

BEST PRACTICE AREA 12: SUSTAINABILITY EDUCATION

Vision

Sustainability education generates a shared understanding of sustainability, vision, action planning and engagement among all citizens. The Joint Planning District builds on its existing stewardship ethic to engage the entire community in sustainability efforts.

Background

According to the United Nations Agenda 21 approved by the U.S. and all the other 177 countries attending the U.N. Conference on Environment and Development:

“Education is critical for promoting sustainable development and improving the capacity of the people to address environment and development issues...Both formal and non-formal education are indispensable to changing people's attitudes so that they have the capacity to assess and address their sustainable development concerns. It is also critical for achieving environmental and ethical awareness, values and attitudes, skills and behavior consistent with sustainable development and for effective public participation in decision-making. To be effective, environment and development education should deal with the dynamics of both the physical/biological and socio-economic environment and human (which may include spiritual) development, should be integrated in all disciplines, and should employ formal and non-formal methods and effective means of communication”

To underscore the need for sustainability education, the United Nations General Assembly declared 2005-2014 as the UN Decade of Education for Sustainable Development.

The Third Minnesota Report Card on Environmental Literacy documents the results of the third statewide survey concerning environmental literacy of adults in Minnesota conducted in 2007. It found that only about 40% of Minnesota adults believe that they are knowledgeable about environmental issues and problems. Almost 38% of the state's adults have a below-average level of knowledge about the environment. While 44% of people thought they were knowledgeable about energy issues, only 13% actually earned an A or B (five out of five correct or four out of five correct respectively) on energy knowledge. And fully one-third (33%) earned a failing grade (0-1 questions correct), and 31% only answered two questions correctly. The vast majority of Minnesotans (93%) wanted schools to provide environmental education.





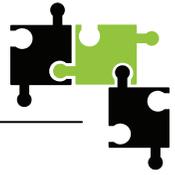
Goals

- A. Create a shared understanding of sustainability in public and private K-12 schools, vocational schools, colleges, universities and other higher education institutions, government agencies, businesses, faith organizations, service organizations, foundations and other non-profits that includes learning by practice and hands on activities.
- B. Create a vibrant web presence for this sustainability effort.
- C. Utilize traditional and new media (e.g., TV, web, newspapers) to distribute creative, informative and impactful messages and stories about sustainability that will create broad public support for sustainability among opinion leaders and the public.
- D. Develop a coordinated creative media and public information campaign that is both broad-based and targeted to specific groups to build awareness, generate broad support for sustainability and motivate groups to become active.
- E. Encourage every public, private and non-profit institution in the Joint Planning District to make a commitment to sustainability and develop a public sustainability vision, baseline assessment, goals, action plan, metrics and annual report.
- F. Set practical, measureable community-wide sustainability goals and indicators which are widely publicized and incorporated into a public annual report.
- G. Create an annual sustainability recognition and award program that recognizes individuals and institutions in every sector at an annual community-wide sustainability celebration.
- H. Identify the best examples of sustainability in every sector and offer tours and information about their practices.
- I. Create an area-wide sustainability leadership team made up of leaders from the public, private and non-profit sectors to help coordinate on-going sustainability efforts in the community.
- J. Develop and enhance green jobs training and economic development programs to utilize current and innovative technologies and maintain certifications for the local work force.

Initiatives and Action Steps

The following three initiatives for initial action were identified through public input and reflect local stakeholders' views of which goals would have the most profound effect on moving the Joint Planning District toward sustainability. Sustainability education offers perhaps the best “bang for the buck” in terms of taking steps toward sustainability and can provide other benefits, such as helping to build the community and save money for business, government and homeowners. These three were selected because it was felt that





government must walk the walk if it's going to ask others to do the same. It was then felt that it was important to have community-wide sustainability education because approximately 95% of a community's energy use and greenhouse gas impact comes from business, citizens and the community. Third, there is a focus on educational institutions because of the significance of their role in education, as well as the environmental impact of their operations

1. **Municipalities Educating Themselves to Practice What They Preach:** Individual City and County Sustainability Education and Commitment.

