

# SEEKING PEACEFUL COEXISTENCE: STREETCARS AND BICYCLES IN THE NEW URBAN ENVIRONMENT

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## I. INTRODUCTION

On May 29, 2007, while riding her bicycle along West Lake Avenue North in Seattle, Washington, Patricia Lenssen sustained a broken jaw and two broken front teeth when her bike toppled to the pavement.<sup>1</sup> She identified the cause as the flange gap<sup>2</sup> of a streetcar track into which the front wheel of her bicycle had slipped, causing her to lose control of her bike and fall to the ground.<sup>3</sup> Between May 2007 and June 2009, five other cyclists sustained similar assorted injuries, each claiming streetcar tracks as the cause.<sup>4</sup> As a result, on May 28, 2010, the six injured cyclists together filed a complaint in Washington Superior Court for King County.<sup>5</sup> The complaint against the City of Seattle (“the City”) sought damages, costs, interest, and attorneys’ fees.<sup>6</sup>

In their complaint, the plaintiffs claimed that the City breached its duty of care in the design, construction, and operation of the South Lake Union streetcar line.<sup>7</sup> Specifically, the

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1. Complaint at 10, *Lenssen v. City of Seattle*, No. 10-2-18980-7 SEA (Wash. Super. Ct. Apr. 6, 2012); Scott Gutierrez, *Lawsuit: Streetcar Tracks Unsafe for Cyclists*, SEATTLE PI (May 31, 2010, 10:00 PM), <http://www.seattlepi.com/default/article/lawsuit-streetcar-tracks-unsafe-for-cyclists-888271.php#ixzz1L8tvbHO2>.

2. A flange gap is “the open gap that runs parallel to and between an embedded rail and that engages the streetcar wheels.” Defendant City of Seattle’s Motion for Partial Summary Judgment at 2, *Lenssen*, No. 10-2-18980-7.

3. Complaint, *supra* note 1.

4. The five other named plaintiffs included Joseph Pomerleau, Emma Levitt, Jason Dean, Laura Humiston, and Amanda Currier. *Id.* at 11–15.

5. *Id.* at 1.

6. *Id.* at 16.

7. *Id.* at 2. The South Lake Union streetcar is a 2.6-mile line connecting South Lake Union to downtown Seattle. PARSONS BRINKERHOFF, STREETCAR POLICY DEVELOPMENT CASE STUDY REPORT 21–22 (2015). It opened for service in 2007, taking only fifteen

complaint stated that the City: (1) “breached its duty to keep its streets in a reasonably safe condition for bicycle traffic by installing streetcar tracks in a manner that was unsafe for bicyclists”; (2) “breached its duty to keep its streets in a reasonably safe condition for ordinary travel by installing streetcar tracks with flange gaps wide enough to catch bicycle tires . . . and by failing to provide adequate warnings of the dangerous tracks”; and (3) “fail[ed] to exercise ordinary care to build and maintain its roadways in a reasonably safe manner for foreseeable acts of those using the roadways.”<sup>8</sup> The complaint further alleged that the City was aware that the tracks created “a crash danger for bicyclists,” not only because flange gaps could trap bicycle wheels but also because of the “right-running configuration of the streetcar tracks”<sup>9</sup> in an area of the street where bicycle riders were used to riding and where bicycle lanes would normally be placed.<sup>10</sup>

In response, the City filed two motions. The initial motion filed on July 21, 2011, was for partial summary judgment, claiming immunity from allegations of negligence in establishing a streetcar system along roadways known to be used by cyclists, and in orienting streetcar tracks in the right-hand travel lane of the roadway.<sup>11</sup> The motion argued that such planning decisions are legislative and executive by nature and are immune from tort liability.<sup>12</sup> The court granted the motion for partial summary judgment on September 2, 2011, finding that the City was entitled

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months to construct. *Id.* In 2013, it reportedly carried 755,340 passengers. *Id.* The line is operated by King County Metro for the City of Seattle, and despite the line operating at a deficit, Seattle is now planning another streetcar line along Fort Hill. *Id.*

8. Complaint, *supra* note 1, at 2.

9. *Id.*

10. *Id.* at 6. Seattle created the hazard for the plaintiffs by placing the tracks on the right side of the roadways along the streetcar route where, by state law, bicyclists under normal circumstances would be used to and are required to travel. WASH. REV. CODE § 46.61.770(1) (2006) (“Every person operating a bicycle upon a roadway at a rate of speed less than the normal flow of traffic at the particular time and place shall ride as near to the right side of the right through lane as is safe . . .”).

11. Defendant City of Seattle’s Motion for Partial Summary Judgment, *supra* note 2. In its motion, the City did not dispute that streetcar tracks in the roadway can present hazards for cyclists who fail to negotiate the tracks at an appropriate angle, but that the right-hand running of streetcars was selected because of considerations related to traffic management, station location, and the need to avoid disrupting extensive existing utility infrastructure. *Id.* at 5.

12. *Id.* at 11–16.

to judgment as a matter of law.<sup>13</sup> In granting the motion, the court offered no written opinion.<sup>14</sup>

In the second motion filed on March 1, 2012, the City sought summary judgment in full, arguing that it owed no heightened duty to cyclists along roadways that are not designed as bicycle facilities, specifically in this case the West Lake Avenue North streetcar route.<sup>15</sup> Plaintiffs' opposition memorandum to this second motion argued, *inter alia*, that because bicycles are "ordinary travel," the City had a duty to keep the streetcar route in reasonably safe condition for bicycles irrespective of the street's designation.<sup>16</sup> Regarding measures the City could have taken to exercise due care along the route, plaintiffs' memo offered:

Had [the City] prohibited bicycles as planned, it would have had a defense when bicyclists crashed. Since it did not ban bikes, plaintiffs need only show that the [streetcar] route was not reasonably safe for bicycle travel. This can be shown not only by the City's failure to prohibit bikes, but by its failure to adequately warn bicyclists of the known danger and even its overall failure to use ordinary care in planning. . . .<sup>17</sup>

The City's response was that, in a multimodal transportation environment, it is not practicable to design every street on which a cyclist chooses to travel in such a way as to

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13. Order Granting Defendant City of Seattle's Motion for Partial Summary Judgment at 2, *Lenssen v. City of Seattle*, No. 10-2-18980-7 SEA (Wash. Super. Ct. Apr. 6, 2012).

14. *Id.*

15. Defendant City of Seattle's Motion for Summary Judgment in Full at 13, *Lenssen*, No. 10-2-18980-7 SEA. To make its point, the City cited Eugene McQuillin: "The municipality is generally not required to take extraordinary precautions to maintain public ways free from [defects] for use by bicycles[.]" *Id.* (quoting 19 EUGENE MCQUILLIN, *THE LAW OF MUNICIPAL CORPORATIONS* 338-39 (3d ed. 2014)).

16. Plaintiffs' Opposition to Defendant City of Seattle's Motion for Summary Judgment in Full at 14-15, *Lenssen*, No. 10-2-18980-7 SEA.

17. *Id.* at 23. Prior to plaintiffs' opposition brief, Seattle stated that it had balanced the interests of all roadway users including cyclists in planning the streetcar route, that it had recognized that the roadway along the route would not be appropriate for cyclists and so did not designate the route as a bicycle route, that it had posted warning signs for bicyclists around the perimeter of the route, and that it had installed new bicycle facilities on alternate routes. Defendant City of Seattle's Motion for Partial Summary Judgment, *supra* note 2, at 5-6.

prioritize bicycles over other competing needs.<sup>18</sup> On April 6, 2012, in a decision again lacking a written opinion, the court granted the City's motion for summary judgment in full.<sup>19</sup>

The issues raised in *Lenssen v. City of Seattle* are not new. In fact, conflicts between bicycles and rails have occurred since the 1800s<sup>20</sup> and have the potential to grow going forward as cities seek to increase reliance both on street rail transit and bicycles as sustainable transportation alternatives to the automobile. Considering this conflict and the potential barriers to suit for cyclists involved in accidents caused by rails posed by governmental immunity, as argued by Lenssen, this Article contends that the political arena, rather than the courts, is better suited to protecting the cycling community from streetcar track injuries. In approaching the topic, the Article first reviews transportation developments, both historical and recent, relating to streetcars and bicycles in the United States. It then discusses current law in seeking to answer two questions: (1) under what circumstances can transit authorities be immune from claims by cyclists injured on streetcar tracks, and (2) under what circumstances can they be liable? Finally, this Article surveys recent developments in street design that can contribute to a compatible regime for streetcars and bicycles in an urban environment, both of which have a role to play in sustainable cities.

## II. THE STREETCAR RENAISSANCE

Streetcars are not new. Ever since, and even before, February 8, 1888, when Frank Sprague is credited with having successfully established the first large-scale electric streetcar system

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18. Defendant City of Seattle's Reply in Support of Partial Summary Judgment at 5, *Lenssen v. City of Seattle*, No. 10-2-18980-7 SEA (Wash. Super. Ct. Apr. 6, 2012).

19. In a December 2015 e-mail exchange with one of the plaintiffs' lawyers, the lawyer indicated that there would be no appeal of the decision. E-mail from Bob Anderton, Anderton Law Office, to author (Dec. 29, 2015, 06:57 EST) (on file with author). Mr. Anderton was previously quoted in the *Seattle Times* as saying that the suit, while resulting in no compensation for the plaintiffs, was nevertheless successful in that it prompted the City to make some design changes in another streetcar project on First Hill that has generally resulted in safer streets for bicyclists. Lynn Thompson, *Judge Tosses Out Bicyclists' Lawsuit Over SLU Streetcar Tracks*, SEATTLE TIMES (Apr. 11, 2012, 10:26 PM), <http://www.seattletimes.com/seattle-news/judge-tosses-out-bicyclists-lawsuit-over-slu-streetcar-t-racks>.

20. See *infra* text accompanying notes 132–46, 163–86.

in the United States,<sup>21</sup> streetcars have plied the streets of American cities and the byways of the American countryside.<sup>22</sup> The early years after Sprague's success saw significant growth for street railway companies, most all of which were privately owned.<sup>23</sup> In the fifteen year period from 1902 to 1917, annual streetcar ridership across the country rose from 5.84 billion passenger trips to an astonishing 14.5 billion passenger trips.<sup>24</sup> During the same period, annual streetcar company revenues rose from \$247.5 million to \$709.8 million.<sup>25</sup> The impact of these performance figures and the importance of sustaining the industry were so significant to the fabric of American life that in 1919, President Woodrow Wilson, at the behest of the Secretaries of Commerce and Labor, appointed the Federal Electric Railways Commission ("FERC") to assess the financial stability of the country's streetcar systems.<sup>26</sup> In its final

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21. DOUG MOST, *THE RACE UNDERGROUND: BOSTON, NEW YORK, AND THE INCREDIBLE RIVALRY THAT BUILT AMERICA'S FIRST SUBWAY 100* (2014). Sprague, a former naval officer and associate of Thomas Edison, entered into a contract with the City of Richmond, Virginia, in 1887 to electrify twelve miles of streetcar track with sufficient power to run thirty cars simultaneously. *Id.* at 92–93. The cars had to be able to climb hills with grades of eight percent. *Id.* The largest electric system up to that time was in Montgomery, Alabama, with only eighteen cars on a flat grade. *Id.* To receive his contractual remuneration of \$110,000, he also had to demonstrate that his system would operate for sixty days. *Id.* Overcoming problems with faulty rails, burned-out motors, and skeptical city officials, he was close to personal bankruptcy when he ultimately succeeded in his quest, but not before agreeing with the city to reduce his payment to \$90,000, half of which he took in company bonds. *Id.* at 95.

22. *See generally* STEPHEN P. CARLSON & THOMAS W. HARDING, *FROM BOSTON TO THE BERKSHIRES: A PICTORIAL REVIEW OF ELECTRIC TRANSPORTATION IN MASSACHUSETTS* (1990). The authors describe the extensive streetcar system established by the Bay State Railway Company that provided service running from Newport, Rhode Island, on the southern end to Nashua, New Hampshire, on the north. *Id.* at 43. The route would wind through many Rhode Island and Massachusetts towns to reach New Hampshire, requiring several changes along the way and likely much time to get from one end to the other. *Id.*

23. By 1917, total streetcar track mileage across the United States was 44,835 miles. 3 FED. ELEC. RYS. COMM'N, *PROCEEDINGS OF THE FEDERAL ELECTRIC RAILWAYS COMMISSION TOGETHER WITH FINAL REPORT OF THE COMMISSION TO THE PRESIDENT 2265* (1920).

24. *Id.* at 2222.

25. *Id.* at 2229.

26. Despite the expansion of the street railway industry, or perhaps because of it, the owners faced significant financial challenges by 1919. *Id.* at 2266. While revenues remained well above operating expenses and tax liabilities between 1902 and 1917, additional costs incurred for construction and equipment purchases during the same period increased from \$2.17 to \$5.14 billion. *Id.* at 2229. In their letter to President Wilson, Commerce Secretary William Redfield and Labor Secretary W.B. Wilson painted a grim picture. They indicated that at least fifty urban streetcar systems were in the hands of the receivers, and the industry as a whole was virtually bankrupt with the collateral negative impact on supplier industries. 1 FED. ELEC. RYS. COMM'N, *PROCEEDINGS OF THE*

report the following year, FERC noted: “[T]he electric railway industry at present is a factor of essential importance in the urban life and, to a scarcely less extent, in interurban relations of the country.”<sup>27</sup> Unfortunately, however, coupled with this recognition, FERC also noted issues that portended the gradual demise of such an important and increasingly costly street rail network.<sup>28</sup> Among these issues were financial mismanagement by owners, high costs of labor and equipment, and the inadequate level of fares prescribed by municipalities through legislation or franchise agreements.<sup>29</sup> Further, the report recognized that the “great increase in the use of private automobiles, the jitney, and motor busses has introduced a serious, although not a fatal, competition to the electric railway.”<sup>30</sup>

The reference to the competitive disadvantage posed by the automobile to the streetcar was prescient. While streetcar systems began a gradual and then accelerated decline from 1917

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FEDERAL ELECTRIC RAILWAYS COMMISSION TOGETHER WITH FINAL REPORT OF THE COMMISSION TO THE PRESIDENT iii, iv (1920). The Secretaries viewed the role of the Commission as both investigative and determinative. *Id.* The Commission conducted the requested investigation between June 4, 1919, and July 27, 1920. *Id.* at iv. It included members representing the Departments of Labor and Commerce, the War Finance Corporation, public utility commissions, investment bankers, labor unions, and city mayors. *Id.* It called as witnesses former President Howard Taft, owners of a number of street railway companies, municipal leaders, and members of the financial industry. *Id.*

27. FED. ELEC. RYS. COMM'N, *supra* note 23, at 2264.

28. *Id.* at 2263–64.

29. *Id.* at 2263. Confronted by these difficult financial issues, FERC recommended, on one hand, an expansion of the then-current streetcar system and the keeping of costs to passengers as low as possible, while on the other hand restoring credit to streetcar companies, reducing special assessments charged companies by municipalities, implementing binding arbitration to settle labor disputes, and reducing the excessive capitalization of company property to a level consistent with its fair value. *Id.* at 2263–64. One recommendation FERC was not ready to make was public ownership of the street railways, noting:

The Commission is unanimous on this point: That there has not been sufficient experience with public ownership and operation of street railways in this country to enable us to recommend it as a permanent solution of this problem. In some of the foreign countries it has apparently worked well. We do not believe under present conditions that this method of operation would be successful in most of the cities of the United States [today].

*Id.* at 2288.

30. *Id.* at 2263.

to 1960,<sup>31</sup> during the same period, the automobile was on the rise.<sup>32</sup> Over time, that rise was helped along by both private industry and the federal government.

