

**AMERICAN BAR ASSOCIATION**  
**ENVIRONMENT, ENERGY, AND RESOURCES SECTION**  
**LAW STUDENT DIVISION**  
**INTERNATIONAL LAW SECTION**  
**SCIENCE & TECHNOLOGY LAW SECTION**

**REPORT TO THE HOUSE DELEGATES**

**RESOLUTION**

1 RESOLVED, That the American Bar Association urges federal, state, local, territorial, and  
2 tribal governments, and the private sector, to recognize their obligation to address climate  
3 change and take action to achieve the following goals:

- 4 • Reduce U.S. greenhouse gas emissions to net zero or below as soon as possible,  
5 consistent with the latest peer-reviewed science, and
- 6 • Contribute the U.S. fair share to holding the increase in the global average  
7 temperature to the lowest possible increase above pre-industrial levels;

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9 FURTHER RESOLVED, That the American Bar Association urges Congress to enact  
10 legislation that would:

- 11 • Utilize a broad range of legal mechanisms, including but not limited to market-  
12 based mechanisms and removal of legal barriers to reduction of greenhouse gas  
13 emissions, to achieve the goals set out above.
- 14 • Utilize a broad range of legal mechanisms to encourage and enable adaptation to  
15 climate change by federal, state, local, territorial, and tribal governments, and the  
16 private sector.
- 17 • Provide for a just transition for the people and places most dependent on the  
18 carbon economy.
- 19 • Recognize and incorporate sustainable development principles in reducing  
20 greenhouse gas emissions and adapting to climate change, in order to  
21 simultaneously promote economic development, social well-being, national  
22 security, and environmental protection;

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24 FURTHER RESOLVED, That the American Bar Association urges the United States  
25 government to: (1) engage in active and constructive international discussions under the  
26 United Nations Framework Convention on Climate Change and its progeny, and (2)  
27 remain in, negotiate, or ratify treaties and other agreements to reduce greenhouse gas  
28 emissions and adapt to climate change; and  
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30 FURTHER RESOLVED, That the American Bar Association urges lawyers to engage in  
31 pro bono activities to aid efforts to reduce greenhouse gas emissions and adapt to climate  
32 change, and to advise their clients of the risks and opportunities that climate change  
33 provides.

## REPORT

This resolution builds on prior House of Delegates resolutions on climate change and sustainable development, as well as ongoing activity by the American Bar Association (ABA) Board of Governors and other ABA leadership.

This resolution updates and substantially revises the climate change resolution adopted by the ABA House of Delegates on February 8, 2008.<sup>1</sup> It differs from the 2008 resolution in four ways. First, that resolution urged the enactment of federal cap-and-trade legislation to fight climate change. That legislation was not adopted. This resolution instead urges the adoption of a wide range of legal measures to both reduce greenhouse gas emissions and to adapt to climate change. Second, the 2008 resolution was directed at the federal government; this resolution is addressed to federal, state, local, territorial and tribal governments, as well as the private sector. Third, the present resolution reflects the greater urgency of climate change. In the more than a decade since the 2008 resolution, the scientific community has even stronger evidence that climate change is occurring, is mostly caused by human activities, and is already having adverse consequences. Reducing greenhouse gas (GHG) emissions and preparing for the impacts of climate change must take on even greater urgency. Finally, the present resolution recognizes the need for, and urges a greater role for lawyers in addressing climate change.

This resolution also builds on a 2011 ABA House of Delegates resolution that urged “the United States government to ensure that federally-recognized Indian tribes ... may participate fully ... in policy discussions on the issue of climate change domestically and in international fora.”<sup>2</sup>

Climate change must be addressed in the context of sustainable development—a conceptual framework that the ABA House of Delegates has endorsed three times. In August 2013, the ABA’s House of Delegates reaffirmed its 1991 and 2003 commitments to sustainable development, and defined sustainable development as “the promotion of an economically, socially and environmentally sustainable future for our planet and for present and future generations.”<sup>3</sup> It also urged “all governments, lawyers, and ABA entities to act in ways that accelerate progress toward sustainability.”<sup>4</sup> In the 2003

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<sup>1</sup> American Bar Association House of Delegates Resolution 109 (Feb. 11, 2008), [https://www.americanbar.org/content/dam/aba/directories/policy/2008\\_my\\_109.pdf](https://www.americanbar.org/content/dam/aba/directories/policy/2008_my_109.pdf).

<sup>2</sup> American Bar Association House of Delegates Resolution 112 (Aug. 8-9, 2011), [https://www.americanbar.org/content/dam/aba/directories/policy/2011\\_am\\_112.pdf](https://www.americanbar.org/content/dam/aba/directories/policy/2011_am_112.pdf). It also urged “the United States government to provide adequate and equitable financial and other support for Tribes to:

1. carry out measures such as mitigating climate change, reducing greenhouse gases, and promoting renewable energy and energy efficiency; and
2. adapt to direct impacts from climate and sea-level changes to their territorial and reservation land bases and resources....” *Id.*

<sup>3</sup> American Bar Association House of Delegates Resolution 105 (Aug. 12-13, 2013), [https://www.americanbar.org/content/dam/aba/administrative/office\\_president/2013\\_hod\\_annual\\_meeting\\_105.authcheckdam.pdf](https://www.americanbar.org/content/dam/aba/administrative/office_president/2013_hod_annual_meeting_105.authcheckdam.pdf).

<sup>4</sup> *Id.*

resolution, the ABA House of Delegates agreed to “promote the principles of sustainable development in relevant fields of law.”<sup>5</sup>

With these resolutions as a foundation, on November 9, 2018, the ABA Board of Governors approved the Mission Statement of the ABA Representative to the United Nations. One of the purposes of this representative is to “[e]nhance globally the reputation of the ABA as a trusted partner of the United Nations and advocate for the Rule of Law, access to justice, defender of human rights and implementation of the UN’s Sustainable Development Goals.” The Sustainable Development Goals are more specific expressions of the meaning of sustainable development, and were adopted in 2015.<sup>6</sup> One of the goals is to “take urgent action to combat climate change and its impacts.”<sup>7</sup> This is precisely the objective of this resolution.

Climate change presents significant risks to this and future generations. Climate change presents environmental risks, to be sure, but it also presents security, economic, and social risks. At the same time, the national and international response to climate change provides major opportunities for improving environmental quality, fostering economic growth and job creation, and enhancing domestic and global security. To foster sustainable development, the United States should play a leadership role in addressing climate change.

## I. Scientific Evidence and Consequences

According to the National Aeronautics and Space Administration (NASA), the past five years (2014-2018) are, together, “the warmest years in the modern record.”<sup>8</sup> In 2018, average surface temperatures around the world were 1.5 degrees Fahrenheit (0.83 degrees Celsius) warmer than they were about 40 to 70 years ago.<sup>9</sup> NASA also found

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<sup>5</sup> American Bar Association House of Delegates Resolution 105 (Aug. 11-12, 2003), [https://www.americanbar.org/content/dam/aba/directories/policy/2003\\_am\\_108.pdf](https://www.americanbar.org/content/dam/aba/directories/policy/2003_am_108.pdf).

<sup>6</sup> United Nations Sustainable Development Goals Knowledge Platform, Sustainable Development Goals, <https://sustainabledevelopment.un.org/?menu=1300> (last visited Feb. 22, 2019).

