civil engineering applications of tire-derived aggregates. The DVD will identify limitations. It will address environmental concerns

[00:59:38]

and will provide resources and data. Projects also include a webbased inventory of information related to TDA use in civil engineering applications, and this project is also scheduled to be completed in the spring of 2010. Next slide. For additional information related to the activities of the Civil Engineering Committee, we're

[01:00:08]

providing on this screen contact information for the Chairman, Todd Marvel. Next slide. The next presentation for the Scrap Tire Workgroup is on the Ground Rubber Committee. The Ground



Rubber Committee is chaired by Jim Gilbert, and Jim is employed by the New York Empire State Development. Next slide.

[01:00:38]

The Ground Rubber Committee is comprised of eleven members including the Chairman, Jim Gilbert. This slide will show you the names of all the Committee members. Next slide. The purpose of the Ground Rubber Committee is to promote the use of ground rubber made from scrap tires. The Committee is focusing on three activities to enhance market growth.

[01:01:08]

Committee activities will educate producers and potential users, identify barriers and solutions, and support activities that would overcome barriers and implement solutions. Next slide. Ground rubber is also known as crumb rubber, and it's defined by ASTM. ASTM, of course, stands for the American Society for Testing and Materials.

[01:01:38]

The various sizes of ground rubber include coarse rubber, ground rubber, and fine grind rubber. Next slide. Regarding ground rubber processing, it takes a lot more effort and machinery and skill to make good quality ground rubber than it does to make TDF or TDA. There are two major processing technologies

[01:02:08]

that are used. The first is ambient grinding and this process occurs when the tires are ground at ambient temperatures to produce a rough irregular surface. And the second method is cryogenic grinding, which is where the rubber is ground or fractured into rubber particles, which have first been frozen with liquid nitrogen

[01:02:38]

before they're ground. This method creates angular and relatively smooth surfaces. Next slide, please. Common ground rubber uses include synthetic or artificial turfs, playgrounds, mulch, molded products, rubberized asphalt, and others such as equestrian usage and cow mattresses. Next slide, please.

[01:03:08]

Synthetic turf is where ground rubber is used as infill between blades of artificial grass in a carpet-like application. Next slide, please. On playgrounds, ground rubber is supplied to a uniform depth to protect children from falls. Three common uses around playground equipment are used.

[01:03:38]

The three common uses are mulch or loose fill, poured-in-place and tiles. Next slide, please. Rubber mulch is used as a longer-lasting alternative to bark and other natural mulches to keep out weeds and/or help retail soil moisture. It is often used around



plants, backyard pools, foundations and other objects.

[01:04:08]

Next slide, please. Plastic virgin rubber, urethane, or other binders are combined with ground rubber to mold parts such as large compression molded objects such as tiles and signpost holders. Inject molding can yield a wider variety of more technical parts such as roof tiles, and ground rubber can be made into sheet

[01:04:38]

goods to make products such as automobile splashguards. Next slide, please. As mentioned earlier, Jim Gilbert is Chairman of the RCC Scrap Tire Workgroup's Ground Rubber Committee. Jim is with the Empire Development in New York, and this slide contains his contact information if you would like to reach him for additional information on the Committee's activities.

[01:05:08]

That concludes my portion of the presentation. Thank you for your time and your attention. At this time, I'll turn the program back over to Mark Schuknecht. Thank you.

MARK SCHUKNEHCT

Thank you, Elizabeth. I'm glad to pick up with the fourth section of this presentation, which is the RCC Rubberized Asphalt Committee. It also has seven members.

[01:05:38]

which are listed below and the Chairman is Serji Amirkhanian. It took me time pronouncing his name. The purpose of the group is to expand the use of scrap tires in the roads. Secondly, to determine and develop ways to educate the public, increase awareness of the benefits of rubberized asphalts, identify solutions for

[01:06:08]

perceived barriers to the use of rubberized asphalt, and lastly, cultivate champions in the private and public sector. Next slide, please. My screen is blank. I'm going to assume that we moved on. The next slide shows the goals and targets of rubberized asphalt. It is measured by the increased amount of crumb rubber

[01:06:38]

used in asphalt by 5%. The success of this goal will be measured by the total use of rubberized asphalt as reported by the RMA surveys. Next slide, please. Project Descriptions. The group will conduct research by using email surveys to identify the states using rubberized