As to private industry, much has been written about the alleged conspiracy among General Motors, Firestone Tire and Rubber, Standard Oil of California, and others<sup>33</sup> to dismantle the street railways in the 1940s and 1950s in order to sell more motor buses, rubber tires, and fuel oil.<sup>34</sup> Without taking sides on whether the conspiracy was aimed specifically at dismantling streetcar systems—although the cast of characters provides a tantalizing invitation to do so—what is known is that these companies were indicted by a federal grand jury in California in 1947 on two counts of violating the Sherman Antitrust Act.<sup>35</sup> Following the

31. For example, in 1917, there were 79,914 streetcars operating throughout the United States; by 1960, however, there were 2856 streetcars operating in only seven cities: Boston, Cleveland, Newark, New Orleans, Philadelphia, Pittsburgh, and San Francisco. AM. PUB. TRANSP. ASS'N, 2014 PUBLIC TRANSPORTATION FACT BOOK app. A at 162–63, 357–58 (2014), <http://www.apta.com/resources/statistics/Documents/FactBook/2014-A-PTA-Fact-Book-Appendix-A.pdf>. See also Jay Young, *Infrastructure: Mass Transit in 19th- and 20th Century Urban America*, OXFORD RES. ENCYCLOPEDIA AM. HIST. (2016), <http://americanhistory.oxfordre.com/view/10.1093/acrefore/9780199329175.001.0001/acrefore-9780199329175-e-28?print=pdf>, for a general overview of the rise and fall of streetcars in the United States.

32. Between 1920 and 1960, the number of automobiles on U.S. roads grew from 8.13 million to 61.67 million. THE WORLD ALMANAC AND BOOK OF FACTS 82 (Sarah Janssen ed., 2015).

33. The nine corporations named in the original indictment included: Firestone, Phillips Petroleum, General Motors, Mack Truck Company, Standard Oil of California, Federal Engineering Corporation, known as the “supplier” corporations, and three holding companies: American City Lines, National City Lines, and Pacific City Lines, who together controlled forty-six transit companies in forty-five cities in sixteen states. *United States v. Nat'l City Lines*, 186 F.2d 562, 564–65 (7th Cir. 1951). Through various arrangements, the holding company defendants agreed with the supplier companies to purchase buses, rubber tires and tubes, and petroleum only from them. *Id.* In its decision, the court did not focus on streetcars, stating at one point only that National City Lines “conceived the idea of purchasing transportation systems in cities where street cars were no longer practicable and supplying the latter with passenger busses.” *Id.* at 565.

34. For a point-counterpoint on the topic of whether General Motors and others were primarily responsible for the demise of America’s streetcars, see BRADFORD SNELL, AMERICAN GROUND TRANSPORT: A PROPOSAL FOR RESTRUCTURING THE AUTOMOBILE, TRUCK, BUS, AND RAIL INDUSTRIES 2 (1973), who argues that General Motors and its subsidiary National City Lines, in an attempt to encourage people to buy automobiles, were responsible for the destruction of more than one hundred streetcar systems in forty-five U.S. cities, and Cliff Slater, *General Motors and the Demise of Streetcars*, 51 TRANSP. Q. 45 (1997).

35. *Nat'l City Lines*, 186 F.2d at 564; see also 15 U.S.C. §§ 1–2 (2012) (describing the Sherman Antitrust Act provisions).

indictments and a change of venue to a federal district court in Chicago, the defendants were acquitted of the first count of engaging in an unlawful combination and conspiracy to eliminate competition in the supplying of products<sup>36</sup> but convicted of the second, which charged them with having “conspired to monopolize part of the interstate trade and commerce . . . of the sale of busses, petroleum products, tires and tubes used by local transportation systems in those cities in which defendants . . . owned, controlled or had a substantial financial interest in, or had acquired . . . such transportation systems . . . .”<sup>37</sup>

On appeal to the Seventh Circuit, the conviction was affirmed with the court concluding: “Inasmuch as the charge was sufficient at law, the evidence substantial and adequate and the trial without error, as a court of review, we may not properly interfere. The judgment is affirmed.”<sup>38</sup> The conviction aside, whether a conspiracy as described by its proponents specifically to dismantle the country’s street railway network ever existed is really beside the point, for in the end, the streetcar all but disappeared from the streets of America’s cities to the great benefit of those who produced automobiles, buses, rubber tires, and fuel oil.

Along with private industry, the federal government played a key supporting role in increasing automobile usage by the enactment of the Federal-Aid Highway Act of 1956 (“the Act”), which developed the interstate system as we know it today.<sup>39</sup> While apparently no conspiracy theories have been offered for its passage,<sup>40</sup> the Act has had a profound impact on national

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36. *Nat'l City Lines*, 186 F.2d at 564.

37. *Id.* The monopolization count against American City Lines was dismissed. *Id.*

38. *Id.* at 574.

39. Federal-Aid Highway Act of 1956, Pub. L. No. 627, 70 Stat. 374 (1956) (codified as amended in scattered sections of 23 U.S.C.). The statute is popularly known as the National Interstate and Defense Highways Act of 1956. See Richard F. Weingroff, *Federal-Aid Highway Act of 1956: Creating the Interstate System*, PUB. ROADS (Summer 1996), <http://www.fhwa.dot.gov/publications/publicroads/96summer/p96su10.cfm>. The Federal Highway Administration (“FHWA”) has published a historical overview of the Eisenhower administration’s efforts to pass the legislation. See *id.*

40. The members of the committee appointed by President Eisenhower to advise on the crafting of the legislation included General Lucius D. Clay, who served as chair; Steve Bechtel of Bechtel Corporation; Sloan Colt of Bankers Trust; William Roberts of Allis-Chalmers Manufacturing; David Beck of the International Brotherhood of Teamsters; and Francis Turner of the Bureau of Public Roads (the forerunner to the FHWA) was appointed to serve as the committee’s executive secretary. Weingroff, *supra* note 39. An interesting side note apropos of conspiracy theories and General Motors’ interest in increasing the market for its vehicles is the fact that in 1952, GM had established a “Better

transportation policies and funding.<sup>41</sup> Arguably, the significant increase in automobile ownership between 1960 and 2010 is, in part, attributable to the passage of the Act and its subsequent iterations.<sup>42</sup> As for streetcar travel, while the federal government was implementing its plan for the interstate system during the 1950s and 1960s, the number of passenger trips continued their precipitous decline.<sup>43</sup>

It is only in the recent past that the streetcar has begun to reappear—thus, the streetcar renaissance.<sup>44</sup> Although promising a streetcar presence in American cities that is nowhere near as expansive as that which existed in the early twentieth century, the renaissance is underway in the number of cities<sup>45</sup> that have recently built, or are currently building, new streetcar and light rail systems.<sup>46</sup> Here too, the federal government is playing a critical supporting role through public transportation funding mechanisms, especially since the 1990s and particularly during the

Highways Award,” offering a total of \$194,000 in prize money for the best essays on “[h]ow to plan and pay for the safe and adequate highways we need.” *GM’s Better Highways Award*, U.S. DEP’T TRANSP. FED. HIGHWAY ADMIN., <http://www.fhwa.dot.gov/infrastructure/gmaward.cfm> (last visited Feb. 3, 2017). Of further note was the appointment by Eisenhower of Charles E. Wilson, GM’s president, as his Secretary of Defense. *Id.*

41. The initial allocation of funding for the interstate system was \$25 billion, authorized for the thirteen-year period from 1957 through 1969. Weingroff, *supra* note 39. The allocation represented a significant increase above the *mere* \$175 million in the Federal-Aid Highway Act of 1954, which Eisenhower thought to be too little. *Id.* It appears from comments made by then-Vice President Nixon that the administration was seeking upwards of \$50 billion. *Id.* For the single fiscal year 2015, the FHWA requested \$48.6 billion for highway funding. FED. HIGHWAY ADMIN., FHWA FY 2015 BUDGET (2015), <https://www.transportation.gov/sites/dot.gov/files/docs/FHWA-FY2015-Budget-Estimates.pdf>.

42. During this period, the number of registered automobiles in the United States increased from 61.7 million to 130.9 million. THE WORLD ALMANAC AND BOOK OF FACTS, *supra* note 32. The *World Almanac* interestingly indicates, however, that between 2010 and 2013, the number of registered automobiles fell to 113.68 million. *Id.*

43. See AM. PUB. TRANSP. ASS’N, *supra* note 31, at 26. During this period, passenger trips by streetcar fell from 3.9 million in 1950, to 235,000 in 1970. *Id.*

44. One commentator proposes that 1970 was the turning point for rail transit in the United States, marked by a regrouping of the rail industry in all its forms, including the urban streetcar. John C. Spsychalski, *Rail Transport: Retreat and Resurgence*, 533 ANNALS AM. ACAD. POL. & SOC. SCI. 42, 49 (1997).

45. Parsons Brinkerhoff reports that since 2001, new streetcar lines have begun operating in nine cities, and nearly a dozen others are in design or construction. PARSONS BRINKERHOFF, *supra* note 7, at 2.

46. Light rail is the modern incarnation of streetcar technology. Spsychalski, *supra* note 44, at 51 (“[T]he rediscovery, technological updating, and reintroduction of electric street and interurban railway equipment that emerged in the 1880s . . . Light rail can . . . operate on trackage set in paved streets as its ancestors did, or on track in reserved rights-of-way in subways, on the surface, and/or on elevated structures.”).

Obama administration.<sup>47</sup> While it is well beyond the scope of this paper to discuss federal transit funding and the legislation that supports it, the Federal Transit Administration (“FTA”) reports in its listing of 2016 Capital Investment Grant (“CIG”) projects that twenty-six out of a total sixty-eight projects are for streetcar and light rail construction in twenty-one cities.<sup>48</sup> As envisaged both by FTA and the cities that propose these new projects, streetcars are viewed as serving multiple roles in the urban core. They are supported for their ability to move people, encourage economic development, and create more livable and desirable neighborhoods.<sup>49</sup>

### III. BICYCLES AS TRANSPORTATION AND THE “COMPLETE STREETS” MOVEMENT

Along with encouraging and funding these urban streetcar projects, the federal government is also pursuing policies that promote bicycling. Although preceding the electric streetcar in its development,<sup>50</sup> the bicycle came into vogue in the United States at approximately the same time—the late 1800s.<sup>51</sup> As noted in a court

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47. See, e.g., Keith Laing, *Obama Turns to Light Rail to Salvage Transit Legacy*, THE HILL (Mar. 1, 2014, 10:57 AM), <http://thehill.com/policy/transportation/199522-obama-turns-to-light-railways-to-salvage-transit-legacy>; Zachary Shahan, *Streetcars Are Making a Comeback, Thanks Largely to Obama*, CLEAN TECHNICA (Apr. 17, 2010), <http://cleantechnica.com/2010/04/17/streetcars-are-making-a-comeback-thanks-largely-to-obama>.

48. *Current CIG Projects*, FED. TRANSIT ADMIN., <https://www.transit.dot.gov/funding/grant-programs/capital-investments/current-cig-projects> (last updated Jan. 19, 2017). The list includes not only cities that have always had streetcar lines like Boston and San Francisco but cities that are reestablishing lines after many years without them, like Sacramento, Houston, Minneapolis, Durham, and Ft. Lauderdale, among others. *Id.* The non-streetcar CIG projects include commuter rail, heavy rail (subway), core capacity (tunnels, electrification), and bus rapid transit. *Id.*

49. See PARSONS BRINKERHOFF, *supra* note 7, at 2; Shahan, *supra* note 47 (statement of Rick Gustafson of Portland Streetcar) (“[A] streetcar makes movement within a city more convenient, and helps build up relatively dense, walkable, mixed use corridors.”).

50. See David Mozer, *Chronology of the Growth of Bicycling and the Development of Bicycle Technology*, INT’L BICYCLE FUND, <http://www.ibike.org/library/history-timeline.htm> (last visited Jan. 29, 2017) (providing a timeline of the development of the bicycle going back to Giovanni Fontana and Leonardo da Vinci in the fifteenth century and showing major advances in bicycle design occurring in the mid-1800s).

51. *The Development of the Bicycle*, NAT’L MUSEUM AM. HIST., [http://amhistory.si.edu/onthemove/themes/story\\_69\\_2.html](http://amhistory.si.edu/onthemove/themes/story_69_2.html) (last visited Jan. 29, 2017). While Americans around the time of the Civil War began showing enthusiasm for bicycles, referred to as “velocipedes,” most of which were imported from Europe, it was not until 1878, when Albert Pope became the first American bicycle manufacturer using the trade name “Columbia,” that bicycles became more popular. *Id.*

decision of the day, “[t]he bicycle has become almost a necessity for the use of workmen, clerks, and others in going to and from their places of work.”<sup>52</sup> At least two factors contributed to the growth of bicycles in popularity as a means of transportation.

The first was advances in design. The early bicycle, referred to as the “Ordinary,” had a very large front wheel with a small trailing back wheel.<sup>53</sup> While lightweight and fast, “it was also hazardous, since the rider’s center of gravity was only slightly behind the large front wheel and the rider was in danger of taking what came to be called a ‘header’—flying over the handlebars.”<sup>54</sup> This could happen if the cyclist made a sudden stop or the front wheel was suddenly stopped by a rut in the road or a stone which caused the cyclist to topple forward.<sup>55</sup> The dangers posed by bicycling during this early period reportedly led Mark Twain to quip, “Get a bicycle . . . [y]ou will not regret it, if you live.”<sup>56</sup> The potential hazardous nature of the Ordinary led to the development of the “Safety Bike,” one more like today’s bicycles with two wheels of equal size.<sup>57</sup>

The second factor contributing to the growth in popularity of bicycles was technological.<sup>58</sup> Along with the Safety Bike came “chain drive” and the development of gears and pneumatic tires.<sup>59</sup> While the Ordinary required the cyclist to both pedal and steer

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52. *Lee v. Port Huron*, 87 N.W. 637, 637 (Mich. 1901) (holding that where streets are unpaved, a municipality was authorized to allow bicycling on sidewalks); see also *Bicycle History from the Late 19th Century*, NAT’L MUSEUM AM. HIST., [http://amhistory.si.edu/ontheemove/themes/story\\_69\\_3.html](http://amhistory.si.edu/ontheemove/themes/story_69_3.html) (last visited Jan. 29, 2017) (“By 1899 . . . [t]he bicycle met the need for inexpensive individual transportation—much as the automobile has in recent times—for going to and from business, for business deliveries, for recreational riding, and for sport.”).

53. *The Development of the Bicycle*, *supra* note 51.

54. *Id.*

55. Mozer, *supra* note 50; see also Emily Hammond, *Government Liability When Cyclists Hit the Road: Same Roads, Same Rights, Different Rules*, 35 GA. L. REV. 1051, 1052 (2001) (“More than one hundred years ago, bicyclists were suffering injury due to rutted, unpaved roads.”).

56. Natalie Angier, *The Bicycle and the Ride to Modern America*, N.Y. TIMES (July 13, 2015), <http://www.nytimes.com/2015/07/14/science/the-bicycle-and-the-ride-to-modern-america.html>.

57. Mozer, *supra* note 50.

58. See *Highway History: The Bicycle Revolution*, U.S. DEP’T TRANSP. FED. HIGHWAY ADMIN., <http://www.fhwa.dot.gov/infrastructure/bicycle.cfm> (last visited Feb. 3, 2017) (crediting technological advances as contributing to the development of the airplane by the Wright brothers, who were originally in the business of bicycle sales and repair).

