Preparing Minnesotans for Climate Change: 2013 Conference Report

by Zdanna Tranby

Evaluation Questions

1) Who came to the 2013 conference?

- a. ~240 attendees; 126 completed surveys.
- b. Most respondents work for the government (60% or 74/123).

2) How did the 2013 conference affect attendees?

a. 94% (or 109/116) gained insights and 86% (or 97/113) made connections with others that will be useful to them as they move forward on climate adaptation.

3) Did we lay the groundwork for a larger conference in 2014?

- a. 99% (or 99/100) would recommend the conference to a colleague.
- b. 76% (or 78/102) said they would come to a 2014 conference, the other 33% (or 34/102) said that they might come.
- c. Half of the respondents (48% or 57/120) heard about the conference from emails, list-serves, or e-newsletters.
- d. Several people voiced support for a 2014 conference in their open-ended comments.

4) How can we improve the conference for 2014?

- a. Assume attendees believe climate change will impact them; 95% (or 118/124) came to the conference with this understanding.
- b. Address other suggestions and critiques provided in the report.

EVALUATION QUESTIONS	1
OVERVIEW	3
METHOD	3
RESULTS AND DISCUSSION	3
ATTENDEES' OCCUPATIONS	3
HEARING ABOUT THE 2013 CONFERENCE	5
ATTENDEES' INTENT TO ATTEND & RECOMMEND A FUTURE CONFERENCE	6
ATTENDEES' BELIEFS ABOUT CLIMATE CHANGE	6
FEEDBACK ABOUT THE MORNING PRESENTATIONS	7
FEEDBACK ABOUT THE BREAKOUT SESSIONS	9
ATTENDEES' REFLECTIONS ON THE 2013 CONFERENCE	15
ATTENDEES' SUGGESTIONS FOR IMPROVEMENT	15
ATTENDEES' ADDITIONAL COMMENTS	20
APPENDIX 1.	25
ATTENDEES' OCCUPATIONS	25
APPENDIX 2.	28
HEARING ABOUT THE 2013 CONFERENCE	28
APPENDIX 3.	30
COMPLETE PERCENTAGES FROM FEEDBACK ON MORNING PRESENTATIONS	30
APPENDIX 4.	31
PDEAL/OUT SESSION NUMBERS	21

Preparing Minnesotans for Climate Change: 2013 Conference Report

December 2, 2013

by Zdanna Tranby

Overview

About 240 people attended the Preparing Minnesotans for Climate Change Conference that was planned by the Minnesota Climate Adaptation Partnership. The conference ran from 9:00 a.m. to 5:30 p.m. on Thursday, November 7 followed by a reception.

Method

As people arrived, they checked in with the registration desk and were given folders and nametags. The folders contained an agenda, other useful documents and a four-page survey, which was designed to be filled out at different points throughout the day. Instructions on the first page and blue highlighting throughout the survey were intended to get the attendee's attention and help guide them through the process. At least two announcements were made while the full group was assembled as well, to encourage participants to fill out the surveys. These announcements occurred in the morning before the presentations by Drs. Mark Seeley and Peter Snyder, and then again after lunch. Surveys were collected by evaluators, who waited near the exits of each of the three locations for breakout sessions at the end of the conference and before the reception. In exchange for handing in a survey, respondents received a voucher for free admission to the Future Earth exhibition and general admission to the Science Museum of Minnesota (SMM).

Results and Discussion

We collected 126 surveys, for a response rate of about 53%. Since the survey is long and not personally administered by an evaluator, this response rate is in line with successful online surveys administered by SMM, which tend to garner less than 50% response rates.

Attendees' Occupations

Participants were prompted, "Do you work in...?" and given the possible selections below to choose from (see Table 1). Six respondents chose more than one category. Most respondents work in government (60%), while one in five work in education (18%) and one in ten work in non-profits (10%).

Table 1. Respondents Work in a Variety of Fields (n=123*)

% of Respondents

Government	60%
Education	18%
Non-profit	10%
Self-employed	9%
Business	7%
Other	5%

^{*}Six participants selected more than one category.

We also asked participants, "What is your occupation?" and had space for them to write in their response. Samples from each grouping are given below, with a complete list available in the appendix (see Appendix 1). Participants' responses are arranged by what the job field category that they selected above. Responses that were given by multiple respondents show the number that they were given in brackets (for example, "Civil engineer. [4]" was written in by four people). Comments that are followed by an asterisk belong to respondents that selected multiple fields in the table above.

What is your occupation? (n=121*)

*Some attendees selected more than one category, so their comments are included in each category they selected.

60% (72) Government

- Administration manager.
- Aquatic scientist. Limnologist.
- Civil engineer. [4]
- Director, Environmental Management.
- Policy analyst.

18% (22) Education

- Administrator.
- Professor of biology.
- U of M Extension program director.

10% (12) Non-profit

- Mental health professional.
- Outreach and volunteer coordinator.
- Policy associate of fresh energy.

9% (11) Self-employed

- Farmer. [2]
- Freelance writer.
- Self-employed tree consultant.

7% (8) Business

- Marketing.
- Property portfolio Manager.
- Retired farmer. Insurance underwriter. Master gardener.

5% (6) Other

- Environmental advocate.
- Retired. Master naturalist.

