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DEPARTMENT OF TRANSPORTATION

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March 15, 1978

To the President of the United States
The President of the Senate and the
Speaker of the House of Representatives

Gentlemen:

We are pleased to submit our report on the effectiveness of the Rail Passenger Service Act of 1970 (Public Law 91-518). This report is submitted in accordance with Section 308(c) of the Act as amended.

Sincerely yours

Daniel O'Neal Chairman

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Contents

HIGHLIGHTS	1
INTRODUCTION	2
PART I	
Commission Activities	3
The Adequacy Regulations	3
1. Ex Parte No. 277 (Sub-No. 1)	3
a. Amendments	3
b. Exemptions	3
2. Ex Parte No. 277 (Sub-No. 2)	6
Compliance	6
1. Complaints	6
2. Inspections	7
3. Formal Proceedings to Enforce Compliance a. I.C.C. v. N.R.P.C., TRRA, et al.	8
b. U.S. and I.C.C. v. N.R.P.C.	8
	9
Access and Compensation Proceedings	9
Discontinuance Proceedings	11
PART II	
Analysis of Amtrak	13
during 1977	
Service	13
1. New Routes and Service	13
2. Station Improvements	14
3. Service Variations	14
4. Curtailment of Service	14
5. Problem Areas	15
a. Temperature control	15
b. Reservations and ticketing	16
c. Employee attitudes	16
 d. Overtime performance e. Availability of passenger equipment 	17 17
Special Studies 1. Track Standards	18
2. Incentive/Penalty Agreements	18 20
3. National Transportation Policy Study Commission	21
4. Amtrak Through Route and Joint Fares Study	21
PART III	
Financial Analysis	23
Finances-General	24
Cash and Working Capital	24
1. Changes in Amtrak's Financial Position	25
2. Federal Funding: Grants and Loans	25
Long-Term Debt	26

Sources of Expenses 1. Services Billed to Amtrak by Railroads 2. Dining and Buffet Service 3. Payroll Costs 4. Payments for Passenger Inconvenience 5. Northeast Corridor 6. Operating Results by Route	26 26 28 28 30 31 32
PART IV	
Economic Analysis	33
Traffic Performance, Equipment Utilization and Revenue 1. Ridership 2. Express, Mail, and Baggage Revenues	33 33 37
-	
Fares and Cost of Service	39 40
1. Fares 2. Cost of Service	40
3. Federal Government Investment in Amtrak	41
Subsidies	41
Marketing	41
Promotion	41
Intermodal Service	42
Market Outlook	43
1. Traveler Use of Public Transportation	43
2. The Economy	43
3. Energy Resources	43
4. Intermodal Competition	44
Appendix	45

Highlights

During Fiscal 1977 Amtrak's net loss per passenger mile and per passenger carried (ridership performance criteria) continued their trend upward. This undoubtedly prompted the determination by Congress to re-evaluate Amtrak's operations systemwide. But it is also noteworthy that during fiscal 1977 Amtrak carried more passengers than it has at any time in its 6-1/2 year history, including the energy crisis inflated years of 1973 and 1974.

It is equally significant that these gains were by no means uniform systemwide. As discussed in Part IV, regardless of which performance criterion is utilized, short distance routes substantially out-performed long distance routes. Indeed, ridership and utilization of equipment increased overall, despite their decrease on virtually all long distance routes. In fact, as discussed in Part IV of this report, very few riders travel the entire length of a long-distance trip. Most patronage over long-distance routes consists of "segment riders", i.e., those riders who travel between intermediate points on long-distance routes.

Results by individual route may vary substantially, in large measure due to performance variables discussed in Part II. But it is clear by now that a relatively consistent pattern of performance in the short vs. long distance routes is emerging. Unless more emphasis is focused on trip segments of long distance routes, continued service over some of these routes may be difficult to justify on purely economic grounds.

In analyzing the precipitous increase in Amtrak's net losses over the past several years, it is necessary to consider that during these years Amtrak has taken over administrative and maintenance responsibilities which were originally performed by the participating railroads under contract with Amtrak. The most significant acquisition was, of course, the purchase of the Northeast Corridor in FY 1976, together with appurtenant rail properties and maintenance facilities. As discussed in Part III, each of these moves has increased Amtrak's overhead expense to a point where the direct cost of providing actual passenger transportation during FY 1977 was reduced to a mere 31.4% of Amtrak's expenses. It is too early to predict whether these acquisitions and assumptions of support functions will ultimately result in cost savings to Amtrak. It is clear, however, that substantial savings could be realized by bringing overhead expenses into more appropriate alignment with direct operating expenses, and that efforts must be made in that direction.

Finally, a number of noteworthy developments have occurred at the Commission with respect to the

various roles it has been assigned under the Rail Services Planning Act. During FY 1977, the Commission reexamined its Basic Adequacy of Service Regulations to determine whether sufficient attention is being paid to the needs of handicapped travelers. To avoid unnecessarily burdening the participants, and to insure consistency in the resulting rules, the Commission's effort will be coordinated with a proceeding about to be initiated by the Department of Transportation. The Commission increased its efforts to mediate passenger complaints by adding a new position in the Passenger Service Branch to deal exclusively with complaints and other matters of consumer interest. In addition, the Commission continued its inspection efforts in an attempt to eliminate conditions which produce passenger complaints.

Also noteworthy is the fact that a number of major compensation proceedings were concluded by the Commission with administrative finality during the fiscal year just ended. Although three of these decisions are pending in Court at year's end, substantial progress has been made toward determining the compensation which railroads should be paid for the use of their facilities by Amtrak.



Introduction

Clearly, the most significant event of the past fiscal year, and perhaps of the brief 6 1/2 years of Amtrak's existence, was the announced intention of Congress to re-evaluate the entire Amtrak system. This announcement naturally implies reconsideration of the role of intercity rail passenger service in the national transportation system. These matters have long been of concern to the Commission.

The Commission has been warning of the disappearance of the intercity rail passenger train since its 79th Annual Report in 1965. By 1968 the situation had become so critical that the Commission's 82nd Annual Report stated that: "Without immediate action on the part of the Federal Government, significant segments of the country will soon face the loss of their last remaining rail [passenger] service." (p. 11). Subsequently the Commission participated fully in the process which led to creation of the so-called "Basic System", over which Amtrak was created to provide intercity rail passenger service. On December 29, 1970, the Commission, as required by Section 202 of P.L. 91-518 (the legislation which created Amtrak), submitted a review of the Secretary of Transportation's designation of a basic national rail passenger system. At pp. 9-10 of that review, the Commission observed:

Whatever the future may produce, the plan and the system should be utilized, at the very least, as a real test of whether good passenger train service, equal in quality and quantity to the common expectation, can attract and sustain sufficient patronage to compete with the other popular modes of travel on a self-sustaining basis.

Even as such a test, however, the system must be,

in actuality, a system—not merely a few trunklines with occasional flair-outs connecting major population nodes. As Congress has envisioned it (Section 101), the system must link together the various regions, providing service between the crowded urban areas and in other areas of the country, so that the traveler in America, will in fact be able to choose rail when most convenient to his needs. Short of that, the entire Federal expenditure could turn out to be a waste.

In its 85th Annual Report the Commission warned that while "This year marked the beginning of a new era in intercity rail passenger service... In the final analysis, however, continuation of a meaningful rail passenger system depends upon the public's support, from both a patronage and financial standpoint." (p. 55).

For the past five years the Commission has been reporting to Congress as required by Section 308(c) of the RPSA, as amended, 45 U.S.C. §548(c), on the effectiveness of the Act in meeting the requirements for a balanced national transportation system. Inasmuch as 98% of all intercity rail passenger service is provided by Amtrak, these reports have amounted to reports on the effectiveness of Amtrak's operations and on the Commission's activities under various provisions of RPSA as they relate to Amtrak and other railroads providing intercity passenger service subject to its jurisdiction. This 6th Annual Report, covering fiscal year 1977 (October 1, 1976—September 30, 1977), is presented with the realization that major changes in the Amtrak system may be mandated by Congress during fiscal year 1978.

Commission PART Activities

Through the Amtrak Improvement Act of 1973 (section 14), Congress directed that the Interstate Commerce Commission issue and enforce regulations relating to the adequacy of service, equipment, track, and facilities operated by Amtrak. These "Adequacy of Intercity Rail Passenger Service Regulations" establish specific standards for such matters as reservations, ontime performance, conditions of stations, temperature in passenger cars, cleanliness, equipment, baggage handling, and condition of cars, coaches, and track standards; and they delineate a Commission-supervised complaint procedure. They also establish procedures for amending the regulations and provide for exemptions from the regulations where the carrier has shown good cause. The Commission's activities relating to amending, enforcing, and granting exemptions from these regulations are described in this part of the report.

The Adequacy Regulations

Ex Parte No. 277 (Sub-No. 1)

During 1977, the Commission reexamined the basic Adequacy Regulations developed in Ex Parte No. 277 (Sub-No. 1) to consider a proposed amendment concerning assistance to the handicapped. The Commission also amended a 1976 report on track standards for intercity passenger service. In addition, a number of exemptions from various Adequacy Regulations were granted.

A. Amendments

At the request of the Kentucky Easter Seal Society for Crippled Children and Adults, Inc., the Commission reopened the proceeding with respect to its Basic Adequacy of Service Regulations to determine whether Regulation 15(b) (which directs carriers to assist handicapped persons "to the extent reasonably possible" in the provisions of on-board train service) complies with Section 504 of the Rehabilitation Act of 1973 (29 U.S.C. §794).

Amtrak filed a motion to dismiss the proceeding, stating that an Executive Order directed the Department of Health, Education and Welfare (HEW) to coordinate the implementation of Section 504 by all agencies providing Federal financial assistance. HEW regulations require all such agencies to rule on the implementation of Section 504 within their areas. The Department of Transportation (DOT) provides Federal financial assistance to Amtrak and must therefore rule on Amtrak's services to the handicapped.

While agreeing with Amtrak that it has no responsibilities under Section 504, the Commission concluded that its RSPA Section 801 authority is sufficiently broad to require it to insure that handicapped persons receive adequate service from intercity rail passenger carriers. Nonetheless, the Commission dismissed the pending proceeding with a view to instituting a more broadly-based one encompassing Adequacy Regulation 14(b) (facilities) as well as 15(b) (services) in concert with the Department of Transportation. The cooperative effort was intended to make participation in both proceedings more convenient to the parties, and to result in regulations as nearly comparable as the varying mandates of the respective agencies will permit.

B. Exemptions

Table I describes and notes the status of all significant petitions for exemption filed by Amtrak during fiscal 1977. Most of the requests sought relief from the requirements of two regulations governing

service at passenger stations: regulation 11, which requires that stations be open for a sufficient time before and after train departure to enable passengers and their attendants to purchase tickets, check baggage, and perform other transportation-related tasks; and regulation 13, which requires checked baggage service at stations. In each petition for exemption, Amtrak cited low ridership and unwarranted high costs of full staffing as reasons for seeking the exemption. In most instances, exemptions were granted, with the restrictions that tickets be available aboard trains without penalty charge and that stations be open for a reasonable period before and after train time.

Amtrak has also, in a few instances, sought exemption from regulations governing on-train service.

"The Pioneer," a new train that provides, for the first time, service between Seattle and Salt Lake City, was exempted from regulation 16 (checked baggage service) and regulation 20a (sleeping car service), as well as from regulation 11. It was thought that exemptions from these regulations would help implement this service by relieving Amtrak of the unnecessarily high costs of operation.

Still pending at year's end was Amtrak's petition for exemption from the requirement to provide sleeping car service (regulation 20a) on "The Inter-American." This train, which provides service between Chicago and Laredo, was recently converted to Amfleet operations; the exemption was requested because the few serviceable sleeping cars that are available are presently incompatible with Amfleet equipment.

Table 1
Amtrak's Petitions for Exemption Filed FY 1977

Finance Docket	Subject	Status
FD 28368 filed 1-5-77	Requests exemption from reg. 11 (Station - Hours of Operation) and 13 (Facilities for Checked Baggage) for station at Batesville, Missippi.	Granted 3-16-77
FD 28369 filed 1-5-77	Requests exemption from reg. 11 (Station - Hours of Operation) for station at Princeton, Illinois.	Granted, providing a custodian is hired, 3-9-77
FD 28370 filed 1-5-77	Requests exemption from reg. 11 (Station - Hours of Operation) and 13 (Facilities for Checked Baggage) for station at Winona, Mississippi.	Granted 3-18-77
FD 28372 filed 1-10-77	Requests exemption from reg. 11 (Station - Hours of Operation) and 13 (Facilities for Checked Baggage) for station at Dyersburg, Tennessee.	Granted 3-30-77
FD 28382 filed 1-26-77	Requests exemption from reg. 11 (Station - Hours of Operation) and 13 (Facilities for Checked Baggage) for station at Monmouth, Illinois.	Granted 4-11-77
FD 28383 filed 1-26-77 Amended - 3-16-77	Requests exemption from reg. 11 (Station - Hours of Operation) and 13 (Facilities for Checked Baggage) for station at Green River, Wyoming.	Granted 5-11-77 Station to close on Saturday and Sunday
FD 28384 filed 1-26-77	Requests exemption from reg. 11 (Station - Hours of Operation) and 13 (Facilities for Checked Baggage) for station at Truckee, California.	Granted 4-26-77
FD 28385 filed 1-26-77	Requests exemption from reg. 11 (Station - Hours of Operation) for station at Laramie, Wyoming.	Dismissed by request 3-16-77
FD 28390 filed 2-1-77	Requests exemption from reg. 11 (Station - Hours of Operation) and 13 (Facilities for Checked Baggage) for station at Ephrata, Washington.	Granted 5-31-77 Station not to be closed be- fore 11-1-77

Table 1 Continued

Amtrak's Petitions for Exemption Filed FY 1977

Finance Docket	Subject	Status
FD 28400 filed 2-15-77	Requests exemption from reg. 16 (Checked Baggage on Trains) for trains 710 & 711 between Oakland and Bakersfield, California.	Granted 5-2-77
FD 28422 filed 3-9-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Waterbury, Vermont.	Withdrawn by Amtrak 4-7-77
FD 28423 filed 3-9-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Brattleboro, Vermont.	Withdrawn by Amtrak 4-7-77
FD 28449 filed 4-11-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Decatur, Alabama.	Granted 7-22-77
FD 28451 filed 4-15-77	Requests exemption from reg. 10 (Cornections), 11 (Station - Hours of Service), 16 (Checked Baggage on Trains) and 20a (Sleeping Car Service) for trains 25 & 26.	Granted 7-27-77 Stations at Pocatello & La Grande will be open short time before and af ter operation of train - no staff - no ticket sales. Salt Lake City and Boise will have full service.
FD 28452 filed 4-18-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Yuma, Arizona.	Granted 7-19-77
FD 28503 filed 7-7-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at White Sulphur Springs, West Virginia.	Granted 9-30-77
FD 28504 filed 7-7-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Hinton, West Virginia.	Granted 9-15-77
FD 28514 filed 7-20-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Lewiston, Pennsylvania.	Pending
FD 28515 filed 7-20-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Sedalia, Missouri.	Granted 9-21-77
FD 28520 filed 7-28-77	Requests exemption from reg. 16 (Checked Baggage on Trains), reg. 20a (Sleeping Car Service) and 20c (Nonrevenue Lounge Space) for trains 34 & 35.	Granted 9-30-77
FD 28522 filed 7-27-77	Requests exemption from reg. 20a (Sleeping Car Service) for trains 21 & 22.	Pending
FD 28565 filed 9-28-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Barstow, California.	Pending
FD 28566 filed 9-30-77	Requests exemption from reg. 11 (Station - Hours of Service) and 13 (Facilities for Checked Baggage) for station at Winslow, Arizona.	Pending

2 Ex Parte No. 277 (Sub-No. 2)— Adequacy of Track Standards

In 1976 the Commission completed part one of a two-stage proceeding with a report on the adequacy of track for intercity rail passenger service. The Commission reported that all but three railroads—Illinois Central Gulf (ICG), Penn Central and Rock Island—appear to have maintained their intercity passenger trackage at the level prevailing on May 1, 1971, Amtrak's start-up date. Amtrak received satisfactory National Arbitration Panel awards against ICG and Penn Central. (Rock Island does not have a contract with Amtrak.)

