



Roads Under Water: Legal Analysis and a Florida Model Ordinance for Addressing Local Government Road Maintenance Liabilities for Environmentally Compromised Roads

Thomas Ruppert¹

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¹ Legal Specialist and Coastal Planning Specialist, Florida Sea Grant College Program.

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The Need: Florida Roads and the Potential Impacts of Sea-Level Rise

Florida's more than 276,289² roads are at risk from multiple threats. In addition to increasing use of its roads, underfunding of maintenance presents a serious problem which led the American Society of Civil Engineers in 2016 to provide a grade of "C" for Florida's roads.³ The last decade has demonstrated the increasing risk from coastal hazards such as flooding, storm surge, and erosion as exacerbated by sea-level rise (SLR). In response, the Florida Department of Transportation, in 2012, began funding research to evaluate the road miles potentially impacted by SLR.⁴ SLR flooding already impacts roads and our use of them, causing human and economic impacts.⁵ And local governments and the state suffer from increased costs and legal issues when roads under their jurisdiction fail due to flooding, storm surge, or erosion, whether directly due to SLR or as exacerbated by SLR.⁶ Examples from around Florida testify to how widespread the challenges of sea-level rise and associated increased flooding and erosion are for road infrastructure at the local government level.⁷ Recent projections for future SLR only add to the urgent need to consider how SLR will continue to affect roads.⁸

² U.S. Dept. of Transp., Office of Highway Policy Information, Selected Measures for Identifying Peer States – 2020, at <https://www.fhwa.dot.gov/policyinformation/statistics/2020/ps1.cfm>

³ Infrastructure Report Card, Florida, American Society of Civil Engineers (2017), https://www.infrastructurereportcard.org/wp-content/uploads/2017/01/2016_RC_Final_screen.pdf.

⁴ See, e.g., Sea Level Scenario Sketch Planning Tool, About, at <https://sls.geoplan.ufl.edu/> (last visited 11/30/21).

⁵ See, e.g. generally Mathew Hauer, Valerie Mueller, Glenn Sheriff & Quin Zhong, More Than a Nuisance: Measuring How Sea Level Rise Delays Commuters in Miami, FL, 16 *Env'tl Rsch. Letters* 1 (2021).

⁶ See, e.g. Alex Harris, Miami Herald, Miami Beach is raising roads or sea rise (undated), at https://digitaledition.orlandosentinel.com/infinity/article_share.aspx?guid=0d1d5840-7933-44d0-81ed-1c30b73a33eb&fbclid=IwAR3FJWkOY-7QbF5M-dFqPOZDz_qynlveax7i2OgiF3q82xHEO8YubKt3Fa4 (last visited 11/30/21).

⁷ See, e.g. Loren Korn, Permanent repairs underway years after Matthew damages A1A in Flagler Beach (May 31, 2019 4:30 pm), at <https://www.clickorlando.com/weather/2019/05/31/permanent-repairs-underway-years-after-matthew-damages-ala-in-flagler-beach/>. Jessica Clark, First Coast News, 'It kind of looks like a bomb went off here': Resident describes a stretch of Old A1A in Summer Haven (October 3, 2022), at <https://www.firstcoastnews.com/article/weather/aia-st-johns-county-hurricane-ian-florida/77-1e012316-2e8e-4dd0-b6d8-34e528b5900c>. News4Jax, Emergency repairs to protect A1A coming to Flagler County (Oct. 6, 2022), at https://www.news4jax.com/news/florida/2021/10/17/three-years-after-hurricane-a-possible-new-beach-in-florida/?utm_medium=social&utm_content=%40tbtnewspaper&utm_source=twitter&utm_campaign=SocialFlow. Alligator Point in Franklin County: Associated Press, Tampa Bay Times, Three Years After Hurricane, a Possible New Beach in Florida (October 17, 2021) (discussing the millions of dollars expended by Franklin County over decades to try to stabilize a section of road that repeatedly washes out) at https://www.tampabay.com/news/florida/2021/10/17/three-years-after-hurricane-a-possible-new-beach-in-florida/?utm_medium=social&utm_content=%40tbtnewspaper&utm_source=twitter&utm_campaign=SocialFlow. James Call, Tallahassee Democrat, Hurricane Michael aftermath: Destruction closes portion of U.S. 98 (Oct. 11, 2018), at <https://www.tallahassee.com/story/news/2018/10/11/u-s-98-closed-east-lanark-village/1601275002/>.

⁸ See, e.g. William v. Sweet, B.D. Hamlington, R.E. Kopp, C.P. Weaver, P.L. Barnard, D. Bekaert, W. Brooks, M. Craghan, G. Dusek, T. Frederikse, G. Garner, A.S. Genz, J.P. Krasting, E. Larour, D. Marcy, J.J. Marra, J. Obeysekera, M. Osler, M. Pendleton, D. Roman, L. Schmied, W. Veatch, K.D. White, and C. Zuzak, National Oceanic and Atmospheric Administration, Global and Regional Sea Level Rise Scenarios for the United States (2022), at <https://oceanservice.noaa.gov/hazards/sealevelrise/sealevelrise-tech-report-sections.html> (last visited Aug. 8, 2022).



Figure 1 U.S. 98 in Florida's Panhandle (James Call, Tallahassee Democrat Hurricane Michael aftermath: Destruction closes portion of U.S. 98 (Oct. 11, 2018), at <https://www.tallahassee.com/story/news/2018/10/11/u-s-98-closed-east-lanark-village/1601275002/>.)



Figure 2 King Street, St. Augustine, Florida during high tide flooding



Figure 3 Casey Key 2020



Figure 4 End of pavement at Old A1A, St. Johns County, Florida, 2016. Photo: Thomas Ruppert, Florida Sea Grant



Figure 5 Highway A1A in Flagler Beach after Hurricane Matthew



Figure 6 Damaged house at Summer Haven, where Old Highway A1A has been subjected to erosion impacts since the 1960s, costing taxpayers millions of dollars to try to protect and replace the road for a handful of homes, most of which were built along the road after decades of erosion impacts to the road. Photo: Thomas Ruppert, Florida Sea Grant, Sept. 2022.

As roads continue to suffer from increased erosion and flooding due to higher seas, the costs of maintenance and rebuilding impose a heavy toll on local governments responsible

for such roads. Thus, this paper uses roads as an example of a key part of the infrastructure network to address as seas continue to rise. How do local governments balance their maintenance responsibilities with their limited financial resources? What happens when the very land on which a road was built becomes the active sand beach? What happens to properties that lose road access due to insurmountable flooding and erosion impacts?

This paper evaluates current Florida law and jurisprudence on road maintenance responsibilities to illustrate the difficulties Florida's local governments face as seas continue to rise ever faster for the foreseeable future. After analyzing current law, this paper discusses a new proposal: an "adaptive duty to maintain" instead of the current "duty to maintain" for roads. The adaptive duty to maintain views the road system as a whole system for the benefit of the public generally rather than looking narrowly at individual segments of roads and their condition or use by individual users or adjoining property owners. This perspective allows consideration of a broader array of factors for the law to consider when determining legal responsibilities of local governments to maintain roads. Finally, this paper finishes with a model ordinance for local governments to consider adopting to assist in rational road system maintenance and planning in the face of impacts from SLR and climate change. The model ordinance takes the broader approach of an "adaptive duty to maintain" that seeks to allow local governments broader discretion in balancing numerous competing interests as they make decisions about road maintenance under changing environmental conditions. Note that the analysis and model ordinance presented here arose from the context of a smaller, locally used road, dead-end road.⁹ As such, the analysis and model ordinance here are most apt for similar types of situations. Instances in which a main thoroughfare has been attacked by erosion, or other forces exacerbated by SLR, would need to include still more difficult considerations, such as amount of traffic, options for rerouting traffic, potential relocation of the road, and the importance of the road segment to the regional transportation system.¹⁰

Road Ownership, Jurisdiction, and Maintenance Responsibilities

Road Ownership and Jurisdiction

Data on Road Ownership and Maintenance in Florida

Three kinds of Florida government entities own public roads in the state of Florida: the State of Florida, counties, and municipalities.¹¹ Public roads are "roads which are open and

⁹ The author of this paper is indebted to the work of attorneys Patrick McCormack and Isabelle Lopez. They developed Ordinance 2012-35 for St. Johns County in response to long-term erosion affecting A1A in St. Johns County, Florida. Ordinance 2012-35 provided the foundation on which the model ordinance presented here is built.

¹⁰ See, e.g., Managed Retreat Toolkit: Infrastructure, GEO. CLIMATE CTR. (noting that road abandonment may only be feasible once other managed retreat strategies have been implemented, thus reducing the use, importance of, and need for the road segment at issue), www.georgetownclimate.org/adaptation/toolkits/managed-retreat-toolkit/infrastructure-disinvestment.html (last visited June 1, 2022).

¹¹ The states in which they are located own segments of the interstate highway system. Cf. e.g. 23 USC § 101(a)(11) (defining a "highway") and 23 USC § 103 (describing the National Highway System).

available for use by the public and dedicated to the public use.”¹² Florida has 122,659 miles of public road, which are separated into rural and urban miles. There are over twice as many urban miles of road as there are rural miles of road, with 36,489 miles of rural road and 89,170 miles of urban road.¹³ Florida counties own 26,454 miles of rural roads and 43,981 miles of urban roads, with a total of 70,436 miles, equaling 57% of Florida’s roadways, the highest ownership percentage out of the three government entities. Behind the counties in ownership are the municipalities, which own 2,578 miles of rural roads and 35,251 miles of urban roads, totaling 37, 829 miles, or 31% of all Florida roadways. Lastly, the state owns 12,116 miles, or 10%.¹⁴ However, the sheer number of miles owned does not necessarily reflect the degree of responsibility owed by the governing body, as certain roads experience a much greater amount of traffic on a daily basis, and thus require more maintenance. For instance, in 2016, Florida’s highway system, which is only 10% of Florida’s road miles, accounted for more than half of all the traffic moving through the state.¹⁵

Florida’s public roads are also divided into four major road systems. The first is the State Highway System, which consists of the interstate system and all other roads that were under the jurisdiction of the state on June 10, 1955; roads constructed by a state agency; and roads transferred to the jurisdiction of the state by mutual consent with other governmental entities. Second is the State Park Road System, which consists of all roads within state park boundaries and leading to state parks, but not roads in the State Highway System, county road systems, or city street systems. Third is the county road system, which consists of all collector roads and all local roads in the unincorporated areas of a county and all minor arterial roads that are not in the State Highway System.¹⁶ Last is the city street system, consisting of all local roads within a municipality and all collector roads inside the municipality that are not in the county road system.¹⁷

Each government entity is responsible for the “planning, construction, operation, or maintenance or jurisdiction over transportation facilities” of the public roads that they own.¹⁸ Governmental entities have the option to transfer public roads between one another by way of an agreement.¹⁹ These transfers must take into account a variety of criteria such as national defense interests, travel in urban areas, access to intermodal facilities and regional public facilities, and disaster preparedness. One government entity may be better

¹² Fla. Stat. § 335.01 (2020).

¹³ Thomas Ruppert, Erin Deady, Jason Evans & Crystal Goodison, *Legal Issues When Managing Public Roads Affected by Sea Level Rise: Florida 6* (Spring 2019) (citing U.S. Dep’t of Transp., Office of Highway Policy Information, “Highway Statistics Series 2012” (Oct. 2013)).

¹⁴ U.S. Dep’t of Transp., Office of Highway Policy Information, “Highway Statistics Series 2012” (Oct. 2013).

¹⁵ INFRASTRUCTURE REPORT CARD, FLORIDA, AMERICAN SOCIETY OF CIVIL ENGINEERS (2017), https://www.infrastructurereportcard.org/wp-content/uploads/2017/01/2016_RC_Final_screen.pdf.

¹⁶ Fla. Stat. § 334.03 (2022). Defines a collector road as “a route providing service which is of relatively moderate average traffic volume, moderately average trip length, and moderately average operating speed.”

¹⁷ Fla. Stat. § 334.03 (2022).

¹⁸ Fla. Stat. § 334.03(11) (2022).

¹⁹ Fla. Stat. § 335.0415(3) (2022).

equipped to deal with one of these issues and may be better off taking care of a certain stretch of affected road.

Each type of government entity has a different duty to maintain its public roads. At the state level, the Florida Department of Transportation (“FDOT”) has a duty to maintain roads under its control. FDOT also has the authority to adopt uniform minimum standards and criteria for design, construction, and maintenance of all public roads.²⁰ Meanwhile, counties have a duty to keep roads in good order and provide a reasonable level of maintenance that affords meaningful access.²¹ Finally, Florida municipalities have a duty to maintain roads in a reasonably safe condition.²² Each of these duties is different from each other and requires individual interpretation, resulting in the potential for varying levels of maintenance between roadways. In addition, Florida courts decreed that any government entity that owns, operates, or controls a roadway owes a general duty to maintain that roadway and likewise has a duty to warn of and correct a dangerous road condition.²³

Florida courts have determined that maintenance responsibilities apply to a road “as it exists,” and that government entities are not required to upgrade roadways to avoid obsolescence or generally improve the road, even if upgrades would make the road safer.²⁴

²⁰ Fla. Stat. §§ 335.01, 334.03, 335.0415(3) (2020).

²¹ *Hillsborough Cty. v. Highway Eng’g & Constr. Co.*, 199 So. 499, 503 (Fla. 1941). The duty to “provide reasonable maintenance that results in meaningful access” is a more recent addition to the county maintenance standard, stemming from *Jordan v. St. Johns County*, 63 So. 3d 835 (Fla. Dist. Ct. App. 2011) This case found that as long as a public road has not been abandoned, then the responsible county has a duty to maintain it so that it affords “meaningful access.”

²² *Jauma v. City of Hialeah*, 758 So. 2d 696 (Fla. Dist. Ct. App. 2000). Held municipality responsible for addressing issues with roadway, sidewalk, and right-of-way flooding when it impeded citizens’ access.

²³ *Pollock v. Fla. Dep’t of Highway Patrol*, 882 So. 2d 928, 933-34 (Fla. 2004).

²⁴ *Fla. Dep’t of Transp. v. Neilson*, 419 So. 2d 1071, 1078 (Fla. 1982) (“We caution, however, that the maintenance of a particular street or intersection means maintenance of the street or intersection as it exists. It does not contemplate maintenance as the term may sometimes be used to indicate obsolescence and the need to upgrade a road by such things as widening or changing the means of traffic control.”).

Maintenance Responsibilities by Jurisdiction

Tables for each state that contain main duties based on jurisdiction (municipal, county, state)

ENTITY	All public entities with road maintenance responsibilities	State	County	Municipalities
DUTY	Duty to warn of a known dangerous condition ²⁵	Maintain roads under its control ²⁶	"[K]eep[] roads in good order" ²⁷ and "provide reasonable maintenance that affords meaningful access" ²⁸	Maintain roads in a reasonably safe condition ²⁹

Evaluating Maintenance Responsibilities Under Tort Law

Introduction: Torts vs. Takings Claims and Doctrinal Confusion

Tort law provides civil law remedies—i.e.-damages—to plaintiffs for harms suffered due to another’s action. In relation to road infrastructure, claims often come in the form of negligence, negligent design, failure to maintain, and failure to warn. However, because cases about roads most often include state or local government defendants, sovereign immunity frequently arises as an impediment for plaintiffs. Thus, increasingly, plaintiffs seek to frame their claims as “takings” cases under the U.S. Constitution’s Fifth Amendment protections of private property rights as the “takings” clause is not subject to

²⁵ Pollock v. Fla. Dep’t of Highway Patrol, 882 So. 2d 928, 933–34 (Fla. 2004).

²⁶ Pollock v. Fla. Dep’t of Highway Patrol, 882 So. 2d 928, 933–34 (Fla. 2004).