[01:07:08]

asphalt regularly, and to identify any perceived obstacles to the use of rubberized asphalt. It will also locate the decision makers, and to promote rubberized asphalt by the creation of a video



toolbox, which will have videos on each process. Next slide,

[01:07:38]

please. For more information, please contact the Rubberized Asphalt Committee Chairman Sergi Amirkhanian. At Clemson University in South Carolina. The last section that I'm going to present today is the Tire-Derived Fuel Committee. Two examples of the

[01:08:08]

cement kilns are shown below that burns tires. The Chairman is George Gilbert from the Kentucky Department of Environmental Protection. Next slide, please. The Tire Derived Fuel Committee has 13 members. The members are listed below and to the right is an example of a TDF spreading and sorting facility in Littletown,

[01:08:38]

Massachusetts. The purpose of the Committee is to ... Next slide, please. Repeating, the purpose of the Committee is to support the expanded and appropriate use of scrap tires as supplemental energy resources in properly permitted industrial facilities. To the right we're showing an example of a tire derived

[01:09:08]

fuel stockpile. Next slide, please. Disposal of scrap tires in tire piles is not an acceptable management practice because of the risks posed by fires, and because the tire piles can provide habitats for disease vectors such as mosquitoes. One of the worst tire fires is depicted in the photograph to the right. It was at Stanislaus

[01:09:38]

County in California. Next slide, please. In 2007, more than 303 million scrap tires were generated in the U.S. Nearly 107 million of these tires were recycled into new products and 164 million were reused

[01:10:08]

as tire-derived fuel in various industrial facilities. Tire-derived fuel is a major consumer of scrap tires as shown in the pie diagram on the right consuming 53% of the scrap tires. Next slide, please. TDF is one

[01:10:38]

of several viable alternatives to divert newly generated scrap tires from disposal in tire piles, and to reduce existing tire piles. Next slide, please. EPA issued and posted the TDF fact sheet. It could be found at the EPA weblink, which is provided above.

[01:11:08]

The EPA Fact Sheet supports the highest and best practical use of scrap tires in accordance with the waste management hierarchy, which is to reduce, reuse, recycle, waste-to-energy, and disposable at appropriate facilities. Next slide, please. Based on



over 15 years of experience with more than 80 individual facilities, EPA recognizes that the use of tire-derived

[01:11:38]

fuels is a viable alternative to the use of fossil fuels. EPA testing also shows that TDF has a higher BTU value than coal. Next slide, please. The Agency supports the responsible use of tires in Portland cement kilns and other industrial facilities, so long as the candidate facilities: One, have a tire storage

[01:12:08]

and handling plan. Secondly, have secured permits for the applicable state and federal programs. And lastly, are in compliance with all the requirements of those permits. Next slide, please. Accomplishments of the Tire Derived Fuel Committee are listed below. We have compiled data to help prospective

[01:12:38]

users of tire-derived fuels, and we have compiled lists of barriers to tire-derived fuel use by state. For more information on these subjects and any others, please contact the Chairman of the Tire Derived Fuel Committee George Gilbert, who is with the Kentucky Department

[01:13:08]

for Environmental Protection. And this constitutes the end of that section. At this point, I would like to make an open invitation to join the Scrap tire Workgroup. We are always looking for new members. We especially need participants from the Region 8 and in the Midwestern States. The group publishes a bi-annual report on the scrap tire

[01:13:38]

market. The group would appreciate your cooperation in collecting this information for this report. One of the major goals of the group is to share information and foster inter-agency support between the individual states and federal government. We think that this one of the best ways to do that. For further information please contact myself, the Group

[01:14:08]

Coordinator at the EPA Office of Resource Conservation and Recovery or contact the Workgroup Chairman, Elizabeth Hoover. She is Arkansas' Department of Environmental Quality. Her email and phone number are shown here. Also, please note that we included the RCC Scrap Tire Work

[01:14:38]

group website, and I look forward to hearing from all of you in the future. I'll take questions at this time.

TOMMIE JEAN VALMASSY

Great. Well, we did have questions come in. If you have more



questions for any of our presenters, Mark and Elizabeth, or George or Michael, go ahead and type those in. And if we can't get to them, we'll make sure to forward them to the speakers. So, Mark, you had an open invitation to join the Scrap Tire

[01:15:08]

Workgroup and someone asked what about the other committees, too. Do you know how someone can get involved if there was another committee they were interested in?

