

Flooding Our History

By: Annalee Blanks

I. Introduction

Historical sites are locations where a community's memory rests. These locations serve as landmarks to remember the past, celebrate a change in society, and remind others that progress is necessary for success. Still, these sites are worth more than their sentimental value. The preservation of historical locations provides a practical solution to growing issues like overpopulation and climate change.¹ Restoring and repurposing buildings that possess a cultural significance not only conserves resources and reduces waste, but also allows for the memory of the past to be directly integrated with the future.² These efforts are sustainable and usually economically sound.³ In truth, any potential drawbacks of preserving historical sites are far outweighed by the benefits.⁴ There have been great strides to protect history, from a local to an international level. However, the rising threat of climate change poses a new danger to cultural sites by exposing a gap in policy.⁵ The sole focus needs to shift from preserving history to preparing sites against the threat of natural disasters.

All policies considered, there was a period when historical conservation was at the forefront of the national political agenda.⁶ While the efforts to preserve history were tremendous,

¹ See Peter A. Bullen, *Adaptive Reuse of Heritage Buildings: Sustain an Icon or Eyesore*, 29 STRUCTURAL SURVEY 411, 411 (Curtin Univ. 2011) ("As part of a wider revitalisation strategy to promote sustainability within the built environment, many buildings of cultural and historical significance are being adapted and reused rather than being subjected to demolition.")

² See *id.* at 412.

³ See *id.* ("Adaptive reuse may help communities, governments and developers in the quest to reduce the environmental, social and economic costs of continued urban development and expansion.")

⁴ See *id.* at 420 ("Heritage buildings are cultural icons their preservation impacts on community well-being, sense of place and therefore social sustainability. Due to the importance of these factors, it is preferable to reuse heritage buildings rather than replace them regardless of bad plot ratios and lack of efficiency.")

⁵ See *Descriptions of All Policies*, FEMA.GOV, <https://www.fema.gov/emergency-managers/practitioners/environmental-historic/laws/descriptions#ahpa> (last accessed Dec. 30, 2021).

⁶ See *id.*

the motivation faded, and the impact of climate change was mostly considered as a separate matter.⁷ Each of the policies mentioned below depicted an understanding of the importance of culturally significant sites and artifacts; however, they were all lacking in one common way. The authority and enforcement power behind these acts were mostly discretionary and easily avoided by federal agencies, thereby making them no more than highly encouraged suggestions rather than enforceable laws. When the original goals of the policies themselves are lacking, it increases the difficulty of transferring the scope of their power to include considerations such as flooding.

The flooding of historical sites and artifacts is not an arbitrary risk but rather an imminent threat growing steadily with climate change.⁸ These properties can be adapted to maintain their cultural integrity and abide by flood policies by repurposing the buildings, utilizing strategies for disaster preparedness, and customizing future standards to prevent the reoccurrence of these issues. This paper will analyze methods adopted by organizations, towns, and states which offer modern solutions to lessen the gap created by legislation.⁹

II. National Historic Preservation Act, 1966 (Amended 2000)

Many of the nation's historical sites are located near waterways thereby creating an adverse risk for flooding.¹⁰ An example of this occurred when one of the artifact storage rooms located within the Smithsonian's American History Museum was flooded from a rainstorm.¹¹ The museum has taken short-term precautions such as flood barriers and water alarms; however,

⁷ See *id.*

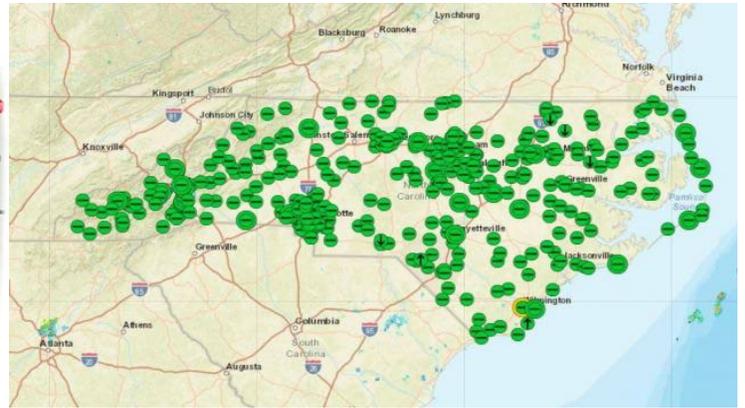
⁸ See Natasha Geiling, *Which of America's Most Precious Historical Sites Are Threatened by Climate Change*, SMITHSONIAN MAGAZINE, (May 2014), <https://www.smithsonianmag.com/travel/climate-change-currently-threatening-some-americas-most-precious-historical-sites-180951495/>.