²⁷ State ex rel. White v. MacGibbon, 84 So. 91 (Fla. 1920). Note that the validity of this specific maintenance standard could be questioned as the language in the *MacGibbon* case making it a duty is both unsupported by statute or other case law and is arguably dicta, though it was treated as precedent by *Jordan v. St. Johns County*, 63 So. 3d. 835 (5th DCA 2011); *Ecological Dev., Inc. v. Walton County*, 558 So. 2d 1069, 1071 (Fla. 1st DCA 1990); *Hillsborough Cty. v. Highway Eng’g & Constr. Co.*, 199 So. 499, 503 (Fla. 1940) (citing to State ex rel., v. MacGibbon, et al., 79 Fla. 132, 84 So. 91).

²⁸ *Jordan v. St. Johns County*, 63 So. 3d. 835 (5th DCA 2011)

²⁹ *Jauma v. City of Hialeah*, 758 So. 2d 696, 698 (Fla. 3d DCA 2000).

the sovereign immunity defense.³⁰ The efforts by plaintiffs to overcome sovereign immunity by framing injuries as takings claims rather than torts has created doctrinal confusion for courts over the distinctions between takings and torts.³¹

This part provides an overview of the general tort law context for the most relevant types of claims before moving on to consider in detail the challenges of sovereign immunity, application of which hinges on the distinction between discretionary functions versus mandatory duties.

Tort Liability Generally

Tort law exists to provide a civil remedy for those harmed by certain actions of others. The discussions here focus on the tort law of negligence, which would be the tort most applicable to claims of failure to maintain roads. Tort law liability is based on finding of four distinct elements: 1) A duty owed by a defendant to the plaintiff who is claiming harm; 2) a breach of that duty; 3) That the breach was the proximate cause of harm to the plaintiff; and 4) Damages to the plaintiff resulted from the breach. The law of torts establishes that a person acts negligently if the person does not exercise reasonable care under all the circumstances.³² Negligence law does not require any sort of intent on the part of a defendant in breaching a duty.³³

Each of the four elements of torts are the subject of extensive case law. Only the element of “duty” and the potential defense of sovereign immunity receive careful treatment here.

“A duty of care is ‘a minimal threshold legal requirement for opening the courthouse doors.’”³⁴ “A duty of care requires that the defendant ‘conform to a certain standard of conduct . . . for the protection of others against unreasonable risks.’”³⁵ The Florida Supreme Court has noted four sources from which a duty of care might be found: 1) legislative enactments or administration regulations; 2) judicial interpretations of such enactments or regulations; 3) other judicial precedent; and 4) a duty arising from the general facts of the

³⁰ See, e.g. Kristen Hite, Congressional Research Service, *Opening the Floodgates? Federal Circuit Lets Claims Proceed Against Corps of Engineers for Hurricane-Related Flooding 2* (Legal Sidebar, Updated Oct. 13, 2022); Sandra B. Zellmer, *Takings, Torts, and Background Principles*, 52 Wake Forest L. Rev. 193, 194-95 (2017) and Thomas Ruppert, *Castles—and Roads—in the Sand: Do All Roads Lead to a “Taking”?*, 48 *Env’tl L. Reporter* 10914 (2018). The Fifth Amendment’s protections of private property rights are made applicable to the states through the Fourteenth Amendment to the U.S. Constitution. *Chicago, B. & Q. R. Co. v. Chicago*, 166 U. S. 226 (1897).

³¹ See, e.g. Kristen Hite, Congressional Research Service, *Opening the Floodgates? Federal Circuit Lets Claims Proceed Against Corps of Engineers for Hurricane-Related Flooding 2* (Legal Sidebar, Updated Oct. 13, 2022); Sandra B. Zellmer, *Takings, Torts, and Background Principles*, 52 Wake Forest L. Rev. 193, 194-95 (2017); J. Scott Pippin & Mandi Moroz, *But Flooding Is Different: Takings Liability for Flooding in the Era of Climate Change*, 50 *ELR* 10920 (2020); and Thomas Ruppert, *Castles—and Roads—in the Sand: Do All Roads Lead to a “Taking”?*, 48 *Env’tl L. Reporter* 10914 (2018).

³² Restatement (Third) of Torts § 3.

³³ See, e.g. *Wallace v. Dean*, 3 So. 3d 1035, 1042 (Fla. 2009) (citing Prosser and Keaton on the Law of Torts).

³⁴ *Wallace v. Dean*, 3 So. 3d 1035, 1046 (Fla. 2009) (citing *McCain v. Fla. Power Corp.*, 593 So. 2d 500, 502 (Fla. 1992)).

³⁵ *Wallace v. Dean*, 3 So. 3d 1035, 1046-47 (Fla. 2009) (citing *Clay Elec.*, 873 So. 2d at 1185).

case.³⁶ The Florida Supreme Court has also provided general guidance on the types of local government activities that may give rise to a duty of care and potential tort liability.³⁷ “Capital improvements and property control operations,” such as road design, building, maintenance, is one type of local government that may give rise to liability.³⁸ It is important to note that finding of a duty owed to a plaintiff forms the prerequisite for any further analysis of elements of the claimed tort or for any defenses. For example, if a plaintiff cannot demonstrate a statutory or common law duty, analysis of the potential defense of sovereign immunity for a government defendant is unnecessary and inappropriate.³⁹

Duty for Maintenance in Tort Claims

Sovereign Immunity and the Discretionary Function Doctrine

As capital improvements and property control operations may potentially give rise to local government liability, it is important that local governments always strive to exercise “reasonable care” in all such activities.⁴⁰ The model ordinance below is designed to help promote local government in exercising “reasonable care” in road maintenance activities for environmentally compromised road segments even as the ordinance also seeks to protect sovereign immunity protections for local government should a court find that a local government’s actions were tortious.

Sovereign immunity is the idea that the “sovereign” or government authority, is immune from a legal suit. This legal rule developed in the context of monarchies, where it was said that the king could do no wrong because he was the highest authority of the land, and the rest of government only had authority through him. The legal rule persists, though in reduced scope, in today’s U.S. legal system. Sovereign immunity continues to offer limited protection to states, counties, and local governments against legal liability for torts (civil wrongs). Continued sovereign immunity protections for government in the U.S. are founded upon a “separation of powers doctrine” as evidenced by the U.S. Constitution.

The separation of powers doctrine limits interference of the judicial branch of government with the policy choices of the legislative branch. Thus, sovereign immunity provides legislative government entities appropriate latitude in setting policy with less fear of liability. Not every policy choice is going to prove fruitful, but legislators would often be paralyzed and unable to innovate without the legal legroom to implement novel and untested methods as well as tried-and-true policies but that may be disfavored by some. Sovereign immunity prevents these dilemmas while still allowing liability for certain claims.

³⁶ Wallace v. Dean, 3 So. 3d 1035, 1047 (Fla. 2009) (citing Clay Elec., 873 So. 2d at 1185).

³⁷ Trianon, 468 So. 2d 912, 919 (Fla. 1985).

³⁸ Wallace v. Dean, 3 So. 3d 1035, 1049 (Fla. 2009).

³⁹ Pollock v. Fla. Dep’t of Highway Patrol, 882 So. 2d 928, 938 (Fla. 2004) and Wallace v. Dean, 3 So. 3d 1035, 1039, 1044, 1053 (Fla. 2009).

⁴⁰ See, e.g. Wallace v. Dean, 3 So. 3d 1035, 1050 (Fla. 2009).

The State of Florida has a limited statutory waiver of sovereign immunity.⁴¹ The Florida statute borrows language from the Federal Tort Claims Act, but does not include the express exception for discretionary exercises of governmental power that the federal act does.⁴² However, Florida courts have nevertheless ruled that there is an implied exception, similar to the federal exception, in the Florida statute for acts that are discretionary, planning, or policy-level decisions, and that the waiver only applies to government actions that are operational, ministerial, or proprietary in nature.⁴³

Florida courts found it necessary to add an implied exception to Florida's waiver of sovereign immunity based on the separation-of-powers doctrine. This doctrine bars the judicial branch of government from interfering with the powers and duties of the legislative and executive branches and their derivate agencies and municipal corporations.⁴⁴ Discretionary decisions involve planning and decision-making, so they look more like traditional exercises of legislative power than operational functions, which are actions that do not create policy but instead execute existing policies. The judiciary cannot direct the policies of the other branches of government but does have the power to evaluate whether the other branches are following the law. In this way, the discretionary versus operational distinction creates a space for courts to intervene, maintaining the goals of sovereign immunity while still holding government entities accountable in their operational actions.

The line between what constitutes a discretionary decision and what constitutes an operational function is often blurry. Courts are tasked with deciphering "...where, in the area of governmental processes, orthodox tort liability stops and the act of governing begins."⁴⁵ The Florida Supreme Court has defined discretionary decisions as those involving "fundamental questions of policy and planning" and operational functions as "secondary decision(s) as to how these policies or plans will be implemented."⁴⁶ At first glance, these definitions seem clear, but figuring out which definition fits with a particular government act is often a source of confusion and is a frequent topic for argument during government

⁴¹ Fla. Stat. §768.28 (2022).

⁴² *Id.*

⁴³ *Commercial Carrier Corp. v. Indian River County*, 371 So. 2d 1010 (Fla. 1979). This case introduced the practice of distinguishing discretionary actions against operational actions to the state of Florida by adopting a standard from the California case, *Johnson v. State*, 447 P.2d 352 (Cal. 1968).

⁴⁴ *Kaisner v. Kolb*, 543 So. 2d 732, 736-37 (Fla. 1989). "[T]he discretionary function exception [to the waiver of sovereign immunity] is grounded in the doctrine of separation of powers. That is, it would be an improper infringement of separation of powers for the judiciary, by way of tort law, to intervene in fundamental decision making of the executive and legislative branches of government, including the agencies and municipal corporations they have created." See also, "...separation of powers [does not] permit the substitution of the decision by a judge or jury for the decision of a governmental body as to the reasonableness of planning activity conducted by that body." *Commercial Carrier Corp.*, 371 So. 2d 1010, 1018 (Fla. 1979) (explaining a New York case that similarly found an implied exception for discretionary acts in the state's waiver of sovereign immunity based on a theory of separation of powers).

⁴⁵ *Commercial Carrier Corp.*, 371 So. 2d 1010, 1018 (Fla. 1979) (citing *Evangelical United Brethren Church*, 407 P.2d 440, 444 (Wash. 1965)).

⁴⁶ *Kaisner v. Kolb*, 543 So. 2d 732, 737 (Fla. 1989). *Commercial Carrier Corp.*, 371 So. 2d 1010, 1021 (Fla. 1979)

tort litigation. The distinction between discretionary versus operation function is so fraught that one court observed that “[t]he enigma is now shrouded in mystery.”⁴⁷

Some types of government acts have traditional categorizations as either discretionary or operational, but many acts need to be analyzed on a case-by-case basis by considering a variety of factors.⁴⁸ In *Commercial Carrier Corp v. Indian River County*, the court recommended and utilized a test from the Washington case *Evangelical United Brethren Church v. State*, in order to parse out which acts qualify as which.⁴⁹ The test asks whether the challenged act involves a government policy, whether the act is essential to implementing that policy, whether the act requires the government entity to utilize some sort of policy evaluation, judgement, or expertise, and whether the government entity involved can and must make or do the challenged act.⁵⁰ If the government act in question easily satisfies each of these questions, then it qualifies as a discretionary act and is an exercise of the sovereign right of governmental entities to govern, and if otherwise, then more inquiry is necessary.⁵¹ The lynchpin here is whether or not the act is a characteristic act of governance. The courts recognized that government entities require a certain degree of tort immunity if they are to ever achieve their goals.⁵²

The court in *Commercial Carrier Corp* found that proper maintenance of a traffic light was operational in nature.⁵³ Maintenance has historically been categorically defined as an operational function in Florida as it was not assumed to require any decision-making or planning. This definition extends to road maintenance as well.⁵⁴ The standards and criteria for the design, construction, and maintenance of any public roads that are not a part of the state or national highway systems are compiled in the *Florida Greenbook*, published by the Florida Department of Transportation.⁵⁵ The *Greenbook* outlines the general requirements for how to construct a road and government entities should adhere to the guidelines design, but there are still many choices during the design process that may be protected

⁴⁷ *Dep’t of Transp. v. Neilson*, 419 So. 2d 1071, 1079 (Fla. 1982) (Sunberg, J., dissenting).

⁴⁸ *Commercial Carrier Corp.*, 371 So. 2d 1010, 1021 (Fla. 1979) “...various factors furnish a means of deciding whether the agency in a particular case should have immunity, such as the importance to the public of the function involved, the extent to which government liability might impair free exercise of the function, and the availability to individuals affected of remedies other than tort suits for damages.”

⁴⁹ *Id.* at 1022; *Evangelical United Brethren Church*, 407 P. 2d 440 (Wash. 1965).

⁵⁰ *Evangelical United Brethren Church*, 407 P. 2d 440 (Wash. 1965).

⁵¹ *Id.*

⁵² Peck, *The Federal Tort Claims Act*, 31 WASH. L. REV. 207 (1956). “Liability cannot be imposed when condemnation of the acts or omissions relied upon necessarily brings into question the propriety of governmental objectives or programs or the decision of one who, with the authority to do so, determined that the acts or omissions involved should occur or that the risk which eventuated should be encountered for the advancement of governmental objectives.”

⁵³ *Commercial Carrier Corp*, 371 So. 2d 1010, 1022 (Fla. 1979).

⁵⁴ *Department of Transportation v. Neilson*, 419 So. 2d 1071, 1078 (Fla. 1982).

⁵⁵ Florida Department of Transportation, *Manual of Uniform Minimum Standards for Design, Construction and Maintenance for Streets and Highways* (the “Florida Greenbook”) (2016), available at <https://www.fdot.gov/roadway/floridagreenbook/fgb.shtm>.

by sovereign immunity as discretionary decisions.⁵⁶ There is no set standard for when or where to build a road, whether to change an existing road, how curvy or straight a road should be, or how many lanes it should have. Such choices represent discretionary acts of governance that are immune from judicial scrutiny.⁵⁷ That being said, negligent construction in building or changing the road may still create liability.⁵⁸

The court in *Department of Transportation v. Neilson* emphasized the difference between sovereign-protected design decisions and actionable maintenance requirements. Decisions about the design of a road or whether the road should be changed only become actionable when the government entity failed to warn the public of a known dangerous condition.⁵⁹ Here the court makes a key differentiation between road maintenance and road upgrades. Government entities are not required to upgrade roads and are not liable when they choose not to.⁶⁰ Upgrades refer to deviations from the initial plan for the road such as lengthening it or changing its route, while maintenance refers to those small repairs that preserve the road's initial plan. For instance, if the initial plan for a road intersection included a stop sign, then the responsible government entity would be required to maintain that stop sign. That entity would need to fix or replace the sign should it be knocked down or destroyed. Maintaining the stop sign is an operational action that is implementing the discretionary, policy-based decision to place one there. However, the responsible government entity could not be held liable for failing to install a stop sign when the initial design did not plan for one, assuming that this omission did not amount to creating a known dangerous condition. The policymakers did not deem a stop sign necessary when they decided on the initial plan for the road and that discretionary choice cannot be second-guessed by the court, regardless of whether the policy seems wise or unwise in hindsight.

To summarize: both municipal and county governments in Florida have specific duties for road maintenance or they may potentially suffer tort liability. For example, if the local government creates a known dangerous condition and fails to warn of such condition, it may be liable for resulting harm. Similarly, if a local government is *aware* of a dangerous condition that is likely to be encountered regardless of a warning, it may also suffer liability. However, sovereign immunity may still apply: if the harm resulted from a discretionary decision rather than a ministerial decision, the local government will be shielded from liability through sovereign immunity. In the context of a determination of sovereign

⁵⁶ *Neilson*, 419 So. 2d 1071, 1078 (Fla. 1982).