59. Mozer, *supra* note 50.

the front wheel, chain drive allowed the pedals to drive the bicycle from the rear wheel, reducing the potential for the cyclist to take a header.<sup>60</sup> Additionally, the development of gears promoted speed, and the pneumatic tire allowed for a more comfortable ride.<sup>61</sup> These advances led to a significant increase in the production of bicycles during the 1890s, from 200,000 in 1889 to one million in 1899.<sup>62</sup>

With more people using bicycles, calls for improving roadways followed. Even before the advent of the automobile, “[b]icyclists and their national, State, and local organizations became the earliest agitators for good roads.”<sup>63</sup> Responding to this agitation, in 1893, Congress authorized the creation of the U.S. Office of Road Inquiry within the Department of Agriculture.<sup>64</sup> The office, which was the precursor of the Federal Highway Administration (“FHWA”), was given a budget of \$10,000.<sup>65</sup>

This all happened at a critical juncture in the development of *motorized* transportation—enter the automobile<sup>66</sup> and, with it, the end of the bicycle craze of the 1890s.<sup>67</sup> The “good roads” movement was taken over by automobile interests, and for the

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60. *The Development of the Bicycle*, *supra* note 51.

61. *Id.*

62. *Id.*

63. *Highway History: The Bicycle Revolution*, *supra* note 58; see also Ross D. Petty, *The Impact of the Sport of Bicycle Riding on Safety Law*, 35 AM. BUS. L.J. 185, 202 (1998) (“Bicyclists, led by the League of American Wheelmen, and financed by [American] manufacturers assembled a coalition of interests, including farmers and railroads, that advocated for improved roads financed by the government. This ‘Good Roads Movement’ led to our modern system of roads and their system of financing that literally paved the way for motorized road transportation.”).

64. *Highway History: The Bicycle Revolution*, *supra* note 58.

65. *Id.*

66. *Id.* (noting the first gasoline-powered automobile was built in Springfield, Massachusetts, in 1893, at the height of the bicycle craze).

67. *Id.* As evidence of the abruptness of the end of the “craze,” the National Museum of American History reports that between 1900 and 1905, the number of American bicycle manufacturers shrank from 312 to 101. *Bicycle History from the Late 19th Century*, *supra* note 52. Along with the automobile as a contributor to the demise of the bicycle were “a considerable number of electric railways [that] took over the sidetracks originally constructed for bicycle use.” *Id.* On this point, it is of interest to note that one of Lensen’s claims in her complaint against the City of Seattle was the laying of streetcar tracks on the right-hand side of West Lake Avenue North where cyclists regularly traveled. See *supra* text accompanying notes 5 and 6.

next half-century, bicycles fell in popularity as a means of adult transportation, becoming primarily a child's toy.<sup>68</sup>

Beginning in the 1960s, however, a renewed interest in adult cycling began to take hold.<sup>69</sup> Yet, it was not until 1991, with the passage of the Intermodal Surface Transportation Efficiency Act,<sup>70</sup> that the federal government established changes to transportation policy that focused in large part on improving conditions nationally for bicycling as an element of a broadened transportation system.<sup>71</sup> Under the law as it now stands, bicycling as a means of transportation is to be given "due consideration" in

68. Mozer, *supra* note 50 ("The focus of planning and development of the transportation infrastructure [by 1920] was the private automobiles. Bicycles use declined and the bicycle was considered primarily as children's toys."); see also *Bicycle History from the Late 19th Century*, *supra* note 52 (stating that after 1905, "for over half a century, the bicycle was used largely by children").

69. Mozer, *supra* note 50 (stating in the early 1960s, the President's Council on Physical Fitness renewed interest in adult cycling for fitness and recreation and sowed the seeds of a bicycling boom that followed in the 1970s). Additionally,

[t]wo developments around this time, however, spurred interest in bicycles as an alternative *mode of transportation*: the birth of the modern environmental movement and the rising price of gasoline. With these concerns in mind, Congress passed the Federal Aid Highway Act of 1973, a renewal of the previous federal highway bill that, among other things, provided the first major federal mechanism for bicycle facilities.

Ryan Seher, Comment, *I Want to Ride My Bicycle: Why and How Cities Plan for Bicycle Infrastructure*, 59 BUFF. L. REV. 585, 595 (2011) (emphasis added) (footnotes omitted). Perhaps the most far-reaching innovations in bicycling during the late 1960s and early 1970s were being implemented in Davis, California. Buehler and Handy write that it was during this period that an aroused citizenry in the university town commandeered the political system to place cycling at the center of infrastructure development. TED BUEHLER & SUSAN HANDY, FIFTY YEARS OF BICYCLE POLICY IN DAVIS, CA 5–9 (2008), [http://www.des.ucdavis.edu/faculty/handy/davis\\_bike\\_history.pdf](http://www.des.ucdavis.edu/faculty/handy/davis_bike_history.pdf). The town became a laboratory of experimentation for developing many of today's accepted standards for bicycling infrastructure (e.g., establishing the geometric pattern for bicycle lanes, implementing "road diets" whereby that part of the roadway used by automobiles was shrunk in order to increase the amount of space given over to cycling, and commissioning a "bicycle circulation and safety" study to identify best practices in roadway design). *Id.* In effect, the authors conclude that Davis was built from the ground up as a "city for bicycles." *Id.* at 9.

70. Intermodal Surface Transportation Efficiency Act of 1991, Pub. L. No. 102-240, 105 Stat. 1914 (1991) (codified as amended in scattered sections of 23 U.S.C.).

71. Consistent with bicycling as part of the nation's transportation system, current guidance issued by FHWA states that "[b]icycling and walking are important elements to integrated, intermodal transportation systems that improve quality of life by providing access to jobs, education, health care, and other essential services." *FHWA Guidance: Bicycle and Pedestrian Provisions of Federal Transportation Legislation*, U.S. DEP'T TRANSP. FED. HIGHWAY ADMIN., [https://www.fhwa.dot.gov/environment/bicycle\\_pedestrian/guidance/guidance\\_2015.cfm](https://www.fhwa.dot.gov/environment/bicycle_pedestrian/guidance/guidance_2015.cfm) (last updated Sept. 15, 2015).

planning all federally-funded transportation projects.<sup>72</sup> Such consideration means that in planning and designing roadway and public transit projects, cities and states should “include improvements and reasonable amenities and provisions to accommodate, enhance, or encourage, bicycling. . . .”<sup>73</sup> To support this policy change, the U.S. Department of Transportation (“USDOT”), through both FHWA and FTA, has made bicycle initiatives eligible for federal funding in relation to both new highway and public transit projects.<sup>74</sup>

Simultaneous with the federal government’s promotion of bicycling as part of the nation’s transportation system, individual cyclists and cycling organizations came together in 2004 to form the National Complete Streets Coalition (“the Coalition”).<sup>75</sup> The “complete streets” movement seeks to encourage cities and states to design and construct roadways that allow all travelers equal use of the road.<sup>76</sup> “All travelers” includes not only automobile drivers but also pedestrians, bicyclists, and users of public transit.<sup>77</sup> Designing a complete street, therefore, means that the entire right-of-way is viewed and built as a multi-modal avenue that

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72. *Id.*

73. *Id.* “Federal surface transportation law provides flexibility to States . . . to fund bicycle and pedestrian improvements from a wide variety of programs. All major surface transportation funding programs can be used for bicycle and pedestrian-related projects.” *Id.*

74. *Id.* In the highway sector, projects covered include, among others, providing paved shoulders on new and reconstructed roads, restriping roadways for bicycle lanes, parking and storage facilities for bicycles, and designated traffic control devices. *Id.* In the public transit sector, projects covered include, among others, planning bicycle routes to public transit, bicycle racks and shelters at transit facilities, and equipment for bicycles on transit vehicles. *See, e.g., FTA Program & Bicycle Related Funding Opportunities*, FED. TRANSIT ADMIN., <http://www.transit.dot.gov/regulations-and-guidance/environmental-programs/ivable-sustainable-communities/fta-program-bicycle> (last updated Mar. 16, 2016).

75. *National Complete Streets Coalition*, SMART GROWTH AM., <http://www.smartgrowthamerica.org/complete-streets> (last visited Feb. 3, 2017).

76. *Id.* In a comment on federal policy, the Coalition noted: “Communities around the country have built miles of streets and roads that are unsafe for people traveling by foot or bicycle. . . . We need to change old road building habits so that road projects consistently take into account the needs of everyone using the roads.” *Federal Policy*, SMART GROWTH AM., <http://www.smartgrowthamerica.org/complete-streets/federal-policy> (last visited Feb. 3, 2017).

77. *Id.* (noting that Complete Streets are streets that work for all users, not just those using a car. Instituting a Complete Streets policy ensures that transportation agencies routinely design and operate the entire right of way to enable safe access for drivers, transit users and vehicles, pedestrians, and bicyclists, as well as older people, children, and people with disabilities).

provides travelers with a variety of transportation choices that are safe and convenient regardless of travel mode.<sup>78</sup> Such new visioning of urban streets requires, for example, sidewalks of ample width, pedestrian destination signage, clearly marked bicycle lanes or separated bicycle tracks,<sup>79</sup> and convenient and safe access for cyclists and pedestrians to bus and rail stops.<sup>80</sup> According to the Coalition, without such improvements, viewing roads as avenues primarily for the automobile reduces “opportunities for safe travel choices that can ease congestion: walking, bicycling, and taking public transportation.”<sup>81</sup>

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78. *Id.* For example, regarding public transit, the Coalition states:

In too many cases, road design is out of sync with the needs of the people who are riding buses, trains, and trolleys. Poor design slows transit service and discourages people from using public transportation.

....

Nearly every transit trip begins as a walking trip—but the disconnect between transit and road planning means transit riders are often left to wait at bus stops marked by a lone post in the grass—no sidewalk, curb ramp or bench.

*Benefits of Complete Streets: Complete Streets Make for a Good Ride*, SMART GROWTH AM., <http://www.smartgrowthamerica.org/documents/cs/factsheets/cs-transit.pdf> (last visited Feb. 3, 2017).

79. Bicycle lanes and bicycle tracks are similar in that they both are specifically designated for bicycle travel only and are usually located along roadways used by general traffic. They differ, however, in their design. Seher describes a bicycle lane as “a part of an actual road or highway, and separates bicycles and motor vehicles only by a painted stripe or curb.” Seher, *supra* note 69, at 587. Alta Planning + Design, which conducted a study of streetcar and bicycle interaction for Portland, Oregon, describes a bicycle track as “a separated bike lane that is attached to the sidewalk realm. It is often elevated to a higher level than the street level. It is often, but not always, separated from moving motor vehicle traffic by parked cars. . . .” ALTA PLANNING + DESIGN, BICYCLE INTERACTIONS AND STREETCARS: LESSONS LEARNED AND RECOMMENDATIONS 7 (2008), [http://www.altaplanning.com/wp-content/uploads/Bicycle\\_Streetcar\\_Memo\\_ALTA.pdf](http://www.altaplanning.com/wp-content/uploads/Bicycle_Streetcar_Memo_ALTA.pdf).

80. See generally *National Complete Streets Coalition*, *supra* note 75 (placing transit stops at intersections to discourage jaywalking and providing bicycle lanes and paved sidewalks to stops are simple ways to provide safe access).

81. *Complete Streets Ease Traffic Woes*, SMART GROWTH AM., <http://www.smartgrowthamerica.org/complete-streets/implementation/factsheets/ease-congestion> (last visited Feb. 3, 2017). Cyclists are rightly concerned about public safety. Recent National Highway Traffic Safety Administration (“NHTSA”) statistics indicate that in 2013, there were 743 pedalcyclists killed and an estimated 48,000 injured in motor vehicle traffic accidents, and of the number killed, sixty-eight percent were on urban roadways. NAT’L HIGHWAY TRAFFIC SAFETY ADMIN., DOT HS 812 151, BICYCLISTS AND OTHER CYCLISTS 1 (2015), <http://crashstats.nhtsa.dot.gov/api/public/viewpublication/812151>.

The Coalition's call for building complete streets in cities across the country is echoed in a current challenge issued to America's mayors by USDOT.<sup>82</sup> Promoting the complete streets concept, USDOT asks that mayors not only demonstrate leadership in promoting bicycle safety and developing safety action plans but that they also adopt a complete streets policy that changes the way transportation decisions are made and streets are designed on the local level.<sup>83</sup>

Taking the lead from both USDOT and private groups like the Complete Streets Coalition, many cities are now broadening their transportation options by encouraging cycling as well as constructing new streetcar lines as alternatives to the automobile.<sup>84</sup> When streetcars and bicycles share the same street, however, the focus of cyclists like Patricia Lenssen is rightly on the flange gap in the streetcar track.<sup>85</sup>

Lenssen's concern is underscored by the results of an extensive survey of cyclists undertaken in Portland, Oregon, simultaneous to the time of her Seattle suit.<sup>86</sup> In the survey, many respondents stressed the danger caused by the flange gap in tracks placed within or near bicycle lanes.<sup>87</sup> In fact, these concerns in Portland led to the filing of a suit similar to Lenssen's against the city by a cyclist there.<sup>88</sup> While the plaintiff in Portland fared no

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82. *Mayors' Challenge 1: Complete Streets*, U.S. DEP'T TRANSP., <https://www.transportation.gov/policy-initiatives/ped-bike-safety/mayors-challenge-1-complete-streets> (last updated May 13, 2016).

83. *Id.*

84. For streetcar projects, see *supra* notes 43–48 and accompanying text. For combined bicycle and pedestrian projects sponsored by FHWA, the total financial obligation in 2015 was \$833.7 million. FED. HIGHWAY ADMIN., FEDERAL-AID HIGHWAY PROGRAM FUNDING PEDESTRIAN AND BICYCLE FACILITIES AND PROGRAMS (2015), [http://www.fhwa.dot.gov/environment/bicycle\\_pedestrian/funding/obligations.pdf](http://www.fhwa.dot.gov/environment/bicycle_pedestrian/funding/obligations.pdf).

85. See *supra* notes 2–7 and accompanying text.

86. ALTA PLANNING + DESIGN, *supra* note 79. The survey undertaken in 2008 garnered 1520 responses within two weeks. *Id.* at 3. Some of the primary findings of the survey among respondents were that: most respondents were experienced cyclists, most valued Portland Streetcar, and 67% experienced an accident on streetcar tracks. *Id.* at 4. Of those who reported falling on tracks, 70% reported only minor injuries such as scrapes and bruises, but 8% reported broken bones or serious joint injuries while 2% reported head or neck trauma. *Id.* at C-2.

87. *Id.* at 9. In addition to the flange gaps, two other issues raised by respondents were right running tracks and streetcar boarding platforms that protruded from the sidewalk as curb extensions into the bicycle travel lane. *Id.*

88. Aimee Green, *Cyclist Crashed on Streetcar Tracks While Avoiding People Blocking Bike Lane, \$49,999 Suit Says*, THE OREGONIAN (May 5, 2014), [http://www.oregonlive.com/cycling/index.ssf/2014/05/cyclist\\_who\\_crashed\\_on\\_streetc.html](http://www.oregonlive.com/cycling/index.ssf/2014/05/cyclist_who_crashed_on_streetc.html). As described in the article,

better than Lenssen did in Seattle, the potential exists for similar suits in other jurisdictions where streetcars and bicycles are becoming important elements of sustainable urban transportation schemes. The questions remain, however, under what circumstances, and for what actions, will transit authorities be held accountable for injuries to bicyclists caused by streetcar tracks, and what can be done to create a compatible system that allows both streetcars and bicycles to operate advantageously?

