

## **The Social Cost of Carbon and Forests** – submitted by Michael Kellett, [RESTORE the North Woods](#) -1-23-17

“The Social Cost of Carbon (SCC) is an estimate of the monetized damages associated with an incremental increase in carbon emissions in a given year. It is intended to include (but is not limited to) **changes in net agricultural productivity, human health, property damages from increased flood risk, and the value of ecosystem services due to climate change.**”

—Technical Support Document: Social Cost of Carbon for Regulatory Impact Analysis Under Executive Order 12866 [now scrubbed from White House website]

<https://web.archive.org/web/20170118134053/https://www.whitehouse.gov/sites/default/files/omb/infocostofcarbon/for-agencies/Social-Cost-of-Carbon-for-RIA.pdf>

**This paper ties logging to the social cost of carbon in federal forests, but the principles apply to *all* forests.** This could provide a good definition for applying the SCC to Massachusetts forests:

**“Research demonstrates that logging reduces the amount of carbon stored in federal forests and increases the amount of carbon dioxide in the atmosphere. Increases in atmospheric carbon dioxide disrupt the global climate, raising the risk of economic harm from extreme weather events, higher temperatures, changes in precipitation, rising sea levels, acidification of oceans, and changes in ecosystems.** An Interagency Working Group of federal agencies recently provided estimates of the economic harm per metric ton expected to result from incremental increases in atmospheric CO<sub>2</sub> in future years. This harm is called the social cost of carbon. The estimates are intended to measure potential climate-related damage, such as reductions in net agricultural productivity from droughts, adverse impacts of heat waves on human health, destruction of property by floods, and the loss of ecosystem services. - *“Accounting for Climate-Related Risks In Federal Forest-Management Decisions”*, **Federal Forest Carbon Coalition**

<http://static1.1.sqspcdn.com/static/f/551504/26259333/1432605642583/SocialCostsOfCarbonOCIandNiemiMay2015.pdf?token=GJPPqA13cpXWx3UjA1oHmTNMful%3D>

### **Other documents with good information include:**

**“EPA and other federal agencies use estimates of the social cost of carbon (SC-CO<sub>2</sub>) to value the climate impacts of rulemakings.** The SC-CO<sub>2</sub> is a measure, in dollars, of the long-term damage done by a ton of carbon dioxide (CO<sub>2</sub>) emissions in a given year. This dollar figure also represents the value of damages avoided for a small emission reduction (i.e., the benefit of a CO<sub>2</sub> reduction).”

*“The Social Cost of Carbon: Estimating the Benefits of Reducing Greenhouse Gas Emissions”* (EPA) [probably soon to be scrubbed from website]

<https://www.epa.gov/climatechange/social-cost-carbon>

**“Scientists predict that climate change will lead, and in some cases has already led, to negative consequences such as the spread of disease, decreased food production, coastal destruction, and many more.**

The social cost of carbon pollution calculates the economic cost of these problems and estimates the damage done by each ton of carbon dioxide<sup>1</sup> that is spewed into the air. The current estimate is around \$40.” —*Social Cost of Carbon Pollution Fact Sheet*, [CostofCarbon.org](#)  
[http://costofcarbon.org/files/Cost\\_of\\_Carbon\\_Fact\\_Sheet.pdf](http://costofcarbon.org/files/Cost_of_Carbon_Fact_Sheet.pdf)