

**Testimony of Honorable Roger Nober  
Chairman of the Surface Transportation Board  
Before the  
House Committee on Transportation and Infrastructure  
Subcommittee on Railroads  
Hearing on National Rail Infrastructure Financing Proposals  
June 26, 2003 Room 2167 RHOB**

Introduction

Good morning, Chairman Quinn, Ranking Member Brown, and Members of the Subcommittee.

My name is Roger Nober, and I am the Chairman of the Surface Transportation Board. I appreciate the invitation to discuss with you the importance of rail infrastructure to the financial health of our freight railroads, to the railroads' customers and to the nation's transportation system as a whole.

1. The STB's Mission and Rail Infrastructure

The Surface Transportation Board ("Board") is an economic regulatory agency, and the rail infrastructure issues being discussed today are important to our mission. One of our core statutory missions from Congress is to assist railroads in attaining adequate revenues. We must also resolve railroad rate and service disputes. As I will explain, the state of railroad infrastructure is inextricably intertwined with, and therefore a significant component of, all of the rail regulatory matters we must address.

The state of rail infrastructure is a key part of the conundrum that you all are familiar with as it has bedeviled the rail industry for several generations – how to provide a level of service that will allow railroads to grow their businesses while maintaining our freight railroads as viable private entities. The level of service railroads are able to provide and the rates they can charge customers for that service are directly related to the capacity and reliability of their network. But, the level of capital investment railroads are able and willing to make in their network, and thus the condition of that network, is limited by the fact that railroads are not meeting their cost of capital. Critically, the condition of the railroads' networks limits their ability to grow their business by offering better and more reliable service; yet without the funds to fully invest in a better system and new technologies, railroads have a difficult challenge to gain market share from other modes. Without growing their businesses and generating new revenues, railroads will have a difficult time earning their cost of capital and becoming revenue adequate.

a. Revenue Adequacy

The Board is required by statute to quantify the revenue needs of the railroads and to assist railroads in attaining adequate revenues. The statute defines and the Board therefore measures revenue adequacy in the following manner: a railroad's revenues are to be considered adequate if they are sufficient, "under honest, economical, and efficient management, to cover total operating expenses, including depreciation and obsolescence, plus a reasonable and economic profit or return (or both) on capital employed in the business." To comply with this statutory mandate, the Board calculates annually the revenue adequacy of the individual Class 1 railroads.

Our determination of revenue adequacy is based on two variables: the weighted cost of capital for the rail industry and the rate of return on past investments achieved by each major railroad. The cost of capital is a measure that aggregates the current cost of both debt and equity financing of publicly traded railroad companies that pay dividends. In effect, it is a proxy for the cost the railroad industry as a whole would pay to finance new investment. The Board recently announced that the after-tax cost of capital for 2002 was 9.8 percent, which is the lowest it has been since the Board and its predecessor, the Interstate Commerce Commission, began these calculations in 1978. The cost of capital determination, which the Board calculates annually, is essentially a calculation of a profitability target for the railroads.

The Board determines whether an individual railroad is revenue adequate by comparing the railroad's rate of return on net investment – measured as the ratio of each railroad's net railway operating income to the book value of its investment base – to the railroad industry's cost of capital.

The Board has observed that since the enactment of the Staggers Act in 1980, the financial health of the railroads has improved considerably. Individual railroads have been found revenue adequate in particular years. From 1992 to 1999, between one and three Class I railroads were found revenue adequate each year. Since 1999, however, no railroad has been found revenue adequate under the Board's standard. This means that, since 1999, no Class I railroad has generated sufficient revenues to earn or recover its cost of capital on prior investments. Nonetheless, railroads have continued to selectively invest in those specific projects that are expected to generate future returns that exceed the firm's cost of capital.<sup>1</sup>

b. Impact of Infrastructure on Rates and Service

The Board's statutory charges include resolving rate and service disputes between railroads and their customers. In this capacity, the Board has attempted to balance the competing interests of railroads and their customers in rate disputes. The Board's rate standards allow railroads to price their services in a way that will permit them to earn a reasonable return on the facilities needed to serve captive traffic. That is important. The Board has observed first hand

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<sup>1</sup> I should note that there are limitations to a single-year revenue adequacy measure. Rail usage and the resulting rail revenues fluctuate with the nature of the business cycle for rail customers and with swings in the overall economy. Thus, the result of our statutorily-mandated revenue adequacy computation in a single year may be less instructive than a multi-year trend.

the effects on rail customers of infrastructure capacity constraints and of poorly maintained infrastructure. For example, after the merger of Union Pacific Railroad and Southern Pacific Railroad, the limitations of rail infrastructure in the Houston area caused the Board to monitor and to address the service disruptions that resulted. The Board has heard from some of the industry's customers who are concerned about the adequacy of the nation's rail system to handle future traffic growth. Some shippers are concerned that infrastructure problems may prevent the railroads from maintaining or improving current levels of service.

