

## #5 C&D Debris | Subcommittee Meeting #5 Summary – Construction & Demolition Debris March 30, 2022 9AM-12PM

Subcommittee meeting #5 of the Construction & Demolition Debris Subcommittee (#5-C&D) was convened virtually via Zoom on March 30, 2022 from 9 AM-12 PM, CST. Attendance for #5-C&D is provided in Table 1 below.

Table 1. #5 C&D Subcommittee Membership and Attendance

Name	Company	Attended 3/30/22
Becky Soglin	Johnson County Planning, Development and Sustainability	Present
Tim Ruth	Home Builders Association of Iowa and Iowa City	Absent
Brian Seals	Waste Commission of Scott County	Present
Hal Morton	Independent	Present
Seth Shannon	SCHEMMER	Present
Richard Graves	NA	Absent
Damion Sadd	Continental Cement Co.	Present
Kerry Dixon	Engie North America	Present
Les Stohs	Greater Des Moines Habitat for Humanity/Re-Store	Absent
Nick Wylie	J Pettiecord	Absent
Cindy Kuhn	Habitat for Humanity Restore in QCA	Absent
Jaime Courtney	Iowa Home Crafters	Present
Jay Iverson	Home Builders Association of Iowa	Absent
Chaden Halfhill	Iowa Home Crafters	Present
Ashley Buss	Iowa DOT	Present
Madeline Schmitt	Iowa DOT	Absent
Samuel Sturtz	Iowa DOT	Present
Reid Bermel	DNR Internal SMM Team	Present
Laurie Rasmus	DNR Internal SMM Team	Absent
Jeff Fiagle	DNR Internal SMM Team	Absent
Tom Anderson	DNR Internal SMM Team	Present
Jennifer Wright	DNR Internal SMM Team	Present
Michelle Leonard	Consultant – SCS Engineers	Present
Christine Collier	Consultant – SCS Engineers	Present
Rosa Cruz	Consultant – SCS Engineers	Present
Jeff Phillips	Consultant – SCS Engineers	Absent
Karen Luken	Sub-Consultant – EESI*	Present

\* Economic Environmental Solutions International

## I. Subcommittee #5 - C&D Summary

The meeting began with the project consulting team reviewing the agenda for this meeting (see Attachment A), the overall objectives of the Sustainable Materials Management (SMM) – Vision for Iowa project, the process and goals of the project process, and the goals for today’s subcommittee meeting. The slides presented for this Subcommittee meeting are included in Attachment A.

The goal for this meeting was to establish a clear direction for implementing C&D strategies with immediate (0-3 years), medium (4-10 years) and long-term (11+ years) strategies. Implementation strategies were discussed for the following topics: develop deconstruction and reuse industry in Iowa, support the use of green building practices and support C&D processing in Iowa.

Implementation strategies were crafted to identify:

- Legislation and Policies
- Infrastructure
- Funding mechanism
- Performance metrics

The following are summaries of discussions concerning the strategies.

### A. Objective 1: Develop Deconstruction and Reuse Industry in Iowa

#### STRATEGY: CONDUCT STUDIES AND EVALUATE DATA ON C&D WASTE IN IOWA – SHORT TERM

##### Subcommittee Member Discussion

- Scott County used to recycle wood, metal and cardboard, data from 2013 where they tracked the waste is available.
- There might be data available from LEED projects in the state that reported C&D waste.
- The EPA has data on disaster debris.
  - EPA disaster debris data: [Resiliency and Natural Disaster Debris Workshops | US EPA](#)
- Iowa State University submitted notices when constructing or deconstructing. They voluntarily reported what was being diverted from the landfill and where the deconstruction waste was going.
- Counties could potentially have numbers on C&D debris that was illegally dumped.
- C&D materials will be captured in upcoming Iowa waste characterization study.
- Other potential resources:
  - Iowa City Salvage Barn; Western Salvage; Habitat ReStore
  - LEED Projects- USGBC reports
  - Disaster debris data (FEMA?)
  - USEPA National Disaster debris reports
  - Demolition permits
  - DNR 2022 Waste Characterization Study
- There is an opportunity to collaborate with other programs for labor that is needed for deconstruction; potential training opportunities for underemployed laborers.

