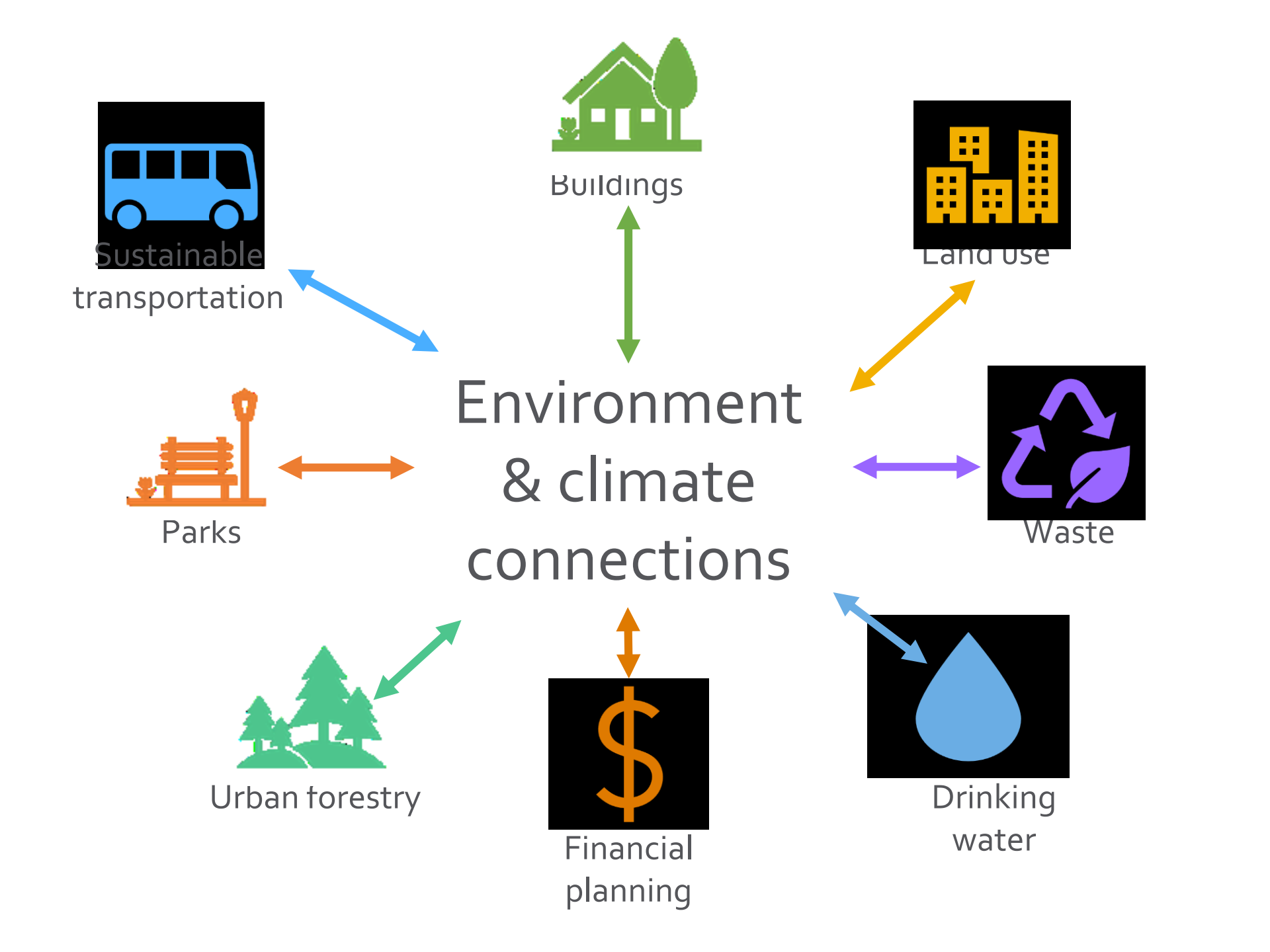
Update on Environmental Protection Council Priority

June 2020


Buildings
Sustainable transportation
Land use
Environment & climate connections
Parks
Waste
Urban forestry
Financial planning
Drinking water

Kelowna's natural environment

- 27 creeks
- 200 wetlands
- Ecosystems for fish and wildlife
- Habitat for rare and threatened plant and animal species
- 28% assessed as sensitive
- Critical migration corridor
- Good air quality