In its report the Commission promulgated regulation 26 requiring carriers to maintain the May 1971 "level of utility" of trackage. The same standard is used in Amtrak's basic agreements with its contracting railroads. The Commission deferred indefinitely the second part of the proceeding—adoption of regulations requiring upgrading of trackage for high-speed operations—because such improvements would involve enormous expenditures requiring Congressional policy decisions. But we are continuing to monitor the situation, as our discussion on our track standard study will indicate.

In an order dated April 6, 1977, the entire Commission clarified some ambiguities in the original report. We amended the language of the report to permit consideration of slow orders and speed restrictions in effect on May 1, 1971, when setting track maintenance standards for intercity rail passenger service. We further explained that we do not intend to decide how track maintenance costs should be allocated between Amtrak and its contracting railroads. Allocation of maintenance costs is covered by the National Railroad Passenger Corporation Agreement (NRPC Agreement), and is therefore a contractual issue to be decided by the courts or by arbitration as prescribed in the Agreement.

Compliance

The Commission gathers information regarding compliance with adequacy of service regulations in two ways: (1) the Commission's field staff conducts on-site inspections and reports findings to the Passenger Service Branch; and (2) personnel in the Passenger Service Branch review all responses from passengers.

1 Complaints from Passengers

Some passenger complaints come in the form of letters. Most are received on "Passenger Response Forms," which the Adequacy of Service regulations require Amtrak and other intercity rail passenger

carriers to make available to customers. (The Form asks specific questions but allows passengers to make their own comments.) The passenger is requested to forward the original of this form to the carrier for response, and to send one copy to the Commission.

During fiscal 1977, 13,431 Passenger Response Forms were filed, up sharply from the 8,033 received during the previous year (see table 2). Part of the increase may be attributed to the increased availability of passenger response forms on board trains, which has been a high priority with the Commission over the past two years, and to increased ridership. However, ridership increased only 5.8 percent over the last fiscal year, while the number of forms received increased approximately 60 percent. Therefore, other factors, such as increased passenger awareness, resulting from clear publication on Amtrak's printed material of just what the passenger should expect, undoubtedly had an effect.

Not all of the forms received criticized Amtrak's performance. Those that did alleged 14,757 violations of the adequacy of service regulations, compared with 9,042 the previous year. Alleged violations of regulations regarding schedule adherence and temperature control continued to lead the list, and nearly every other category of complaint showed an increase as well (see table 2).

Several extraordinary events during the year undoubtedly contributed to the large number of complaints. Severe winter weather caused massive equipment failures and long delays in scheduled runs. In late January 1977, Amtrak suspended 20 trains indefinitely and annulled many more each day. An unusually hot summer also contributed to the increase in air conditioning complaints received, despite the delivery of Amtrak's new, all-electric Amfleet equipment, which was completed in June 1977. There were also several floods across the nation and a number of large derailments that interrupted service, inconvenienced passengers, and led to the filing of many Passenger Response Forms.

The rising number of passenger responses has increased the importance of the Commission's role as a mediator for unresolved problems. To this end, the Commission created the new position of Transportation Consumer Specialist in the Passenger Service Branch to deal exclusively with passenger complaints and other matters of consumer interest. Since early 1977, the Transportation Consumer Specialist has met weekly with Amtrak representatives to mediate unresolved passenger complaints. During

^{&#}x27;Ex Parte No. 277 (Sub-No. 2)—Track, Adequacy of Intercity Rail Passenger Service, 348 I.C.C. 518 (1976).

the entire fiscal year, approximately 750 passenger complaints were mediated, with many having been mediated more than once, and several as many as four times.

The mediation process has proved extremely successful in several areas; through cooperation between Amtrak and the Passenger Service Branch, the Commission has secured favorable settlement on a number of nonjurisdictional as well as jurisdictional complaints. Furthermore, the Branch's identification of shortcomings in Amtrak's complaint-handling procedure resulted in more timely and more complete responses by Amtrak. Randomly selected complaints are reviewed by the Passenger Service Branch to check

the promptness and adequacy of Amtrak's responses. When its responses were found to be inadequate, Amtrak has, at the the requests of the Branch, reopened files; in some cases Amtrak has issued fare adjustments to which passengers were entitled but which they did not pursue.

2 Inspections

The Commission also uses inspections by its field staff to monitor compliance with the adequacy of service regulations. This program includes unannounced visits to stations, where facilities are checked for substandard conditions, and walk-on and ride-on inspections of trains. During fiscal 1977 the

 Table 2

 Complaints and Alleged Violations

		Passenger Responses		Field Staff	Reports
	Total Passenger Response Forms	_13.431	Total Reports	Trains	Stations531
-	Regulation ¹	-	Violations	-	
2	Information to be provided	. 2		1	0
3	Reservations	1,265		20	22
4	Reservation-Making	49		1	8
5	Reservation-Confirming	10		5	13
6	On-Time Performance	4,085		640	3,042
7	Expeditious Service	35		9	0
8	Cancellation of Trains	, 6		0	3
9	Cancellation En Route	154		1	4
10	Thru Car Service	17		0	33
11	Station Hours	24		1	99
12	Consist of Stations	343		0	270
13	Checked Baggage	451		11	111
14	Consist of Trains	673		128	67
15	On-Board Services	1,239		154	0
16	Baggage Services	16		266	0
17	Food & Beverage	814		125	0
18	Temperature Control	3,455		561	0
19	Functioning Equipment	592		335	0
20	Car Requirements	1,386		892	0
21	Nonsmoking Space	110		78	0
22	Complaint Procedure	13		212	51
26	Track Standards	18		0	0
Tota	l Alleged Violations	14.757		3,440	3,723

^{&#}x27;The regulations omitted from this list give definitions (regulation 1) and establish procedures for the Commission to initiate proceedings on its own motions (regulation 23), for the execution of penalities (regulation 24), and for the modification of regulations (regulation 25).

Commission's field staff made 3,575 compliance inspections of the approximately 520 stations in the nation and 2,200 cars in the passenger fleet. Table 2 shows the number of alleged violations, by type, reported by the field staff. Amtrak has been very cooperative in voluntarily correcting deficiencies identified during inspections. Since the number of field staff is limited, the assignment of field investigations has been improved by the fact that Passenger Response Forms identify major problem areas.

The Commission again monitored Amtrak's preparation and performance during peak holiday periods this year. Focusing on the 1976 Christmas period and the 1977 Labor Day weekend, investigators observed conditions on trains and at selected major stations across the country. Again they reported that Amtrak had for the most part prepared well. Extra cars were added to increase passenger-carrying capacity, and additional Amtrak personnel were available at ticket windows and at other locations within the station to give information and assistance. Minimal congestion and over-crowding were reported. Over the Christmas holiday period there were delays and equipment failures associated with the harsh weather, but those difficulties may have been largely beyond Amtrak's control. The Commission acknowledges Amtrak's efforts to alleviate many of the chaotic conditions that mark holiday travel.

3 Formal Proceedings to Enforce Compliance

During 1977 prompt action by the Commission and other concerned authorities averted serious threats to passenger and express service in St. Louis, Missouri, and to baggage assistance for the elderly and the handicapped in the Northeast Corridor.

A. Interstate Commerce Commission v. National Railroad Passenger Corporation, Terminal Railroad Association of St. Louis, George P. Mueller, Union Electric Company, Union Center Venture, Colorado-Union Inc., Horizons-U.C.V. Corporation, Harry Gurwich, No. 77-0754-C(4) (E.D. Mo., 1977). Attorneys from the Commission's Bureau of Investigations and Enforcement sought a temporary restraining order against discontinuance of rail passenger and express service by Amtrak and the Terminal Railroad Association of St. Louis (TRA) at St. Louis Union Station. The discontinuance was alleged to violate section 1a(1) of the Interstate Commerce Act (49 U.S.C. 1a(1)). Station lessors and the Union Electric Company (UEC) were also joined as defendants to prevent their interference with continued service.

On July 13, 1977, the Court ordered continuation of passenger and express service and directed that Union

Amtrak's "Pioneer" operates daily between Salt Lake City, Utah and Seattle, Washington.



Station lease agreements between Amtrak, TRA, and Union Center Venture (UCV) be extended for 90 days. For the duration of the order, Amtrak was directed to pay the \$16,250 monthly terminal rental fee prescribed by the Commission in National R. Pass. Corp. and TRRA Just Compensation, 348 I.C.C. 801 (1977). The Court also enjoined UEC from stopping service at station facilities. The parties must report back to the Court on their progress in negotiating the reclocation of Amtrak's terminal facilities in St. Louis. The Commission's prompt action prevented a halt in service to some 163,000 passengers who use St. Louis Union Station.

B. United States and Interstate Commerce Commission v. National Railroad Passenger Corporation, No. 77-1567 (D.D.C., 1977). The Department of Justice and the Commission filed this action for a temporary restraining order on September 12, 1977, to prevent Amtrak from ending redcap service to passengers in the Northeast Corridor. Plaintiffs stated that ending redcap service would violate the provisions of Section 801 of RPSA (45 U.S.C. § 641) and the Commission's Adequacy of Service Regulations 14 and 15 (49 C.F.R. § § 1124.14, 1124.15), issued under Section 801. These regulations require carriers to facilitate travel by elderly and handicapped persons and provide them appropriate assistance to, from, and on trains and in terminals. Baggage assistance is one of the services required for such passengers (and for the general traveling public). The Commission and Department successfully argued that Amtrak had not given adequate notice of termination to the Commission or the public-it was announced only through news reports published two days before. Prompt action by the Commission and the Department persuaded the Court to issue a restraining order just four hours before redcap service was to end. In subsequent negotiations, Amtrak said it no longer intends to end redcap service in the Northeast Corridor. The case ended with a consent decree entered December 21, 1977; Amtrak did not admit nor deny any alleged violations but agreed to continue its current force level of employees in the Northeast Corridor and to notify the Commission and the Department of Justice before significantly reducing the number of redcaps there.

Access and Compensation Proceedings

Section 402(a) of the RPSA insures Amtrak access to needed tracks, facilities, or services of other railroads in return for compensation determined by the Commission, where the parties themselves cannot come to an agreement. The Amtrak Improvement Act of 1973 (Public Law 93-146, 87 Stat. 548) amended section 402(a) as follows:

...In fixing just and reasonable compensation for the provision of services ordered by the Commission under the preceding sentence, the Commission shall, in fixing compensation in excess of incremental cost, consider quality of service as a major factor in determining the amount (if any) of such compensation... 45 U.S.C. 562(a)

In 1977 the Commission continued to refine its application of section 402(a) as amended.

In Finance Docket No. 27708, Amtrak and Washington Terminal Company, et al., Use of Tracks and Facilities and Establishing Just Compensation, the Commission was asked to fix terms and compensation for Amtrak's use of the Washington Terminal in the District of Columbia. In a report at 348 I.C.C. 859 (1977), Division 3, acting as an Appellate Division, supplemented its prior order.2 The Division repeated its finding that Amtrak should join the 1907 Operating Agreement, as amended.3 Addressing some issues left open by the prior report, the Division ordered the Washington Terminal Company (WTC) to pay Amtrak its proportionate share of mail revenues earned by the terminal retroactive to July 1, 1973, and to credit Amtrak for ownership expenses and rent traceable to terminal building areas that could not be used because of National Visitor Center construction.

The Division modified the earlier report by deleting the cost-allocation adjustment for business cars and by interpreting the liability cost provision so that it is consistent with the National Arbitration Panel's ruling in NAB Case No. 15.4 The Division also decided that authorization of the construction of a new diesel and electric locomotive repair facility should be handled under Section 402(d)⁶ of RPSA, instead of Section 402(a). The Division rejected Amtrak's request that the Commission establish quality-of-service standards for WTC, but authorized reopening the proceeding if Amtrak finds that it cannot obtain satisfactory performance from WTC employees after six months of operations under the 1907 Operating Agreement. Since parking facilities were under construction above the new passenger station, the Division saw no need to take any action on parking.

¹Amtrak and Washington Terminal Company, Tracks and Facilities, 348 I.C.C. 86 (1975).

³This operating agreement has governed relations between the owners and users of the terminal since 1907.

^{&#}x27;In Re: Risk of Liability—Jointly Owned Terminals, the National Arbitration Panel found that Amtrak's payments to the railroads for liability costs under section 7.2 of the National Railroad Passenger Corporation Agreement for the period of May 1, 1971-June 30, 1973 included liability costs billed to the railroads by WTC.

In Finance Docket No. 27819, Amtrak, and the Texas and Pacific Railway Company, Use of Tracks and Facilities and Establishment of Just Compensation, 348 I.C.C. 645 (1976), the Commission found that the standards applicable to calculations of compensation for services6 rendered differ from those for the use of tracks and facilities. The Division explained that the incremental-cost standard of compensation is the minimum level of compensation for services provided to Amtrak. Added compensation may be awarded when the railroad providing service surpassing the standard set by the parties as a reasonable level of service. The Division found that a 20-minute schedule reduction for Amtrak's "Inter-American" service offered the best balance between the interests of the traveling public, which wants faster service, and the interests of the railroad in providing efficient freight service over heavily-used lines. The Division decided that the rate of on-time performance is the only practical objective standard for gauging quality of service. For Amtrak's "Inter-American" service, the Division established 80 percent on-time performance as the baseline above which Texas and Pacific would receive payments in excess of its incremental costs. The standard is intended to encourage on-time performance.



In contrast to the treatment of services, Division 3 noted that compensation for tracks and facilities used by Amtrak need not be computed by the incremental-cost standard. The Division found that although station rent and return on investment are not incremental costs, they are compensable.

In Finance Docket 27950, National Railroad Passenger Corporation and Terminal Railroad Association of St. Louis, et al., Use of Tracks and Facilities and Establishment of Just Compensation, 348 I.C.C. 901 (1977), Division 3 applied the reasoning developed in the Texas & Pacific case to calculate the just and reasonable compensation to be paid by Amtrak for use of connecting trackage leading to the facilities of the Terminal Railroad Association of St. Louis (TRRA). However, as to the use of the terminal itself, the Commission essentially followed the determination in the Washington case, except that it added Amtrak to the existing lease on the station. In Washington Terminal, Amtrak was substituted as a party to the Operating Agreements. The Division noted that it has jurisdiction to set compensation only after the effective date of its initial order requiring that service be provided to Amtrak, and found \$195,000 a year to be a reasonable rental for Amtrak's use of TRRA's terminal facilities. The Division also ordered Amtrak to pay part of the costs arising from use of TRRA trackage, including interest on the value of the property used, taxes, depreciation, maintenance, and operating expenses. TRRA's costs, plus a return on investment, are to be allocated among the users of the station and facilities on a wheelage or per-car basis.

In Finance Docket No. 28165, National Railroad Passenger Corporation and Union Pacific Railroad

⁵(1) If the Corporation and a railroad are unable to agree upon the terms for the sale to the Corporation of property (including interests in property) owned by the railroad and required for the construction of tracks or other facilities necessary to provide intercity rail passenger service, the Corporation may apply to the Commission for an order establishing the need of the Corporation for the property at issue and requiring the conveyance thereof from the railroad to the Corporation on reasonable terms and conditions, including just compensation. Unless the Commission finds that:

⁽A) conveyance of the property to the Corporation would significantly impair the ability of the railroad to carry out its obligations as a common carrier; and (B) the obligations of the Corporation to provide modern, efficient, and economical rail passenger service can adequately be met by the acquisition of alternative property, including interests in property, which is available for sale on reasonable terms to the Corporation or available to the Corporation by the exercise of its authority under section 305(d) of this Act;

the need of the Corporation for the property shall be deemed to be established and the Commission shall order the conveyance of the property to the Corporation on such reasonable terms and conditions as it may prescribe, including just compensation.