<sup>7</sup> United Nations Sustainable Development Goals Knowledge Platform, Sustainable Development Goal 13, <https://sustainabledevelopment.un.org/sdg13> (last visited Feb. 22, 2019). Goal 13 has five (5) Targets:

- (1) Strengthen resilience and adaptive capacity to climate-related hazards and natural disasters in all countries;
- (2) Integrate climate change measures into national policies, strategies and planning;
- (3) Improve education, awareness-raising and human and institutional capacity on climate change mitigation, adaptation, impact reduction and early warning;
- (4) Implement the commitment undertaken by developed-country parties to the United Nations Framework Convention on Climate Change to a goal of mobilizing jointly \$100 billion annually by 2020 from all sources to address the needs of developing countries in the context of meaningful mitigation actions and transparency on implementation and fully operationalize the Green Climate Fund through its capitalization as soon as possible;
- and (5) Promote mechanisms for raising capacity for effective climate change-related planning and management in least developed countries and small island developing States, including focusing on women, youth and local and marginalized communities.

<sup>8</sup> National Aeronautics and Space Administration, *2018 Fourth Warmest Year in Continued Warming Trend, According to NASA, NOAA* (Feb. 6, 2019), <https://climate.nasa.gov/news/2841/2018-fourth-warmest-year-in-continued-warming-trend-according-to-nasa-noaa/> (last visited April 21, 2019).

<sup>9</sup> *Id.* (using mean of the years 1950-1980 as baseline).

that Earth's global surface temperatures in 2018 ranked as the fourth warmest since 1880.<sup>10</sup>

Increased atmospheric concentrations of GHGs, the Intergovernmental Panel on Climate Change (IPCC) concluded in 2014, “are extremely likely to have been the dominant cause of the observed warming since the mid-20th century.”<sup>11</sup> The IPCC also concluded that further emission increases will have significant adverse effects: “Continued emission of greenhouse gases will cause further warming and long-lasting changes in all components of the climate system, increasing the likelihood of severe, pervasive and irreversible impacts for people and ecosystems.”<sup>12</sup>

The 2018 IPCC report<sup>13</sup> makes clear that the scientific evidence of the magnitude, speed, and consequences of climate change is becoming increasingly urgent. According to this and other IPCC reports and those of the U.S. National Academy of Sciences and all other major national academy of science reports, climate change is occurring, human activities contribute to it, and climate change will have adverse effects on the United States and the rest of the world. While there remain some uncertainties about its magnitude, the evidence of climate change easily passes the certainty tests that are used to make decisions in other relevant areas of law and policy.

In 2009, after detailed analysis of the science and consideration of extensive public comment, the U.S. Environmental Protection Agency (EPA) made a formal finding that “six greenhouse gases taken in combination endanger both the public health and the public welfare of current and future generations.”<sup>14</sup> For public health, EPA “has considered how elevated concentrations of the well-mixed greenhouse gases and associated climate change affect public health by evaluating the risks associated with changes in air quality, increases in temperatures, changes in extreme weather events, increases in food- and water-borne pathogens, and changes in aeroallergens.”<sup>15</sup> For public welfare, a term defined under the Clean Air Act (CAA) to include a wide variety of non-health-related impacts,<sup>16</sup> EPA considered “numerous and far-ranging risks to food production and

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<sup>10</sup> *Id.*

<sup>11</sup> IPCC, CLIMATE CHANGE 2014 SYNTHESIS REPORT: SUMMARY FOR POLICYMAKERS 4 (2014), [https://www.ipcc.ch/site/assets/uploads/2018/02/AR5\\_SYR\\_FINAL\\_SPM.pdf](https://www.ipcc.ch/site/assets/uploads/2018/02/AR5_SYR_FINAL_SPM.pdf).

<sup>12</sup> *Id.* at 8.

<sup>13</sup> IPCC, GLOBAL WARMING OF 1.5 °C: SUMMARY FOR POLICY MAKERS (2018), [https://www.ipcc.ch/site/assets/uploads/2018/02/AR5\\_SYR\\_FINAL\\_SPM.pdf](https://www.ipcc.ch/site/assets/uploads/2018/02/AR5_SYR_FINAL_SPM.pdf).

<sup>14</sup> Endangerment and Cause or Contribute Findings for Greenhouse Gases Under Section 202(a) of the Clean Air Act, 74 Fed. Reg. 66496, 66496 (Dec. 15, 2009) (codified at 40 C.F.R. ch. I). EPA also found that “the combined emissions of these greenhouse gases from new motor vehicles and new motor vehicle engines contribute to the greenhouse gas air pollution that endangers public health and welfare” under § 202(a) of the CAA, 42 U.S.C. § 7521(a). *Id.* The six gases are carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride. *Id.* at 66497. EPA denied petitions for reconsideration of that finding. EPA’s Denial of the Petitions to Reconsider the Endangerment and Cause or Contribute Findings for Greenhouse Gases Under Section 202(a) of the Clean Air Act, 75 Fed. Reg. 49556 (Aug. 13, 2010).

<sup>15</sup> 74 Fed. Reg. at 66497.

<sup>16</sup> 42 U.S.C. § 7602(h):

All language referring to effects on welfare includes, but is not limited to, effects on soils, water, crops, vegetation, manmade materials, animals, wildlife, weather, visibility, and climate, damage to and deterioration of property, and hazards to transportation, as well as

agriculture, forestry, water resources, sea level rise and coastal areas, energy, infrastructure, and settlements, and ecosystems and wildlife.”<sup>17</sup>

The endangerment finding was then challenged before the U.S. Court of Appeals for the District of Columbia (D.C.) Circuit, which unanimously upheld the finding.<sup>18</sup> The U.S. Supreme Court took jurisdiction over another part of this case, and reversed the D.C. Circuit’s decision on that part of the case, but did not take jurisdiction over the endangerment finding decision.<sup>19</sup> The present Administration has not taken any action to date to modify or overturn the endangerment finding.

The endangerment finding is not the last word on the actual and likely impacts of climate change on the United States. The U.S. Global Change Research Program, which was authorized by the U.S. Congress in 1990, issued the first portion of its fourth climate change assessment in 2017.<sup>20</sup> Concentrations of CO<sub>2</sub> in the atmosphere, the report said, are now more than 400 ppm [parts per million], “a level that last occurred about 3 million years ago, when both global average temperature and sea level were significantly higher than today.”<sup>21</sup> “Global annually averaged surface air temperature has increased by about 1.8°F (1.0°C) over the last 115 years (1901–2016).”<sup>22</sup> In addition, “over the next few decades (2021–2050), annual average temperatures are expected to rise by about 2.5°F for the United States, relative to the recent past (average from 1976–2005), under all plausible future climate scenarios.”<sup>23</sup> Finally, global annual average temperatures “could reach 9°F (5°C) or more by the end of this century” relative to pre-industrial times if the world continues on a business-as-usual pathway.<sup>24</sup> It projected sea-level rise by 2100 at one to four feet, and said that a rise of eight feet “cannot be ruled out.”<sup>25</sup> Already, U.S. Global Change Research Program explained, rainfall intensity is increasing, the incidence of forest fires is greater, the ocean is acidifying, and glaciers are melting.<sup>26</sup>

All of these things cause or contribute to adverse effects on human rights in the United States and the rest of the world.<sup>27</sup> Extreme weather events, “their causes and consequences, raise questions of justice and human rights. Climate change affects

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effects on economic values and on personal comfort and well-being, whether caused by transformation, conversion, or combination with other air pollutants.

<sup>17</sup> 74 Fed. Reg. at 66498.

<sup>18</sup> *Coalition for Responsible Regulation v. Environmental Prot. Agency*, 684 F.3d 102 (D.C. Cir. 2012), *rev’d in part on other grounds sub nom. Utility Air Regulatory Group v. Environmental Prot. Agency*, 134 S. Ct. 2427 (2014).