⁵⁷ *Department of Transportation v. Konney*, 587 So. 2d 1292, 1294 (Fla. 1991). "... we have consistently held that decisions concerning the initial plan, road alignment, traffic control device installation, or the improvement of roads and intersections are not matters which would subject a government entity to liability, because these activities are basic capital improvements and are judgmental, planning-level functions."

⁵⁸ *Neilson*, 419 So. 2d 1071, 1078 (Fla. 1982) "If... the alleged defect is one that results from the overall plan itself, it is not actionable unless a known dangerous condition is established."

⁵⁹ *Id.*

⁶⁰ *Konney*, 587 So. 2d 1292, 1295 (Fla. 1991). "This court and the district courts of appeal have established the principle that traffic control methods and the failure to upgrade intersections with traffic control devices are judgmental, planning-level decisions, which are not actionable."

immunity, “maintenance” is a legal term of art that distinguishes decisions and actions of a ministerial nature from those inherently involving legislative aspects of balancing competing policy decisions. This is made clear by courts distinguishing “maintenance,” which is obligatory, from “upgrades,” which are discretionary. Thus, the dichotomy between “maintenance” and “upgrades” determines whether sovereign immunity protects a local government from tort liability.⁶¹

When Is “Maintenance” No Longer Just “Maintenance”?

Government entities are not protected by sovereign immunity when an injury occurs as a result of insufficient road maintenance, but they are protected when the injury resulted from a discretionary, policy-based decision on whether or not to upgrade the road.⁶² This means that any tort claim against a government entity over a road condition is only actionable if the condition was the result of a “maintenance” issue rather than a failure to “upgrade” a road or take other discretionary actions. “Maintenance” is a legal term of art signaling that the act is an operational function not protected by sovereign immunity. It involves small acts such as repairing minor damages like potholes and generally keeping the road consistent with its initial plan. In contrast, “upgrades” signals a discretionary decision that involves planning-level changes to the road such as extending it or modernizing it. Government entities are not required to upgrade roadways even if it would prevent the roads from becoming obsolete.⁶³ But courts have yet to directly address what it means when extraneous circumstances—such as sea-level rise or other environmental changes—may make it impossible to conduct “maintenance” as defined in law that is sufficient for a road to remain in a “reasonably safe condition” or “good order.” What happens when the costs and effort to keep a road reasonably safe or in good order far exceed typical “maintenance” costs and the costs resemble or exceed the costs to upgrade a road?

In such cases, can the required work to keep the road consistent with its original design still be called “maintenance” in the legal-term-of-art sense of the word? Or does such work at some point become a policy issue and include sovereign immunity? With the example from a well-known case here in Florida, this white paper and its accompanying ordinance argue that situations arise in which keeping a road consistent with its original design goes beyond the legal term of art “maintenance” and becomes a policy decision subject to the protections of sovereign immunity.

In *Jordan v. St. Johns County*, the Atlantic Ocean had been damaging the road known as Old A1A for more than half a century.⁶⁴ An already decades-old professional assessment determined that the county would need to implement a beach renourishment project

⁶¹ Thomas Ruppert & Carly Grimm, Drowning in Place: Local Government Costs and Liabilities for Flooding Due to Sea-Level Rise, FLA. BAR J., Vol 87, No. 9 (2013)

⁶² *Neilson*, 419 So. 2d 1071 (Fla. 1982).

⁶³ *Id.* at 1078.

⁶⁴ 63 So. 3d 835 (Fla. Dist. Ct. App. 2011).

costing more than \$13 million for a beach nourishment project to even create dry land on which to rebuild the road, on top of additional millions needed every handful of years thereafter to maintain the road once it is rebuilt.⁶⁵ And all this is to serve about two dozen properties, all built after about three decades of severe and documented erosion problems. Despite this, the court found that the county had a duty to conduct “a reasonable level of maintenance” that would result in “meaningful access.”⁶⁶ The court created a confusing opinion because it did not differentiate between “maintenance” as a legal term of art signaling an operational function, and “maintenance” as it is commonly used in ordinary usage. The common definition of “maintenance” denotes efforts engaged to “keep [something] in an existing state (as of repair, efficiency, or validity): preserve from failure or decline.”⁶⁷ When the court found a duty to conduct “a reasonable level of maintenance,” it seemed to use the common definition but triggered the legal term. This seems to redefine the legal term to refer to any repair necessary to achieve usability—or “meaningful access”—as well as broadened the legal term beyond its scope as an operational function that waives sovereign immunity for tort liability. Where “maintenance” normally refers to operational functions including filling in cracks, replacing damaged road signs, and fixing guardrails, the court’s opinion in *Jordan* potentially created a new definition for “maintenance” that requires government entities to use any means necessary to provide “meaningful access.”

Any attempt to restore Old A1A to its original design would have involved an initial outlay greater than the county’s entire annual road and bridge maintenance budget for over 1,000 miles of roads and 47 bridges merely to replace the land where 1.6 miles of road had been located but that had been lost through erosion. The need for a beach renourishment project to create land on which the county could rebuild the road demonstrates that Old A1A no longer existed as it once had, and regular “maintenance” in the legal sense of the term would never be enough to recreate the road. Indeed, the duty to conduct “maintenance” only applies to a road “as it exists” and Old A1A is unable to return to the form in which it once existed, with chunks of the road already eliminated entirely prior to the lawsuit.⁶⁸

Rebuilding the entire road on newly created land is much more like an upgrade because it fundamentally changes the nature of the decision making for the local government.⁶⁹ The decision whether to spend \$13 million of taxpayer money to resurrect a 1.6-mile segment of rapidly deteriorating road more closely resembles a planning-level, discretionary decision than it does an operational function. The decision of how to maintain the road at issue necessitated serious policy considerations, especially since the entire St. Johns County

⁶⁵ *Id.*

⁶⁶ *Id.* at 838

⁶⁷ Merriam-Webster Dictionary, *Maintain*, <https://www.merriam-webster.com/dictionary/maintain> (last visited July 5, 2021).

⁶⁸ Neilson, 419 So. 2d 1071, 1078 (Fla. 1982) (referring to *Commercial Carrier Corp. v. Indian River County*, 371 So. 2d 1010, 1010 (Fla. 1979)).

⁶⁹ See, e.g. *City of St. Petersburg v. Collom*, 419 So. 2d 1082, 1086 (Fla. 1982) (noting that “The judicial branch can neither mandate the building of expensive and fail-safe improvements, nor otherwise require expenditures for such improvements.”).

budget for bridge and road maintenance in the year 2009 was \$9,617,471, a few million shy of even the initial beach nourishment cost that would have had to precede rebuilding of Old A1A, which represented only about 0.1% of the county's road miles.⁷⁰ St. Johns County had 200,000 residents, 1,026 miles of road, and 47 bridges to consider when allocating that budget.⁷¹ Decisions regarding budgets and road locations are hallmark policy-based, planning-level decisions that represent inherent legislative acts of government because these decisions create the policies that are then carried out through operational functions.⁷² Courts distinguish between “maintenance” and “upgrades” to avoid infringing upon St. Johns County's right to govern, a right that the court in *Jordan* threatened.

The model ordinance below seeks, among other goals, to provide an overarching policy framework within which local governments exercise their legislative discretion. As the framework would guide policy at the local level, it preserves local government sovereign immunity from tort suits since the local government will still be exercising policy making discretion in application of the framework.⁷³ The analogy is that the decisions made under the guidance of the ordinance are “design” and “construction,” which enjoy sovereign immunity.

Steps to Decrease Potential Tort Liability

Avoiding the Problem—Do Not Accept Dedications

One very clear lesson for local governments emerges from the *Jordan v. St. Johns County* case: be very careful of what infrastructure you accept for maintenance since, once you own it, you also own any potential liability that arises along with it, and you own this in perpetuity. While it was clearly a long-term strategic mistake for St. Johns County to accept the right-of-way of Old A1A from the State of Florida, it was not clear in that case whether the county had the option to not accept the right-of-way.

Dedication represents a common way by which local governments acquire road right of ways (and other at-risk infrastructure, such as drainage systems). Dedication occurs when private land is “dedicated” to public use and accepted by the public. Local governments acquire road right of ways when a properly executed plat with the dedications has been approved by the local government and recorded.⁷⁴ However, even with such a dedication and acceptance by local government, the statute indicates that “nothing herein shall be construed as creating an obligation upon any governing body to perform any act of

⁷⁰ ST. JOHNS COUNTY, FLORIDA, 2009 FINANCIAL PLAN 85 (2008) (County Expenditures by Service Area, Transportation, Transportation Trust Fund, Road & Bridge Maintenance), <http://co.st-johns.fl.us/OMB/media/FY2009FinancialPlan/pdf>.

⁷¹ *Id.*

⁷² *City of St. Petersburg v. Collom*, 419 So. 2d 1082, 1086 (Fla. 1982) (“The judicial branch can neither mandate the building of expensive and fail-safe improvements, nor otherwise require expenditures for such improvements.”).

⁷³ *Wallace v. Dean*, 3 So. 3d 1035, 1046 (Fla. 2009) (drawing a distinction between operational conduct that “did *not* involve the exercise of any type of quasi-legislative discretion [italics in original] and “fundamental questions of public policy or planning”).

⁷⁴ Fla. Stat. § 177.081(3) (2021).

construction or maintenance within such dedicated areas except when the obligation is voluntarily assumed by the governing body.”⁷⁵ This would appear to create a conflict with the local government duties to maintain roads for which they are responsible. Narrowly construing the lack of obligation might offer a way out of this conundrum: if a local government accepts a right of way dedication but then *never* does any maintenance on the road, maybe no duty to maintain the road arises. However, if the local government begins maintenance, then a duty to either continue maintenance or abandon the road would arise.⁷⁶ In theory, this does not necessarily conflict with current Florida case law that forbids placing roads in a “no-maintenance status” but keeping them public since in the case that announced that rule, the local government had already been conducting maintenance on the dedicated roadways.⁷⁷ Rather, this potential resolution simply emphasizes what is already considered a key point in the law: whether the local government has been doing maintenance on the road or not.⁷⁸

A focus on previous maintenance activities fits with other statements in the law as well. For example, “local governments may be held accountable for maintenance even for privately constructed roads on which local governments have consistently performed maintenance.”⁷⁹ If the privately constructed roads were, as noted above, effectively dedicated to public use and local government, this presents no issue for a local government engaging in maintenance activities. However, if a private road is not effectively dedicated to the public, remains private, and a local government expends public funds on maintenance of the road, such expenditures likely violate Florida’s Constitution.⁸⁰ It appears that if a local government expends public funds on construction or maintenance of private

⁷⁵ Fla. Stat. § 177.081(3) (2021).

⁷⁶ See, e.g. *Jordan et al. v. St. Johns County*, 63 So. 3d 835 (Fla. 2011) (citing *Ecological Development, Inc. v. Walton County*, 558 So. 2d 1069, 1071 (Fla. 1st DCA 1990) for the proposition that local government cannot “be compelled, to perform or provide for any particular construction or maintenance, except such as it voluntarily assumes to do. This is far removed, however, from the notion advanced by appellee [county] that it can accept established roadways within the county, undertake to maintain the same, and later by resolution or other official action (short of abandonment) relieve itself of all duties with respect to maintenance of such roads.”).

⁷⁷ *Ecological Development, Inc. v. Walton County*, 558 So. 2d 1069 (Fla. 1st DCA 1990).

⁷⁸ E.g., compare Fla. Stat. § 95.361(2) (noting that regular maintenance or repair of a roadway “for the immediate past 7 years” results in the road being deemed dedicated to the maintaining local government) with Fla. Stat. § 177.081(3) (noting that even effective dedication of a right of way to a local government has been achieved, this does not create “an obligation upon any governing body to perform any act of construction or maintenance within such dedicated areas except when the obligation is voluntarily assumed by the governing body”).

⁷⁹ Thomas Ruppert, Erin Deady, Jason Evans & Crystal Goodison, *Legal Issues When Managing Public Roads Affected by Sea Level Rise: Florida 10* (Spring 2019) (citing Fla. Stat. § 95.361(2) (2018)).

⁸⁰ FLORIDA ATTORNEY GENERAL OPINION AGO 79-14 (Feb. 16, 1979) (noting that spending public funds on private road maintenance likely runs afoul of s. 10, Art. VII of Florida’s Constitution and citing a previous attorney general opinion and case law holding so). See, also *Collins v. Jackson County*, 156 So. 2d 24, 27 (Fla. 1st DCA, 1963) (noting that “we wish to emphasize that our conclusion herein is not to be construed as condoning the expenditure of public funds on private property or the abuse of discretion that results when public funds are expended for purposes other than in furtherance of lawful objectives serving the public necessity and convenience”).

roads, challenging this action would require directly challenging the legal authority of the local government to authorize such expenditures.⁸¹

Thus, in Florida, local governments should not, by law, expend money for construction or maintenance of private roads. If such occurs, case law indicates that an injunction against such expenditures is appropriate relief. Case law has not clearly established whether such illegal expenditures would give rise to a duty on the part of the local government to continue to provide such maintenance if the roads had not yet been made public according to statutory procedures. Nor has case law clearly established whether a local government that illegally expends public funds for maintenance for the statutory period of seven years on a private road⁸² effectively makes such private road into a public road. It appears that if no one directly challenges the illegality of the public expenditures on a private road, the road may indeed become a public road that is now the property—and liability—of the local government.

This analysis demonstrates that if a local government seeks to limit future liabilities for roadways or other infrastructure that may become extremely difficult and expensive—or even virtually impossible—to keep in typical functioning order due to impacts of rising seas, the safest route is to avoid responsibility for the maintenance of such infrastructure. This includes avoiding either intentional or unintentional acceptance or dedication of such infrastructure. Clear local government policies limiting intentional acceptance or dedication coupled with clear policies ensuring that maintenance activities only occur on rights of way which are owned by the local government can help avoid this problem. Such policies are included in the draft ordinance below.

⁸¹ *Collins v. Jackson County*, 156 So. 2d 24, 27 (Fla. 1st DCA, 1963) (noting that plaintiff suing county “did not assert or undertake by the proofs to establish that the county commissioners exceeded their lawful authority - abused their discretion - by causing work to be performed that did not serve the public convenience and necessity”).

⁸² Fla. Stat. § 95.361(2) (2021).

Duty to Warn and Signage

Determining what duties entities may owe to one another is a core tenet of tort law. The first step in pleading negligence is to establish that the alleged tortfeasor (defendant) owed some sort of duty to the complainant (plaintiff), and the second step is establishing that the duty was breached.

Government entities have a duty to warn of a known danger. In the State of Florida, the duty to warn requires that when a government entity creates a known dangerous condition, they must take steps to warn any persons who may be injured by that dangerous condition.⁸³ This duty is an operational-level duty and is not protected by sovereign immunity.⁸⁴ In fact, the duty to warn represents a partial exception to the established principle that a government entity cannot be liable for an inherent defect in an adopted plan or improvement.⁸⁵ If the adopted plan or improvement creates a dangerous condition, and the government entity implementing that plan or improvement knows of the dangerous condition, then they are obligated to warn the public.

