Carbon dioxide isn’t the only target of House Democrats this week.

The latest version of Energy and Commerce Chairman Henry Waxman's (D-Calif.) sweeping climate and energy bill would accelerate the schedule for slashing hydrofluorocarbons, or HFCs - some of the most potent greenhouse gases.

The chairman's mark under discussion this week would establish separate limits and emission allowances for HFCs that would slash their use by 85 percent after 2032 -- six years sooner than the proposal unveiled in March proposed to achieved the same reductions.

The latest version would also result in steeper cuts to HFCs, by slashing HFC levels by 10 percent of the baseline starting in 2012, compared with a 4 percent reduction proposed in the previous draft.

HFCs are man-made chemical refrigerants that are often used as alternatives to ozone-depleting substances. The most potent type of HFC traps heat 12,000 times more effectively than carbon dioxide, while other HFCs are between 100 and 1,000 times more effective than CO₂ at trapping heat, according to the Energy Information Administration. The use of these chemicals is expected to grow rapidly as they are used to replace the ozone-depleting substances being phased out by the Montreal Protocol.

“It’s a huge potential win to address the HFCs,” said Durwood Zaelke, president of the Institute for Governance and Sustainable Development.

“Reducing CO₂ emissions doesn’t produce significant cooling for at least 1,000 years,” Zaelke said, but swiftly cutting HFC emissions and other potent emissions like black carbon could offer cooling effects more quickly. This plan to slash HFCs is “big and it’s fast and it’s also quite cheap to phase down to the minimal uses,” he added.

The bill would create programs to study and mitigate the effects of black carbon, another potent greenhouse gas and a major source of global warming in the Arctic. It would require U.S. EPA to propose regulations under the Clean Air Act to reduce black carbon emissions or find that
existing regulations adequately control the potent emissions. EPA would also be directed to identify ways to achieve significant cuts in black carbon emissions abroad.

Some environmental and industry groups have cautioned lawmakers against regulating HFCs in the same way as less potent greenhouse gases in domestic and international policies. Experts say treating HFCs like the other global warming pollutants would spur industry groups to cut small amounts of HFC emissions instead of cutting larger quantities of carbon dioxide emissions under a cap-and-trade program. That could result in price spikes for a chemical often used in refrigerators and air conditioners, and those prices could be passed on to consumers, some argue.

Some industry groups have expressed concerns about the Waxman-Markey bill's steep cuts to HFCs, arguing that a shortage of alternatives could make it difficult to comply with even the less stringent standard in the March version of the bill. Alternatives do exist, but they are largely unapproved for the U.S. market and existing equipment is not necessarily configured for them, according to industry executives who are working to introduce new HFC-free equipment domestically and abroad (ClimateWire, April 2).