Phase 1: State of the Practice

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Introduction

‘Rails-with-trails’ (RWT) is a catchall term describing any bikeway or multi-use trail, typically paved that is located on or directly adjacent to an active railroad corridor. There are about 60 such trails in 20 U.S. states today, with a total of 239 miles. (Please see Figure 1) These trails are located adjacent to rail lines ranging from a few slow-moving short haul freight trains weekly to over 100 Amtrak trains per day traveling 100 mile per hour (mi/h). Another 82 RWT are proposed or planned; if all are built, there will be rails-with-trails in 40 states. States that today have almost no rails-with-trails mileage, such as Maine and Texas, could have new rails-with-trails.

There are also hundreds of miles of rails-with-trails in Western Australia, Canada and European countries like Switzerland, Denmark, and the Netherlands.

There has been an explosion in bicycling and walking as recreational and commuter activities over the past decade. This has been fueled to a large extent by the growing interest and concerns about health and safety. Since 1991, the Federal government has provided significant amounts of funding for trails and bikeways through the Intermodal Surface Transportation Equity Act (ISTEA) and Transportation Equity Act for the 21st Century (TEA-21). Additionally, there has been a nationwide movement to convert abandoned railroad corridors to trails, led by groups such as the Rails-to-Trails Conservancy.

Communities looking to improve conditions for bicycling and walking often see rail corridors as prime opportunities. Rail corridors often offer nice scenery along rivers or canals for long stretches unbroken by intersections. When the alternative is adjacent roadways with significant automobile traffic and limited width for bicycle lanes or other improvements, rail corridors look even more attractive.
The railroad industry meanwhile is undergoing a growth in tonnage carried and consolidation of companies, and continues to serve as an efficient and important component of the private sector goods movement business. Railroads possess strategic corridors through urban and suburban areas that are virtually irreplaceable in the utility they provide. As seen in Figure 1.2, Intermodal Traffic, the movement of trailers or containers by rail and at least one other mode of transportation is the fastest growing major segment of the U.S. freight railroad industry. As cities and towns have grown around the rail corridors, the railroad industry finds its corridors increasingly used by people trespassing, resulting in accidents and costly vandalism. Operation Lifesaver has been established to educate the public about the dangers of trespassing or disregarding crossing safety equipment. Railroad labor unions have also been involved in advocating railroad-crossing safety.

A major concern for railroad companies is that adjacent trails will attract more people and bring trouble in the form of more trespassers, vandals, and liability concerns. Many rail companies actively discourage the use of adjacent space for recreational uses because of concerns about safety. Although nationwide, trespassing fatalities, injuries, and rates have dropped over the past decade, train operators deal firsthand with trespassers, reporting numerous near-misses daily even in well-signed areas. A conductor whose train kills a pedestrian or motorist, despite the almost unanimous assignment of fault to the victim, is scarred for life.

Class I, Group II and short line railroad companies (see definitions below) are private for-profit sector companies. Trail planners and coordinators often work for governmental agencies and private non-profit organizations. The
trail advocate’s perspective is that these facilities are for the benefit of all citizens, while the perspective of the railroad companies is that rail corridors are private property and anyone in the rail corridor without authorization or permission from the owner is trespassing. Most importantly, rail corridor owners bear the burden of litigation for incidents on their property. In today’s litigious society, the railroad industry has been forced to pay significant amounts for crashes with at-fault automobile drivers who have blatantly ignored gates, lights, and warning bells.

"Being on rail property is a very dangerous pastime which can and does result in injury and loss of life. Juries have and will continue to award multi-million dollar settlements to the families of those who have been hurt or killed while on railroad property despite all good efforts to protect and warn."

Stephen Wait, Wheeling Corporation

The difficulty in drafting agreements for trails in rail corridors comes in the legal wording of the lease/use agreement documents to relieve the burden of litigation from the rail corridor owner to the trail owner. Public agencies have different laws determining their legal liability and remuneration for damages.

Although lease/use agreements have been adopted in many RWT, they have not yet been tested in court. Even when the railroad transfers ownership of the adjacent right-of-way, they are still subject to trespassing, vandalism and potential liability.

In the meantime, the pressure continues to free up space adjacent to rail lines for trail usage, oftentimes pitting the railroad industry’s concerns against public agencies seeking bikeway and trails. This situation has created the need to study the issue of rails-with-trails (RWT), to determine where RWT are appropriate, “best practice” design treatments and management strategies, and ways to reduce the impacts on the railroad industry.

Definitions

CLASS I RAILROAD: A railroad with annual gross operating revenue in excess of $250 million based on 1991 dollars.

COMMUTER RAIL: Urban passenger train service for short distance travel between a central city and adjacent suburbs. Does not include rapid rail transit or light rail service.
COMMUTER TRAINS: Includes commuter trains and passenger trains other than elevated trains and subways. Includes local and commuter train service. Does not include intercity service by Amtrak.

DEPARTMENT OF TRANSPORTATION: Established by an act of congress in 1966, the US Department of Transportation works to build a safe transportation system. The DOT includes the Federal Highway Administration, Federal Railroad Administration, Federal Transit Administration and the Surface Transportation Board.

EXCURSION TRAINS: Generally a private enterprise catering to the leisure or tourism market, such as dinner trains or tourist trains to a historical destination.

FEDERAL HIGHWAY ADMINISTRATION: The Federal Highway Administration (FHWA) coordinates highway transportation programs in cooperation with states and other partners to enhance the country's safety, economic vitality, quality of life, and the environment. Major program areas include the Federal-Aid Highway Program, which provides federal financial assistance to the States to construct and improve the National Highway System, urban and rural roads, and bridges.

FEDERAL RAILROAD ADMINISTRATION: The Federal Railroad Administration (FRA) promotes safe and environmentally sound rail transportation. With the responsibility of ensuring railroad safety throughout the nation, the FRA employs safety inspectors to monitor railroad compliance with federally mandated safety standards including track maintenance, inspection standards and operating practices. The FRA conducts research and development tests to evaluate projects in support of its safety mission and to enhance the railroad system as a national transportation resource. FRA also administers public education campaigns on highway-rail grade crossing safety and the danger of trespassing on rail property.

FEDERAL TRANSIT ADMINISTRATION: The Federal Transit Administration (FTA) assists in developing improved mass transportation system for cities and communities nationwide. Through its grant programs, FTA helps plan, build, and operate transit systems with convenience, cost and accessibility in mind.

GROUP II RAILROAD: Railroads excluding class I with an annual accumulation of over 400,000 employee hours worked.

LIGHT DENSITY RAILROAD: Railroads with 1200 or less train miles per road mile.
LIGHT RAIL: A street car type vehicle operated on city streets, semi-exclusive rights of way, or exclusive rights-of-way. Service may be provided by step entry or by level boarding.

RAIL-TRAIL: Usually refers to a trail developed on an abandoned or converted railroad line, where there is no active rail service.

RAIL-WITH-TRAIL (RWT): Any bikeway or multi-use trail (typically paved) that is located on or directly adjacent to an active railroad corridor.

SHORT LINE RAILROADS: Those railroads that do not meet Class One or Group Two Railroad criteria.

SURFACE TRANSPORTATION BOARD: The Surface Transportation Board (STB) is an independent, bipartisan, adjudicatory body organizationally housed within the DOT. It is responsible for the economic regulation of interstate surface transportation, primarily railroads, within the United States. The STB's mission is to ensure that competitive, efficient, and safe transportation services are provided to meet the needs of shippers, receivers, and consumers.

TRANSIT RAILROAD: (Also known as rapid rail, rapid transit rail, transit mode, transit railway.) Includes heavy and light transit rail. Exclusive rights-of-way, multi car trains, high-speed rapid acceleration, sophisticated signaling, and high platform loading characterize heavy transit rail. Also known as subway, elevated railway or metropolitan railway (metro). Light transit rail may be exclusive or shared rights-of-way, high or low platform loading, multi car trains or single cars, automated or manually operated. In general usage light rail includes trolley cars, streetcars and tramways.

Overview of RR Industry trends

From the railroad industry perspective, safety is traditionally thought of as passenger, community and crew safety. Trespassing is rarely discussed. At the 1995 National Highway-Rail Grade Crossing Safety Conference, Bruce George of the FRA had this to say. "We talk about the safe operations of trains across our nation and through communities. The FRA's traditional role in crossing safety is to address these functions with regulations and inspections and five specific disciplines: track, signal, operating practices, motive..."
power and equipment, and finally hazardous materials. Neither crossing safety nor trespass prevention has been included in the past. However, that is changing.

In 1998, there were 3500 railroad-related accidents and over 400 deaths in the U.S. Over 900 trespassing injuries and fatalities were also recorded. (See Figures 1.3 and 1.4 Trespasser Casualty Rates).

In his report to the 1995 National Highway-Rail Grade crossing Safety Conference, Stephen Jennings said that his research on trespasser demographics did not produce a singular profile of a trespasser. The only thing they had in common was that they were on railroad property or equipment without official authorization.

Through his research, Jennings found some regional differences in reported trespassing incidents. In the West, close to the borders, railroads reported consistent problems with undocumented aliens. In addition, trespassers were reported to be drug users, recreational groups, hoboes, Native Americans, and a variety of non-English speaking groups. In the Midwest, the typical trespassers were sports spectators, rail buffs, hunters, students, and the homeless. In the Southwest, reported trespassers were undocumented aliens, substance abusers, recreational groups, hoboes and a variety of non-English speaking individuals. However, in the East, the primary trespasser was youth because of the close proximity to

![Graph: Trespasser Casualty Rate, Jan - Dec (1991-1999)]

Figure: 1.3 Trespasser Casualty Rates
schools and shopping centers and the desirability of railroad property as a place to congregate and party. Other reported trespassers were sportsmen such as hunters, fishermen, snowmobilers, and cyclists. Along with substance abuse, suicides were reported.