Key components to deciphering whether the duty to warn applies are whether the danger was created by the government entity and whether the government entity knew of that danger. It is not necessary that the government entity create the danger itself so long as the danger is attributable in part to the entity's failure to maintain an existing structure.⁸⁶ In such cases, the failure to maintain effectively created a dangerous condition that they are now responsible for either fixing or warning the public of. The other key component to the duty to warn is whether the government entity tried to correct or warn of the danger. Courts have stated that the duty has been satisfied if the government acted reasonably and responsibly under the circumstances using acceptable standards of care and took steps either to correct the danger or to warn those at risk.⁸⁷ In general, the exception to sovereign immunity by claiming a known dangerous condition constitutes a narrow exception.⁸⁸ The dangerous condition must be "so serious and so inconspicuous to a foreseeable plaintiff that it virtually constitutes a trap."⁸⁹

⁸³ *City of St. Petersburg v. Collom*, 419 So. 2d 1082, 1086 (Fla. 1982) ("...once a governmental entity creates a known dangerous condition which may not be readily apparent to one who could be injured by the condition, and the governmental entity has knowledge of the presence of people likely to be injured, then the governmental entity must take steps to avert the danger or properly warn persons who may be injured by that danger." (citing *Savignac v. Department of Transportation*, 406 So. 2d 1143 (Fla. 2d DCA 1981))).

⁸⁴ *Id.*

⁸⁵ *Id.*

⁸⁶ *Robinson v. Fla. Department of Transportation*, 465 So. 2d 1301, 1305 (Fla. Dist. Ct. App. 1985) (holding Florida DOT liable for its failure to maintain a traffic control signal at an intersection where there had already been injuries).

⁸⁷ *Id.*

⁸⁸ John A. Greco, *Litigation of the Narrow Exception to Sovereign Immunity for Known Hazards or Traps*, 42 THE AGENDA 1, 13 (Fall 2019), at <https://www.cclgl.org/wp-content/uploads/2021/03/CCLG-Fall-2019.pdf>.

⁸⁹ *Department of Transportation v. Konney*, 587 So. 2d 1292, 1298-1300 (Fla. 1991) (Kogan, J., concurring).

The failure to warn of a known danger is a common cause of action in tort claims that arise from poor road conditions. However, a government entity's duty to warn may be satisfied by installing warning signs at the site of the dangerous area. Courts have indicated signage as an appropriate conduit to warn those at risk.⁹⁰ Government entities enjoy broad discretion in regard to signage requirements and courts do not mention a set standard for what a sign needs to include in order to qualify as a sufficient warning. Erecting a sign that notifies a motorist that the section of road they are approaching is dangerous represents a step taken by the government entity to warn those at risk of injury. When a government entity installs an appropriate warning sign, it has fulfilled its operational duty to warn and may now be protected from tort liability. This is particularly useful when the dangerous condition was created by natural forces. When a government action creates a dangerous condition, the entity is faced with *either* taking steps to ameliorate the danger *or* warning of the risk.⁹¹ If the entity is unable to correct the danger due to cost or extenuating circumstances that render correction attempts extremely challenging, then the government entity can still potentially gain protection from tort liability by informing those put at risk by the dangerous condition.

It is important to note that case law indicates that liability arises if the local government itself *created* the danger in cases cited⁹² or that the local government had *notice* of the dangerous condition.⁹³ It is unclear whether doing some work to repair a damaged road without bringing that road up to the standards that would be typical for such road absent the exigent circumstances of sea-level rise or other environmental challenges constitutes "*creating* a known hazard." Rather than argue about whether government *created* the hazard or whether nature did so, in the interest of caution, this analysis assumes a court might hold that local government work on a road that did not bring the road up to usual standards constitutes "creat[ing] a *known* dangerous condition."⁹⁴ Thus, the model ordinance below requires signage to warn motorists of the potential dangers of roads that the local government has made policy decisions to not maintain to the usual standards.

Legislative Policy on Road "Maintenance" Costs

The model ordinance seeks to make clear that the policy choices included rest on the local governments right—even its responsibility—to make challenging decisions that balance the important and competing interests of a safe and effective transportation network, private property rights, environmental concerns, and local government fiscal sustainability.

⁹⁰ Savignac v. Department of Transportation, 406 So. 2d 1143, 1147 (Fla. Dist. Ct. App. 1981); Department of Transportation v. Webb, 438 So. 2d 780, 781 (Fla. 1983).

⁹¹ City of St. Petersburg v. Collum, 419 So. 2d 1082, 1086 (Fla. 1982).

⁹² See, e.g. Windham v. Fla. Dep't of Transp., 476 So. 2d 735, 740-741 (Fla. 1st DCA 1985) (citing Garza v. Hendry County, 457 So.2d 602, 603 (Fla. 2d DCA 1984) as indicating there was no liability where defendant's failure to warn of a condition was not grounds for liability because there was no evidence defendant caused the dangerous condition nor was there any evidence that the government was on notice of the dangerous condition).

⁹³ Hannewacker v. City of Jacksonville Beach, 402 So.2d 1294 (Fla. 1st DCA 1981) (plaintiff failed to establish notice on defendant's part of known dangerous condition); Garza v. Hendry County, 457 So.2d 602, 603 (Fla. 2d DCA 1984) (same).

⁹⁴ City of St. Petersburg v. Collom, 419 So.2d 1082, 1086 (Fla. 1982).

The policy inherent in the model ordinance emphasizes the distinction between the discretionary act of setting road maintenance policies (which enjoy sovereign immunity) and the ministerial/non-discretionary acts of implementing policy (which do not enjoy sovereign immunity). The model ordinance does this by setting financial thresholds on how much will be spent for maintenance activities on environmentally compromised roads. As such, the policy is how much money is allocated and which activities the local government decides to dedicate those funds to on an environmentally compromised road segment. Decisions about what work to conduct on an environmentally compromised road segment with the limited funding available is itself a discretionary decision, but the manner of the execution of the work decided upon would remain an operational activity not protected by sovereign immunity.

Duty for Maintenance and Inaction Under a Takings Theory

“Takings” law is based on the U.S. Constitution’s Fifth Amendment protection of private property rights,⁹⁵ though the basis for finding a Fifth Amendment taking of property in the case of decreased access is not very clear.⁹⁶ In the context of roads, Florida courts have concluded that “substantially diminished” road access can result in a taking of the private property right to maintain connection to the public road system.⁹⁷

However, historically courts had held that one cannot successfully bring a takings claim against the government without specifying the government action that caused the taking of the private property right.⁹⁸ At least one District Court of Appeal in Florida departed from this standard and joined a small minority of courts that have held that “inaction” can form a basis for a takings claim in some circumstances.⁹⁹ While the case in Florida that did this, *Jordan v. St. Johns County*,¹⁰⁰ was only a state district court of appeal case, it is binding law on all trial courts in the state.¹⁰¹ Yet this precedent contradicts takings law analysis from the Court of Federal Claims and most states.¹⁰²

⁹⁵ U.S. CONST. amend. V (“... nor shall private property be taken for public use, without just compensation.”).

⁹⁶ See, e.g., Isaac Foote, *A Taking Timebomb: Loss of Access Takings as a Barrier to Managed Retreat from Sea Level Rise*, 23 MINN. J.L. SCI. & TECH. 537, 549-et seq. (2022).

⁹⁷ Fla. Dep’t of Transp. v. Kreider, 658 So.2d 548, 550 (Fla. 4th Dist. Ct. App. 1995); Palm Beach County v. Tessler, 538 So.2d 846, 849 (Fla. 1989); Pinellas County v. Austin, 323 So. 2d at 8 (Fla. Dist. Ct. App. 1975).

⁹⁸ Thomas Ruppert, *Castles—and Roads—in the Sand: Do All Roads Lead to a “Taking”?*, 48 ENV’T L. REPORTER 10914, 10920-21 (2018).

⁹⁹ For in-depth consideration of the issue of government inaction as a basis for a takings claim, including case citations, see, Thomas Ruppert, *Castles—and Roads—in the Sand: Do All Roads Lead to a “Taking”?*, 48 ENV’T L. REPORTER 10914, 10920-25 (2018).

¹⁰⁰ 63 So. 3d 835, 839 (Fla. Dist. Ct. App. 2011).

¹⁰¹ Thomas Ruppert, *Castles—and Roads—in the Sand: Do All Roads Lead to a “Taking”?*, 48 ENV’T L. REPORTER 10914, 10931 (2018).

¹⁰² *Id.* 10920-21 nn. 76-78 (collecting federal and state cases finding inaction cannot support a takings claim); *id.* at 10921 nn. 80-83; and *id.* at 10930-32; *but see, id.* at 10921 n. (noting state cases indicating that, under limited circumstances, government inaction might be enough to support a takings claim).

As a result, local governments in Florida currently operate under judicial precedent that a takings claim based on inaction of a governmental entity is not subject to dismissal on the basis of government inaction. Other district courts of appeal in Florida are not, however, bound by the *Jordan* decision and could rule differently, setting up a conflict that might then reach the Florida Supreme Court. Federal district and appellate courts are not bound by the *Jordan* decision. And if a case based on government inaction were to be brought in the Court of Federal Claims, it is very likely to be dismissed based on clear case law that contradicts the *Jordan* opinion.¹⁰³ However, the Court of Federal Claims is a court of limited jurisdiction; the Tucker Act¹⁰⁴ provides that the Court of Federal Claims has *exclusive* jurisdiction over claims *against the federal government* for money damages greater than \$10,000 based on a Fifth Amendment takings claim.¹⁰⁵ Takings claims, such as the one in *Jordan v. St. Johns County*, may only be brought in state or federal district court. This means that local governments cannot take advantage of the more favorable legal precedent in the Court of Federal Claims.

Based on Florida case law as contrasted with the Federal Circuit, other federal courts, and other states, the rule in Florida that a taking may be premised on a “duty to act” that is neither statutory nor contractual, local governments face a risk of takings in the “maintenance” of infrastructure subject to chronic and extreme environmental stresses. However, if the costs of keeping the infrastructure functioning to provide historic levels of service becomes impracticable or even impossible, local governments need an exit strategy or at least some way of seeking to limit their potential legal and fiscal liabilities. The model ordinance presented below seeks to minimize the likelihood of *successful* takings claims by creating a specific policy-oriented basis for limiting road infrastructure liabilities for local governments confronting environmentally compromised roads.

In part, the model ordinance recognizes the realities that it is not government making a decision to eliminate roads, but rather *erosion* and *sea-level rise* are making these

¹⁰³ Thomas Ruppert, *Castles—and Roads—in the Sand: Do All Roads Lead to a “Taking”?*, 48 ENVTL L. REPORTER 10914, 10930-32 (2018) (contrasting the *Jordan* opinion with the holding of *St. Bernard Parish Gov’t v. United States*, 887 F.3d 1354 (Fed. Cir. 2018)). However, local governments do not have access to the Federal Court of Claims for takings claims brought against them as the Federal Court of Claims is a court of limited jurisdiction

¹⁰⁴ 28 U.S.C. § 1491 and 28 U.S.C. § 1346(a).

¹⁰⁵ 28 U.S.C. § 1491(a)(1). For a recent example of a federal district court refusing to exercise jurisdiction over a Fifth Amendment takings claim due to the Tucker Act’s grant of exclusive jurisdiction to the United States Court of Federal Claims, see *Christopherson v. Bushner*, 2021 WL 1692151 (“This claim, however, would not be properly before this [Federal District] Court because the Tucker Act grants the Court of Federal Claims exclusive jurisdiction over such claims. . . . Under the Tucker Act, “claims against [the] United States exceeding \$10,000 founded upon [the] Constitution . . . are in [the] exclusive jurisdiction of Court of Federal Claims.” *Mullally v. United States*, 95 F.3d 12, 14 (8th Cir. 1996) (citing 28 U.S.C. § 1491) (additional citation omitted). This rule applies to claims against both “the United States and its agencies.” *State of Minn. by Noot v. Heckler*, 718 F.2d 852, 857 (8th Cir. 1983). Here, Plaintiffs have requested \$1.5 million in damages from FEMA. (Doc. 1-1 at 1.) Accordingly, this Court would lack subject-matter jurisdiction over proposed Count VIII.”)

decisions.¹⁰⁶ Furthermore, the justification for using takings law claims based on diminished access to property seems inapposite in the context of SLR.¹⁰⁷

Nuisance and Mandamus Actions: Governmental Failure to Maintain

In addition to takings claims and tort suits in negligence potentially driving liability for environmentally compromised roads, another potential legal action is a nuisance lawsuit: If a governmental entity fails to maintain or repair a road damaged by sea-level rise, storms, flooding, or erosion, a plaintiff could allege that the entity is maintaining a nuisance and seek an injunction. Florida courts define a nuisance as, in part, omitting to perform a duty that injures or endangers the safety of a person or that interferes with or otherwise renders unsafe another's use of his property.¹⁰⁸ Nuisance claims are commonly brought to remedy environmental harms and damage.¹⁰⁹ The author is not aware of any cases in which this approach has been used in Florida in the context of failure to maintain a road or governmental responsibility for repairing damage caused by flooding or other natural causes.

Modifying the Duty to Maintain

The challenges presented by changing environmental conditions for roads due to rising seas and from the increasing number and intensity of heavy rainfall events combine with limited local government maintenance budgets to present serious difficulties in maintaining many low-lying or exposed roadways along Florida's coasts. As environmental conditions change, and what is feasible for maintenance changes, the law needs to also evolve to avoid forcing state and local governments into the untenable position of spending excessive or unavailable funding for road segments that may not be the most feasible to maintain to typical standards due to changing conditions. Current legal maintenance responsibilities do not have clear avenues to make such difficult decisions. On the contrary, current duties and legal precedent, grounded in assumptions of relatively stable climate and coastal conditions, seem to lean towards imposing possible liability on

¹⁰⁶ See, e.g. *Jordan v. St. Johns County*, No. 05-694, slip op. at 12 (Fla. Cir. Ct. May 21, 2009), aff'd in part, rev'd in part, *Jordan v. St. Johns County*, 63 So. 3d 835, 837 (Fla. Dist. Ct. App. 2011).

¹⁰⁷ See, e.g. J. Peter Byrne, *The Cathedral Engulfed: Sea-Level Rise, Property Rights, and Time*, 73 LA. L. REV. 69, 104 (2012) (noting that "this judicially-created doctrine [of loss of access takings] may have made sense in light of an owner's normal reliance on public access for his or her land and concerns about government discrimination, but such rationale is greatly diminished in the shadow of sea-level rise."). See also, Isaac Foote, *A Taking Timebomb: Loss of Access Takings as a Barrier to Managed Retreat from Sea Level Rise*, 23 Minn. J.L. Sci. & Tech. 537, 549-65 (2022).

¹⁰⁸ *Prior v. White*, 180 So. 347, 355 (Fla. 1938).

¹⁰⁹ See *Flo-Sun, Inc. v. Kirk*, 783 So. 2d 1029 (Fla. 2001) (alleging a public nuisance from sugar processing operation); *Town of Surfside v. Cty. Line Land Co.*, 340 So. 2d 1287 (Fla. Dist. Ct. App. 1977) (alleging nuisance from town's operation of a dump that affected health, safety, and welfare of surrounding residential neighborhood); *Fla. Wildlife Fed'n v. State Dep't of Env'tl. Regulation*, 390 So. 2d 64, 65 (Fla. 1980) (alleging nuisance to enjoin water pollution). See also Ronald G. Aronovsky, *Back from the Margins: An Environmental Nuisance Paradigm for Private Cleanup Cost Disputes*, 84 DENV. U. L. REV. 395 (2006).

local governments for failure to maintain road segments to a standard that provides “meaningful access.”¹¹⁰

Current court precedent on road maintenance duties in Florida have often approached the issue from the perspective of individual users or of abutting property owners, as evidenced by the case law on takings claims for diminished road access.¹¹¹ This leads to the conundrum of needing to spend inordinate sums of money on relatively small portions of the road system serving relatively small numbers of people. An alternative approach is to consider road segments not individually but as constituent parts of a larger road system.¹¹² Focusing on the road *system* rather than individual road segments broadens the inquiry into how to approach the challenge and allows more creative thinking about the “duty to maintain” as it currently exists in state law.