### STRATEGY: REVISIT AND REVAMP MULTI-DEPARTMENTAL TASK FORCE ON C&D – SHORT TERM

#### Subcommittee Member Discussion

- In 2009 there was a task force that dealt with construction and demolition.
- Should there be an internal task force that looks at policies that restrict and limit the use of deconstruction materials?
  - There is the opportunity to build bridges between departments if there was a task force.
  - The task force would need a specific focus to be successful.
- This strategy may be eliminated.

### STRATEGY: CONDUCT ANALYSIS TO DETERMINE VIABILITY OF DONATION AND DECONSTRUCTION FACILITIES - SHORT TERM

#### Subcommittee Member Discussion

- In regards to deconstruction there is lack of storage, labor and equipment.
- There are multiple salvage facilities for example, Iowa City Salvage Barn, and there should be research on how they operate.
- Certain groups have struggled to develop a salvage program due to not being able to find a place to store material. Cedar Rapids recently obtained property where they can retail material.
- Research is needed on what materials salvage and junk yards are ending up with.
  - Metal is often sold to salvage yards after deconstruction projects.
- There needs to be an analysis on whether or not it is worth it to salvage materials over buying new due to where the lumber market is now. Chaden had an example of a project where the amount of work it took to salvage studs from an old building resulted in being more expensive than purchasing the material new.
- Donation centers such as Habitat for Humanity have grown immensely and now need to limit the items they can take.

### STRATEGY: IDENTIFY, EVALUATE, AND IMPLEMENT INCENTIVES FOR PURCHASING OF DECONSTRUCTED MATERIALS - MEDIUM TERM

#### Subcommittee Member Discussion

- This strategy to be considered after education to building community and analysis of building codes.

### STRATEGY: EDUCATE BUILDING COMMUNITY ON DECONSTRUCTION PRINCIPALS, PRACTICES, FACILITIES AND SERVICES - MEDIUM TERM

#### Subcommittee Member Discussion

- Encourage urban lumber, reuse lumber when educating.
- Need to understand the market for reuse materials.
- National Building Materials Reuse Association has newsletters and conferences.
- Around 2014-2015 UNI had a partnership with the DNR where training was conducted on deconstruction and construction and demolition debris. This program is not current.

- Outreach to public should include education on materials worth preserving so they are appreciated.

#### STRATEGY: REVIEW AND UPDATE BUILDING CODES FOR GOVERNMENT PROJECTS TO PRIORITIZE BUILDING REUSE AND INCENTIVIZE MATERIALS REUSE - MEDIUM TERM

##### Subcommittee Member Discussion

- California has a green building code that requires a plan for types of waste that will be generated and how they will be disposed of. A portion has to be diverted from the landfills.
- Builders should understand how materials can be used, some materials can lose structural integrity and if they don't they would require an evaluation from an engineer.
- LEED has sustainable guidelines that schools follow. Iowa State was following guidelines and registering projects.
- The ICC green construction code should be examined.
- Johnson County has adopted their own policy for green construction. The policy mentions proper demolition and minimum sustainability standards. This is a policy and not linked to code.

#### B. OBJECTIVE 2: SUPPORT USE OF GREEN BUILDING PRACTICES

#### STRATEGY: DEVELOP SAMPLE PROJECT BID LANGUAGE SUPPORTING GREEN BUILDING PRACTICES - SHORT TERM

##### Subcommittee Members discussion

- Iowa State has green building bid language that is publically available.
- If only changing bid language that would mean that it would only include C&D waste and not construction of buildings.
- If the goal is sustainable buildings there will need to be involvement in the design of the buildings.
- There will need to be involvement in both the commercial and residential arenas.
- Enterprise Communities is a non-profit in Indianapolis that has language for green criteria for development.
- The Iowa Economic Development Authority has Iowa Green Streets which sets criteria for various projects. When you apply for a loan through Green Street there are specific practices identified and criteria you have to hit.
  - [IowaGreenStreetsCriteria.pdf \(iowaeda.com\)](#)
- The subcommittee should consider including other organizations and state agencies who are familiar with code and sample bids.
- Codes are set by State Fire Marshal's office.