#### IV. REVIEW OF THE LAW

Before addressing these questions, two preliminary observations based on the research for this Article are in order. First, most all of the cases relating specifically to the negligence of streetcar companies are old. As already noted, during the second half of the twentieth century, streetcar systems had all but disappeared in the United States.<sup>89</sup> Thus, many of the cases relating to personal injuries caused by streetcars are late-nineteenth and early-twentieth century cases. Further, these early cases were decided at a time, unlike today, when contributory negligence as a defense was the general rule that non-suited many plaintiffs.<sup>90</sup> Research also indicates that early streetcar cases involving bicycle accidents related primarily to collisions with

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plaintiff Leslie Kay got her front bicycle wheel caught in the flange gap of a streetcar track while she was trying to avoid several people who were waiting for a streetcar at a stop. *Id.* She claimed in part that the city was at fault for building streetcar lines with tracks in such a way as to make them unsafe for bicyclists. *Id.* In a brief telephone conversation with Kay's lawyer, Cedric Brown, the author was told that the suit had been withdrawn. Telephone Interview with Cedric Brown, Attorney at Law (Dec. 17, 2015). Brown said that there was a settlement but declined in any way to be certain or specific regarding it. *Id.*

89. See AM. PUB. TRANSP. ASS'N, *supra* note 31, at 162–63.

90. See, e.g., *Patterson v. Townsend & Son*, 59 N.W. 205, 206 (Iowa 1894) (“It would be palpable negligence for the driver of a wagon or carriage to recklessly drive upon a crossing in a race with an approaching [street] car. In all such cases it should be held the driver of the vehicle takes his chances of a collision, and he ought to have no remedy if an accident occurs.”); *Plinkiewisch v. Portland Ry., Light & Power Co.*, 115 P. 151, 153 (Or. 1911) (“Conceding . . . that defendant was negligent in failing to stop its [street] car or in failing to ring a gong, the evidence shows that the negligence of deceased was concurrent, and continued to the very moment of the injury. Under such circumstances plaintiff cannot recover.”); *Brown v. Phila. Rapid Transit Co.*, 97 A. 691, 691 (Pa. 1916) (“It is the duty of bicycle riders . . . about to cross the tracks of a street railway company to look . . . before they attempt to cross the tracks. . . . If they fail to do so, and the [street] car is so close or approaching at such a distance as to make the crossing perilous and they are injured by reason of their failure to look, they are guilty of such contributory negligence as bars their right to recover.”).

moving streetcars and broken pavement alongside rails.<sup>91</sup> The author found no case where an action in tort was based specifically on the existence of a street rail flange gap in a properly maintained streetcar track.<sup>92</sup>

Second, finding a uniform rule of law in this area is elusive. For instance, ownership of streetcar lines today is primarily in the hands of public entities and not private companies.<sup>93</sup> The result of such a transition raises issues related to governmental immunity from suit by injured cyclists, something that would not have been at issue in the days of private ownership but was critical in Lenssen's suit. In turn, governmental immunity from suit caused by roadway accidents is subject to state law, which can vary from state to state, leaving room for contrasting interpretations on its applicability.<sup>94</sup> This potential for divergent views of the law is compounded by the varied definitional treatments afforded bicycles by the states. For example, are bicycles "vehicles" with the same rights and responsibilities as automobiles to use roadways?<sup>95</sup>

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91. See, e.g., *Everett v. L.A. Consol. Elec. Ry. Co.*, 43 P. 207, 207 (Cal. 1896) (involving a bicyclist riding between the rails and being hit from behind by a streetcar); *N. Chi. State R.R. Co. v. Irwin*, 66 N.E. 1077, 1077 (Ill. 1903) (involving an adult cyclist hit by a streetcar while riding between the rails to avoid snow on the outer portions of the roadway); *Harbison v. Camden & S. Ry. Co.*, 65 A. 868, 868 (N.J. 1908) (involving a cyclist riding alongside the tracks and then turning to cross them and being hit by a streetcar); *Macchi v. Portland Ry., Light & Power Co.*, 148 P. 72, 74 (Or. 1915) (involving a cyclist injured by a collision with a streetcar while attempting to cross the tracks at an intersection). See *infra* Part IV.B and notes 175–80, 194–96 and accompanying text for cases involving cyclists being injured by elevated rails and broken pavement along rails.

92. See *infra* text accompanying notes 163–73 (discussing two cases related to injuries caused by flange gaps in rails that are properly maintained; however, one is on a track at a railroad crossing and the other is at a mechanical guide way atop a dam where neither relates to properly maintained streetcar tracks). These two cases are, respectively, *Reinhart v. Seaboard Coastline R.R. Co.*, 422 So. 2d 41 (Fla. Dist. Ct. App. 1982), and *Gaeta v. Seattle City Light*, 774 P.2d 1255 (Wash. Ct. App. 1989).

93. See *supra* note 31 and accompanying text.

94. See *infra* Part IV. Not only do state appellate courts each interpret and apply the rules of immunity in their own states as discussed *infra* Part IV, but state legislatures have also enacted statutes, pursuant to any constitutional immunity provisions extant, that address state immunity and tort liability in their state. See, e.g., JAIME RALL, NAT'L CONFERENCE OF STATE LEGISLATURES, WEATHER OR NOT? STATE LIABILITY AND ROAD WEATHER INFORMATION SYSTEMS (RWIS) app. B (2010), [http://www.ncsl.org/documents/transportation/Weather\\_or\\_Not\\_App\\_B\\_Rall\\_04.30.10.pdf](http://www.ncsl.org/documents/transportation/Weather_or_Not_App_B_Rall_04.30.10.pdf). For example, some state statutes restrict immunity to some combination of legislative, executive, and judicial decision-making. See *id.* Some restrict immunity to discretionary acts, such as planning and design decisions while other statutes establish procedures to be followed when making claims against the state. See *id.*

95. Several commentators, as well as the Uniform Vehicle Code ("UVC"), have referenced this issue of bicycles as "vehicles." See Hammond, *supra* note 55, at 1073.

There is also some cloudiness as to when cyclists are “intended users” vis-à-vis “permitted users” and if bicycles are “ordinary travel.” Even the Seattle court’s order granting summary judgment to the City in Lenssen’s suit did not venture an answer.<sup>96</sup> In the order, the judge simply added a hand-written notation stating, “The Court makes no finding as to whether bicycle travel is ordinary travel.”<sup>97</sup>

As with the judge’s order, it is beyond the scope of this Article to enter the definitional debate surrounding the bicycle. Rather, warning of the potential for inconsistencies among the states, the analysis that follows reviews key court decisions that grappled with issues of immunity, bicycles, and rails in an attempt to glean a consensus on the law as it stands. The first part of the review relates to governmental immunity and the barrier that immunity potentially poses to cyclists seeking relief from falls on streetcar tracks based on claims of negligent planning and design. The second part relates to the potential liability for state and city transit agencies (“transit authorities”) for injuries to cyclists from falls on defective rails and similar obstacles at railroad crossings and in-street based on claims of negligent maintenance and repair.

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Hammond indicates that the UVC was originally drafted in 1926. *Id.* In the original draft, the UVC treated bicyclists as drivers of vehicles with the same rights and responsibilities. Petty, *supra* note 63, at 198. When revised in 1944, however, Petty notes that the UVC restricted bicyclists in ways that it did not restrict automobiles. *Id.* For instance, bicycles were prohibited from controlled access highways and were required to ride along the right edge of the road. *Id.* The 1968 version of the UVC went further and clarified that bicycles were not vehicles when it excluded from the definition of “vehicle” “devices used by human power.” Hammond, *supra* note 55, at 1073. Hammond notes that in 1976, the UVC was again revised so that human-powered devices were no longer excluded from the definition of “vehicle.” *Id.* However, because the UVC, similar to other attempts to provide a uniform legal framework like the Uniform Commercial Code or the Uniform Partnership Act, is enacted on a state-by-state basis, variations arise. Seher, for instance, indicates that though bicycles are for all intents and purposes treated as vehicles, they are not always considered analogous to automobiles. Seher, *supra* note 69, at 606. To resolve this lack of consistency in definitional treatment, Hammond proposed uniform statutory language that clearly defines a bicycle as a vehicle, defines a roadway as the portion of a highway ordinarily used by vehicles, and imposes on public entities the duty to exercise reasonable care in maintaining roadways for all vehicular use that is reasonably foreseeable. Hammond, *supra* note 55, at 1079–80. In the twenty-first century, Hammond’s proposal makes perfect sense.

96. See Order Granting Defendant City of Seattle’s Motion for Summary Judgment at 2, *Lenssen v. City of Seattle*, No. 10-2-18980-7 SEA (Wash. Super. Ct. Apr. 6, 2012).

97. *Id.*

*A. Planning and Designing Streetcar Lines: The Impact of Governmental Immunity*

As noted, in the early days of urban transportation, most streetcar companies were privately-owned entities. They were given franchises<sup>98</sup> to lay tracks in public streets by city governments acting within the scope of their statutory authority.<sup>99</sup> As privately owned entities, streetcar companies could be sued for tortious injuries in the same way that any other private individual or company could be sued.<sup>100</sup>

This open exposure to suit began to change in the period between the Great Depression and World War II and accelerated from there. With the loss of profitability in part caused by the increasing popularity of the automobile, urban transportation companies—which by this period often consisted of some combination of streetcar, trolleybus, motor bus, and subway

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98. Discussing street railway development in Massachusetts at the turn of the nineteenth century, Carlson and Harding write:

Rival groups competed for coveted franchises. Promoters such as E.P. Shaw of Newburyport and his sons appeared to build lines, as much for their own profit as the benefit of the public. Promotion thrived because the public hungered for the cheap, readily-available transportation that street railways promised and formed a “ready customer” for the stock issued by the promoters.

CARLSON & HARDING, *supra* note 22, at 7. References to the franchises system can also be found in court decisions. *See* *Finch v. Riverside & A. Ry. Co.*, 25 P. 765, 765 (Cal. 1891) (stating the franchise did not prescribe the precise part of the street upon which tracks were to be laid); *City of Hartford v. Hartford St. Ry. Co.*, 47 A. 330, 333 (Conn. 1900) (noting no street railway could lay down tracks except in a manner prescribed by the common council); *City of Tulsa v. Wells*, 191 P. 186, 188 (Okla. 1920) (stating the city would have a right to proceed against a street railway company for damage caused by its failure to observe the conditions of its franchise obligations).

99. *See, e.g., Rich v. Salt Lake City Corp.*, 437 P.2d 690 (Utah 1968). *Rich* is an interesting case that led the Utah Supreme Court to broadly interpret a city’s statutory authority regarding transportation franchises. By statute in 1907, Utah granted to cities the right to operate or lease to others the right to operate a “street railway.” *Id.* at 691. By 1967, the privately-owned street railway had been converted to a bus system, and the city proposed purchasing the system and operating it as a public facility. *Id.* Plaintiff argued that the city had no authority to operate a “bus system” because the 1907 statute referenced only streetcars and not buses. *Id.* The court found in favor of the city, however, concluding expansively “that the term ‘street railway’ as used in the statute included trolley coaches and motor buses.” *Id.* at 692.

100. *See, e.g., id.*

routes—were taken over by city or state governments.<sup>101</sup> Once they became governmental entities, their exposure was limited to the extent dictated by statute<sup>102</sup> or judicial opinion<sup>103</sup> under the concept of sovereign immunity, or what today is more often referred to as governmental or discretionary immunity.<sup>104</sup>

At base, the concept of discretionary immunity protects governmental decision-making from unlimited liability in claims brought alleging tortious conduct. Courts have articulated at least two justifications for applying the concept. One is based upon the separation of powers doctrine.<sup>105</sup> As stated by the U.S. Supreme Court, the purpose of immunity is to “prevent judicial ‘second-guessing’ of legislative and administrative decisions grounded in social, economic, and political policy through the medium of an

101. See, e.g., *id.* at 690–91; see also BRADLEY H. CLARKE, *BOSTON’S MTA: THROUGH RIVERSIDE AND BEYOND* 1–4 (2015). “The Metropolitan Transit Authority came into being with the passage by the Massachusetts State Legislature of Chapter 544 of the Acts of 1947. . . . The new entity, defined as a political subdivision of the Commonwealth . . . soon acquired the assets of the Boston El.” *Id.* at 1.

102. See *supra* note 90.

103. See *infra* Part IV.

104. See, for example, Jonathan R. Bruno, *Immunity for “Discretionary” Functions: A Proposal to Amend the Federal Tort Claims Act*, 49 HARV. J. ON LEGIS. 411 (2012); Karen J. Kruger, *Governmental Immunity in Maryland: A Practitioner’s Guide to Making and Defending Tort Claims*, 36 U. BALT. L. REV. 27 (2006); and Debra L. Stephens & Bryan P. Harnetiaux, *The Value of Government Tort Liability: Washington State’s Journey from Immunity to Accountability*, 30 SEATTLE U. L. REV. 35 (2006) for a discussion on the issue of immunity in various contexts.

105. W. PAGE KEETON ET AL., *PROSSER AND KEETON ON THE LAW OF TORTS* 1046 (5th ed. 1984).

Even where the sovereign immunity of a state has been abolished, a legislative . . . immunity is retained to protect against liability for legislation . . .

By analogy, the state and its agencies are also protected from liability for the decisions of executive-branch employees and officers when those decisions involve the kind of basic policy issues typically involved in legislation. The immunity is recognized everywhere under one name or another . . .

The chief justifications for this immunity have been that the judiciary should not invade the province of the executive branch of government by supervising its decisions through tort law . . .

action in tort.”<sup>106</sup> The New York Court of Appeals made the same point in the context of a jury trial:

General tort liability is misplaced where a duly authorized public planning body has entertained and passed on the very same question of risk as would ordinarily go to the jury. Although a jury verdict is to be highly regarded, it is neither sacrosanct nor preferable to the judgment of an expert public planning body.<sup>107</sup>

A second justification is based on more general public policy considerations. A common view of those considerations was articulated by the Supreme Court of Colorado when it stated that immunity guards against the disruption of public services, shields the taxpayer from the excessive financial burdens that might result from innumerable tortious claims against the state, and protects public employees so they are not discouraged from providing the services expected of them in carrying out their public duties.<sup>108</sup>

Because, however, immunity operates to deny individuals their common law right to seek remedy for tortious wrongs caused by government decisions, actions, and omissions (“decisions”), courts tend to interpret the government’s immunity narrowly.<sup>109</sup> In this narrowing process, courts have attempted to distinguish between those government decisions that are immune from suit and those that are not. This has challenged courts to adopt language and tests that clarify what can otherwise be a confusing distinction.<sup>110</sup> To this end, for example, courts in Indiana

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106. *United States v. S.A. Empresa de Viacao Aerea Rio Grandense (Varig Airlines)*, 467 U.S. 797, 814 (1984).

107. *Weiss v. Fote*, 167 N.E.2d 63, 68 (N.Y. 1960).

108. *Swieckowski v. City of Ft. Collins*, 934 P.2d 1380, 1387 (Colo. 1997).

109. *See, e.g., Herrera v. City & Cty. of Denver*, 221 P.3d 423, 425 (Colo. App. 2009) (“The state’s immunity must be strictly construed because it derogates from the common law.”); *Hanson v. Vigo Cty. Bd. of Comm’rs*, 659 N.E.2d 1123, 1125 (Ind. Ct. App. 1996) (“We narrowly construe immunity because it provides an exception to the general rule of liability.”); *Johnson v. Utah Dep’t of Transp.*, 133 P.3d 402, 406 (Utah 2006) (“This court has always read the discretionary function exception to the immunity waiver narrowly.”).

110. The Supreme Court of Washington noted the challenge stating:

Initially then, it is necessary to determine where, in the area of governmental processes, orthodox tort liability stops and the act of governing begins, for as stated by Mr. Justice Jackson in his dissent in

distinguish government decisions as either “planning” decisions or “operational” decisions—those governmental decisions that relate to planning are immune from suit, those that are operational are open to suit.<sup>111</sup> Other courts use different terms to make the same distinction—“governmental-proprietary,”<sup>112</sup> “discretionary-ministerial,”<sup>113</sup> “discretionary-implementation.”<sup>114</sup> In 1965, the Supreme Court of Washington, in its attempt to clarify the distinction, established a four-prong test in *Evangelical United Brethren Church v. State*<sup>115</sup> to assess the outer limit of that immunity.<sup>116</sup> It concluded that for the government to succeed in a claim of discretionary immunity, each of the prongs of the test would have to be answered in the affirmative:

(1) Does the challenged act, omission, or decision necessarily involve a basic governmental policy, program, or objective?