The model ordinance below incorporates this thinking through the model ordinance’s limitations on how much money a local government has to spend to repair and “maintain” an environmentally compromised road. The limitation is set based on the context of road maintenance costs for road segments that are not environmentally compromised. Placing the “maintenance” costs of an environmentally compromised road segment in the larger context of the local government’s transportation infrastructure “emphasize[s] the public trust nature of government road ownership so that the public’s collective interests inform the scope of the government’s duty to maintain a roadway.”¹¹³

As noted earlier, the model ordinance is most appropriate for consideration in the context of lower-traffic, local access roads. It is less appropriate for high-traffic, regionally important thoroughfares, evacuations routes, or access to critical facilities.

Not included in the model ordinance below but also worth considering by local governments is providing notice to potential property purchasers, permit applicants, and their citizens generally about the challenges that sea-level rise and climate change pose to infrastructure, including roads. Doing so offers a potential defense to future takings claims related to such infrastructure.¹¹⁴

¹¹⁰ *Jordan v. St. Johns County*, 63 So. 3d 835, 838 (Fla. Dist. Ct. App. 2011).

¹¹¹ See *supra* Duty for Maintenance and Inaction Under a Takings Theory.

¹¹² See, e.g., Shana Jones, Thomas Ruppert, Erin Deady, Heather Payne, Scott Pippin, Ling-Yee Huang, and Jason Evans, *Roads to Nowhere in Four Jurisdictions: States and Local Governments in the Southeast Facing Sea-Level Rise*, 44 COLUMB. J. ENVTL. L. 67, 115-33 (2019).

¹¹³ Shana Jones, Thomas Ruppert, Erin Deady, Heather Payne, Scott Pippin, Ling-Yee Huang, and Jason Evans, *Roads to Nowhere in Four Jurisdictions: States and Local Governments in the Southeast Facing Sea-Level Rise*, 44 COLUMB. J. ENVTL. L. 67, 116 (2019).

¹¹⁴ For an example of a local government in Florida that has taken this approach, see Satellite Beach, Florida, Ordinance numbers: 1113 (2016)(developing Adaptation Action Areas [AAAs]; establishing the sea-level rise curve used by the City; committing City to development of new infrastructure and building standards in AAAs; limiting areas of new City infrastructure; prioritizing projects that utilize green infrastructure; and other actions); 1159 (2018)(expanding the City’s Erosion Adaptation Action Area; limiting location of rebuilding in the Erosion Adaptation Area); 1160 (2018)(modifying the City’s code of

Environmentally Compromised Road Segment: Creating a New Road Classification

Authority to Establish Alternative Road Maintenance Standards (in Florida, via “The Greenbook” and Local Ordinance)

The Florida Department of Transportation, based on statutory authority,¹¹⁵ has promulgated uniform standards and criteria for all public roads in the state that are not part of the state or national highway systems.¹¹⁶ These appear in a publication popularly known as the Florida Greenbook.¹¹⁷ According to the Florida Greenbook, it is essential to maintain all aspects of the road at the “highest reasonable level of safety” and to maintain roads in a quality condition. At the same the Florida Greenbook recognizes that “a comprehensive preservation program is expensive” and that “establishment of appropriate budget priorities and careful planning” are important.¹¹⁸ Additionally, the Florida Greenbook notes the need to establish priorities in conducting maintenance and that “[e]very effort should be made to ensure the highest safety payoff from the maintenance dollar.”¹¹⁹ Thus, the Florida Greenbook recognizes that not all dollars spent on road maintenance provide the same return on investment, indicating that local policy makers must set priorities and balance competing interests in allocating their road maintenance funds.¹²⁰

The Florida Greenbook also notes that in some situations, practical reasons arise that prevent meeting typical standards.¹²¹ Chapter 14, Design Exceptions and Variations, of the Florida Greenbook focuses on how to address such situations. The Florida Greenbook

ordinances provisions related to coastal construction); 1194 (2021)(modifying the City’s comprehensive plan to include sea-level rise and climate change as factors in multiple elements of the plan); 1221 (2022)(including notice of likely future infrastructure impacts as part of permit applications). See also, City of Satellite Beach Resolution No. 1000 (urging the “State of Florida to approve legislation that will provide a coastal retreat funding source and policies to limit coastal construction permitting in highly eroded areas).

For more information on the importance of providing prior notice of likely sea-level rise and climate change impacts as part of the analysis of whether a taking of private property rights has occurred due to regulation, see Thomas Ruppert, *Reasonable Investment-Backed Expectations: Should Notice of Rising Seas Lead to Falling Expectations for Coastal Property Purchasers?*, 26 J. LAND USE & ENVTL. LAW 239 (2011).

¹¹⁵ Fla. Stat. §§ 336.045; 334.044(10)(a) (2022).

¹¹⁶ The Florida Greenbook does contain limited exceptions that require use of the Florida Department of Transportation Design Manual for projects that include vehicular bridges, pedestrian bridges over roadways, and certain box culverts. Mary Anne Koos, Florida Dept. of Transp., 2018 Florida Greenbook Summary of Changes (Power Point presentation, August 2019), https://fdotwww.blob.core.windows.net/sitefinity/docs/default-source/roadway/floridagreenbook/florida-greenbook-2018-summary-of-changes.pdf?sfvrsn=ee7550fd_4 (last visited March 16, 2022).

¹¹⁷ Florida Department of Transportation, Manual of Uniform Minimum Standards for Design, Construction and Maintenance for Streets and Highways (Commonly known as the “Florida Greenbook”)(2018), available at <https://www.fdot.gov/roadway/floridagreenbook/fqb.shtml>.

¹¹⁸ *Id.* at 10-6.

¹¹⁹ *Id.* at 10-3.

¹²⁰ Even Florida’s Fifth District Court of Appeal in the *Jordan v. St. Johns County* case recognized that local governments retain significant discretion in how they spend their road maintenance funds. *Jordan v. St. Johns County*, 63 So. 3d 835, 838 (Fla. Dist. Ct. App. 2011).

¹²¹ *Id.* at iii.

allows design exceptions for “Projects that comply with design criteria for *local subdivision roads and/or residential streets adopted by ordinance*.”¹²² Note that such design exceptions must be adopted by ordinance and only apply to “local subdivision roads and/or residential streets.”

The Florida Greenbook’s process for approval of design exceptions is quite rigorous, especially demanding careful justification if a proposed design does not meet minimums for key design elements.¹²³ Cost savings, time savings, and existence of similar designs are not, standing alone, justifications for design exceptions.¹²⁴ The Greenbook indicates a “strong case” for design exceptions and variations exists when 1) “The required criteria are not applicable to the site specific conditions;” 2) “The project can be as safe by not following the criteria;” and 3) “The environmental or community needs prohibit meeting criteria.”¹²⁵ At the same time, the Greenbook observes that “Most often a case [for design exceptions and variations] is made by showing the required criteria are impractical and the proposed design wisely balances all design impacts.”¹²⁶ Any request for exceptions must include documentation of the proposed exception’s impact on: safety and operational performance; level of service; right of way impacts; community impacts; environmental impacts; costs; usability by all modes of transportation; and long-term and cumulative effects on adjacent sections of roadway.

Thus, if a local government is confronted with a situation in which compliance with typical road design and/or maintenance standards are not physically or financially feasible,¹²⁷ a design exception may be the appropriate response, though the need to justify, document, and secure approvals for design exceptions will itself be an additional burden. Alternatively, a local government could pass a local ordinance establishing design criteria for local subdivision roads and/or residential streets. This was the approach of St. Johns County in response to the road situation at issue in the case *Jordan v. St. Johns County*.¹²⁸ St. Johns County passed Ordinance 2012-35 on December 4, 2012, which noted that it was based on the authority of local governments to pass ordinances for local design criteria.¹²⁹ St. Johns County Ordinance 2012-35 focused its attention on how environmental conditions could limit the physical and fiscal ability of the county to maintain roads in “environmentally challenging locations” to the same standards as typical county roads.

¹²² *Id.* at 14-2 (emphasis added).

¹²³ *Id.* at 14-3; 14-2 to 14-9.

¹²⁴ *Id.* at 14-3.

¹²⁵ *Id.*

¹²⁶ *Id.*

¹²⁷ *E.g.* the physical situation outlined in *Jordan v. St. Johns Cty.*, No. 05-694, (Fla. Cir. Ct. May 21, 2009), *aff’d in part, rev’d in part* by *Jordan v. St. Johns County*, 63 So. 3d 835, 837 (Fla. 2011).

¹²⁸ *Jordan v. St. Johns Cty.*, No. 05-694, (Fla. Cir. Ct. May 21, 2009), *aff’d in part, rev’d in part* by *Jordan v. St. Johns County*, 63 So. 3d 835, 837 (Fla. 2011).

¹²⁹ St. Johns County, Florida, Ordinance 2012-35, whereas clauses 4-6.

The St. Johns County ordinance acknowledged the costs of maintaining roads in “environmentally challenging locations,” and the model ordinance below takes this a step farther by expressly putting the costs of “maintenance” of road segments in “environmentally compromised areas” in the context of the average costs of maintenance across a local government’s jurisdiction; this change ensures that the local government is considering the transportation system as a whole rather than just looking at one small piece of the road segment.

Sovereign Immunity and the Planning/Discretionary Function vs. Ministerial Duty Distinction

While the approach outlined in the model ordinance below may be appropriate for some situations, especially in smaller, more fiscally constrained local governments, models to address the problem of sea-level rise impacts on roads for local governments with more resources may vary widely depending on local circumstances. As examples of different approaches that focus on elevating roads to address the impacts of sea-level rise flooding roads, one can look at the activities of both Miami Beach, Florida and Monroe County, Florida.

Miami Beach has been raising roads to address increasing tidal flooding. The raised roads have necessitated greatly increased pumping capacity of the stormwater system and many other challenges for Miami Beach and affected residents. For more information, see Miami Beach’s website <https://www.mbrisingabove.com/>.

Monroe County, which encompasses the Florida Keys, has engaged in detailed, long-term planning to evaluate vulnerability of roads, establish proposed levels of service, and created frameworks for determining criticality of different areas of road. For more information on the approach of Monroe County, visit Monroe County’s sustainability website at www.monroecounty-fl.gov/803/Sustainability and the presentation “Monroe County Roadway Vulnerability Analysis and Capital Plan Update” at www.monroecounty-fl.gov/DocumentCenter/View/29266/Item-B-8-HDR-Roads-Elevation-Study-Update-20210621

An integral part of the model ordinance presented below is a concerted effort to maximize the sovereign immunity protections to local governments dealing with problematic roads. As noted previously in Duty for Maintenance in Tort Claims, sovereign immunity *only* applies in the context of tort claims, not takings claims. The challenge of overcoming sovereign immunity is a key reason that claimants often seek to portray their claims related to road maintenance as takings claims rather than tort claims. Steps to Decrease Potential Tort Liability above detailed how the model ordinance is structured to increase the potential for sovereign immunity protections for local governments through emphasis on the legislative/discretionary function nature of road maintenance decisions for environmentally compromised road segments and through use of signage to fulfill the local government’s duty to warn.

As sovereign immunity does not apply to takings claims, the model ordinance cannot guarantee that a local government will not be subject to a successful takings claim. The model ordinance can, however, still decrease the likelihood of a successful takings claims by virtue of the model ordinance’s structure. It does this in three key ways.

First, as noted in Steps to Decrease Potential Tort Liability, the model ordinance increases the chance that a court could conclude that the decision to implement the policy

represented by the model ordinance is a policy/discretionary function decision. If a court so finds, this undermines the conclusion in *Jordan v. St. Johns County*,¹³⁰ that the duty to provide a reasonable level of maintenance has not been fulfilled. In other words, the overall structure of the model ordinance provides local government the opportunity to argue that the local government has exercised its discretion through the ordinance, and that the doctrine of separation of powers should prevent a court from interfering with the legislative determination of the local government on how to balance the many interests inherent in conducting maintenance of environmentally compromised road segments. If a court agrees that the ordinance represents a legislative/planning/discretionary action on the part of local government and that the local government has properly implemented the ordinance (i.e.—complied with its non-discretionary, ministerial duties as indicated in the ordinance), then this should lead a court to conclude that the local government has complied with its duty to “provide reasonable access” as articulated in Florida case law.¹³¹ In other words, the “inaction” of not repairing a road to typical standards has not violated a duty; since finding a “duty” to act was key to Florida case law on inaction as sufficient to bring a takings claim, no duty arises for discretionary acts.

Second, the ordinance emphasizes due process and opportunities for property owner involvement. Due process is a foundational part of the U.S. Constitution’s protections of various rights, including property rights.¹³² Due process is included in the model ordinance through notice provisions to property owners whose properties abut a road segment considered for designation as an “environmentally comprised road segment” or for property owners whose property location makes use of such road segment obligatory for access. The public nature of hearings on designation of an area as environmentally compromised or a road segment as environmentally comprised provides additional opportunity for public input and participation in processes.

Third, as part of due process, the ordinance provides options for property owners affected by a finding of a road segment as environmentally compromised to petition the local government for creation of a special funding district to increase the amount of funding available for maintenance of the environmentally compromised road segment.

Abandonment: The Last Road to Take

According to current jurisprudence in Florida, a local government must provide a reasonable level of maintenance that affords meaningful access unless or until the local government formally abandons a road.¹³³

¹³⁰ *Jordan v. St. Johns County*, 63 So. 3d 835, 838 (Fla. 2011).

¹³¹ *Jordan v. St. Johns County*, 63 So. 3d 835, 838 (Fla. 2011).

¹³² U.S. Const. amend. 5 (“nor [shall any person] be deprived of life, liberty, or property, without due process of law”); amend 14, sec. 1 (“nor shall any State deprive any person of life, liberty, or property, without due process of law”).

¹³³ *Jordan v. St. Johns County*, 63 So. 3d 835 (Fla. 2011).

A local government must consider the public interest in abandoning a road. Public places and rights-of-way are held in trust for the benefit of the public, but this trust concept does not preclude abandoning or otherwise discontinuing those streets “when done in the interest of the general welfare.”¹³⁴ In *City of Naples v. Miller*, the court upheld a municipal ordinance to vacate and abandon a street after consulting with public officers, considering the general welfare of the citizens, and determining that abandoning the street was in the best interest of the city.¹³⁵

Road abandonment should typically be a last resort for local governments confronting difficult maintenance challenges since road abandonment itself can potentially result in legal liability for a taking of the property right to maintain a property’s access to the public road system. That said, abandonment may still be the best option in some circumstances. This section describes the statutory authority and processes for road abandonment for counties and municipalities, describes when abandonment may result in a taking, and discusses how the model ordinance seeks to minimize the likelihood of a successful takings claims or the amount of liability should a takings claim be successful.

Road Abandonment Procedures

Florida local governments may abandon roads “when done in the interest of the general welfare.”¹³⁶ In cases such as those envisioned by the model ordinance below, the public welfare would be served by abandoning an environmentally compromised road segment due to the fiscal and legal liabilities accruing to the local government from continued attempts at maintaining the road as a public thoroughfare. Counties and municipalities both may legally abandon roads in Florida, but counties have a more detailed statutory regime for doing so. Local governments may not put roads into a no-maintenance regime and still claim the road as a public road.¹³⁷

Florida counties may abandon roads via the statutory process provided for in Chapter 336, Florida Statutes. Statute stipulates that, before a road may be abandoned, the county commissioners are required to give notice at least two weeks prior to the date of a public hearing.¹³⁸ After abandoning a road, the county renounces claims and easements to land in connection with the road. Thus, the fee owner is released from his or her obligations under the easement.¹³⁹ If the county owns fee title in a road that is abandoned, an abutting fee owner obtains title to the same proportion that they or their predecessor in title owned the land when the county obtained it for road purposes.¹⁴⁰ Put another way, a previous property

¹³⁴ *Sun Oil Co. v. Gerstein*, 206 So. 2d 439, 441 (Fla. Dist. Ct. App. 1968).