2% (3) Attendees that did not select a job field category

- Mortgage servicing.
- Retired. [2]

Hearing about the 2013 Conference

The conference planning committee disseminated knowledge about the conference primarily through emails and word of mouth, and by enlisting community members to help spread the word. The original plan was to hold registrations to 225 participants, but adjustments to the schedule permitted 240 to attend. Half of the respondents wrote that they found out about the conference through personal emails, a list-serve, or an electronic newsletter (48%). Another two-fifths of the respondents wrote in specific people, organizations, or groups that told them about the conference (38%). A selection of their comments is included below; the full collection is in Appendix 2.

"How did you learn about the conference?" (n=120*)

*Some respondents listed multiple sources. Their comments are followed by an asterisk and are included in multiple categories.

48% (57) Email, list-serve, e-newsletter

- Climate group list-serve.
- Email. [33]
- Freshwater Society/Water Resources Email.
- List-serve. [2]
- U of M email. [4]

38% (45) Colleagues, Organizations, and the Minnesota Climate Adaptation Partnership

- Barb Loukinnen.
- Colleague. [6]
- Conference planning member.
- U of M extension announcement.

5% (6) Word of Mouth

• Wife.

• Word of mouth. [4]

5% (6) News sources

- MNAT website, pioneer press.*
- MPR. [3]

3% (4) Websites

- Google search.
- U of M Master Nat, website.

7% (8) Other

- Not sure.
- Postcard. [2]

Attendees' Intent to Attend & Recommend a Future Conference

When asked if they would attend the conference if it were offered again next year, 77% of respondents (n=102) checked "yes". The remaining respondents selected "maybe". When asked to rate their agreement with this statement, "I would recommend this conference to a colleague," only one respondent disagreed. The remaining 99 respondents wrote that they would either strongly agree (62%) or agree (37%) with that statement. Given this strong endorsement of the 2013 conference, organizers of a potential 2014 conference may want to consider reaching out to 2013 conference participants at the appropriate time to help spread awareness of the 2014 conference and to drive registrations and attendance.

Attendees' Beliefs about Climate Change

Before the conference got started, participants were prompted by the survey to answer this question, "How much of an impact do you think climate change will have on Minnesota in the next 50 years?" The survey also prompted participants to answer a similar question after the last breakout session, "Now that you have participated in today's conference, how much of an impact do you think climate change will have on Minnesota in the next 50 years?"

Overall, most respondents, both before (95%, n=124) and after (94%, n=119) the conference, ranked the amount of impact that climate change would have on Minnesota in the next 50 years at a 4 or 5 (a lot of impact)(see Table 2).

Any future Minnesota climate adaptation conference can assume that attendees already understand that climate change is likely to have considerable impact on Minnesota in coming years. So, as one attendee put it, we can offer "more nuts and bolts, less preaching to the choir," in the next conference. Another attendee affirms this idea by saying, "The conference still had a focus on pandering to climate change deniers. That was a distraction. In this audience that is not an issue. Time would have been better used to talk about climate change adaptation techniques."

Table 2. Rankings of the Amount of Impact that Climate Change will have on Minnesota in the Next 50 Years. Before and After the Conference

	BEFORE the Conference (n=124)	AFTER the Conference (n=119)
1 (No impact)	1%	-
2	-	-
3 (Some impact)	4%	6%
4	24%	17%
5 (A lot of impact)	71%	77%

There were a few participants who changed their assessment of the impact of climate change on Minnesota as a result of the conference (14%, n=117), but these changes were generally only by one point (on a five-point scale), and were equally likely to be positive as negative.

Feedback about the Morning Presentations

Presentations by Drs. Mark Seeley and Peter Snyder

Even though most respondents had previously seen a presentation by at least one of the speakers before (61%, n=126), almost all of them agreed with the statement, "The presentations by Mark Seeley and Peter Snyder provided me with a better understanding of climate change in Minnesota" (99%, n=125). See Appendix 3 for more details on how participants responded.

Panel Presentation

Most respondents also either agreed or strongly agreed with this statement, "The panelists' presentations helped me to think more broadly and deeply about the implications of climate change," (98%, n=122). See Appendix 3 for more details on how participants responded.

The Q&A session following the morning presentations

Respondents were slightly less supportive of the Q&A session that followed the presentations (see Table 3). When asked to rank their agreement with this statement, "The Q&A session helped me to think more broadly and deeply about the implications of climate change," 16% of respondents disagreed and 1% strongly disagreed.

Table 3. Agreement with, "The Q&A session helped me to think more broadly and deeply about implications of climate change." (n=120)

% of Respondents

Strongly agree	14%
Agree	70%
Disagree	16%
Strongly disagree	1%

The Combined Effect of the Morning Presentations and Q&A session

Most respondents walked away from the morning presentations and Q&A session thinking that they could apply some of the things that they hear to their own work on climate adaptation (see Table 4).

Table 4. Agreement with "I can apply some of the things I heard about this morning to my own work on climate change adaptation." (n=126)

% of Respondents

Strongly agree	35%
Agree	60%
Not applicable: I am not in a position to act.	4%
Disagree	1%
Strongly disagree	1%

Bob Johnson's lunch address

Most respondents agreed that Bob Johnson's address was an effective use of their time (93%, n=122)(see Table 5).

% of Respondents (n=122)

Table 5. Agreement with, "Listening to Bob Johnson's address was an effective use of my time."