<sup>19</sup> *Id.*

<sup>20</sup> U.S. GLOBAL CHANGE RESEARCH PROGRAM, CLIMATE SCIENCE SPECIAL REPORT: FOURTH NATIONAL CLIMATE ASSESSMENT (Vol. 1) (2017) [hereinafter CLIMATE SCIENCE SPECIAL REPORT], [https://science2017.globalchange.gov/downloads/CSSR2017\\_FullReport.pdf](https://science2017.globalchange.gov/downloads/CSSR2017_FullReport.pdf).

<sup>21</sup> *Id.* at 11.

<sup>22</sup> *Id.* at 10.

<sup>23</sup> *Id.* at 11.

<sup>24</sup> *Id.* at 10-11.

<sup>25</sup> *Id.* at 10.

<sup>26</sup> *Id.* at 10-11.

<sup>27</sup> INTERNATIONAL BAR ASSOCIATION CLIMATE CHANGE JUSTICE AND HUMAN RIGHTS TASK FORCE, ACHIEVING JUSTICE AND HUMAN RIGHTS IN AN ERA OF CLIMATE DISRUPTION (2014), [file:///C:/Users/John%20Dern/Downloads/Climate%20Change%20Justice%20and%20Human%20Rights%20Report%20\(1\).pdf](file:///C:/Users/John%20Dern/Downloads/Climate%20Change%20Justice%20and%20Human%20Rights%20Report%20(1).pdf).

everyone, but it disproportionately strikes those who have contributed least to it and who are also, for a variety of reasons, least well placed to respond.”<sup>28</sup> “Climate justice seeks to combine the climate change discussion with human rights in a way that is equitable for the most climate-vulnerable groups.”<sup>29</sup> The adverse effects of climate change, particularly those in low-lying island countries and those in already hot regions, could potentially be catastrophic. For example, it may not be possible to even survive without air-conditioning in some very hot regions during the hottest months as temperatures increase.<sup>30</sup>

The evolving climate science indicates that adverse effects will be much lower if the temperature increase is as low as possible, and if emissions are reduced to net zero or lower as soon as possible. A review article comprehensively synthesizing recent research, for example, determined that climate disruption from GHG pollution would cause additional and more severe adverse impacts than those identified in EPA’s 2009 endangerment finding.<sup>31</sup> The resolution links the GHG emissions reduction timetable to the latest peer-reviewed science.

The resolution also indicates that the U.S. should contribute its fair share to reducing global greenhouse gas emissions, recognizing that, while responsibility for growing concentrations of greenhouse gas emissions is shared among many countries, the U.S. has a large historical responsibility for those concentrations, and that it should reduce its emissions accordingly.

## II. International Framework

The United States participated actively in the negotiations that led to the United Nations Framework Convention on Climate Change (Convention),<sup>32</sup> and played a major role in shaping it. The United States signed the Convention on June 12, 1992, at the United Nations Conference on Environment and Development in Rio de Janeiro. The Senate gave its advice and consent on October 7, 1992.<sup>33</sup> Less than a week later, on October 13, President George H.W. Bush signed the instrument of ratification and transmitted it to the Convention Secretariat,<sup>34</sup> making the U.S. the fourth country in the world to ratify the Convention. The Convention took effect in 1994, and now has 197 parties—196 countries plus the European Union.<sup>35</sup>

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<sup>28</sup> *Id.* at 2.

<sup>29</sup> *Id.* at 3.

<sup>30</sup> Jeremy S. Pal & Elfatih A.B. Eltahir, *Future Temperature in Southwest Asia Projected to Exceed a Threshold for Human Adaptability*, 6 NATURE CLIMATE CHANGE 197 (2016).

<sup>31</sup> Philip B. Duffy et al., *Strengthened Scientific Support for the Endangerment Finding for Atmospheric Greenhouse Gases*, 363 SCIENCE (Feb. 20, 2019),

<http://science.sciencemag.org/content/sci/363/6427/eaat5982.full.pdf>.

<sup>32</sup> United Nations Framework Convention on Climate Change, 1771 U.N.T.S. 107, U.N. Doc. A/AC.237/18 (1992), *reprinted in* 31 I.L.M. 849 (1992).

<sup>33</sup> 138 Cong. Rec. S17150, S17156 (daily ed. Oct. 7, 1992) (reporting Senate approval of ratification of the resolution).

<sup>34</sup> United States Instrument of Ratification, United Nations Framework Convention on Climate Change (Oct. 13, 1992).

<sup>35</sup> United Nations Framework Convention on Climate Change: Status of Ratification,

<https://unfccc.int/process/the-convention/what-is-the-convention/status-of-ratification-of-the-convention>

As its name indicates, the Convention creates an international legal framework, including reporting, scientific and technological research, and annual meetings of the conference of the parties, to address climate change. The Convention does not contain any binding commitments to reduce GHG emissions by a certain amount by a date certain. The Convention treats developed countries and developing countries differently. As the Convention's preamble states, developed countries have contributed the largest share of historical and current global emissions of greenhouse gases, and have higher per capita emissions levels than developing countries.<sup>36</sup> Thus, in ratifying the Convention, developed countries agreed to adopt policies and measures that will demonstrate that they "are taking the lead" in addressing climate change.<sup>37</sup>

On December 12, 2015, in Paris, France, the Parties to the Convention agreed to a goal of net zero GHG emissions by no later than the second half of this century.<sup>38</sup> The zero emissions target in the Paris Agreement is framed in terms of "a balance between anthropogenic [human caused] emissions by sources and removals by sinks...."<sup>39</sup> The term "net zero" derives from U.N. Convention. Carbon dioxide, the most important climate change pollutant, can be removed from the atmosphere by a variety of natural and other processes that are collectively defined as sinks.<sup>40</sup> The "balance" of emissions and removals by sinks means net zero emissions.<sup>41</sup>

The Paris Agreement, as it is called, marks the first time since the Convention was opened for signature in 1992 that all Parties have agreed to such a goal. It was also the first time that all Parties agreed to take actions to reduce their GHG emissions.<sup>42</sup> The Kyoto Protocol did not contain an overall emissions reduction goal, and only limited developed countries' emissions.<sup>43</sup>

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<sup>36</sup> Convention, *supra* note 32, preamble para. 3. In the preamble, parties also recognize the "special difficulties" of developing countries, including their need for access to new technologies to address climate change. *Id.* paras. 20 & 22.

<sup>37</sup> *Id.* art. 4.2(a).

<sup>38</sup> The Paris Agreement states:

Parties aim to reach global peaking of greenhouse gas emissions as soon as possible . . . and to undertake rapid reductions thereafter . . . so as to achieve a balance between anthropogenic emissions by sources and removals by sinks of greenhouse gases in the second half of this century.

*Adoption of the Paris Agreement*, U.N. Framework Convention on Climate Change Conference of the Parties, 21st Sess., Agenda Item 4(b), art. 4.1 (in Decision 1/CP.21), U.N. Doc. FCCC/CP/2015/L.9/Rev.1 (2015).

<sup>39</sup> *Id.*

<sup>40</sup> *Convention, supra* note 32, at art. 1.8 (defining a "sink" as "any process, activity or mechanism which removes a greenhouse gas, an aerosol or a precursor of a greenhouse gas from the atmosphere").

<sup>41</sup> Kelly Levin et al., *INSIDER: Understanding the Paris Agreement's Long-Term Goal to Limit Global Warming*, WORLD RES. INST. (Dec. 15, 2015), <http://www.wri.org/blog/2015/12/insider-understanding-paris-agreement%E2%80%99s-long-term-goal-limit-global-warming>.

<sup>42</sup> Joby Warrick & Chris Mooney, *196 Countries Approve Historic Climate Agreement*, WASH. POST, Dec. 12, 2015, <https://www.washingtonpost.com/news/energy-environment/wp/2015/12/12/proposed-historic-climate-pact-nears-final-vote/>.