¹³⁵ *City of Naples v. Miller*, 243 So. 2d 608, 611 (Fla. Dist. Ct. App. 1971).

¹³⁶ *Sun Oil Co. v. Gerstein*, 206 So. 2d 439, 441 (Fla. Dist. Ct. App. 1968).

¹³⁷ *Ecological Dev. v. Walton Cty.*, 558 So. 2d 1069 (Fla. Dist. Ct. App. 1990).

¹³⁸ Fla. Stat. § 336.10 (2022).

¹³⁹ Fla. Stat. § 336.12 (2022).

¹⁴⁰ *Emerald Equities, Inc. v. Hutton*, 357 So.2d 1071 (Fla. 2nd DCA 1978).

owner may have conveyed a portion of his property to the county in order for a road to be built, becoming an abutting property owner to the new county road. When the county later abandons that road, the abutting property owner obtains title to the same portion of property that was conveyed to create the road in the first place as long as he or his previous title owner had a property interest in the road before the county acquired it.

A Florida municipality has the ability to abandon or vacate a public road by passing an ordinance. Both the state constitution and the 1973 Municipal Home Rule Powers Act grant a municipality governmental, corporate, and propriety powers to conduct municipal government, to perform municipal functions, and to render municipal services.¹⁴¹ Abandoning a road by ordinance requires the municipal government to provide advanced notice of the meeting to adopt the ordinance. At the meeting, the municipal government must allow for public comment. A majority of the members of the governing body must approve of the ordinance, which then becomes effective ten days after passage or as otherwise provided.¹⁴² Florida courts have held that an ordinance to abandon or vacate a public road must be “clear, definite, and certain in its terms” and is invalid if the precise meaning cannot be determined.¹⁴³ After a city street is vacated, title to the area vests in abutting property owners.¹⁴⁴

Once a right-of-way is abandoned by a county, whether the county held the right-of-way in fee or only by easement, the right-of-way reverts in fee simple ownership to the successors of the grantor.¹⁴⁵ The same is true for a city that abandons a road.¹⁴⁶

¹⁴¹ Fla. Const. Art. VIII, § 2.; Fla. Stat. § 166.021 (2022).

¹⁴² Fla. Stat. § 166.041 (2022).

¹⁴³ *City of Naples v. Miller*, 243 So. 2d 608, 610 (Fla. Dist. Ct. App. 1971).

¹⁴⁴ *Hurt v. Lenchuk*, 223 So. 2d 350, 352 (Fla. Dist. Ct. App. 1969).

¹⁴⁵ *Emerald Equities v. Hutton*, 357 So. 2d 1071, 1072 (Fla. 2d Dist. Ct. App. 1978) (discussing abandonment by a county).

¹⁴⁶ Fla. Stat. § 336.09-12 (2022); *Dean v. MOD Properties, Ltd.*, 528 So. 2d 432 (Fla. 5th Dist. Ct. App. 1988).

Florida Test for a Taking

Even when abandoning a road legally according to statutory or common law procedures, a court may find a “taking” of the right of a property owner to maintain connection with the public road system. This rests on statutory and judicial recognition “that ‘property’ is something more than a physical interest in land; it also includes certain legal rights and privileges appurtenant to the land and its enjoyment [, including rights of access].”¹⁴⁷

Complete loss of access is not a prerequisite for a property owner to recover compensation for a taking; courts may find a taking of property rights if the road abandonment “substantially diminished” access.¹⁴⁸ The nature of the access remaining is relevant: in one case, the county vacated a road used by property owners as access to their property. The only remaining access points included an old wooden bridge that could not support heavy vehicular traffic and a platted street that did not connect to a usable road. The court found the loss of access to be compensable, even though the property owners technically had remaining ways to access their land.¹⁴⁹ A court in another case concluded that a winding road through a neighborhood was not sufficient to avoid a takings claim for the direct access that was lost. Service roads that are overly long may not be a suitable substitute for the previously abutting road.¹⁵⁰

At the same time, case law in Florida does place real limits on the finding of a taking of access. For example, government action that merely decreases the flow of traffic on an abutting road does not rise to the level of a taking,¹⁵¹ which means, in the context of the model ordinance, that decreased traffic due to poorer road condition is not necessarily a taking. Similarly, “if injury or inconvenience is the same in kind as that suffered by others similarly situated, but different only in degree, compensation is not recoverable.”¹⁵²

In Florida, there arises the potential that a local government could also be subject to a takings claim *even when trying to maintain* a road subject to environmental attack by increasing flooding or erosion.¹⁵³ This is discussed in the following subsection. Note,

¹⁴⁷ Palm Beach County. v. Tessler, 538 So.2d 846, 850 (Fla. 1989); see, also State Dep't of Transp. v. Stubbs, 285 So. 2d 1, 5 (Fla. 1973) (“Ease and facility of access constitute valuable property rights for which an owner is entitled to be adequately compensated.”).

¹⁴⁸ See, e.g. Weaver Oil Co. v. City of Tallahassee, 647 So. 2d 819, 822 (Fla. 1994) and Palm Beach County. v. Tessler, 538 So.2d 846, 848 (Fla. 1989).

¹⁴⁹ Pinellas County v. Austin, 323 So. 2d at 8 (Fla. Dist. Ct. App. 1975).

¹⁵⁰ Fla. Dep't of Transp. v. Kreider, 658 So.2d 548.

¹⁵¹ Rubano v. Dep't of Transp., 656 So. 2d 1264, 1267 (Fla. 1995).

¹⁵² Rubano v. Dep't of Transp., 656 So. 2d 1264, 1270 (Fla. 1995) (citing both Anhoco Corp. v. Dade County, 144 So.2d 793, 798 (Fla. 1962) and Palm Beach County. v. Tessler, 538 So.2d 846, 849 (Fla. 1989).

¹⁵³ See, e.g. Jordan v. St. Johns County, 63 So. 3d 835 (Fla. Dist. Ct. App. 2011)

however, that not all states view coastal erosion damaging or even eliminating a road as a breach of maintenance duties.¹⁵⁴

Applying the State-Specific Test (including Legal Analysis of How Notice, Due Process, and Legislative Policy Decisions May Affect This Analysis)

Since following legal road abandonment processes may still lead to local government liability for a taking, what can local governments do to minimize this risk?

First, the local government should evaluate the origins of the right-of-way and what happens to the right-of-way if it is abandoned. For example, if the rights of way were dedicated through a plat, examine the plat to see if an express intention to dedicate a fee simple interest to the local government existed. If not, then only an easement on the part of the public was dedicated. In such cases, abutting landowners still own an interest in the road, and abandonment of the road means that abutting owners' ownership interest is now freed from the easement on the part of the public. However, as other purchasers in the platted area also purchased in reliance on the plat, the plat created private rights in those purchasers as well.¹⁵⁵ Thus, abandonment of an easement for a public road means that the fee ownership of abutting property owners is free of a *public* easement for use but remains burdened by the *private* rights of access subject to the beneficial use rule of *Powers v. Scobie*.¹⁵⁶

The "beneficial rule" adopted by *Powers v. Scobie* may serve to obviate takings claims since it allows courts to essentially substitute other access that the dominant property owners may have as long as the such alternative access "reasonably protect[s]" the dominant property owner's interests by providing a benefit equivalent to the lost easement.¹⁵⁷ The "benefit" that must be equivalent is limited to consideration of *access*, not other possible or conjectural benefits.¹⁵⁸ Thus, an argument exists that if, for example, a local government abandons a road serving ten lots in a small subdivision whose lots were sold based on a plat delineating the road being vacated, all ten lot owners retain an easement in the road even though the road may no longer be public. This could possibly obviate the "substantially diminish" and "special injury" analyses to the point that a court might not find a taking.

¹⁵⁴ See, e.g. *Kirkpatrick v. Town of Nags Head*, 713 S.E. 2d 151, 154 (S.C. Ct. of Appeals 2011) (noting that the lower court had granted summary judgement for the defendant town on plaintiff's claim of a taking due to failure to repair the road damaged by erosion).

¹⁵⁵ *Childs v. Weissman*, 432 So.2d 604 (Fla. 3d DCA, appeal dismissed, 441 So.2d 633 (Fla. 1983)). See, also Gregory M. Cook, *Insuring Vacated Platted Rights-of-Way*, 28 THE FUND CONCEPT 91, 97 (1996) (citing 3 Boyer, Florida Real Estate Transactions, Sec. 120.03 [1][c]).

¹⁵⁶ *Powers v. Scobie*, 60 So. 2d 738, 740 (Fla. 1952).

¹⁵⁷ *Enos v. Casey Mountain, Inc.*, 532 So. 2d 703, 706 (Fla. 5th DCA 1988).

¹⁵⁸ *Harbor View #7, Inc. v. Willson*, 120 So. 2d 453, 455 (Fla. 2d DCA 1960).

If an environmentally compromised road segment is located within the boundaries of a homeowners' association (HOA) as defined by Florida Statute section 720.301(9), a county (but not city) that owns the road could potentially transfer the right-of-way to the HOA.¹⁵⁹ However, for this to occur, a number of statutory conditions must be met, including, as a threshold issue, the HOA must request the “abandonment and conveyance in writing for the purpose of converting the subdivision to a gated neighborhood with restricted public access.”¹⁶⁰ It is not clear how likely it is that an HOA would request such abandonment since, if the road is environmentally compromised and already costing far more than an average road in maintenance, would an HOA request to assume such cost?¹⁶¹

If the potential defenses to a takings claim above are not available or are unsuccessful, some additional potential arguments on the part of local governments might be presented. First, local government could argue that it was not any government action that took the property but the action of erosion and natural processes that “took” the road access.¹⁶² Next, the local government could emphasize to the court that it has engaged in “reasonable maintenance”; if such maintenance does not result in what the court considers “reasonable access,” the court should still refrain from interfering based on a separation-of-powers argument: the local government’s balancing of competing interests in management of the transportation network is a quintessential *legislative* action with which the *judiciary* should not interfere.¹⁶³ As an adjunct to the previous argument, a local government could assert that the real legal standard for takings liability should be whether any specific government action created the loss of access.¹⁶⁴

Finally, if a court does find a taking due to abandonment—or insufficient “maintenance”—of an environmentally compromised road segment, the local government might want to evaluate how the long-term costs and benefits of seeking to provide “reasonable access” compare with the costs and benefits of exercising eminent domain to acquire the property

¹⁵⁹ FLA. STAT. § 336.125 (2022).

¹⁶⁰ FLA. STAT. § 336.125(1)(a)1. (2022).

¹⁶¹ In the trial case of *Jordan v. St. Johns County*, the court noted that property owners along a deteriorating coastal road had requested that the county abandon the road. *Jordan v. St. Johns County*, No. 05-694, slip op. at 4 (para. 9) (Fla. Cir. Ct. May 21, 2009), aff’d in part, rev’d in part, *Jordan v. St. Johns County*, 63 So. 3d 835, 837 (Fla. Dist. Ct. App. 2011).

¹⁶² While this argument clearly failed in *Jordan v. St. Johns County*, 63 So. 3d 835 (Fla. Dist. Ct. App. 2011), this does not mean that another Florida district court of appeal might rule differently, as did the trial court in *Jordan v. St. Johns County*, No. 05-694, slip op. at 12 (Fla. Cir. Ct. May 21, 2009). If a local government is not in the jurisdiction of Florida’s Fifth District Court of Appeal, such an argument will lose at the trial court level as the trial court would be bound by the Fifth District Court of Appeal’s *Jordan* holding. However, if such a ruling were appealed and another district court of appeal were to align its ruling with the trial court’s *Jordan* decision rather than the court of appeals’ *Jordan* decision, this would create a conflict among district courts of appeal, setting up a potential appeal to the Florida Supreme Court. Or, if not appealed to the Florida Supreme Court, the ruling would still change the governing law in the district court of appeal that sided with the *Jordan* trial court’s rationale.

¹⁶³ For more on this argument, see, e.g. Thomas Ruppert, *Castles—and Roads—in the Sand: Do All Roads Lead to a “Taking”?*, 48 ENV’T L. REPORTER 10914, 10920 (2018).

¹⁶⁴ For more on this argument, see *id.*, at 10931 (comparing the case of *Jordan v. St. Johns County* to *St. Bernard Parish Gov’t v. United States* and arguing that the latter would indicate that the legal standard appropriate in the former case would have been whether “the landowners los[t] more access due to the actual maintenance activities of the county”? rather than “Did the county perform reasonable maintenance that resulted in meaningful access?”).

affected. When considering eminent domain, the local government should argue that the value of the property should be determined with the limitations on access rather than on “comparable sales” that do not have access difficulties.

Model Ordinance

Introduction

This model ordinance is a modified version of an ordinance originally developed by St. Johns County in direct response to the events outlined in the legal case *Jordan v. St. Johns County*.¹⁶⁵

Matter in square brackets [...] in the following model ordinance represents material that either may or must be tailored to any specific local government considering adopting this ordinance in whole or in part. The numbers appearing in the draft ordinance in brackets were numbers placed by the authors as examples of numbers that could be used by a local government seeking to reach a balance between assisting property owners as much as possible with access to their property while also seeking to protect other taxpayers and roads by not dedicating an unreasonable amount of resources to a small portion of the local government’s road system to the detriment of the transportation system as a whole. Any local government considering adopting all or parts of this model ordinance should evaluate their situation to determine the most appropriate numbers.

Italicized matter in curly brackets {...} are comments of the author to clarify reasoning or provide reference to legal analysis sections supporting the design of the model ordinance.

¹⁶⁵ *Jordan v. St. Johns Cty.*, No. 05-694, (Fla. Cir. Ct. May 21, 2009), *aff’d in part, rev’d in part* by *Jordan v. St. Johns County*, 63 So. 3d 835, 837 (Fla. 2011). While the Fifth District Court of Appeals case remanded the case for determination as to whether the county had met the Fifth DCA’s articulated duty to “provide reasonable maintenance that results in meaningful access,” the parties settled the lawsuit prior to a trial on remand. Thus, while it was not determined whether a taking occurred in the case, the DCA opinion’s holding that a failure to act may serve as a basis for a takings claim in Florida remains a binding decision on all trial courts in Florida.

