

Testimony before the House Committee on Natural Resources, Fish and Wildlife

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Good morning Chair Sheldon and Committee members. My name is Mike Kline, I am a river ecologist retired from the Department of Environmental Conservation, where I served as Rivers Program Manager from 2009 to 2019. Thank you for inviting me back to offer the following testimony on S.234:

- Having worked with Rob Evans at ANR and Chris Cochran at ACCD a few years back on the Flood Hazard Area & River Corridor language related to Neighborhood Development Areas, I would agree with their testimony that the existing statutory language is overly restrictive. The statutes should be amended as proposed in S.234 and S.226 such that Neighborhood Development Areas may include Flood Hazard Areas and River Corridors, as long as the town has adopted town-wide standards consistent with the ANR model hazard bylaws:
 - To ensure new development does not cause adverse impacts to surrounding pre-existing development;
 - To ensure flood resilient construction for new infill and redevelopment; and
 - To avoid new encroachments along undeveloped river corridors up and downstream of existing settlements.
- I would also like to echo Mr. Evans' testimony that there is language in both S.234 and S.226 where the term "flood hazard area" needs to be changed to "floodway." In S.234, the second instance of the term "flood hazard area" in § 2793e(c)(5)(A) should be changed to "floodway." Recall that the floodway is the portion of flood hazard area that is a no fill/no build zone. Flood resilient construction can and does take place in the flood hazard area outside of the floodway.
- Next, the changes proposed in S.234 that update the Act 250 criterion 1D definitions are long, long overdue. The proposed changes would bring the criteria into alignment with Title 10 Chapter 32, ANR rules and procedures, and the model hazard bylaws offered to towns. And to be frank, I think the confusion around the existing 1(D) language has been so costly, in terms of court cases, that modernizing 1(D) language should be a part of any bill that advances river corridor protection to help free up Program resources.

We need more affordable housing, which, by definition, needs to go where there are services within existing developments. You've heard in recent testimony that perhaps we should not be encouraging infill development in flood hazard areas. I would rejoin that it is a matter of risk management. In my experience erosion hazards account for greater risks and damages to property and public safety in Vermont than inundation hazards; and existing settlements are generally safer with new housing going within their boundaries, than those settlements would be if the new housing were to be placed along otherwise unconstrained reaches of river upstream or downstream. We've made huge investments in protecting historic settlements from erosion, more will be necessary, but the more a river is constrained from depositing upstream, the more dangerous and damaging it becomes downstream.

I would ask, do we want to try and manage our risks in a few places along a river's length, or fail at the attempt to manage them along its entire course? Individual landowners cannot afford to armor a larger stream or river, they turn to the government program, the taxpayer, and I'm very concerned that when we use the public till and borrow every year to respond to multiple disasters, as we're seeing with climate change, there will be less and less to spend on other pressing needs—like affordable housing. We should focus on lowering our costs, by continuing to invest in floodplain restoration like we have within the neighborhoods of Bennington, Brattleboro, Brandon, Barre, Ripton, Northfield, and Middlebury. We can also keep our costs down when we require new buildings to meet floodproofing standards and minimize the repetitive losses experienced when houses are only built to FEMA's minimum standards.

Vermont settlements grew up around our rivers—if we are to both mitigate the causes and adapt to the impacts of climate change, it is both prudent and timely to combine the steps of promoting new infill housing in compact settlements while mitigating flood and fluvial erosion hazards, as proposed in S.234/226. A state training course on the technical process for creating and adopting infill maps within designated centers and neighborhood development areas should be created. Such *a priori* mapping would create greater efficiency for developers, municipalities, and state programs.

At the end of my testimony on February 17th, I advocated for an expansion of state jurisdiction under the Flood Hazard Area and River Corridor Rule—a priority identified in the Climate Action Plan for our resiliency to an increase in the frequency and intensity of flooding. Without this action, or, as an interim, the river corridor language proposed in S.234/226, I believe we will see a rapid and accelerating

loss of river corridors and functioning floodplains to piecemeal development. New encroachments that result in hemming in another segment of the river into an exceedingly narrow slice of its valley translates into the kind of adjacent and downstream destruction of infrastructure and neighborhoods we saw in Irene.

Thank you for the opportunity to provide this testimony, and please know that I would be happy to try and answer any questions you may have now or in the future regarding rivers and river corridors.