	_
Strongly agree	38%
Agree	55%
Disagree	7%
Strongly disagree	1%

Feedback about the Breakout Sessions

Respondents could only attend up to three of the breakout sessions listed below (see Table 6), since sessions 1-3, 4-6 and 7-9 were offered at concurrent times. The sample size for each group of sessions is as follows: a) for sessions 1-3, n=120, b) for sessions 4-6, n=120, and c) for sessions 7-9, n=95). This shows that about 1 in 5 of respondents either did not take the time to provide feedback on the last session or that these respondents left early.

Survey responses had close to even coverage of the first round of breakout sessions, but two breakout sessions during later rounds have smaller samples; "Public Health Preparedness and Response to Extreme Heat" and "Highway Interchange 101/61 Flood Mitigation Project". Data from these sessions are reflected in tables 6-9, but further analysis excludes these because of their small sample sizes.

Table 6. Breakout Session Attendance by Respondents

Sample Size	Time Offered	Session #	Session Name	% of Respondents
		1	Adapting Urban Ecosystems for Climate Change	29%
120	2-3pm	2	Community Stormwater Response to a Changing Landscape and Climate	37%
		3	34%	
		4	Preparing for Extreme Events	41%
120	3:20- 4:20pm	5	Public Health Preparedness and Response to Extreme Heat	17%
		6	6 Managing Risk in Agriculture in a Changing Climate	
		7	7 Highway Interchange 101/61 Flood Mitigation Project	
95	5 4:30- 5:30pm		Facing Challenges of Limited Community Water Availability	37%
		9	Climate Adaptation in Minneapolis and Saint Paul	54%

Breakout Sessions as a Source of New Information

Almost all of the respondents (95%) either agreed or strongly agreed with the statement, "The session gave me some new information," when asked about a session they attended (see Table 7 and Appendix 4). Two sessions stand out as having a higher percentage of "strongly agree" rankings. These were, "Community Stormwater Response to a Changing Landscape and Climate" and "Facing Challenges of Limited Community Water Availability". While attendees were not asked directly, the "strongly agree" rankings may indicate that respondents felt these were more informative sessions than the other ones that they attended.

Breakout Sessions as Sources for Ideas for Further Action

Attendees were asked to rank their agreement with, "The session gave me some ideas for further action." One out of every four respondents' agreement rankings were "not applicable: I am not in a position to act," (see Table 8 and Appendix 4). A higher percentage of respondents who attended "Adapting Urban Ecosystems for Climate Change" and "Strategies for Addressing Climate-change Impacts of Water Quality" either agreed or strongly agreed that these sessions gave them ideas for further action (80% and 76%, respectively). Only 7% of respondents left one of their breakout sessions thinking that it did not give them ideas for action, even though they felt that they were in a position to act.

Ability to Implement Ideas in Next 6 Months

We wanted to know if participants *intended* to act on ideas that were sparked by sessions at the conference; we also wanted to support their further action by providing the suggestion of goal. So, if respondents agreed with the statement, "The session gave me some ideas for further action," they were asked to rank their agreement with, "I will be able to implement at least one of these ideas in the next 6 months." Most respondents indicated that they would be able to act on their ideas in this timeframe (80%, see Table 9 and Appendix 4).

Table 7. Agreement with, "The session gave me some new information."

	Total %	Urban Ecosystems (Session 1)	Stormwater (Session 2)	Water Quality (Session 3)	Extreme Events (Session 4)	Public Health (Session 5)	Agriculture (Session 6)	Highways 101/61 (Session 7)	Community Water (Session 8)	Minneapolis & St. Paul (Session 9)
Strongly agree	32%	31%	45%	39%	18%	35%	15%	50%	44%	33%
Agree	63%	66%	50%	61%	80%	65%	69%	50%	47%	83%
Disagree	4%	3%	5%	-	2%	-	15%	-	6%	2%
Strongly disagree	1%	-	-	-	-	-	2%	-	3%	-
Sample Size	321	35	44	41	45	20	48	8	34	46

Table 8. Agreement with, "The session gave me some ideas for further action."

	Total %	Urban Ecosystems (Session 1)	Stormwater (Session 2)	Water Quality (Session 3)	Extreme Events (Session 4)	Public Health (Session 5)	Agriculture (Session 6)	Highways 101/61 (Session 7)	Community Water (Session 8)	Minneapolis & St. Paul (Session 9)
Strongly agree	15%	29%	18%	5%	11%	25%	4%	14%	10%	21%
Agree	54%	51%	45%	71%	60%	55%	54%	29%	56%	49%
Not Applicable: I am not in a position to act	25%	17%	27%	20%	28%	15%	29%	57%	24%	26%
Disagree	6%	3%	9%	5%	2%	5%	10%	-	6%	4%
Strongly disagree	1%	1	-	-	-	-	2%	-	3%	-
Sample Size	323	35	44	41	47	20	48	7	34	47

Table 9. Agreement with, "I will be able to implement at least one of these ideas in the next 6 months."