⁽²⁾ The Commission shall expedite proceedings under this subsection and, in any event, issue its order within one hundred and twenty days from receipt of the application from the Corporation. If just compensation has not been determined on the date of the order, the order shall require, as part of just compensation, interest at the rate of 6 per centum per annum from the date prescribed for conveyance until just compensation is paid.

E.g., Operating crews, maintenance, et cetera.

Company, Use of Tracks and Facilities and Establishment of Just Compensation, 348 I.C.C. 916 (1977), Division 3 found it appropriate to use a flat-rate system7 of compensation for the recurring incremental8 costs incurred by Union Pacific (UP) in providing services to Amtrak and to base nonrecurring incremental costs on actual cost figures.9 The Division also directed Amtrak and UP to develop a formula for track maintenance reimbursements based either on the "Amtrak formula" presented by Rail Systems Research Associates and L.E. Peabody and Association, Inc., or on the formula adopted by the Commission's Rail Services Planning Office (RSPO) in Ex Parte No. 293 (Sub-No. 18)-Standards for Determining Commuter Rail Service Continuation Subsidies (49 C.F.R. 1127.5(c)). The formula must include proper allowances for the variance between the Federal Railroad Administration's allowable maximum speeds and UP timetable speeds. The Division found that a reduction of 55 minutes in the schedules of trains no. 5 and 6 would improve the quality of service and that 80 percent on-time performance should be the minimum above which UP would receive payments in excess of its out-of-pocket costs for services rendered.

In a case of first impression, Finance Docket No. 28533, Minnesota Railway Company Ordered to Provide Services, Tracks and Facilities for Operation of Trains of the National Railroad Passenger Corporation and the Establishment of Just and Reasonable Compensation for Such Services, Tracks and Facilities, Division 3 approved the use of section 402(a) by Amtrak to insure its future access to the services, tracks, and facilities of the Minnesota Transfer Railway Company (MTRC). Section 402(a) was found to apply to such situations whenever Amtrak can prove that (1) the parties have diligently, and in good faith, attempted to settle their differences, and (2) future needs require immediate action. By including these conditions the Commission sought to avoid becoming the arbiter of every contract Amtrak negotiates.

Under section 401(a)(2) of the RPSA, railroads providing intercity rail passenger service may rid themselves of their common carrier obligation to offer such service by paying Amtrak an amount equal to half the fully-distributed passenger-service deficit of the railroad as reported to the Commission for 1969. Section 401(a)(3) of the RPSA permits the railroads to reserve the right to pay a lesser sum equal to the avoidable loss¹⁰ of all intercity rail passenger service operated by the railroad in 1969.

In Finance Docket No. 28122, Southern Pacific Transportation Company—Determination of Avoidable Loss under the Rail Passenger Service Act, 348 I.C.C. 873 (1977), the Southern Pacific

Transportation Company (SP) asked the Commission to resolve a dispute between it and Amtrak about the amount of SP's avoidable loss in 1969, SP paid Amtrak \$9,259,225 under the fully-distributed deficit formula of section 401(a)(2), and reserved the right to determine the amount owed to Amtrak under the lesser-sum avoidable loss formula. SP computed its avoidable loss for 1969 as \$7,836,390, and sought a refund of \$1,422,835 from Amtrak. The two railroads could not reach agreement on the avoidable loss figure. The Commission decided that SP had understated its avoidable costs by \$763,227, had overstated its nonretainable revenues by \$7,792 and had improperly excluded \$385,093 of passenger locomotive depreciation and \$378,134 of joint-facility minimum charges from its avoidable loss computation. The Commission found SP's avoidable loss to be \$8,607,409, and ordered Amtrak to refund \$651,816 (the difference between \$9,259,225 and \$8,607,409) to

Amtrak has petitioned the U.S. Court of Appeals for the District of Columbia Circuit for review of three Division compensation decisions, involving Washington Terminal,¹¹ Texas and Pacific,¹² and TRRA.¹³

Discontinuance Proceedings

Section 13a of the Interstate Commerce Act provides for the discontinuance of intercity rail passenger service by a carrier when continued operations are not required by public convenience and necessity, and continuation of the service would unduly burden interstate commerce. The RPSA contemplated that Section 13a would govern the discontinuance of passenger service by Amtrak. However, the Amtrak

⁷Utilization of a fixed price per unit of work of service, multiplied by the number of units furnished by the railroad during the billing period.

^{*}Train and engine crews, meals and lodging, fuel, equipment servicing cost, station costs, hostling, accounting services, general administration, station rental, and taxes.

^{*}Emergency services and special mail handling.

¹⁰Generally, avoidable loss can be defined as the amount of money that a railroad could save if it did not provide passenger service. A detailed definition can be found in Ex Parte No. 268, Determination of Avoidable Losses Under the Rail Passenger Service Act of 1970, as set forth at 49 C.F.R. 1123 et seq.

[&]quot;National Railroad Passenger Corporation v. I.C.C. and United States, Civil Action No. 77-1523 (filed June 13, 1977).

¹²National Railroad Passenger Corporation v. United States and I.C.C., Civil Action No. 77-1596 (filed July 11, 1977).

¹³National Railroad Passenger Corporation v. United States and I.C.C., Civil Action No. 77-1626 (filed July 15, 1977).

Improvement Act (AIA) of 1975 established new procedures for Amtrak discontinuance. Section 8 of AIA of 1975 amended Section 404 of RPSA to allow Amtrak to develop its own standards and procedures for discontinuance of its passenger service. Amtrak discontinuance standards were submitted to Congress and became effective in March 1976 when Congress failed to issue a resolution disapproving them. Thus Amtrak can now make its own decisions on the discontinuance of passenger service without action by the Commission.

Two non-Amtrak discontinuance proceedings were initiated in 1977. In Finance Docket No. 28322, Chicago South Shore and South Bend Railroad Discontinuance of All Passenger Train Service, South Shore sought to discontinue all passenger train service between South Bend, Indiana, and Chicago, Illinois, effective December 8, 1976. The Commission ordered South Shore's service continued for the statutory 4-month period, pending investigation. After hearings in key cities served by South Shore, Division 3 concluded that the public convenience and necessity required continued operation of South Shore's passenger service

for ten months. The Division found that despite large losses incurred by South Shore in providing passenger service, there is great public need for the service, especially for the people of Northwest Indiana who must commute to jobs in Chicago. It was noted that although South Shore's overall operations show a profit, its financial position is weakening and the railroad may not be able to sustain passenger losses much longer without a commuter service subsidy from the State of Illinois.

In Finance Docket No. 28532, William H. Gibbons, trustee of the Chicago Rock Island and Pacific Railroad Company, filed a petition August 15, 1977 seeking authority to discontinue trains No. 5 and 6 between Rock Island and Chicago, Illinois, and trains No. 11 and 12 between Peoria and Chicago. The petition alleges that even though operation of these trains is subsidized, their continued operation is not required by the public convenience and necessity, and will unduly burden interstate commerce. The Commission will conduct hearings on the petition according to provisions of section 13a(2) of the Interstate Commerce Act.

Analysis PART II of Amtrak during 1977

One of the most important events in Amtrak's history occurred in fiscal 1976 when ownership of the Northeast Corridor was conveyed from ConRail to Amtrak. With this transaction, for which Congress authorized \$120 million, Amtrak assumed control of 621 route miles of track in the Northeast, some 130 stations, shelters, and station sites, and half interest in both Chicago Union Station and The Washington Terminal Company. The Northeast Corridor was set up as a separate region within Amtrak and was staffed largely with former ConRail employees, including engineering and maintenance-of-way personnel, signalmen, clerical workers, dispatchers, police, and station, tower, and block operators.

Service

Also during 1976 the Northeast Corridor Improvement Project got underway. That project was mandated by the Railroad Revitalization and Regulatory Reform Act of 1976, which directed Amtrak to establish, by 1981, "regularly scheduled and dependable" service between Boston and New York on a 3-hour, 40-minute schedule and to reduce running time between New York and Washington to 2 hours 40 minutes. Congress initially authorized \$1.6 billion for track improvement plus an additional \$150 million (on a matching basis with States) for improvement to stations and related facilities, making a total authorization of \$1.75 billion.

Work began officially on March 31, 1977, on a 7.5-mile stretch of Northeast Corridor mainline track near Odenton, Maryland. The project ran into trouble in July 1977, due to lack of money, and planned "nonessential" improvements to tunnels, bridges, curves, and stations, expected to cost \$500 million, were dropped. The basic project commitments to

reduced running times were kept, however. In August 1977, plans were approved for a \$256 million electrification network between Boston and Washington, and plans were also drawn for additional "work packages" totalling \$120 million by the end of the 1977 work season, for upgrading track in the Corridor.

Although the Northeast Corridor contains less than 2.5 percent of Amtrak's total mileage, it accounts for about 57 percent of its riders. The completion of the Northeast Corridor Improvement Project, enabling fully electric trains to travel between Boston and Washington at speeds up to 120 miles an hour, would be a significant event in Amtrak's history. Whether the project will be completed to the degree envisioned by the Congress, however, will depend on many complex budgetary factors.

I New Routes and Service

Two new Amtrak trains—"The Pioneer" and "The Hilltopper"—were introduced during fiscal 1977. "The Pioneer" was inaugurated in June 1977, to provide service for the first time between Seattle and Salt Lake City. Established in cooperation with State governments as an experimental route (i.e., one that will be tested over a 2-year period), the route has a scheduled running time of approximately 24 hours via Portland, Oregon, Boise and Pocatello, Idaho, and 2. Ogden, Utah. "The Pioneer" is an all-reserved, all-coach train equipped with long-distance Amfleet coaches and an Amdinette car, which offers beverage, snack, and light meal service.

"The Hilltopper" provides service between Washington, D.C., and Catlettsburg, Kentucky. It replaced "The Mountaineer," which ran as an experimental train between Cincinnati and Norfolk and was terminated on June 2, 1977, because of low ridership. "The Hilltopper" uses Amfleet equipment

and connects at Catlettsburg, Kentucky, with "The Cardinal" (formerly "The James Whitcomb Riley") for service to Cincinnati and Chicago.

2 Station Improvements

Although Amtrak reduced or eliminated service at many stations last year, it directed much effort toward improving the quality of service at others as it began the first phase of a two-phase station improvement program. Phase I called for completion of station repairs by the end of fiscal 1978, while phase II proposed a program to upgrade all stations systematically.

Accomplishments during this first year of phase I included: redevelopment of the station at St. Louis, Missouri, station rehabilitation at Charleston, West Virginia; new stations for Miami, Florida, and Canton, Ohio; emergency repair of the Harrisburg, Pennsylvania, station; rehabilitation of the North Philadelphia station; repair of the Mt. Joy and Middleton, Pennsylvania, and Kingston, Rhode Island, stations; and extension of track and station rehabilitation at Omaha, Nebraska.

In addition, with the financial assistance of State and local governments, Amtrak also implemented other station work last year: plans for a new station at Dearborn, Michigan; new stations at Schenectady and Rochester, New York; and rehabilitation of Detroit's metropolitan terminal.

Expenditures on station improvement (phase I and others) last year totaled \$17.6 million. Amtrak proposed to spend \$34.2 million during fiscal 1978 to complete phase I, but budget restrictions have reduced available funds to \$7.4 million. As a result, station improvement has stalled, and the program has been redirected from specific projects to broad, systemwide objectives. Those stations that show potential for a larger market share, intermodal operations, efficiency of operation, and joint funding will now be first to be improved.

3 Service Variations

The level of service on Amtrak trains continues to be unpredictable. Amtrak's "Inter-American" (Chicago-Laredo), for example, has received much attention because of its poor on-time performance. The Commission, in response to complaints from the public, has initiated a preliminary investigation into the frequency and causes of delays over this route.

On the other hand, "The San Diegans," Amtrak trains serving the Los Angeles-San Diego corridor, have proved to be dependable and responsive to travelers' needs and have seen a strong and steady increase in ridership over the past year.

The quality of service abroad "The San Diegan," which is equipped with new Amfleet coaches and

Amdinettes, was evaluated in September 1977, during a ride-on inspection by a Commission investigator. The menu, while limited, is adequate for this short, 128-mile run. Breakfast rolls were served hot; pancakes, juices, and hot beverages were also available. Soft drinks and hot and cold sandwiches completed the menu. Crew members were courteous and assisted passengers at each stop as well as on board the train. Passengers interviewed were pleased with the service, and several regular riders said they had switched from automobile or bus transportation since Amfleet equipment was introduced over the route in mid-1976. In fact, ridership on "The San Diegan" since that time has increased by 70 percent. The train has also maintained a good on-time record during that period.

The unpredictability of Amtrak's trains increases with the length of the route: trains traveling shorter routes generally are less subject to delay and maintenance problems that are trains over longer routes. This is due in part to the advanced age of the conventional equipment still in use on many of Amtrak's long-distance trains. The Commission expects to see a significant reduction in service variations with the introduction of Amtrak's new bilevel Superliners, which were scheduled for delivery and operation on selected long-distance routes in 1978.

4 Curtailment of Service

The winter of 1976 was the worst in recent history. Bitter cold in the East and Midwest froze equipment on entire trains, made several routes impassable, and virtually stopped train service. Amtrak suspended the operation of 20 trains during January and February of 1977 and annulled many more day by day as weatherrelated problems persisted. Trains with frozen equipment were taken out of service and sent south to thaw and be repaired. Conventional equipment was worst hit by the severe weather. Three long-distance conventional trains ("The Panama Limited," "The James Whitcomb Riley," and "The Mountaineer") were replaced with Amfleet equipment because of the scarcity of serviceable conventional cars and because Amfleet equipment proved able to withstand cold weather much better than the conventional equipment. By early March 1977, all operations had resumed, and the substituted Amfleet trains remained in operation.

During fiscal 1977, Amtrak's Chicago-St. Petersburg train, "The Floridian," was designated for service changes because it does not meet performance standards set forth in Amtrak's criteria and procedures for making route and service decisions, which were established according to provisions of the Amtrak Improvement Act of 1975. The route has suffered from

[&]quot;There are 10 daily "San Diegans," 4 of which are partially subsidized by the State of California.

low ridership and heavy losses. At year's end Amtrak was planning public hearings on its proposed alternatives to the present service, which range from rerouting the train through Atlanta (thus taking advantage of a larger market area) to discontinuing the route altogether.

Although Congress authorized \$545 million in subsidies for Amtrak for fiscal 1978, it appropriated \$56.5 million less than that, or \$488.5 million. Because of losses projected under this ceiling, Amtrak announced fare increases and service reductions to begin October 30, 1977. Reductions in service include eliminating 22 trains a day in the Northeast Corridor, laying off more than 1,000 employees, and reducing the frequency of operation of several long-distance trains. On September 22, 1977, Amtrak's board of directors voted to request an additional appropriation of \$56.5 million to avoid further cutbacks after January 1, 1978. Congress authorized an additional \$18 million and directed Amtrak to restore service that had been eliminated and discontinue plans for further cutbacks.

On September 19, 1977, Amtrak discontinued its service of transporting pets aboard its trains. Prior to that date, Amtrak carried pets in approved containers on baggage cars. The cost of complying with new U.S. Department of Agriculture regulations (Animal Welfare Act of 1976), which require climate control systems on trains and in animal shelters in stations (an estimated \$13.8 million) would have been prohibitive. Amtrak will, however, continue to transport seeing eye dogs accompanying blind passengers.

5 Problem Areas

Some types of problems in service are very persistent. Again this year, the major service problems (identified on the basis of passenger complaints, inspection reports, and various investigations) had to do with the adequacy of service regulations regarding temperature control, reservations and ticketing, employee attitudes, on-time performance, and availability of equipment (see part I, table 2).