Recognizing the importance of infrastructure to service, the Board took a leadership role in bringing freight railroads, the city of Chicago and the State of Illinois together to produce the recent agreement to improve rail infrastructure in the Chicago area.

c. The Short Line Industry

The Board has overseen the growth and development of the short line industry, as our approval is required for one railroad to sell or transfer a rail line to another railroad. Today, there are more than 500 short line railroads, which operate more than 50,000 track miles – or one-third of the railroad route miles in the United States. These smaller railroads originate or terminate rail traffic worth a bit less than 10 percent of the rail industry's gross revenues. Nevertheless, as this Committee is keenly aware, many short lines have significant infrastructure needs because their tracks were not built to handle the modern, larger capacity rail cars – which are generally 286,000-pound cars. Estimates of the short line industry's capital needs are nearly \$7 billion, according to ZETA-TECH, which the American Short Line and Regional Railroad Association commissioned in 2000 to study short line infrastructure needs.

2. Railroads Infrastructure Investments Since the Staggers Rail Act of 1980

When considering the state of freight rail infrastructure, the most important fact to remember is that our freight system is a capital-intensive network that has been maintained for years by private companies. Unlike most countries, we do not have a government-subsidized freight rail network. However, the regulatory framework administered by this agency and its predecessor has a significant impact on the financial health of the freight railroads and therefore the condition of their infrastructure.

As the 1970s ended, the regulatory regime had taken its toll on railroads. Many were in financial distress. The weakest railroads failed, including all the major railroads in the Northeast: the Reading, Erie-Lackawanna, the Lehigh Valley, the Boston and Maine, the Lehigh and Hudson River, the New Haven, and Central of New Jersey. But it took a dramatic event -- the bankruptcy of the Penn Central Transportation Company only two years after its formation, in

what was at that time the largest bankruptcy in United States history -- to provide the impetus for an overhaul of rail regulation. Accordingly, Congress passed the Railroad Revitalization and Regulatory Reform Act of 1976 (the "4 R Act") and the Staggers Rail Act of 1980 ("Staggers Act") to deregulate many aspects of the rail industry and to help move the private freight railroads from heavily regulated entities to more competitive businesses.

Since the enactment of the Staggers Act, railroads have become more financially stable and thus have been able and willing to invest substantial sums of money in their own infrastructure. They have refined their networks by spinning off lines to short line railroads and expanded the capacity of their remaining system by investing in more modern equipment and technologies. All of these changes have made them substantially more productive. The Board has reported that "comparing 1998 to 1980, Class I railroads produced 50 percent more ton-miles using 61 percent fewer employees, 28 percent fewer locomotives, 38 percent fewer track miles, and 23 percent fewer freight cars in service." (Rail Rates Continue Multi-Year Decline, Surface Transportation Board, Office of Economics, Environmental Analysis, and Administration, December 2000, at 4-5.)

Although the freight railroads have passed a significant percentage of their cost savings on to their customers in the form of rate decreases, they have also used their improved financial condition to make major, targeted capital investments. Since 1980, they have invested nearly \$96.5 billion in their infrastructure. For example, Union Pacific Railroad ("UP") invested substantial amounts in the 1990s to improve its central corridor, which runs from the coal fields in the Powder River Basin in Wyoming across central Nebraska, and its Marysville Subdivision, which runs from Gibbon, Nebraska, to the Kansas City gateway, to accommodate increasing amounts of coal and intermodal traffic. After its acquisition of part of Conrail, Norfolk Southern ("NS") made investments and then realigned some of its operations, thereby substantially increasing its business of transporting automobile parts, finished automobiles, and intermodal traffic.

Still, railroads operate over large networks that are expensive to build and that require sophisticated and expensive technologies, such as centralized train control and automated switches, to operate efficiently. Yet, these expensive systems also must be well maintained to ensure continued safe operations -- an issue Administrator Rutter knows better than I. In addition, railroads must maintain all the rights-of-way on which their tracks, yards, and other facilities are located. In fact, between 1997 and 2001, the railroads spent on average more than 18 percent of revenue on capital investments, while the manufacturing sector as a whole spent a bit more than 3 percent.

I believe that freight railroads are unable to make the level of capital investment in their

networks that those systems presently need. This is primarily a result of the fact that, as I discussed earlier, the return on railroads' past capital investments has fallen short of the industry's cost of capital. And as publicly-traded companies, freight railroads must be responsive to the needs of their investors, and these investors are seriously concerned about the inadequate returns on investment earned by the Class I railroads.