Assessing progress on environmental protection

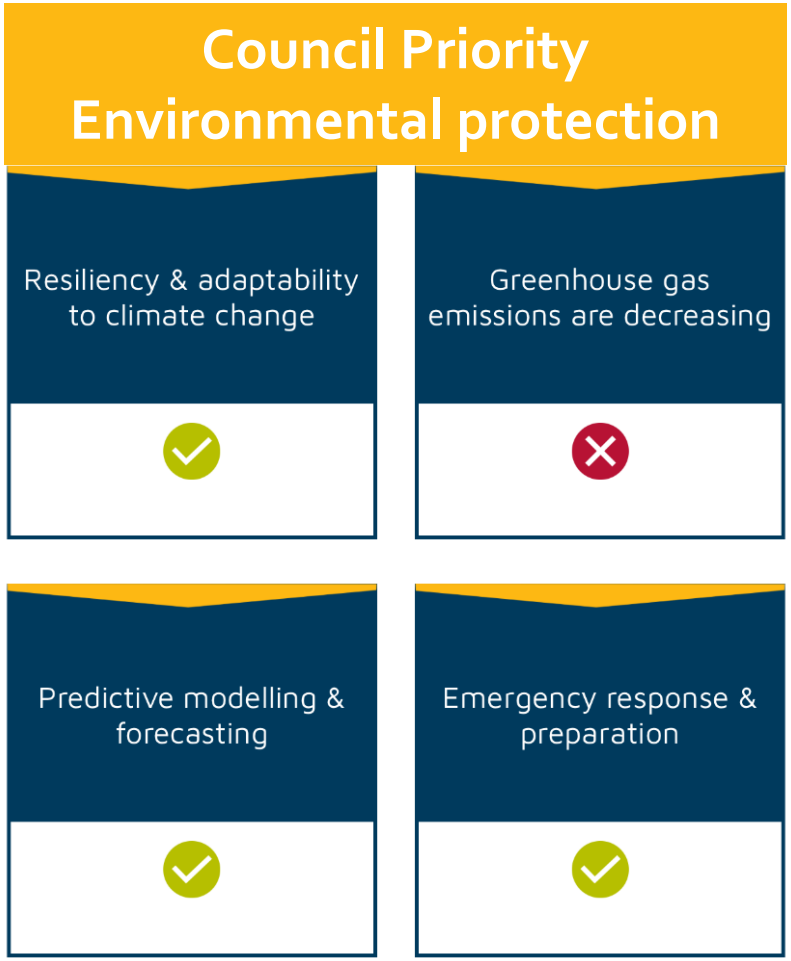
- Clean water
- Clean air
- Clean energy
- Habitat protection
- Biodiversity
- Waste reduction
- Climate mitigation
- Climate adaptation

Assessing progress on environmental protection

- Clean water
- Clean air
- Clean energy
- Habitat protection
- Biodiversity
- Waste reduction
- Climate mitigation
- Climate adaptation

Assessing progress on environmental protection

- Clean water
- Clean air
- Clean energy
- Habitat protection
- Biodiversity
- Waste reduction
- Climate mitigation
- Climate adaptation



Council Priority: Environmental Protection

Climate projections

Warmer temperatures

Drier summers

Longer growing season

Warmer winters

More precipitation

Shifting Seasons

Adaptation, modeling, response progress

- Fuel modification
- Flood models
- Irrigation water consumption predictor
- Improvements to stream capacity
- Changes to development standards