A. Temperature control

Regulation 18 requires that the temperature on board a train be maintained at no more than 80° and no less than 60° Fahrenheit. Because temperature control has been a persistent problem, the Commission again this year conducted a series of intensive air-conditioning inspections across the country during the months of June, July, and August. Of the 3,672 cars inspected on August 10 and 11, 1977, 165 (4.5 percent) were found to have inside temperatures exceeding 80°. Comparable figures for the June and July inspections were 5.2 percent and 6.2 percent. Figures for the previous year's inspections were: May, 6.6 percent; June, 6.8 percent; and September, 2.5 percent.

The Commission's fiscal 1976 Report noted that not all of the 492 Amfleet coaches on order had been delivered by summer's end and that deployment of those cars should contribute considerably to better temperature control aboard trains. Delivery of Amfleet equipment was completed on June 9, 1977; nevertheless, the number of passenger complaints about faulty temperature control increased sharply this year, making it the second largest category of complaint (see table 2, part I). During fiscal 1977, the Commission received 3,455 passenger complaints regarding temperature control, compared with 1,986 during the prior year.

Unquestionably, extreme winter and summer weather conditions affected temperature control systems; but Commission investigators have also identified a problem that is within Amtrak's control—breakdowns in procedures for reporting maintenance of air conditioning equipment. The Commission believes this breakdown is a major factor in the high incidence of temperature control problems reported by passengers. Each Amtrak car is supposed to carry a repair card on which defects are noted and from which repairs are to be made, either on-board, at intermediate points, or at

Interstate Commerce Commission investigator testing on board temperature during a nationwide aircondition inspection.



designated maintenance points. Inspections revealed that many defective cars carried no repair card; further, the cards in many of those that did bore no notation that repairs were needed. Some repair cards indicated that cars had been dispatched from the designated maintenance point (a train's primary repair facility) in defective condition.

It is evident that failure to control temperature is related not only to the age of equipment but also to the maintenance effort. Bureau of Operations personnel visit Amtrak maintenance facilities annually to determine the level of pre-season preparation and maintenance of on-board air conditioning systems. Recent inspections have shown that over five percent of the cars checked had inside temperatures exceeding 80°F, the prescribed maximum temperature. Amtrak needs to give much closer attention to breakdowns in reporting procedure and repair operations at designated maintenance points if this chronic problem is to be solved.

B. Reservations and ticketing

Amtrak is required by the adequacy of service regulations to make reserved space aboard trains available and to furnish the same type of accommodations it confirmed. If the same accommodations are not available, specific steps must be taken to mitigate passenger inconvenience and ensure fair and reasonable relief: Amtrak must provide better accommodations at no extra charge on the confirmed train; or it must provide equal or better accommodations on the next available train and food and shelter in the interim.

Last year's report described a Commission study of Amtrak's Automated Reservations and Ticketing System. The study was critical of the complexity of the system and the frequent changes in the many fares and services, all of which inhibit the flow of correct information from reservations and information agents to customers. The report also noted that no formal training program in reservations and sales techniques existed prior to January 1976. During the past year Amtrak has expanded its training program, adding a two-day station services program to upgrade skills and effectiveness of ticketing personnel and administering a three-day course in better and more effective sales techniques to 957 Amtrak employees during the first half of 1977.

Despite these efforts, the Commission received slightly more complaints about reservations and information this year than it had last year (see part I, table 2). Common complaints continue to be: incorrect fare information; improperly prepared tickets; duplicate sale of the same space; and failure to advise passengers that sufficient seating may not be available

on reserved trains, a condition that results in overcrowding and standing.

From October 1, 1976, through August 30, 1977, Amtrak incurred expenses of approximately \$1.6 million as a result of passenger inconvenience caused by such problems as reservations and ticketing errors, malfunctioning equipment, missed connections, and incorrect information. These payments, by providing reimbursement for services paid for but not received, may restore good will and enhance potential for repeat business from passengers whose past experiences have been dissatisfying.

C. Employee attitudes

Again this year the Commission received a large number (1,239) of complaints about the assistance and service given by Amtrak employees. Passengers complained that reservations and ticketing personnel gave out erroneous information, that personnel were rude and ignored repeated requests for assistance, that on-board crews or station personnel were neglectful, and that employees failed to inform passengers adequately of delays and substitutions in service.

Amtrak initiated several significant training programs for employees during the first half of 1977 and continued to offer existing courses. Positive effects are not yet apparent; the number of employee-related service complaints received remained about the same as for the previous year.

A two-day station services training program was initiated in March 1977. The program is designed to upgrade skills and effectiveness of station employees who meet the public on behalf of Amtrak—ticketing personnel, baggage handlers, redcaps, gatemen/ushers, and some supervisory personnel; it places strong emphasis on customer relations and passenger assistance. By mid-1977, 1,238 Amtrak employees had completed this program.

Amtrak continued recurrent training, for personnel who provide on-board services, in the skills and procedures necessary to upgrade service in dining cars, snack cars, coaches, and sleeping cars, including Amfleet and Turbo equipment. This is a three-day program that reemphasizes customer relations. A separate five-day course trains newly hired serviced attendants. During the first half of 1977, 1,093 employees completed these courses. Also during this time 324 conductors attended a one-day orientation course that includes customer relations, and 95 conductors attended a half-day session on the operation of all types of new Amtrak equipment.

A three-year apprenticeship program for 10 electrician apprentices was started at Amtrak's Beech Grove, Indiana, maintenance facility on June 1, 1977. Amtrak has also agreed to conduct apprenticeship programs for carmen and machinists at the Beech

Grove facility at three-month intervals. Other maintenance training covers procedures and operation of Amfleet and new bi-level equipment, and maintenance and operation of F-40 locomotives.

D. On-time performance

The Commission received 4,085 complaints this year about late trains, more than three times the previous year's figure of 1,280. Regulation 6 requires that a train arrive at a station no later than 5 minutes after the scheduled arrival time for every 100 miles it has traveled, with a maximum allowable lateness of 30 minutes. (The regulation is related only to the degree of adherence to published schedules, not to the inherent capabilities of either equipment or track).

Appendix A shows on-time performances of carriers operating Amtrak trains from October 1976 through September 1977. The overall performance of these carriers declined this year, with trains arriving on time 70.5 percent of the time, compared with 75.1 percent of the time last year. The performance of eastern and midwestern carriers declined during the months of December 1976, January and February 1977, because of severe weather, and performance of several carriers was poor throughout the year. The Illinois Central Gulf continued at about the same poor overall level of performance (59.7 percent this year compared with 59.6 percent last year). The Louisville and Nashville experienced a sharp decline in on-time performance, dropping from 78.4 percent last year to 44.2 percent this year. The Missouri Pacific experienced a similar decline, going from 80.0 percent on-time last year to 51.4 percent this year. The on-time performance of the Consolidated Rail Corporation ("CRC NON CORR"), which began operations on April 1, 1976, with the badly deteriorated track of bankrupt Eastern railroads, also declined—to 39.4 percent from last year's already low level of 53.2 percent.

E. Availability of passenger equipment

During the past year, 673 complaints were received alleging violations of regulation 14, which requires sufficient equipment to meet normal travel demands and, to the extent equipment availability permits, to meet predictable peak period demands. The number of complaints remained virtually unchanged from last year's figure (see part I, table 2). Again this year, Commission inspections during peak periods revealed that Amtrak prepared well, with the equipment it had available, to keep difficult conditions during holiday travel periods to a minimum.

The number of passenger cars in Amtrak's fleet declined slightly this year; however, the remaining types of cars allowed Amtrak to provide service at the same level. Total cars numbered 2,249 on September 30, 1977, down from 2,257 on October 1, 1976; 142

conventional coaches, 28 sleeping cars, and 18 full service diners were retired, and 175 new all-electric Amfleet cars and 15 Turbo cars were added.¹⁵

Delivery and deployment on western routes of the first of 284 new bi-level Superliners was scheduled to take place in late 1977. Because of budget restrictions, the remainder of Amtrak's new-equipment program will not go forward until fiscal 1979. The plan includes the purchase of 355 new "low-level," long-distance cars for operation on eastern routes not served by Amfleet, the maintenance of a backup "mothball" fleet of 200 cars and 30 locomotives scheduled to be taken out of regular service, and the conversion of sleeping cars, baggage cars, and locomotives to electric operation.

The Commission's fiscal 1976 Report described Amtrak's long-range plan to purchase 118 Metroliner II cars. That plan has been revised and now calls for upgrading existing Metroliners over a two-year period beginning in fiscal 1978 and purchasing 50 Metroliner II cars in fiscal 1982, after construction and testing of prototypes during fiscal 1978 and 1979.

The next several years should see a steady reduction in the size of Amtrak's fleet; by 1982 it is scheduled to consist of only 1,632 passenger cars. Amtrak also expects that by that time its fleet will be composed entirely of all-electric equipment (i.e., air conditioning, etc.). Projected increases in ridership are expected to be accommodated by the increased passenger-carrying capacity of each new unit.

Appendix B shows that the out-of-service rate of Amtrak's cars jumped to 31.5 percent in January 1977, when severe weather hit the East and Midwest, from approximately 20 percent during the previous 3 months. By September 1977, the figure had been reduced to 22.6 percent, about the same level as September 1976.

During the past year Amtrak continued to acquire direct control of maintenance and repair facilities across the country. In 1977 it took over maintenance at Los Angeles and New Orleans, and it now performs 53 percent of its own car overhaul, 67 percent of assigned car maintenance, and 55 percent of assigned locomotive maintenance. Proposals for fiscal 1979 and beyond call for consolidating road diesel locomotive maintenance at seven locations, six of which will be owned and operated by Amtrak. (This work is currently done under contract to supporting railroads at 15 different locations.) In addition, two major maintenance facility overhaul programs were undertaken this past year: a \$38 million modernization program for Chicago's 12th Street and 16th Street

¹⁵Cars retired and added do not constitute total equipment activity (see appendix B).

yards, and the second part of a three-phase rehabilitation program for Amtrak's Beech Grove, Indiana, facility.

Special Studies

I Track Standards

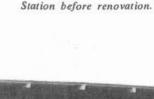
Marking a change in public policy, recent legislation has paved the way for making available to railroads funds specifically earmarked for improvement of roadbed and equipment. This Federal subsidy will amount to approximately \$5.5 billion, of which \$2.1 billion is committed to the rebuilding of ConRail, \$1.75 billion is committed to rebuilding Amtrak's Northeast Corridor, and \$1.6 billion is earmarked for loans and guarantees to railroads elsewhere in the country to be used in the rehabilitation of facilities and equipment.

As of August 31, 1977, eight railroads had applied to the Federal Government for loans. By making the loans, the Government will, in effect, be purchasing preferred stock of the railroads in order to complete the financial aid package. Of the more than \$520 million requested in the applications, nearly \$100 million is intended for work to be completed during fiscal 1977. In each case, the stock purchased would be that of the railroad itself and not of any parent holding company.

As a result of Ex Parte No. 277 (Sub-No. 2), and as a part of its continuing duty to monitor the performance of Amtrak, the Commission made a preliminary study of the utility of track used by carriers providing intercity rail passenger service. (The underlying causes of derailments and other service factors that appear to be related to deteriorated track conditions were also

The James Whitcomb Riley in route from Chicago to Washington, D. C. before the substitution of Amfleet equipment.

New shelter at Middletown, Pa.



Portion of North Philadelphia







considered.) The level of utility on May 1, 1976, and December 31, 1976, was compared with that existing on May 1, 1971, Amtrak's first day of operation.

Level of utility was considered maintained if it permitted the operation of a train between terminals in the same elapsed time as on May 1, 1971. Elapsed times (times between scheduled departure and scheduled arrival) were taken from published operating timetables or, when unavailable from that source, from the Official Railway Guide. 16

The first part of the study was made by the Bureau of Operations. The routes evaluated encompassed the operations of eleven railroads, including 9 currently or previously under contract with Amtrak to operate intercity passenger trains as well as Amtrak's own operations in the Northeast Corridor:

Routes	Railroads
New York-Kansas City	(Penn Central/Amtrak/
(via Indianapolis and	ConRail Missouri
St. Louis)	Pacific)
New York-Miami/	(Penn Central/Amtrak/
St. Petersburg	RFP/Seaboard Coast Line)
New York-Chicago	(Penn Central/Amtrak/
(via Pittsburgh)	ConRail)
Chicago-Minneapolis	(Milwaukee Road)
Chicago-New Orleans	(Illinois Central Gulf)
Chicago-Milwaukee	(Milwaukee Road)
Chicago-Miami/St.	(Louisville & Nashville
Petersburg	/Seaboard Coast Line)
Minneapolis-Seattle	(Burlington Northern)
New Orleans-Los Angeles	(Southern Pacific)

The railroads reviewed further in the study were the Seaboard Coast Line, Burlington Northern, Louisville and Nashville, Southern Pacific, and Missouri Pacific; those railroads that received Federal grants and subsidies and have already undertaken massive refurbishing programs were not considered further for purposes of determining utility. In all cases the primary objective of the study is to determine the ability of the underlying carriers to perform both as presently agreed upon and at the level existing on May 1, 1971.

The Seaboard Coast Line operates three routes over which five Amtrak trains operate. Of those trains, one ("The Palmetto") was not operating on May 1, 1971.

Examination of operating timetables revealed that most of the Seaboard Coast Line trains changed little between 1971 and 1976 in either elapsed time, number of stops, or scheduled average speed. "The Floridian," Amtrak's Chicago-Florida train operated by both the Seaboard Coast Line and the Louisville & Nashville, was an exception. Scheduled average speed of trains

operating on Seaboard Coast Line's portion of the route decreased nearly 5 miles per hour, and the elapsed time increased more than 1.5 hours. Also significant is the fact that average on-time performance for the route has not improved substantially even though the schedule running time has increased. It has not been determined that the lengthened schedules or difficulty with on-time performance are due to track conditions; however, there is evidence—the difference in running times between 1971 and 1976—that the level of utility has decreased.

The Burlington Northern currently operates two primary long-distance routes over which two Amtrak trains operate—"The Empire Builder" and "The North Coast Hiawatha." The operation of "The Empire Builder" has changed little since Amtrak's inception. Although 48 route miles have been added since 1971, bringing the total route length to 1,866 miles, "The Empire Builder's" scheduled average speed is faster now than it was in 1971. The elapsed time in May 1976, was 50 minutes longer than it was in 1971, but by December 1976, the elapsed time had been reduced to less than 1971 levels. All indications are that the Burlington Northern has maintained its utility of track at or above 1971 levels. It did, however, increase scheduled running times as much as four hours to accommodate the operation of Amtrak's SDP-40 locomotives.

The Louisville and Nashville Railroad operates one passenger route between Chicago and Montgomery, Alabama. This train connects with the Seaboard Coast Line at Montgomery to complete the Chicago-St. Petersburg travel of "The Floridian." Scheduled average speed of these trains is nearly 8 miles per hour slower than it was in 1971, and the elapsed time has been lengthened 3 hours 40 minutes southward and 2 hours 35 minutes northward over 1971 schedules. Ontime performance of trains on this portion of "The Floridian's" route, even with substantially elongated schedules, remains poor. Trains were on time 42.2 percent of the time in 1976, compared with 34.4 percent of the time in 1971.

The Southern Pacific and Missouri Pacific have shown little change in scheduled average speeds and elapsed times, for the trains and periods studied. On the other hand, both carriers demonstrated problems with on-time performance.

Southern Pacific's "Sunset Limited" between New Orleans and Los Angeles was on time 54.6 percent of the time in calendar 1976 and 56.2 percent of the time in fiscal 1976, 60.3 percent of the time during calendar 1971, and 59.2 percent of the time during 1972.

¹⁶These criteria by which level of utility was determined were established in regulation 26 of the Adequacy of Intercity Rail Passenger Service Regulations.

(Interestingly, during fiscal 1976, the "Sunset" was on time 85.4 percent of the time westward, but only 26.9 percent of the time eastward.) Inasmuch as the question of utility is still unresolved, further study will be conducted to determine whether the "Sunset's" performance problems are related to the utility of track or to other factors, such as scheduling and traffic.

