



JUNEAU COMMISSION ON SUSTAINABILITY ANNUAL REPORT JUNE 2018 - MAY 2019

This report summarizes the activities of the Juneau Commission on Sustainability from June 2018 through May 2019.

HIGHLIGHTS

- Recommended that Assembly adopt a 2019 goal of implementing the Juneau Renewable Energy Strategy (JRES).
- Supported the JRES goal of developing a CBJ Energy Management Program. Provided information and discussed options with CBJ staff. Assisted CBJ Engineering and Public Works with technical and public support letters for the US DOT Low-No Grant and VW Emissions grant initiatives for Capital Transit electric bus funding.
- Supported the JRES space heating goal. Convened groups and provided the lead for developing the collaborative Juneau Heat Pump Conversion Project, with 2 JCOS members participating on the steering committee. Met with the Building Code Advisory Committee to discuss updates to energy codes.
- Supported the JRES transportation goal. Initiated development of a community EV support plan. Held two Sustainability Sessions (June 19, 2018, July 17, 2018) and additional public outreach on Electric Vehicles and CBJ Public Charging Station policy/proposed ordinance. Developed detailed Electric Vehicle information for the Juneau public and Assembly review.
- Participated in review of livestock ordinance (originally initiated by JCOS and public Food Security Sustainability Sessions) by Planning Commission subcommittee.
- Conducted two Visitor Industry Sustainability Sessions (January 29, 2019, and April 18, 2019) from DEC staff and another from cruise industry executives on emissions and visitor industry sustainability.
- Assisted CBJ Manager's Office in drafting a letter to National Forest Service regarding support for Mendenhall Glacier Visitor Center improvements.
- Provided detailed research and Dock Electrification background report (on JCOS

website) which assisted the Assembly in deliberating on Dock Electrification design efforts from Marine Passenger Fees in April 2019.

- Initiated efforts and developed a new, more informative JCOS website for Juneau Community Sustainability issues in a year-long process in a beta format. The new JCOS website is now live. <https://beta.juneau.org/community-development/jcos>
- Provided recommendation to City Manager regarding Leadership in Energy and Environmental Design (LEED) building requirements for the Juneau International Airport North Wing reconstruction. Work included research on the history of the CBJ's LEED Ordinance and background, analyzed situation and Airport request for waiver. Met with Airport Managers and Airport Board on the Airport's request for exemption of LEED requirements for airport expansion to work through these issues.
- Initiated and collaborated with UAS to assist CBJ in updating Sustainability Indicators from 2007, Climate Change: Predicted Impacts on Juneau.
- Participated in the 'Blueprint Downtown Visioning' project public meetings.
- Provided recommendations on CIP projects for FY2020-2026 to further the delivery of community goals and strategies as outlined in the Juneau Renewable Energy Strategy (JRES) and the Juneau Climate Action and Implementation Plan (JCAIP).

2019 PRIORITIES BY COMMITTEE

Outreach Committee - Christine Woll (Chair), Jim Powell, Duff Mitchell, Iura Leahu, John Smith

- Continue and expand Sustainability Sessions- Cruise ship Emissions, Solid Waste reductions/Compost, Other community topics
- Website improvement and timely community dissemination of Commission information
- Increase Community liaisons to other organizations, tribes, and interest groups
- Research of, and connect with, other programs, organizations, and other communities with Sustainability efforts to assist Juneau efforts

Energy/Climate – Implementation of JCAIP/JRES Committee– Steve Behnke (Chair), Gretchen Keiser, Jim Rehfeldt

- Support and assist community electrification of transportation (Juneau EV plan and charging infrastructure, VW grant, Electric Buses, LO NO Grant follow up and new submissions, dock electrification)
- Support and assist in reducing fossil fuel use in buildings, through energy efficiency and electrification of space heating. Review related building codes, support community air-source heat pump conversion program, initiate community

- discussions on an Alaskan or Community Heat Pump Technology Center in Juneau.
- Support and assist staff in the development of a CBJ Energy Management Program (energy use data for CBJ facilities and operations, CBJ fleet electrification, energy use in CBJ buildings).