Adaptation options

a. Climate adaptation plan – actions to live with the effects of global warming

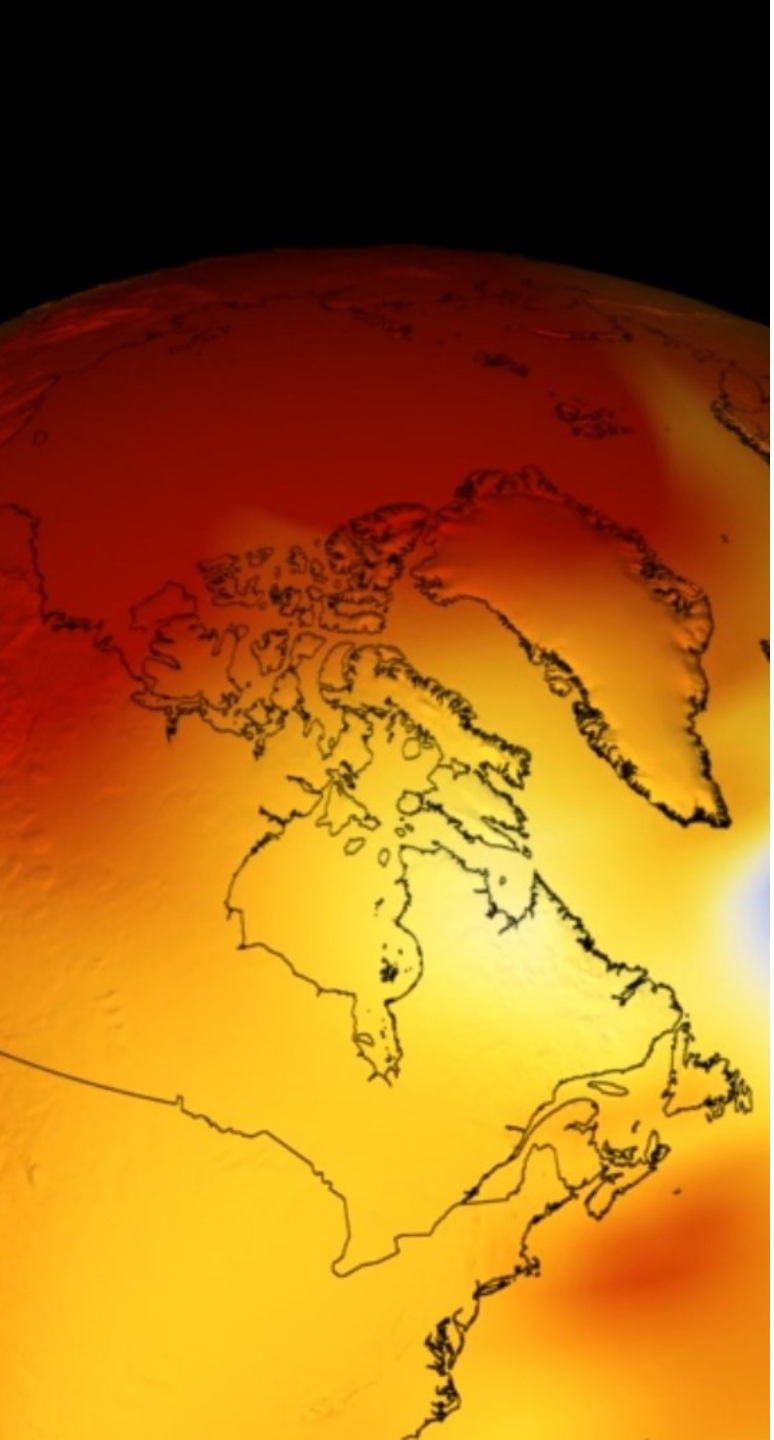
b. Climate resiliency plan – mitigation and adaptation to become resilient to climate change