The Missouri Pacific operates segments of several trains for Amtrak, one of which is the St. Louis-Kansas City segment on the New York-Kansas City route of the "National Limited." The "National" has had a persistent problem with on-time performance; in 1971, its trains between New York and Kansas City were on time only 56.3 percent of the time. For six sample months in 1976, its trains arriving in Kansas City from St. Louis were on time 39.3 percent of the time, and those arriving in St. Louis from Kansas City, 59.5 percent of the time.

During the same sample period, the "Inter-American," another train operated by the Missouri Pacific, arrived from Laredo, Texas, on time in St. Louis 27.3 percent of the time; and in Laredo, from St. Louis, 30.2 percent of the time. Moreover, the trains arriving late in Laredo were, on the average, more than 54 minutes late. Similarly, late arrivals at St. Louis averaged 58 minutes behind schedule.

At this point in the study we cannot establish whether these delays on the Missouri Pacific routes are attributable to track or to operating factors.

Further on-site investigations of the Missouri Pacific, the Southern Pacific, the Louisville and Nashville, and other railroads exhibiting the characteristics discussed, will be made, using the criteria set forth in adequacy of service regulation 26, to establish clearly the level of utility.

2 Incentive/Penalty Agreements

Incentive/penalty agreements date from July 1, 1974, when Amtrak entered into arrangements with Burlington Northern and the Milwaukee Road regarding schedule adherence, recovered and excess delay time, schedule improvement, and operability and availability of equipment. If performance in these areas was above a certain level, Amtrak would pay additional money. Penalties could be assessed if performance fell below a stated level or if cars were unclean. However, the total amount of the penalties assessed could never exceed the total amount of incentives earned each year (i.e., penalties assessed could not decrease the base payment).

According to the General Accounting Office, as of March 1, 1977, 17 railroads were providing services to Amtrak under 1 or more of 3 types of agreements, one of which is incentive/penalty. From July 1, 1974, to the present, 10 of these 17 railroads signed

incentive/penalty agreements. The GAO study, dated June 8, 1977, revealed that by June 30, 1976, Amtrak had paid \$32.6 million as incentives for improvement of on-time performance. GAO concluded, however, that liberal arrival criteria and loosened schedules rather than the monetary incentives accounted for performance improvements.

Shortly before negotiating the first amended agreements, Amtrak adopted new performance criteria that were much more permissive than previous criteria. Revisions of these criteria included:

- 1. Increasing the length of time a train could be late and still be considered on time, from 5 minutes to 30 minutes;
- 2. Altering schedules to allow more running time, even though those schedules did not warrant expansion;
- 3. Considering on-time performance at final destinations only, while disregarding intermediate stops;
- 4. Establishing on-time performance incentives at 65 percent levels while the carriers involved were at that time operating on time an average of 80 percent of the time:
- 5. Averaging the performance of all trains regardless of route length; and
- 6. Basing incentive payments on arrival times as recorded by the carrier, with some question arising as to accuracy.

The second amended agreements recently signed by the railroads show Amtrak's effort to improve incentive provisions and the basis for payments. Changes include:

- 1. Elimination of incentives for recovered time and schedule improvement;
- 2. Elimination of liberal arrival criteria;
- 3. Tightening of some schedules;
- 4. Raising the baseline on which on-time incentives are paid from 65 percent to 80 percent; and
- 5. Basing incentive payments on the performance of individual trains rather than on average performance of all trains.

GAO also noted in its report that although Amtrak, by June 1, 1976, had paid incentives totaling \$1.5 million to improve equipment maintenance, little improvement was evident. Furthermore, the second amended agreements replace provisions that were difficult to enforce with other provisions that GAO indicates may also be filled with problems. Specifically, GAO expresses concern that the new agreements do not make adequate provision for ensuring that the work is completed before incentives are paid. Further, the

agreement may place more emphasis on quantity than on quality of services and may pay more attention to performance of scheduled maintenance than to the required daily cleaning of cars.

GAO concluded that Amtrak should base its costs on the services the railroad is to perform and that future agreements should be based on the provision of said services, with the option to penalize if performance falls below an established baseline, regardless of the amount of incentives paid.

During 1975 the Commission studied Amtrak's incentive contracts with the Chicago, Milwaukee, St. Paul, and Pacific Railroad (Milwaukee), the Burlington Northern Railroad (BN), and the Seaboard Coast Line Railroad (SCL). These three carriers were selected for study because they received the highest incentive payments and they operate in a variety of geographic locations. The on-time performance of these three carriers was studied and train schedules before and after implementation of the incentive payment program were analyzed to determine whether schedules were reasonable or contained unreasonable "time buffers."

The Commission study concluded that incentivecontract standards were too low, that allowances were too permissive, and payments too high, and most importantly, that the benefits derived were practically nonexistent.

During this fiscal period, Amtrak made payments totaling \$11,265,916 to the 10 supporting railroads having incentive contracts for adherence to minimum on-time performance standards for individual trains. Incentive payments made by Amtrak to contracting carriers during the past year are shown in Appendix C.

3 National Transportation Policy Study Commission
The Interstate Commerce Commission recently

forwarded to the National Transportation Policy Study Commission, at its request, copies of four ICC studies of Amtrak operations. (The four reports were: Amtrak Maintenance Study and Facility Review; Rail Passenger Questionnaire-Survey Program; Special Investigation of Amtrak Incentive/Penalty Agreements; and Study of Amtrak's Reservations and Ticketing System.)

This study commission, established by the Congress under the Federal-Aid Highway Act of 1976, is responsible for preparing, by December 30, 1978, a report discussing the policies and programs of the Federal Government that affect the development of a national transportation system. Additionally, the study commission will consider new policies necessary for the development of a balanced national transportation system that will meet projected needs.

4 Amtrak Through Route and Joint Fares Study (Ex Parte No. 339)

Section 106 of the Rail Transportation Improvement Act of 1976 directed the Commission to conduct and transmit to Congress a study of through routes and joint fares between Amtrak and (1) other intercity common carriers by rail and (2) motor carriers of passengers. As part of this study, the Passenger Service Branch made a preliminary analysis of rail/bus connections at four cities where through ticketing and baggage arrangements between Amtrak and bus companies exist, and rail/rail connections between Amtrak and other intercity rail passenger carriers. Both the extent to which existing arrangements make for easier transfer from one mode to another and the limitations of such arrangements were analyzed (see part IV, Intermodal Service). This study was completed by the Commission and submitted to Congress with preliminary recommendations on September 30, 1977.

Financial Analysis

On May 1, 1977, Amtrak completed its sixth year of operations; six years fraught with financial and operating problems. Amtrak was assigned the task of continuing a rail-passenger service with ill-maintained, antiquated equipment, dilapidated passenger stations and a dependence for service and maintenance on railroad companies which had been eager to rid themselves of the responsibility and costs of rail-passenger service—a service which had been all but abandoned by the traveling public. To complicate matters, Amtrak's renovation and capital programs were caught in one of the worst inflationary spirals in recent history.

In order to meet immediate goals, Amtrak invested in costly stop-gap measures to provide at least minimal service for those riders still showing a preference for train travel. Construction of new, long-haul passenger equipment, except for Metroliner service, had virtually ceased, and delivery was years in the future; hence,

Amtrak was forced into expensive refurbishments of equipment purchased from railroads being relieved of passenger service. Much of such equipment was of pre-World War II vintage, the latest having been manufactured in 1955. Use of this antiquated equipment also gave rise to numerous complaints and undoubtedly decelerated the projected rise in revenues against ever-increasing costs.

Amtrak undertook to develop an administrative force and train personnel in record-keeping. Education of employees in their duties, combined with maintenance of current records, caused a burgeoning payroll, which has continued to increase, in the clerical and administrative area. This was further increased by the purchase of the Northeast Corridor and other rail segments, but it is also in this area which we believe Amtrak should be able to effect considerable economies in the future.

Table 3
Condensed Income Statements
In Thousands

	1977	1976	1975	1974	1973
Railway Operating Revenues	\$311,272	\$277,769	\$246,247	\$250,264	\$190,914
Railway Operating Expenses	803,435	679,966	554,760	465,001	336,277
Net Revenue from Rwy. Operations	(492,163)	(402,197)	(308,513)	(214,737)	(145,363)
Rental Income (Expense) Net	(4,119)	(6,017)	(5,798)	(7,778)	(6,381)
Other Income	367	182	(331)	42	281
Fixed Charges	40,758	33,311	20,092	14,137	2,792
Net Income (Loss)	\$(536,673)	\$(441,343)	\$(334,734)	\$(236,610)	\$ (154,255)

General Finances

Amtrak finances followed the same general patterns in FY 1977 as in FY 1976, with expenses (and Federal funding) rising rapidly—nationwide. Amtrak expenses continue to be two and one half times its revenues. Net loss increased from \$441 million in FY 1976 to \$537 million in 1977; Federal funding rose from 66.2 percent of total income to 73.2 percent; and loss per passenger mile, 11 cents in FY 1976, was 14 cents for the year ended September 30, 1977.

Amtrak's \$536.7 million loss in FY 1977, combined with previous years' losses, brings the aggregate loss since May 1, 1971, to a total of \$1.9 billion. Table 3 gives condensed income statements for the last five fiscal years, and detailed income statements for the last four fiscal years appear in appendix D. Since Amtrak changed its reporting fiscal period in 1976 to coincide with the Federal fiscal year ending September 30, financial statements and other schedules have been recomputed and restated where feasible to the 12-month periods ending September 30 of each year.

Surprisingly, the cost to Amtrak of actual passenger transportation (including train crews, station agents, and on-board personnel) represents a relatively modest percentage of total expenses. Transportation expenses for FY 1977 totaled only 31.4 percent of Amtrak expenses, or \$266.3 million of \$847.9 million.¹⁷

Amtrak's taxes were greatly affected by the acquisition, refurbishing, and construction of passenger stations and by near quadrupling of payroll in the last three years. For the fiscal year ending September 30, 1977, Amtrak's taxes climbed to \$81.6 million compared to \$36.2 million FY 1974. The harsh winter weather in January, February, and March 1977, also contributed to increased expenses and falling revenues.

We are concerned that the share of expenses attributable to transportation is so low. In our

statement dated October 12, 1977 (before the Subcommittee on Transportation and Commerce of the House Committee on Interstate and Foreign Commerce), we noted that even reductions in service over unprofitable routes would have a minimal impact on Amtrak's operating deficit, as the burden caused by transportation expenses is minimal.

We indicated in that statement that a fertile field of inquiry would be Amtrak's payroll. During FY 1977 Amtrak's payroll accounted for \$272.3 million—one-third of the carrier's total expenses.

Cash and Working Capital

Amtrak is permitted to draw down its quarterly allocation of Federal grants at any time during a quarter, and the allocation for the third quarter of FY 1977 (April, May, and June) was drawn down April 1, leaving no Federal cash available for the rest of the quarter. On July 1, Amtrak drew down \$158.11 million, which was disbursed in July, leaving the carrier with only its own revenues with which to operate at month's end and through August. An additional \$25 million capital grant was drawn down August 29.

Table 4 and Amtrak's balance sheet (shown in appendix E) for FY 1977 show a cash balance of \$5.5 million. In fact, Amtrak was in a deficit cash position of \$6.6 million on September 30, 1977. Checks totaling \$12.1 million, which had been remitted to various creditors, were restated on the books as payable to banks. Amtrak has an agreement with the banks permitting such overdrafts.

Table 4Comparative Cash Position
September 30, 1977, 1976, 1975, 1974, & 1973¹

	1977	1976	1975	1974	1973
Cash Temporary Cash Investments	\$5,508,285 ² -0-	7,143,639 ² 7,500,000	8,912,625 5,500,000	6,798,335 -0-	838,134 6,000,000
Total	\$5,508,285	14,643,639	14,412,625	6,798,335	6,838,134
Change from Prior Year	-62%2	+2%2	+112%	-1%	+4%

^{&#}x27;Restated to September of each year to facilitate comparisons.

¹⁷See appendix D. This figure represents total operating expenses (\$784 million) plus total corporate expenses (\$63 million).

²After restatement of \$12.1 million of checks remitted, which were shown as due bank at 9/30/77 and \$12.9 million at 9/30/76.

Net working capital shows a deficit of \$55.6 million on September 30, 1977 (table 5), a slight improvement over 1976. This improvement stems from a large increase in capital grants available during FY 1977.

L Changes in Amtrak's Financial Position

Appendix F shows the effect of drawing down large amounts of Federal grants during FY 1977. Although Amtrak sustained the greatest loss in its history, debt reduction was substantial, especially in accounts and notes payable and in capitalized lease and mortgage obligations. All these debt items had increased in FY 1976.

During 1975, 1976, and 1977, Amtrak showed large increases in purchases of materials and supplies, with the greatest increase in 1976 (appendix G). This is entirely due to acquisition of maintenance shops, mostly the result of the purchase of the Northeast Corridor and its facilities.

In addition, purchase of cars, locomotives, and turbo

trains has led to substantial increases in the depreciation accounts.

2 Federal Funding: Grants and Loans

Ever since Congress authorized the first \$40 million on October 20, 1970, Amtrak has become increasingly dependent on Federal funding for its passenger operations.

Table 6 compares funds received from the Federal government with those from other sources. Except for FY 1976, the percentage of Federal funding to total funding has increased annually, from 58.3 percent in calendar year 1973 to 73.2 percent in FY 1977. Before 1975, federally guaranteed loans made up most of the Federal funds; since then, Federal grants have been the principal source. The balance of guaranteed loans actually decreased in FY 1977 because of the use of capital grant funds. Amtrak can effect capital acquisitions through Federal guranteed loans and pay the loans from capital grants. During FY 1977, Amtrak

Table 5
Cash & Working Capital¹
Millions

	1977	1976	1975	1974	1973
Cash and Temporary Cash Investments	5.5	14.6	14.4	6.8	6.8
Other Current Assets	106.2	75.6	33.7	76.4	104.1
Total Current Assets	$\overline{111.7}$	90.2	48.1	83.2	110.9
Total Current liabilities	167.3	152.4	378.9	247.1	`90.5
Net working capital	(55.6)	(62.2)	(330.8)	(163.9)	20.4

Table 6
Source of Funds
For Fiscal Years Ended September 30, 1976-1977 and Calendar Years 1973-75
By percent of Total

	9/30/77	9/30/76	12/31/75	12/31/74	12/31/73
Federal Grants	57.3%1	47.5%	36.7%	20.3%	22.0%
Federal Guaranteed Loans	15.9	18.7	35.7	49.2	36.3
Total from Federal Sources	73.2	66.2	72.4	69.5	58.3
Railroad Buy-in-Payments		***********		2.2	12.8
Revenues	25.2	31.3	26.7	28.1	28.8
Other	1.6	2.5	0.9	0.2	0.1
Total-Other-Than-Federal	26.8	33.8	27.6	30.5	41.7
Total-All-Sources	100%	100%	100%	100%	100%

used \$226 million in such grants for capital purposes (see appendix F).

Despite increased revenues each year, revenues as a percent of total cash have steadily decreased (except in FY 1976). Table 6 shows a decline in revenues from 28.8 percent of the total in 1973 to 25.2 percent in FY 1977. Thus Amtrak's own revenues supply one dollar for every four dollars needed. This does not take into account the rehabilitation of the Northeast Corridor, which is funded separately.

Since it started in 1970, Amtrak has been authorized \$3.171 billion, has had appropriated \$2.484 billion, and has drawn down \$1.819 billion in Federal grants. Amounts for each fiscal year from September 30, 1971, through September 30, 1977, are shown in appendix F, and in a barchart in figure 1.

Appendix H summarizes Federal guaranteed loans and shows that the Federal guaranteed loan authorization has been reduced by \$25 million (it will probably be further reduced, since these guaranteed loans serve no real purpose in that they are usually paid with Federal funds). Appendix I offers an analysis of the loan authority reflecting capital expenditures for FY 1975 to 1977.

