



REQUEST FOR DECISION

MEETING DATE: February 22, 2022

TITLE: Climate Change Action Plan – Draft

DIVISION: Planning & Infrastructure

SUMMARY:

This presentation is being brought forward to Committee of the Whole to provide information on the Climate Change Action Plan (CCAP) report completed by All One Sky Foundation. The presenters will be Sarah Prescott, Project Manager, Climate Mitigation and Adaptation as well as Richard Boyd, Director, Research both from All One Sky Foundation.

The CCAP is a 12-year guiding document for the City of Spruce Grove (the City) that will outline feasible, effective, and equitable actions to both reduce greenhouse gas (GHG) emissions, and to enhance community resilience and protect the local economy, environment and community from current and future climate-related impacts. The long-term goal is to ensure Spruce Grove remains a resilient, safe and an attractive City to live, work and play, and that the City does its part to address global climate change.

PROPOSED MOTION:

No motion required.

BACKGROUND / ANALYSIS:

In 2021, the City's Environmental Sustainability Action Plan (ESAP) expired, after being in place for 10 years. To replace the ESAP, the City spent all of 2021 and part of early 2022 preparing a CCAP. The CCAP will outline feasible, effective, and equitable actions to both reduce greenhouse gas (GHG) emissions, and to enhance community resilience and protect the local economy, environment and community from current and future climate-related impacts.

Throughout the preparation of the CCAP, the City engaged with citizens, conducted research of scientific best practices and regional actions to recommend a set of actions that the City can take to address climate change in an environmentally and financially responsible way.

The CCAP is designed to help answer two main questions:

- How can the City help prepare the community for the anticipated effects of climate change?
- How can the City reduce its greenhouse gas emissions and help the community do the same?

The reason for developing a CCAP as the guiding document for the City's environmental action stems from agreement within the climate scientific community that rapidly rising global temperatures have created a climate crisis. There is unequivocal evidence that the global climate system has warmed at an unprecedented rate since the pre-industrial era—from observations of rising air and sea surface temperatures globally and in Canada. The science is equally clear that most of the observed increase in temperatures is due to emissions of heat-trapping greenhouse gases (GHGs) from human activity and that continued emissions of GHGs will cause further warming and long-lasting changes in the climate system. Under a very high GHG emissions scenario (e.g., where few actions are taken to reduce global GHG emissions), global temperatures are very likely to rise by 3.3°C to 5.7°C above pre-industrial levels; even under an intermediate emission scenario, warming of 2.1°C to 3.5°C is very likely. At the same time, the climate science is unambiguous about the catastrophic and long-term, irreversible consequences for human and ecological systems of allowing global temperature to rise more than even 1.5°C above pre-industrial levels. Importantly, to limit future warming to 1.5°C and avoid the worst impacts of climate change, GHG emissions must be dramatically reduced in the coming decades—halved by 2030—with carbon neutrality achieved by mid-century.

OPTIONS / ALTERNATIVES:

Council will be asked to make two decisions at the upcoming Council meeting tentatively scheduled for March 14, 2022:

1. The first decision will be around accepting the CCAP as information, thereby giving administration guidance to move forward with the CCAP and implement the various actions through the Corporate Planning process approvals.
2. The second decision will set the City's GHG emission reduction targets for now out until 2050. As stated in the presentation, there are two GHG reduction pathways being considered. Administration will seek some direction on which pathway the City will be most supportive of. The first pathway labelled "steep decline +1.5°C scenario", aligns with C40 Cities and World Wildlife Fund's One Planet City Challenge. The second reduction pathway labelled "Canadian path to +1.5°C scenario" aligns to the Government of Canada's Nationally Determined Contributions submitted to the United

Nations. Administration is hoping to get a sense of which reduction pathway Council would like to strive towards in order to draft the motion for the March 14, 2022 Council meeting.

This is the City's plan so it is important to note that by committing to a preferred direction in March simply provides direction to Administration on the types of initiatives to be brought forward through the Corporate Planning process for decision amongst all priorities of the City.

CONSULTATION / ENGAGEMENT:

A series of internal and public engagement activities took place over 2021/22:

External Engagement:

- Online public webinar (May 27, 2021)
- Online public survey (May 10 to June 8, 2021)
- Online public survey (September 24 to October 26, 2021)
- Booth at an in-person Farmer's Market (September 25, 2021)
- Classroom presentation to Grade 10 class from St. Peter the Apostle Catholic High School (September 28, 2021)
- Online Webinar Series (January 18 (afternoon and evening) and 19, 2022)

Internal Engagement:

- Related to Climate Change Adaptation:
 - Vulnerability and Risk Assessment Workshop (June 21, 2021) with staff from departments across the City
 - Adaptation Action Brainstorming one-on-one staff interviews (September 30-October 7, 2021)
- Related to Climate Change Mitigation:
 - One-on-one interviews with City departments to identify GHG sources and potential GHG mitigation actions (June 22-June 29, 2021)
 - Action Planning Workshop, participated in by staff from departments across the City (October 22, 2021)
- Combined Actions:
 - Staff review of suggested Adaptation and GHG Mitigation Actions to confirm action scope, framing, and general feasibility (December 15-24, 2021)
 - Staff review of proposed capital and operating costs for suggested actions to confirm estimated cost ranges (January 13-21, 2022)
 - Presentation to Corporate Leadership Team for input and review (January 18, 2022)

IMPLEMENTATION / COMMUNICATION:

The implementation of the CCAP will be implemented through the Corporate Plan on an annual basis. The responsibility of implementing these actions will lie with each department in which the actions relate. There may be the requirement to hire additional staff to support the implementation of the CCAP, which will be presented through the Corporate Plan as well.

Communication to the public on City Council setting an emissions reduction target and accepting the CCAP will be important. The Environment and Transit Department will work closely with the Communications Department to ensure proper communication and promotion of the CCAP.

IMPACTS:

The CCAP will guide the City over the next 12 years on ways to respond to and prepare for a changing climate, while also taking steps and actions to reduce emissions and the City's contribution to climate change. The actions outlined in the final CCAP relate to work and actions that will need to be taken by all departments within the City and by the public. The work that is needed to be done to address climate change is complex, time consuming and resource intensive. Climate change is one of the biggest and most complex issues of our time, and without quick, focused, and ambitious action is something where the cost of inaction will outweigh the cost of action.

FINANCIAL IMPLICATIONS:

As stated in the CCAP the estimated cost of completing the actions outlined in the CCAP have not been strictly determined but an order of magnitude for the recommendations has been provided. The cost implications will be addressed with each project when it is contemplated within the Corporate Planning process.

Within the second technical report, estimates for the energy cost savings and avoided damages cost for each emission reduction pathway have been provided for the 12-year (3 carbon budget cycle) period ending in 2033:

1. Steep Decline +1.5°C Scenario:
The corresponding energy cost savings associated with achieving the goals set in the three carbon budgets are estimated at \$903.1 million over 12 years, of which \$8.8 million relate to corporate operations and services. Climate change damage costs avoided are estimated at \$137.3 million.
2. Canadian Path +1.5°C Scenario:
The corresponding energy cost savings associated with achieving the goals set in the three carbon budgets are estimated at \$455.7 million (2020 dollars), of which \$4.5

million relate to corporate operations and services. Climate change damage costs avoided are estimated at \$69.9 million.

STRATEGIC VISION ELEMENT:

This topic relates to all three of the City's strategic vision elements contained in Council's Strategic Plan

RELATED GOAL:

Citizens consistently express high levels of satisfaction with municipal services.