- a. Individual City and County Sustainability Education, Baseline Assessment, Visioning and Action Planning – This is perhaps the most important step each governmental unit can take in becoming sustainable.
 - i. First Workshop on Sustainability and NSF for Each City and County's Leaders – This is a critical opportunity for the leadership of each governmental unit to come together to all be on the same page and develop a shared understanding of sustainability, as well as a sustainability assessment, vision, and action plan. It also would allow the leadership to assess the value of utilizing the NSF as a tool for use throughout the government and community. The leadership should include elected officials, department heads and public commissions/boards.
 - ii. The first half of the 7-hour workshop examines sustainability, the sustainability tipping point, a summary overview of the NSF, visioning, the story and purpose of the NSF, systems thinking, the science of the NSF, practical examples of the four principles of the NSF, and an easy, re-enforcing baseline assessment homework exercise. The second half of the workshop addresses questions and challenges, the homework assignment, a deepened understanding of sustainability, who's using the NSF, the benefits, case studies, small working groups (based on operating teams) doing the B-C-D process, group reports, next steps and evaluation.
 - iii. The result is that the leaders will have a shared understanding of challenges and opportunities, with each working group having completed a preliminary assessment, overall vision and first steps in an action plan for their specific area. They'll know which items are easily implemented, inexpensive low-hanging fruit and those having a longer-term payback that will require budgeting or a capital investment. A discussion can then be held about how to integrate and prioritize those actions within and across departments.
 - iv. NSF Presentations for All City/County Staff and Commission Members – One and a half hour presentations on Sustainability and the Natural Step

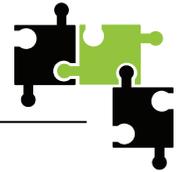




Framework would be conducted that would reach the rest of the city/county staff and commission members. This would build the basic understanding of sustainability and the NSF in a way that would engage the entire city/county and encourage them to be actively involved in the implementation. This is a critical element in the NSF's bottom-up approach and will help create the sustainability tipping point in each governmental unit. It will almost immediately pay for itself in terms of aligned teams, employee energy and retention, creative solutions by line workers, incorporation of the NSF in the staff's homes, schools and congregations, and more active community participation. There is no limit to how many participants there could be in any session.

- v. Department Meetings – Each department would have a meeting where they would do their own departmental baseline analysis, create a vision and develop their action plan. This work will then be integrated in the larger plan.
 - vi. City or County Sustainability Action Planning Meeting – This meeting will allow each city or county to integrate all of the baseline assessments, visions and action plans, while encouraging prioritization and integration across departments. It would incorporate input from the staff in each department and develop an integrated vision and action plan for the City/county.
 - vii. Ongoing Staff Sustainability Education – Sustainability education should be offered in various forms to city/county staff to deepen their knowledge on various aspects of sustainability. This could be done through presentations at staff meetings, lunch time brown bags and videos, online learning, study circles of books and case studies, and newsletter articles.
 - viii. Train-the-Trainer Program – The City/county should conduct a Sustainability and NSF Train-the-Trainer Program for interested city/county staff so that Governmental unit will have its own set of trainers to work with new employees and community groups.
 - ix. New Staff Orientation – All new city/county staff should go through an introductory session on sustainability and the Natural Step Framework led by the city/county of governmental unit trainers.
- b. City or County Sustainability Resolution – Once the city or county leadership has fully experienced the NSF, they have the opportunity to make a public statement about the city or county's commitment to sustainability. They can pass a resolution stating that governmental unit will utilize the NSF as its guide to sustainability and develop a sustainability action plan. They would then become one of the first eco-municipalities in Minnesota and part of a larger national movement.