Council Priority: Environmental Protection

1. Corporate GHG emissions
2. Community GHG emissions

Corporate GHG Emissions

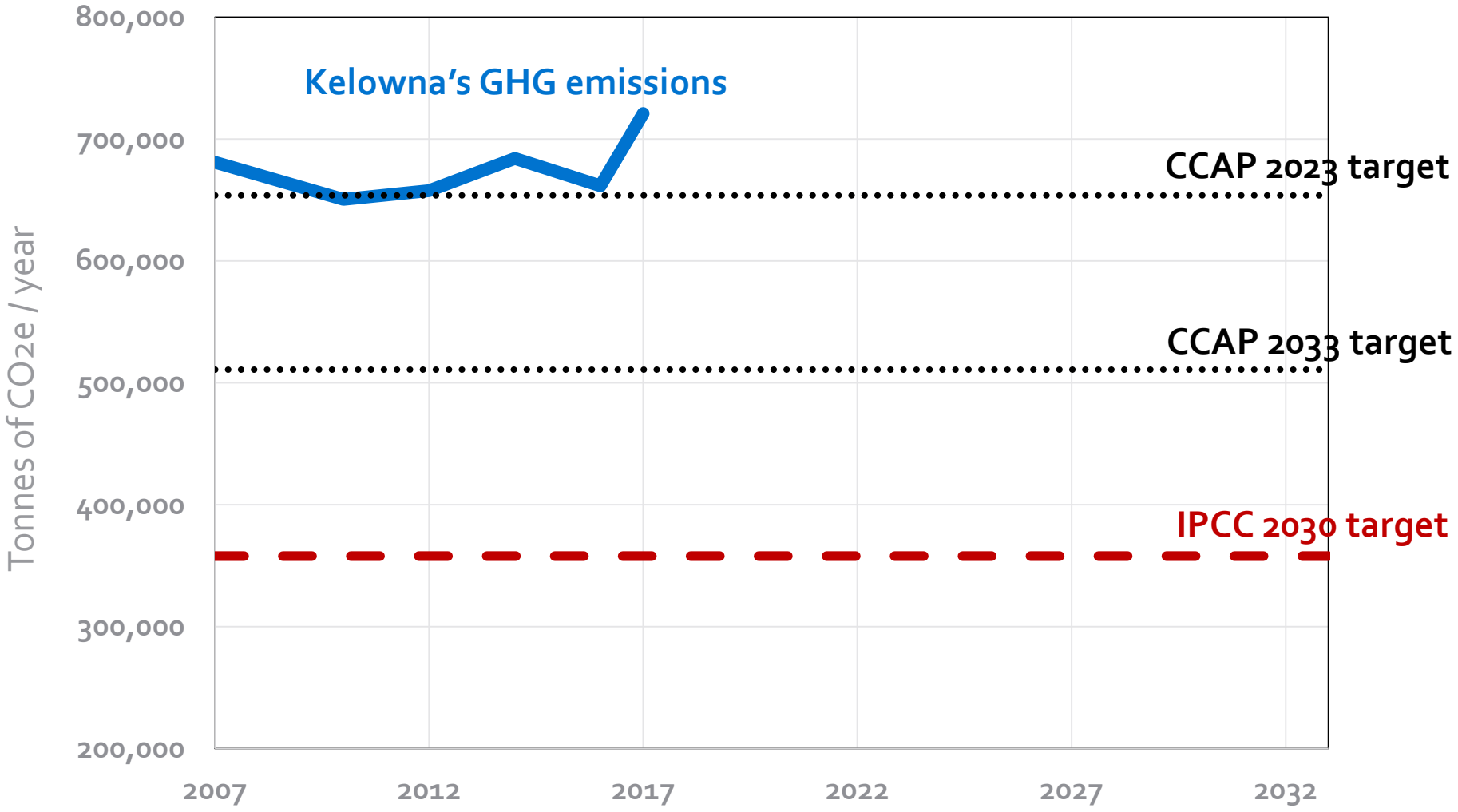
- Account for approx. 1% of community GHG emissions
- Historical corporate GHG emissions data being reconciled to establish performance trend



Global Emissions

- Reduce GHG emissions by 45% by 2030
- Limit warming to 1.5 degrees
- Unprecedented change needed for land use, transportation and buildings
- Local governments investigate how to accelerate GHG reduction or determining actions to align with IPCC