Sustainability Indicators and Impacts Committee -Jim Powell (Chair), Iura Leahu, Jim Rehfeldt

- Incorporate broader meaning of sustainability (more holistic) where possible (use existing local indicators)
- Review and update methodology for carbon emissions/community energy for JCAIP/JRES. Update the 2007 and 2010 energy use and GHG emission inventory.
- Update on the impact of climate change on Juneau/need for mitigation. Last assessment was conducted in 2007.

OVERVIEW AND BACKGROUND OF JCOS

In 2007, the CBJ Assembly established the Juneau Commission on Sustainability (JCOS) to research and advise the CBJ on community sustainability. The Commission’s mission is to promote the economic, social, environmental, and governmental well-being of Juneau and all its inhabitants, now and in the future.

The commission’s powers and duties are to:

- *Coordinate, propose, and promote sustainability initiatives among residents, businesses, government, and non-governmental agencies and education organizations through education and outreach programs;*
- *Make recommendations to the Juneau Assembly and CBJ Boards and Commissions on policies and programs that promote sustainability;*
- *Research and apply for grants or other funds or CIPs from public or private agencies for the purpose of carrying out any of the provisions or purposes of the resolution establishing the commission;*
- *Serve as an advisory group to the CBJ in reducing greenhouse gas emissions to target levels as adopted by the CBJ Assembly and;*
- *Act as liaison between the public and the CBJ Assembly on sustainability-related issues.*

The governing legislation for the Juneau Commission on Sustainability is City and Borough of Juneau Resolution 2401a, July 9, 2007. The mission of the former Juneau Energy Advisory Committee was folded into the policy and purpose of the Commission. Resolution 2401am

also repealed Resolution 2376 relating to the Juneau Energy Advisory Committee. The Commission’s 2010 sunset date was removed by CBJ Resolution 2528, May 19, 2010.

Additionally, the JCOS is charged with duties from the Assembly through CBJ Resolution 2593, November 14, 2011, Juneau’s Climate Action and Implementation Plan (JCAIP).

I. Membership history

The eleven-member Commission includes nine public members appointed by the Assembly, one member of the Assembly and one member of the Planning Commission. The Commission is supported by a CBJ staff liaison. The Commission’s membership reflects environmental, social, economic, and governmental perspectives unified by the common interests of sustainability.

The membership structure of the Commission was altered from February 05, 2015, through CBJ Resolution 2755 which re-established the Commission and repealed the previous establishing Resolution 2718 (which in turn had previously repealed Resolution 2528). Planning Commission members and Assembly Liaison Members are now considered non-voting members and do not count towards a quorum.

Chair – Duff Mitchell, 2019 **Vice Chair** – Jim Rehfeldt, **Secretary** – Christine Woll

Members serving as of June 30, 2019, are:

Member	Term Expires	Member	Term Expires
<i>Duff Mitchell</i>	6/30/2019, Chair	<i>Jim Rehfeldt</i>	6/30/2021, Vice Chair
<i>Steve Behnke</i>	6/30/2021, past Chair	<i>Gretchen Keiser</i>	6/30/2021
<i>Edward King</i>	6/30/2020	<i>Christine Woll</i>	6/30/2020
<i>Jim Powell</i>	6/30/2020	<i>John Smith III</i>	6/30/2019
<i>Iura Leahu</i>	6/30/2019		
<i>Michelle Hale</i>	CBJ Assembly Liaison	<i>Mike LeVine</i>	Planning Commission Liaison
<i>Tim Felstead</i>	CBJ Staff Liaison	<i>Beth McKibben</i>	CBJ Staff Liaison

JCOS would like to warmly thank others who served on the Commission during the past year and contributed to our progression of success in advisory to the Assembly. These past members of the last year were:

Assembly Liaison – Rob Edwardson;

Public: Darrell Weatherall

Persons who previously served on the Commission include:

Public: Carol Anderson, Nathan Arentsen, Kaley Bangston, Bob Bellagh, Kate Bevegni, Eva Varadi Bornstein, Sandy Boyce, Alida Bus, Amy Condra, Robert Deering, Susan Ely, Catherine Fritz, Myrna Gardner, Clint Gundelfinger, Dave Hanna, Lauren Heine, Scott Jackson, Zane Jones, Jonathan Kamler, Linda Kruger, Jenni Lefing, Sarah Lewis, Sean Lynch, Greg McEwen, Sally Schlichting, Amy Skilbred, Kate Troll, Sara Truit, Greg Smith, Nancy Waterman, , Rick Wolk, Gayle Wood, Lisa Weissler.