(2) Is the questioned act, omission, or decision essential to the realization or accomplishment of that policy, program, or objective as opposed to one which would not change the course or direction of the policy, program, or objective?

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*Dalehite v. United States*, “it is not a tort for government to govern.” It is a gross understatement to say, however, that marking a definitive dividing line, with any degree of clarity or certainty, is fraught with some legal as well as factual difficulty.

*Evangelical United Brethren Church of Adna v. State*, 407 P.2d 440, 444 (Wash. 1965) (citation omitted) (quoting *Dalehite v. United States*, 346 U.S. 15, 57 (1953)).

111. *Hanson*, 659 N.E.2d at 1125.

112. *Gallagher v. Albuquerque Metro. Arroyo Flood Control Auth.*, 563 P.2d 103, 106 (N.M. Ct. App. 1977).

113. *Muskopf v. Corning Hosp. Dist.*, 359 P.2d 457, 463 (Cal. 1961), *superseded by statute*, Government Claims Act, CAL. GOV'T CODE § 810 (West 2016), *as recognized in State Dep't of State Hosps. v. Superior Court*, P.3d 1013, 1018 (Cal. 2015).

114. *Zambory v. City of Dall.*, 838 S.W.2d 580, 582 (Tex. App. 1992).

115. *Evangelical*, 407 P.2d at 444 (involving the question of state liability for the action of a juvenile detainee in state custody who escaped and set several fires).

116. Plaintiffs in *Evangelical* had premised their claim of state liability on Washington statutory law that, as amended in 1963, abolished immunity for governmental actions. *Id.* at 443. In *Evangelical*, therefore, the court was confronted with the question of the extent, if any, of immunity. *Id.* at 444. The 1963 amended statute reads: “The state of Washington, whether acting in its governmental or proprietary capacity, shall be liable for damages arising out of its tortious conduct to the same extent as if it were a private person or corporation.” WASH. REV. CODE ANN. § 4.92.090 (2006).

(3) Does the act, omission, or decision require the exercise of basic policy evaluation, judgment, and expertise on the part of the governmental agency involved?

(4) Does the governmental agency involved possess the requisite constitutional, statutory, or lawful authority and duty to do or make the challenged act, omission, or decision?<sup>117</sup>

Judicial distinctions and tests for applying immunity like the *Evangelical* test can help clarify when immunity applies, but even the U.S. Supreme Court itself admits to lingering confusion.<sup>118</sup> For example, at what point in the process of decision-making regarding the development of transportation infrastructure like streetcar lines does a government decision no longer qualify as discretionary? Considering that a functioning streetcar line requires a plan, design, construction, operation, maintenance, and repair, where is the distinction drawn between liability and immunity, or as the *Evangelical* court put it, between orthodox tort liability and the act of governing?<sup>119</sup> In 1974, not fully satisfied that its *Evangelical* decision sufficiently answered the question, the court in *King v. Seattle*<sup>120</sup> returned to its four-prong test and clarified the implication of the third prong regarding policy judgments by adding that a grant of immunity requires that the state, in rendering a judgment, “make a showing that . . . a policy decision, *consciously balancing risks and advantages*, took place.”<sup>121</sup> Other courts have also come to focus on the need for

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117. *Evangelical*, 407 P.2d at 445. Similarly, the Utah Supreme Court established a four-part test that mirrored the Washington court’s test. Like the Washington test, the Utah court asks whether a decision not only involves a basic government policy, but also whether it is essential to accomplishing the policy, was made after due consideration, and was exercised by an agency pursuant to relevant statutory authority. *Little v. Utah State Div. of Family Servs.*, 667 P.2d 49, 51 (Utah 1983).

118. *United States v. S.A. Empresa de Viacao Aerea Rio Grandense (Varig Airlines)*, 467 U.S. 797, 813 (1984) (“As in *Dalehite*, it is unnecessary—and indeed impossible—to define with precision every contour of the discretionary function exception.”).

119. *Evangelical*, 407 P.2d at 444.

120. *King v. City of Seattle*, 525 P.2d 228 (Wash. 1974) (involving a claim of liability by developers of an office building against Seattle for its failure to issue street use and building permits).

121. *Id.* at 233 (emphasis added). In a later case, the Washington court clarified still further the nature of this conscious balancing for finding an act or decision to be discretionary when it ruled against immunity in a case involving the design of a bridge

some sort of evaluative process in drawing the line between discretionary immunity and tort liability. Perhaps the Indiana Court of Appeals put it best by defining discretionary decisions as exercises involving “the formulation of basic policy characterized by official judgment, discretion, weighing of alternatives, and public policy choices.”<sup>122</sup> These basic policy choices are most frequently made during the planning and designing stages of transportation infrastructure and are the usual beneficiaries of immunity.<sup>123</sup> Immunity does not, however, commonly extend to the subsequent stages of infrastructure construction or maintenance and repair of already-built infrastructure.<sup>124</sup> In these instances, the government is vulnerable. As noted by a Texas appellate court, “[d]ecisions incidental or related to the implementation of a discretionary or policy-formulated decision are not immune from liability.”<sup>125</sup>

Courts have been willing, therefore, to accept as immune from suit executive, legislative, and administrative policy decisions that plan basic infrastructure. As the cases discussed below demonstrate, planning for a highway, bridge, bicycle lane, or

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stating: “There was no showing by the State that it considered the risks and advantages of these particular designs, that they were consciously balanced against alternatives, taking into account safety, economics, adopted standards, recognized engineering practices and whatever else was appropriate.” *Stewart v. State*, 597 P.2d 101, 106–07 (Wash. 1979).

122. *Hanson v. Vigo Cty. Bd. of Comm’rs*, 659 N.E.2d 1123, 1125–26 (Ind. Ct. App. 1996); accord *Stewart*, 597 P.2d at 106–07.

123. *Seher*, *supra* note 69, at 608 (“[T]he duty of highway design is much less likely to produce liability than the duty of highway maintenance. This is because highway design decisions are generally protected by governmental immunity.”); cf. U.S. DEP’T OF TRANSP., FED. HIGHWAY ADMIN., FHWA-HRT-05-127, FEDERAL HIGHWAY ADMINISTRATION UNIVERSITY COURSE ON BICYCLE AND PEDESTRIAN TRANSPORTATION: LESSON 22: TORT LIABILITY AND RISK MANAGEMENT 9 (2006), <http://www.fhwa.dot.gov/publications/research/safety/pedbike/05085/pdf/lesson22lo.pdf>.

Design decisions may have protection, but maintenance and operations do not. Certain actions have full or partial immunity from legal action. As a general rule, governments still enjoy some immunity in the area of design, although this too is eroding. There is little immunity for actions related to operations or maintenance.

*Id.*

124. U.S. DEP’T OF TRANSP., *supra* note 123.

125. *Zambory v. City of Dall.*, 838 S.W.2d 580, 582 (Tex. App. 1992); see also *Hanson*, 659 N.E.2d at 1125–26 (“Planning functions are discretionary and are therefore shielded by immunity, while operational functions are not. . . . Operational functions are characterized by execution or implementation of previously formulated policy.”).

railroad crossing falls squarely within the protection of governmental immunity. This protection logically extends to planning streetcar lines and is particularly assured when transit officials apply for construction funding through FTA's CIG programs,<sup>126</sup> for to receive such funding, FTA requires that transit authorities undertake a lengthy evaluative process that considers the project's impacts on land use, cost effectiveness, mobility improvements, congestion relief, environmental benefits, and economic development.<sup>127</sup> These impacts are measured against the current levels of transit service, a no-build option, and potential alternative projects.<sup>128</sup> Through this process, policy is formulated and the final plan for a streetcar line is made.<sup>129</sup> As a discretionary decision, such a plan would almost certainly be immune from legal challenge. As such, rather than using the courts to challenge planning decisions to construct streetcar lines, cyclists and other groups that might oppose construction would do better focusing their energies on joining the political process by attending public meetings regarding a project, providing their experience and expertise to planners, and advocating for a design that promotes bicycle safety.

The difficulty for opponents seeking to stop a decided-upon plan to build transportation infrastructure was made clear by the case of *Salt Lake on Track v. Salt Lake City*.<sup>130</sup> In the early 1990s, as Salt Lake City was planning the construction of a light rail system, the city granted the Utah Transit Authority ("UTA") a

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126. See *supra* note 48 and accompanying text.

127. FED. TRANSIT ADMIN., FINAL INTERIM POLICY GUIDANCE: FEDERAL TRANSIT ADMINISTRATION CAPITAL INVESTMENT GRANT PROGRAM ch. 1, at 10 (2016), [https://www.fta.dot.gov/sites/fta.dot.gov/files/docs/FAST\\_Updated\\_Interim\\_Policy\\_Guidance\\_June%20\\_2016.pdf](https://www.fta.dot.gov/sites/fta.dot.gov/files/docs/FAST_Updated_Interim_Policy_Guidance_June%20_2016.pdf). The land use measure includes, among others, an examination of existing corridor and station area development, station area facilities, parking supply, and affordability-restricted housing within one-half mile of the proposed stations. *Id.* Cost effectiveness, depending on the size of the project, is measured either on the annual operating and maintenance cost per trip for larger projects and on the federal share of the project cost per trip for smaller projects. *Id.* at 13. Mobility improvement measures the number of passenger trips anticipated using the new project, with a weight of two trips for every one trip made by a transit dependent person. *Id.* at 16. Environmental benefit evaluates improvements in air quality resulting from the implementation of the project. *Id.* at 18. Economic development measures the extent to which the project will induce additional transit-supportive development proximate to the project. *Id.* at 22.

128. *Id.* at ch. 1, at 10–11.

129. *Id.* at ch. 1, at 9.

130. *Salt Lake on Track v. Salt Lake City*, 939 P.2d 680, 681 (Utah 1997).

franchise to lay tracks on city streets.<sup>131</sup> Salt Lake on Track (“SLOT”), a group seeking to stop the plan, asked the city to put the plan on the ballot as an initiative petition.<sup>132</sup> When the city refused, SLOT sued, arguing, *inter alia*, that under long-standing Utah law, the city had no authority to allow light rail on city streets unless the franchise was issued through an “ordinance.”<sup>133</sup> The court dismissed the suit disagreeing that an ordinance was required despite the statutory language relied upon by SLOT.<sup>134</sup> On appeal, the Utah Supreme Court affirmed the dismissal.<sup>135</sup> Referencing several more recent statutes granting the city a variety of options for granting a franchise, the court ruled, “Salt Lake City has chosen to exercise the power given it by these newer statutes to authorize the construction of light rail on Main Street rather than granting a franchise under section 10-8-33. That alternative is within the *discretion* of Salt Lake City.”<sup>136</sup>

With a planning decision in place, designing a project is the next essential element to developing a streetcar line or any transportation infrastructure; the two go hand-in-hand. In fact, several states have enacted statutes that grant discretionary immunity specifically for both planning and design together, indicating perhaps an understanding that the design of a project is integral to the plan itself.<sup>137</sup> Likewise, as previously noted, immunity will apply to design, but with the caveat that it be the result of that same balancing of policy choices, risks and advantages, and weighing of alternatives.

For example, in *Morgan v. Peninsula Corridor*, a cyclist was riding his bicycle along a San Francisco bicycle lane designed to run parallel and to the left of a set of Amtrak railroad tracks.<sup>138</sup>

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131. *Id.*

132. *Id.*

133. *Id.*

134. *Id.* On appeal, the Utah Supreme Court referenced section 10-8-33 of the Utah Code relied upon by plaintiffs as follows: “The second clause of section 10-8-33 . . . provides that a city ‘may by ordinance grant franchises to railroad and street railroad companies . . . to lay, maintain, and operate in any street . . . tracks [for public transit].’” *Id.*

135. *Id.* at 682.

136. *Id.* at 681 (emphasis added).

137. *See, e.g.*, GA. CODE ANN. § 50-21-24(10) (2013); IDAHO CODE § 6-904(7) (2010); KAN. STAT. ANN. § 75-6104(m) (2015); MISS. CODE ANN. § 11-46-9(1)(p) (2012); NEB. REV. STAT. § 81-8, 219(11) (2014).

138. *Morgan v. Peninsula Corridor Joint Powers Bd.*, No. 13-cv-1041 JSC, 2014 U.S. Dist. LEXIS 7324, at \*2 (N.D. Cal. Jan. 21, 2014).

When the cyclist arrived at the point where he turned to the right to exit his cycle lane and enter an intersecting street to reach the cycle lane on that street, he encountered the railroad tracks.<sup>139</sup> As he attempted to cross the tracks, his wheel stuck and he fell to the pavement, sustaining injuries.<sup>140</sup> He sued the city and Amtrak<sup>141</sup> in negligence and premises liability,<sup>142</sup> claiming that his injuries were caused by the design of the bicycle lane next to the tracks and the deteriorated condition of the pavement surrounding the rails at the crossing, both of which he judged to be dangerous conditions.<sup>143</sup> The city moved for summary judgment under California's design immunity statute.<sup>144</sup>

In its analysis, the federal district court noted that immunity in California applies when a design has been approved by a legislative body or some other body or employee exercising discretionary authority.<sup>145</sup> The court also noted that the approved design had to evidence "reasonableness" (i.e., that there be a "reasonable basis on which a reasonable public official could have initially approved the design").<sup>146</sup> In its decision, the court held that the design was properly approved in that the appropriate city board authorized the plan for the lane's installation, and the duly-appointed city engineer subsequently approved a detailed design developed by a competent engineering firm.<sup>147</sup> The court also agreed with the city that the design was reasonable.<sup>148</sup> It noted that the design was discussed at numerous public hearings, supported by the San Francisco Bicycle Coalition, and was in compliance with

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139. *Id.*

140. *Id.*

141. *Id.* at \*3 (naming Amtrak as a defendant, resulting in the case being heard in federal court under federal question jurisdiction).

142. *Id.* at \*6.

143. *Id.* at \*3.

144. *Id.* at \*8–9 (citing CAL. GOV'T CODE § 830.6 (West 2016)), which provides immunity "for an injury caused by the plan or design of a construction of, or an improvement to, public property where such plan or design has been approved in advance of the construction or improvement by the legislative body of the public entity or some other body or employee exercising discretionary authority to give such approval. . . . if the . . . court determines that there is any substantial evidence upon the basis of which (a) a reasonable public employee could have adopted the plan or design . . . or (b) a reasonable legislative body . . . could have approved the plan or design").

145. *Id.* at \*9.

146. *Id.* at \*15 (quoting *Compton v. City of Santee*, 12 Cal. App. 4th 591, 597 (1993)).

147. *Id.* at \*14.

148. *Id.* at \*20.

requirements of the California Manual on Uniform Traffic Control Devices.<sup>149</sup> In response to the cyclist's claim that the design was unreasonable because it failed to comply with the 2009 Bicycle Plan approved by the transit authority's board, the court noted that the 2009 plan was not mandatory.<sup>150</sup> Further quoting from California precedent, the court sought more generally to clarify the impact of the reasonableness requirement when it said, "[A]s long as there was any substantial basis on which a government official could have decided the design was reasonable, it is irrelevant that a contrary opinion might have been offered."<sup>151</sup> Similarly, the *Evangelical* court stated, "Even though in the eyes of some the decisions involved may seem unwise, such does not render the state subject to orthodox tort liability."<sup>152</sup> On this basis, the California federal court granted summary judgment for the city, holding that it proved its design immunity as a matter of law.<sup>153</sup> As to the cyclist's claim that his injuries were also caused by deteriorated pavement surrounding the tracks, a maintenance issue, the court was much more solicitous; it refused summary judgment.<sup>154</sup>

In another transportation infrastructure design case, *Weiss v. Fote*, the New York Court of Appeals offered a rationale similar to that in *Morgan*.<sup>155</sup> Plaintiff claimed that the City of Buffalo's decision to design a traffic signal sequence with only a four-second "clearance interval"<sup>156</sup> was negligent and the cause of the accident that injured him at an intersection.<sup>157</sup> In reviewing the matter, the court noted that the design was the result of an ample study of traffic conditions at the intersection and numerous traffic checks

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149. *Id.* at \*16–17.