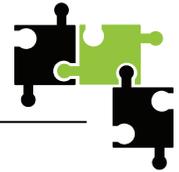
- c. City or County of Sustainability Coordinator – The city or county should either create a new part-time position of Sustainability Coordinator or shift an existing staff person responsibilities (or perhaps two people to co-coordinate) so they can coordinate the city or county’s sustainability efforts with the Sustainability Team, City Council/County Board, departments, commissions and a public Sustainability Commission. It is essential to have someone (or two people) serve as the point person for sustainability efforts and facilitate the Sustainability Team. In addition, they would provide sustainability resources to city/county staff, commissions and the public. The coordinator should have strong organizing, communication and facilitating skills, as well as knowledge about sustainability.
- d. City or County Sustainability Team – The city/county should have a Sustainability Team to include a representative from each department and hold monthly or bi-monthly meetings to regularly discuss the progress each department is making in implementing its sustainability action plan. The departmental representative would serve a two-way role of sharing information with their department and bringing departmental discussions to the Sustainability Team. The meetings would be facilitated by the Sustainability Coordinator.
- e. City or County Sustainability Commission – The city or county should establish a Sustainability Commission composed of community members that would work in conjunction with the Sustainability Team and regional effort to get public input and review the sustainability plan and ongoing efforts. The Sustainability Coordinator would staff the Commission.
- f. Draft City/County Sustainability Plan – The Sustainability Team should take the departmental plans and integrate them into a proposed city or county sustainability plan and coordinate with the regional effort.
- g. Public Comment on the Sustainability Plan – The City Council or County Board, Sustainability Team and Sustainability Commission should conduct at least one public presentation to get public comments on the proposed sustainability plan. That input would then be reviewed by the Sustainability Team and approved by the City Council or County Board.
- h. Publication of Sustainability Plan – The Sustainability Plan and sustainability indicators should be posted on the website and promoted to the staff and public. A short version of the key goals should be printed and widely disseminated.
- i. Ongoing Staff Communication – An internal city/county sustainability list serve should be created for anyone within the city/county to easily share ideas, challenges and questions.





- j. Quarterly Departmental Sustainability Reporting – Each department should prepare a quarterly electronic report on its progress in implementing its sustainability action plan. This report would be disseminated to the City Council/County Board, Sustainability Team, and Sustainability Commission, as well as to city/county employees through e-newsletters and to the public through website postings and the City/county’s newsletter.
- k. Incorporation of Sustainability into Job Descriptions, Work Plan and Performance Reviews – Sustainability should be incorporated into each staff member’s job description and work plan. It should then be made part of their annual performance review.
- l. Sustainability Accounting System – The city or county should establish an accounting system that can track the costs and savings as well as key sustainability indicators by department from implementing the sustainability plan.
- m. Ongoing Public Relations – Creative, engaging and inspiring stories should be written up and widely publicized on the website, newsletter, social media, news releases and posting at City Hall/County Seat about all the creative ways that employees have been sustainable.
- n. Suggestions for Continual Improvement – An atmosphere of openness should be created for getting employee ideas on sustainability, including time at staff meetings and a suggestion box (including anonymous suggestions) at City Hall/County Seat that will be reviewed.
- o. Annual Anonymous Employee Survey – To assure that departments are responding to employee concerns and to measure the overall attitudes of employees, an annual anonymous employee survey should be conducted by the Sustainability Coordinator in conjunction with City/County management.
- p. Sustainability Indicators – The Sustainability Team, in conjunction with the Sustainability Commission (as well as the Minnesota Technical Advisory Panel and Sustainability Corps), should develop a set of key sustainability indicators that can be tracked over time to monitor the city/county’s progress in achieving its goals and becoming sustainable. There should be a process for engaging community leaders and the public with final approval by the City Council or County Board.
- q. Annual Sustainability Report and Review– The Sustainability Coordinator and Team will be responsible for creating an annual report describing the progress in meeting the goals and objectives specified in the Sustainability Plan. The report will summarize the costs and savings by department from the sustainability plan, as well as progress in meeting the sustainability indicators. This should be posted on the website and widely disseminated to the City Council or County Board, staff and the