	Total %	Urban Ecosystems (Session 1)	Stormwater (Session 2)	Water Quality (Session 3)	Extreme Events (Session 4)	Public Health (Session 5)	Agriculture (Session 6)	Highways 101/61 (Session 7)	Community Water (Session 8)	Minneapolis & St. Paul (Session 9)
Strongly agree	12%	20%	12%	2%	6%	33%	7%	-	9%	15%
Agree	68%	64%	77%	37%	66%	53%	79%	100%	68%	73%
Disagree	20%	16%	12%	27%	28%	13%	14%	-	23%	12%
Strongly disagree	1%	-	-	2%	-	-	-	-	-	-
Sample Size	212	25	26	41	32	15	28	3	22	33

Attendees' Reflections on the 2013 Conference

Most respondents (94%, n=116) either agreed or strongly agreed with the statement, "I gained insights from this conference that will be useful to me moving forward on climate adaptation," (see Table 10).

Table 10. Agreement with, "I gained insights from this conference that will be useful to me moving forward on climate adaptation." (n=116)

	% of Respondents
Strongly agree	33%
Agree	61%
Not applicable: I am not in a position to act.	5%
Disagree	1%
Strongly disagree	-

Many respondents (86%) were able to network at the conference, ranking their agreement with the statement, "I made connections with others that will be useful to me moving forward on climate adaptation," as either agree or strongly agree (see Table 11).

Table 11. Agreement with, "I made connections with others that will be useful to me moving forward on climate adaptation." (n=113)

	% of Respondents
Strongly agree	21%
Agree	65%
Not applicable: I am not in a position to act.	9%
Disagree	5%
Strongly disagree	-

Attendees' Suggestions for Improvement

Attendees were asked, "How could the conference be improved if offered again?" Seventy-nine people responded, giving a wide array of suggestions (see Table 12). Almost one-third of the

respondents made suggestions about focusing on different aspects of climate change or specific topics that could be included in 2014 (29%). A little over a quarter of respondents (28%) made suggestions about improving the space where the conference is held, including suggestions to have the meetings all take place on one floor and in a larger space. The complete list of responses is included below the table.

Table 12. Attendees' Suggestions for Improvement $(n=79^*)$

% of Suggestions

Shift the conference focus, include other topics	29%
Venue-related, expanding conference size	28%
Change the way the conference is run	22%
Breaks and networking	14%
Improve, provide refreshment	11%
Diversify, Improve Speakers	9%
Change the conference length	5%
Expand the audience	4%
Non-specific positive comments	4%
Other	1%

^{*} Some respondents gave more than one kind of suggestion, so the percentages in this table add up to more than 100%.

"How could the conference be improved if offered again?" (n=79)

29% (23) Shift Conference Focus, Include Other Topics

- A breakout session on communicating climate change impacts to a lay audience is needed.
- Consider more climate effects elsewhere that will affect MN. E.G. migration, food quality and prices.
- Continue specific examples (successes, failures, lessons learned) of communities that are adapting.
- Deeper dive into BMP's in trees, equity.
- Did any speaker or panelist talk about adaptation? No- defining the problem over and over again.*

^{*}Some responses are included under multiple categories, because they suggested more than one way in which to improve the conference.

- Effect of irrigation (increase in use) on available H2O in [unintelligible] and increased need for agricultural irrigation in response to global climate.
- Elected leaders- state reps, senators. Find a youth engagement connection. How can volunteering service, Americorps, be leveraged to help implement resiliency with local communities?
- Expand the vision beyond tinkering with existing systems to changes that also impact mitigation.
- I think if wildlife impacts are considered, the conference might have more public appeal.
- I think it would be great if we spoke more on solutions and next steps. What are MSG's doing [unintelligible] thermal regimes, slowdown of storm water.
- Insurance- more! The costs are huge. More dry period definition, [unintelligible] of rainfall intensity/duration.
- It would be interesting to do a panel about the cross-section of government agencies and non-profits, how we support each other's efforts.
- More breakout sessions covering specific adaptation topics.*
- More ecological data, impact, solutions, less tech, less built-urban mind-set.
- More examples of innovative actions that public, private and governments can begin on.
- More nuts and bolts, less preaching to the choir.
- Networking time in the afternoon (before the end of the day when lots of people leave). What is the state legislature discussing re: cc adaptation?*
- The conference still had a focus on pandering to climate change deniers. That was a distraction. In this audience that is not an issue. Time would have been better used to talk about climate change adaptation techniques.
- The presentations could've included a greater diversity of people, lack economic strategy and social scientists. We are not talking about real issues of adaptation. This is an ecological issue and a social issue. I heard almost only economic risk management options.*
- The subject matter is very broad and difficult to follow at times. Attempt to narrow focus in breakout sessions in the afternoon even further.
- This conference did a good job of informing us about impact but could have done more on adaptation strategy and examples.
- Try to assess popular topics in advance and give more popular topics. Larger rooms, there was some standing room only.*
- Work together to show more ideas on how to adapt to climate change.*

28% (22) Venue-Related, Expanding Conference Size

- Afternoon break was crowded and poorly organized. Not everyone could get refreshments.*
- Allow more people to come, larger venue. Send out agenda to register ahead of time.
 Outreach to NGO's to include diverse perspective in presenters. This was hearing academia and LGU's but there's important work happening at the grassroots level.*
- AM break with some nutrition- fruit or juice. Coat check- was there one?*
- Better food with morning break. More space for afternoon breaks for increased traffic.*
- Build on today's success--enlarge the venue--I would like to bring a number of colleagues.*
- Change the venue --rooms were scattered up/down the stairs for lunchtime--have presenter speak in the same room, after lunch
- Different venue with less up and down flights of stairs.