<sup>43</sup> Kyoto Protocol to the United Nations Framework Convention on Climate Change, art. 3.1 & Annex B, U.N. Doc. FCCC/CP/197/L.7/Add. (1998), <http://unfccc.int/resource/docs/convkp/kpeng.pdf>.

The Paris Agreement was designed to achieve the objective of the Convention on Climate Change, which is the “stabilization of greenhouse gas concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system.”<sup>44</sup> The world’s understanding of what that level means is evolving in the direction of lower concentrations of GHGs and thus lower emissions. Prior to Paris, the most frequently stated goal was to hold the global increase in temperatures to 2°C (or 3.6°F) above pre-industrial levels.<sup>45</sup> The Paris Agreement, however, aims to hold “the increase in the global average temperature to well below 2°C above pre-industrial levels and to pursue efforts to limit the temperature increase to 1.5°C [3.7°F] above pre-industrial levels, recognizing that this would significantly reduce the risks and impacts of climate change.”<sup>46</sup> As indicated above, subsequently published scientific reports indicate that much greater and more rapid reductions may be required.

In June 2017, the current President announced his intention to withdraw the United States from the Paris Agreement.<sup>47</sup> Under the Paris Agreement, no country can withdraw from the agreement for a period of three years after the agreement enters into force.<sup>48</sup> That withdrawal, in turn, is effective one year later.<sup>49</sup> Because the Paris Agreement achieved a sufficient number of ratifications and other approvals to enter into force on November 4, 2016, the earliest that the United States can actually withdraw is November 4, 2020,<sup>50</sup> which is one day after the 2020 U.S. presidential election.

### III. Current Efforts

#### A. State, Territorial, and Local Governments

State, territorial, and local governments are playing a leading role in addressing climate change in the United States. State efforts to compel action by the federal government in response to the current administration’s deregulatory agenda have been enhanced by *Massachusetts v. EPA*, which held that the federal government is responsible for protecting individual state interests, practically ensuring the ability of states to demonstrate standing in lawsuits against the federal government.<sup>51</sup> State Attorneys General have been aggressive in recent litigation against the federal government.<sup>52</sup>

<sup>44</sup>Convention, *supra* note 32, art. 2.

<sup>45</sup> *Report of the Conference of the Parties on Its Sixteenth Session, Held in Cancun From 29 November to 10 December 2010*, U.N. Framework Convention on Climate Change, Decision 1/CP.16, ¶ 4, U.N. Doc. FCCC/CP/2010/7/Add.1 (2011), <http://unfccc.int/resource/docs/2010/cop16/eng/07a01.pdf>.

<sup>46</sup> United Nations Framework Convention on Climate.

<sup>47</sup> See Remarks Announcing United States Withdrawal From the United Nations Framework Convention on Climate Change Paris Agreement, 2017 DAILY COMP. PRES. DOC. 00373 (June 1, 2017), <https://www.gpo.gov/fdsys/pkg/DCPD-201700373/pdf/DCPD-201700373.pdf>.

<sup>48</sup> Paris Agreement, *supra* note 38, art. 28.1.

<sup>49</sup> *Id.* art. 28.2.

<sup>50</sup> United Nations Framework Convention on Climate Change, *Paris Agreement—Status of Ratification*, <https://unfccc.int/process/the-paris-agreement/status-of-ratification> (last visited Apr. 27, 2019).

<sup>51</sup> 549 U.S. 497, 519-20 (2007) (holding: “These sovereign prerogatives to force reductions in greenhouse gas emissions...are now lodged in the Federal Government,..Congress has ordered [EPA] to protect Massachusetts...by prescribing applicable standards”); see Philip Green, *Keeping Them Honest: How State Attorneys General Use Multistate Litigation to Exert Meaningful Oversight Over Administrative Agencies in the Trump Era*, 71 ADMIN. L. REV. 251 (Winter 2019).

<sup>52</sup> See e.g., *New York v. Pruitt*, 1:18-cv-1030 (S.D. N.Y. Feb. 6, 2018) (regarding the Clean Water Rule).

Many states are employing a planning process that involves a GHG reduction goal and implementation of a suite of legal and policy measures to achieve that goal. Others are acting without quantifiable reduction goals, but are nonetheless employing a suite of tools. These tools include, but are not limited to, renewable electricity portfolio standards, net metering, carbon dioxide limits on new power plants, energy efficiency provisions in building codes, public funding or benefit programs for efficiency and renewable energy, tax credits, and registries for early GHG reductions. In addition to reducing GHG emissions, these tools reduce negative external costs of energy generation, require energy conservation activities whose benefits exceed their costs, and use the market to reduce net emissions. They also limit and even lower energy costs for the poor, and create employment and economic growth. Use of these tools can also reduce emissions of other air pollutants, including sulfur dioxide and nitrogen oxides.

A growing number of states are acting on a regional basis. The most prominent of these is the Regional Greenhouse Gas Initiative (RGGI). “RGGI is a cooperative effort among the states of Connecticut, Delaware, Maine, Maryland, Massachusetts, New Hampshire, New York, Rhode Island, and Vermont to cap and reduce CO<sub>2</sub> emissions from the power sector.”<sup>53</sup> New Jersey is preparing to rejoin RGGI and Virginia has proposed regulations that would allow trading with RGGI states.<sup>54</sup> The nine-state RGGI program has put a descending cap on GHG from the power sector, and provides for trading of allowances.<sup>55</sup> Another trading initiative involves the state of California and the provinces of Quebec and Ontario. The California-Quebec-Ontario program creates an economy-wide cap and trade program that covers all major GHG emission sources and further requires that distributors of fossil fuels and electricity importers surrender allowances equal to the emissions created by combustion of the fuels or generation of the imported electricity.<sup>56</sup>

At the local level, 1,060 U.S. municipalities have signed the Mayors Climate Protection Agreement, under which they agree to strive to meet or exceed the Kyoto Protocol goal of a seven percent reduction in GHG emissions from 1990 levels by 2012.<sup>57</sup> Ten states, 281 cities and counties, nine tribes, and more than 2,000 businesses and investors have joined the “We Are Still In” coalition to advance the goals of the Paris Climate Agreement.<sup>58</sup> “We Are Still In” signatories represent a constituency of more than half of all Americans, and taken together, they represent \$6.2 trillion, a bigger economy

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<sup>53</sup> The Regional Greenhouse Gas Initiative, Welcome, <https://www.rggi.org/> (last visited Apr. 27, 2019).

<sup>54</sup> The State has published a proposed regulation that mirrors the RGGI program and would allow trading even without Virginia joining RGGI. 9VAC5-140. Regulation for Emissions Trading Programs (adding 9VAC5-140-6010 through 9VAC5-140-6430), 34 VA. Reg. 924 (Jan. 8, 2018). See also, Darrell Proctor, *Virginia Moves to Join RGGI Carbon-trading Market*, POWER (Nov. 15, 2017), <http://www.powermag.com/virginia-moves-to-join-rggi-carbon-trading-market/>.

<sup>55</sup> Reg'l Greenhouse Gas Initiative, Elements of RGGI, <https://www.rggi.org/program-overview-and-design/elements> (last visited Apr. 27, 2019).

<sup>56</sup> Cal. Air Res. Bd., *California Cap-and-Trade Program: Facts About The Linked Cap-and-Trade Programs* (2017), [https://www.arb.ca.gov/cc/capandtrade/linkage/linkage\\_fact\\_sheet.pdf](https://www.arb.ca.gov/cc/capandtrade/linkage/linkage_fact_sheet.pdf).

<sup>57</sup> The U.S. Conference of Mayors, Mayors Climate Protection Center, <https://www.usmayors.org/mayors-climate-protection-center/> (last visited Feb. 20, 2019).