Assembly Liaison: Bob Doll, Karen Crane, Mary Becker, Jerry Nankervis, Kate Troll, Maria Gladziszewski

Planning Commission Liaison: Dan Miller, Nancy Waterman, Nicole Grewe, Ben Haight

CBJ Staff Liaison: Maria Gladziszewski,

Previous chairs include Gayle Wood, Sarah Lewis, Sandy Boyce, Sean Lynch, Alida Bus, Nancy Waterman, Kate Troll, Lisa Weissler, Steve Behnke.

II. Meetings and Subcommittees

The Commission holds a regular meeting on the first Wednesday of each month. Subcommittees meet at monthly work sessions, usually the fourth Wednesday of each month. For the time period covered by this report, the Commission held 9 regular commission meetings, and numerous work sessions. The Commission holds an annual retreat in January to identify goals and strategies for the calendar year. Out of each retreat, subcommittees are formed to act on the priorities identified.

Based on the January 2019 retreat, the Commission currently has the following subcommittees:

- Energy and Climate-Implementation of JRES/JCAIP
- Outreach
- Sustainability Indicators and Impacts

However, in 2018 the JCOS also worked with a Food Security Committee

Past subcommittees include: Food Security Committee (2016-2018) Climate Action Plan Implementation (2012), Sustainability Indicators (2012, 2011, 2010), Initiatives (2012), Energy (2015, 2014), Energy/Green House Gas (2011, 2010, 2009), Food Security (2011, 2010, 2009), Solid Waste (2016, 2015, 2014), Sustainability Chapter/Comprehensive Plan Update (2014), Built Environment, City Operations, and Transportation; Outreach/Accountability(2015, 2014).

ACCOMPLISHMENTS FOR 2018-2019

I. Supported Implementation of the Juneau Renewable Energy Strategy

One of JCOS continuing priorities for 2018-2019 was supporting implementation of the Juneau Renewable Energy Strategy (JRES), and related areas in the Juneau Climate Action & Implementation Plan (JCAIP). The Assembly adopted the JCAIP in 2011, and the JRES (Resolution 2808) in February 2018.

The Commission recommended to the Assembly that they make implementation of the JRES a priority in 2019 (Nov. 29, 2018 letter “JCOS Input on Assembly Priorities for 2019”). At the December 1, 2018 retreat, the Assembly adopted Goal 5A “Develop and implement a CBJ energy management program”, and Goal 5B “Follow & implement Juneau Renewable Energy Strategy”

The Energy Committee of JCOS is charged with providing recommendations, and assistance when requested, to the CBJ in addressing implementation of the four main areas of the JRES:

1. Implement a CBJ energy management program;
2. Reduce Juneau’s dependence on fossil fuels for space heating;
3. Reduce Juneau’s dependence on fossil fuels for transportation;
4. Support efforts to provide new renewable energy supplies.

1. CBJ Energy Management

The goal of this initiative is to assist the CBJ in developing a comprehensive energy management program that allows for systematic consideration of energy use and costs in

decision-making at all levels and provides information to the public.

Commissioners continue to offer assistance to the City Manager and to CBJ staff in tracking and reducing energy use and improving efficiency. A JCOS has previously recommended energy tracking for each CBJ facility so that baseline information can be developed and tracked.