Long-Term Debt

Since 1976, when Amtrak bought the Northeast Corridor and undertook on-going rehabilitation of its tracks, the carrier's balance sheet has included mortgages payable as liabilities.

Capitalized lease obligations shown in the balance sheet and in appendix J are largely made up of capitalized leases for rental and ultimate purchase of rolling stock and computer equipment on September 30, 1977, Amtrak records show \$127 million due under capitalized leases. However, because the lease-purchase agreements include interest, appendix J

Table 7
Summary of Long-Term Debt at September 30, 1977
In Thousands

Calitalized Leases (Including interest)	\$179,479
Los Angeles Commissary (Including interest)	232
Northeast Corridor - Purchase	53,977
Northeast Corridor - Due U.S. Govt.	89,013
Long Term Notes	492,628
Total	\$815,329

shows total capitalized lease obligations of \$179.5 million.

Equipment or other assets bought or refurbished under Federal guaranteed loans are included under notes payable in the long-term section of the balance sheet. On September 30, 1977, these items show a balance of \$492.6 million. The mortgage payable on the Northeast Corridor is not so shown because it does not include interest.

Amtrak's total long-term debt at the end of FY 1977, including its short-term portion, is \$815.3 million (see table 7). Appendix J shows the debt in detail with amounts due each year until 1982.

The mortgage payable to the Federal Government includes \$25 million advanced for principal payments and interest payable to Consolidated Rail Corporation (ConRail). The balance of \$89 million covers expenditures for upgrading the Northeast Corridor.

Sources of Expenses

I Services Billed to Amtrak by Railroads

When Amtrak assumed responsibility for rail passenger service in 1971, all services previously provided by the operating railroads (including operation and maintenance of trains, ticket agent and clerical services) continued to be provided by the railroads and billed to Amtrak. During its first two years of operation, Amtrak employees handled little more than the carrier's own administrative work. During 1973 and 1974, Amtrak hired a number of onboard and clerical personnel. In 1975, purchase of maintenance facilities tripled the number of maintenance-of-equipment employees, and, in 1976, purchase of the Northeast Corridor greatly increased equipment maintenance and for the first time, Amtrak hired large numbers of maintenance-of-way employees. This decreased the amount paid to the railroads but multiplied Amtrak's overall expenses: maintenance of equipment cost Amtrak \$65.5 million in 1973 and \$216.2 million in FY 1977.

Much of the increase stemmed from acquisition of maintenance facilities. Amtrak previously bore only allocated costs applicable to the maintenance of Amtrak equipment, but now pays full year-round costs of all facilities.

Appendix K compares amounts billed by operating railroads with Amtrak expenses in the same categories. Table 8 reflects only comparison totals and the percentage of the total billed by the railroads. Figure 2 presents a bar chart that also shows revenues and the results of operations for each year from 1973 to 1977. All schedules and tables include railroad incentive payments made in four of the last five years.

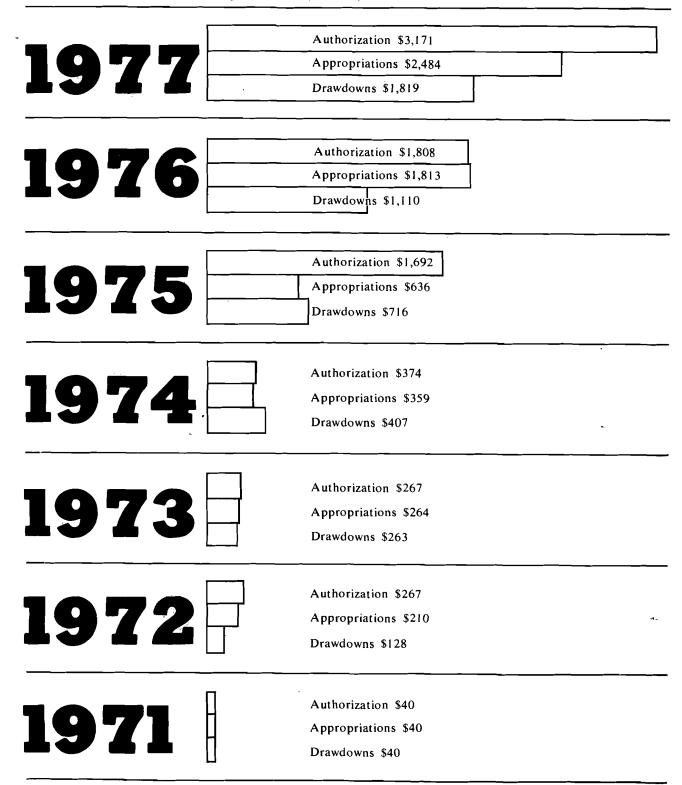


Table 8

Expenses Billed and Incurred

For the years ending September 30, 1977, 1976 and December 31, 1975, 1974, and 1973

In Thousands

Type of Expense	Period					
	1977	1976¹	1975	1974	1973	
Expenses billed by Railroads	\$248,121	\$285,324	\$303,628	\$283,368	\$277,519	
Expenses incurred directly by Amtrak	599,824	433,789	301,599	246,239	83,201	
Total Amtrak expenses	847,945	719,113	605,227	529,607	360,720	
Percentage of total expenses paid to Railroads	29.3	39.7	50.2	53.5	76.9	

2 Dining and Buffet Service

Amtrak's dining and buffet service has consistently shown large losses, although the situation is improving. Table 9 shows losses for fiscal years ending on September 30 of 1975, 1976, and 1977.

When Amtrak assumed responsibility for passenger service, it bought approximately 165 diners from 13 railroads; not only were many of the diners outmoded, but they also differed in basic configuration. Some were full diners, others diner-lounge cars. All carried combustible fuels and used wet and dry ice for refrigeration. They also required full dining crews; certain tasks, such as dishwashing, were done by hand. Because Amtrak service is nationwide, it is difficult to include the right kind of diners in the car consists. Replacements for defective diners are not readily available.

Table 9
Dining and Buffet Revenue and
Expense
In Thousands

	1977	1976	1975
Revenue from operations	\$21,554 60,885	\$18,095 52,599	\$14,892 50.570
Expense of service (Loss)	(39,331)	(34,504)	(35,678)

Amtrak is attempting to decrease its losses from dining and buffet service with delivery of new cars and revamping of rail-dining concepts. New Amfleet cars have been redesigned for increased storage, and have microwave ovens and electric refrigeration. The new cars provide fast foods, hot sandwiches, and tray meals (preferred by many travelers). Conventional diners are still used on long-haul trains, but feature simplified menus; food is purchased nationally.

Amtrak now maintains commissaries to service its dining and buffet operations across the nation. As long

as commissary operations are continued, Amtrak cannot make a profit from its dining and buffet service. However, Amtrak hopes to reduce losses by several million dollars a year, and it is also training employees to be passenger-service oriented.

3 Payroll Costs

Payroll costs for Amtrak's 21,000 employees rose to \$272 million in FY 1977, a 49 percent increase over FY 1976.

The transportation payroll has not increased substantially since Amtrak absorbed station agents and on-board service personnel in 1973. However, payroll costs in all other areas have risen dramatically during the last two years, largely because of acquisition of the Northeast Corridor (NEC) and efforts to modernize corridor equipment, and because of union and non-union wage increases.

Purchase of the NEC has increased the number of Amtrak's maintenance-of-way and structures employees from 21 to 1975 to 4,000 in 1977. Also, purchase and delivery of 492 Amfleet cars has required additional employees in maintenance of equipment and stores (918 in 1975, more than 5,000 in FY 1977).

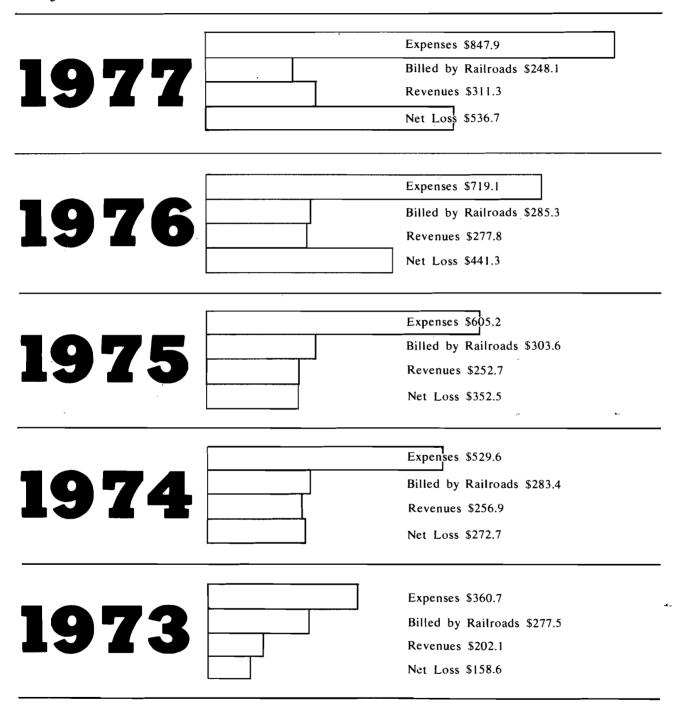
During the two years from September 30, 1975, to September 30, 1977, the number of executives, officials, and staff assistants rose 59 percent; professional, clerical, and general staff jumped 65 percent. Employees in the support areas now have the training and experience to handle increased demand, and gross revenues have increased only 20 percent in the last four years. As a \$300 million carrier, Amtrak probably does not need an administrative and clerical staff totaling one-third of all employees; this staff should be reevaluated.

The number of employees in each classification during the six years ending September 30 is shown in table 10. Table 11 shows total payroll expense for FY 1973 to 1977. Payroll expense by classification is not available for 1977.

Figure 2

Payments to Railroads

in relation to total expenses and operating revenues for the years ending 9/30/77 and 9/30/76 and 12/31/73-75



4 Payments for Passenger Inconvenience (Emergency Exchange Vouchers)

Charges for passenger inconvenience resulting from late or postponed trains, equipment failures, clerical errors, or other causes fall into three major categories:

- 1. Policy refunds: amounts paid to passengers for inconvenience resulting from inadequate service;
- 2. Transportation, including the cost of providing substitute transportation such as bus service; and
- Other, including the cost of meals, lodging, taxis, télephone calls and miscellaneous expenses incurred by inconvenienced passengers.

The general procedure for handling inconvenienced passengers is (1) try to get the passenger on the next train that day; (2) if there is no train that day, provide the passenger with lodging and meals, and put her/him on a train the next day or, if that is not acceptable, provide another form of transportation; (3) if the passenger refuses (1) and (2), reimburse her/him for the unused portion of the ticket and provide assistance in making airline reservations (Amtrak has not absorbed the additional cost of air transportation since the beginning of 1977).

For fiscal year 1977, passenger inconvenience claims totaled \$1,768,721, compared to \$889,860 in the previous fiscal year. Table 12 compares passenger inconvenience payments for the four quarters ending September 30, 1977, and total payments for fiscal years 1977 and 1976.

The second quarter of FY 1977 brought more complaints than any period on record: 20 trains were suspended because of severe winter weather, and the Federal Railroad Administration (FRA) issued a slow order on 150 Amtrak locomotives late in the quarter, causing many passengers to miss connections until Amtrak could adjust train schedules.

Table 11

Total Number of Employees and Total Payroll For Fiscal Years Ending September 30, 1977 76, 75, 74 and 73 Dollars in Thousands

Year	Total Number of Employees		
1973	5,375	\$30,216	
1974	8,983	84,131	
1975	9,285	110,856	
1976	15,978	183,275	
1977	20,536	272,311	

The fourth quarter of each fiscal year brings many complaints because 30 to 35 percent of Amtrak traffic takes place during the summer. The great majority of summer complaints concern inadequate air conditioning. Passengers who encounter this problem receive refunds on long-haul trips. Purchase of Amfleet cars has alleviated the problem—only one-third as many passengers have complained about air conditioning in the new cars—but usually high payments in the fourth quarter indicate a breakdown in the quality of overall service. (Payments totaled \$509,500 in the fourth quarter of FY 1977, compared with \$344,300 in the quarter of FY 1976, and most Amfleet cars were in service by the fourth quarter of FY 1977.)

Amtrak has liberalized its policy on passenger-inconvenience payments to try to improve its public image. This will increase costs, but prompt reimbursement for inconvenience may attract repeat ridership. Amtrak is also improving locomotives to meet FRA standards.

Table 10

Number of Employees by Classification

1977'	1976	1975	1974	1973	1972
540	480	341	251	146	57
6,918	5,459	4,195	4,433	3,974	879
3,737	2,063	21		2	1
5,048	4,124	918	232	62	9
4,293	3,852	3.810	4,067	1,191	89
20.536	15.978	9,285	8.983	5.375	1,035
	540 6,918 3,737 5,048 4,293	540 480 6,918 5,459 3,737 2,063 5,048 4,124 4,293 3,852	540 480 341 6,918 5,459 4,195 3,737 2,063 21 5,048 4,124 918 4,293 3,852 3,810	540 480 341 251 6,918 5,459 4,195 4,433 3,737 2,063 21 5,048 4,124 918 232 4,293 3,852 3,810 4,067	540 480 341 251 146 6,918 5,459 4,195 4,433 3,974 3,737 2,063 21 2 5,048 4,124 918 232 62 4,293 3,852 3,810 4,067 1,191

Figures given as of September 30 of each year.

5 Northeast Corridor

In accordance with the U.S. Railway Association (USRA) Final System Plan, which states that the principal user of a railroad facility should own or lease and maintain the facility, Amtrak bought several rail lines and their support facilities from ConRail upon conveyance from debtor estates. By far the largest and most important purchase was that of the Northeast Corridor (NEC), which provides service from Washington, D.C., to Boston, Mass. The purchase price of \$86.366 million included spur lines off the NEC from Philadelphia to Harrisburg, Pa., and from Springfield, Mass., to New Haven, Conn.

In addition to rail lines, Amtrak acquired passenger stations, half the stock ownership of Washington Terminal, and several maintenance facilities, including large facilities at Wilmington, Del., the Penn Coach yard in Philadelphia, and the Sunnyside yard on Long Island, N.Y. With these acquisitions came about 8,000 employees, most of whom work on maintenance of roadway and equipment and in train dispatching and control. Many work for ConRail and commuter operations; Amtrak is reimbursed for such work, and reimbursement is credited to the original expense accounts. Thus, Amtrak income statements are prepared net of reimbursements and reflect the expense of passenger operations.

ConRail continues to supply train crews, conductors, brakemen, and other personnel for Amtrak passenger trains, while Amtrak allows ConRail to use NEC track and performs track maintenance, signaling, and train dispatching service for ConRail freight trains in NEC. Amtrak and ConRail have negotiated an interim agreement for ConRail's freight operations whereby ConRail pays Amtrak 22.4509c per car mile (adjusted to the Association of American Railroads price index) for freight cars operated over the Corridor.

Corridor and non-Corridor properties cost Amtrak a total of \$90.3 million. The \$3.9 million for non-

Corridor segments has been paid, but the Corridor is being paid off at \$10.8 million a year plus interest over a period of 8 years. Because of offsets from freight operations, ConRail has the option to require accelerated payments but has not yet exercised this option.

The roadway property acquired by Amtrak supports a number of commuter operations in NEC. The carrier provides the same services it provides for ConRail freight, plus some servicing and repair of commuter equipment. Amtrak is paid a percentage of revenues generated and subsidies received by ConRail from the commuter agencies (see table 13).