150. *Id.* at \*19.

151. *Id.* at \*20 (quoting *Compton*, 12 Cal. App. 4th at 597).

152. *Evangelical United Brethren Church of Adna v. State*, 407 P.2d 440, 447 (Wash. 1965).

153. *Morgan*, 2014 U.S. Dist. LEXIS 7324 at \*20.

154. *Id.* at \*36–37.

155. *Weiss v. Fote*, 167 N.E.2d 63 (N.Y. 1960).

156. *Id.* at 64. A clearance interval is the number of seconds between the time that a traffic light turns red for one line of traffic and the opposite signal turns green for the intersecting line of traffic, allowing an intersection to clear between vehicular movement. *See id.*

157. *Id.*

by Buffalo's Board of Safety.<sup>158</sup> In ruling that Buffalo's decision was immune from liability, the court concluded:

To state the matter briefly, absent some indication that due care was not exercised in the preparation of the design or that no reasonable official could have adopted it—and there is no indication of either here—we perceive no basis for preferring the jury verdict, as to reasonableness of the “clearance interval”, to that of the legally authorized body which made the determination in the first instance.<sup>159</sup>

Together, *Morgan* and *Weiss* demonstrate the application of discretionary immunity in a transportation design context. Note, however, that in each case a critical element to the granting of immunity was the element of reasonableness.<sup>160</sup> If the respective courts had determined that the decision-making process and the resultant design had not been reasonable, it appears that immunity might not have been granted. This, in fact, was the result in the following design case.

In *Stewart v. State*, a motorist was killed in an automobile accident in Washington State on an interstate highway bridge at a river crossing.<sup>161</sup> In her complaint, the wife of the decedent argued, inter alia, that the bridge's design was responsible for the death of her husband.<sup>162</sup> In its ruling, the Supreme Court of Washington returned to the standards for immunity it articulated in *Evangelical* and *King*.<sup>163</sup> It observed that there was no question regarding immunity for the planning decision “to build the freeway, to place it in its particular location, so as to necessitate crossing the river, [and] the number of lanes. . . .”<sup>164</sup> In designing the lighting and approach to the bridge, however, the court ruled that the state was not immune.<sup>165</sup> In its rationale, while

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158. *Id.*

159. *Id.* at 66.

160. *Id.*; *Morgan v. Peninsula Corridor Joint Powers Bd.*, No. 13-cv-1041 JSC, 2014 U.S. Dist. LEXIS 7324, at \*9 (N.D. Cal. 2014).

161. *Stewart v. State*, 597 P.2d 101, 103–04 (Wash. 1979).

162. *Id.* at 106.

163. *Id.*

164. *Id.*

165. *Id.*

recognizing that the state made a “judgment” about elements of the bridge’s design, the court stated that there was no showing that the state’s judgment “considered the risks and advantages of these particular designs, that they were consciously balanced against alternatives, taking into account safety, economics, adopted standards, recognized engineering practices and whatever else was appropriate.”<sup>166</sup> On this basis, the court concluded that “the issues arising from the evidence as to negligent design should have been submitted to the jury.”<sup>167</sup> In reaching its decision, the court cited rulings in other jurisdictions that reached similar results. For instance, the court cited the Nevada Supreme Court decision in *State v. Webster*, which held that “[o]nce the decision was made to construct a controlled-access freeway . . . the State was obligated to use due care to make certain that the freeway met the standard of reasonable safety for the traveling public.”<sup>168</sup>

In none of the cases discussed above were the plans questioned—the plan to establish the San Francisco bicycle lane, the plan to install the Buffalo light signal, the plan to build the bridge at the river crossing in Washington.<sup>169</sup> In these instances, plaintiffs neither raised challenges nor did the courts entertain any.<sup>170</sup> Challenges were raised, however, to the designs, and in assessing the validity of those challenges and the governments’ claims of immunity, the courts looked for some element of reasonableness and due care in the design process.<sup>171</sup> Where such care is taken—where the designs are reasonable and a result of a conscious balancing of factors that promote a public policy objective—the matter does not go to the jury. Immunity applies.

For cyclists challenging streetcar projects, therefore, the design stage would seem to be key. As part of overall planning, it is at this stage where a reasonable assessment and exercise of due

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166. *Id.* at 106–07.

167. *Id.* at 107.

168. *State v. Webster*, 504 P.2d 1316, 1319 (Nev. 1972) (involving a claim by a motorist injured in a collision with a horse that the state had failed to adequately fence a limited access highway from an animal pasture).

169. *See generally* *Morgan v. Peninsula Corridor Joint Powers Bd.*, No. 13-cv-1041 JSC, 2014 U.S. Dist. LEXIS 7324 (N.D. Cal. 2014); *Weiss v. Fote*, 167 N.E.2d 63 (N.Y. 1960); *Stewart*, 597 P.2d at 101.

170. *See supra* note 169 and accompanying text.

171. *See, e.g., Webster*, 504 P.2d at 1319.

care by transit authorities in project design must occur. Here, cyclists have a role to play and must play it, for it is their chance to contribute to a design that promotes bicycle safety. Likewise, for transit authorities, it would seem incumbent on them to encourage cyclist participation so as to assure that any subsequent claims of immunity are supported by a showing that there was a weighing of risks and advantages and that due care was used in designing a project that considered the interests of all roadway users, including cyclists. The participation of cyclists as stakeholders would reinforce such a showing.

Of course, in any challenge to the design of a streetcar line, the one design element that is unchallengeable is the fact that a streetcar line of necessity requires the laying of tracks in-street. A streetcar line cannot be planned and designed without them. As Seattle argued in response to Lenssen's suit, "Simply put, it is patently necessary to lay track in some configuration in order for a streetcar to operate. . . ." <sup>172</sup> It follows and is fair to conclude, therefore, that once a transit authority has made the public policy decision to build a streetcar line and has exercised due care in determining the design configuration of the tracks, the decision is immune from liability in tort "[e]ven though in the eyes of some the decisions involved may seem unwise, such does not render the state subject to orthodox tort liability." <sup>173</sup>

### *B. Maintenance and Repair of Street Rail: Transit Agencies' Duty of Care*

While transit agencies may, without penalty, make unwise and even unpopular planning and design decisions in the exercise of their discretionary authority, they do not benefit from the same advantage in relation to the everyday ministerial or proprietary responsibilities of maintaining and repairing infrastructure. <sup>174</sup> In

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172. Defendant City of Seattle's Motion for Partial Summary Judgment, *supra* note 2, at 15.

173. *Evangelical United Brethren Church of Adna v. State*, 407 P.2d 440, 447 (Wash. 1965).

174. Construction of infrastructure cases will often be treated similarly to maintenance and repair cases when the manner of construction is at issue. *See, e.g., Johnson v. Utah Dep't of Transp.*, 133 P.3d 402, 409 (Utah 2006) (holding that a decision by the state to use orange barrels instead of concrete barriers for safety at a highway construction site was an operational decision and not one of deliberative policy making that qualifies for immunity).

these matters, agencies can be liable under traditional tort principles—the same principles that were used to hold transit companies accountable when streetcar lines were privately owned.<sup>175</sup> Of course, along with the plaintiff's right to hold transit authorities to these traditional tort principles comes the defendant agency's right to use the same body of principles with which to defend itself, such as comparative negligence, the open and obvious hazard defense, and others.<sup>176</sup> The following series of cases relating to these traditional duties and defenses arise specifically from injuries caused to cyclists and pedestrians claiming negligent maintenance and repair of rails and similar obstacles at railroad crossings and in-street.

In *Reinhart v. Seaboard Coastline Railroad*, a cyclist was injured at a railroad crossing when the wheel of her bicycle got caught in the flange gap of one of the rails causing her to fall.<sup>177</sup> The track alignment as it crossed the roadway was at a twenty-degree angle,<sup>178</sup> a dangerous angle for any cyclist.<sup>179</sup> Reinhart did not allege any disrepair of the paved surface surrounding the tracks,<sup>180</sup> nor did she claim that the flange gaps were in themselves negligently designed or constructed.<sup>181</sup> Rather, she claimed that the Florida DOT was negligent in failing to post appropriate warnings of the hazardous angle of the tracks while knowing of a number of previous bicycle accidents at the crossing.<sup>182</sup> Florida responded that the decision not to place these warnings was a

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175. See, e.g., *Weiss v. Fote*, 167 N.E.2d 63, 67–68 (N.Y. 1960).

176. See *id.* at 64 (instructing the jury to consider defenses such as contributory negligence).

177. *Reinhart v. Seaboard Coast Line R.R. Co.*, 422 So. 2d 41, 42–43 (Fla. Dist. Ct. App. 1982).

178. *Id.*

179. For cyclists intersecting with in-street rails the advice is to cross at as close to a ninety-degree angle as possible. *Be Street Car Safe!*, CITY OF CIN., <http://www.cincinnati-oh.gov/streetcar/streetcar-safety/bike-safety2> (last visited Jan. 24, 2017). Cities that are re-establishing streetcar systems are giving this advice to cyclists through public service announcements. See *id.* For example, Cincinnati, Ohio, advises cyclists to cross tracks at ninety degrees. *Id.* Washington, D.C., advises likewise—“[c]yclists are more likely to crash when crossing the tracks at an angle less than 90 degrees.” *Bike Safety*, D.C. STREETCAR, <http://dcstreetcar.com/safety/bike-safety> (last visited Jan. 24, 2017).

180. *Reinhart*, 422 So. 2d at 43 (stating plaintiff's allegations in the matter).

181. *Id.*

182. *Id.*

planning decision entitling it to immunity.<sup>183</sup> While the trial court agreed with the state, the appellate court did not, holding:

Decisions to build a road or a crossing with a particular alignment . . . are generally considered judgmental, planning-level functions, and absolute immunity attaches. However, once DOT became aware of the dangerous condition of the crossing, a duty at the operational level arose to warn the public of . . . the known danger.<sup>184</sup>

In reversing the trial court and remanding the case for trial, the court indicated that the issue of negligence in failing to erect warning signs of a known dangerous condition was one for the jury to decide.<sup>185</sup>

In another flange gap case, *Gaeta v. Seattle City Light*, a motorcyclist was injured when one of the wheels of his motorcycle was caught in a two-and-one-half inch groove running parallel to a track.<sup>186</sup> The track at issue was on an open access roadway, atop a dam, and used for guiding a “mule,” which is “a device for raising the floodgates.”<sup>187</sup> The groove, essentially a flange gap, allowed the wheels of the mule to run along the track.<sup>188</sup> Gaeta’s complaint alleged negligence on the part of the defendant for failing to warn him of the tracks.<sup>189</sup> In his claim, he relied on Washington’s recreational use statute that protects users of publicly owned land from a “known dangerous artificial latent condition for which warning signs have not been conspicuously posted.”<sup>190</sup> In assessing Gaeta’s argument, the appellate court agreed with him that Seattle City Light had actual notice of the condition but disagreed that the condition was “latent” requiring warning signs.<sup>191</sup> Simply

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183. *Id.* at 44.

184. *Id.*

185. *Id.*

186. *Gaeta v. Seattle City Light*, 774 P.2d 1255, 1257 (Wash. Ct. App. 1989).

187. *Id.* at 1257 n.1.

188. *Id.* at 1257.

189. *Id.*

190. WASH. REV. CODE ANN. § 4.24.210(4)(a) (West 2017).

191. *Gaeta*, 774 P.2d at 1259.

stated, the court noted that “[t]he condition here was not latent because the tracks were obvious.”<sup>192</sup>

Despite their differing outcomes, both *Gaeta* and *Reinhart* are consistent in that they speak to a ministerial duty on the part of government to warn<sup>193</sup> travelers of hazardous conditions on public ways, including hazards caused by rails.<sup>194</sup> In *Reinhart*, the Florida DOT was aware of numerous injuries to cyclists at the rail crossing but took no action to post warning signs appropriate to the level of danger.<sup>195</sup> Therefore, the court agreed with the plaintiff that there was a triable issue of negligence.<sup>196</sup> In *Gaeta*, the court found no triable issue, not because there was no duty to warn, but because the track itself was an obvious warning of danger, and the recreational use statute required warnings only of latent dangers.<sup>197</sup>

In addition to potential claims involving injuries caused by failures to warn of rails, claims can also arise from a failure to repair defective rails. These circumstances most commonly involve tracks that have become elevated above the surface of the roadway caused by pavement settling or deterioration.

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192. *Id.*

193. Note, however, that the duty to warn in road hazard cases is not absolute. In most cases, the duty is coupled with a requirement that the governmental defendant have notice, actual or constructive, of the hazard with sufficient time to correct it or warn of it. *See, e.g.*, *Langdon v. Town of Westport*, 658 A.2d 602 (Conn. App. Ct. 1995) (illustrating a suit by a bicyclist whose tire was caught in a sewer grate who was barred for failure to prove that the defendant had knowledge that the grate was defective); *Schneider v. State*, No. 89-CC-0270, 1994 WL 906661, at \*1–2 (Ill. Ct. Cl. Oct. 4, 1994) (illustrating a suit by a cyclist whose tire was caught in a sewer grate with bars set parallel to the roadway that was dismissed for lack of proof that the state had actual or constructive knowledge that the situation was a hazard); *Jones v. Hawkins*, 731 So. 2d 216, 216–17 (La. 1999) (noting the absence of a plan by the responsible governmental agency to inspect an intersection at which a cyclist was injured did not constitute actual or constructive notice to the defendant of any hazard thereby allowing the cyclist to prevail); *Sahagan v. Commonwealth*, 518 N.E.2d 888, 889 (Mass. 1988) (illustrating a suit by a cyclist injured by the stump of a signpost who was barred for failure to prove that the responsible agency had knowledge of the stump); *Hindman v. State Dep’t of Highways & Pub. Transp.*, 906 S.W.2d 43, 44 (Tex. App. 1994) (illustrating suit by injured cyclist who hit a bump on a roadway shoulder that was dismissed for failure to prove that the state had prior, actual notice of the hazard).

194. *Reinhart v. Seaboard Coast Line R.R. Co.*, 422 So. 2d 41, 43 (Fla. Dist. Ct. App. 1982); *Gaeta*, 774 P.2d at 1257.

195. *Reinhart*, 422 So. 2d at 43.

196. *Id.* at 44.

197. *Gaeta*, 774 P.2d at 1259.

