

Gypsum Wallboard Recycling group
February 25, 2010
Notes

Present: Gaby Frigon (CT DEP/Solid Waste Permitting), Bob Hannon (CT DEP/Office of Ombudsman), Vincent Mastriano (Reusable Greenworks), Tom Armstrong(Reid & Riege), Keith Santos (All Waste), Sherill Baldwin (CT DEP/Recycling)

Phone: Patrick Manning (Gypsum Recycling America), Don van Rhyn (Fairchester Green Building Council), Judy Belaval (CT DEP/Recycling)

After introductions, Sherill provided an overview of past meetings and issues to Bob Hannon, from CT DEP's Ombudsman Office.

***The Office of the Ombudsman** provides a central point of contact for all stakeholders seeking information and assistance from the department including:*

- *Coordinating multi-media access;*
- *Maintaining an information hotline;*
- *Assisting applicants in understanding the [environmental permitting](#) process and coordinating application processing for new and expanding businesses;*
- *Scheduling and coordinating multi-media [pre-application](#) meetings in an effort to fully explain all permit application requirements;*
- *Working in partnership with the CT Department of Economic and Community Development (DECD), other state agencies, and municipalities in outreach efforts to new and expanding businesses;*
- *Making referrals to and coordinating with other DEP programs and non-DEP service providers;*
- *Providing outreach opportunities to promote compliance by better informing business and industry of their regulatory obligations. Such outreach highlights compliance success stories and innovative solutions to environmental problems.*
- *Promoting improved environmental performance by providing guidance, training and recognition for the use of environmental management systems.*

Office of the Ombudsman at 860-424-3003

DISCUSSION

- Discussed what types of permits would be needed to provide different types of services or operations to get gypsum wallboard recycling efforts to move forward.
- Patrick provided background information about GRA's mobile unit – which is used indoors, can run off electricity provided by the site and/or diesel generator. Patrick offered the specifications for Bob.

- Bob said in addition to solid waste permitting – there are two areas of concern for this type of project as it impacts air – fugitive dust emissions and using generators.
- Does the facility hosting the site need the permit? Or would the owner of the mobile unit need the permit. The conversation went back and forth – and overall folks felt the permit should be held by the mobile unit owner. Permit would be with the owner of the unit.
- The mobile unit would run 2-3 days – needs minimum of 1000 tons to make the trip worthwhile.
- What does this look like if multiple sites/facilities stored gypsum till we had enough?
- How much volume is 1000 tons? Patrick said a loose load (like collected with contractors throwing in scrap by hand) is est. 500 lbs/yd³. A packed load is estimated at 750 lbs/yd³
 - Cambridge – takes about a month to collect/generate 1000 tons
 - In CT? – it would take awhile initially until it became /known becomes an option for contractors/builders
 - Impossible/difficult for facilities to be able to store that much... a 30 yard container would hold only 15000-22500 lbs (7.5 tons to 11.25 tons). That's a lot of containers – even if they go up to 40 yard containers.
- How can we store that much material? None of the facilities have the capacity. Could a warehouse space be rented/leased to hold it? Or multiple sites? Mobile unit could either travel to 2 -3 sites or all material could be transported to one site once mobile unit arrives.
- If a warehouse were rented/purchased specifically to just store gypsum until 1000 tons were collected – this would probably fall under a transfer station permit. Needs to be under cover. The GRA mobile unit could be transported and process the materials on the site when the minimum 1000 tons are collected – and probably take 2-3 days. Could GRA get a temporary permit for the mobile unit?
- Vehicle/mobile unit vs. fixed – does this matter? Does this change the permit needs?
- Is this more like an IPC? – is the mobile unit an IPC? (intermediate processing center)
- Facility would be licensed to store (transfer station) – and include within the permit for the site – the ability to use the mobile unit so many times a year.
- Or should the mobile unit seek a temporary authorization? Good for 30 days? How frequently would the mobile unit come to the warehouse/transfer station site? Depends on the frequency we can generate/collect enough to process.

- If there's a central location/site for large and small haulers to bring clean gypsum – we could probably collect enough in 3 months (less if it catches on quickly). Interested municipalities would be able to participate too – having a separate container/can for clean gypsum at their transfer stations.
- Could this also be a solid waste demonstration project? This might be a good direction – to reduce the risk of the venture – to ensure the quantities can be collected. Good for 2 years, but can get an extension. If successful – will need to apply for appropriate permits after the end of the demo permit time.
- What about composting the material – as full boards/scrap straight into the pile? This would also bring up the issue of fugitive dust and would need to consider the pH of the resultant mixture and where it is placed.
- Patrick said he has a copy of a study that looked into mixing the paper portion of the end product into compost – but wasn't successful – sulfur problems.
- Buzz from VT DNR also has a report/study that looks at air and water issues when using/including gypsum in the composting process. This is already linked to our website from the December 2009 meeting: [Gypsum Wallboard Recycling and Reuse Opportunities in the State of Vermont](#), Paper by Emma Marvin, VT DNR
- Might make more sense to add gypsum powder to finished compost as a value added product.
- At the C & D Summit in Mass a few months ago – they stated that not more than 10% of gypsum aggregate/powder should be added to finished compost/soil mix.
- When the mobile unit processes the gypsum wallboard – a number of products are generated. Could these products be used locally? Is there a local market – which would make this venture more cost effective?
- Paper product has been used by agriculture in other states/regions – as animal bedding. We should explore whether this could be used here – if CT is a market for this material. We could start with the stables for the Governor's Horse Guard.
- Other product of course is the gypsum itself – in powder and other size aggregate – used in cement product, new gypsum wallboard and as a soil amendment. There's no gypsum board manufacturing in CT – but isn't there cement production?
- While we don't have a lot of farms – couldn't this be used as a soil amendment? We have a growing wine industry – isn't this material beneficial for soils growing grapes?

- We should reach out to these potential markets and invite them to the next meeting. Or even better, have a meeting with the potential producers/generators of the material and the potential users/markets of the material.
- Sherill shared setting this up for March would be difficult – and suggested April or May. She will begin reaching out to the agricultural community (Vineyard association, Farm Bureau, WLA, CT NOFA, UCONN).
- Sherill asked the group about possible new directions and/or resources:
 - Listserv – the CT Materials Reuse Network, which includes some folks who are part of the gypsum recycling group receive emails and news from Sherill just like the gypsum group. In an effort to create stronger connections between members – which include businesses, municipalities, consultants, non-profit organizations and agencies (DEP, DPH and DPS) – Sherill’s wondering if folks would see the benefit of a listserv. Current communication is one-way – only coming from Sherill – a listserv would give folks the opportunity to ask questions of each other, promote events, their successes, if they have a job opening, upcoming issues and/or concerns etc. Overall the answer was positive, as it was with MRN, so Sherill will look into starting a listserv for C & D reuse and recycling (people will have the option to be removed once it’s established)
 - Direction of Gypsum Wallboard Recycling group. It’s been effective to focus on one material – and once the issues of gypsum come to some conclusion/resolution – what’s next? Do people see the benefit of meeting – would you like to continue gathering – perhaps to take a step back and look at all the C & D materials – and identify other priority materials to focus on? Overall answer was positive – but focus should continue on gypsum a bit longer until all the pieces were in place to ensure movement/storage of product.

Sherill said she’d coordinate the next meeting – to be announced – for April or May – inviting wallboard scrap generators and possible markets for the products- focusing on the agricultural community.

*Notes submitted by Sherill Baldwin as best as she can recall – and may include some errors/omissions.