Figure: 1.4 Trespassing Casualties

Because of this diversity, a "one size fits all" solution is not going to be effective says Jennings. There are numerous treatments used by railroad companies to deter trespassing such as education programs, selective fencing, cactus and K-9 patrolling. The Santa Fe and Norfolk Southern police departments have adopted "zero tolerance" policies for trespassing and have implemented comprehensive trespass abatement programs. While most states have trespassing laws for private property owners, only 32 states have trespassing laws with specific legal language for railroad property. And of those only a handful prescribed a punishment for trespassing on railroad property and equipment. Jennings further suggested that the laws in many states are not strong enough to prevent trespassing on railroad property. With this in mind, it is understandable why railroad companies are reluctant to support the idea of inviting thousands of people to walk and bicycle in close proximity to their property.

Background of the report

The impetus for this study is a direct result of numerous public agencies seeking to develop bikeways along active railroads, and the resulting frustration on both sides of the issue. The genesis for an 1997 ITE Report began when the Coastal Rail Trail in San Diego County, a 44-mile proposed bikeway along the San Diego Northern railway between San Diego and Oceanside, received Federal funding to
develop plans and designs for a facility to be constructed within the rail right-of-way. The high-speed railroad corridor carried over 30 passenger trains and six freight trains per day under public agency ownership, the North County Transit District (NCTD). In the Project Feasibility process, NCTD raised specific questions about liability which resulted in an extensive analysis being conducted by the Rails-to-Trails Conservancy. One of the conclusions was that, in order to limit liability, the bikeway should conform to accepted standards for crossings, fencing, setbacks, and other items. Unfortunately, few such standards existed.

Appeals to the California Public Utilities Commission (CPUC) and Caltrans to provide guidelines eventually ended up getting the attention of the Federal Railroad Administration (FRA). The FRA held a conference in early 1997 in Washington, D.C. to discuss the matter. The conference was attended by representatives from the railroad industry, Federal agencies, and state and local agencies. Most attendees of that conference had little interest in developing any firm standards or guidelines which could be interpreted as an endorsement of the concept of Rails-with-trails, but rather to develop a ‘best practices’ study which reviewed existing facilities and drew conclusions from their operations.

The Institute of Transportation Engineers agreed to sponsor this Best Practices Informational Report in mid-1997. Due to cost and time to develop hard data on subjects such as trespassing, it was apparent that a more in-depth study of the issue is needed. In 1999 the Federal Railroad Administration (FRA) and Federal Highways Administration (FHWA) decided to join forces to develop this Best Practices Report to help study the existing trails and guide the planning process for upcoming trails.

**Current RWT Process**

The current RWT process varies from location to location, although there are common elements. It is not unusual, for example, for a public agency to identify a RWT as part of a bikeway master plan and secure public and agency approvals and funding prior to initiating contact with a railroad on whose property the RWT is proposed.

When a public agency seeks some type of preliminary approval or review of a RWT project, there may not be an established review and approval process within railroad companies that is easily
accessed and can provide responses in a reasonable time. As more public agencies seek to determine the feasibility of RWT, the number of requests to private railroads and public railroad agencies continues to increase, consuming time and energy on a proposition that—in many cases—may not to provide any direct benefit or run counter to company policy. While rails-with-trails are occasionally approved quickly (usually when the railroad has little choice because they do not own the land), many more are outright rejected or involve a long and involved review process. Public agencies and railroads may spend large amounts of time attempting to define, analyze, and respond to RWT proposals.

It is not possible to draw any firm conclusions about why and how a railroad may respond to an individual RWT request, although it is reasonable to assume that past approvals do not guarantee future approvals, and that a railroad may have a myriad of reasons why it approves of a RWT in one location and not in another. It is safe to conclude that, while they may approve of a RWT occasionally under specific conditions, railroads do not want to set a precedent whereby public agencies start considering RWTs as viable options under all conditions. A consistent response from railroads are that operating right-of-way is primarily intended for active railroad use and is not suitable, except under limited situations, for access by the general public.

Data Collection

In the summer of 2000, a team of researchers set out across the country to analyze a series of case studies of rails-with-trails. The case study locations, shown in figure 3 on the following page, were selected to be as geographically diverse as possible, and include trails in Washington, Oregon, California, Texas, Georgia, Michigan, Wisconsin, Pennsylvania, Delaware, Rhode Island, Vermont and Maine. Half the trails exist already; the other half are in the planning stages and are expected to be built by Fall 2001. Case study researchers plan to follow-up on the planned trails once they are built to analyze before and after conditions related to trespassing, accidents, vandalism and other issues.

For each trail, researchers conducted a series of interviews with railroad officials, trail managers, and law enforcement officials. They also gathered objective data about before and after conditions related to safety, trespassing, vandalism, and conflicts. These case studies—summarized in Section II—help offer guidance as to the best practices in developing and operating rails-with-trails.

Additional case study research was done as part of the draft ITE Rails-with-Trails Technical Committee paper, “Rails-with-Trails: A Best Practices Informational Report (May, 1999),” which also included a series of case studies. These case studies are also summarized in Section II. Furthermore, the Rails-to-Trails Conservancy gathered information about the design of all 61 existing U.S. trails. This information is contained in their compendium document, “Rails-with-Trails:
Sharing Corridors for Transportation and Recreation” (update forthcoming, Fall 2000).

Further research comes from an analysis of existing literature, as summarized in Section I. International research looked at experience from European countries, western Australian rails-with-trails\(^1\) and initial research from Canada as provided by the Canadian Pacific Railways\(^2\). All these places have an extensive network of rails-with-trails.

Finally, team members also researched various other aspects of rails-with-trails, including:

- Relevant laws and statutes, their effectiveness, and transferability;
- Ownership/use arrangements;
- Educational efforts underway through surveys of railroad officials, trail managers, and Operation Lifesaver instructors;
- Railroad company policies toward rails-with-trails through a telephone survey;
- Operations and maintenance issues through interviews with train engineers and operations personnel; and
- Analysis of current design practices.

**Intent**

The status quo condition can result in an inefficient use of time and resources for both the private railroads and public agencies seeking rails-with-trails, as each new project attempts to answer questions about design, operations, and liability starting from square one. The intent of this report is to offer recommendations as to the “best practices” in the development, construction, and operation of rails-with-trails, so that railroad companies, trail developers, and others can benefit from the history of trails in existence today. The intent is also to offer a neutral and balanced position on the issue that takes into consideration the perspectives of

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\(^1\) Rails-with-Trails: The Western Australian Experience,” Transplan Pty, Ltd., Western Australia, August 2, 2000.

railroad industry as well as trail planners, law enforcement officials, and trail users.

Elliot Bay Rail Trail. Seattle, WA

Contents

The report is divided into the following sections:

- Literature Review Summary (Section I)
- RWT: State of the Practice (Section II), which includes summarized info from 18 case studies of rails-with-trails throughout the U.S.
- Section III focuses on best practices in the areas of process, including trail feasibility and selection, planning and policy.
- Section IV deals with best practices in legal issues, liability, insurance, and legislation.
- Section V offers best practices in trail design, including setback, separation techniques, signage, etc.
- Section VI provides information about operational aspects, including maintenance, outreach and education, and enforcement.
- Appendices include the Case Study Data (A), and Model Documents (B), including easement agreements, indemnification, and recommended state and local statutes.
Section I

Literature Review Summary

Introduction

The development of background research for this project has focused on five areas:

- Rail-with-trail studies;
- Specific studies of rail-with-trail projects in the United States;
- A legal analysis of the issues and cases which have defined the relationships between railroads, adjacent property owners, the public and trail managers;
- The development of technologies to monitor trespass activity along active rail lines; and
- Information on the state of rail-with-trail practice in Europe and elsewhere.

As trails within active rail lines represent a relatively new concept, most of the research relating to existing practices and facilities has been conducted within the past five years on a relatively small number of facilities. The principles of rail-trail development, the legal issues associated with public access to railroad properties, and the development of strategies and devices to protect these rights of way have been developed over many decades of diligent practice by railroads, public agencies and the legal system.

The following summary concentrates on those research findings with the most immediate application to rails-with-trails. The technical addendum for this study includes the complete literature review as applied to legal precedents and emerging railroad property management practices.
Rail-With-Trail Studies

One of the most significant discussions to date on the topic of RWT occurred at a 1998 conference on railroad safety: “A Working Outline of the Major Issues Related to Multi-Use Recreational Trails Located Near Active Rail Lines, A Work in Progress of the Rails-with-Trails Task Force Initiated at the Pre-Conference Meeting First Annual International Trails and Greenways Conference”, Carolyn Cook, (former Program Director, Crossing Safety, Railroad Commission of Texas, current Assistant Crossing and Trespass Prevention Regional Manager, Federal Railroad Administration).

This document was prepared for the 1998 International Trails & Greenways Conference in San Diego as part of an all-day roundtable discussion between trails groups and the railroad industry. Key aspects of the presentation included liability issues, planning process, design issues, highway crossings, illegal crossing and trespassing issues, security, crime, and vandalism concerns, safety and education issues, rails-with-trails co-existing with railroad operations and management, and trail operations and management,

Frequently cited by proponents of rails-with-trails, “Rails-with-Trail: Sharing Corridors for Transportation and Recreation” published by the Rails-to-Trails Conservancy/National Park Service in 1997 lists 49 existing Rails-with-trails and provides detailed information on the physical and operating characteristics of the facilities. (Note: an updated 2000 version of this study with data on all 61 existing trails will be available in the fall of 2000.)

The study summary states that trails are compatible with active railroads, even high-speed and high-density mainline tracks. “Proximity to a highly active, high-speed rail line does not necessarily require greater separation between the tracks and rail. RTC’s findings include a few successful examples of trails residing close to mainlines.”

Steven Wait examines the perspective of the railroads themselves more closely in the Wheeling Corporation’s “Rails with Trails”.

This 1998 report was privately produced and distributed by the Wheeling Corporation, parent company of the Wheeling & Lake Erie Railway Company and the Akron Barberton Cluster Railway. The report presents a summary of the problems facing railroads including vandalism,
trespassing, injuries, and fatalities. The report details efforts by Operation Lifesaver and the railroad's own safety procedures that are required because of the unforgiving nature of railroad operations.

The report outlines the circumstances under which the Wheeling Corporation will consider a trail, which are explained in more detail in Section III. These include issues related to train speed and function; property availability; proper trail separation; suitable statutory scheme and liability insurance; property compensation; clearly defined operations and maintenance responsibility falling on the trail operator.