In *Cordy v. Sherwin Williams*, a New Jersey cyclist was injured at an abandoned rail crossing.<sup>198</sup> Unlike the situation in *Reinhart*, however, the crossing in this case was perpendicular to the road, eliminating any flange gap issue.<sup>199</sup> Rather, Cordy's claim was based on the fact that the tracks were elevated above the road surface.<sup>200</sup> He alleged that when his bicycle hit the elevated rail, it caused the bicycle to fall over throwing him to the pavement.<sup>201</sup> The rail's elevation was approximately three-fourths of an inch.<sup>202</sup> He sued both Sherwin Williams and Camden County for negligent maintenance of the crossing.<sup>203</sup> The county moved for summary judgment under the New Jersey Tort Claims Act, which required, in part, that an injury be caused by a "condition of [the] property that creates a substantial risk. . . ."<sup>204</sup> In granting summary judgment, the federal court found that a rail elevated three-fourths of an inch above the paved surface of the roadway "and in plain view of the users of the roadway, could not rationally be found to have created a substantial risk. . . ."<sup>205</sup> To find otherwise, the court concluded, would impose an unfairly onerous burden on the county to keep roads free of any imperfection, in effect making the county an insurer of safety.<sup>206</sup> Further, the court noted that even if the plaintiff could establish that the county had breached its duty of care in maintaining the crossing, a reasonable jury could have found that the cause of injury was not the track's elevation but the plaintiff's own negligence in not properly maintaining his bicycle.<sup>207</sup> Unfortunately for the plaintiff, evidence indicated that at impact the bicycle's "front wheel separated from the front fork [of the bicycle] due to the failure of the front hub's quick-release mechanism to hold the wheel in place."<sup>208</sup>

A few very early cases also dealt with the issue of elevated rails. A 1903 Texas case, *Shelton v. Northern Texas Traction Co.*,

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198. *Cordy v. Sherwin Williams Co.*, 975 F. Supp. 639, 639 (D.N.J. 1997).

199. *Compare Reinhart*, 422 So. 2d at 43 (alleging track crossed the road at an acute angle), *with Cordy*, 975 F. Supp. at 641 (alleging a perpendicular manner).

200. *Cordy*, 975 F. Supp. at 641.

201. *Id.*

202. *Id.* at 643.

203. *Id.* at 639.

204. *Id.* at 642-43; *see also* N.J. STAT. ANN. § 59:4-1(a) (West 2006).

205. *Cordy*, 975 F. Supp. at 641.

206. *Id.* at 644.

207. *Id.* at 649.

208. *Id.* at 645-46.

involved the driver of a loaded wagon who was thrown to the pavement when his wagon skidded several feet along a streetcar track that had become elevated four inches above the street pavement.<sup>209</sup> Shelton sued on the ground that the defendant streetcar company was negligent in failing to repair the rail.<sup>210</sup> Based on an erroneous jury instruction, however, the jury found for the defendant.<sup>211</sup> Plaintiff appealed.<sup>212</sup> The appellate court reversed and remanded the case, allowing the matter of the track's height to be put before the jury under a revised instruction.<sup>213</sup> In an 1892 New York case, *Schild v. Central Park, North and East River Railroad Co.*, the New York Court of Appeals affirmed the verdict of a trial court in favor of a pedestrian who had tripped over a streetcar rail that was elevated above the pavement between 1.12 and two inches.<sup>214</sup> The plaintiff claimed that the track's elevation was the result of negligent maintenance of the rail by the streetcar company.<sup>215</sup>

In two cases involving obstructions similar to elevated street rails, courts in Louisiana and Massachusetts found for plaintiffs injured in cycling accidents. In *Delphen v. Department of Transportation & Development*, a Louisiana cyclist was injured on a bridge when his bicycle hit a bridge plate that was elevated two to three inches above the paved road surface.<sup>216</sup> In its decision, the appellate court ruled that the defendant was in control of the bridge and had notice of the defect and, therefore, should at the very least "have posted warning signs or signs prohibiting bicycle traffic on the bridge."<sup>217</sup> In a 1930 case, *Guidi v. Town of Great Barrington*, a four-year-old was injured when his tricycle hit a sidewalk slab that was elevated two to four inches above the adjoining sidewalk slab, causing the cycle to topple.<sup>218</sup> The town moved for a directed verdict claiming that the two to four inch

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209. Shelton v. N. Tex. Traction Co., 75 S.W. 338, 338 (Tex. Civ. App. 1903).

210. *Id.*

211. *Id.* at 339.

212. *Id.*

213. *Id.*

214. Schild v. Cent. Park, N. & E.R.R. Co., 31 N.E. 327, 327 (N.Y. 1892).

215. *Id.*

216. Delphen v. Dep't of Transp. & Dev., 657 So. 2d 328, 331 (La. App. 1995).

217. *Id.* at 335.

218. Guidi v. Town of Great Barrington, 172 N.E. 916, 916 (Mass. 1930).

elevation was not sufficiently defective to be a hazard.<sup>219</sup> The trial court denied the motion, and the jury returned a verdict for plaintiff.<sup>220</sup> The Massachusetts Supreme Judicial Court affirmed, stating, “The difference in level between the concrete blocks cannot be said as matter of law to be so slight as not to constitute a defect.”<sup>221</sup>

In addition to injury claims based on a failure to repair rails and other obstacles elevated above the street surface, similar claims can also result from injuries caused by the subsidence of the pavement surrounding the rails. For example, in a 1941 case, *Rousseau v. Public Service Co. of New Hampshire*, a ten-year-old boy was injured when his bicycle ran into a hole in the roadway surface next to a streetcar track.<sup>222</sup> Evidence indicated that there were deep ruts running along both sides of the rails, that the ruts had existed for an extended period of time, and that streetcars running along the tracks at twenty-minute intervals had in part caused the ruts by destabilizing the roadbed.<sup>223</sup> In affirming judgment for plaintiff, the New Hampshire Supreme Court noted that the defendant knew or should have known of the deterioration of the tracks and that their use under the circumstances constituted negligence.<sup>224</sup> The court also noted that there was no claim of contributory negligence against the boy.<sup>225</sup>

The foregoing cases demonstrate that unlike planning and design decisions that are generally protected by governmental immunity, maintenance and repair decisions are not. Transit authorities owe an enforceable duty of care to cyclists and other travelers to protect against defects. That duty requires warnings of dangers caused by rails, the repair of rails, and the surrounding pavement when they deteriorate below an acceptable level. Prospectively, along streetcar routes it means that transit authorities should develop appropriate maintenance and repair criteria to provide optimum safety and operational solutions for streetcars and bicycles sharing the same streets. Before, however, discussing in Part V what some of those solutions might be, it

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219. *Id.*

220. *Id.*

221. *Id.*

222. *Rousseau v. Pub. Serv. Co. of N.H.*, 21 A.2d 160, 160 (N.H. 1941).

223. *Id.* at 160–61.

224. *Id.* at 161.

225. *Id.*

seems appropriate to return to *Lenssen v. City of Seattle* and view it through the lens of the foregoing legal analysis.

### C. *The Ruling in Lenssen v. City of Seattle*

Recall that in response to Lenssen's complaint, the City initially filed a motion for partial summary judgment arguing that the decisions "to (1) install a streetcar [line] on roadways within the South Lake Union neighborhood and (2) dedicate the right-hand lane of the street right-of-way to streetcar operation are legislative and executive decisions that are immune from tort liability."<sup>226</sup> The City argued that the decision to install the line was legislative and entitled to absolute immunity, and the decision to lay tracks on the right side of the street was protected by discretionary immunity.<sup>227</sup> For support it relied upon *Stewart v. State*, where the court had ruled that a decision to build a highway with a bridge to cross a river at a specific location was immune from challenge.<sup>228</sup> In making its argument, the City applied the four-prong *Evangelical* test,<sup>229</sup> asserting that: (1) the decision to establish and locate transportation infrastructure involved the basic governmental objectives of regulating the use of city streets<sup>230</sup> and establishing mass transit, in this case a streetcar line in a city neighborhood;<sup>231</sup> (2) to accomplish these policy objectives, the laying of streetcar tracks in some configuration on the street was essential;<sup>232</sup> (3) in exercising discretion in this matter, the City "considered and balanced multiple factors, including bicycle concerns[,] . . . traffic management, pedestrian safety, right-of-way constraints, and . . . potentially cost-prohibitive impacts to existing utility infrastructure";<sup>233</sup> and (4) after a clear exercise of judgment and expertise, the decision to lay tracks on the right-hand side of

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226. Defendant City of Seattle's Motion for Partial Summary Judgment, *supra* note 2, at 2.

227. *Id.* at 11, 15.

228. *Stewart v. State*, 597 P.2d 101, 106 (Wash. 1979); Defendant City of Seattle's Motion for Partial Summary Judgment, *supra* note 2, at 10, 14.

229. *See supra* text accompanying notes 115–21.

230. Defendant City of Seattle's Motion for Partial Summary Judgment, *supra* note 2, at 13.

231. *Id.* at 15.

232. *Id.*

233. *Id.* at 15–16.

the street was made by the statutorily authorized individual.<sup>234</sup> Apparently accepting the City's analysis that legislative and discretionary authority was properly exercised, the superior court allowed the motion for partial summary judgment.<sup>235</sup>

The motion did not raise, nor did the court's allowance address, however, the matter of public safety—"whether streets along the streetcar route were reasonably safe for ordinary travel."<sup>236</sup> This issue became the central focus of the motion for summary judgment in full. Lenssen's opposition to this motion argued that the streetcar route was not reasonably safe for bicycle travel because the City had failed to "adequately warn bicyclists of the known danger" of the streetcar tracks.<sup>237</sup> In opposing the motion, Lenssen cited *Owen v. Burlington Northern*,<sup>238</sup> a railroad crossing case involving the deaths of two Washington motorists caused by the negligent design and maintenance of the crossing in relation to a nearby signalized intersection.<sup>239</sup> In *Owen*, the trial court granted summary judgment to the co-defendant City of Tukwila, but the Washington Court of Appeals reversed, stating that a jury could conclude that unusual circumstances at the crossing required "more than the normal signage and warnings,"<sup>240</sup> an argument similar to the one successfully made in *Reinhart*. In *Lenssen*, the City conceded that whether a roadway is safe for ordinary travel is a jury issue,<sup>241</sup> but argued that Lenssen had offered no evidence upon which a jury could reach a decision that the Seattle streetcar route was unsafe.<sup>242</sup> She had made no

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234. *Id.* at 15.

235. Order Granting Defendant City of Seattle's Motion for Partial Summary Judgment, *supra* note 13, at 2.

236. Defendant City of Seattle's Reply in Support of Partial Summary Judgment, *supra* note 18, at 1.

237. Plaintiffs' Opposition to Defendant City of Seattle's Motion for Summary Judgment in Full, *supra* note 16, at 1.

238. *Owen v. Burlington N. Santa Fe R.R., Inc.*, 56 P.3d 1006, 1013 (Wash. Ct. App. 2002) ("As part of its duty to maintain its roads in a condition reasonably safe for ordinary travel, a governmental entity has a duty to post adequate and appropriate warning signs either when required by law, or when the situation is inherently dangerous or misleading.").

239. Plaintiffs' Opposition to Defendant City of Seattle's Motion for Summary Judgment in Full, *supra* note 16, at 20.

240. *Owen*, 56 P.3d at 1012.

241. Defendant City of Seattle's Reply in Support of Partial Summary Judgment, *supra* note 18, at 1.

242. *Id.*

showing as to any applicable standard of care regarding the design and traffic engineering of a streetcar route nor had she made any showing regarding appropriate signage along such a route.<sup>243</sup> Further, and more generally, the City argued that in regard to multimodal transportation infrastructure, it is not possible to design “in a manner that prioritizes bicycle travel over other competing needs.”<sup>244</sup> Following these arguments, finding for the City, the court issued summary judgment in full.<sup>245</sup>

The barriers posed by the application of governmental immunity to the planning and design stages of a streetcar project should raise caution for those seeking to rely on the judicial process for resolving conflicts between streetcars and bicycles caused by streetcar projects, the placement of tracks, and particularly the matter of the flange gap. This is not to say that individual instances of personal injury caused by inadequate signage or failure to repair deteriorated tracks are not appropriate for the courtroom; they are. Whether a streetcar line should be built, however, and whether in building it, it adversely affects cyclists’ ability to use a roadway, or any one particular group’s ability to use a roadway, is fundamentally a public policy matter involving a wide range of competing interests that are best resolved through political discourse and decision-making. The range of those interests includes the efficient movement of people, environmental health, urban development, public (including cyclist) safety, and others, all related to building sustainable cities into the future. The problem for plaintiffs is that tracks with their flange gaps are essential to streetcars, and standards of practice relating to the engineering of streetcar routes, the way streetcars interface with bicycles and other traffic, and relevant signage and road markings are still in the developmental phase.<sup>246</sup> Further, the usual guidance relied upon

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243. Defendant City of Seattle’s Reply to Plaintiff’s Response to the City’s Motion for Summary Judgment in Full at 3–5, *Lenssen v. City of Seattle*, No. 10-2-18980-7 SEA (Wash. Super. Ct. Apr. 6, 2012).

244. *Id.* at 5.

245. Order Granting Defendant City of Seattle’s Motion for Summary Judgment, *supra* note 96.

246. For instance, regarding signage, the City in its Motion for Summary Judgment in Full called attention to the fact that the 2003 issue of the Manual on Uniform Traffic Control Devices (“MUTCD”), which it accepted as the controlling standard for roadway signage in the state at all times relevant to the plaintiffs’ action, “does not prescribe, or

by finders of fact is silent on these issues. For instance, neither the 2012 American Association of State Highway and Transportation Officials (“AASHTO”) *Guide for the Development of Bicycle Facilities*<sup>247</sup> nor the 2014 *Statewide Pedestrian and Bicycle Planning Handbook*<sup>248</sup> issued by FHWA offer any guidance nor make any reference to relevant standards for bicycle facilities specific to streets with streetcar traffic. Likewise, the current *Manual on Uniform Traffic Control Devices* (“MUTCD”) includes no sign specific to bicycles in relation to streetcars.<sup>249</sup> So, in assessing an alleged breach of the duty of care, courts have little guidance from the standard sources upon which to rely.

Fortunately, however, as more streetcar projects are introduced into more American cities, the outlines of a regime for promoting bicycle safety in streetcar zones are emerging. While AASHTO and MUTCD have some catching up to do, transportation planners in affected North American cities are beginning to draw on each other’s experiences and on the European experience to flesh out some guidelines for developing compatible roadways. These include designs for streetcar rights-of-way and bicycle facilities, as well as bicycle-appropriate signage and pavement markings. The aim is to establish a regime for streetcars and bicycles that can serve the goals of sustainable urban transport in the twenty-first century while minimizing, to a practicable extent, the kinds of injuries sustained by Lensen.

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even suggest, any particular signage to alert bicyclists to the hazards of streetcar tracks.” Defendant City of Seattle’s Motion for Summary Judgment in Full, *supra* note 15, at 7.

247. AM. ASS’N OF STATE HIGHWAY & TRANSP. OFFICIALS, *GUIDE FOR THE DEVELOPMENT OF BICYCLE FACILITIES* viii, ix (4th ed. 2012) (including a chapter dedicated to the design of on-street facilities for bicycles and a chapter on integrating bicycles with transit, but no reference to streetcars and bicycles).

248. U.S. DEP’T OF TRANSP. & JOHN A. VOLPE NAT’L TRANSP. SYS. CTR., *DOT-VNTSC-FHWA-14-04, STATEWIDE PEDESTRIAN AND BICYCLE PLANNING HANDBOOK* (2014), [http://ntl.bts.gov/lib/54000/54500/54587/Ped-Bike\\_State\\_Planning\\_Handbook.pdf](http://ntl.bts.gov/lib/54000/54500/54587/Ped-Bike_State_Planning_Handbook.pdf).

249. *See* U.S. DEP’T OF TRANSP. FED. HIGHWAY ADMIN., *MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES FOR STREETS AND HIGHWAYS* (2009 ed. rev. 2012), <http://mutcd.fhwa.dot.gov/pdfs/2009r1r2/mutcd2009r1r2edition.pdf>. The Manual does include, however, authorized signage for in-street lane markings for streetcars and light rail vehicles as well as light rail grade crossing signage. *Id.* at 753, 759.