Since I have become Chairman, I have met with all of the major figures in the investment community who follow railroads. And while all of these investment analysts agree that the railroads' investments are not meeting their cost of capital, they do not agree on the solution. Some urge railroads to increase their capital investment levels, some believe railroads currently make an appropriate level of capital investment, and others believe railroads should cut back on their levels of capital investment. Many of these same analysts urge railroads to increase revenue by raising prices to existing customers, rather than by investing in their networks to grow their traffic. The choices that the senior management and Board of Directors of railroads face to determine the proper level of capital investment for their networks is a difficult one, and is part of the conundrum I referred to earlier.

For example, when I recently visited with NS's capital planning team, they explained that no new project – a project other than maintenance – with a future return on investment lower than 20 percent would receive any capital funding. This investment analysis reflects a very disciplined process by which NS identifies its most pressing infrastructure needs and carefully targets investments. However, NS cannot commit the financial resources to every desirable project, and therefore NS will not make certain infrastructure investments.

Accordingly, there are still significant unmet infrastructure needs today despite the substantial investments the railroads have made in their networks.

### 3. Railroads Will Need Increased Infrastructure Investments

As freight and passenger rail traffic grows, there will be infrastructure improvements that should not be deferred if our nation is to maintain a healthy rail industry that can meet the growing demand for rail transportation.

#### a. Increased Freight Demands

The Department of Transportation, in its October 2002 *Freight Analysis Framework*, estimates that freight rail traffic will grow by 50 percent by 2020. That growth will put significant additional pressure on existing rail capacity and infrastructure. Therefore, we will need our railroads to expand and enhance their infrastructures so the national rail system will be ready to meet this growth in demand and so the railroads can serve their customers safely and efficiently. In its recent study, the American Association of State Highway and Transportation Officials estimated that unless we adequately invest in increased rail capacity, we will place additional constraints on our highway system. (Transportation--Invest in America, Freight -Rail

Bottom Line Report, January 2003, at 3.)

b. Increased Passenger Demands

Passenger rail will also continue to put pressure on the capacity of our freight rail infrastructure. Commuter and intercity passenger trains primarily operate on infrastructure owned by the freight railroads. Since the number of trains that can pass over a line of track is limited, each passenger train takes some capacity away from freight operations. Moreover, the number of commuter operations is likely to continue to grow. For example, while today on CSX's lines there are about seven ongoing rail passenger and commuter operations, nearly four times that many are under study.

The capacity of freight lines also affects passenger services. Outside of the northeast corridor, Amtrak operates with a statutory preference over freight lines. The condition of these lines affects the speed of Amtrak operations, and the capacity of these lines impacts both the freight railroads and Amtrak. The demands for additional passenger service that exist around the country, including high-speed rail operations, could further tax the freight rail infrastructure.

c. Improving Railroad Gateways

For railroads to improve their service and increase their traffic, the gateways, handoffs and interchanges between railroads must be improved. While our interstate highway system is an integrated, national system, our freight rail network is really a series of regional networks that connect at several interchange gateways. The most significant of these is Chicago, but other important points are Kansas City, St. Louis, Memphis and New Orleans. At these cities, our eastern and western railroads hand off freight to one another. The efficiency and importance of rail freight gateways cannot be underestimated – nearly one-third of all rail freight is transferred between carriers.

These terminals are densely populated urban areas whose rail systems have been in place for as many as 150 years, and these systems long predate the development that has occurred around them. These gateways are not always the first place railroads look when preparing capital budgets. But I believe we must focus attention on these gateways, because they can be critical chokepoints in our freight rail networks.

Chicago is by far our nation's most important rail gateway. More than one third of all rail traffic moving on a given weekday converges on Chicago. All seven of the major railroads operating in the United States operate within the Chicago area and move the more than 37,500 freight cars and 20,000 intermodal trailers and containers that comprise the 500 freight trains that operate in Chicago every weekday. These trains operate in Chicago over 893 miles of track and 125 interlockings, and in 57 yards. They also pass through 4,600 control points, which are switches or speed zone changes. Whereas railroads have invested to automate control points in

many other locations 30 of the approximately 150 manned towers that remain in the United States are in Chicago.

Most of the rail shipments do not begin or end their journey in Chicago, but rather move through Chicago. The vast majority are interchanged at Chicago between railroads or between a railroad and a truck for further transport. It takes too much time for rail traffic to make its way through the Chicago gateway. In fact, I am told that it takes about the same amount of time to move a train through Chicago as it does to move one from the West Coast to Chicago.