- public. The City Council/County Board should review the Annual Sustainability Report and give their comments and approval.
- r. Annual Celebration and Awards – Based on the results in meeting the plan, there should be a fun, informative annual celebration for the staff with awards given to all those departments and individuals that meet their goals. In addition, awards should be given to everyone who has commuted to work by walking, biking, public transit or car pooling.
 - s. Annual Sustainability Planning – A process should be conducted whereby each department reviews and updates its plans for the coming year and then shares them with the Sustainability Team where they are reviewed and coordinated. The recommended plan would then be reviewed by the City Council or County Board and their comments brought back to the Sustainability Team for modifications and preparation of the final plan with approval by the City Council or County Board.
 - t. Local, Regional, National and International Networking – The City or County should become an active partner in various municipality sustainability efforts at all levels in order to learn about and share best practices. This would include the Alliance for Sustainability’s Sustainable Community Network, the North American Eco-Municipality Network and ICLEI. It should also encourage department heads (Public Works, Finance, HR, Planning, etc.) to be active in their respective professional group’s sub-group or committee to learn about sustainability practices that are specific to their field.
 - u. Seek Sustainability Awards – The City or County should seek awards, ratings and public acknowledgement in its efforts to become sustainable, both to increase the pride of staff and officials, as well as the public. This will also be important in establishing the city or county as a national sustainability leader, which will help draw business and increased funding. Some of the awards and acknowledgement will include the MN Environmental Initiative Awards, the Governors Pollution Prevention Awards and Sustainlane ratings.
 - v. Review of City or County Ordinances and Create a Unified Development Ordinance (UDO) - A review should be conducted of all city/county ordinances to determine whether they contribute to, or conflict with, sustainability and the NSF. Many communities have numerous conventional development ordinances that they have revised and updated over the years. As a result, often the ordinances gradually become uncoordinated, outdated, and inconsistent. A UDO takes all the pertinent development ordinances in the city/county (zoning, subdivision, wetlands, storm water management, etc.) and integrates them into a single, unified ordinance. The creation of a UDO would allow the city/county to develop an overarching or “systems” approach to integrating sustainability into the development process,





which is far more efficient and effective than a “silo” approach to development where each development ordinance tries to address sustainability issues separately. It overcomes a piecemeal approach and thereby saves money and creates a more consistent approach that reflects the city/county’s sustainability values.

2. **Upping the Community Sustainability IQ:** Community Sustainability Education and Commitment

- a. Community-wide Sustainability and NSF Education, Assessment Visioning and Action Planning – Once the city/county has passed a Sustainability Resolution, it’s important to expand the efforts to reach key community leaders and institutions.
 - i. Community Leader Workshop on Sustainability and NSF – Using a format similar to the city and county NSF Workshop, there would be a two evening workshop on Sustainability and the Natural Step Framework for community leaders (and any city/county staff who were not able to participate in the earlier workshops or wanted to develop a deeper understanding than just the introductory presentation). The community participants that would be invited would be the leadership of the Chamber of Commerce, Rotary and other service clubs, congregations, healthcare institutions, nonprofits, and community groups. This will play an important role in building a solid base of support for the city or county’s sustainability initiatives among county and other key opinion leaders, as well as encouraging the adoption of the NSF by institutions ranging from leading businesses and service organizations to hospitals and non-profits.
 - ii. NSF Presentations for Community Leaders and Citizens – One and a half hour presentations on Sustainability and the Natural Step Framework would be conducted to reach other community leaders and citizens. This would build the basic understanding of sustainability and the NSF in a way that would inspire and engage the entire community and encourage them to live a sustainable lifestyle and be actively involved in the implementation. This will further the NSF’s bottom-up approach and will help create the sustainability tipping point in the city or county.
 - iii. Community Leader NSF Sustainability Action Planning – This meeting would provide the opportunity for a broad array of community leaders to develop an action plan for their institution. This will be an inspiring and interconnecting session that will help create the tipping point for sustainability in the community.
 - iv. Public Community Workshops on Sustainability and NSF – Using a format similar to the city or county’s NSF Workshop, there would be full Sustainability





and NSF workshops for businesses, service organizations, healthcare, congregations, neighborhood groups, nonprofits and the public to educate them and support them in developing their own sustainability visions and action plans. This will play an important role in broadening the base of support for the city/county's plan and engaging all community institutions.