MARK SCHUKNECHT

Yes, contact myself and I will get your information and put you down as one of the group members. Also we have a Yahoo! website for state and federal people. Again, contact me and

[01:15:38]

I'll get you in contact with that group. To work with any of the committees please contact the committee chairman for each of the groups and talk to them. I'm sure they would be most affable and very happy to have additional help. Even if you're not able to provide help with the group

[01:16:08]

at this time, we still encourage you to become a member just to keep up on what the latest news in scrap tires is. So either way, call us and we'll put you in the group.

TOMMIE JEAN VALMASSY

Great, and I just sent a little link again where you can download all of the presentations that were given today and that has all of the contact information in there. Can tribes also get involved with this Workgroup, and do you know if there is currently any tribal

[01:16:38]

involvement?

MARK SCHUKNECHT

In any trade organization? Did you say treadmill? I'm sorry, I couldn't hear you.

TOMMIE JEAN VALMASSY

I'm sorry, tribe, T-R-I-B-E.

MARK SCHUKNECHT

Oh. Yes, the tribes can get involved and we would like to encourage tribes to. At this point, we don't have any tribal members involved in the Workgroup. We would be more than happy to have them. If they don't have time to be a participating working member, call up and just

[01:17:08]



be a member. As I said before, we would be happy to have you just to keep up on the latest information in what is going on with scrap tires.

TOMMIE JEAN VALMASSY

Okay. So related to tire-derived fuel, can you just explain basically what exactly is it used for? Is it just used to replace coal? Like who uses it?

MARK SCHUKNECHT?

Tire-derived fuels is used by a number of different industries. The cement kiln industry is one,

[01:17:38]

and it's used to reduce the amount of fuels that are burned in the cement kilns. Up to 25% of scrap tires can be burned presently with other fuels in the cement kilns. The paper and pulp industry uses scrap tires as well. There is the electrical generating facilities that also use scrap tires,

[01:18:08]

and I believe that's all. I can't think of any more at this time, but there are several others.

ELIZABETH HOOVER

Boilers.

MARK SCHUKNECHT

Oh, boilers also use scrap tires. Elizabeth, do you want to comment here?

ELIZABETH HOOVER

Yes, the steel industry sometimes uses tires as a charge material in their steel making operation.

TOMMIE JEAN VALMASSY

Okay. Great.

[01:18:38]

Well, Elizabeth, one thing that you mentioned with the use of tire shreds was ... I forget the exact language you used by like equestrian uses and things like that. But someone also questioned ... They've heard that the nylon from tires can get stuck inside their horse's digestive tract and cause deaths because horses particularly are sensitive and have a tendency to chew when not occupied. Do you know anything about that? Can you address that?

[01:19:08]

ELIZABETH HOOVER



I have not heard that.

MARK SCHUKNECHT

I haven't either. The scrap or the rubber produced from scrap tires is crumb rubber, and crumb rubber is normally I believe it's at the 200 mesh. And at the 200 mesh, all the steel and all the nylon has been removed from the product so there isn't any left at that point. I have never heard of this happening.

[01:19:38]

I suspect it possibly could. If they chewed the rubber, they may have digestive problems, but other than that I have no comment.

TOMMIE JEAN VALMASSY

Okay. Can you explain what some of the end uses for a fine ground tire rubber are?

MARK SCHUKNECHT

Elizabeth, do you want to take that?

ELIZABETH HOOVER

Fine ground?

TOMMIE JEAN VALMASSY

Yeah.

ELIZABETH HOOVER

Well, the fine ground would probably be

[01:20:08]

what you would find that would go into rubberized asphalt, and also into some of the products. You know, molded products.

MARK SCHUKNECHT

It's used for tire guards and chalks and it's pressed into automobile parts.

[01:20:38]

It's also used to make sheet goods and flooring materials. So there is quite a wide variety of products that crumb rubber can be used in.

TOMMIE JEAN VALMASSY

Okay, great. And it was also mentioned that that rubber is used at playgrounds. Do you know if there are any health issues with that or have any studies been done about health issues at playgrounds?