<sup>58</sup> We Are Still In, Who's In, <https://www.wearestillin.com/signatories> (last visited Feb. 20, 2019).

than any nation other than the U.S. or China.<sup>59</sup> In addition, “90 cities, more than ten counties and two states, have already adopted ambitious 100% clean energy goals.”<sup>60</sup> Six of these cities are already supplied by 100% renewable electricity.<sup>61</sup>

## B. Tribal Governments

There are 573 federally recognized American Indian and Alaska Native tribes, many of which have direct experience in coping with the impacts of climate change. The Fourth National Climate Assessment devotes a chapter to tribes and other indigenous peoples.<sup>62</sup> Drawing on an extensive amount of published studies as well as meetings with tribal representatives and others with relevant expertise, that chapter presents some observations regarding the wide range of climate change impacts being experienced by Indian and Alaska Native tribes, including:

“. . . Though they may be affected by climate change in ways that are similar to others in the United States, Indigenous peoples can also be affected uniquely and disproportionately. Many Indigenous peoples have lived in particular areas for hundreds if not thousands of years, and their cultures, spiritual practices, and economies have evolved to be adaptive to local seasonal and interannual environmental changes. . . .”<sup>63</sup>

“Most Indigenous peoples across all regions of the United States pursue a mix of traditional subsistence and commercial sector activities that include agriculture, hunting and gathering, fisheries, forestry, energy, recreation, and tourism enterprises. Observed and projected changes of increased wildfire, diminished snowpack, pervasive drought, flooding, ocean acidification, and sea level rise threaten the viability of each of these enterprises. . . .”<sup>64</sup>

Over the last decade, many American Indian and Alaska Native tribes have begun aggressive efforts to understand climate change impacts on their tribal communities, and to plan for adaption action to reduce those impacts on their tribal members and on the built environment. Several key actions taken include comprehensive climate action and adaptation planning, strategic energy planning, and climate action assessments. More than 35 tribes have developed climate action assessment and adaption plans – most of which include distributed renewable energy projects as key components to adapting to climate change. These tribes have been supported by the Pacific Northwest Tribal Climate

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<sup>59</sup> We Are Still In, About, <https://www.wearestillin.com/about> (last visited Feb. 20, 2019).

<sup>60</sup> Sierra Club, 100% Commitments in Cities, Counties, & States, <https://www.sierraclub.org/ready-for-100/commitments> (last visited Feb. 20, 2019).

<sup>61</sup> *Id.*

<sup>62</sup> L.C. Jantarasami, et al, *Tribes and Indigenous Peoples*, in IMPACTS, RISKS, AND ADAPTATION IN THE UNITED STATES: FOURTH NATIONAL CLIMATE ASSESSMENT, VOLUME II [D.R. Reidmiller, et al, eds. 2018] (U.S. Global Change Research Program) at.572-603, <https://nca2018.globalchange.gov/chapter/tribes>.

<sup>63</sup> *Id.* at 575.

<sup>64</sup> *Id.* at 579.

Change Network at the University of Oregon<sup>65</sup> and the Institute of Tribal Environmental Professionals at Northern Arizona University.<sup>66</sup>

The National Congress of American Indians (NCAI) recently launched a pair of intertribal initiatives to deal with climate change. Established in 1944, NCAI is the oldest, largest and most representative national organization made up of American Indian and Alaska Native tribal governments and their citizens. Since at least 2006, NCAI has expressed concern over the unique effects climate change has had on tribal nations and the need to create a national, mandatory program to reduce climate change within a timeframe that prevents irreparable and irreversible harm to human health, the economy and environment.<sup>67</sup> Building on the expressed desires of NCAI's voting membership (which includes tribal nations and individual citizens of tribal nations), in February 2019, at the NCAI Executive Council Winter Session, NCAI President Jefferson Keel announced the launch of the NCAI Climate Action Resource Center and the pending establishment of the NCAI Climate Action Task Force (CATF). These two initiatives represent a commitment by tribal nations not only to the importance of this issue, but also to share creative ways in which tribal nations, as front line communities, are leading initiatives to combat climate change.<sup>68</sup>

As governments exercising inherent sovereignty within their reservations, tribes can make valuable contributions to the utilization of a wide range of legal mechanisms to reduce greenhouse gas emissions and to adapt to climate change. It should be noted, however, that tribes are different from state and local governments in certain ways, and some of the policy tools referred to in this report may require some modification to render them useful by tribes.

### C. U.S. Government

The United States has no overall goal for reducing GHG emissions, although there are disparate legal mechanisms that can help reduce these emissions to a limited extent. Nor does the United States appear to be prepared to adapt to the consequences of climate change.

As a result, U.S. GHG emissions are about the same as they were in 1990. In 2017, net GHG emissions in the United States were 14.1% lower than they were in 2007 just

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<sup>65</sup>University of Oregon, Tribal Climate Change Project, <https://tribalclimate.uoregon.edu/> (last visited Apr. 27, 2019).

<sup>66</sup> Northern Arizona University, Tribal Adaptation Plans, Toolkits, Planning Guides <http://www7.nau.edu/itep/main/tcc/Mindmap/TribalAdaptationPlans> (last visited Apr. 27, 2019).

<sup>67</sup> See, e.g., THE NATIONAL CONGRESS OF AMERICAN INDIANS, RESOLUTION #EWS-06-004: SUPPORTING A NATIONAL MANDATORY PROGRAM TO REDUCE CLIMATE CHANGE POLLUTION AND PROMOTE RENEWABLE ENERGY (2006), [http://www.ncai.org/attachments/Resolution\\_KSlvpcMnfSafhsDsxFnQcTDKMclEpNfvEPQFCsLihonOXZrOOXu\\_EWS-06-004.pdf](http://www.ncai.org/attachments/Resolution_KSlvpcMnfSafhsDsxFnQcTDKMclEpNfvEPQFCsLihonOXZrOOXu_EWS-06-004.pdf); THE NATIONAL CONGRESS OF AMERICAN INDIANS RESOLUTION #MOH-17-053: CONTINUED SUPPORT FOR THE PARIS CLIMATE AGREEMENT AND ACTION TO ADDRESS CLIMATE CHANGE (2017), [http://www.ncai.org/attachments/Resolution\\_NCDmKFSVrETdIUtFZxWeVSayYSqcrfaNBHJfrncWYVPNIIdCBAXU\\_MOH-17-053.pdf](http://www.ncai.org/attachments/Resolution_NCDmKFSVrETdIUtFZxWeVSayYSqcrfaNBHJfrncWYVPNIIdCBAXU_MOH-17-053.pdf).

<sup>68</sup> The National Council of American Indians, Climate Action Resource Center, <http://www.ncai.org/ptg/climate> (last visited Apr. 27, 2019).

before the recession, but 1.6% greater than they were in 1990.<sup>69</sup> The United States is the second-largest emitter of GHGs in the world (after China).<sup>70</sup> U.S. CO<sub>2</sub> emissions per capita are among the highest in the world.<sup>71</sup> After three years in which U.S. carbon dioxide emissions declined, emissions rose by 3.4% in 2018, according to preliminary estimates by the Rhodium Group.<sup>72</sup>

The United States has had laws for several decades that support energy efficiency and conservation. The U.S. also has laws fostering the use of renewable energy.<sup>73</sup> Finally, the U.S. Supreme Court decided in *Massachusetts v. EPA* that GHGs are pollutants under the Clean Air Act,<sup>74</sup> thus providing the federal government with the ability to use the Clean Air Act to reduce greenhouse gas emissions. Federal efforts to address climate change intensified during the previous Administration, which used this decision to adopt the endangerment finding described in Section I of this report. Perhaps the most publicly visible and politically controversial manifestation of that was the Clean Power Plan, which was intended to reduce GHGs from electric power-generating facilities by 32% from 2005 levels by 2030.<sup>75</sup>

On the other hand, the present Administration, seeing the climate change issue through the lenses of reducing government regulation and trying to revive the coal industry, has expressed skepticism about the basic science of climate change and initiated proceedings to roll back many previous Administration initiatives on climate change,<sup>76</sup> including the Clean Power Plan.<sup>77</sup>

#### D. Private Sector

<sup>69</sup> U.S. ENVIRONMENTAL PROTECTION AGENCY, INVENTORY OF U.S. GREENHOUSE GAS EMISSIONS AND SINKS: 1990-2017. at ES-4 (2019), <https://www.epa.gov/sites/production/files/2019-02/documents/us-ghg-inventory-2019-main-text.pdf>.