**Individual Studies and Master Plans**

With respect to individual studies and master plans for RWT projects, very little has been written on safety and trespassing issues. For several reasons, finding written documentation on RWT safety on individual projects is quite difficult:

- Written literature is usually prepared before the trail is built, in the form of a master plan report and/or a written agreement between the railroad and the trail developer/manager. A considerable percentage of trails are built, however, with no written master plan. For the trails that do have master plan reports, these reports often do not cover or only briefly touch on safety issues related to the adjacent active line. After the trail has been built there is scarce documentation of safety issues.

- For projects that were built more than four or five years ago, master plan copies are scarce and often the people who conducted the master plan are difficult to find, having turned over the management of the trail to other organizations or individuals.

For these reasons, the literature search is concentrated on a sampling of more recent RWT projects that were built later than 1995.

**Three Rivers Heritage Trail Master Plan (Baldwin Borough Segment)- PA**

The Three Rivers Heritage Trail - Baldwin Borough Segment is a four kilometer (2.5-mile) RWT in Pittsburgh, PA that has not yet been constructed. The railroad company is CSX, and this is a freight line that carries at least one train per day at about 65-80 kph (40 to 50 mph). CSX was very concerned about liability and trespassing during the negotiations for this trail, and therefore stipulated a number of design requirements as part of their agreement to grant right-of-way to the Friends of the Riverfront.
The Master Plan for the Three Rivers Heritage Trail - Baldwin Borough Segment (October 1999 Draft) makes the following statements about the particular RWT safety issues associated with this trail:

There two central issues related to the shared use of this corridor between the active railroad and the multi-use trail:

- Maintaining access for railroad maintenance: an access road that is separate from the trail will be built by CSX for maintenance of the rail line and the utilities that share the corridor. During the design phase, it will be important to ensure that access to the trail vs. access to the private maintenance road is clearly separated and delineated, so that there is no confusion about which facility the public should use.

- Security of the railroad property: the presence of the trail will attract more users to the area, and with this increase in activity comes the possibility of increasing instances of trespassing on railroad property. In order to ensure that this does not occur, a 1.8m (six foot) high chain link fence will be placed between the trail and the active rail line.

Five Star Trail (PA) - Terms of Agreement with Railroad

The construction plan for the Five Star Trail details a number of safety features that were part of the right-of-way agreement between the Rail Trail Council (RTC) and Southwestern Pennsylvania Railroad (SPRR). The Five Star Trail is a 6.4 km (4 mi) RWT that links Youngwood to Greensburg, PA. This is a freight line that carries two trains per day (southern section) at a speed of approximately 32 kph (20 mph). The Five Star Trail was expected to eliminate the problems that were previously occurring because of an unofficial jogging/walking trail that had criss-crossed the active tracks in many places, and which was only three to four feet away from the active rail.

A Regional Trail Corporation was developed to design, construct and maintain the trail, and the bylaws of the organization state that part of its purpose is to "maintain good relations and communications with the Westmoreland County Industrial Development Corporation (WIDC), and the Southwestern PA Railroad, and to satisfy the requirements of the right-of-way entry agreement between the RTC and the WIDC and SPRR."

The construction plan describes the following safety features for this RWT:

- Parking areas were located on the same side of the tracks as the trail, eliminating the need for people to cross the tracks to access the trail.
- The trail was constructed on one side of the rails, with no crossings.
The minimum distance between the active rail and the trail is 1.95m (6.5 ft), but wherever physically possible, the trail was located further from the tracks.

An area of rock ballast and vegetation is maintained between the trail and tracks.

A 1.35m (54 in) tall fence was placed between the active rail and the trail in a few locations where the space was severely constrained (less than 3m/10 ft of buffer space available).

Markers were placed every 60m (200 feet) between the track and trail that explain rules and regulations.

The construction plan also notes that the proposed trail improvements to the corridor were very beneficial to the railroad, because it had been poorly maintained for many years. The RTC removed over 90.9 metric tons (100 US tons) of trash from the corridor, improved drainage conditions and continues to maintain the vegetation in the corridor.

**Silver Creek Bike Trail (MN) 1993**

The Silver Creek Bike Trail is a 2.08 km (1.3 mi) RWT in Rochester, Minnesota. The railroad company is DM&E Railroad. This is a freight line that carries two trains per day. The Enhancement funding application to Minnesota Department of Transportation for this project described the safety measures that had been agreed upon by the City and DM&E Railroad. The rail right-of-way is 30 m (100 ft) wide with the rails in the center of the ROW. DM&E required a minimum 2.4 m (8 ft) setback from the edge of the tracks to the edge of the trail, with no signs or other obstructions in that space, however, for most of the length the trail is set back approximately 9m (30 ft) without constructed barriers.

The Application also describes the agreements made with the rail company for two at-grade crossings and one below grade crossing (through an existing drainage culvert). The new at-grade crossings were not a great safety issue, because of the slow speed of the trains (less than 16km/10 mph) and the good visibility, therefore no control measures were installed at these locations. According to the project contact, there have been no safety problems with this facility since its installation five years ago.

**West Orange Rail-Trail Master Plan**

The West Orange Trail in Winter Garden, FL extends along an active railroad for just under a mile of its 8.8 km (5.5 mi) length. This section of trail is in downtown Winter Garden. The railroad is CSX, and this particular line is a freight
line that carries one train per day at a very slow speed (approximately 8 kph/5 mph).

The Master Plan for the West Orange Trail describes the design features that were agreed upon between CSX and Orange County. CSX granted an easement for trail construction (less than one mile of the trail extends along an active rail line). Since the trains move very slowly through downtown Winter Garden (8 kph/5 mph), they agreed on a low, 1.2 m (4 ft) tall chain link fence between the trail and the tracks. The minimum setback from the track to the edge of the trail is 2.4 m (8 ft) as mandated by Florida statute.

**Liability of Rails-with-Trails**

This review of the applicable legal research material addresses the liability issues raised by locating a trail alongside an active rails line (Rails-with-Trails or RWT). Because RWT are a recent development in trail design, there is limited legal authority directly on this subject. Thus, this literature review has been developed to include articles and publications whose subjects are considered analogous to RWT or otherwise contribute to the analysis of these legal issues.

The 1997 report "Coastal Rail Trail: Project Study Report" includes a review of the liability issues associated with rails-with-trails under California law. The review is part of a report on the Coastal Rail Trail in San Diego, California, and includes an analysis of the legal liability for governments operating the trails, the railroads, as well as adjacent property owners. The review analyzes the impact of the California Torts Claims Act and California's recreational use statute on the issue of liability.

The liability of the governments will be limited with regard to RWT by general governmental immunities. In addition, the operators, railroads, and adjacent property owners will be protected from liability in most cases by recreational use statutes.

Because the article is limited to California law, it therefore does not necessarily reflect or predict how liability issues will be resolved in other states.
In “Secrets of Successful Rail-Trails”, (Rails-to-Trails Conservancy, 1993), the Rails to Trails Conservancy published what was presented as a manual for converting rails into trails. Included in the manual are discussions on the liability associated with rails-to-trails and building trails next to an active rail line. With regard to the liability of rail-to-trails, the manual discusses the fact that most trails are owned or operated by local governments and the risks associated with the trail are covered by the government’s insurance program. There are, however, cases where a private rails-to-trails organization has been put out of business by the cost of insurance and/or a claim against the organization, according to the discussion. The importance of design safety in trail construction is also discussed. As for building trails next to active rail lines, the manual discusses how this has proven to be a successful option, which has not resulted in significant safety incidents or liability problems.

The conclusion of the manual is that liability is not a significant factor for rails-to-trails due to government ownership of trails, due to recreational use statutes that protect adjacent land owners, design safety for trails, and the general nature of trail use.

In a 1997 article from Public Management magazine titled “Putting Value on Rail-Trails”, B.M. Howser writes of the economic and environmental benefits to be gained from rails-to-trails and lists several specific examples. Additionally, she mentions a point of contention between landowners and trail advocates over land use. The contention was invoked by an amendment to the National Trails Systems Act that authorizes the Interstate Commerce Commission (ICC) to “bank” rail corridors for possible future railroad use. The landowners would have preferred to have the land revert back to their ownership. She concludes that studies have found that landowners are ultimately happier—both aesthetically and economically—with the trail present.

One important issue raised by the author is that of railbanking or the potential to restart a rail line if it is economically viable. The second important issue is the potential opposition from landowners and the initial discourse between landowners who own reversionary rights along the right of way and trail planners. These issues are relevant to rails-with-trails because planners must understand future plans of railroads. Not only can rail lines be banked, but lines can be upgraded and expanded to double tracks.

**Innovative Technological and Operational Improvements**

Individual railroads, state and federal governments are constantly engaged in efforts to increase safety along rail rights of way. While these efforts to date have not been focused specifically on the presence of trails within rail corridors, the goal of improving safety and security next to trains has been a constant concern.
The individual railroads have spent considerable time and effort in the development of monitoring technologies to control trespass activity along their properties. The Burlington Northern Santa Fe Railroad reported in BNSF Today (1999) of efforts to develop and implement a remote monitoring system for rail crossings that would be combined with an in-cab video system to record activity on tracks. These systems would record location using GPS technology and record the dynamics of the train (braking, whistles, lights) to develop information on trespass. Such technology has application in the pre and post-construction monitoring of trespass activity along RWT corridors.

BNSF has also been active in establishing new relationships with local and state government in cooperative efforts to control trespass activity through the establishment of a Trespasser Abatement Program of actively security intervention and a Safety Assurance Compliance Program that emphasizes efforts with local communities to educate citizens of the risks and consequences of rail trespass.

A significant effort to study and apply lessons from trespass injuries is represented by a study from the Centers for Disease Control, Mortality and Morbidity Weekly Report, "Injuries Among Railroad Trespassers in Georgia, 1990 – 1996" (July 1999).