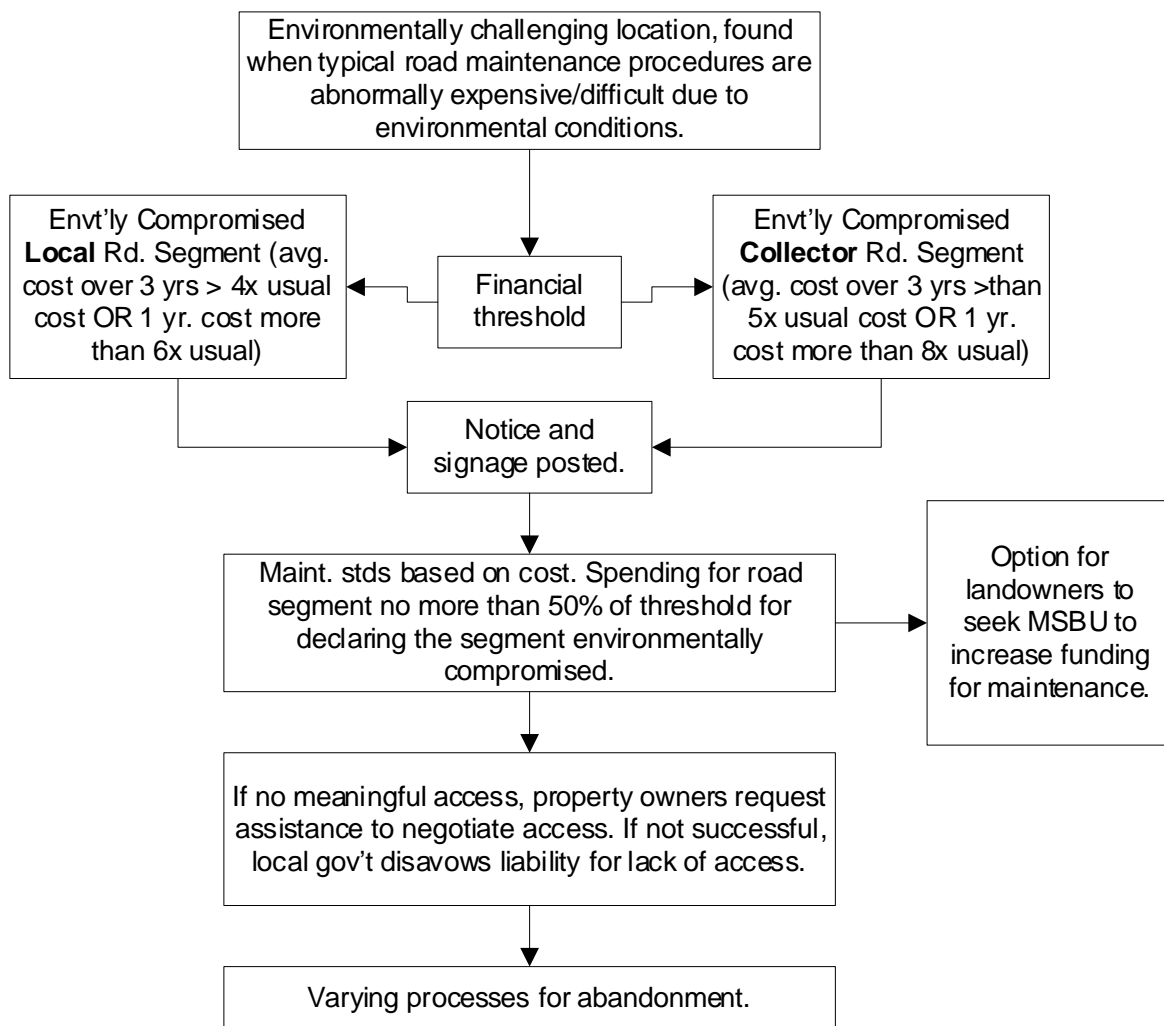


Figure 7 Illustration of how the model ordinance functions

Caveat: This ordinance and any commentary are for educational and policy-discussion purposes. They do not constitute legal advice and do not create an attorney-client relationship. Local governments should not implement this model, in whole or in part, without consulting their attorneys for specific legal advice.

Preamble

The purpose of this Ordinance is to address (a) The environmental degradation and damage to public roads, streets, highways, bridges, sidewalks, curbs and curb ramps, crosswalks, bicycle ways, hiking and walking paths and trails, underpasses, overpasses, and other improved public rights-of-way used for travel or recreation (hereinafter “right(s)-of-way,” “road(s),” or “roadway(s)” (however, in no event shall such reference to “road(s)” or “roadway(s)” be construed to refer to private rights-of-way, private roads, or other improved private rights-of-way used for travel)), (b) The significant and potentially disproportionate costs of construction, maintenance, remediation, repair, and operations incurred by governmental entities for road segments subject to excessive environmental degradation,

(c) The need of local governments to manage tax-payer dollars responsibly in efforts to maintain a comprehensive transportation network and balance this fiscal responsibility with (d) The need for procedures and means that may be taken by the governmental entity to ensure reasonable maintenance that results in meaningful access to private properties connected to the roadways or to abandon the roadways and terminate public maintenance responsibility for the road.

{The “whereas clauses” at the beginning of the ordinance set the context for the ordinance and should be customized to the local government’s situation.}

WHEREAS, [ADDITION OF LOCALLY RELEVANT INFORMATION ON RELATIVE SEA-LEVEL RISE AS NEEDED AND AVAILABLE]; and

WHEREAS, erosion, flooding, and other environmental challenges may pose challenges to effective maintenance of [CITY/COUNTY] roads either now or in the future; and

WHEREAS, rising mean sea level increases the rate at which oceanfront land will be eroded, the elevation to which a given storm surge will rise, and increases flooding risk of roads, potentially far inland, due to impacts on [CITY/COUNTY]’s stormwater system; and

{While this model ordinance could be used outside of the coastal context, the need for considering the types of impacts contemplated by the model ordinance appear most acutely adjacent to our coasts and in low-lying areas near the coast or even far inland when low land gradients mean that a rising sea level decreases drainage potential.}

WHEREAS, pursuant to Florida Statutes (FS) Ch. 334, the Florida Departments of Transportation (DOT) has the power to develop and adopt uniform minimum standards and criteria for the design, construction, maintenance, and operation of public roads, and such adopted standards allow for design exceptions in such circumstances; and

WHEREAS, Section 336.045, FS provides for the uniform minimum standards for design, constructions, and maintenance of streets, roads, highways, bridges, sidewalks, curbs and curb ramps, crosswalks, bicycle ways, underpasses, and overpasses; and

WHEREAS, Section 163.3178(1), FS provides that it is the intent of the Legislature that local governments restrict development activities, including new projects or those addressing existing infrastructure, where such activities would damage or destroy coastal resources and that such plans protect human life and limit public expenditures in areas that are subject to destruction by natural disaster; and

WHEREAS, Section 163.3178(2)(f), FS requires local governments that must have Coastal Elements of their Comprehensive Plans to include development and redevelopment principles, strategies, and engineering solutions that reduce the flood risk in coastal areas which result from high-tide events, storm surges, flash floods, stormwater runoff, and the related impacts of sea-level rise; and

WHEREAS, Section 163.3177(6)(g)6, FS requires local governments to limit public expenditures that subsidize development in coastal high hazard areas; and

{The references to comprehensive plan language that coastal local governments are required to have are not necessarily applicable to all local governments. However, if a local government does, for example, have language limiting expenditures that subsidize development in coastal high hazard areas, spending abnormally large amounts of money to maintain environmentally compromised roads in high hazard areas arguably contravenes such a policy and thus would further support implementation of something similar to the model ordinance to limit such subsidies.}

WHEREAS, through the enactment of the Coastal Barrier Resources Act, 16 U.S.C. ss. 3501-3510, the U.S. government has discouraged development by prohibiting most federal expenditures that would encourage development in designated coastal areas deemed worthy of protection; and

{Reference to the Coastal Barrier Resources System may not be applicable to some local governments.}

WHEREAS, [CITY/COUNTY] has in place a comprehensive plan policy [ADD REFERENCE TO POLICY] to limit expenditures that subsidize development in coastal high hazard areas; and

WHEREAS, the [CITY/COUNTY] is aware of the potential for coastal erosion, flooding, or a rising water table to cause damage to private property and roads and other infrastructure [CITE TO LOCAL VULNERABILITY ASSESSMENT OR LOCAL DOCUMENTATION OF EROSION/FLOODING]; and

WHEREAS, it is anticipated that the disruptive impacts of sea-level rise on [CITY/COUNTY] will increase and that passage of this Ordinance provides adequate time for owners of potentially at-risk properties to adjust their reasonable investment-backed expectations; and

WHEREAS, the [CITY/COUNTY] seeks to place limits on excessively disproportionate costs for certain road segments and avoid or defend against lawsuits that can be reasonably anticipated and avoided as sea-level rise and climate change increasingly impact [CITY/COUNTY]'s transportation infrastructure;

NOW, THEREFORE, BE IT ENACTED BY [CITY/COUNTY], FLORIDA, as follows

Environmentally Compromised Road Segments Ordinance

1. Ordinance Purpose and Authority

In a good-faith effort to reasonably maintain environmentally compromised road segments, to provide meaningful access for property owners, to consider the needs of the

broader transportation network in [COUNTY/CITY], and to balance these with responsible management of public fiscal resources, this ordinance exempts “environmentally compromised” [CITY/COUNTY] road segments from the Levels of Service (LOS) and design standards for roads established by [CITY/COUNTY]. Pursuant to the State of Florida, Department of Transportation, Manual of Uniform Minimum Standards for Design, Construction and Maintenance for Streets and Highways, Chapter 14 (May 2011 edition) (a.k.a. “Florida Greenbook”), allows local ordinances to establish exceptions from Florida Greenbook design criteria. Any road categorized as “environmentally compromised” under this ordinance qualifies for such a design/maintenance exception.

2. Definitions

- a. “Average annual maintenance cost per lane mile per year” means the amount of money spent each year on general road maintenance activities for all roads not located in environmentally challenging locations and not including major rebuilding/redesign/reconstruction projects that exceed, for example, routine maintenance activities such as milling and resurfacing. This must be calculated as the annual costs of general road maintenance activities divided by the number of lane miles maintained, excluding lane miles within environmentally challenging locations and excluding bridge maintenance costs and lane miles.
- b. “Routine maintenance” means common road maintenance activities such as, but not necessarily limited to, restriping, mowing, patching, cleaning, milling, and/or resurfacing.
- c. “Major maintenance” include maintenance activities more substantial than “routine maintenance,” including examples such as redesign, rerouting, regrading, work on the road’s subbase, and significant activities surrounding the road necessary to protect or keep the road usable, such as building berms, adding drainage pumps, or similar protective measures.
- d. “Environmentally challenging locations” means a location where typical road construction, remediation, or repair criteria and standards are technically, legally, and/or financially not feasible or abnormally difficult due to environmental conditions:
 - i. That repeatedly and/or frequently damage or threaten the road to the extent that standard automobiles and light trucks, law enforcement patrol cars or fire and medical emergency vehicles, or vehicles providing service such as trash collection are not able to safely use the road per the documented determination of an appropriate local authority or official; or
 - ii. That require materials or processes to maintain, repair, or rebuild the road that are not standard materials or processes for roads in [CITY/COUNTY] that are not in environmentally challenging locations; or

- iii. That cause needed maintenance, repair, or rebuilding of the road to have an identifiable detrimental impact on a natural resource (such as, but not limited to, a wetland, dune, estuary, sanctuary, hammock, shoreline, habitat management or wildlife conservation area) or adjacent private property; or
 - iv. That result in maintenance, repair, or rebuilding activities necessary to keep the road in service increasing or exacerbating the detrimental impact of the road on a natural resource or adjacent private property; or
 - v. Locations being subject to permitting or mitigation requirements of a state or federal agency for activities that would be considered routine maintenance and repair in other locations in [COUNTY/CITY] and not subject to such permitting requirements.
- e. “Environmentally compromised local road segment” means a segment of local road, as defined in Florida Statute Section 334.03(14), in an environmentally challenging location for which one of the following conditions exists:

- i. The average annual routine and major maintenance cost per lane mile per year over [three (3)] consecutive fiscal years to maintain the paved road segment to the same standard as is common in [CITY/COUNTY] exceeds by a factor of [four (4)] or more the average annual maintenance cost per lane mile per year to conduct routine maintenance on roads [COUNTY/CITY] – wide averaged over the same [3-year] period; or

{Note that 2.e.i-ii and 2.f.i-ii include both “annual routine and major maintenance cost per lane mile.” It might appear that this is overinclusive since then “major maintenance” is being compared to an average for other roads that only includes “routine” maintenance. However, due to the nature of roads being considered for categorization as “environmentally compromised,” such roads are far more likely to be damaged or degraded to the point where “major maintenance” is a far more common occurrence than most roads. Exempting “major maintenance” from the calculation here could render the entire ordinance and efforts to limit expenditures useless.}

- ii. The annual routine and major maintenance cost per lane mile per year in a given fiscal year to maintain the paved road segment to the same standard common in [COUNTY/CITY] exceeds by a factor of [six (6)] or more the average annual maintenance cost per lane mile per year to conduct routine maintenance on roads (excluding already-designated environmentally compromised road segments) [COUNTY/CITY] – wide averaged over the given fiscal year plus the [two (2)] immediately preceding fiscal years.
- f. “Environmentally compromised collector-road segment” means a collector road segment, as defined in Florida Statute Section 334.03(4), in an environmentally challenging location for which one of the following conditions exists:

- i. The average annual routine and major maintenance cost per lane mile per year over [three (3)] consecutive fiscal years to maintain the paved road segment to the same standard as is common among similar roads in [CITY/COUNTY] (excluding road segments in areas already-designated as environmentally challenging locations) exceeds by a factor of [five (5)] or more the average annual maintenance cost per lane mile per year to conduct routine maintenance on roads (excluding already-designated environmentally compromised roads segments) [COUNTY/CITY] – wide averaged over the same [3-year] period; or
 - ii. The annual routine and major maintenance cost per lane mile per year in a given fiscal year to maintain the paved road segment to the same standard common in [COUNTY/CITY] exceeds by a factor of [eight (8)] or more the average annual maintenance cost per lane mile per year to conduct routine maintenance on roads (excluding already-designated environmentally compromised road segments) [COUNTY/CITY] – wide averaged over the given fiscal year plus the [two (2)] immediately preceding fiscal years.
- g. In this ordinance, “environmentally compromised road segment” includes both “environmentally compromised local road segments” and “environmentally compromised collector road segments.”

3. Process for Designating Environmentally Challenging Locations and Environmentally Compromised Road Segments

- a. The governing board of the [COUNTY/CITY] will designate environmentally challenging locations and environmentally compromised local- or collector-road segments by ordinance. The ordinance must include at least the following information:
 - i. The basis upon which the designation is based, and
 - ii. The approximate beginning and end point of the environmentally challenging location or environmentally compromised road segment, and
 - iii. The parcel number, street address number, and owner’s name, as listed by the Property Appraiser’s or Tax Collector’s Office, of all parcels fronting the designated location, and
 - iv. The parcel number, street address number, and owner’s name, as listed by the Property Appraiser’s or Tax Collector’s Office, of all parcels whose property owners **must** pass over that road segment to access their property, and
 - v. A map showing the designated environmentally challenging location or environmentally compromised road segment, and the boundaries, parcel numbers, and street address numbers of parcels identified in 3.a.iii. and 3.a.iv.

immediately preceding.

{While the requirements of 3.a.iii-v and 3.b. could be quite expensive and onerous for local governments, they are included here as protections for the due process rights of affected landowners. Violations of due process through lack of notice could provide an avenue of attack by affected property owners.

Another option to reduce the burden associated with this notice is to modify the ordinance to only provided mailed notice as part of declaring a road segment environmentally comprised but not for declaring an area environmentally challenged. Alternatively, a local government could opt for only providing notice via public signage on the road segment/area contemplated for designation along with publication in the local government's standard manner for public notices.}

- b. [CITY/COUNTY] will mail a notice of the first reading, U.S. Mail Return Receipt Requested or equivalent, at least 30 days prior to the first reading of any draft ordinance of designation of an environmentally challenging location or environmentally compromised road segment, notice in conformance with the requirements of Section 125.66, FS (County) and Section 166.041, FS (Municipality), to those property owners listed in the draft ordinance, at the address of record maintained by the Property Appraiser's Office or Tax Collector's Office. The notice will include either a draft copy of the ordinance or a place and dates and times when individuals can obtain a copy of the draft ordinance.
- c. The [COUNTY/CITY] will post, where it normally posts official notices of meetings, at least 30 days prior to the first reading of the ordinance, the notice mailed to property owners as well as a list of the parcels and owners listed in the draft ordinance.