- Expand room for more attendees, market it more, strongly to city council and public works department.*
- Larger rooms for break out sessions.
- Larger rooms. Offer in other parts of the state to reach more city leaders or offer city leader workshop.*
- Larger space. More break time, longer breaks.*
- Larger venue.
- Make it larger (and longer)--it appears that there is plenty of interest.*
- More room. Two days.*
- More space for breakouts.
- More space in the breakout rooms.
- One of the conference rooms was too small, but you already knew that.
- Please hold it in a place that does not have hideously uncomfortable seating, as was the case with this auditorium. It would also be nice to have breakouts in rooms with classroom tables, so we could easily take notes. The conference center on the U of M's St. Paul campus has these kinds of facilities.
- Seating in breakfast rooms, have adequate. Do not have a panel with 7 speakers! Most of conference one-way, stand and talk- need more interaction. Three afternoon sessions is a lot- overload.*
- Seats in auditorium were terrible.
- Try to assess popular topics in advance and give more popular topics. Larger rooms, there was some standing room only.*
- We're early in the game of Adaptation, but some talks on strategies rather than "what's happening" would be great. Overall, I think it was great and I look forward to seeing this conference grow in size, information, and impact in the coming years.*

22% (17) Change the Way the Conference is Run

- Allow more discussion during sessions -- maybe fewer sessions so can have more discussion.
- Allow more people to come, larger venue. Send out agenda to register ahead of time.
 Outreach to NGO's to include diverse perspective in presenters. This was hearing academia and LGU's but there's important work happening at the grassroots level.*
- Expand room for more attendees, market it more, strongly to city council and public works department.*
- Have a more diverse set of experts. Have more opportunities for participants to interact.*
- In the Q & A part of the first panel, there were so many questions I'd ask just one panelist to reply rather than most all of them.
- More breakout sessions covering specific adaptation topics.*
- More time for discussion.
- More time for lunch, it was rushed. Need to move people faster through the afternoon snack line. Start and end 30-60 minutes earlier.
- More time for the Q & A session with the panel.
- Paul Douglas took Bob Johnson's time, Paul should have had his own breakout session.
- Plan for more people!
- Seating in breakfast rooms, have adequate. Do not have a panel with 7 speakers! Most of conference one-way, stand and talk- need more interaction. Three afternoon sessions is a lot- overload.*
- Slow down the pace a little.

- Some time for small group discussion- harvesting wisdom of the community. If time seems too short to include, start with topic suggestions on lunch tables.
- Two breakouts, not three. More time for discussing.
- Web broadcast.
- Work together to show more ideas on how to adapt to climate change.*

14% (11) Breaks and Networking

- Add real coffee and more breaks and time to converse.*
- Break up the morning a little bit more.
- Larger space. More break time, longer breaks.*
- Maybe a networking session per topic, 5-10 topics. Attendee list?
- Mid-morning break.
- More networking time- some walking time.
- Need refreshment break in the morning -- before lunch.*
- Networking time in the afternoon (before the end of the day when lots of people leave). What is the state legislature discussing re: cc adaptation?*
- Opportunities more to meet other participants.
- Supply contact info of material info within agenda i.e. email addresses and website links.
- Timing: more breaks. Offer coffee to all.*

11% (9) Improve, Provide Refreshment

- Add real coffee and more breaks and time to converse.*
- Afternoon break was crowded and poorly organized. Not everyone could get refreshments.*
- AM break with some nutrition-fruit or juice. Coat check- was there one?*
- Better food with morning break. More space for afternoon breaks for increased traffic.*
- Coffee in the morning.
- Coffee!
- Lovely lunch but a bit heavy for sitting and listening all day.
- Need refreshment break in the morning -- before lunch.*
- Timing: more breaks. Offer coffee to all.*

9% (7) Diversify, Improve Speakers

- Have a more diverse set of experts. Have more opportunities for participants to interact *
- Include more business/partner insights, mayors or other leaders? Citizen groups?
- Include some economists! The issues raised include economic issues in almost all cases.
- Include tribes and business.
- Some speakers were very good presenters, others were terrible. Improve the average quality of presentations.*
- The presentations could've included a greater diversity of people, lack economic strategy and social scientists. We are not talking about real issues of adaptation. This is an ecological issue and a social issue. I heard almost only economic risk management options.*
- These presenters are mostly devices of the human element- bring in strong social science (sociology, anthropology, geography, psychology). They have a lot of wisdom about what all this means! The conference was too focused on top-down, centralized approaches to change (the planner, the academic perspective). Bring in the social movement people,

the activists, the people who are trying to save native wild rice in the face of climate change. This was a very white, upper middle-class, professional conference. How well does this reflect the Minnesota of today? Of 50 years from now?

5% (4) Change the Conference's Length

- Longer.
- It was very long for one day. Start earlier or split?
- Make it larger (and longer)--it appears that there is plenty of interest.*
- More room. Two days.*

4% (3) Expand the Audience

- Allow more people to come, larger venue. Send out agenda to register ahead of time.
 Outreach to NGO's to include diverse perspective in presenters. This was hearing academia and LGU's but there's important work happening at the grassroots level.*
- Build on today's success--enlarge the venue--I would like to bring a number of colleagues.*
- Larger rooms. Offer in other parts of the state to reach more city leaders or offer city leader workshop.*

4% (3) Non-Specific Positive Comments

- Excellent.
- No suggestion.
- Not sure really. It seems everything ran smoothly.