This report summarizes a study of fatal and nonfatal injuries to railroad trespassers in Georgia from 1990 through 1996. In accordance with the reporting practices of the Federal Railroad Administration, an injury to a railroad trespasser was defined as the unintentional injury of any person whose presence on railroad property was prohibited by law in Georgia during 1990-1996. Data on trespasser injuries was provided by the 17 railroad companies operating in the State. Additional information was obtained from the State medical examiner, county medical examiners and coroners, the Georgia Center for Health Information, the Georgia Bureau of Investigation, the Federal Railroad Administration, and newspaper reports.

The findings of this report support those of previous studies that found most injuries to railroad trespassers involved men aged 20-49 years, many of whom were intoxicated. Few trespassers were attempting to use trains for transportation; most trespassers were either walking or socializing near the tracks at the time of injury. In many incidents, trespassers apparently did not hear the train horn or misjudged the speed or location of the train; this last problem appears to be more common when a train is approaching on one of multiple parallel sets of tracks.

Although the number of deaths from motor-vehicle collisions with trains at highway rail crossings has decreased, deaths among trespassers have increased. The decline in deaths at highway rail crossings probably resulted from multiple
factors such as education efforts and engineering changes. Efforts to prevent trespasser deaths have received less attention, and the target audience (adult males who abuse alcohol) may be difficult to reach.

This study is very useful in understanding the characteristics of railroad trespassing incidents in a State like Georgia. For rails-with-trails analyses, similar studies can identify what types of trespassers are likely to be involved, what types of injuries are expected, which railroad properties, operating characteristics and locations (urban or rural settings) are at high risk, how the incidents can be mitigated, and what types of actions, measures, and technologies can be employed by the railroads, the government, and the community to enhance the safety of rails-with-trails.

The Federal Government has focused considerable energy in the conspicuity of locomotives and rail cars through research into lighting and reflectivity. The USDOT and the Federal Railroad Administration in 1994 (USDOT, Federal Railroad Administration "Rail-Highway Crossing Safety Action Plan Support and Proposals") reviewed the effectiveness of these strategies to improve safety at grade crossings. While the findings at that time were mixed (due to concerns over cost and maintenance responsibility) many of these practices are now coming into practice. One practice found cost-effective was increased illumination of the at-grade crossings themselves.

**International Rail-with-Trail Research**

There is an extensive network of rail-trails throughout Europe. According to Juerg Schopp, President of the Swiss Cycling Federation and Board Member of the European Cyclists’ Federation, "There are no studies on problems of trails along rail lines, because European railways do not see a problem."

RWT along train tracks are very popular in Switzerland and there are some famous hiking trails along the Gotthard and Lütschberg railroads. The BLS-Lütschberg Railway produces a series of brochures for their adjacent BLS-Adventure Trail that provides a
point-by-point historic tour of all the features of the railway. Other railroads that have adjacent trails include the federally-owned Swiss Federal Railways SBB and the privately-owned Rhaetian Railways RhB.

Switzerland’s nine new national bike routes always start and end at train stations. Swiss Federal Railways SBB is a member of the Foundation Bike Country Switzerland and promotes the benefits of combining bikes and public transport.

In Denmark, the "Kystbanestien", a popular cycling "track" from Klampenborg north of Copenhagen and further up north, is close to the railway for several kilometers. Another rail-with-trail is a path used mostly for bicycle commuting that is east of Roskilde connecting to the center of the city. Both paths are lit at night. Data was not available on either trail.

Further international research yielded a study of Western Australian rails-with-trails, (commissioned for this study), which lays out the specific conditions governing the developing of rails-with-trails in Perth. The plan is to develop rails-with-trails along all their active rail lines. Since there is only one railroad company—Westrail—the challenge of meeting needs and reducing concerns is easier. “Rails-with-Trails: The Western Australian Experience,” (2000) notes that all rails-with-trails are to be separated by fencing with barbed wire strands on top, that all grade crossings are to be carefully designed, and that the existing system of trails has been very successful.

In “Problem Analysis Report: Recreational Trail Use,” (2000) the Canadian Pacific Railway Police Service Community Services Unit, lays out a series of issues to be discussed as part of their effort to develop a company-wide policy on rails-with-trails. Issues include the typical concerns about trespassing, accidents, vandalism, and liability. Data was collected through a survey of various field offices; many have experience with rails-with-trails, although it is not formally known how many rails-with-trails exist in Canada.
Section II

State of the Practice: Case Studies

This section provides summaries of 21 rail-with-trail case studies dispersed throughout the U.S., (please see Figure 2.1). Specific information relating to process, legal issues, design, and operations, maintenance, and education and enforcement are contained in the relevant section.

Overview of Findings

RWT projects should involve the railroads, law enforcement officials and other stakeholders from the outset. Although most current processes do involve the railroads, they are still often contentious and difficult.

RWT are not appropriate in every situation, and railroad companies know best their trouble spots, operation, and maintenance issues. With proper involvement, railroad companies can actually in many cases benefit from RWT, by requiring design features that may help reduce existing trespassing problems. These features include good separation (distance, grade, vegetation, or fencing), well-defined and designed crossings, and signing. However, where these features are not present, RWT can cause undue burden on the railroads in the form of increased trespassing and safety risks.

Few trespassers on existing trails were observed, and typically only on trails without fencing to separate trail from rail. On planned trails, observed trespassing was more common, with the most serious conditions along the proposed Coastal Rail-Trail in California near Del Mar and Encinitas (155 trespassers observed over the course of two hours.) In all, most trespassers (58 percent) were crossing the track to access water (ocean or river) for surfing, fishing and other recreational activity (see Figure 2.2). The remainder was observed walking along the rail. Very few were actually on the rail line. Researchers observed that 44 percent of the activity seemed to be unrelated to the planned trail, while about 32 percent may be activity that can be curtailed by trail installation (see Figure 2.3). The majority of trespassers observed were judged to be less than 20 years of age (54 percent) (see Figure 2.4) and male (68 percent) (see Figure 2.5). More than three quarters (77 percent) were pedestrians, with the remainder split between joggers, bicyclists, and other (see Figure 2.6).

Education and enforcement play a role on several trails. Railroads are often compensated financially and relieved of liability through the proper arrangements.
Case Studies
Rails-with-Trails, 2000

- Existing RWT Facility
- Planned RWT Facility

Altair
Figure 2.2

Case Studies:
Type of Trespassing by Percentage of Incidents, 2000

- Unknown or no response: 2%
- Walking across rail: 58%
- Walking on rail: 2%
- Walking along rail: 38%

Figure 2.3

Case Studies: "Is Trespassing Related to Planned Trail?"
Percentage of Observed Incidents, 2000

- Unknown: 24%
- Yes: 32%
- No: 44%
Figure 2.4

Case Studies:
Age of Observed Trespassers, 2000

- Over 50: 3%
- Unknown or no response: 1%
- 20-50: 42%
- Under 20: 54%

Figure 2.5

Case Studies:
Observed Gender of Trespassers, 2000

- Unknown: 2%
- Female: 30%
- Male: 68%
Figure 2.6

Case Studies: Observed Trespasser Type, 2000

- Pedestrian: 77%
- Bicyclist: 5%
- Jogger: 7%
- Other: 10%
- Unknown: 1%
Case Study Summaries

Existing Trails

The Atchinson, Topeka, and Santa Fe (ATSF) Trail
City of Irvine, County of Orange, CA

The ATSF Irvine Trail is an 11-foot wide multi-use trail within the Southern California Edison easement. The trail parallels the railway for approximately three miles. The Southern California easement is approximately 200 foot wide and the trail meanders through the easement and goes under most of the roadways. The Metropolitan Transportation Company operates 49 Metrolink and Amtrak trains and eight freight trains. The passenger trains travel at speeds up to 70 mi/h and freight trains travel about 50 mi/h.

There are only minor problems associated with the trail, mainly with the fence separating the rail and trail getting cut or cases of graffiti. Trespassing is not a problem since the trail is located in a very wide utility easement; there is no reason for people to walk along the railway. The trail has lighting on some portion of the trail for night use.

The easement is generally landscaped with trees and shrubs and some agriculture exists within the easement. A five-foot high chain link fence separates the Edison easement (and the trail) from the railway. Single family and multi family development primarily border the trail. There is no trail identification signage at the entrances to the trail, and, other than a park with little parking, there are no staging areas. The trail is highly used by local residents, mostly by joggers and pedestrians.

The trail was planned over 20 years ago and the older neighborhoods have no access to the trail other than from the major roadways. Newer neighborhoods, at the northern portion of the project, have provided access through the residential neighborhoods and have developed several mini-parks along the rail corridor. The lease agreement with the utility is renewed every five years.
Burlington Waterfront Bikeway
Burlington, Vermont

The entire Burlington Waterfront Bikeway recreational corridor is seven and half miles long while the rail-with-trail section is about two miles long. The Vermont Railway Company (VTRR) uses the tracks as a switching yard with numerous trains operating continuously throughout the day at speeds no greater than 10 mi/h.

Trespassing or other occurrences are not seen as a problem. The addition of the trail had the effect of "channelizing" pedestrian crossings down to a few known areas, compared to the situation prior to the installation of the trail. When the trail was more "informal," constant numbers of people from abutting residential properties had been crossing the tracks at random locations to get to other utilitarian destinations. There are problems with fences being cut and the City, who is in charge of maintenance, keeping up with mending the fencing and with kids jumping on rail cars in the yard.

The contract agreement includes a special requirement for the trail to include fencing. The trail side of the corridor sees hundreds of thousands of patrons per year and the old Rutland RR mainline is being reopened as a trail further north. This causeway is being upgraded and opened for trail users and will be an important component of an off road connection to Montreal in a few years. The railroad side of the corridor is embarking on an upswing as well with the coming of commuter rail to downtown Burlington only a few months away now. The freight side of the VTRR business is on the upswing as well with some new customers who transload at the yard facilities.

In 1982 the City Attorney for the City of Burlington Vermont started to negotiate with the Central Vermont Railway and Vermont Railway Company as well as the state DOT, who owns the right-of-way of the VTRR. The old Central Vermont Railway approached Union Station from the north, and the Vermont Railway
approached from the south. Agreement was finally reached between all parties and the trail was built in 1985.