Kelowna's community GHG emissions

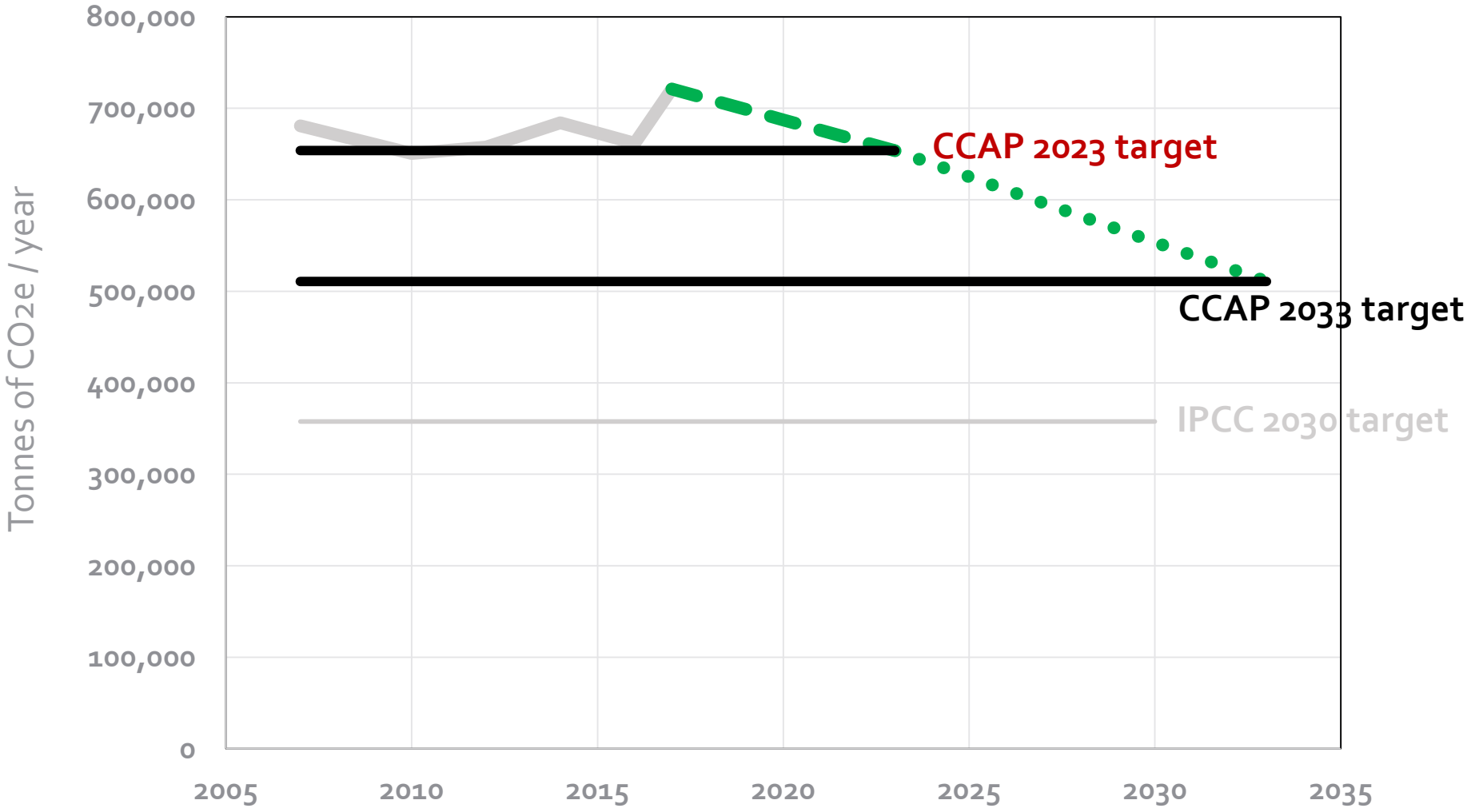


CCAP progress

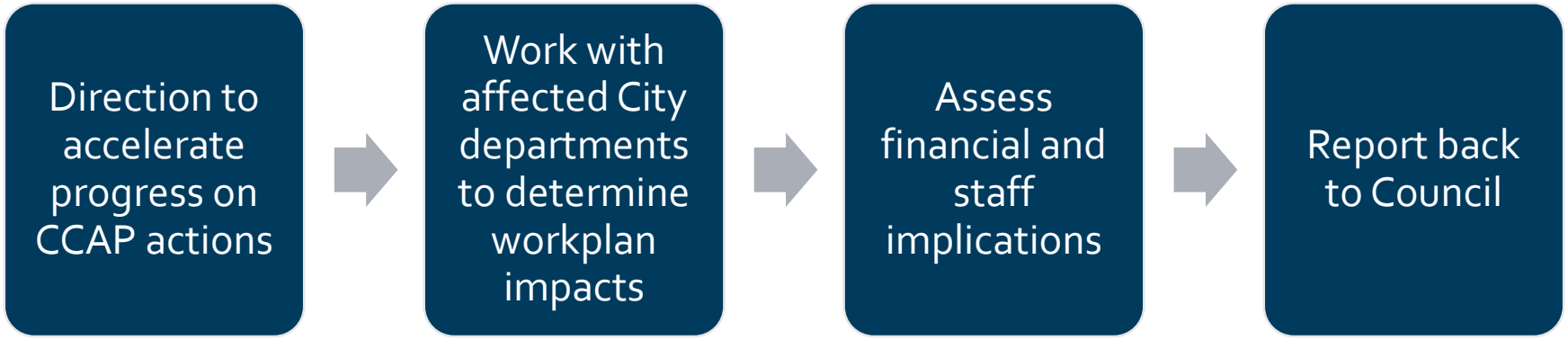
	Actions with existing resources				Actions with additional resources			
	Ongoing/ Complete	In progress	Not started	Total actions	Ongoing/ Complete	In progress	Not started	Total actions
Ongoing	**11**	**2**	**0**	**13**	0	0	2	2
Years 0 - 2 (2018 - 2020)	**5**	**11**	**3**	**19**	0	4	1	5
Years 3 - 5 (2021 – 2023)	**0**	**1**	**1**	**2**	0	3	3	6
Total	**16**	**14**	**4**	**34**	**0**	**7**	**6**	**13**