<sup>70</sup> U.S. Environmental Protection Agency, *Global Greenhouse Gas Emissions Data*, <https://www.epa.gov/ghgemissions/global-greenhouse-gas-emissions-data> (last visited Apr. 27, 2019).

<sup>71</sup> World Bank, *CO<sub>2</sub> Emissions (Metric Tons Per Capita)* (showing U.S. per capita emissions to be 17.0 tons in 2011, which is exceeded only by Aruba, Bahrain, Brunei Darussalam, Kuwait, Luxembourg, Oman, Qatar, Trinidad and Tobago, and United Arab Emirates), <http://data.worldbank.org/indicator/EN.ATM.CO2E.PC> (last visited Apr. 27, 2019).

<sup>72</sup> Rhodium Group, *Preliminary US Emissions Estimates for 2018* (Jan. 8, 2019), <https://rhg.com/research/preliminary-us-emissions-estimates-for-2018/>.

<sup>73</sup> See *generally*, GLOBAL CLIMATE CHANGE AND U.S. LAW, (Michael B. Gerrard & Jody Freeman eds., 2d ed. 2014).

<sup>74</sup> 549 U.S. 497 (2007).

<sup>75</sup> Carbon Pollution Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units, 80 Fed. Reg. 64661, 64736 n.384 (Oct. 23, 2015) (to be codified at 40 C.F.R. pt. 60).

<sup>76</sup> See Columbia Law School, Sabin Center for Climate Change Law, *Climate Deregulation Tracker*, <http://columbiaclimatelaw.com/resources/climate-deregulation-tracker/> (last visited Apr. 27, 2019).

<sup>77</sup> Emission Guidelines for Greenhouse Gas Emissions From Existing Electric Utility Generating Units; Revisions to Emission Guideline Implementing Regulations; Revisions to New Source Review Program, 83 Fed. Reg. 44,746 (Aug. 31, 2018) (to be codified at 40 C.F.R. pts. 51, 52, and 60); Repeal of Carbon Pollution Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units, 82 Fed. Reg. 48035, 48035 (Oct. 16, 2017) (to be codified at 40 C.F.R. pt. 52), <https://www.federalregister.gov/documents/2017/10/16/2017-22349/repeal-of-carbon-pollution-emission-guidelines-for-existing-stationary-sources-electric-utility>. Prior to this, the U.S. Supreme Court enjoined implementation of the Clean Power Plan until all legal challenges are resolved. *West Virginia v. EPA*, Env'tl. Prot. Agency, 136 S. Ct. 1000, 1000 (2016).

The U.S. business community is disadvantaged in implementing reductions by the absence of a comprehensive federal program, national flip-flopping on climate policy between Presidential Administrations, the proliferation of inconsistent state and regional regulations, and litigation that is intended to force (or substitute for) federal regulation. The lack of a federal program also makes capital expenditure for carbon reduction planning very difficult, inhibits research and development, robs businesses of economies of scale and of markets for climate-friendly technologies and products, and puts them at a disadvantage compared to companies in countries that have ratified the Kyoto Protocol, are working toward achievement of the goals in the Paris Agreement, or both.

The function of many other public climate change mitigation laws can be served—at least to some degree—by some form of private governance.<sup>78</sup> This does not mean that private governance is necessarily of equal effectiveness to public governance, but it does mean “that there are more options available to decision makers than traditionally believed.”<sup>79</sup> This is no small thing. Private corporate greenhouse gas emissions reductions could be as high as one-half billion tons of CO<sub>2</sub> equivalent, which is “equal to a regulatory approach that would reduce the emissions of the U.S. transportation sector by a third.”<sup>80</sup> In 2017, the World Wildlife Fund and others issued a report stating that “nearly half of the companies in the 2016 Fortune 500 have set targets to reduce greenhouse gases (GHG), improve energy efficiency, and/or increase renewable energy sourcing.”<sup>81</sup> The Fortune 500 is comprised entirely of U.S. corporations.

#### IV. Framework and Tools for Getting to Net Zero Greenhouse Gas Emissions

Reducing U.S. GHGs to net zero or below by 2050 or earlier, or even to 20% of 1990 levels by 2050, is often referred to as “deep decarbonization”—“deep” because it requires systemic changes to the energy economy.<sup>82</sup> More than a thousand legal tools are available to federal, state, tribal, territorial, and local governments, as well as the private sector, to get the job done.

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<sup>78</sup> MICHAEL P. VANDENBERGH & JONATHAN M. GILLIGAN, BEYOND POLITICS: THE PRIVATE GOVERNANCE RESPONSE TO CLIMATE CHANGE 53-71 (2017).

<sup>79</sup> *Id.* at 53.

<sup>80</sup> *Id.* at 224.

<sup>81</sup> World Wildlife Fund et al., Power Forward 3.0: How the Largest U.S. Companies are Capturing Business Value While Addressing Climate Change (2017), [https://c402277.ssl.cf1.rackcdn.com/publications/1049/files/original/Power\\_Foward\\_3.0\\_-\\_April\\_2017\\_-\\_Digital\\_Second\\_Final.pdf?1493325339](https://c402277.ssl.cf1.rackcdn.com/publications/1049/files/original/Power_Foward_3.0_-_April_2017_-_Digital_Second_Final.pdf?1493325339).

<sup>82</sup> Deep decarbonization applies not only to reductions in carbon dioxide, but also other GHG pollutants, such as methane and nitrous oxide. “Deep decarbonization’ refers to the reduction of greenhouse gas (GHG) emissions over time to a level consistent with limiting global warming to 2°C or less, based on the scientific consensus that higher levels of warming pose an unacceptable risk of dangerous climate change.” JAMES H. WILLIAMS ET AL., PATHWAYS TO DEEP DECARBONIZATION IN THE UNITED STATES, U.S. 2050 REPORT, VOLUME 2: POLICY IMPLICATIONS OF DEEP DECARBONIZATION IN THE UNITED STATES 8 (Deep Decarbonization Pathways Project & Energy and Environmental Economics, Inc., 2015), [http://deepdecarbonization.org/wp-content/uploads/2015/11/US\\_Deep\\_Decarbonization\\_Policy\\_Report.pdf](http://deepdecarbonization.org/wp-content/uploads/2015/11/US_Deep_Decarbonization_Policy_Report.pdf) [hereinafter DDPP U.S. POLICY REPORT].

Two reports by the Deep Decarbonization Pathways Project (DDPP) outline a basic approach for deep decarbonization in the United States.<sup>83</sup> The DDPP, which is led by the Sustainable Development Solutions Network<sup>84</sup> and the Institute for Sustainable Development and International Relations (IDDRI),<sup>85</sup> is the principal international effort to devise pathways to decarbonize the global economy.<sup>86</sup>

The two DDPP reports, taken together, make remarkably clear the gap that exists between current law and the laws that are needed to achieve deep decarbonization. Perhaps the DDPP's "most important finding is that it is technically feasible for the U.S. to reduce [carbon dioxide] emissions from fossil fuel combustion" to 85% below 1990 levels by 2050.<sup>87</sup> If the United States did that, the report states, it could reduce its overall greenhouse gas emissions to 80% below 1990 levels by 2050.<sup>88</sup> The overall cost to the U.S. economy in 2050, DDPP says, is about 0.8% of the expected GDP for 2050.<sup>89</sup> The reports do not calculate the considerable public health, safety, security, economic, environmental and other benefits.