MARK SCHUKNECHT

Yes, health issues has been one of the issues that the scrap tire Workgroup and the committee have been working with it.

[01:21:08]

Recently, EPA published a new study on the health hazards of scrap tires in crumb rubber. We found that a small amount of chemicals were given off as air emissions but the levels were so low that they were almost undetectable.

[01:21:38]

And as a result, we were unable to show any impacts from crumb rubber. There have been a number of other studies that have been done recently in the year to year and a half. Several studies were done on the impacts of crumb rubber by the New York

[01:22:08]

State, and also have been other studies done that showed that the impacts from crumb rubber were virtually negligible. The EPA is in the process of convening a group to further look into this issue and we will keep you updated as we find more information.

TOMMIE JEAN VALMASSY

Okay, great. Let me see.

[01:22:38]

There are quite a few more questions coming in here, and if you still have some questions go ahead and send those in. I just want to let people know it sounds like a few people are having trouble getting the presentation. Maybe the whole thing isn't there, but we will go ahead and reload the presentations onto the website I sent you. We'll make sure the complete version is up there. So just give us a couple days, and we'll try to send an email to everyone to let you know when the complete presentation is up there. So sorry for any trouble that you're having

[01:23:08]

getting those, and you can also go ahead and email us if there is particular contact information you were looking for and we'll get that back to you. So back on to the questions. One person asks, "Has the Workgroup thought about enlisting the support of NASCAR in the effort to educate the public regarding the proper disposal of the used tires?"

MARK SCHUKNECHT

I don't know what to add at this point. Elizabeth do you have any comment on that?

[01:23:38]

ELIZABETH HOOVER

I couldn't hear what you said, Mark.



TOMMIE JEAN VALMASSY

The suggestion was that the Workgroup enlist the help of NASCAR when it comes to educating the public with how to dispose of tires?

ELIZABETH HOOVER

Okay, that has not been discussed. That's a very interesting idea, though. I'm not sure whether that possibility might come with a price tag on it, you know, if we were to

[01:24:08]

solicit a group to basically endorse something. But that is an interesting concept.

TOMMIE JEAN VALMASSY

Okay. So can you explain just generally is the RCC Workgroup a regional effort, or is it a national effort? And does it include binational participation? I know that we do have a few people from Mexico on the line today for example.

MARK SCHUKNECHT

Yes,

[01:24:38]

the RCC is national. We've included federal, state, industrial and academia for people from all the various sectors. It includes all the states. We also have several people that are interested from Mexico and also participation from Canada.

[01:25:08]

The Mexican or EPA has a border project, which is looking at some of the issues associated with border tire issues on the border of Mexico. So that is another resource that might be useful to those international people.

TOMMIE JEAN VALMASSY

Okay, great. Earlier I think Elizabeth

[01:25:38]

you were on and you mentioned there the goal of reducing tire piles by about 65%. And, someone wanted to know do you have funding available to help communities or tribes reach that goal, or if not, can you describe ways that rural areas have been successful in getting rid of their tire piles?

ELIZABETH HOOVER

Oh, well, the Scrap Tire Workgroup does not have a budget per se. Each of the individual states would have their own funding mechanisms



[01:26:08]

for getting rid of their tires. But Arkansas where I'm from, we're a pretty rural state and I would say that one of the things that is the most successful for us is to have a good collection system in place where the tire dealers in the public they don't have to drive to great distances to find a place where they can leave their tires. And so, the more collection systems

[01:26:38]

that you have available in the rural areas the less likely people will dump the tires. And also our state law allows the public to be able to take four tires per trip to a collection center and leave them free of charge.

TOMMIE JEAN VALMASSY

Okay.

MARK SCHUKNECHT

Most of the states have programs that have what we call

[01:27:08]

tire tipping fees, and they are normally attached to the sale of the tires. Some of them may be fifty cents to a dollar, maybe a dollar fifty in some areas. That money is collected by the state and then used by the state to help fund their programs. But again, this is on a state-by-state basis. We don't have any federal funding available for that.

TOMMIE JEAN VALMASSY

Okay.

[01:27:38]

So one more question before we have to wrap up here. Someone mentioned they thought that tires were considered a dirty fuel that causes more emissions than traditional fuels. Is it something that the Workgroup has considered? Is it possible that maybe it would be better for landfill players than to bring them as fuel?