GHG Emissions Reduction Options

Option: Accelerate Progress on CCAP



Option: Accelerate Progress on CCAP



Example: Accelerate Progress for **Transportation**

What we are doing	Develop an Electric Vehicle Strategy (CCAP Action T6)
Accelerate progress	Accelerate implementation of the EV Strategy once complete

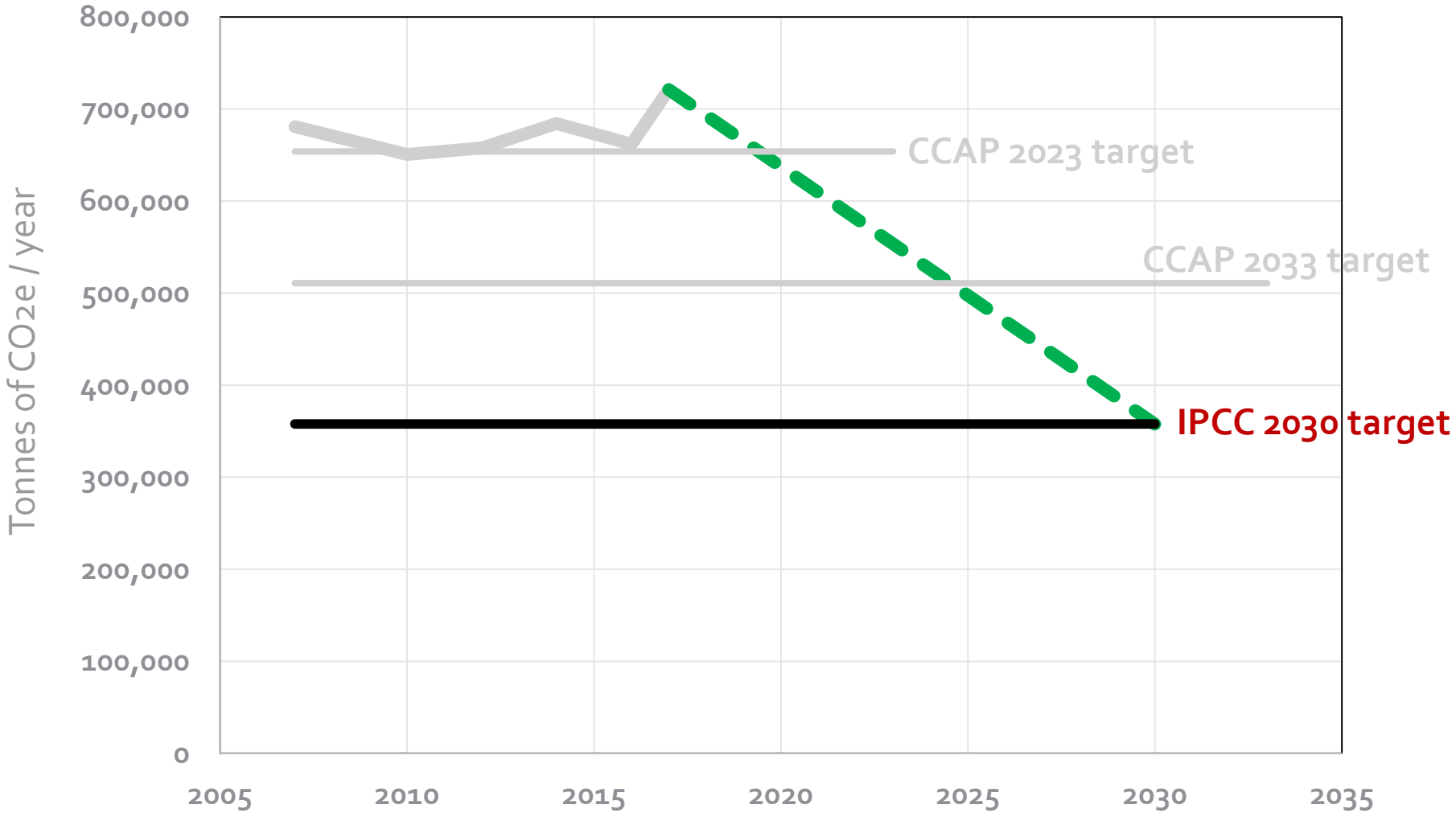
Example: Accelerate Progress in **Buildings**