As this money does not cover the full cost of commuter operations, the Urban Mass Transit Authority (UMTA) will make up the difference (it paid for the first 180 days of Amtrak's Corridor ownership). However, UMTA is estopped from providing funds after the 180-day period, which ended September 27, 1976. Section 13c of the Urban Mass Transportation Act states that the Secretary of Labor must first be satisfied with compliance with labor-protection agreements between the commuter agencies and labor unions, and agreement on these points has not been reached. The withholding of UMTA funds has caused a shortfall in Amtrak funds over fully allocated costs. To alleviate this, Amtrak established a line of credit

Table 13
Agreed Compensation Percentages
Between Amtrak and ConRail

ě	Percent
New Jersey Dept. of Transportation	36
Massachusetts Bay Transit Authority and Rhode	
Island Dept. of Transportation	36
Southeast Pennsylvania Transit Authority and	
Delaware Dept. of Transportation	43
Maryland Dept. of Transportation	43

Table 12Passenger Inconvenience Payments

Payment Category		To	otal			
	1st Qtr 1977	2nd Qtr 1977	3rd Qtr 1977	4th Qtr 1977	1977	1976
Policy Refunds	\$25,936	\$31,693	\$37,102	\$58,811	\$153,542	\$91,625
Transportation	82,055	308,134	143,139	242,756	776,084	331,791
Other	142,829	422,824	65,482	207,960	839,095	476,444
Total	\$250,820	\$762,651	\$245,723	\$509,527	\$1,768,721	\$899,86

(without Government guarantees) with Manufacturers Hanover Bank & Trust Company, at a favorable interest rate.

The NEC is Amtrak's major source of revenue and shows a lower loss than the carrier's national operations. The NEC "Spine" (Washington to Boston) contributed 33.6 percent of Amtrak's total revenue for FY 1977 and only 24 percent of total loss (see appendix L). NEC, as a whole, including Philadelphia-Harrisburg and Springfield-New Haven spurs, contributed 35.4 percent of total revenue and 26.9 percent of total loss. The Corridor may or may not provide measurable economies for Amtrak in the future. However, acquisition of NEC will decrease dependence on other railroads for its operations. The NEC line will be the first really passenger-oriented, long-haul rail line, and should improve passenger safety, comfort, and service and enhance Amtrak's image as a passenger carrier.

6 Operating Results by Route

Temporarily suspended early in 1976, Amtrak's Route Profitability System was reinstated in June of that year with some modifications. The statistical summary by route for 1977 again shows that Amtrak losses are increasing; again, no route showed a profit (see appendix M). The Metroliners operated at a loss of \$17.9 million in FY 1977, compared with 17.3 million in FY 1976. Metroliner loss per revenue

passenger mile was 6.2 cents in FY 1977, compared with 5.5 cents in FY 1976, an increased loss of .7 cents.

Routes receiving State subsidies under section 403(b) of the RPSA continue to experience losses. The Chicago-Quincy route (subsidized by the State of Illinois) had the closest expense-to-revenue ratio for 1976 (13.6 percent) and the lowest ratio in 1977 (15.5 percent), but the route still experiences increased loss.

Amtrak's nationwide expenses remain 2 1/2 times its revenues. Expenses for NEC remain twice the revenue earned, with a .7 percent increase over 1976. Expenses for services outside the Corridor increased .2 percent over revenues in FY 1976.

Amtrak has shown consistency and refinement in expense allocation and statistical accumulation. We continue to recommend the following changes to make the system more meaningful for Amtrak, Congress, and the public:

- Contract incentives and penalties under RPS relate directly to the operation of specific trains and should be so assigned.
- General and administrative expenses and interest are Amtrak expenses and should be allocated as overhead expense to trains and routes.
- Because State subsidies are extremely important indicators, the Commission recommends that subsidies be shown for the routes to which they apply.



Economic PART IV Analysis

This part of the report assesses Amtrak's performance and productivity in fiscal 1977 in the context of its accomplishments in providing a modern rail passenger service, as mandated by the Congress, and the economic costs of developing the services provided. For the most part, evaluations are based on progress made during fiscal 1977.¹⁸

Traffic Performance, Equipment Utilization and Revenues

Analysis of Amtrak's traffic performance is based on three measures: number of revenue passengers carried (ridership);¹⁹ number of miles traveled by revenue passengers; and revenues generated from the ridership. Figures used to indicate equipment productivity (utilization) are: average revenue passenger loadings per train (revenue passenger miles per train mile); average miles traveled per revenue passenger; and average train load factor. These figures are also used to indicate the relationship between the volume of traffic on selected routes and the type of equipment used. Revenues from supplemental (nonpassenger) and specialized services are also discussed.

1 Ridership

Ridership is a major criterion for assessing Amtrak's performance. Its importance was stated by Department of Transportation Secretary Adams:

Rail passenger service has an important role in the national transportation picture. . . . The route and service criteria established for Amtrak are a very constructive step forward in arriving at decisions on how much service Amtrak is to offer. . . . Ridership and the potential for ridership is the single most important factor. . . . ²⁰

As shown in table 14, Amtrak carried 19.2 million revenue passengers during fiscal 1977, an increase of 7.4 percent over the 17.9 million carried during the previous 12-month period. Revenue passenger miles increased 7.0 percent, while revenue generated by the ridership was up 6.4 percent. When viewed in terms of a cumulative increase over the two preceding comparable periods, the gains may be considered an impressive indication of Amtrak's ability to revitalize public confidence in rail passenger service—its primary objective.

Table 15 compares fiscal 1977 data with fiscal 1976 data for selected long-distance and short-distance routes. On nearly all long-distance routes, both the number of revenue passengers and the miles traveled by those passengers declined, while both figures on the majority of the short-distance routes increased substantially.

Table 16 shows, for selected routes, the average revenue passenger loadings per train (revenue passenger miles divided by train miles). Table 17 shows the average number of miles traveled per revenue passenger.

The average number of miles traveled per Amtrak passenger increased slightly (3.1 percent) on these short-distance routes and decreased slightly (4.2 percent) on the long-distance routes. The average number of revenue passengers per train on the short-

¹⁰In 1976, Amtrak's fiscal year was changed (Public Law 94-25) to begin on October 1 and end on September 30. The Commission's fiscal 1976 report covered the period August 1, 1975, through July 31, 1976. To provide a comparable 12-month period, all fiscal 1976 Commission data have been restated to cover the period October 1, 1975, through September 30, 1976.

¹⁹Revenue passengers exclude 92-316 and non-92-316 personnel.

²⁰Confirmation Hearings. Excerpts from answers to written questions posed by the Senate Commerce Committee.

distance routes increased by 13.2 percent, while the train loadings on the selected long-distance routes declined by 5.8 percent.

The "load factor" measure is intended to reflect a general relationship between the number of seats available and the number of passengers carried. It is computed by dividing the total number of miles traveled by revenue passengers by the total number of available seat miles.

Table 18 gives the average load factor—or average occupancy of available seats—on selected short- and long-distance routes during fiscal 1976 and fiscal 1977.

The load factor figures follow fairly closely the train loadings data. The average occupancy of available seats increased 7.6 percent on trains on short-distance routes and decreased 3.6 percent on trains on long-distance routes.

The load factor statistic is a general indication of equipment utilization, but it does not reflect the quality of service provided. It should be kept in mind that there are a number of intermediate markets served between the endpoints of a route. Very few passengers travel the entire route. (For example, according to Amtrak, the Boston-Chicago "Lake Shore Limited" is used almost exclusively by short-distance passengers.

with only approximately 3 percent of patrons riding end-point to end-point.) By improving the quality of service to the intermediate markets, the number of available seats may increase. In other words, while the introduction of new equipment such as bi-level cars, Amfleet equipment, and turbo trains is continuing (thus making available many more seats in anticipation of future demands of intercity travelers), the load factor figures in many cases may not reflect improvements in the quality of service provided.

Amtrak is depending on its new Amfleet cars and bilevel "superliner" cars, with their increased seating capacity, to attract riders and increase revenues. According to Amtrak, new Amfleet equipment, service improvements, schedule changes, and additional trains have succeeded in attracting riders and have added revenues in the Washington-New York City, Washington-Chicago-Detroit, and Los Angeles-San Diego corridors. By converting to new equipment and adding more trains in the high-density Los Angeles-San Diego corridor, ridership increased by 69.8 percent. The trains attracted 659,000 passengers in fiscal 1977, or 271,000 more than in fiscal 1976.

Amtrak attributes an increase in ridership between Seattle and Portland and in the San Joaquin Valley to

Table 14Amtrak Traffic Profile
Comparison of FY 76 - FY 77 Traffic Levels by Quarters

					•		
Period		Revenues	Passe	of Revenue engers lions)	Revenue Passenger Miles (millions)		
	Actual	Percent Change	Actual	Percent Change	Actual	Percen Change	
Fiscal 1976							
4th QTR - 1975	\$53.4	6.6	4.213	(4.6)	944.6	(3.4)	
1st QTR - 1976	50.9	1.4	4.112	(2.2)	868.8	(4.0)	
2nd QTR - 1976	61.1	22.9	4.717	6.8	1,011.8	17.0	
3rd QTR - 1976	66.7	12.9	4.835	20.8	1,222.8	42.7	
Total FY 76	\$232.1	<u> 11.0</u>	17.877	4,9	4,048.0	12.0	
Fiscal 1977							
4th QTR - 1976	58.7	9.9	4.848	15.1	1,066.5	12.9	
1st QTR - 1977	52.1	2.4	4.303	4.6	883.7	1.7	
2nd QTR - 1977	65.0	6.4	5.040	6.9	1,118.6	10.6	
3rd QTR - 1977	71.2	6.8	5.015	3.7	1,264.4	3.4	
Total FY 77	\$247.0	6.4	19.206	7.4	4.333.2	7.0	

Sources: I.C.C. OS-B Reports, Qtrly. I.C.C. RE&I Reports, Qtrly. new Amfleet equipment introduced on those routes. For example, ridership in the Seattle-Portland corridor increased 22.6 percent, from 118,000 in fiscal 1976, to 144,700 in fiscal 1977. Turboliners, which replaced conventional equipment in service on the New York City-Albany-Buffalo line in the fall of 1976 and on the Adirondack route to Montreal in the spring of 1977, have also probably contributed to increased ridership.

To provide an incentive for travelers to use its longdistance trains, the new Amtrak bi-level "Superliner" cars are scheduled to begin regular service between Chicago and Seattle in the first quarter of fiscal 1978. Bi-level service will be phased in over an 18-month period on the Chicago-Seattle routes ("Empire Builder" and "North Coast Hiawatha"), Chicago-Los Angeles ("Southwest Limited"), Chicago-San Francisco ("Zephyr"), Los Angeles-New Orleans ("Sunset Limited"), Los Angeles-Seattle ("Coast Starlight"), and the Chicago-Houston trains.

In an effort to attract more passengers to its "Inter-American" trains, a heavy money loser, Amtrak increased frequency to daily service. However, because

Table 15
Amtrak Revenue Passengers and Revenue Passenger Miles

Route	Number	of Revenue Par (thousands)	ssengers	Revenue Passenger Miles (millions)				
Route	FY 1976	FY 1977	Percent Change	FY 1976	FY 1977	Percent Change		
Short Distance								
Chicago-Carbondale	135.4	136.4	0.7	22.8	*****			
Chicago-Detroit	413.7	399.9	(3.3)	58.0	58.3	0.5		
Chicago-Dubuque	32.5	37.4	15.1	4.6	4.9	6.5		
Chicago-Milwaukee	248.5	253.0	1.8	20.1	20.2	0.5		
Chicago-Port Huron	83.0	87.3	5.2	14.2	15.0	5.6		
Chicago-Quincy	80.9	81.8	1.1	13.7	14.2	3.6		
os Angeles-San Diego	388.5	659.5	69.8	33.8	57.7	70.7		
Minneapolis-Duluth	31.4	69.7	122.0	4.2	9.7	131.0		
NYC-Buffalo/Detroit	559.0	573.7	2.6	107.3	119.1	11.0		
New York-Montreal	97.1	116.5	20.0	17.5	24.0	37.1		
Dakland-Los Angeles	63.9	83.0	29.9	9.8	11.7	19.4		
Seattte-Portland	118.0	144.7	22.6	16.9	20.8	23.1		
Washington-Cumberland	163.0	252.8	55.1	5.7	16.8	194.7		
Long Distance								
Chicago-Florida*	137.9	126.9	(8.0)	87.1	81.7	(6.2)		
Chicago-Houston	253.9	228.3	(10.1)	113.2	95.7	(15.5)		
Chicago-Los Angeles	243.1	219.1	(9.9)	255.0	212.7	(16.6)		
Chicago-New Orleans	176.9	173.2	(2.1)	89.9	83.6	(7.0)		
Chicago-St. Louis	279.0	173.2	(37.9)	53.2	31.5	(40.8)		
Chicago-NYC/Washington	224.9	201.8	(10.3)	129.2	113.0	(12.5)		
Chicago-Oakland	231.8	204.8	(11.6)	189.9	152.9	(19.5)		
Chicago-Seattle (North)	278.7	244.1	(12.4)	173.6	141.4	(18.6)		
Chicago-Seattle (South)	213.3	171.3	(19.7)	92.2	78.1	(15.3)		
Chicago-Washington/Norfolk	172.5	158.4	(8.2)	59.6	51.6	(13.4)		
Kansas City-NYC/Washington	166.4	167.9	0.9	68.6	74.5	8.6		
os Angeles-New Orleans	82.9	77.6	(6.4)	81.2	72.9	(10.2)		
Los Angeles-Oakland-Seattle	371.6	412.1	10.9	174.2	188.5	8.2		
New York-Florida*	774.6	862.8	11.4	557.1	625.5	12.3		
Washington-Montreal	337.8	335.7	(0.6)	67.7	67.3	(0.6)		

Note: Statistics compiled from Amtrak Route Earnings Summary, Monthly Report, exclude 92-316 and non 92-316 personnel.

^{*}Includes St. Petersburg and Miami.

of continued low ridership, frequency reverted to triweekly service. According to Amtrak, many of the problems in the "Inter-American" service between Little Rock, Arkansas, and Laredo, Texas, stem from a poor relationship with the Missouri-Pacific—slower speeds and poor on-time performance (see Part II, Track Standards).

In the Northeast Corridor high-density market, riders initially preferred the more expensive, higher quality service offered by the Amtrak Metroliners. However, as newer, more modern Amfleet equipment was introduced, passenger preference shifted to conventional trains (see table 19). In calendar 1974,

ridership for all trains increased 10 percent, while Metroliner and conventional ridership rose 9 percent and 13 percent, respectively. In fiscal 1977, with overall ridership on the route up 4.0 percent, conventional train ridership increased by 52.0 percent while Metroliner ridership declined by 9.3 percent.

Official travel by U.S. Government military and civilian personnel on Government Transportation Requests continued to increase during fiscal 1977. Amtrak's marketing efforts directed to this highly specialized, service-oriented travel market generated \$5.45 million in revenues in fiscal 1977, up from \$3.42 million and \$4.99 million in the two preceding

Table 16
Amtrak Average Revenue Passenger Loadings Per Train*

Short Distances	Average Revenue Passengers Per Train					
Short Distances	FY 1976	FY 1977	Percent Change			
Chicago-Carbondale	70.6	72.2	2.3			
Chicago-Milwaukee	78.3	80.3	2.6			
Chicago-Detroit	92.3	88.1	(4.6)			
Chicago-St. Louis	89.2	82.0	(8.1)			
Los Angeles-San Diego	117.1	137.8	17.7			
NYC-Buffalo/Detroit	87.1	85.3	(2.1)			
New York-Montreal	63.1	86.1	36.5			
Dakland-Bakersfield-Los Angeles	30.4	36.8	21.1			
eattle-Portland	61.9	76.8	24.1			
Vashington-Cumberland	46.6	48.9	4.9			
Chicago-Dubuque	32.5	38.7	19.1			
Chicago-Quincy	71.3	73.5	3.1			
Minneapolis-Superior	38.8	88.8	128.9			
Long Distances						
Chicago-New Orleans	132.9	124.2	(6.6)			
Chicago-Washington/Norfolk	34.0	43.0	26.5			
Chicago-Houston	63.0	53.4	(15.2)			
Chicago-NYC/Washington	96.0	85.2	(11.3)			
Chicago-Los Angeles	156.5	130.4	(16.7)			
Chicago-Denver-Oakland	106.7	87.4	(18.1)			
Chicago-Seattle (North)	103.6	86.7	(16.3)			
Chicago-Seattle (South)	67.0	58.0	(13.4)			
os Angeles-Portland-Seattle	174.5	189.2	8.4			
New York-Florida	137.3	141.6	3.1			
Chicago-Florida	38.8	37.9	(2.3)			
Kansas City-NYC/Washington	49.8	54.6	9.6			
os Angeles-New Orleans	127.0	113.1	(10.9)			
Vashington-Montreal	137.9	137.2	(0.5)			

Note on Table 15 applies.