4. Signage of and Speed Limits for Environmentally Compromised Road Segments

[COUNTY/CITY] must, within one month of designation, provide clear and appropriate signage at the beginning and end of the environmentally compromised road segment as well as at any access points from intersecting public roads and, if applicable, at intervals of no greater than one-half mile. Such notice must, in compliance with the Florida Greenbook, Chapter 18, comply with "Conventional Road" size and design requirements in the Federal Highway Administration's (FHWA) Manual on Uniform Traffic Control Devices. Such signage should state: "WARNING: [DAMAGED, ERODED, or other warnings as appropriate to the specific situation such as STANDING WATER, NARROWED ROAD, BROKEN ASPHALT, DETERIORATED SHOULDER, WASHOUTS, or other wording as appropriate] road surface ahead. Road may not be suitable for all types of traffic."

{For legal analysis supporting the need for signage and references to relevant Florida case law, see supra Duty to Warn and Signage.}

[COUNTY/CITY] will evaluate the conditions of each environmentally compromised road segment and set appropriate speed limits based on the current or expected future condition of each segment. These speed limits should be at least 10 miles per hour lower than the usual speed limit were the road not environmentally compromised, but may be even less as conditions warrant.

5. Maintenance Standard for Environmentally Compromised Road Segments

- a. [COUNTY/CITY] must not expend more per lane mile per year on an environmentally compromised road segments than any of the formulas in Sections 2.c and 2.d of this ordinance that are sufficient to declare the road segment environmentally compromised. The maintenance standard for designated environmentally compromised road segments is the standard to which the road segment can, in the discretion of [COUNTY/CITY], be maintained with expenditures that do not exceed the limits established here. [COUNTY/CITY] must not, except as noted in Section 9 of this ordinance, exceed this limitation for maintenance for any environmentally compromised road segment from general road maintenance funds. This limitation does not apply to additional funding sources not available for [COUNTY/CITY] – wide road maintenance, such as, but not limited to, grants targeted to environmentally compromised road segments or funds from a special-benefit unit such as the one described below in 7.a.-d.

- b. In a good-faith effort to reasonably maintain environmentally compromised road segments, to provide meaningful access for property owners, to consider the needs of the broader transportation network in [COUNTY/CITY], and to balance these with responsible management of public fiscal resources, [COUNTY/CITY] will spend up to and no more than the amounts listed in 5.a. above on maintenance activities for environmentally compromised road segments. Notwithstanding this commitment by [COUNTY/CITY], [COUNTY/CITY] may, at its discretion, limit annual overall spending on environmentally compromised road segments as follows:
 - i. When the average annual maintenance cost per lane mile per year to maintain all environmentally compromised road segments over the [three (3)] most recently completed fiscal years equals or exceeds [one hundred (100%)] of the cost to maintain all other road segments in the [COUNTY/CITY] during the same period, at the discretion of the [COUNTY/CITY] legislative body, the [COUNTY/CITY] reserves the option to spend no more than [half (50%)] its road maintenance funds in each of the current and following fiscal years on environmentally compromised road segments, apportioned among the segments at the discretion of the [COUNTY/CITY] legislative body; or

 - ii. When the average annual maintenance cost per lane mile per year to maintain environmentally compromised road segments exceeds by a factor of [ten (10)] or more the average annual maintenance cost per lane mile per year to maintain roads [COUNTY/CITY]-wide averaged over the [three (3)] most recently completed fiscal year, in which case, at the discretion of

[COUNTY/CITY] governing board, the [COUNTY/CITY] reserves the option to spend no more funds on environmentally compromised road segments during that fiscal year and no more than [half (50%)] its road maintenance funds in the next fiscal year on environmentally compromised road segments, apportioned among the segments at the discretion of the [COUNTY/CITY] legislative body.

- c. Based on the limitations in 5.a. and 5.b. above, the [COUNTY/CITY] retains full discretion to determine the most appropriate methods, techniques, activities, construction, and other road matters in spending the amount of road funds available for environmentally compromised road segments.

{Limiting maintenance activities based on funding rather than meeting an engineering standard based on defined "level of service" seeks to provide local government a persuasive legal argument, as noted in the legal analysis supra that the government is exercising its legislative and discretionary authority to make challenging policy choices with which courts should hesitate to interfere due to the separation of powers doctrine.}

6. Lack of Meaningful Access of Property

- a. One or more owners of properties who lack meaningful access to their property due to severe degradation or loss of an environmentally compromised road segment may, in writing, request assistance from the [COUNTY/CITY] Clerk:
 - i. To open negotiations with all property owners affected, as defined in 3.a.iii. and 3.a.iv. above, by the environmentally compromised road segment, to facilitate affected owners creating among themselves mutual easements for access to properties lacking meaningful access; or
 - ii. To establish a statutory way of necessity as provided for in Florida Statutes subsection 704.10(2). [COUNTY/CITY] will assist such property owners as feasible and deemed reasonable by [COUNTY/CITY].
 - iii. For assistance by [COUNTY/CITY], in [COUNTY/CITY]'s discretion as [COUNTY/CITY] deems reasonable, to assist such property owners in securing meaningful access.
- b. If the [COUNTY/CITY]'s involvement and assistance as noted in 6.a.i. and 6.a.ii. does not result in meaningful access for all affected property owners, [COUNTY/CITY] will not be held liable for the inability of property owners to secure access since [COUNTY/CITY] is neither directly nor indirectly responsible through its actions for the natural causes that created the environmentally compromised road segment and [COUNTY/CITY] had informed property owners in a timely manner via this ordinance of the potential for such loss.

- c. Properties without pre-existing development or with pre-existing development that has not been subject to documented consistent and active use for the preceding three years will have no claim on [COUNTY/CITY] for any assistance or damages since any such claim would involve speculative losses and since [COUNTY/CITY] was neither directly nor indirectly responsible through its actions for the natural causes that created the environmentally compromised road segment and [COUNTY/CITY] had informed property owners in a timely manner via this ordinance of the potential for such loss.

{Obviously a local government ordinance cannot, by ordinance, prevent a claim for a taking of private property or prevent a court from finding such a taking. However, this ordinance is drafted to minimize the likelihood of a successful takings claim, and subsections 6.b. and 6.c. provide support for local government arguments about separation of powers and exercise of legislative discretion in defending against such claims. For more on this, see the legal analysis supra.

7. Additional Funding for Environmentally Compromised Road Segments: Creation of MSBU

- a. [COUNTY/CITY] may, at its discretion, raise additional funding through establishment of a Municipal Services Benefit Unit (MSBU) or other lawful assessment powers, for maintenance of environmentally compromised road segments. The process for this is established in Ordinance ____.
- b. In case of establishment of additional funding for an environmentally compromised road segment, the [COUNTY/CITY] will continue to contribute at least 75% of, but not exceed, the amount specified in Section 5 above towards maintenance of the road segment.
- c. Establishment of additional funding does not abrogate the [COUNTY/CITY]'s authority to abandon environmentally compromised road segments as established in Section 3 of this ordinance. However, an environmentally compromised road segment with a mechanism for additional funding may not be abandoned during any period in which the additional funding serves as the repayment method for outstanding bonds issued on the basis of the additional funding mechanism. If an environmentally compromised road segment with an active additional funding mechanism is abandoned by [COUNTY/CITY], any funds remaining with the additional funding mechanism, after repayment of any bond obligations, must be refunded to the property owners in proportion to the amount contributed by owners on behalf of each property involved.

8. Termination of Environmentally Compromised Road Segment Designation

All or a portion of an environmentally compromised road segment that has not been abandoned by [COUNTY/CITY] that is contiguous to that portion of [COUNTY/CITY]'s road network that is not environmentally compromised will no longer be so designated at such time as for [three (3)] consecutive fiscal years the average annual maintenance cost per

lane mile per year to maintain it to the same as is common among other roads in the [COUNTY/CITY] over the same period.

9. Limitations on Application of this Ordinance's Limitations

The limitations on road maintenance spending for road segments declared environmentally compromised road segments may be overridden by a majority vote of the [COUNTY/CITY BOARD/COMMISSION] should the [COUNTY/CITY BOARD/COMMISSION], based on data and analysis, conclude that the affected road segment is critical to the integrity of the larger transportation system and is necessary for the broader public health and safety of COUNTY/CITY].

{This section allows for overriding the purposes of this ordinance. As such, this section puts the burden on the local government board or commission to demonstrate the compelling need to override the terms of the ordinance. Shifting the burden of evidence to the local governing body for any override is designed to make more difficult attempts at local decisions driven more by the political influence of interested property owners rather than data and analysis and the model ordinance's overarching policy.}

10. Abandonment of Environmentally Compromised Road Segments

- a. After a road segment has been continuously designated an environmentally compromised road for [six (6)] years, [COUNTY/CITY] may choose, at any time, to abandon any environmentally compromised road segment, and any portion of right-of-way which the compromised segment separates from the rest of the [COUNTY/CITY]'s road network.
 - i. Prior to abandonment by [COUNTY/CITY], [COUNTY/CITY] will assist affected property owners as specified in 6.a.i., 6.a.ii., and 6.a.iii., above.
 - ii. If [COUNTY/CITY] approves abandonment, the [COUNTY/CITY] owes no compensation to the property owners who had notice of the potential loss via enactment of this ordinance and if: 1) easements for access are available or 2) [COUNTY/CITY] is neither directly nor indirectly responsible through their actions for the natural causes that created conditions resulting in classification of the road segment as environmentally compromised. If court of competent jurisdiction should find a taking for lack of access, [COUNTY/CITY] will present evidence that compensation should be determined based on a property value assuming the level of access available during the last year prior to road abandonment.
- b. Abandonment to an authorized entity:
 - i. [FOR COUNTIES:] [COUNTY] may abandon environmentally compromised road segments per the statutory processes in Florida Statutes, Chapter 336.

- i. [FOR CITIES:] [CITY] may abandon environmentally compromised road segments by ordinance to an “authorized entity” as described in Florida Statute Section 336.125(1) (2022). Abandonment by ordinance requires advance notice through publication of the date, time, and place the ordinance will be discussed and availability to the public of copies of the proposed ordinance prior to the meeting where the governing body considers the proposed ordinance. At the meeting to consider the ordinance, public comment must be allowed. If a majority of the governing body approves the ordinance, it will become effective ten [10] days after passage or as provided in the ordinance.
 - ii. If [COUNTY/CITY] approves abandonment, the [COUNTY/CITY] owes no compensation to the property owners as [COUNTY/CITY] had informed property owners by this ordinance of the potential loss and if: 1) easements for access are available or 2) [COUNTY/CITY] is neither directly nor indirectly responsible through their actions for the natural causes that created conditions resulting in classification of the road segment as environmentally compromised.
- c. Abandonment without a properly authorized entity:
- i. [FOR COUNTIES:] [COUNTY] may abandon environmentally compromised road segments per the statutory processes in Florida Statutes, Chapter 336
 - ii. [FOR CITIES:] [CITY] may abandon environmentally compromised road segments by ordinance. Abandonment and delivery to an authorized entity requires that the entity fulfill the requirements in Florida Statute Section 336.125(1) (2022). Abandonment by ordinance requires advance notice through publication of the date, time, and place the ordinance will be discussed and availability to the public of copies of the proposed ordinance prior to the meeting where the governing body considers the proposed ordinance. At the meeting to consider the ordinance, public comment must be allowed. If a majority of the governing body approves the ordinance, it will become effective ten [10] days after passage or as provided in the ordinance.
 - iii. Prior to abandonment by [COUNTY/CITY], [COUNTY/CITY] will assist affected property owners as specified in sections 6.a.i., 6.a.ii., and 6.a.iii. above.
 - iv. If such abandonment is approved by the electors and executed by the [COUNTY/CITY], no compensation will be due the property owners when, by law, mutual access easements are available due to the abandonment.

{In the case of abandonment of a road that was dedicated as part of a platted development, title will typically revert back to the parcel holders with mutual easements for access.}

11. Limitations on Dedication of Private Roads to the Public

- a. [COUNTY/CITY] will not accept any dedications of existing private roads without compelling evidence from the owner of the private road that:
 - i. The road, as it exists, meets or exceeds all [COUNTY/CITY] engineering standards for equivalent new road construction by [COUNTY/CITY]; and
 - ii. That, considering changing rainfall patterns and rising sea levels, the location of any dedicated roads is not, and will not become within the next 50 years, an environmentally challenging location nor will the road become an environmentally compromised road segment.
- b. [COUNTY/CITY] will not approve plats with dedications per Florida Statute section 177.081 until [COUNTY/CITY] has determined whether the proposed areas of dedication pursuant to the plat include a risk that roads proposed for dedication might currently be or come to be located in environmentally challenging locations or might become environmentally compromised road segments due to on-going climate change impacts to rainfall events, storm surge, sea-level rise, erosion, or other environmental impacts within the next 50 years. To make this determination, [COUNTY/CITY] may request data, engineering studies, and/or other information.
- c. Sea-level rise projections for making the determinations for dedications in this subsection shall be [SUGGEST USING LOCAL PROJECTIONS IF ANY HAVE BEEN OFFICIALLY ADOPTED BY THE LOCAL GOVERNMENT. IF NONE HAVE BEEN ADOPTED, USE EITHER THOSE OF THE RELEVANT REGIONAL PLANNING COUNCIL, IF AVAILABLE, OR, AS A LAST RESORT, THE LATEST VERSION OF THE UNITED STATES ARMY CORPS OF ENGINEERS' "SEA-LEVEL CHANGE CURVE CALCULATOR" ([Sea-Level Change Curve Calculator \(army.mil\)](#)) AND THE "SCENARIOS SOURCE" "NOAA et al. 2017."]

Conclusion

Florida has already seen sea levels rise, and this rise will continue to increase in rate for the foreseeable future. In fact, sea levels will continue to rise for centuries.¹⁶⁶ We have effectively "baked in" dozens of feet of sea-level rise into our climate system.¹⁶⁷ This model ordinance

¹⁶⁶ See, e.g. Jane A. Leggett, Congressional Research Service Report R43229, *Climate Change Science: Key Points* (2013), at <https://crsreports.congress.gov/product/pdf/R/R43229/5>. <https://news.harvard.edu/gazette/story/2021/04/study-says-antarctic-ice-sheet-melt-to-lift-sea-level-higher-than-thought/> (noting new research in 2021 indicating that "Sea-level rise doesn't stop when the ice stops melting." And, "The damage we are doing to our coastlines will continue for centuries.").

¹⁶⁷ See, e.g. Jason E. Box, Alun Hubbard, David B. Bahr, William T. Colgan, Xavier Fettweis, Kenneth D. Mankoff, Adrien Wehrlé, Brice Noël, Michiel R. van den Broeke, Bert Wouters, Anders A. Bjørk, & Robert S. Fausto, *Greenland ice sheet climate disequilibrium and committed sea-level rise*, 12 NAT. CLIM. CHANGE 808 (2022); and Sweet, W.V., B.D. Hamlington, R.E. Kopp, C.P. Weaver, P.L. Barnard, D. Bekaert, W. Brooks, M. Craghan, G. Dusek, T. Frederikse, G. Garner, A.S. Genz, J.P. Krasting, E. Larour, D. Marcy, J.J. Marra, J. Obeysekera, M. Osler, M. Pendleton, D. Roman, L. Schmied, W. Veatch, K.D. White, and C. Zuzak,

represents a small step in recognizing that the enormity of the problems we face with sea-level rise and climate change will, in at least some times and places, defy efforts to overcome them only with bigger, stronger, more resilient infrastructure. Rather, we will need to innovate policy that allows local governments greater flexibility in how they address infrastructure as part of adapting to our changing world.

2022: Global and Regional Sea Level Rise Scenarios for the United States: Up-dated Mean Projections and Extreme Water Level Probabilities Along U.S. Coastlines. NOAA Technical Report NOS 01, at 1 ("Sea levels will continue to rise due to the ocean's sustained response to the warming that has already occurred—even if climate change mitigation succeeds in limiting surface air temperatures in the coming decades (Fox-Kemper et al., 2021)."). National Oceanic and Atmospheric Administration, National Ocean Service