What we are doing	Developing a Community Energy Retrofit Strategy (CCAP Action B4)
Accelerate progress	Investigate financing models and provide municipal incentives to support city-wide deep energy retrofits (CCAP Action B10)

Example: Accelerate Progress for **Planning**

What we are doing	Develop 2040 OCP in conjunction with TMP (CCAP Action LU4)
Accelerate progress	Accelerate implementation of the OCP (once complete)

Option: Align with IPCC targets



Option: Align with IPCC targets

Agree to align with the IPCC recommendations to limit global warming to 1.5 °C by 2030

- May include a Council Declaration of a Climate Emergency
- Council may direct staff to determine what policy alignment would look like (normally with either added staff and/or financial commitments)

Revise community and corporate GHG emissions reduction targets

- Most local governments have adopted the revised target of reducing community and corporate GHG emissions by 45-50% below 2007 levels by 2030
- May also include a longer-term commitment to be net-zero (i.e., carbon neutral) by 2050.

Develop an action plan to achieve the revised GHG emissions reduction targets

- Typically results in a revised Climate Action Plan or an entirely new plan (e.g., Climate Resiliency Plan).
- Typically involves added resources (either staff and/or financial commitments) to implement the plan

Example policies to align with IPCC

By 2030, over half of the kilometres driven on Kelowna's roads will be by zero emissions vehicles.

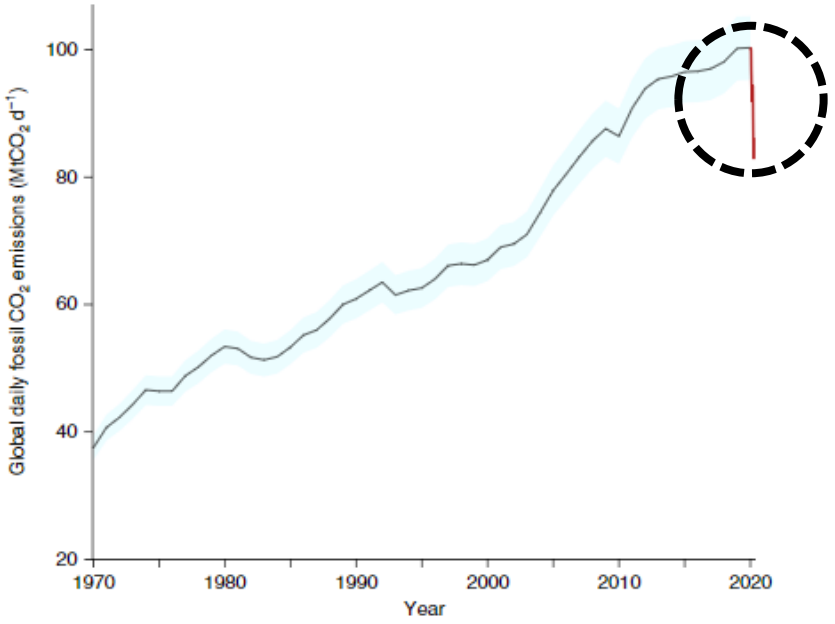
Increase bicycle ridership and micro electric mobility to reach 10% of all trips taken by 2030, with further increases to 2050.

Each year, 10% of existing residential buildings will receive deep energy retrofits.

All new buildings will meet the top performance level of the BC Energy Step Code by 2025, with incentives for new buildings to install low-carbon energy systems.

By 2025, all new and replacement heating and hot water systems will be zero emissions.

GHG Emissions During COVID-19



- Government policies during COVID-19 restrictions **reduced transportation** and **changed consumption patterns**
  - Daily CO2 emissions decreased by **17%** at the peak of restrictions in April
  - 2020 annual CO2 emissions reduction expected between **4-7%**

Questions?

For more information, visit **kelowna.ca**.