Inefficiencies of Chicago rail operations can affect more than just railroads in Chicago. There are approximately 1 million “rubber tire transfers”— where intermodal traffic is taken off a rail car, moved by truck to another rail facility, and then reloaded on a rail car. Obviously, these truck moves on Chicago roads occur because it is either slower or more expensive to complete the interchange exclusively by rail. Moreover, the slow movement of trains in Chicago means that road crossings remain blocked by trains longer.

These problems are less severe than they were even a few years ago thanks to cooperative efforts among all affected parties. After the winter of 1998-99, which severely disrupted rail operations in Chicago, the Board urged the parties to work together to solve some of the problems and delays in rail movements in Chicago. The railroads serving the Chicago gateway then formed the Chicago Planning Group, which provided them with a formal mechanism to discuss issues related to Chicago.

The railroads determined that they needed an integrated approach to deal with operations in Chicago. Thus, at the Board’s urging, they created the Chicago Transportation Coordination Office (“CTCO”). CTCO, which is located in the METRA Dispatching Center in downtown Chicago, monitors the condition of all the rail facilities in the Chicago area, as well as the trains entering, departing, and moving through the area. CTCO is therefore aware of congestion, delayed arrivals, and other ongoing events that could affect rail operations in the area. It has improved the operation of yard facilities and major corridors in Chicago that handle significant amounts of rail traffic. Railroads have worked to directly interchange more intermodal traffic and thereby reduce the number of “rubber tire transfers” in Chicago.

As a result of these efforts, the railroads have realized significant improvements in their Chicago operations. The average car took 30 hours to move through Chicago in 2002, which was down from 45 hours in 1999. In addition, the time a car spent sitting in a yard in the Chicago area was reduced to 23 hours from 41 hours over the same period. Nevertheless, the Board has continued its active involvement and hosted a number of meetings of the Chicago Rail Task Force, which was co-chaired by a railroad executive and the Transportation Commissioner for the City of Chicago. This group has focused on the substantial investment in infrastructure expansion and realignment in Chicago that is necessary to make further improvements in rail freight efficiency in that City.

With the continuing need to improve rail efficiencies in Chicago through investments in infrastructure improvements and realignments in mind, the Chicago Rail Task Force recently announced that the railroads, the City of Chicago, and the Illinois Department of Transportation entered into an agreement for a major infrastructure project, and I was pleased to be present at that announcement. The Chicago Project will improve further rail transportation in Chicago as well as remove numerous grade crossings that interfere with automobile traffic. It is an ambitious proposal, and I commend the industry, the city, and everyone involved for their vision.

d. Construction of New Rail Lines

The Board is statutorily required to approve all construction of new rail lines, and the demand for investment in new rail lines, particularly build-ins, continues. Infrastructure investment in new rail lines to bring competitive service to singly-served customers can provide significant benefits to railroads, customers, and the freight system as a whole. In the past two years, we have considered two major new construction cases that each reflect this trend in rail infrastructure investment – the Dakota, Minnesota and Eastern (“DM&E”) construction to the Powder River Basin in Wyoming and the San Jacinto construction to the Bayport chemical area near Houston, Texas.

The DM&E construction project has two parts: First, DM&E plans to build some 280 miles of new rail line west from a point on the railroad’s existing line near Wasta, South Dakota, to specific mine sites in Wyoming’s Powder River Basin. Second, DM&E plans to rebuild and upgrade approximately 598 miles of its existing main line in Minnesota and South Dakota. DM&E originally estimated that the cost of the entire project would be about \$1.6 billion, although some recent reports have DM&E characterizing it as a \$2 billion project.

The San Jacinto project involves the construction of a 12.8-mile line of railroad so The Burlington Northern and Santa Fe Railway (“BNSF”) could serve the Bayport Industrial District in southeast Houston, TX, near Galveston Bay. This new line would be financed through an innovative partnership between the railroad and the petrochemical manufacturers in the Bayport area who would gain competitive rail service. The BNSF states that the cost of building the line is \$80 million.

The Board approved each of these privately-funded projects based on their transportation merits. They are projects that these companies believe are good for their companies and provide competition, but they are time consuming, expensive, and ultimately their completion is uncertain. In addition to the expense and business uncertainty of building these projects, both of these have also encountered significant local opposition, of the sort usually reserved for publicly-funded highway or airport construction projects. Fewer of these types of projects get proposed, despite their transportation benefits, because companies must factor this uncertainty into their decision to tie up their private capital.

## Conclusion

Our country and its economy will benefit from greater investments in rail infrastructure. Expanded capacity and more efficiently aligned infrastructure means customers will get better service, communities will have improved conditions, and goods will move more quickly across this country. Those are benefits to everyone.