JCOS reviewed the CBJ Capital Improvement Plan (CIP) and attempted to provide input regarding the use of sustainability language and metrics within the plan. Commissioners met with city staff to encourage continued consideration of sustainability when projects are proposed and developed. As noted in previous years, the JCOS believes that the CBJ is missing significant opportunities to save money, increase transparency and improve public support for CBJ programs by failing to include information on energy use and expenditures in the CIP. This request is not merely for JCAIP and JCOS goals and strategies but also supports fiscal responsibility in the use in CBJ taxpayer funds.

The Energy Committee has recommended that a key starting point for this initiative is for the CBJ to develop a system for tracking and reporting energy use and costs by facility and program. The JCOS would like to increase see increased Assembly and staff/management emphasis over the next year.

2. Space Heating and Buildings

The JCOS is exploring several approaches to continuing to reduce fossil fuel dependence throughout the community, including changes to the CBJ building code dealing with energy efficiency, working with groups involved in building, such as the Southeast Building Industry Association and the Renewable Energy Cluster Working Group, and convening affected groups.

Over the past year, JCOS liaisons have participated in the development of the Juneau Heat Pump Conversion demonstration project, and the creation of Alaska Heat \$mart (a new and growing Juneau Air Source Heat Pump initiative that will promote energy efficiency and lowers the cost of heating to Juneau families). JCOS has recommended that CBJ provide financial support to the project.

Beginning in spring 2018, the JCOS convened individuals and organizations involved with promoting and supporting energy efficiency and the adoption of heat pumps. We organized a Sustainability Session on electrification of heating in Juneau, which included a panel representing AEL&P, Renewable Juneau, and Interfaith Power & Light.

These efforts continued through 2018 and into spring 2019, resulting in the development of a heat pump adoption and energy efficiency “accelerator” demonstration project. Key progress over the past year included:

- Conducting a planning workshop in November 2018. Renewable Juneau obtained the services of consultant Pat Keegan in assisting with program development.
- Forming a steering committee in December 2018, representing major stakeholders, including the CBJ, JCOS, AEL&P, JEDC, and Juneau builders. Members include Steve Behnke, Susan Bell, Alec Mesdag, Gretchen Keiser, Eva Bornstein, Sally Saddler, Paul Voelckers, Margo Waring, and Alan Wilson.
- Submitting a CIP funding request for \$250,000.
- Conducting a 2-day operational planning workshop in April 2019.
- Incorporating as Alaska Heat \$mart in May 2019.
- Developing partnerships with statewide organizations such as the Alaska Housing Finance Corporation (AHFC) and the Cold Climate Housing Research Center (CCHRC).
- Continuing detailed program planning, with a goal of beginning operation soon after July 1 and the availability of funding.

JCOS will continue to work with the full range of groups involved in energy efficiency and heating, including a coordinated effort on electrification of heating loads.

3. Transportation: Electric Vehicles

The JCOS Energy Committee developed an outline of an EV plan in 2018, to contribute to meeting the JRES Transportation goal (Draft: “Why Juneau should support EVs, and why the CBJ should adopt an EV plan.”)

The JCOS has been involved in this initiative for more than five years, helping to provide information and promote electric vehicle adoption in the community.

Juneau is a leading EV adopting community and is one of the fastest growing EV communities in America. Over the past 5 years, the number of electric vehicles has grown to about 500, with 1 to 2 new electric vehicles arriving in Juneau weekly. Our local EV adoption has garnered regional and national attention. JCOS has been instrumental in supporting the electrification of transportation since the first electrical vehicles arrived in Juneau. In addition to continuing strong growth in numbers of used and new Nissan Leafs, there is an increasing variety of EV’s, including Chevrolet Bolts and over a dozen Teslas. According to a recent report by Experian Information Solutions, which examined all EV sales, Juneau ranked 3rd in the Nation. The leading EV market in the U.S. is the San Francisco-Oakland-San Jose area, with a market share of 7.9 percent, followed by San Diego at 4 percent and Juneau, Alaska at 3.5 percent.

In contrast to many communities, which rely either on private industry or government to provide public EV charging infrastructure and other incentives, Juneau has relied on collaborative private-public partnerships. Our collaboration of private and public partnerships makes Juneau unique.