Cedar Lake Trail
Minneapolis, Minnesota

The Cedar Lake Trail runs from downtown Minneapolis to the western city limits, providing connections to St. Louis Park. The trail is 3.5 miles long, with planned connections to other regional trails creating a loop of approximately 50 miles of trail.

The Minneapolis Park Board owns and operates the 25 feet wide easement and trail, which has two at-grade crossings. Maintenance is provided by the Park Board. Security is provided by the Park Board and the Minneapolis Police Department.

The adjacent tracks carry 10 to 12 trains per day, with an average speed of between 25 and 50 mi/h. Railroad maintenance has reportedly been improved by the trail by providing upgrades to the access roads. The minimum setback of the trail from the centerline of the track is 15 feet, with the average setback 25 feet. A six-foot chain link fence separates the trail and the rail at the minimum trail setback.

Security is provided by daily patrols, although the trail reportedly experiences less security problems than the surrounding area as a whole. There have been no lawsuits filed against the railroad by a trail user. Incidents of trespassing on the adjacent tracks have decreased since the trail was installed.

Columbus River Walk (Chatahoochie Trail)
Columbus, Georgia

The Columbus Riverwalk is approximately 16 miles of trail adjacent to the Chatahoochie River from the Lake Oliver Walkway to Fort Benning. This is a multi phase project: phase one and two are the river walk, while phase three is the planned acquisition and development of a trail and trolley from the river walk to Columbus State University and the Peach Tree mall with future plans to extend the trail 35 miles to Warm Springs and FDR’s “Little White House”.

Columbus River Walk (Chatahoochie Trail)
Columbus, GA
Railtex/GATX/Georgia Southwestern Railroad Company leases the tracks from Norfolk Southern Pacific. The Consolidated Government of Columbus operates the trail. Freight trains are the primary users of the tracks and run infrequently, mostly in the spring when the river is high enough so barges can bring petroleum products up to the docks for further transport by rail. The trains travel at speeds less than 10 mi/h.

Both commuter and recreational users use the trail although most uses are for recreational activities such as bicycling, in-line skating, walking, travel, tourism, travel and all other non-motorized uses. There have not been any trespassing or vandalism incidents along the rail corridor, although sometimes the restroom facilities get broken into during the winter. It was observed that the rail line was not accessible to the general public throughout Columbus city until the Peach Tree Mall and Columbus State University area. The rail line was either surrounded by fence or in between warehouses with no public access.

In the outlying areas north of downtown Columbus and south to Fort Benning it is a two-lane 10-foot wide asphalt trail. In the areas closer to the historic downtown district a cement walkway was constructed that is 10 to 12 feet wide. In the historic downtown area it is a wide promenade made of brick pavers. It has many amenities such as restrooms, benches, an amphitheater like stair case down to the river, and two areas with stairs that lead down closer to the river. These lower areas are used for fishing and wildlife viewing. Lighting is provided along the trail from the Historic Downtown area to Rotary Park. This trail connects several city parks, Memorial Stadium, the Columbus Civic Center and the Softball Complex used in the 1996 Summer Olympics for the Women’s Softball competition. The trail is lighted at night although there is not much use after 11:00 p.m.

This trail system plan has been in the Bi-State Metropolitan Planning Organization (MPO) transportation plan as a program from 1989 to 2015, which enabled them to acquire the first TEA 21 dollars in the state of Georgia. The cooperation of the two cities and two state departments of transportation through the bi-state MPO make this case study unique.

La Crosse River State Trail
La Crosse, Wisconsin

The La Crosse River State Trail serves as a 21-mile connector between two better known State of Wisconsin trails, the Elroy–Sparta and the Great River Trails. The state owns the railroad right-of-way. Trains, including freight and Amtrak passenger lines, are fairly frequent.
The trail is lightly used relative to the other area trails, despite the fact that it is exceptionally beautiful. It goes through a marsh in La Crosse filled with water lilies, other aquatic plants, birds, and other wildlife. Closer to Sparta is an impressive prairie restoration project with many flowering prairie plants and wonderful shiny leafed burr oaks. The trail passes through several small towns within which are local bars and restaurants that seem to welcome cyclists.

Riding alongside a freight train on the La Crosse River State RWT. La Crosse, Wisconsin

The trail is well separated from the rail line for most of its length. Marshland, grass filled ditches and large swathes of prairie separate the two by approximately 100 feet or more. The trail is closer to the rail in Sparta but the only significant trespassing reported or observed came from non-trail related activities. One hazard observed was repeated gate jumping as drivers waited briefly for the train and then decided to drive around the gate. In the past trail users trespassed on the rails when moving between the Great River and the La Crosse River trails. This was solved with the addition of an overpass with signing and paths that clearly direct users to the other trail. The problems that exist on the trail seem to be those common to all the trails in this area: minor vandalism and some motorized trespassing on the trail. A special agreement in the contract allows the state to install fencing for adjacent landowners outside of the right or way for those who request it; the landowners, however, must sign an agreement to maintain the fence for twenty years.

The process to build the trail appears straightforward. The trail was surfaced and signed twelve years after the state purchased the right-of-way in 1978.

Lehigh River Gorge Trail
Jim Thorpe, Pennsylvania

The entire length of the trail is 25 miles long, with the southern six miles being a rail-with-trail facility. The Reading and Northern Railroad Company operates two to six freight trains on the tracks at speeds between 25 to 40 mi/h.
There was easy access to the area adjacent to the tracks prior to the trail being designated. The area used for the trail previously served as an access road to the railroad and facilitated illegal dumping. Since the trail has been established the illegal dumping has ceased. There have been no reported incidents between people trespassing and trains that have resulted in injuries. However, the railroad officials noted that there have been some close calls in areas of the trail adjacent to the tracks and have expressed concerns that trespassing is a problem along the trail.

The trail has a crushed stone surface and is generally 10 feet in width, with a few areas that are wider. The railroad tracks are as close as five feet to the edge of the trail, but there is generally about 10 to 15 feet of separation. Additionally, for about half the length of the trail there is five to eight feet of grade separation between the tracks and the adjacent trail, where the tracks are above the trail.

A lesson to be learned from this trail, which is a busy recreational facility, is to work with outfitters and bike rental agents to see that people renting bikes for use on the trail are aware of the rail-with-trail and the rules and precautions that need to be used in the corridor.

Mission City Trail
City of San Fernando, California

This one-mile multi-use trail traverses through the City of San Fernando, located in the northern portion of Los Angeles County. The Metropolitan Transportation Authority runs 26 Metrolink passenger trains traveling at 70 mi/h and five to six freight trains at 50 mi/h, and the number of trains is expected to increase.
The trail is a concrete pathway, eight foot wide with one-foot shoulders, that meanders within a 20-foot portion of the right-of-way along the eastern edge of the railway. It connects to the Metrolink station within the City of Los Angeles. The trail is separated from the railway by a six-foot high welded wire mesh fence and is enhanced with shrubs, trees, and a monument sign. With several at-grade street crossings, the city has designed and installed self-closing stop gates to slow bicyclists prior to crossing major streets in order to avoid potential conflicts with vehicles. The trail is lighted and allows night use.

Problems with vandalism and trespassing have decreased since the trail was developed.

**Norwottuck Trail**  
**Hampshire County, Western Massachusetts**

The Norwottuck Trail, passes through the communities of Northampton, Hadley, Amherst and ending just over the border in Belchertown. In 1984, the State of Massachusetts through their Department of Environmental Management purchased the corridor for the purposes of building a RWT. It took eight years of negotiations through the teeth of virulent opposition to finally construct the trail which opened in 1993. An extension, which lies immediately adjacent to the New England Central Railroad (NECR) ex Central Vermont Railway (CV), mainline through the town of Amherst, was opened in 1997.

The trail is owned in its entirety by the state, with usage estimated at over 300,000 users a year.

There are currently two grade crossings of the railroad from roads that also intersect the trail, one protected by warning lights and bells, and the other (a semi-private grade crossing used primarily as an access road by the Town of Amherst’s Water Department) without bells, lights or barriers. The latter does have whistle markers alerting the NECR and AMTRAK engineers to sound the horn. For trail users there is no sign alerting them to the possibility of a train, though there is no attractive reason to cross.

The adjacent railroad is owned and operated by the New England Central Railroad (NECR). Also operating on this line is the AMTRAK Vermonter. The Right-of-Way (ROW) of the active railroad is 66 feet wide. There are a total of six trains a day. The 10 feet wide paved trail is setback 37 feet (center-to-center) from the adjacent tracks. There is no man-made fencing in place along the shared corridor.

The Amherst Police Department provides daily security coverage of the trail, primarily through a bike police patrol. Officer Doug Geary reported that the adjacent rail line has had no reported incidents of trespassing.
Platte River Multi-Use Trail  
Denver County, Colorado

The Platte River Multi-Use Trail, is approximately twenty years old and extends from downtown Denver along the Platte River. The trail is located along the Denver Regional Transit District's track for approximately one mile. The trail is owned and managed by the Denver Department of Parks and Recreation. There are a total of five over crossings on the trail and two at-grade crossings.

Maintenance and snow removal are provided by the Denver Parks and Recreation Department. Landscape maintenance is provided by Denver Urban Drainage and Flood Control. Security is provided by the Denver Police Department through spot checks and on a response basis.

Average train speed on the line is approximately 15 mi/h. Railroad construction and maintenance has required periodic closure of the trail. The eight to 10 feet wide concrete path is setback at least 25 feet from the centerline of the nearest track. There is no fencing between the trail and tracks.

The corridor is patrolled on a spot check and response basis. While there is no definitive number of trespassing or crime incidents, homeless activity is a notable problem in the corridor (however it is not directly related to the trail). There have been no lawsuits filed against the City or railroad as a result of the trail. Trespassing on the tracks has reportedly decreased due to the availability of the trail within the corridor.