According to the reports, enormous changes would be required to achieve this level of reduction. The U.S. would more than double the efficiency with which energy is used. Nearly all electricity would be carbon free or use carbon capture and sequestration. Electricity production would also double because gasoline and diesel fuel for transportation would be mostly replaced by electricity.<sup>90</sup> Significantly, the reports do not identify a single approach to deep decarbonization. Instead, they show four different pathways or scenarios—a high renewables scenario, a high nuclear energy scenario, a high carbon capture and sequestration scenario, and a mixed scenario involving a balanced combination of all three.

But how is this level of reduction to be accomplished? Ultimately, deep decarbonization is not likely to occur unless general policies are translated into proposed laws, enacted, and then implemented. More than 1,000 legal tools are available to achieve deep decarbonization in the United States, according to a newly published book, *Legal*

<sup>83</sup> JAMES H. WILLIAMS ET AL., PATHWAYS TO DEEP DECARBONIZATION IN THE UNITED STATES, U.S. 2050 REPORT, VOLUME 1: TECHNICAL REPORT xii (Deep Decarbonization Pathways Project & Energy and Environmental Economics, Inc., 2015), [http://deepdecarbonization.org/wp-content/uploads/2015/11/US\\_Deep\\_Decarbonization\\_Technical\\_Report.pdf](http://deepdecarbonization.org/wp-content/uploads/2015/11/US_Deep_Decarbonization_Technical_Report.pdf) [hereinafter DDPP U.S. TECHNICAL REPORT]; DDPP U.S. POLICY REPORT, *supra* note 82.

<sup>84</sup> Sustainable Development Solutions Network, *Vision and Organization*, <http://unsdsn.org/about-us/vision-and-organization/> (last visited Apr. 27, 2019); *see also* DDPP, *About* (explaining the relationship between the Sustainable Development Solutions Network and the DDPP), <http://deepdecarbonization.org/about/> (last visited Apr. 27, 2019).

<sup>85</sup> DDPP, *supra* note 84; *see also* IDDRI, <https://www.iddri.org/en> (last visited Apr. 27, 2019).

<sup>86</sup> SUSTAINABLE DEVELOPMENT SOLUTIONS NETWORK & INSTITUTE FOR SUSTAINABLE DEVELOPMENT AND INTERNATIONAL RELATIONS, PATHWAYS TO DEEP DECARBONIZATION: 2014 REPORT 4 (2014) [hereinafter DDPP 2014 REPORT], [http://unsdsn.org/wp-content/uploads/2014/09/DDPP\\_Digit\\_updated.pdf](http://unsdsn.org/wp-content/uploads/2014/09/DDPP_Digit_updated.pdf).

<sup>87</sup> *Id.* at 204. "Technical feasibility is defined here as a robust analytical demonstration that multiple technology pathways exist for achieving the 2050 emissions target that satisfy a broad set of reasonableness criteria, including reliance on commercial or near-commercial technologies, natural infrastructure turnover, power system operability, and sustainability limits on natural resources." DDPP U.S. TECHNICAL REPORT, *supra* note 83, at 2.

<sup>88</sup> *Id.* at xii.

<sup>89</sup> *Id.* at 30.

<sup>90</sup> *Id.* at xiv.

*Pathways to Deep Decarbonization in the United States.*<sup>91</sup> These legal tools are available to federal, state, tribal, territorial, and local governments, as well as to the private sector.

These legal tools fall into a dozen categories or types. The tools are not just the usual suspects (additional regulation, market-leveraging approaches, tradable permits or allowances), but also include reduction or removal of legal barriers to clean energy and removal of incentives for fossil fuel use. Additionally, they include information/persuasion, facilities and operations, infrastructure development, research and development, insurance, property rights, and social equity.<sup>92</sup> The latter is particularly important for individuals and communities dependent on the carbon economy. The term “just transition” is used in the resolution to indicate a range of tools and measures to ensure that the benefits and effects of the clean energy economy are equitably shared.

The wide range of legal tools has important consequences for lawyers. It means that lawyers in diverse fields in addition to energy and environment could help build a consensus for reducing and removing legal barriers to addressing climate change. Lawyers with expertise in finance, corporate law, municipal, procurement, contracting, real estate, and other areas bring vital skills for responding to climate change and fulfilling the duty of lawyers to serve justice.

Lawyers already engage in activities to reduce greenhouse gas emissions. Many lawyers already advise their clients to reduce the risks and maximize the opportunities that climate change raises.<sup>93</sup> Other lawyers are working to address climate change in a variety of pro bono activities, including drafting model statutory, regulatory, or transactional language for the recommendations contained in *Legal Pathways*.<sup>94</sup> The need for additional legal work is enormous.

## V. Conclusion: Urgent Need for Serious Action

The United States’ history of leadership on key international issues, including several involving international environmental law, provides an opportunity for leadership on climate change, regardless of the administration in power. As in many other areas of law and policy, the United States’ ability to influence other countries to reduce greenhouse gas emissions would be aided if we led by example. This is particularly true because of the historic contribution of developed countries to greenhouse gas emissions, and their superior financial and technological resources, as acknowledged by the Convention to which the U.S. is a party. Moreover, it is widely acknowledged that negative climate change effects will occur disproportionately in developing countries that are most vulnerable to climate change and that lack the resources to adapt effectively. The many

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<sup>91</sup> The book is published in two forms. One is *LEGAL PATHWAYS TO DEEP DECARBONIZATION IN THE UNITED STATES: SUMMARY AND KEY RECOMMENDATIONS* (Michael B. Gerrard and John C. Dernbach eds. 2018). The other is *LEGAL PATHWAYS TO DEEP DECARBONIZATION IN THE UNITED STATES* (Michael B. Gerrard and John C. Dernbach eds. 2019) [LEGAL PATHWAYS].

<sup>92</sup> John C. Dernbach, *The Dozen Types of Legal Tools in the Deep Decarbonization Toolbox*, 39 *ENERGY L. J.* 313 (2018).

<sup>93</sup> John C. Dernbach, *Sustainable Development in Law Practice: A Lens for Addressing All Legal Problems*, 95 *DENV. L. REV.* 123 (2017).

<sup>94</sup> Michael B. Gerrard & John C. Dernbach, *How Lawyers Can Help Save The Planet*, *LAW360*, May 21, 2019, <https://www.law360.com/ip/articles/1160147/how-lawyers-can-help-save-the-planet>.

strengths of the United States—including its technological capacity, economic strength, comprehensive educational system, commitment to innovation, and legal institutions—give this country a unique and unparalleled opportunity to play a significant and constructive role in addressing climate change. The United States should resume its leading role in international environmental law, and take domestic actions to help the world lower its greenhouse gas emissions and prepare for the impacts of climate change.

Respectfully Submitted,

Amy L. Edwards  
Chair, Environment, Energy, and Resources Section  
August 2019

**GENERAL INFORMATION FORM**

Submitting Entities: Section of Environment, Energy, and Resources (SEER); Law Student Division; Section of International Law; Section of Science & Technology Law.

Submitted By: Amy L. Edwards, Chair, Section of Environment, Energy, and Resources; Negeen Sadeghi-Movahed, Chair, Law Student Division; Robert L. Brown, Chair, Section of International Law; William B. Baker, Chair, Section of Science & Technology Law.