⁹ *Descriptions of All Policies*, FEMA.gov, <https://www.fema.gov/emergency-managers/practitioners/environmental-historic/laws/descriptions#ahpa> (last accessed Dec. 30, 2021).

¹⁰ See *WaterWatch*, U.S. GEO. SURVEY, (last accessed Dec. 30, 2021), https://waterwatch.usgs.gov/?id=ww_flood.

¹¹ Christopher Flavelle, *Floods Are Threatening a Treasure Trove of American Heritage*, N.Y. TIMES, (Dec. 1, 2021), <https://www.nytimes.com/2021/12/01/climate/nyt-climate-newsletter-smithsonian.html>.

permanent solutions are years away.¹² This is an issue that directly affects North Carolina as well, as evidenced by the state maps below. The map on the left depicts the major historical sites in NC,¹³ while the map on the right illustrates



the locations at risk for flooding.¹⁴ When

looking at these maps side-by-side, it is clear that each cultural site depicted is located within an at-risk flooding area.

The value of historic sites was not nationally recognized until the 1960s after decades of grassroots movements and local advocacy.¹⁵ The National Historic Preservation Act (“NHPA”) "established a framework to foster a new ethnic through all levels and agencies of the federal government . . . [requiring] federal agencies to consider the impact of their actions on historic properties."¹⁶ However, this act has two major drawbacks. First and foremost, the statute only requires that federal agencies consider any potential adverse effects on historic properties without compelling legal obligations to protect them.¹⁷ It is only a foundation for inquiries with

¹² See *id.*

¹³ American Heritage, *Travel To Historic Sites of North Carolina* (digital image), , <https://www.americanheritage.com/content/guide-historic-sites-north-carolina> (last accessed Dec. 29, 2021).

¹⁴ WRAL, *NC Flood Map* (digital image), (Sept. 13, 2018), <https://www.wral.com/online-maps-show-if-you-live-in-a-flood-zone/17839857/>.

¹⁵ See Karin Wulf, *How Historic Preservation Shaped the Early United State*, SMITHSONIAN MAGAZINE, (2020).

¹⁶ Amanda M. Marincic, *The National Historic Preservation Act: An Inadequate Attempt to Protect the Cultural and Religious Sites of Native Nations*, 103 IOWA L. REV., 1777 2018, <https://ilr.law.uiowa.edu/print/volume-103-issue-4/the-national-historic-preservation-act-an-inadequate-attempt-to-protect-the-cultural-and-religious-sites-of-native-nations/0>.

¹⁷ See *id.*

lacking preservation requirements. Secondly, the act provides little power for judicial review thus leaving many of the decisions to the agencies themselves.¹⁸ This creates numerous issues. The absence of consistency in court opinions makes creates inefficiency and an inadequate opinion of law to serve as precedent.¹⁹

Recently, a case was brought in the Southern District of Indiana by a plaintiff seeking relief against the implementation of a flood insurance rate map that was provided by FEMA.²⁰ The court held that FEMA had no obligation to consult the Advisory Council on Historic Preservation (ACHP) on the matter because,

The ACHP defines an “undertaking,” in relevant part, as “a project, activity, or program funded in whole or in part under the direct or indirect jurisdiction of a federal agency....” . . . It defines “effect” as an “alteration to the characteristics of a historic property qualifying it for inclusion in or eligibility for the National Register.” . . . The ACHP directs the agency to determine whether its action amounts to an undertaking “and, if so, whether it is a type of activity that has the potential to cause effects on historic properties.” . . . If the agency finds in the negative, it has no further obligations.²¹

Simply stated, if a federal agency deems the potential risk insignificant, there is no adequate cause of action in a federal court. The potential risk is then left exposed. Therefore, the NHPA established the framework of cultural conservation but failed to provide actionable remedies for injustices or future solutions.

III. National Environmental Policy Act, 1970

¹⁸ Amanda M. Marincic, *The National Historic Preservation Act: An Inadequate Attempt to Protect the Cultural and Religious Sites of Native Nations*, 103 IOWA L. REV., 1777 2018, <https://ilr.law.uiowa.edu/print/volume-103-issue-4/the-national-historic-preservation-act-an-inadequate-attempt-to-protect-the-cultural-and-religious-sites-of-native-nations/0>.

¹⁹ See *Maudlin v. Fed. Emergency Mgmt. Agency*, 138 F. Supp. 3d 994, 996 (S.D. Ind. 2015).

²⁰ *Id.* at 1000.