Railroad Trail  
Gaylord, Michigan

The Railroad Trail is the first and only rail-with-trail in the State of Michigan. It is a 22-mile snowmobile trail that travels through towns and natural areas in Northern Michigan and is part of a 56-mile corridor. The Lake State Railroad operates up to five freight trains per week at speeds between 25 to 40 mi/h.
It is officially a snowmobile trail but other uses (except other motorized users) are permitted. The Railroad Trail doesn’t look much like a trail after the snow melts but occasional walkers and mountain bicyclists have been seen using the trail. In summer, the surface had reverted to grass, with some worn areas revealing the underlying sandy soil.

The railroad and the trail are between the Lake and Old Highway 27. Up to 6,000 people use the trail on the weekends. Few trespassing problems were reported; in fact, the trail has relieved problems for the railroad by up to 90 percent. Snowmobile use on the tracks has been substantially reduced and the right-of-way is cleaner. There are a few spots where one might park to access the lake from the road, which would require crossing the tracks. According to the sheriff, snowmobiles regularly cross the tracks to access the frozen lake in the winter.

A special act of the legislature was passed to officially allow this dual use. This legislation applies only to this trail and sets the terms of trail operation from December 1 through March 31. It took five to six years of negotiation with the railroad company and the legislature to establish the trail. The trail was first established on a trial basis; it was then made permanent. However, the Lake Side Railroad was not involved in the decision to go from trial to permanent status. The representative of the Lake State Railroad accepted the trail but expressed some anxiety about what might happen if a very serious accident occurred. The railroad felt that the trail’s presence did increase the railroad’s liability and that the $2 million insurance policy carried by the snowmobile club would be “irrelevant” to a claim that could result from a serious accident.

Snowmobile trails benefit from a mandatory registration fee paid when the machine is purchased and a trail fee of $10. The managing organization, Alpine Snowmobile Trails, Incorporated, receives an annual maintenance grant of $250 per mile per year from the Michigan Department of Natural Resources. The grant is a 60/40 formula and the club provides the 40 percent primarily with volunteer labor. The club has an informal agreement with the railroad to maintain the trails (trimming brush in the summer and removing debris year round).

Schuylkill River Trail
Norristown, Pennsylvania

This approximately four-mile long rail-with-trail facility, located primarily in Norristown, PA, is part of the 22-mile long Schuylkill River Trail connecting Philadelphia with Valley Forge. The Norfolk Southern Railroad Company
operates about 20 freight and commuter rail trains on the track at speeds between 20 to 40 mi/h, which operate more frequently on the weekdays.

There is some trespassing in the area adjacent to the trail, although the activity does not appear to be related to the presence of the trail. Trespassing was occurring before the trail was built. In fact, the presence of other trail users appears to prevent incidences of trespassing and vandalism.

The trail is eight to 10 feet wide and has an asphalt surface. It is used extensively for both commuting and recreation purposes, and provides a direct connection to the Norristown Transportation Center. The separation between the trail and tracks varies through the corridor, with the closet point being about 10 feet. There is a wrought iron fence between the tracks and the trail adjacent to the transit center, and a split rail fence is in place in another area where the trail is within 10 feet of the tracks.

The process for approving the trail was long and difficult. The railroad was involved in both the feasibility study and design phase of the planning process for the trail. An easement agreement with the railroad stipulated that the railroad have final approval of the trail design, specifically with fencing and distance from centerline.

**Seattle Waterfront Trail / Elliott Bay Trail**

**Seattle, Washington**

These two contiguous trails combine for a total length of approximately 6 miles. These flat trails run along the waterfront from the heart of downtown Seattle north to the Interbay area. The Burlington Northern and Santa Fe (BNSF) Railroad Company uses the tracks for passenger, freight and switching use for a total of 60 trains per day, the lightest day being Monday. Train speeds vary from 40 mi/h for...
passenger and 35 mi/h for freight trains.

The trail character can be divided into three very distinct sections: the southern third, downtown, is in very close proximity to a rail line that carries four slow moving trolleys per hour. It crosses many streets, parking lots and driveways, but the area is so congested and traffic is so slow that the result is a fairly bicycle and pedestrian-dominant environment. In this section, busy Alaskan Way is on the other side of the tracks which is lined with a long set of attractions, including water views, stores, restaurants, the Seattle Aquarium, an Imax theater, an outdoor concert pier, and both ferry and cruise ship terminals. Much of the trail traffic is tourists and downtown workers getting exercise or simply taking in the views.

The middle section is in Myrtle Edwards Park. Unlike the other sections, it is directly on the waterfront, separated into wheeled and non-wheeled paths, and surrounded by lawn, trees, landscaping and even a rose garden. It is separated from the rails by about 100 feet and a 10-foot high chain link fence. The trail surface is old, bumpy and curvy. The trail connects downtown and several neighborhoods in the northwest part of the city.

The northern section runs through the rail yards. In most parts chain link fences and rails closely bound the trail on both sides, with almost no landscaping. The path is so narrow in several points that multiple warning signs are needed to help avoid accidents between users. The trail is lighted and has night use.

Although there are not any significant problems with trespassing or vandalism, incidents with motorists hitting trolley cars and vehicles driving on the trail have occurred, but do not appear to be related to the trail. The contract agreement requires the installation of a low “indicator fence” and landscaping.

The acquisition of the rail-with-trail occurred as part of Seattle’s program to fix up the area in the late 1980s.
Planned Trails

Blackstone River Bikeway
Albion, RI

The Blackstone River Bikeway is a six mile planned trail along rails owned by the Providence and Worcester Railroad (P&WRR). Up to four diesel freight trains operate on the tracks on a daily basis at speeds up to 40 mi/h, while an additional 10 to 20 “special excursion” or “fan” trains use the tracks occasionally throughout the year.

It is expected that the trail will be used by both commuters and recreational users, and will be open to all non-motorized uses. Upwards of 1000 users per day are projected to use the trail. The trail, which travels through rural Albion, runs adjacent to the Blackstone River, which has been recently designated as a National Historic Corridor.

The rail line has an established history of trespassing, from dirt bike and ATV users, to walkers, and to illegal dumping along the tracks. The trail will have a minimum width of eighteen feet to a maximum width of 60 feet from the center of the tracks to the trail edge, averaging 25 feet over the length of the trail. A planned eight-foot chain link fence with black vinyl slats will be installed to separate the track and trail.

It took several years of negotiation with P&WRR to approve the trail, which represents the final link in a more than 30-mile project that will connect Providence, Rhode Island, with Worcester, Massachusetts. The P&WRR saw the benefit of the project as a possible means to improve operations and business opportunities in the state.

Burke-Gilman Trail Extension
Seattle, Washington

This proposed trail is an approximate four-mile extension of the existing 27 mile-long Burke-Gilman Trail, owned and managed by the City of Seattle. The Ballard Terminal Railroad runs a freight service on the tracks with approximately two to
three round trips per week at speeds no more than 10 mi/h, which are always preceded by a railroad employee on foot. The company is considering the addition of passenger services.

The trail, with an initial projected daily trail usage of 500 people per day, will be open to all users round the clock. It is almost entirely bounded by working small industry and ship-related businesses. Many sections of the rail are either in—or immediately adjacent to—busy streets while other sections are almost deserted. The extension promises to connect the existing Burke-Gilman to several very desirable destinations, including the Chittendon Locks (both a popular tourist destination and a very popular and attractive waterside park), Golden Gardens Park, Shilshole Marina, as well as many points with beautiful views of Puget Sound and the Olympic Mountains.

The railroad had a history of trespassing problems, including dumping, however those activities decreased significantly after the railroad cleaned up the surrounding areas. Averaging between 10 to 12 feet, the trail will have a nine-foot minimum distance from the track centerline to the trail’s edge. Since the trail will be adjacent to a working railroad, a three and a half foot high fence is planned for most of the trail’s length between the tracks and the trail.

The public planning process for this proposed trail has been lengthy, adversarial, and has involved over a dozen parties. Many challenges remain, such as trail design issues, where the right-of-way is especially tight.

**Coastal Rail Trail**

**Cities of Oceanside, Carlsbad, Encinitas, Solana Beach, Del Mar, San Diego, and San Diego County, CA**

This proposed 12 foot wide multi-use pathway will be located within the San Diego Northern Railway right-of-way and will traverse from Oceanside to San Diego, connecting transit stations with a paved Class I bikeway for non-motorized users for 33 miles of the total 44 mile rail corridor. Twenty-two Coaster and 26 Amtrak passenger trains—operating at speeds up to 90 mi/h—travel along the corridor on a daily basis, while five freight trains and up to 48 San Diego Trolley trains operate on a weekly basis at 50 mi/h and between 30 to 40 mi/h, respectively. Construction of the trail is expected to commence in late 2001.
The trail, owned and managed by the North County Transit District and the Metropolitan Development Board, will be open to a variety of non-motorized users, including commuter and recreational users, bicyclists, joggers, pedestrians and wheelchair users. It is estimated that there will be 28,500 daily and 7,080,000 annual users.

Running parallel to the ocean, the tracks are frequently crossed by trespassers to access the beach. The trail will be designed to include two-foot wide shoulders and will be situated 20 feet from the edge of the track. Trail users will be separated from the tracks by grade variations, vegetation, and other barriers.

The six cities joined efforts and together prepared a feasibility study, completed in January 1999. Development of the Project Study Report was a combined effort of the six cities and the two railroad companies, North County Transit District and Metropolitan Transit District who all participated in a Memorandum of Understanding. The purpose of the MOU was to cooperatively plan a trail within the active railroad right-of-way. This process has included over three years of monthly meetings.

**Cotton Belt Trail**
**Dallas, Texas**

The 10 mile long Cottonbelt Trail is a multi-phase, multi-jurisdictional trail that comprises a piece of the Dallas-Fort Worth bicycle trail system called “Veloweb”. 2.5 miles of the 10-mile path have been completed. The track, owned by the Dallas Area Rapid Transit (DART), is leased to a short line company—Fort Worth and Western—which uses the track for daily tourist excursions and for nightly dinner trips on the weekends, in addition to intermittent use by freight trains about three times per week. An ordinance by the City of Grapevine requires the trains to travel no more than 30 mi/h.
Each city involved in the project will own and manage the trail within their respective jurisdiction limits. Since it is a multiple use trail, all non-motorized uses are allowed. Both commuter and recreational uses are expected, with recreational uses being the primary use. The track is adjacent to residential areas and several large open fields.