1% (1) Other

• Check sites like Resilience.org

Attendees' Additional Comments

We asked attendees if there was anything else that they would like to add. These comments tended to include praise for the conference and additional suggestions. In general, the same suggestion themes emerged (see Table 13). A complete list of their comments is included in the report below.

Table 13. Attendees' Additional Comments (n=69*)

% of Comments

Positive or neutral comments	43%
Shift the conference focus, include other topics	20%
Change the way the conference is run	17%
Diversify, Improve Speakers	6%
Expand the audience	4%
Improve, provide refreshment	3%
Venue-related, expanding conference size	1%
Breaks and networking	1%
Other	4%

^{*} Some respondents gave more than one kind of suggestion, so the percentages in this table add up to more than

"Anything else you would like to add?" (n=69*)

43% (30) Positive or Neutral Comments

- Awesome facilitators! Paul Douglas was intriguing.
- Excellent! Thanks for putting this on!
- Excellent.
- Good job.
- Good topics. Interesting.
- Good value for the price.
- Good variety of presentations, very interesting.
- Great conference and hope you continue! Paul Douglas is a good inspirational speaker mostly on mitigation though.
- Great conference!
- Great conference. Big thanks!
- Great conference. Congratulations to the planning team and conference organizers for a job well done. You hit the nail on the head.
- Great food! Thanks for all your work!*
- Great speakers, great info, do it again! Didn't attend breakout session 3 because, "needed to go for a walk! Too much sitting and not enough interactive opportunities".*
- Great topics, good food, free parking.

^{*}Some responses are included under multiple categories, because they suggested more than one way in which to improve the conference.

- Great!
- Lovely event. Thank you.
- None.
- Not at this time.
- Thank you for such a great conference!
- Thank you. [2]
- Thanks for history. Good presenters and very important info.
- Thanks for sponsoring.
- Thanks for the [unintelligible] line-up of speakers and for the affordable registration fee!
- Thanks so much for organizing this. You brought together [unintelligible] presentations offered at the conference/venue. Excellent.
- The talks and speakers were excellent.
- This is the best conference I've been to in years! Quality topics, quality speakers--great!
- This starts a useful [unintelligible] action. Much more holistic changes and adaptation are useful. Be bold.
- Very informative and well done. Thank you.
- Very nice lunch, well organized.

20% (14) Shift Conference Focus, Include Other Topics

- Add a cultural component. Human change.
- Bring in more private sector speakers and discuss impact on business climate and opportunities presented by climate change.*
- City of Victoria's political correctness added little to the discussion of watershed issues. Agriculture session was more of an agricultural update than about climate adaptation.
- For me it's important to talk about mitigation and adaptation together- to understand their relationship- and some of that was covered but it might be good to explicitly address at the introduction.
- How is MN positioned compared to other states? What will MN be like mid-century-Kansas City? Hotter? What are other cities/states doing that we could adopt?
 Opportunity for a day on a weekend for citizen participation?
- I would've loved a basic session on what causes climate change. I understand it began in agriculture. I believe people would be fascinated to know this and they would really use the intro.
- More focus on food system adaptation and health.
- More out of state MN info. There was some input from outside MSP, but I would like to see more
- More specific scenarios about what we face would have been helpful. We know it will be drier, wetter, etc... But what is the likelihood that we will run out of water? What do we do if the Salinas Valley goes dry? What does it mean?
- Needed much more focus on adaptation not just reporting of research and observation and discussion of the options and examples of adaptations/actions already taking place.
- Next conference, "Preparing Minnesotans for Climate Mitigation Activism". Much of the audience is looking deeper than the agenda.
- Require Ag session to address measures other than status quo. Ag practices (i.e. land conversion to Ag.) to help mitigate climate issues.
- Very government, academic, and local/state planner heavy! Where is the civil society in all of this? Environmental justice focus- this was completely missing!
- Yes: Focus on adaptation methods that also mitigate.

17% (12) Change the Way the Conference is Run

- Attendees list are appreciated. Copies of the slide presentations.*
- Don't need both dessert and mid-afternoon cookies (although both are delish). Great to have business people here, not just academic and local government. Have a carpool finder to get here?*
- Excellent job! Snack time should be positioned to let folks [wind?] down. Two sides of table to move faster.
- Great speakers, great info, do it again! Didn't attend breakout session 3 because, "needed to go for a walk! Too much sitting and not enough interactive opportunities".*
- Have an organization/company/government entity listed on name tags.
- More clear signs on where to go. With rooms it would be nice not to have to move around so much. Late speakers.
- Panel, good idea, too many panelists though. Evaluation scale needs a "neutral category".
 The afternoon breakout sessions were mostly updates. They did not often produce new ideas to implement, which is what this evaluation asks.
- Please offer coffee at breaks. Also, as the conference grows, perhaps having workshop sessions (at least a couple) that are interactive with everyone to discuss ideas. Take more advantage of all the experts in one place!*
- The panel was good but a little long--too many speakers led to not enough time for questions. Dragged on a little bit long. Paul Douglas--great speaker! Great job, great conference!
- Thank you for not doing "report back" type of format. Afternoon sessions didn't really connect climate change to their issues... and cause on adaptation strategies- most of that time was spent on general info and only a few minutes on how to adapt. Generally, the morning presentations were strong and lunch presentations, too. Thank you for organizing this.*
- Too much sitting and listening. Is this like a 1990's style conference? USDA guy in the Ag. Session was not a good speaker, and did not answer questions well.*
- Workshops should have been at 4:30 or 5:00.