²¹ *Id.*

While the NHPA was enacted to provide foundational protection for historical locations, the National Environmental Policy Act (NEPA) was established to determine the potential environmental consequences of federal agencies and their actions.²² NEPA declared that it is the “continuing policy of the Federal Government . . . to use all practicable means and measures . . . to create and maintain conditions under which man and nature can exist in productive harmony . . . [and] preserve important historic, cultural and natural aspects of our national heritage.”²³ NEPA delegated the responsibility of safeguarding the environment to all federal departments.²⁴ This means environmental impacts must be considered by every national agency throughout the execution of their respective projects. NEPA also acts as a balance of power against FEMA directly. Before FEMA is authorized to take any “action that may effect the environment, agency decision-makers must study the potential impacts that the proposed action and alternatives will have on the human and natural environment, and make that information available to the public.”²⁵ This policy is attempting to solve environmental issues preemptively to maximize efficiency by funneling environmental considerations to be taken into account at the beginning of a task. By doing so, any negative impacts which arise can be amended before permanent action is taken.

However, one of the main drawbacks of NEPA is its lack of enforcement capabilities. The Council on Environmental Quality (“CEQ”)—NEPA’s governing board—attempted to solve this issue by distributing a “Memorandum with suggestions for implementation . . . [only] the Memorandum recommends the development of guidance [to agencies] but does not recommend

²² *National Environmental Policy Act*, FEMA.GOV (Feb. 8, 2021), <https://www.fema.gov/emergency-managers/practitioners/environmental-historic/laws/nepa>.

²³ 42 U.S.C.A. § 4331a-b.

²⁴ *National Environmental Policy Act*, *supra* note 22.

²⁵ *See id.*

structural changes that would change how NEPA responsibilities are carried out.”²⁶ The Memorandum essentially provides instructions without resources for the application.²⁷ Additionally, NEPA gives very little administrative power to the courts- a similar trait to the NHPA.²⁸ Congress attempted to streamline agencies' statutory obligations by passing additional legislation which, unfortunately, "weakens NEPA's environmental mandate by transferring decision-making authority to agencies responsible for their projects and by restricting judicial review of their decisions.”²⁹ These issues with NEPA, combined with those from NHPA, create bureaucratic barriers preventing adequate consideration, instruction, and implementation of transforming historical properties into environmentally secure locations. In a case where the Sierra Club attempted to halt additional construction on a watershed, the Court explicitly stated

“when a federal action of the . . . character [of a federal agency] is proposed . . . we are, however, admonished to refrain from substituting our judgment. . . the only role for a court is to ensure that the agency has taken a "hard look" at environmental consequences.”³⁰

NEPA is intended to be a subjective policy fostering environmental competence; however, it is implicated as an objective standard to guide rather than incentivize. This is indicative of courts wanting to act, only to be restricted from doing so, thus, creating little change in the policy’s requirements.

IV. Executive Order 11988: Floodplain Management, 1977

Thus far, the policies concerning historical properties have centered around their environmental impact while alluding to aspects of flooding. However, President Jimmy Carter

²⁶ Daniel R. Mandelker, *The National Environmental Policy Act: A Review of Its Experience and Problems*, WASH. U. J. L. & POL’Y 293, (2010), https://openscholarship.wustl.edu/law_journal_law_policy/vol32/iss1/9.

²⁷ *Id.*

²⁸ See *National Historical Preservation Act*, AHPC, <https://www.achp.gov/digital-library-section-106-landing/national-historic-preservation-act> (last accessed Dec. 29, 2021).

²⁹ *Id.*

³⁰ *Sierra Club v. Bergland*, 451 F. Supp. 120, 128 (N.D. Miss. 1978).

issued Executive Order 11988 to explicitly address floodplain management.³¹ The order requires “federal agencies to avoid . . . the long and short-term adverse impacts associated with the occupancy and modification of floodplains and to avoid direct and indirect support of floodplain development wherever there is a practicable alternative.”³² This policy only proposed additional considerations for federal agencies when developing land and includes a very simple excuse for noncompliance.³³ A practical alternative is monetarily quantifiable. An agency simply has to produce information stating that there is no economically sound alternative for the preservation of floodplains despite the numerous complications that could arise from building on top of them.

This problem was later addressed by the Obama Administration who updated the executive order to include stricter requirements for construction.³⁴ Formally, development could not take place on a FEMA-recognized floodplain from the last 100 years.³⁵ Obama expanded the construction considerations to include the utilization of the best scientific data regarding climate change available, adding an elevation requirement to 100-year floodplains, and/or extending the requirement for critical floodplains to 500 years.³⁶ These restrictions were well-established in protecting floodplains and ultimately the communities that surrounded them.