According to the railroad, trespassing is not a problem. The trail will incorporate grade separation along the trail to separate it from the tracks, as well as maintaining 25 feet from the center of the tracks to the edge of the trail.

Although the trail was designed to parallel a highway, it was only afterwards that it was discovered that some of the trail fell in the railroad right-of-way. This mix up initiated policy changes by DART to allow for trail use in their right-of-way. The City of Grapevine has a two-year lease with option for renewal from DART. Also, because Explorer Gas Company has a pipeline under the trail a special design had to be made to enable a section of the trail to be lifted without sparks if repairs are needed on the pipeline.

Five Star Trail
Youngwood to East Huntingdon, Pennsylvania

This trail is a six-mile extension to the existing five mile long Five Star Trail. The Regional Trail Corporation manages the trail through a lease agreement with the Westmoreland County Industrial Development Corporation, who own and operate the railroad. The track currently has two trains per day on weekdays, with up to an additional four trains on weekend days of speeds no greater than 25 mi/h. Freight trains are the predominant users of the track followed by weekend excursion trains.

The trail will be a commuter and recreational trail used by bicyclists and pedestrians. Although projected daily usage is unknown, the existing trail is the third most popular recreational activity in Westmoreland County.

The trail extension will be a 10 feet wide path with a crushed limestone surface, and will have a minimum distance of 12 feet from the center of the track, with maximum separation provided whenever possible. Trespassing is a concern in the corridor where the trail extension is proposed because the area is currently is used by people on motorcycles and ATVs, leading to erosion problems in some locations.
The primary lesson learned from this trail is to establish a good working relationship between the trail managers and the railroad company. Open communication between these groups has lead to the success of the existing portion of the Five Star Trail, and provided a framework towards a successful planning process for the trail extension, which involved multiple jurisdictions.

**Kennebec River Rail-Trail**

**Kennebec, Maine**

The planned six and a half mile Kennebec River Rail Trail is owned by the Maine Department of Transportation (DOT). The Maine Coast Railroad (MCR) leases the track from the DOT, operating a daily freight train service—and an occasional passenger train—during the week at speeds no greater than 25 mi/h.

An inter-local agreement between the four towns partnering in the project has created a Board of Supervisors from each town responsible for managing the trail in their respective jurisdictions. All types of trail users, including non-motorized uses, are expected to use the trail, with activities ranging from bicycle and pedestrian use in the summer to cross country skiers in the winter. Up to 750 trips per day are projected.

The Kennebec River Rail-Trail is part of the Augusta Branch of the Maine Central Trail, and runs through rural and suburban territory. Trespassing during the winter by snowmobiles riding on the tracks is a constant problem. Most of the corridor will have grade separations where the trail will have the planned distance of 13.5 feet from track centerline to edge of the trail, with the exception of one 1000-foot section where the corridor funnels down to only 10.5 feet, at which point an eight-foot chain link fence will be installed to discourage trespassing.

The railroad company has not been supportive of the project due to a variety of concerns. The process was hindered when MCR’s president left and his replacement had little knowledge of the trail.

**North East Corridor Trail**

**Newark, Delaware**

The Northeast Corridor is a planned 1.7-mile asphalt trail in Newark, DE adjacent to Amtrak’s Northeast Corridor main line. The City of Newark, which owns some of the land and manages the trail, will lease property from the University of
Delaware for portions of the trail. Amtrak owns the railroad line—perhaps one of the busiest corridors on the east coast—operating up to 100 passenger and freight trains per day during the week at speeds over 100 mi/h, with Amtrak’s new Acela Trains expected to travel at speeds upwards of 120 mi/h. The Amtrak track is closest to the planned trail, and is shared with commuter trains operated by the Southeast Pennsylvania Transit Authority.

Situated nearby the University of Delaware, the trail is expected to serve students in addition to providing access to both commuter and recreational users, including bicyclists, in-line skaters and pedestrians. The projected daily trail usage is unknown at this time. The trail setting includes a mixture of parkland, urban and industrial land uses along the trail.

There are currently no identified problems with trespassing. With the construction of the chain link fence adjacent to the entire corridor, opportunities for trespassing should be reduced. This fence is required per the contract agreement. The minimum planned distance of 30 feet between the center of the track and edge of the trail should further discourage trespassing.

The success of this proposed trail to date is credited to an extensive and effective public process to build support for the trail. An advisory Committee was established to provide input regarding trail development, and numerous public meetings at various stages of the planning process have created strong public support for the trail.

**Springwater Corridor Extension (OMSI to Oaks Bottom)**
**Portland, Oregon**

The City of Portland plans to build the Springwater Corridor Extension project in the spring of 2001. It is approximately three miles long. The land on the corridor is owned by the Metro regional government, which bought an easement for the trail from Oregon Pacific Railroad (OPR), a freight and excursion short-line. OPR operates freight trains three times a week in winter and tourist excursion trains five times per day in the summer.
The maximum train speed is 20 mi/h.

The trail is to be managed by the City of Portland Parks Bureau. It will be a commuter and recreational trail with a projected half-million annual users. It is bounded on the west side by the Willamette River, and on the east by the tracks and relatively high-density neighborhoods, a wildlife sanctuary, and a semi-industrial district.

There is a long history of trespassing activity along the rail line in the form of recreational walking, jogging, and bicycling both along the tracks and crossing the tracks to reach the Willamette River. This activity will largely be contained on the trail due to two features: a four-foot tall chain link fence and the construction of two pedestrian undercrossings. The trail is planned to be eight and half feet from the centerline of the track to the fence, plus an additional two feet to the trail.

The trail process was contentious and difficult. Although the railroad was involved from the outset, outside mediation was required to resolve key issues.

**Three Rivers Heritage Trail**  
**Pittsburgh, Pennsylvania**

The Three Rivers Heritage Trail will be a 2.5 mile extension of an existing trail on the North side of the Monongahela River. Friends of the Riverfront own the property, which was purchased from the CSX Railroad, who retains ownership of the railroad line.

Bicyclists and skaters are expected to be the main users since access is limited to a trailhead at either end of the trail. The trail is located in an urban area in the City of Pittsburgh.

As a condition of sale of the property CSX Railroad is requiring a chain link fence to be built over the entire length of the trail with no opening or breaks in the fence allowed. The contract agreement requires that this fence be built before the trail is constructed. The adjacent rail line has a fairly high level of train traffic, but the fence will be located between at least 50 to 65 feet from the centerline of the tracks. Concerns of trespassing are generally focused on the area near Becks Run Road where many people cross the tracks to access the river for fishing.
A lesson learned from this trail is to identify all potential partners early in the planning process. The trail manager noted that he did not realize that the local water and sewer utilities would be such strong supporters of the trail because it will provide better access for their maintenance vehicles. When the utility companies became more involved in the planning and negotiation for the trail property the process started to move forward at a faster pace.
Section III

Best Practices: Process

In August 2000, researchers conducted a telephone survey of railroad officials of all the major U.S. and Canadian companies. In response to a question about the company's position or policy on RWT, many offered statements like,

> "Our position is to discourage trails of active railroad rights-of-way."
> "Do not allow trails along rights-of-way."

Most railroad companies emphasize the need to consider future expansion needs, the impacts on the railroads in terms of safety, trespassing and liability, and future changes to adjacent land uses. Many railroads mentioned that they expect an increase in future business and would prefer to retain the right-of-way for potential future rail use. Thus they are reticent to sell or lease the property for trail use because of the difficulty in returning the property to private use once the public has come to expect trail usage. Railroad companies also protest that trail planners do not understand railroad operations and promote the trail over safety and common sense.

Trail managers, on the other hand, do not understand the railroad companies' seeming unwillingness to consider such trails, particularly given the positive record of existing trails to date. They also do not understand the railroad's formal structure, and often struggle even to determine which railroad company to contact about the proposed trail, since railroad companies often lease the rail tracks to another company when it has no operations on that track. Furthermore, transit authorities, Amtrak and railroad companies are governed and regulated by different laws and administrations. The trail project planner/coordinator must become acquainted with the regulations and governing authorities of the rail line for that project, and cannot assume that all rail line corridors are governed and regulated in the same fashion.

Many rail-with-trail processes are quite contentious. In most cases, railroad companies are involved in some stage of the planning, although often not early enough for their liking.
Finding Common Ground

However, there does appear to be common ground. Several railroads agreed they would consider a RWT proposal if several conditions are met. For example, Tom Zeinz of Canadian National/Illinois Central, "The only instances where we are presently willing to cooperate in proposals to establish new trails on or adjacent to active rail lines are a) where we determine we have sufficient title and width of right-of-way that we can sell the subject property to the trail operator/sponsor, in other words, so that when all's said and done, it's not on our right-of-way; b) the operator/sponsor agrees to erect and maintain in perpetuity a substantial fence between our common rights-of-way to preclude or substantially discourage trespassing, typically in the form of a covenant in the conveyance document; c) that it does not include or require any new grade crossings; and d) if any existing crossings are involved, same be equipped with appropriate crossing warning devices at the project sponsor's expense."

Steven Wait offers another perspective in the Wheeling Corporation’s "Rails with Trails". "We at the Wheeling see many benefits of Rails with Trails within some of the communities we serve, both in economic development and enhancing the beauty of the area. With properly patrolled trails, these areas could see a dramatic decrease in trespassing, vandalism, and sabotage. And hopefully, through it all, the public will become more informed about our industry and the economic benefits of the rail carrier serving their area."

However, the Wheeling Corporation is very clear that it does not support all RWT proposals. Rather they offer a stringent set of guidelines for considering a RWT, including:

- The line in question must be a light density, low speed operation.
- The property must be available and suitable for this type of project.
- The tracks must be isolated from the trail with proper barriers.
- The statutory scheme must be compatible with joint use between trails and railroads.
- The trail operator must obtain proper property liability insurance.
> Compensation to the railroad for the use of their property either through sale or lease.
> The trail operator, not the railroad, will cover the improvements to the property, along with the insurance costs.
> The trail management and/or local parks or community groups must provide the security personnel to properly patrol and control the property.