6% (4) Diversify, Improve Speakers

- Bring in more private sector speakers and discuss impact on business climate and opportunities presented by climate change.*
- More of an effort to engage conservationists, business, students, educators, more people in the know.
- Some very good presenters and some not so good. Paul Douglas was great addition.
- Too much sitting and listening. Is this like a 1990's style conference? USDA guy in the Ag. Session was not a good speaker, and did not answer questions well.*

4% (3) Expand the Audience

- Invite law workers.
- It would be great to get policy makers (local and state) included.
- What can we do about lack of diversity? Geographic, ethnic, racial, age, income?

3% (2) Improve, Provide Refreshment

• Need to have water available outside of each room.

• Please offer coffee at breaks. Also, as the conference grows, perhaps having workshop sessions (at least a couple) that are interactive with everyone to discuss ideas. Take more advantage of all the experts in one place!*

1% (1) Venue-Related, Expanding Conference Size

• The chairs in the auditorium were very uncomfortable!

1% (1) Breaks and Networking

Attendees list are appreciated. Copies of the slide presentations.*

4% (3) Other

- Really need to think out-of-the-box to consider regional water volume and quality areas.
- There seemed to be a lot of preaching to the choir. It wasn't clear whether Minnesota's business leaders were present.
- Will there also be a climate change mitigation conference?

APPENDIX 1.

Attendees' Occupations

Complete List of Responses to, "What is your occupation?" (n=121)

60% (72) Government

- Administration manager.
- Administration.
- All Hazard planner. [2]
- Aquatic scientist. Limnologist.
- City planner.
- Civil engineer. [4]
- County enviro director.
- County Commissions.
- County manager.
- Director, Environmental Management.
- DNR invasive species specialist.
- Ecologist. [2]
- Emerg. Management, Mitigation.
- Emergency preparedness.
- Engineer.
- Engineer. (Drinking water and surface water)
- Environmental consultant.*
- Environmental Specialist.
- Environmental health.
- Environmental planner. [4]
- Environmental policy.
- Environmental programs planner.
- Environmental protection.
- Environmental quality.
- Environmentalist.
- Facility project manager.
- Government MPCA.
- Hazard Mitigation Planner.
- Hydro-geologist.
- Hydrologist.
- Hvdrology.
- Hydrologist (storm water).
- Industrial stormwater program coordinator.
- Manager.
- Mid-level manager. Scientist.
- Natural resource manager.
- Natural resource manager.
- Non-traditional educator.
- Planner--focused on groundwater.
- Planner, Washington County Dept. of Public Health and Environment.
- Planner. [2]

- Policy analyst.
- Policy director.
- Policy.
- Principal Engineer.
- Program coordinator.
- Program manager.
- Public health manager.
- Public servant.
- Research and Development.
- Retired prof of Biology. Social Justice. Conservation District Supervisor.*
- Scientist. [2]
- Scientist/project manager.
- Senior advisor to governor.
- State environmental planner.
- Student intern.
- Sustainability Intern.
- Sustainability Spec.
- SWCD supervisor.*
- Water quality specialist.
- Water quality.
- Water researcher.

18% (22) Education

- Administrator.
- Associate program director extension.
- College professor.
- Eco design.*
- Education Consultant.
- Educator.
- Extension education.
- Landscape Architect.*
- Professor of biology.
- Professor. [2]
- Program director, education.
- Public health.
- Research and education.
- Retired agricultural economist.
- Retired prof of Biology. Social Justice. Conservation District Supervisor.*
- Scientist/educator.
- SWCD supervisor.*
- Teacher/scientist.
- U of M Extension program director.
- U of M staff.
- Water gardener volunteer.

10% (12) Non-profit

• Director.

- Energy policy.
- Environmental consultant.*
- Land conservation.
- Mental health professional.
- Outreach and volunteer coordinator.
- Policy associate of fresh energy.
- Program coordinator.
- Project administrator. Consultant.*
- Research.
- Senior manager.
- SWCD supervisor.*

9% (11) Self-employed

- Architect.
- Conservation ecologist.
- Consultant.
- Eclectic.
- Eco design.*
- Farmer. [2]
- Freelance writer.
- Project administrator. Consultant.*
- Self-employed tree consultant.
- SWCD supervisor.*

7% (8) Business

- Eco design.*
- Environmental consultant.*
- Landscape Architect.*
- Marketing.
- Metal fabrication.
- Property portfolio Manager.
- Retired farmer. Insurance underwriter. Master gardener.
- Scientist (Environmental Consultant).

5% (6) Other

- Architectural landscape designer.
- Consulting engineer. Government and private clients.
- Environmental advocate.
- Research scientist.
- Retired. Master naturalist.
- Retired.

2% (3) Those that did not select a job field category

- Mortgage servicing.
- Retired. [2]

APPENDIX 2.

