A HAZARD ANALYSIS OF FEDERAL PERMITTING UNDER THE NATIONAL ENVIRONMENTAL POLICY ACT OF 1970

Michael Bennon
Stanford Center for Democracy, Development and the Rule of Law
Stanford Global Projects Center

Daniel De La Hormaza
Visiting Research Fellow
Cornell Program in Infrastructure Policy
Cornell University

R. Richard Geddes
Professor, Cornell Jeb E. Brooks School of Public Policy
Professor of Economics
Founding Director, Cornell Program in Infrastructure Policy
Cornell University

Last Updated September 22, 2021
ABSTRACT

The National Environmental Policy Act (NEPA) of 1970 requires federal agencies to assess the environmental impact of proposed major federal actions. NEPA affects delivery of an array of infrastructure including the construction of roads, bridges, highways, airports, water systems, broadband, both conventional and renewable energy generation and distribution, electricity transmission, and management activities on public lands. NEPA requires the completion of an Environmental Impact Statement (EIS) for environmentally impactful federal actions. EIS must be completed before government acts and is a significant undertaking. For infrastructure projects this can entail significant delays which increase final costs. A typical NEPA review now takes about four and one-half years and is over 600 pages long. Some EIS’s take over a decade to complete. We provide the first detailed analysis of project approval times under NEPA by examining 1,269 EIS permitting processes. We analyze empirically the well-defined interval from Notice of Intent to file (NOI) to Record of Decision (ROD). We use Cox proportional hazard to estimate the impact of several factors on EIS duration. Those factors comprise permits featuring major construction, those including private investment, those for projects located in states with restrictive environmental laws, those using a federal permitting “dashboard,” and those publishing a Supplemental EIS prior to the ROD but after completing a final EIS. We find that privately financed projects receive faster permitting, while projects involving major construction, those undertaken in restrictive states, and those utilizing the federal permitting dashboard, face slower permitting times. We explore links between EIS page counts and permitting time. Greater EIS page counts are associated with longer permitting times. We conclude by examining EIS completion during economic stimulus programs such as the American Recovery and Reinvestment Act (ARRA), as well as the frequency of EIS completion by the federal government itself.

If you would like to receive a full text of this paper, please contact Richard Coyle, the Executive Director of the Cornell Program in Infrastructure Policy, at rjc89@cornell.edu.