### STRATEGY: REVIEW AND UPDATE BUILDING CODES TO IMPLEMENT GREEN BUILDING PRACTICES - SHORT TERM

#### Subcommittee Member Discussion

- Policy is a more direct path for entities to get what they want.
- Codes are reviewed every three years; this goal should be short term since codes will be reviewed in 2024.

### STRATEGY: ADOPT BUILDER/CONTRACTOR CERTIFICATION PROGRAM (NATIONAL PROGRAM STANDARDS) - MEDIUM TERM

#### Subcommittee Member Discussion

- Certification and training programs could be beneficial for the new generation starting out in the industry to gain knowledge about these practices.

## C. OBJECTIVE 3: SUPPORT C&D PROCESSING IN IOWA

### STRATEGY: REMOVE BARRIERS AND INCENTIVIZE DEVELOPMENT OF C&D PROCESSING FACILITIES - SHORT TERM

#### Subcommittee Member Discussion

- Barriers to the development of C&D processing facilities are market driven.
- There is a C&D recycling facility in Minnesota, what are their markets?
- C&D recycling facilities in Iowa have a history of accumulating materials then leaving.
- Is there a viable long term strategy for these facilities?
- Neighbors in the past have had issues with odors from C&D materials such as drywall.
- Dane County C&D recycling facility should be looked as an example:
  - [Construction and Demolition Recycling | Dane County Department of Waste & Renewables \(countyofdane.com\)](https://www.countyofdane.com/Construction-and-Demolition-Recycling)
- Identify and understand what the barriers are for development of C&D processing facilities.
- Investigate what Dane County and DemCon are doing for end markets.
- Research potential markets for C&D materials.
- Iowa solid waste facilities may consider recycling C&D if there were viable end markets and it made economic sense.

### STRATEGY: ADOPT RECYCLING CERTIFICATION INSTITUTE METHODS - LONG-TERM

#### Subcommittee Member Discussion

- This strategy should be considered once barrier and markets have been developed.
- Earth 911 is website that helps to show 'where it goes' and who can recycle products. Might be something worth exploring. Not a lot in Iowa right now, but an area of opportunity if we can get markets for these materials.

#### D. Research Request List

Through the discussions and in follow up discussions, various topics have been identified for further research. These are provided below.

- Research LEED data available on C&D waste.
- Research how salvage facilities operate.
- Research Iowa State University bid language.
- Research C&D end markets.
- Research on Dane County C&D Recycling and DemCon end markets.

#### E. Other Notes

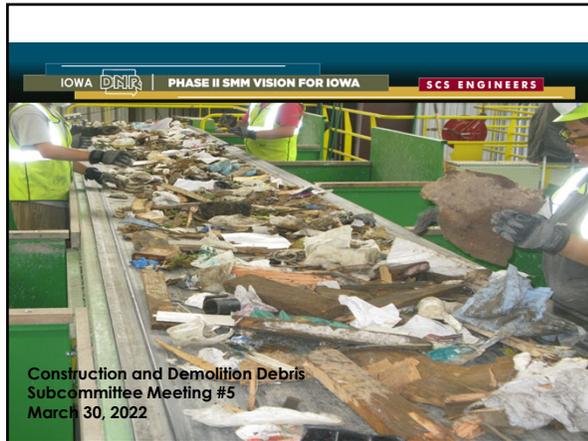
Other items of note from the #5-C&D meeting are as follows:

- Consider including organizations and state agencies familiar with code.
- Subcommittee Meeting #6 will be April 27, 2022.
- The third Stakeholder Meeting will be held June 15, 2022. Subcommittee members in addition to other interested parties are invited and encouraged to attend.

