Steering Committee (SC) Call Minutes NanoRelease Consumer Products April 9, 2013

Participants: Myriam Hill, Wendel Wohlleben, Richard Zepp, Bill Kojola, Treye Thomas, Yasir Sultan, Shaun Clancy, Debbie Kaiser, Janet Carter, Carolyn Cairns, Jo Anne Shatkin, Richard Canady, Libby Tsytsikova, Elyse Lee, Molly Bloom

<u>Agenda</u>

(1) Approval of last call minutes

No comments were made on the call.
 Action Item: Members should send any comments to the minutes by Friday April 12th after which, the minutes will be considered approved and posted online.

(2) Group Updates

- TG1
 - o A co-chair noted that a manuscript for the white paper is half complete and should be a full draft by early May.
- TG2
 - o A co-chair noted that work is being done to edit the paper down to an appropriate length for publication for submission to the journal *Carbon*. A final draft should be complete by the end of the month.
- TG3
 - o It was noted that the white paper was resubmitted about a week ago after making revisions based on comments from editors at the journal *Environment International*.
- SOST
 - The group has submitted an outline to *Nature Nanotechnology* and is waiting to hear from editors if they would accept the paper as a progress article.

(3) Phase 2.5 & 3 Updates

- Phase 2.5
 - o Members on the call reviewed the preliminary documents for the Phase 2.5 report including a sorting table for release studies, question matrix, and annotated outline.
 - o It was noted that chapters 3 and 4 have been combined so there are now five chapters.
 - It was pointed out that the main findings from the report in table 2.1 show a prioritizing of three release mechanisms- sanding, weathering, and abrasion. There are a low number of existing studies on leeching, thermal degradation, drilling and others. Members discussed these release scenarios for possibly carrying forward in methods development.
 - Not all laboratory data has been included. There may be more information on thermal abrasion and UV weathering exposures that is not in the table. However, sanding and taber abrasion have been studied the most with many more examples for these approaches.
 - Another 4-5 interviews are still to be conducted, but the weighting of the table will be the same.
 - The Nanopolytox project, which finishes in a few months, looks at many fillers not just CNTs. Relevant expertise from that project can be incorporated into our interlaboratory testing group.

- It was noted that incineration is not equivalent to thermal degradation. There is a lot more information on incineration than thermal degradation. There is a thermal degradation aspect to weathering scenarios as well. With thermal degradation, there is degradation of the matrix and release of the CNT, not necessarily destruction of the CNTs as with incineration.
- A focus on consumer use scenarios like weathering, which could lead to leeching and abrasion was suggested as opposed to occupational hazard scenarios.
- Sanding occurs at higher speeds of 10-20 meters per second while abrasion is generally at a lower velocity, so more like normal use. Ex: shoe on the floor
- Thinking about how good the available methods for different scenarios are and where more development would have the greatest impact was suggested, instead of focusing on which scenarios have been most researched. All scenarios could have relevant modules in the NanoRelease project.
- The scenarios with the most research inform the project on what is most relevant to consumers and so can be focused on with our limited resources. All of these methods are in fairly early stages and contribution to any of them would be useful.
- It was noted that the more comprehensive we can be with kinds of scenarios, the more
 reflective they are of real life use and release. So think of a real life scenario
 understanding the factors involved and then mimic these techniques. This may not be
 feasible because all labs may not have all of the equipment, but we could develop a test
 that can take into account as many factors as we possible.
- The Phase 2.5 report itself will touch on all of these scenarios and then more of a decision can be made at the workshop.
- It was noted that the group discussion today focused on sanding, weathering, and abrasion as main scenarios then combined with or enhanced by aging, incineration, and thermal degradation.
- Action Item: Members should send any comments regarding the Phase 2.5 report to the secretariat by April 16th so that the report can be shared on the next Steering Committee call.
- Phase 3/ITG Update
 - o A preliminary list of members for the Interlaboratory Testing Group was shared with members.
 - A first meeting of the ITG core group is being planned for the 2nd-3rd week of April to discuss the initial concept for a pilot study.
- Phase 2.5-3 Transition Workshop (May 16-17, 2013)
 - The location for Day 1 is EPA East Building, 1201 Constitution Avenue NW, Washington, D.C.
 20004 and Day 2 is Potomac Yard North, 2733 Crystal Drive, Arlington, VA 22202.
 - Members went through the draft agenda and agreed to add an item on Day 2 of the workshop for identification of resources and of coordination needs when moving forward to initiate pilot testing.

(4) Updates on Outreach & Collaborations

- It was noted that a poster abstract has been submitted for Nanotech 2013 May 12-16, 2013.
- (5) Final Comments/Questions
 - The next SC call will be rescheduled for the last week of April for more discussion before the workshop.