1. Summary of Resolution.

The American Bar Association urges federal, state, local, territorial, and tribal governments, and the private sector, to recognize their obligation to address climate change and take action to reduce U.S. greenhouse gas emissions to net zero or below as soon as possible, consistent with the latest peer-reviewed science, and to contribute the U.S. fair share to holding the increase in the global average temperature to the lowest possible increase above pre-industrial levels; urges the United States Government, state, territorial, and tribal governments, local governments, and the private sector to take a leadership role in addressing the issue of climate change; urges Congress to enact appropriate climate change legislation; urges the United States Government to engage in active international discussions to address climate change; urges lawyers to engage in pro bono activities to address climate change and urges them to advise their clients about the risks and opportunities in addressing climate change.

2. Approval by Submitting Entities.

Approved by the Section of Environment, Energy and Resources Council on April 26, 2019; by the Law Student Division Council on March 25, 2019; by the Section of International Law Council on April 9, 2019; and by the Section of Science & Technology Law Council on May 6, 2019.

3. Has this or a similar recommendation been submitted to the ABA House of Delegates or Board of Governors previously?

In 2008, the House of Delegates adopted a resolution (HOD Resolution No. 08M 109) (American Bar Association House of Delegates Resolution 109 (Feb. 11, 2008), [https://www.americanbar.org/content/dam/aba/directories/policy/2008\\_my\\_109.pdf](https://www.americanbar.org/content/dam/aba/directories/policy/2008_my_109.pdf).) urging the adoption of national legislation to address climate change. This is a substantial revision to, and update of, that resolution.

4. What existing Association policies are relevant to this Resolution and how would they be affected by its adoption?

As indicated above, this resolution is a substantially updated and revised version of HOD Resolution 109 adopted in 2008. This resolution also builds on a 2011 ABA House of Delegates resolution that urged “the United States government to ensure that federally-recognized Indian tribes ... may participate fully ... in policy discussions on the issue of climate change domestically and in international fora.” (American Bar Association House of Delegates Resolution 112 (Aug. 8-9, 2011),

[https://www.americanbar.org/content/dam/aba/directories/policy/2011\\_am\\_112.pdf](https://www.americanbar.org/content/dam/aba/directories/policy/2011_am_112.pdf). ) The House of Delegates has also endorsed sustainable development, the conceptual framework for addressing climate change, in 2013 (American Bar Association House of Delegates Resolution 105 (Aug. 12-13, 2013), [https://www.americanbar.org/content/dam/aba/administrative/office\\_president/2013\\_hod\\_annual\\_meeting\\_105\\_authcheckdam.pdf](https://www.americanbar.org/content/dam/aba/administrative/office_president/2013_hod_annual_meeting_105_authcheckdam.pdf)), 2003 (American Bar Association House of Delegates Resolution 105 (Aug. 11-12, 2003), [https://www.americanbar.org/content/dam/aba/directories/policy/2003\\_am\\_108.pdf](https://www.americanbar.org/content/dam/aba/directories/policy/2003_am_108.pdf)), and 1991 (American Bar Association House of Delegates Resolution 10-B (Aug. 1991)). In the 2013 resolution, the House of Delegates reaffirmed its 1991 and 2003 commitments to sustainable development, defined sustainable development as “the promotion of an economically, socially and environmentally sustainable future for our planet and for present and future generations, and urged “all governments, lawyers, and ABA entities to act in ways that accelerate progress toward sustainability.” The 2003 resolution encouraged governments, businesses and nongovernmental entities to promote sustainable development, and recognized that good governance and the rule of law are essential to achieving sustainable development. In 2018, the Board of Governors approved the Mission Statement for the ABA Representative to the United Nations. One of the purposes of this representative is to support the U.N. Sustainable Development Goals, and one of the goals is to take “urgent action to combat climate change and its impacts.”

5. If this is a late report, what urgency exists which requires action at this meeting of the House?  
N/A
6. Status of Legislation. (If applicable.)  
A variety of different bills to address some aspect of climate change have been proposed in Congress. Among the more prominent bills is H.R. 763, the proposed Energy Innovation and Carbon Dividend Act (2019). The resolution endorses no particular bill or legislative proposal, however.
7. Brief explanation regarding plans for implementation of the policy, if adopted by the House of Delegates.  
The sponsoring entities intend to host a series of educational programs (webinars, podcasts, and a one day conference in February 2020) about the current state of knowledge about climate change, mechanisms for adaptation, legal tools for deep decarbonization, and discuss other ways in which lawyers and their clients can get involved in this issue. They will also prepare white papers and make their attorneys available as resources to federal, state, local, territorial, and tribal governments interested in adopting legislation to reduce greenhouse gas emissions.
8. Cost to the Association. (Both direct and indirect costs.)  
This resolution does not impose costs on the Association beyond those already being incurred to advance the Rule of Law (Goal IV).

9. Disclosure of Interest. (If applicable.)  
The cosponsoring entities engage in activities that address climate change legal issues, including CLE programming, providing information of ABA activities to governments, NGOs and others as well as development of policy resolutions. No individual associated with this resolution will benefit personally from adoption of the resolution.
10. Referrals. (List entities to which the recommendation has been referred, the date of referral and the response of each entity if known.)  
As it was being developed, this Report with Recommendations was circulated to representatives of:
- Business Law Section  
Infrastructure and Regulated Industries Section  
Law Student Division  
Section of Administrative Law and Regulatory Practice  
Section of Civil Rights and Social Justice  
Section of International Law  
Section of Science & Technology Law  
Section of State and Local Government Law  
Young Lawyers Division
11. Contact Name and Address Information.  
Amy L. Edwards  
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Washington, DC 20006  
202-457-5917 (o).  
[amy.edwards@hklaw.com](mailto:amy.edwards@hklaw.com).
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## EXECUTIVE SUMMARY

### 1. Summary of the Resolution.

The resolution urges federal, state, local, territorial, and tribal governments, and the private sector, to recognize their obligation to address climate change and take action to reduce U.S. greenhouse gas emissions to net zero or below as soon as possible, consistent with the latest peer-reviewed science, and to contribute the U.S. fair share to holding the increase in the global average temperature to the lowest possible increase above pre-industrial levels; urges the United States Government, state, territorial, and tribal governments, local governments, and the private sector to take a leadership role in addressing the issue of climate change; urges Congress to enact appropriate climate change legislation; urges the United States Government to engage in active international discussions to address climate change; urges lawyers to engage in pro bono activities to address climate change and urges them to advise their clients about the risks and opportunities in addressing climate change.

### 2. Summary of the issue which the Resolution Addresses.

Humans are contributing to climate change through emissions of greenhouse gases, principally carbon dioxide. Climate change presents significant risks to this and future generations. Climate change presents environmental risks, to be sure, but it also presents security, economic, and social risks. At the same time, the national and international response to climate change provides major opportunities for improving environmental quality, fostering economic growth and job creation, and enhancing domestic and global security. There is growing bipartisan agreement that climate change is a serious issue that requires further legal action at all levels of government and in private governance.

### 3. Please Explain How the Proposed Policy Position Will Address the Issue.

The proposed policy contained in the resolution will address this issue in four ways. First, it recommends that federal, state, local, territorial, and tribal governments, and the private sector, recognize their obligation to address climate change and to take action to reduce U.S. greenhouse gas emissions to net zero or below as soon as possible, consistent with the latest peer-reviewed science, and to contribute the U.S. fair share to holding the increase in the global average temperature to the lowest possible increase above pre-industrial levels. Second, the resolution recommends that Congress adopt appropriate climate change legislation. Third, it urges the United States Government to engage in active international discussions to address climate change. Fourth, the resolution encourages lawyers to engage in pro bono activities to address climate change and to advise their clients about the risks and opportunities in addressing climate change.

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4. A summary of any minority views or opposition which have been identified.  
None.