#### Attachments:

Attachment A: PowerPoint Presentation

Attachment A  
PowerPoint Presentation



## Agenda

- 1. Introductions**
  - a. Project Team
  - b. Subcommittee Members
- 2. Background**
  - a. Sustainable Materials Management
  - b. SMM Vision for Iowa Project
  - c. Process
- 3. Strategies Discussion**

IOWA DNR PHASE II SMM VISION FOR IOWA SCS ENGINEERS

## What is SMM?

“Sustainable materials management is an approach to using and reusing materials most productively throughout their entire life cycles”

It represents a change in how our society thinks about the use of natural resources and environmental protection

Source: USEPA

IOWA DNR PHASE II SMM VISION FOR IOWA SCS ENGINEERS

## What Isn't SMM?

- Product Bans without LCA on alternative products
- Landfill diversion requirements without:
  - Strategies to reduce generation
  - Sufficient infrastructure and funding to collect and process
  - Assessment of impact on greenhouse gas emissions; especially at landfills with landfill gas to energy systems
  - Assessing the impact of GHG emissions from transporting recyclables across country/world
  - Viable off-take markets

IOWA DNR PHASE II SMM VISION FOR IOWA SCS ENGINEERS

## Project Goal

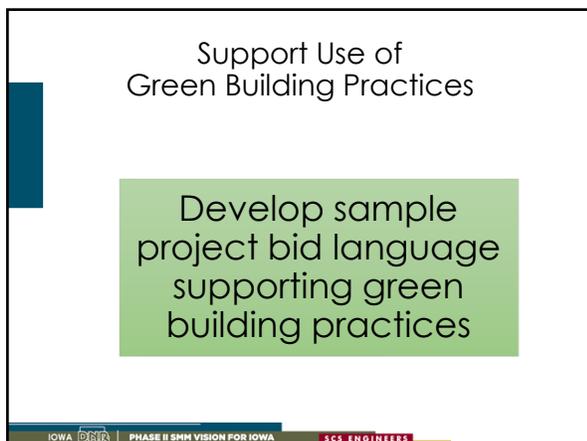
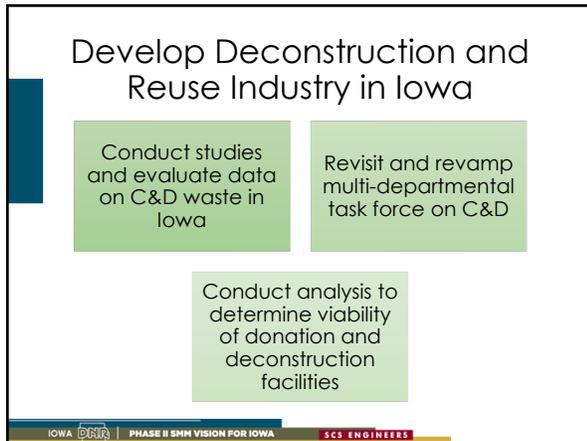
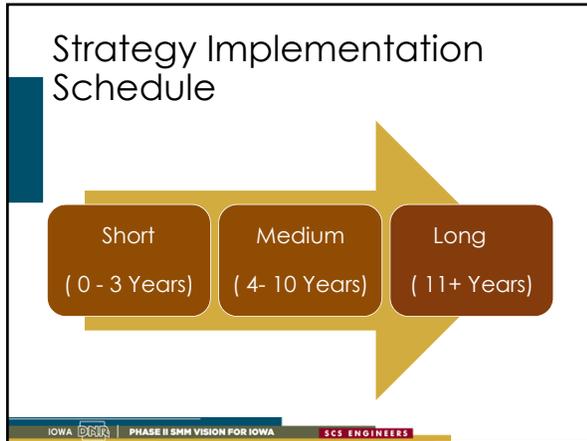
Establish a clear direction for implementing an SMM system with immediate, medium and long-term strategies

IOWA DNR PHASE II SMM VISION FOR IOWA SCS ENGINEERS

## Process to Date

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graph LR; A[Select specific material types within each category] --> B[Conduct and Review Research]; B --> C[Identify material-specific objectives]; C --> D[Develop Implementation Strategies];
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IOWA DNR PHASE II SMM VISION FOR IOWA SCS ENGINEERS



Support C&D Processing in Iowa

Remove barriers and incentivize development of C&D processing facilities

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Support C&D Processing in Iowa

Adopt recycling certification institute methods

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