Unfortunately, executive orders are discretionary in use and much easier to overturn than laws.³⁷ Any sitting president has the power to abide, alter, or abolish the orders.³⁸ A new

³¹ *Executive Order 11988 Floodplain Management*, FEMA.gov (Oct. 21, 2021), <https://www.fema.gov/glossary/executive-order-11988-floodplain-management>.

³² *See id.*

³³ *See id.*

³⁴ *New Executive Order Establishes a Federal Flood Risk Management Standard*, ENERGY.GOV (Feb. 5, 2015), <https://www.energy.gov/nepa/articles/new-executive-order-establishes-federal-flood-risk-management-standard>.

³⁵ *See id.*

³⁶ *See id.*

³⁷ *What is an Executive Order*, ABA (Jan. 25, 2021), https://www.americanbar.org/groups/public_education/publications/teaching-legal-docs/what-is-an-executive-order/.

³⁸ *See id.*

administration is under no obligation to follow orders from the previous one.³⁹ Thereby, making executive orders effective so long as they are upheld. In a recent example, the United States Army Corp of Engineers (“COE”) aimed to build a park in an area that was later revealed to be partially on a floodplain.⁴⁰ The plaintiffs, in this case, argued that the COE failed to get written assurances the floodplain complied with FEMA regulations to which the court deemed unnecessary to obtain permits and delegated decision-making authority to the state.⁴¹ This policy is yet another example of the severe lack of federal enforcement capabilities regarding historical properties and floods. If an agency is conditionally required to follow floodplain preservation strategies, there is little consideration for how their development might impact cultural sites.

V. Archeological and Historic Preservation Act, 1974

The 1970s were host to a national movement focusing on the preservation of sites and artifacts of cultural significance which translated to include archeological findings.⁴² The Archeological and Historic Preservation Act (“AHPA”) expanded on past legislation to include “the preservation of historical and archeological data which might be lost or destroyed as the result of the construction of a federally authorized dam or other construction activity.”⁴³ Thus far, the policies mentioned have mainly focused on conservancy before construction has taken place. This act contains a provision requiring that construction be halted when objects are discovered required funding for the recovery and analysis of such items.⁴⁴ While NHPA

³⁹ *See id.*

⁴⁰ *Hall v. U.S. Army Corps of Engineers*, No. 4:08CV00278 BSM, 2008 WL 5058986, at *1 (E.D. Ark. Nov. 24, 2008).

⁴¹ *Hall*, 2008 WL 5058986, at *2.

⁴² *See Geiling, supra* note 8.

⁴³ *Laws, Regulations and Executive Orders Authorizing Historic Preservation*, U.S. DEPT. OF AGRIC. FOREST SERV. (2008), <https://www.fs.usda.gov/detail/r1/learning/history-culture/?cid=stelprdb5335841> (last accessed Dec. 30, 2021).

⁴⁴ *See id.*

specifically applied to locations, AHPA was more inclusive in its writing to apply to objects and sites.

Unfortunately, the literature surrounding AHPA is limited for unclear reasons. Consequently, the utilization of this act in a court of law is also lacking. One possible explanation lies in its procedural requirements. Whenever a potential cultural artifact is found, “the agency must notify the Secretary of the Interior in writing, providing any appropriate information concerning the project. The Secretary, if he or she determines that such data is significant . . . must conduct a survey and other investigation of the areas.”⁴⁵ There is no actual governing body.⁴⁶ The task of reviewing the significance of potential archeological or historical findings is a delegated chore to an official with an exceeding number of professional duties. Therefore, it is likely that when issues do arise, they might not be given priority. Thus, allowing concerns to go unnoticed.

There has been little consideration for historical sites and how disaster prevention strategies (specifically for flooding) should be implemented. FEMA cites the NHPA, NEPA, EO 11988, and the AHPA as the laws relevant to their actions concerning such matters.⁴⁷ However, how is FEMA implementing these policies when they are cumulatively lacking in enforcement capabilities? The threat flooding poses to United States history, from a local to a national scale, is becoming increasingly more alarming.⁴⁸

⁴⁵ *Cheavens v. Pub. Serv. Corp. of Colorado*, 176 F. Supp. 3d 1088, 1097 (D. Colo. 2016).

⁴⁶ *See id.*

⁴⁷ *Descriptions of All Policies*, FEMA.GOV, <https://www.fema.gov/emergency-managers/practitioners/environmental-historic/laws/descriptions#ahpa> (last accessed Dec. 30, 2021).