Hearing about the 2013 Conference

Complete List of Responses to, "How did you learn about the conference?" (n=120*)

*Some attendees' comments included more than one kind of method of learning about the conference. These comments are followed by an asterisk and appear below multiple categories.

48% (57) Email, list-serve, e-newsletter

- Another event; email list.*
- Climate group list-serve.
- E-blast.
- Email from staff.
- Email list.
- Email--climate adaptation workgroup.
- Email. [33]
- Email. Pat Hamilton.*
- Email. Word of mouth.*
- Freshwater Society/Water Resources Email.
- List-serve. [2]
- Mark Seeley weekly newsletter.
- Master gardener list-serve.
- MRWRS mailing list.
- Non-profit email list-serve.
- Online list-serve.
- Postcard. Email.*
- U of M email. [4]
- Web list serve.
- WRC Email list-serve.

38% (45) Colleagues, Organizations, and the Minnesota Climate Adaptation Partnership

- Asked to speak.
- Barb Loukinnen.
- CAP. [3]
- Climate adaption workgroup.
- Co-worker. [2]
- Colleague. [6]
- Conference planning member.
- Email. Pat Hamilton.*
- Faye Sleeper.
- Fellow employee.
- Greg Spoden, DNR. [2]
- Helped plan it.
- ICAT.
- J. Drake Hamilta.
- Master gardener program.
- Master gardeners.
- MDH. [2]

- MNDOT.
- MOH staff member.
- MPCA.
- Phil Musserig.
- Planning committee. [2]
- Science Museum of MN.
- Supervisor. [2]
- Saint Paul Ramsey County Public Health.
- Through MN ICAT.
- Work. [4]
- U of M extension announcement.
- U of M Extension resources.
- U of M Extension Sustainable Partnership.

5% (6) Word of mouth

- Email. Word of mouth.*
- Wife.
- Word of mouth. [4]

5% (6) News Sources

- MNAT website, pioneer press.*
- MPR. [3]
- NPR.
- Web search. News.*

3% (4) Websites

- Google search.
- MNAT website, pioneer press.*
- Paul Douglas weather blog.
- U of M Master Nat. website.

7% (8) Other

- An earlier talk by Dr. Seeley.
- Another event; email list.*
- Mark Seeley presentations to MCP2A.
- Mark Seely.
- Not sure.
- Postcard. [2]
- Postcard. Email.*

APPENDIX 3.

Complete Percentages from Feedback on Morning Presentations

"Have you previously attended a presentation by either Mark Seeley or Peter Snyder? (n=126)"

- "Yes" = 61% (n=77)
- "No" = 37% (n=47)
- "I'm not sure" = 2% (n=2)

Table A. Agreement with, "The presentations by Mark Seeley and Peter Snyder provided me with a better understanding of climate change in Minnesota." (n=125)

% of Respondents

Strongly agree	52%
Agree	47%
Disagree	1%
Strongly disagree	-

Table B. Agreement with, "The panelists' presentations helped me to think more broadly and deeply about the implications of climate change." (n=122)

% of Respondents

Strongly agree	48%
Agree	50%
Disagree	2%
Strongly disagree	-

Appendix 4.

Breakout Session Numbers

Table D. Agreement with, "The session gave me some new information."

	Total	Urban Ecosystems (Session 1)	Stormwater (Session 2)	Water Quality (Session 3)	Extreme Events (Session 4)	Public Health (Session 5)	Agriculture (Session 6)	Highways 101/61 (Session 7)	Community Water (Session 8)	Minneapolis & St. Paul (Session 9)
Strongly agree	103	11	20	16	8	7	7	4	15	15
Agree	202	23	22	25	36	13	33	4	16	30
Disagree	14	1	2	-	1	-	7	-	2	1
Strongly disagree	2	-	-	-	-	-	1	-	1	-
Sample Size	321	35	44	41	45	20	48	8	34	46

Table E. Agreement with, "The session gave me some ideas for further action."

	Total	Urban Ecosystems (Session 1)	Stormwater (Session 2)	Water Quality (Session 3)	Extreme Events (Session 4)	Public Health (Session 5)	Agriculture (Session 6)	Highways 101/61 (Session 7)	Community Water (Session 8)	Minneapolis & St. Paul (Session 9)
Strongly agree	47	10	8	2	5	5	2	1	4	10
Agree	176	18	20	29	28	11	26	2	19	23
Not Applicable: I am not in a position to act	80	6	12	8	13	3	14	4	8	12
Disagree	18	1	4	2	1	1	5	-	2	2
Strongly disagree	2	-	-	-	-	-	1	-	1	-
Sample Size	323	35	44	41	47	20	48	7	34	47

Table F. Agreement with, "I will be able to implement at least one of these ideas in the next 6 months."

	Total	Urban Ecosystems (Session 1)	Stormwater (Session 2)	Water Quality (Session 3)	Extreme Events (Session 4)	Public Health (Session 5)	Agriculture (Session 6)	Highways 101/61 (Session 7)	Community Water (Session 8)	Minneapolis & St. Paul (Session 9)
Strongly agree	25	5	3	1	2	5	2	-	2	5
Agree	144	16	20	15	21	8	22	3	15	24
Disagree	42	4	3	11	9	2	4	-	5	4
Strongly disagree	1	-	-	1	-	-	-	-	-	-
Sample Size	212	25	26	41	32	15	28	3	22	33