During 2014-2015 a combination of business and grant funding with JEDC was used to acquire and install an initial round of EV chargers located around Juneau. The expansion of additional charger has expanded in Juneau through a combination of privately financed and operated charging stations, and publicly financed and operated chargers. The Juneau Electric Vehicle Association (JEVA) has played a key role by obtaining a number of used Level 3 chargers which it has made available to the CBJ and to private businesses. In 2019 several businesses installed charging stations, including the Juneau Fred Meyer store that installed two Level 2 chargers along with fast DC chargers. The Alaskan Brewing Company also installed a fast DC charging station at its new Tasting Room, located on the way to Costco.

JCOS and JEVA collaborated with the Juneau Fred Meyer Store in organizing a 2019 Drive Electric Earth Day ribbon-cutting ceremony for the new chargers in April 2019. Mayor Weldon and Assembly Member Wade Bryson participated in the commissioning of this private fast charging station for Juneau's increasing electrical vehicle fleet.



JCOS and JEVA are looking into the options of how to provide fast charging stations to allow for electric taxis and electric commercial vehicles that require fast charging systems to lower transportation costs in Juneau, but also to meet JCAIP GHG emission goals and JRES renewable energy strategies. JCOS is also looking at suggestions and recommendations for Assembly consideration as a means to increase electric bus charging capabilities for commercial, hospitality and tourism use. Many commercial transporters, Care van type buses have now entered the commercial market.

JCOS has supported efforts to acquire and utilize electric buses, both by the Capital Transit and private companies. Commissioners assisted CBJ staff in developing two year's successful Lo-No grant with review and recruitment of letters of support. The successful grant provided significant funding for Juneau's first electric public transit buses. JCOS looks forward to the successful follow through on this important community public transportation procurement.

JCOS has recommended and supported EV adoption for the CBJ municipal vehicle fleet as well as electric buses for the CBJ Capital Transit. In 2019 JCOS Commissioners assisted CBJ Public Works in obtaining letters of support for the 2019 Low No grant for additional federal funding for converting additional Capital Transit buses to electric.

4. New Renewable Energy Supplies

JCOS' focus in this area is to help share information about the status of renewable energy supplies and projects in Juneau. JCOS has in the past provided Sustainability Sessions on Juneau District Heating, Sweetheart Lake Hydroelectric Project and AEL&P efforts. As proposals to meet the other JRES goals through electrification of heating and transportation are developed, there is a need for better information about electricity supplies and costs, to be provided by the industry to Juneau's public. JCOS role is to provide Sustainability Sessions to make Juneau energy information open and transparent to the Assembly and the Juneau public.

II. Solid Waste

JCOS continued to monitor CBJ solid waste reduction efforts and initiatives, including composting, recycling, and bio-solids. As noted below under food security, JCOS organized a public outreach event on composting in the past and has indicated in our meetings that we will likely have another composting/recycling/CBJ solid waste plant update sustainability session during this next year.

III. Food Security

In 2017 JCOS completed its work on its recommendations toward an amendment to CBJ Land Code regarding the keeping of livestock. This was a result of the JCOS focus on food security and increasing community interest in small scale livestock husbandry.

JCOS recommendations that were compiled with public input were passed to the CBJ Planning Commission for review and their recommendation for Assembly disposition to the CBJ Livestock Ordinance.

The Planning Commission Title 49 Subcommittee has reviewed and amended the JCOS recommendation – JCOS provided feedback to the Title 49 Committee as they undertook their review. JCOS has been informed that the Planning Commission Committee of the Whole has provided Staff with direction to do a further review with CBJ Law before bringing a formal ordinance back to them CDD hope to have the Ordinance to the Assembly by Fall 2019. JCOS would like to see this Ordinance reviewed by the Assembly. Many community members initiated this revision of the ordinance to provide public compliance with the growing chicken use within the Borough.

IV. Outreach

Website

With cooperation from the CBJ, JCOS has continued to update the Sustainable Juneau website with upcoming events. In the meantime, JCOS worked with CBJ staff on a complete redesign of the website, to better house relevant sustainability resources for Juneau, including those that JCOS has produced and generated, and to be easier to navigate and aesthetically pleasing; the new site went live June 2019.