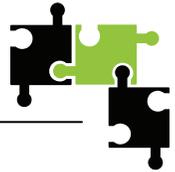
- v. Public Community NSF Sustainability Action Planning – Public action planning would be held for the public community participants to work on developing their institution's action plans. In addition to this being an inspiring experience, it will build collaboration between groups and play a major role in moving all of the community towards sustainability, create a network of groups and build political support for it.
- b. Community Sustainability Plan – Every business, school, nonprofit and other Government organization will be encouraged to submit their sustainability plan to the Sustainability Commission and have it published as part of a Community Sustainability Plan that will be widely publicized on the website and newsletter.
- c. Ongoing Public Relations – Creative, engaging and inspiring stories should be written up and widely publicized on the website, newsletter, social media, news releases and posting at City Hall/County Seat about all the creative ways that organizations and citizens have been sustainable.
- d. Annual Sustainability Report and Review– The Sustainability Commission will create an annual report describing the progress made by businesses, schools, congregations and organizations in meeting the goals of their sustainability plans. The report will also seek to summarize the costs and savings by each organization. This should be posted on the website and widely disseminated to the City Council/County Board, staff and the public.
- e. Annual Community Sustainability Celebration and Awards – Based on the results in meeting each institution's sustainability plan, there should be a fun, informative annual celebration for businesses and community groups recognizing and awarding all those who meet their goals. In addition, there should be some individual awards recognizing individuals who've done the most to bring about sustainability or lead a sustainable life.
- f. Early Adopters Group – The city/county should encourage the creation of an Early Adopter's Group that would be made up of businesses, schools and community groups that have committed to using the NSF and developed an action plan. They would hold regular meetings to further their efforts and encourage peer-to-peer learning. The participants would be publicly recognized by the city or county on the website, through news releases and in the newsletter.





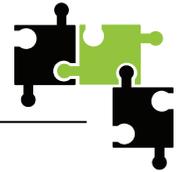
- g. Ongoing Networking and Communication – There should be an email list serve and facilitated quarterly meetings of community groups to continue to share new ideas and support each other in becoming sustainable.
 - h. Ongoing Community Sustainability Education – The city or county should utilize a range of fun, positive and informative approaches for continuing to educate and engage the public in its sustainability initiatives, including: website, emails, cable television, newsletter, sustainability and NSF Study Circles (groups that would meet monthly to see videos or read resources like *The Natural Step for Communities*), contests (like school art), and public events.
 - i. Annual Sustainability Planning – A process should be conducted whereby each community institution should be encouraged to review and update its plans for the coming year and then share them with the Sustainability Commission.
 - j. Sustainability Expo - Hold an expo day, similar to the Living Green Expo, and provide tours of renewable energy sites and education from volunteers from local colleges and universities.
 - k. Model Sustainability Site - Establish a fully-sustainable example site with sustainable water use, tree planting, etc.
3. **Education for Our Future and Present:** Provide Sustainability Education within Every Academic Institution
- a. Leadership Training on Sustainability and the Natural Step Framework (NSF) – Provide a one-day or two half-day training on Sustainability and the NSF for the leadership (administrators, facilities staff, teachers and/or Board members) of all public and private K-12 schools, vocational schools, colleges, universities and other higher education institutions. Hopefully, at least three people would come from each institution. It would include an institutional baseline assessment, vision and sustainability action plan. This will provide a shared understanding and commitment to sustainability, as well as an assessment of the value of the approach and a strategy for their individual institution.
 - i. Individual Academic Institution Training on Sustainability and the NSF – With each academic institution, provide a one-day or two half-day training on Sustainability and the NSF for all department heads and interested teachers, staff, administrators and Board members. In the case of high schools and higher education, student leadership would also be invited. Each institution will develop its own baseline assessment, vision and sustainability action plan. This will create a full commitment to sustainability within the institution.
 - ii. Sustainability Presentations Within Each Institution – Provide a one and a half hour presentation on Sustainability and the NSF for all teachers, staff and





- administrators within each academic institution. This will build broad-based support, excitement and commitment within the institution.
- iii. Create a Sustainability Team Within Each Institution – Once the training and sustainability presentations are completed within each institution, a Sustainability Team should be created with representatives from each department of the institution, as well as students in the case of junior high, high school and post-secondary institutions. The team will meet monthly or bi-monthly to finalize the sustainability plan and discuss progress with implementation. Representatives will both solicit ideas and feedback from their department for the Team and share progress and recommendations from the Team with their department.
 - iv. Sustainability Presentations for Parents at Each K-12 Institution – Each K-12 institution will have a one and a half hour presentation on Sustainability and the NSF for all parents and interested community members. The institution’s sustainability plan will be shared and feedback given. This will build broad-based support, excitement and commitment from the parents for the initiatives.
 - v. Sustainability Presentations for Students at Each K-12 Institution – Each K-12 institution will have a school-wide 40-60 minute presentation on Sustainability and the NSF for all students. This will create awareness and support for sustainability.
 - vi. Sustainability Presentations for Students at Each Post-Secondary Institution – Each higher level academic institution will have several one and a half hour presentations on Sustainability and the NSF for all students. The institution’s sustainability plan will be shared and feedback given. This will build broad-based support, excitement and commitment from the students for the initiatives.
- b. Inclusion of Sustainability in the Curriculum – Each institution should examine what is the best way to incorporate sustainability into its curriculum.
 - c. Public Measures of Sustainability – Each institution should develop easily acquired, informative metrics and indicators for measuring and reporting its progress in moving towards sustainability.
 - d. Earth Month Activities – Each institution should utilize Earth Month to conduct sustainability education and action projects in the community.
 - e. Sustainability Handout – There should be a fun, informative handout describing policies, actions and expectations for sustainability within the institution. It should be