⁴⁸ Flavelle, *supra* note 11.

VI. Potential Solutions

One way for sustainable historic preservation policies to become effective is to adopt new legislation. However, this could take years and risks the possibility of a new act turning out like the others. The more immediate solution is to start on a small scale, focusing on changes that can be done directly alongside the work of federal agencies. This mindset requires “commun[ities] to be flexible and willing to consider nontraditional approaches and building materials. To protect the old, we must embrace the new.”⁴⁹ Combining modern technology with historical properties enhances the capabilities of conservation and education. Those who participate or simply enjoy the modified preservation standards would be granted the opportunity to learn from the past while gaining an understanding of the threat of climate change. Various cities, states, and private organizations have each developed their unique strategies to protect cultural locations. Federal agencies have even recommended a few guidelines for consideration.

The effects of climate change can be seen across the globe. Rising temperatures have caused increased water levels, posing flood risks to communities where it was previously minimal. Leland "Fishtown", Michigan is one example. One a thriving fish shantytown is now having to adopt drastic changes to prevent further damage from the rising water level of Lake Michigan. In the last few years alone, "Fishtown has seen more frequent and intense flooding . . . it has caused swamped docks, inundated shanties, and lost revenue."⁵⁰ Rather than waiting for federal aid, the local community took action.⁵¹ The town began by "lifting the shanties. Some have been placed on higher foundations. Others on new pilings that rise above the projected

⁴⁹ *Climate & Culture: National Trust for Historic Preservation*, NAT'L TR. FOR HIST. PRES. , <https://savingplaces.org/climate-and-culture#.YbiWTH3MK3J> (last accessed Dec. 30, 2021).

⁵⁰ Hari Sreenivasan et al., *Climate Change Threatens Michigan's Fishtown and Its Historic Shanties*, PBS (Dec. 12, 2021), <https://www.pbs.org/newshour/show/climate-change-threatens-michigans-fishtown-and-its-historic-shanties>.

⁵¹ *Id.*

higher watermark for the Leland River."⁵² By raising the buildings, the town has been able to preserve its local heritage and tourism economy by maintaining the culture that draws people in.⁵³ However, even this solution has its complications. For one, it takes time and money to raise the buildings.⁵⁴ This is a cost that must be paid upfront. Businesses, and ultimately the town, must sacrifice months' worth of revenue to make these changes.⁵⁵ To help mitigate these consequences, Leland also spends time fundraising to keep construction going.⁵⁶ While this is a more practical solution, it can require a tremendous amount of conscious effort.

Florida, a state prone to habitual flooding, has developed an entire manual for disaster planning of historical resources. Preemptive measures could significantly reduce the risk of flooding on cultural sites without exhausting resources after the fact.⁵⁷ Communities within Florida are knowledgeable on what to do and how to execute these plans so that other officials can focus their efforts elsewhere.⁵⁸ The previous plan called for state mitigation and local mitigation to merge their efforts to minimize the harm caused by natural disasters.⁵⁹ The manual supplements this strategy to include a "historic preservation representative to the Local Mitigation Strategy Committee responsible for the development and periodic evaluation of the local mitigation plan."⁶⁰ This solution is a fantastic example of state and local governments collaborating preemptively to devise a protection plan safeguarding cultural sites without sacrificing the needs of the entire community. The coordination of efforts is economically

⁵² *Id.*

⁵³ *Id.*

⁵⁴ *See id.*

⁵⁵ *See id.*

⁵⁶ *Id.*

⁵⁷ DISASTER PLANNING FOR FLORIDA'S HISTORICAL RESOURCES, DIV. OF HIST. RES. (2003), https://www.floridadisaster.org/globalassets/importedpdfs/disaster_planning_for_historic_resources.pdf (last accessed Dec. 29, 2021).

⁵⁸ *See id.*

⁵⁹ *See id.*

⁶⁰ *Id.*

efficient realistic. Anticipating harm before it occurs allows adequate steps to mitigate the damage.

VII. Conclusion

The difference between the policies currently imposed by FEMA and the solutions discussed above is their practical relevance. The FEMA policies, while enacted with good intentions, are outdated, and fail to account for modern considerations. The efforts made by local communities and state governments, however, have the potential to be immediate and effective solutions to the flooding risks of historical sites. There will always be downfalls to any plan. The key is to create enforceable policies and procedures that are reasonable to carry out. To do this, the priorities of the organizations must be established at the forefront, the governing body must have some sort of enforcement capability, and court systems need to be able to fortify those efforts.