The new website is: <https://beta.juneau.org/community-development/jcos>

JCOS has also been active in using their Facebook page (<https://www.facebook.com/SustainableJuneau>) for announcing upcoming events hosted by JCOS and in the Juneau community and sharing local, national, and global stories relevant for JCOS stakeholders.

Sustainability Sessions

The outreach committee helped organize four sustainability sessions during this reporting period. These sustainability sessions are intended to raise public awareness and discourse about relevant sustainability sessions. These included:

EV Public charging station ordinance: JCOS provided two forums to gather and distribute information related to a proposed ordinance related to fees associated with the use of EV public charging stations. These were held on June 10 and July 18.

Air emissions and monitoring: JCOS co-hosted a sustainability session with the Alaska Department of Environmental Commission on January 29, 2019. This session was attended by about 40 members of the Juneau public including the Commissioner of ADEC, and presenters from ADEC showcased how they handle air quality compliance in Juneau and obtained feedback on their upcoming plans to monitor air quality in Juneau.

Visitor industry sustainability sessions: JCOS hosted a sustainability session featuring a panel representing the Juneau visitor industry on April 18, 2019. Each panelist presented on how their business approaches sustainability, and a public crowd of around 40 people brought questions to the panelists. It was clear from this panel discussion that industry supported Juneau's efforts to use Marine Passenger Fee monies to electrify Juneau's dock infrastructure to assist in lowering localized cruise ship emissions.

The JCOS seeks and requests Assembly consideration to have Sustainability Sessions recorded for distribution on the JCOS website. Materials presented provide detailed information that should be able to be retrieved by a broader Juneau audience. The JCOS has met with CBJ staff and made recommendations which to date have not satisfactorily resolved this request. For example, a very informative Sustainability Session included recommendations and lessons learned on electric fences for raising chickens within the CBJ. This information, if recorded and used would help CBJ residents decrease the number of unfortunate bear-chicken interactions.

V. Community Sustainability Indicators and Impacts

Development of Community Sustainability Indicators - The Comprehensive Plan Policy 2.3. and Implementing Action 2.3 – directs JCOS to develop sustainability indicators and measures. This is especially relevant given that using the recommended methodology for community greenhouse gases and energy use is now impossible due to non-release of data by fuel suppliers. Accordingly, JCOS’s Committee on Indicators has organized and plans to review the existing draft list of indicators developed in 2007. The development process includes engaging the public as well as experts and CBJ staff. Additionally, public meetings coordinated with the update of the CBJ Comprehensive Plan process will also be considered. The committee plans on identifying key sustainability indicators that are measurable and relevant to CBJ priorities. The 2007 Predictions of Climate Change Report and the 2010 Emissions Inventory will also be reviewed. A set of Key Sustainability Indicators for a full JCOS review are anticipated for early 2020.

Update to 2007 CBJ and UAS Predictions of Climate Change Report (Report) - JCOS, in collaboration with UAS, School of Arts and Sciences has been reviewing the 2007 Report with a view to updating it based on the latest information and understanding. Progress thus far includes commitments from four UAS faculty to assist with updating the report. Also, three graduate students from the UAS – Master of Public Administration program are currently working on the social and economic sections of the revised report. A draft of the revised report is tentatively planned for JCOS review on January 1, 2020. JCOS has asked CBJ to contribute \$5,000 to UAS to help support UAS’s collaboration and leadership in updating the Report.

Direction for 2019-2020

The Commission is focusing its attention during 2019-2020 on the following priorities:

- Energy Strategy Implementation (space heating, CBJ organization and community-wide energy tracking and energy management, electrical transportation and dock electrification) – lead by Steve Behnke.
- Outreach - Continue Sustainability Sessions Future presentations should look at local and non-Juneau success stories. More effective Website and media use to promote the CBJ efforts- – Christine Woll will lead work on this.
- Community Sustainability Indicators and Tracking for more effective management of community goals and values- led by Jim Powell.