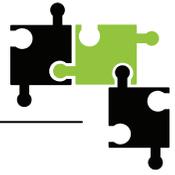


posted on the website and given electronically to all staff, teachers, administrators, parents and students.

- f. Sustainability at Orientation – At orientation each year there should be a discussion about the expectations and goals for sustainability. The sustainability handout should be included in any orientation materials.
- g. Sustainability Awards and Celebration – There should be a fun, informative annual celebration recognizing the accomplishments of individuals and groups who've done the most to bring about sustainability.
- h. Sustainability Communications - Creative, engaging and inspiring stories should be written up and widely publicized for posting on the website and in newsletter, bulletins, social media and news releases about all the creative ways people and groups have been sustainable.
- i. Sustainability in Staff/Teacher Job Description, Evaluation and Review - Sustainability should be incorporated into each staff member's job description and work plan. It should then be made part of their annual performance review.
- j. Sustainability Educational Signage – Creative, fun and engaging sustainability educational signage should be created for electronic kiosks and physical signs in the classrooms, food service area, restrooms and entrance to academic institutions.
- k. Sustainability Demonstration – Every school should have an organic garden, greenhouse and composting area.
- l. Sustainability Club – Sustainability Clubs should be encouraged with membership in YEA MN! (Youth Environmental Activists Minnesota).
- m. Minnesota Energy Challenge – Encourage schools to compete as part of the Minnesota Energy Challenge and do a carbon footprint analysis.
- n. College Sustainability Scholarships – Offer sustainability grants & scholarships for college.
- o. Expand the Adopt-a-Block Program – Expand the St. Cloud State student volunteer Adopt-a-Block program where they help the neighborhood with sustainability, including clean up.
- p. Green Buildings – Assure that all new academic buildings are green.

General Actions





The following general actions have been identified as additional possible steps to allow the Joint Planning District to move toward the goals for this Best Practice Area that were not selected as “initiatives” above.

- I. Provide experientially-based education for young people.
- II. All technical colleges should have green buildings.
- III. Offer internships for students to work on sustainability education.
- IV. Provide practical, hands on education for food growing, preservation and composting.
- V. Create awareness for students about where their food comes from and provide information about healthy, sustainable food and the impacts of certain foods, including dairy and meats as well as some practices, like pesticides.
- VI. Have people understand the benefits of sustainability and why products sometimes cost more.
- VII. Have businesses (especially polluters) fund local sustainability education initiatives.
- VIII. Provide residential education on water reuse/recycle.
- IX. Have local composting sites and encourage homeowner composting.
- X. Create a tax on plastic bags and take-out containers to create awareness of their real costs and encourage reusable and biodegradable containers.
- XI. Provide complete transparency on how tax money is being used.
- XII. Have education days with events like the Living Green Expo and tours of renewable energy and with CMBA.
- XIII. Have Earth Month activities that move from clean up to sustainability and include workshops and tours.
- XIV. Have a model, fully integrated sustainability site that can serve as a good example of how people can deal with everything from growing food to water collection.
- XV. Provide information on how to “update” an older home so each person can get guidance and doesn’t have to start from scratch or “the ground up”.
- XVI. Work with Habitat for Humanity to address sustainability, including people’s yards.
- XVII. Have Natural Step Framework study circles to engage and educate the community.
- XVIII. Encourage thinking about full costs of items or projects over their entire lifetime and show the sustainability economic savings and benefits.
- XIX. Have the Mayor mention progress on sustainability and goals in the State of the City.