**Steps to Evaluate the Feasibility and Safety of RWT**

Currently there is no standard process for evaluating the feasibility and safety of RWT.

The next phase of this study will offer recommendations for how to measure impacts; environmental considerations; Railroad-Trail Manager-Government Agency Coordination; recommended steps to working with the railroad company, and finding incentives for railroads to allow access to their property.

**Assessing Potential Benefits**

Through the course of this study, railroad companies identified numerous potential ways that RWT can benefit their business. Finding such benefits are crucial to arranging satisfactory deals with the railroads. Such benefits include:

> Reduced liability costs.

  Liability currently costs railroads millions of dollars per year. Entering into rails-with-trails agreements can help to dramatically reduce these costs to railroads.

> Financial compensation through sale of property, easement or license fees, or tax credit for donated land or easement

  Many railroad companies receive some sort of financial compensation, with an average of over $800,000 sale price for those selling property.

> Reduced trespassing, dumping, and vandalism through proper trail separation including proper setbacks and the use of landscaping, grade, and/or fencing. This can have a direct economic savings to railroads.

"The trail has reduced, maybe eliminated, illegal dumping that occurred before the trail designation." Park Ranger Kevin Fazzini, Lehigh River Gorge Trail, PA
Many railroad companies noted reduced problems directly attributable to well-designed trails. Some of the trails showing improvements included ATSF Trail (CA), Mission City Trail (CA), Railroad Trail (MI), and the LaCrosse River State Trail (WI). Planned trails hoping to derive improvements include the Springwater Corridor (OR), the Five Star Trail (PA), and the Coastal Rail-Trail (CA), which both currently see enormous amounts of trespassing behavior both along and over the tracks.

- Reduced illegal track crossings through channelization of users to grade-separated or well-designed at-grade crossings.

Several RWT have done a good job forcing users to specific crossing sites. For example, users on RWT in Perth, Australia, are channelized through fenced trail sections to at-grade crossings with automatic, trail-width gates that lock in place until the train is gone. Several American trails offer similar improvements, including the Springwater Corridor (OR) (two pedestrian undercrossings in an area previously swarmed by river seekers); the LaCrosse River State Trail (which constructed a bridge to connect to trails in order to eliminate trespassing between the trails), and the Burlington Waterfront Bikeway (VT) (which channelized pedestrian crossings down to a few areas, dramatically reducing trespassing problems.)

- Reduced petty crime problems through increased user presence and design

The Canadian Pacific Railway Police Service relies on the concept that assigning space according to its ability to support an intended function is a crucial element of successful RWT design. They have had dramatic results in reducing crime and trespassing through RWT designs that improved the aesthetic quality of an area, thus attracting the “right” people and thereby discouraging vandals and criminals, who thrive in abandoned, ugly areas. One example is the Oshawa Creek, Ontario “Trespassing Prevention through Environmental Design Project”, which built a new trail and pedestrian under crossing adjacent to a railway in order to reroute trespassing kids trying to get to a nearby school. Another project is Toronto’s “Weston Living Fence Project” which aimed to reduce trespassing by providing landscaping near otherwise blank and often graffitied walls.

- Increased public awareness of the important service railroad companies still provide.

A train operator in California noted that people have been surprised to hear that there are still trains in this country today. Users on several trails express that the highlight of their tour is when trains come by. As noted
earlier, the Wheeling Corporation’s report offered the hope that RWT will help, “the public will become more informed about our industry and the economic benefits of the rail carrier serving their area.”

- Increased aesthetics in the creation of a landscaped, continuous trail.

This sentiment was voiced by the Metropolitan Transportation Authority in San Fernando, CA (ATSF Trail).

Railroads, police departments, and government agencies pointed out other potential community benefits, including:

- Increased tourism revenue.

Along with other snowmobile trails in Michigan, the Railroad Trail brings in a reported $15 million in income to the County and $100 million plus for northern Michigan. The LaCrosse, WI trail manager reported that the trail is a boon to local economies and greatly enhances the reputation of the state as a place to visit.

- Increased adjacent property values

Desirable property is valuable property. Many studies have shown that trails enhance property values by providing community amenities for fitness and health, aesthetic beauty, and reduced crime.  

- Other community benefits in terms of health, open space, transportation options, and recreational opportunities for generations present and future.

**Corridor Acquisition**

About half the trail corridors are owned by entities (usually states, cities and counties) other than the rail companies. In the remainder, the railroad retains the right-of-way ownership, with the trail entities obtaining a use easement or license in 80 percent of the cases, from a variety of potential sources (railroad or transit authorities, utilities, other government agencies). See Figure 3.1 and 3.2.

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3There have been numerous studies on this topic, including "The Economic and Social Benefits of Off-Road Bicycle and Pedestrian Facilities", a National Bicycle and Pedestrian Clearing House Technical Brief (Technical Assistance Series Number 2, Sept 1995); Roger Moore, et. al., "The Impacts of Rail-Trails: A Study of Users and Nearby Property Owners from Three Trails, US Dept of the Interior (1992); and studies from cities and states such as Seattle, Colorado, Pennsylvania, and North Carolina.
Figure 3.1
Cost of Corridor Purchase, by Percentage of Trails, 2000

Between 1996 and 2000, there was an increase in the number of trails paying for part of their trail corridors. There was also a drop in the number of trail managers who reported not knowing how much was paid for their trail land. This may represent a growing understanding by railway companies that the land is valuable.

Average Cost = $801,684
Source: Rail-to-Trails Conservancy

Most of the trail agencies obtained their funding through a variety of federal, state, county, city, and private funds.

Figure 3.2
Agency Ownership of Rail Corridor, by Percentage of Trails, 2000

Note: Partial ownership indicates that the trail manager owns part of the trail and received an easement or unofficial permission for the remainder.
Source: Rail-to-Trails Conservancy
Involving the Stakeholders

It is a unanimous sentiment that the railroad companies and all other potential stakeholders should be involved from the start of the process. Potential stakeholders include:

➤ Railroad companies, including real estate departments, operations, maintenance, and legal representatives
➤ Utility companies, such as telephone, cable, water, sewer, electric, gas
➤ Law enforcement officials
➤ Other adjacent landowners
➤ Trail user groups
➤ Transportation departments

Cottonbelt Trail, Dallas, Texas

“What a corridor is today does not mean it will be the same tomorrow...I would have liked to have been involved earlier in the planning process.” Jan Schneider, Manager of Railroad Facilities, Dallas Area Rapid Transit

"The biggest problem is dealing with the Railroad company. We did not realize how formal the railroad industry is. Make sure in all situations that the railroad company is involved.” Joe Moore, Assistant Director of Parks and Recreation, Grapevine TX.

Today, trail planners are more likely to run a more inclusive process than in years past, with most key agencies and companies reporting they were involved in various aspects. However, on many trails studied, railroad representatives complained they were not involved early enough, a sentiment that was often echoed by the trail planner.

A good example of railroad involvement was on for the Schuylkill River Trail (PA). According to trail manager John Wood, “The trail itself was approved by the County Commissioners in 1974, however the approval of Conrail was hard fought. In 1990, the Chairman of County Commissioners contacted a senior vice president of Conrail and the two of them worked out an agreement. The County’s designers worked with Conrail designers to assure that their interests were addressed, concurrent to negotiation of the agreement. When the design was completed, the easement agreement was signed. The Agreement had a clause that the trail design would meet approval of Conrail engineers, and it did, since they were part of the design process. Bottom line: Get top management to agree and give them a stake in the project.”
Section IV

Best Practices: Legislation, Liability, & Insurance

Legislation Relating to Liability for Rails-with-Trails

The attached matrix (Table 1) is a compilation of the laws of the 50 states and the District of Columbia relating to the liability issues associated with Rails-with-Trails (RWT). The matrix provides a listing of the Recreational Use Statutes and Governmental Tort Claims Acts for each state. In general, a Recreational Use Statute limits the liability of a landowner for land that is being used, without charge, for recreational purposes. Governmental Tort Claims Acts, on the other hand, establish the limits of government liability for injuries to persons or damage to property resulting from the acts or omissions of government officials.

In addition to the Recreational Use Statutes and Governmental Tort Claims Acts, the matrix also lists Recreational Trail and Rails-to-Trails statutes for the states that have enacted them. As the matrix shows, the vast majority of states have passed some type of recreational trail statute. Moreover, over half of the states have enacted a recreational trail statute that addresses the issue of liability in some fashion. This can range from protecting adjacent landowners from liability, as is done in many states, to making the Recreational Use Statute for the state specifically applicable to a Rails-to-Trails program.

An analysis of the applicability of these laws and statutes to the question of liability for Rails-with-Trails will be undertaken as part of the next phase of this report, as well as research into specific local statutes, trespassing ordinance, and model legal arrangements.
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<tr>
<td>Limited to undeveloped lands.</td>
<td>Public use of railroad § 42.40.420</td>
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<tr>
<td>- Allows a municipality or the state to petition to use railroad land, including along active railroads for public use, including trails. Must be established that the use will not create a safety hazard, and the municipality or state must enter into an agreement to indemnify the railroad.</td>
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<td></td>
<td>Code of AL §§ 11-93-1 et seq.</td>
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<thead>
<tr>
<th>State</th>
<th>Recreational Use Statute (RUS)</th>
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<tr>
<td>Trail, Rails-to-Trails Program, Recreational Trails System, or Similar Statute</td>
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<td>Government Tort Liability Act</td>
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<tr>
<td>Trails System §22-4-401 et seq.</td>
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- No liability provision. |  |

**State**

**Recreational Use Statute (RUS)**

**Trail, Rails-to-Trails Program, Recreational Trails System, or Similar Statute**

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**Government Tort Liability Act**
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<tr>
<td>CO Rev Stat. § 33-41-101 to 106</td>
<td>CA Gov't Code § 846</td>
<td>Recreational Use Statute (RUS)</td>
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<tr>
<td>Recreational Trails §33-11-101 - No liability provision.</td>
<td>Recreational Trails Act §5070 et. seq. - Limits liability for adjacent property owners.</td>
<td>Trail, Rails-to-Trails Program, Recreational Trails System, or Similar Statute</td>
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