## V. ESTABLISHING A COMPATIBLE REGIME FOR STREETCARS AND BICYCLES

The key to building a compatible regime requires both a planning process that is collaborative and an ultimate design that benefits all users. While several of the new streetcar cities have issued advisories to promote bicycle safety,<sup>250</sup> three informative reports have resulted in a series of specific guidelines and recommendations that promote some level of compatibility. These were produced in relation to streetcar planning in Portland, Oregon,<sup>251</sup> metro-Washington, D.C.,<sup>252</sup> and Edinburgh, Scotland.<sup>253</sup> They offer insight into the particular challenges faced by transit planners and cyclists in streetcar zones and provide practical approaches to coping with them. The three reports form the basis of what follows.

### A. *Planning a Compatible Regime*

The starting point in planning for a system that works both for effective streetcar operation and bicyclist safety is appreciating that streetcars will have to function within an already-existing urban context. The *Edinburgh Design Manual*, developed to guide the construction of Edinburgh's new streetcar system, notes that a well-designed system "requires a holistic process that addresses the nature of the city, responding equally to the inherited townscape,

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250. See Ciara Frisbie, *Atlanta Streetcar Project Works to Keep Downtown Cyclists Safe Amid Continued Construction*, THE SIGNAL (Dec. 3, 2013), <http://georgiastatesignal.com/new-streetcar-railing-and-construction-impacts-bicycle-safety> (advising cyclists to ride on the side of the street opposite tracks, take alternative routes, bring bikes onto the streetcar, and cross tracks at right angles); *Rule of Rail Safety*, CITY OF CHARLOTTE, <http://charmeck.org/city/charlotte/cats/lynx/Documents/Rail%20Safety%20Brochure.pdf#search=bicycle%20streetcar%20safety> (last visited Feb. 6, 2017).

251. See Scott Mizée, Presentation at the American Public Transportation Association Annual Meeting: Integrating Bicycles with Streetcars (2012), <http://www.apta.com/mc/annual/previous/2012/presentations/Presentations/MizeeS-Integrating-Bicycles-with-Streetcar.pdf>.

252. *TLC Program Helps Connect Transportation and Land-Use at the Local Level*, METROPOLITAN WASH. COUNCIL GOV'TS (July 9, 2012), <https://www.mwcog.org/about-us/newsroom/2012/07/10/tlc-program-helps-connect-transportation-and-land-use-at-the-local-level-lid-arlington-county-district-of-columbia-frederick-county-bicycling-freight-tlc-program-transportation/land-use-coordination-technical-assistance>.

253. CITY OF EDINBURGH COUNCIL, EDINBURGH TRAM PROJECT: DESIGN MANUAL (2005), [http://www.edinburgh.gov.uk/download/meetings/id/25512/edinburgh\\_tram\\_project\\_design\\_manual\\_appendix\\_1\\_part\\_1](http://www.edinburgh.gov.uk/download/meetings/id/25512/edinburgh_tram_project_design_manual_appendix_1_part_1).

accessibility for all, traffic circulation and management, operational efficiency, sound engineering and economic prosperity.”<sup>254</sup> This integrated approach brings planners together at the outset with design architects and stakeholders from affected communities. For the Edinburgh project, that meant the creation of a Design Working Group<sup>255</sup> as a first step toward envisioning how streetcars would actually operate within the already-existing fabric of the city.<sup>256</sup> Because cyclists were a part of that fabric, the Working Group sought to create a streetcar system that actually “encourag[ed] . . . cycling”<sup>257</sup> by “minimising [sic] restrictions on . . . cyclists.”<sup>258</sup> To achieve such a bicycle-friendly result in Edinburgh, or any city introducing streetcars into the cityscape, the bicycle community has to be included in the early envisioning process.

In addition to cyclist participation in government-sponsored working groups such as the one in Edinburgh, cyclists themselves should be proactive in attending community meetings, participating in stakeholder surveys, and advocating generally for bicycle safety and accessibility as important elements of the planning process for a compatible system of streetcars and bicycles.<sup>259</sup> For example, in 2008, in anticipation of the initiation of streetcar service in Portland’s Lloyd District, the Lloyd District Transportation Management Association (“LDTMA”) developed a web-based survey that was distributed widely amongst cyclists and

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254. *Id.* § 1.2.

255. *Id.* § 3.2.

256. *Id.* at 15 app. 1.

These aims lead to the following objectives in the LTS: to make it easier to live without a car, or use the car less; to reduce the amount of car use; to encourage and facilitate walking, cycling, and public transport use; to reduce the adverse effects of travel including road accidents, environmental damage, particularly for the worst affected by these impacts; to enhance streets as civic spaces where priority is given to people rather than cars; to improve the ability of people with low incomes or mobility impairments to use the transport system, especially by public transport, as pedestrians or by bicycle.

*Id.*

257. *Id.* §§ 4.45–4.46.

258. *Id.*

259. U.S. DEP’T OF TRANSP. FED. HIGHWAY ADMIN., *supra* note 249, at 38–39 (recommending such stakeholder participation for bicycle facilities planning through workshops, meetings, focus groups, surveys, social media, and advisory committees).

transit users through blogs, e-mail, and postings on transit and cycling websites.<sup>260</sup> The goal was to gather information about cyclists' interactions with Portland Streetcar, which had already been functioning in other parts of Portland since 2001.<sup>261</sup> From the survey, LDTMA was able to make a series of bicycle-friendly recommendations for designing future extensions of Portland Streetcar, several of which are included below.<sup>262</sup> As part of the survey, LDTMA also researched guidelines developed from practices in other cities. It concluded, not surprisingly, that with the exception of Edinburgh, "staff were not able to find many examples of formal design guidelines, either at the national or local level,"<sup>263</sup> a point made by the City in *Lenssen*.

The ultimate benefit of inclusive planning, such as Edinburgh's, is to lay the foundation for a design of the streetcar system that works for all stakeholders. For cyclists in the United States, being actively involved from the very beginning in planning for new streetcar systems is essential to improving bicycle safety and minimizing restrictions on cyclists. It also is the phase in the process where streetcar routes and track alignments are determined and, from the cases discussed in the legal analysis, infrastructure alignments made as part of discretionary planning, whether bridges as in *Stewart* or tracks as in *Reinhart*, are protected under governmental immunity. Once plans are made, the cases indicate that they are closed to litigation.

For transit authorities involved in planning streetcar systems, including cyclists and other stakeholders in the planning phase encourages the weighing of risks, advantages, and alternatives identified in *Evangelical, Morgan*, and other cases that are important to the exercise of the discretionary function and the

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260. ALTA PLANNING + DESIGN, *supra* note 79, at 3.

261. See LAVONNE GRIFFIN-VALADE ET AL., OFFICE OF THE CITY AUDITOR OF PORTLAND, PORTLAND STREETCAR: CITY BEARS FINANCIAL BURDEN AND OPERATIONAL RISK WHILE RELYING ON OUTSIDE PARTNERS 1-2 (2014), <https://www.portlandoregon.gov/auditservices/article/48758>. Portland Streetcar began operating in Portland, Oregon, in 2001. *Id.* at 4. "The City initiated the Portland Streetcar as a public-private partnership with Portland Streetcar Incorporated, a private nonprofit organization, and later added TriMet, the public transportation agency for the Portland metro region." *Id.* at 1. "The City has planned for the Portland Streetcar system's continued expansion, with four extensions already completed." *Id.* at 7.

262. The surveyors conducted extensive research on design guidelines for streetcar systems and noted that they were not able to find many examples of formal guidelines in the United States. ALTA PLANNING + DESIGN, *supra* note 79, at 5, E-1, E-2.

263. *Id.* at 5.

immunity that flows from it. It also assists planners in understanding and gauging community concerns, identifying specific problems to address, building support for plan implementation, and building a streetcar line that creates optimum satisfaction.

### *B. Designing a Compatible Regime*

In addition to recommendations regarding planning, the reports also focus on designing roadways along streetcar routes. In both the Portland and Washington, D.C., reports, much of that focus was directed at protecting cyclists from flange gaps. The D.C. report was blunt: “Bikes & Streetcars can NOT share a lane.”<sup>264</sup> For this reason, in designing streetcar lines, the guidance from all three studies is that bicycles and streetcars should be operationally segregated from each other.<sup>265</sup> Operational segregation poses design issues both regarding the alignment of tracks on a street and the curving of tracks at intersections.

Because cyclists usually travel on the right side of the roadway, the alignment of streetcar tracks in the right lane poses obvious dangers for bicycles, as Lenssen’s complaint indicated.<sup>266</sup> Where streets are wide enough, the guidance from the studies is that tracks and boarding platforms should be located in the center of the roadway. As the Portland study notes, center-running or left-running streetcar tracks and platforms on one-way streets are strongly preferred for bicycle safety.<sup>267</sup> Often, however, streets are not wide enough for such an alignment or are two-way, resulting in a decision to align tracks to the right. Where a right-side alignment is selected, there is no perfect solution for enhancing bicycle safety. The Portland study discusses the creation of cycle lanes or grade-separated “cycle tracks” as means of mitigating the

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264. Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, Presentation: Best Practices in Providing Bicycle Facilities in Streetcar Corridors, at slide 19 (May 4, 2011), <http://old.mwcog.org/transportation/activities/tlc/pdf/ArlBike-PPT.pdf>.

265. CITY OF EDINBURGH COUNCIL, *supra* note 253, at 66 app. 1; Mizée, *supra* note 251, at slides 26–31; Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264, at slides 18, 23–29. While the studies generally recognize the restrictions imposed on all travel within a defined right of way, each study advises that some form of separation between bicycles and streetcars is advisable.

266. Mizée, *supra* note 251, at slide 14; Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264, at slide 23.

267. Mizée, *supra* note 251, at slide 16.

risk to cyclists, but cautions that there are drawbacks to both.<sup>268</sup> An alternative to these cycle facilities that run along the streetcar route itself is to develop parallel bikeways or “bicycle boulevards” on a lesser trafficked contiguous street.<sup>269</sup> This would seem to counter the guidance offered in the *Edinburgh Manual*, however, that requires streetcar planners to respect already existing bicycle routes.<sup>270</sup>

While there seem to be viable strategies as noted in the studies for designing rights of way that keep bicycles clear of tracks along roadways shared with streetcars, intersections with rails pose more difficulties for all cyclists, even those that approach the intersection from a street without tracks. For instance, a cyclist turning left from the right side bicycle lane across a streetcar track, or a cyclist traveling straight across an intersection who is confronted with crossing a curving track, is at a high risk of crashing unless the rail is crossed at an angle of more than forty-five degrees<sup>271</sup> and closer to ninety. In fact, most guidance for cyclists from the studies, as well as general advisories published by new streetcar cities, as previously noted, is very clear—the best angle for cyclists crossing tracks is ninety degrees.<sup>272</sup> Thus, intersections need particular design attention that directs cyclists on how best to cross tracks safely. This might require a designer to include a chicane or “jug handle” pavement markings directing cyclists to the right in order to turn left across tracks;<sup>273</sup> traffic signals specific for cyclists so that other traffic in the intersection stops while cyclists maneuver the tracks;<sup>274</sup> pavement markings that

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268. *Id.* Right side cycle lane and cycle track solutions for parallel right-running streetcar tracks can create conflicts with boarding platform curbing, with passengers boarding and alighting streetcars (cause of Lensen’s accident), and with left turns across streetcar tracks at a less than optimum angle. *Id.*

269. *Id.*; Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264, at slide 30.

270. CITY OF EDINBURGH COUNCIL, *supra* note 253, at 66 app. 1 (“Cycle/pedestrian routes are to be provided alongside the tram track on those sections where the tram route follows a corridor currently occupied by a cycle/pedestrian path only.”).

271. Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264, at slide 36.

272. Mizée *supra* note 251, at slide 24; Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264, at slide 38.

273. Mizée *supra* note 251; Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264.

274. Mizée *supra* note 251; Nat’l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264.

utilize green “bike boxes” where cyclists pause awaiting their signal or the best opportunity to proceed;<sup>275</sup> and minimizing excessive street metal work including tracks, manhole covers, and grates that make an intersection even more dangerous for cyclists when wet.<sup>276</sup>

Two other considerations occasionally mentioned as ways of minimizing the dangers of flange gaps include the use of flange gap fillers and wider tires on urban bicycles. Rubberized flange fillers sit in the gap, flush with the road pavement, preventing bicycle wheels from slipping into the gap.<sup>277</sup> The weight of a streetcar using the tracks, however, would depress the filler allowing the streetcar to proceed, after which the filler springs back flush with the road surface. A rubberized flange filler is mentioned in the 2008 Portland study as not showing much success.<sup>278</sup> They wear out too quickly with the type of regular service a streetcar line would provide. It appears, however, that experiments on streetcar tracks in Zurich are showing some progress in the use of sturdier synthetic flange fillers. In an e-mail exchange with Weber Bernhard of Verkehrsbetriebe Zurich, the Zurich transit agency, he indicated that the ultimate success of the filler as the experiment proceeds depends on improving its durability and reducing its purchasing costs.<sup>279</sup>

The second consideration for minimizing the danger posed by flange gaps is the use of wider tires on city bicycles. Unlike flange gap fillers that are only in early stages of development, wider bicycle tires are readily available on the open market today. These wider tires are not so easily trapped in a flange gap. The gap measures approximately two-and-one-quarter

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275. Nat'l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264.

276. CITY OF EDINBURGH COUNCIL, *supra* note 253, at 61 app. 1.

277. Jonathan Maus, *A Few Ideas on How to Improve Streetcar Track Safety*, BIKEPORTLAND.ORG (Sept. 1, 2011), <http://bikeportland.org/2011/09/01/a-few-ideas-on-how-to-improve-streetcar-track-safety-58408>.

278. ALTA PLANNING + DESIGN, *supra* note 79, at 8.

279. E-mail from Weber Bernhard, Zentrale Dienste, Verkehrsbetriebe Zurich, to author (Dec. 21, 2015, 03:53 EST) (on file with author). A photograph of Zurich street rail with the synthetic filler can be found on TransportXtra. Andrew Forster, *Sheffield Explores Ways to Cut Cycle Accidents on Tram Lines*, TRANSPORTXTRA (June 24, 2016), <https://www.transportxtra.com/publications/local-transport-today/news/49318/sheffield-explores-ways-to-cut-cycle-accidents-on-tram-lines>.

inches,<sup>280</sup> while bicycle tires come in widths that range up to three inches and are available in sizes that fit the standard twenty-six to twenty-seven inch diameter wheel.<sup>281</sup> There are drawbacks to wider tires, including slowing the speed of a cyclist, as the Portland study noted.<sup>282</sup> For urban cyclists who regularly traverse routes that include streetcar tracks, however, it would make sense to consider installing wider tires if for no other reason than self-protection.

## VI. CONCLUSION

The planning and design recommendations that are being developed through shared experiences and discussions among planners, architects, and stakeholders are establishing the outlines of a standard of practice that promotes a compatible regime for streetcars and bicycles. These recommendations are evolving in the political arena, which is better suited than the courts for resolving competing interests and reaching mutually beneficial solutions. They are also providing guidance to transit authorities on how best to implement discretionary planning decisions so that once constructed, streetcar lines provide quality service and bicyclists are adequately protected. Such would be an important contribution in the on-going development of sustainable urban transportation for the twenty-first century.

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280. A physical measurement of a standard flange gap was taken by this author at the Heath Street streetcar station on Boston's Green Line on July 31, 2016. A high altitude visual of the station is incorporated in the Washington study. Nat'l Capital Region Transp. Planning Bd. & Transp. & Land-Use Connections, *supra* note 264, at slide 51.

281. *How Do I Find My Size?*, MOUNTAIN EQUIPMENT COOPERATIVE, <https://www.mec.ca/en/explore/how-to-choose-bike-tires> (last visited Mar. 1, 2017).

282. ALTA PLANNING + DESIGN, *supra* note 79, at 7.