MARK SCHUKNECHT

This is a subject that George...

[01:28:08]

You know, can address more accurately. He has made presentations that especially look at the emissions from tire fuels. Tires when burned in uncontrolled landfills and landfill fires are some of the most dirty burning fires we have, but tires that are burned properly in

[01:28:38]

permitted facilities are relatively clean and have low emissions. They have lower CO2 and SO2 standards in automobile fuels, and



also the levels in some cases are lower than normal fuels. So our experience has been that the burning

[01:29:08]

of tires is an environmentally safer method of disposing of tires rather than burning them in uncontrolled and also disposing of them in landfills because they do not decompose. And they destroy your landfill and due to some floating issues and things of that sort.

TOMMIE JEAN VALMASSY

Okay, did anybody

[01:29:38]

have anything to add to that? Okay, so one more question about programs with Mexico. Can you clarify? It sounds like there may be some programs related to the border, but are there any other programs in Mexico related to scrap tires that you can comment on?

MARK SCHUKNECHT

The best thing I can do is to refer you to the

[01:30:08]

Border Issues Committee. I believe they have a border, I think it's 2020 program that's going on. I'm not sure of all the details of that. Ellie Kanipe is one of the people that is on that committee and I'm sure that she would be helpful in answering those questions better than I.

[01:30:38]

TOMMIE JEAN VALMASSY

And I'm sorry. Who is that?

MARK SCHUKNECHT

Ellie Kanipe.

TOMMIE JEAN VALMASSY

Okay. One last question. I think Elizabeth you were talking about the development of a DVD that illustrates the legitimacy of PDA. Where can someone get a copy of that DVD?

ELIZABETH HOOVER

Well, it hasn't been completed at this time and it's scheduled for

[01:31:08]

completion sometime during the spring of 2010. So I would suggest that anyone interested in receiving a copy of that to contact the Chairman of the Civil Engineering Committee, Todd Marvel at the Illinois EPA. And they can check with him and once it's completed, they should be able to get a copy of that.



TOMMIE JEAN VALMASSY

Okay, great.

[01:31:38]

MARK SCHUKNECHT

And we'll also be posting that on the web as well at a later date.

TOMMIE JEAN VALMASSY

At which website is that?

MARK SCHUKNECHT

I'm not sure at this time but we do have intentions of posting it on the web. We have, I believe they call it a trailer that we're going to post of YouTube and it will be available to for public viewing, and

[01:32:08]

we might even be able to put the entire DVD on YouTube as well but we'll have to investigate that.

TOMMIE JEAN VALMASSY

Cool. All right. Well, and again, the slide that is up, you can download the speakers' presentations. And we apologize that not everything loaded quite right. So there might be some missing slides up there. So we'll make sure that those all got loaded properly. There is also a Scrap Tire Clean Up Guidebook that's listed there and Kendra will mention that in a minute.

[01:32:38]

But I wanted to go ahead and put that information up there for those of you who have to leave us. I just want to say if you still have some questions, and I know there were a couple we didn't get to, please go ahead and type those in. And we'll make sure those get forwarded to the speakers and we'll try to get back to. With that, I'm going to hand it back over to Kendra Morrison from EPA to go ahead and wrap us up.

KENDRA MORRISON

Okay, thank you Tommie Jean and thanks Mark and Elizabeth for your informative presentation and answers. And thank you all for participating on the webinar today.

[01:33:08]

I wish to thank all of our speakers for taking time from their busy schedules to share their expertise on not only rural recycling but the national activities that are advancing scrap tire reuse and recycling. And as Tommie Jean has pointed out, it sounds like maybe there was a little bit of issue with downloading the presentations from our Region 8 website. We'll reload those and make sure that that's functioning good within the next day or so.



And the Scrap Tire Clean Up Guidebook that Tommie Jean pointed out is a great resource for solid waste

[01:33:38]

managers that the EPA Region 5 and the Illinois EPA put together. So if you didn't get a chance to jot these addresses down, you can email me and I'd be happy to send you the links. My email address is show there morrison.kendra@epa.gov, and don't forget to take a few minutes and provide us feedback on today's session. It helps us to provide better webinars in the future. And it tells us where we can better meet your needs. So thank you again.

[01:34:08]

[01:34:10] [END VIDEO]