^{*}Average revenue passenger loadings per train = revenue passenger miles + train miles.

comparable 12-month periods²¹ (a cumulative 58.8 percent increase). Military travel accounted for approximately 60 percent of these revenues.

2. Express, Mail, and Baggage Revenues

Revenues from Amtrak's railway express (ARE) specialized services (priority package, economy package, and custom express) have increased steadily since the service began in 1973. In fiscal 1977, combined revenue from these three special express services amounted to approximately \$2.22 million, an increase of 27 percent over fiscal 1976 revenue of \$1.75 million and nearly double the \$1.15 million in fiscal 1975.

Citing rising costs due to inflation, Amtrak raised economy package express rates by 5 percent during the fiscal year. These rates, comparable with those for Greyhound's "next bus out" express service, are based on distance and weight plus a minimum basic charge of \$7.50 per shipment.

A flat \$5 "Santaexpress" rate on package-express shipments from eight major cities was offered during a 30-day period in November-December, 1976. The reduced charge, basically an "opportunity" rate

Table17Amtrak Average Miles Per Passenger Selected Routes (Comparison FY 1976-1977)

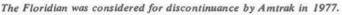
n	Aver	age Miles Per F nue Passenger	Reve-	
Route	FY 1976	FY 1977	Percent Change	
Short Distance				
Chicago-Quincy	168.2	171.7	2.1	
Chicago-Carbondale	167.6	166.4	(0.7)	
Chicago-Detroit	144.9	141.7	(2.2)	
Chicago-Port Huron	172.2	, 171.3	(0.5)	
Minneapolis-Superior	135.5	136.6	0.8	
Los Angeles-San Diego	87.4	88.1	0.8	
NYC-Buffalo/Detroit	191.1	191.2	0.1	
New York-Montreal	177.0	201.0	13.6	
Seattle-Portland	143.1	144.9	1.3	
Washington-Portland	35.3	65.0	84.1	
San Francisco-Los Angeles	152.5	144.9	(5.0)	
Long Distances				
Kansas City-NYC/Washington	410.9	429.6	4.6	
Chicago-Houston	445.7	421.5	(5.4)	
Chicago-Los Angeles	1,033.3	944.6	(8.6)	
Chicago-Washington/Norfolk	343.2	325.9	(5.0)	
Chicago-NYC/Washington	567.4	551.5	(2.8)	
Chicago-Denver-Oakland	795.5	717.5	(9.8)	
Chicago-Seattle (North)	609.2	563.7	(7.5)	
Chicago-Seattle (South)	420.3	438.9	4.4	
Los Angeles-Oakland-Seattle	464.3	452.0	(2.7)	
New York-Florida	722.4	721.0	(0.2)	
Chicago-Florida	633.7	629.6	(0.6)	
Chicago-New Orleans	503.0	475.6	(5.4)	
New Orleans-Los Angeles	973.1	920.3	(5.4)	

²¹The previous annual revenue figures have been restated to reflect two 12-month periods (corresponding to fiscal 1975 and fiscal 1976) for comparison with fiscal 1977 statistics.

Table 18
Amtrak Passenger Load Factors (Percentages)
Selected Routes (Comparison FY 1976-FY 1977)

Route	Pero	cent	Percent
	FY 1976	FY 1977	
hort Distance			
Chicago-Carbondale	32.0	35.2	10.0
Chicago-Detroit (Turbo)	34.3	31.8	(7.3
Chicago-Dubuque	17.4	25.8	48.3
Chicago-Port Huron	28.5	24.9	(12.6
Chicago-Quincy	25.2	30.3	20.2
Chicago-St. Louis	39.3	34.6	(12.0
Los Angeles-San Diego	44.9	40.1	(10.7
Minneapolis-Superior	41.0	54.8	33.7
NYC-Buffalo/Detroit	34.1	34.8	2.1
New York-Montreal	36.3	35.8	(1.4
Oakland-Bakersfield	35.3	38.0	7.7
Seattle-Portland	40.5	40.5	
Washington-Cumberland	17.8	30.8	73.0
Long Distance			
Chicago-Florida (St. Petersburg) (Miami)	46.1	46.8	1.5
Chicago-Houston	49.0	45.5	(7.1
St. Louis-Laredo	37.1	33.4	(10.0
Chicago-Los Angeles	60.5	62.3	3.0
Chicago-New Orleans	49.9	46.8	(6.2
Chicago-Norfolk	25.4	25.8	1.6
Chicago-NYC/Washington	52.0	50.3	(3.3
Chicago-Oakland	58.6	55.5	(5.3
Chicago-Minot-Seattle (North)	69.0	60.7	(12.0
Chicago-Washington/Newport News	38.8	38.4	(1.0
Kansas City-NYC/Washington	37.3	41.3	10.7
Los Angeles-New Orleans	48.0	46.8	(2.5
Los Angeles-Seattle	52.1	55.3	6.1
New York-Florida (St. Petersburg) (Miami)	58.3	54.5	(6.5
Washington-Montreal	40.7	46.2	13.5
Chicago-Seattle(s)	69.0	63.7	(7.7

Source: Compiled from Amtrak Market Research Passenger and Equipment Utilization Comparison for Selected Routes, Monthly Report. (Base data for months of August-September 1977 estimated).





instituted during a strike at United Parcel Service to attract shippers to Amtrak's express service, proved a profitable promotional effort.

Amtrak is exploring various systems of providing pick-up-and-delivery service in conjunction with ARE. It has also entered into a demonstration program at a military installation to ship duffel bags for a flat \$8.50 charge anywhere within the Amtrak system of approximately 305 stations handling express shipments.

Mail revenues rose from \$7.93 million in fiscal 1976 to \$10.67 million in fiscal 1977, a gain of 35 percent. The increase was made possible by greater use of more efficient mail containers.

Excess, transfer, and miscellaneous baggage accounted for approximately \$289,391 in supplemental

revenue, an increase of 4.9 percent over fiscal 1976 revenue of \$275,949. The specialized baggage cars now in use on many long-haul routes handle ARE packages and mail.

Fares and Cost of Service

Although Amtrak is not under the rate jurisdiction of the Commission, some cost data are useful in analyzing the cost/revenue relationship in terms of the cost of the service provided and route and systemwide profitability.

Table 19
Northeast Corridor - Amtrak Ridership Profile

	Number of	of Revenue P (000)	Revenue Passenger Miles (millions)			
Route	FY 1976	FY 1977	Percent Change	FY 1976	FY 1977	Percent Change
Washington-NYC	2,738.9	2,830.4	3.3	377.8	379.7	(0.5)
Metroliner	2,173.1	1,970.5	(9.3)	314.8	289.3	(8.1)
Conventional	565.8	859.9	52.0	63.0	90.4	43.5
Boston-Washington	2,653.0	2,721.1	2,6	398.5	416.2	4.4
New Haven-Hartford-Springfield	210.3	250.5	19.1	8.7	8.5	(2.3)
NYC-Philadelphia	3,072.8	3,139.0	2.2	162.6	155.7	(4.2)
Harrisburg-Philadelphia	727.9	758.3	4.2	40. 2	40.6	1.0
Boston-Harrisburg	196.7	209.8	6.7	11.9	12.1	1.7
Boston-Philadelphia	448.7	472.1	5.2	45.5	46.7	2.6
Philadelphia-Springfield-Washington	247.4	341.0	37.8	24.5	34.9	42.5
NYC-Boston (Turbo)	209.6	203.3	(3.0)	33.8	28.8	(14.8)
	Average	assenger	Average Miles Per Revenue Passenger			
	FY 1976	FY 1977	Percent Change	FY 1976	FY 1977	Percen Change
Washington-NYC	158.8	147.1	(7.4)	127.7	126.0	(1.3)
Metroliner	144.0	142.7	(0.9)	145.0	146.9	1.3
Conventional	173.5	151.4	(12.7)	110.4	105.1	(4.8)
Boston-Washington	191.3	198.6	3.8	150.0	152.8	1.9
New Haven-Hartford-Springfield	32.9	32.5	(1.2)	40.8	34.4	(15.7)
NYC-Philadelphia	235.0	253.8	8.0	52.9	51.2	(3.2)
Harrisburg-Philadelphia	57.9	57.0	(1.6)	55.3	53.5	(3.3)
Boston-Harrisburg	117.1	121.4	3.7	60.1	57.5	(4.3)
Boston-Philadelphia	160.9	156.6	(2.7)	101.8	98.7	(3.0)
Philadelphia-Springfield-Washington	116.1	139.6	20.2	95.1	102.0	7.3
NYC-Boston (Turbo)	86.7	81.3	(6.2)	161.8	140.9	(12.9)

Source: Compiled from Amtrak Route Earnings Summary, Monthly Report.

1 Fares

The 1970 law that created Amtrak called for "innovative marketing and pricing concepts" by Amtrak to develop a variable fare structure that would be attractive to the various market segments and would thus lead to a ridership that would be consistent throughout the year.

By law, Amtrak determines its own fares, which are not regulated by the Commission. However, as it is financially supported by Federal funds, Amtrak acknowledges a commitment to develop a basic fare structure that will lead to a viable rail passenger service but will not have irrevocable negative effects on other modes of transportation in the national passenger transportation system. Present fares have evolved from a number of across-the-board percentage increases and selective add-on increases, which, according to Amtrak, are not counterproductive to ridership growth.

It is Amtrak's stated policy that fare increases are programed to respond to predicted Consumer Price Index (CPI) changes for an annual change of about 5 percent. Fares are reexamined bi-annually to make certain they are competitive with other modes of transportation and to keep pace with inflation.

In line with its pricing strategy, Amtrak applied certain general and selective fare increases during fiscal 1977 to help offset escalating operating costs. A 3.5 percent general increase, with exceptions, was applied to fares and charges in the Eastern section of the United States in December 1976, and in the Western section in February 1977. On June 1, 1977, most fares and charges throughout the system were increased 3 percent to 5 percent; in addition, numerous "add-ons" were applied on a selective basis (e.g., a surcharge of 25¢ to \$1 on tickets, needed, according to Amtrak, to cover higher costs caused by the harsh weather of the 1976-1977 winter).

Amtrak announced a general 2.5 percent to 5 percent increase on most fares and charges to go into effect in October 1977, although some routes are not affected. The proposed increase does indicate some degree of cross-subsidization. The basic increase will be 2.5 percent; higher increases will be applied to routes or corridors along which ridership has shown gains, the average trip length (in miles) has increased,

or competitive modes of transportation have applied comparably greater fare increases.

To remain competitive with other modes for the intercity passenger market, Amtrak has initiated bargain excursion, off-season, and special discount fares to highlight new service concepts, schedule revisions, special and seasonal events, and natural tourist attractions.

The degree to which Amtrak relies on a Federal

operating subsidy to continue operation can be shown in relation to the fare structure. In fiscal 1977, Amtrak's total expenses (system cost base) were more than double the amount of revenue (revenue cost base). With passenger revenues contributing only 37.7 percent to the cost base, Amtrak cannot rely solely on fare increases to offset the operating deficit. In many instances, additional increases might be self-defeating, reducing ridership and revenues.

2 Cost of Service

By the terms of its charter, Amtrak is not required to justify its fare structure or its fare increases on a cost basis. The reason for citing cost data in this report is to place Amtrak's performance in an economic perspective, not to use them in an evaluation of the reasonableness of the fare levels in terms of the cost of services provided.

The increasing cost of service, reflected in an operating deficit that has plagued Amtrak since its inception, can be attributed in part to continuing inflation that has increased costs of supplies and labor.

An index published by the Association of American Railroads (AAR) illustrates the marked rise in operating expenses. The AAR combined index of material and supply prices, fuel cost, and wage rates (including supplements) increased from 145.6 in 1972 to 258.4 in October, 1977, a rise of 77.5 percent. During fiscal 1977, fuel (coal and oil) prices increased by 12.7 percent, compared with 5.2 percent during the previous comparable 12-month period. Amtrak's train fuel and power costs rose from \$0.99 per train mile in calendar 1974 to about \$1.31 in fiscal 1977. Labor. costs rose by 4.9 percent in fiscal 1977, compared with 4.6 percent in fiscal 1976. Amtrak's payroll costs (wages and salaries) in fiscal 1977 amounted to \$272 million—approximately 34 percent of Amtrak's total operating expenses of \$803 million.

Despite the fact that ridership increased during fiscal 1977, revenues did not keep pace with the cost of service. The relationship between revenues and expenses may be observed by comparing fare levels with costs at the level of service provided.

As noted earlier, revenue passenger miles in fiscal 1977 increased 7.0 percent over fiscal 1976, and accompanying revenues increased 6.4 percent. During fiscal 1977, average revenue per passenger mile was 6.7 cents. During that same period, the net loss per passenger mile was 14 cents, compared with 11 cents in fiscal 1976. More significantly, the net loss per passenger, systemwide, rose from nearly \$20 in fiscal 1975 to nearly \$25 in fiscal 1976 to over \$27 in fiscal 1977. Losses on some routes during fiscal 1977 far exceeded systemwide average.

Amtrak seeks to decrease operating deficits primarily by changing its basic route structure. Such

routing changes are based on an evaluation of the potential of each route for increased ridership and revenue.

It has also initiated some service reductions, which it apparently considers an effective means of cost control. In response to Amtrak requests, the Commission waived a number of service requirements in fiscal 1977—a move which, by reducing operating and other expenses, has saved Amtrak about \$3 million without detracting from the overall adequacy of service provided (see Part I, Exemptions).

In view of growing costs, the objective that Amtrak be a "for profit" corporation²² will probably be difficult to attain in the short run, if at all. The major questions appear to be: How much should fares contribute to overall revenues? What proportion of the cost of providing the service should the Amtrak passenger pay? And what proportion should be borne by the taxpayer?

3 Federal Government Investment in Amtrak

The persistence of the operating deficit makes it evident that Amtrak will continue to look to Federal monies to offset its operational losses and to meet its need for capital funds. In fiscal 1972, Amtrak operated with a \$153.5 million deficit. That deficit was \$441.3 million in fiscal 1976, and in fiscal 1977, it rose to \$536.7 million. Cumulatively, the annual deficits amount to approximately \$1.9 billion. It is the continuing nature of the problem that appears to be of primary concern to the Congress and that probably

Amtrak travelers picking up checked baggage at their destination.



contributed to its decision to restrict the fiscal 1978 budget to \$488.5 million (exclusive of any additional supplemental appropriations).

Amtrak has also received, through fiscal 1977, a total of \$1.82 billion in Federal grants. Considering, in addition, the \$1.75 billion authorized by the Congress to rehabilitate track and right-of-way in the Northeast Corridor, it is clear that the Federal Government has a considerable financial investment in Amtrak.

Subsidies

Whether Federal funds are viewed as a subsidy or as a Government investment in what many consider a "national resource," Amtrak's increasing dependence on Federal funds suggests that the Amtrak concept should be reevaluated in terms of both the type of national transportation system desired and the economic feasibility of the Amtrak operation. The total amount of funds provided is contingent on these decisions.

Marketing

To develop and maintain the best possible route alignment consistent with the established route and service criteria, Amtrak's major marketing effort is aimed toward attracting increasing numbers of travelers to rail transportation.

A portion of Amtrak's current market research concentrates on identifying characteristics and travel patterns of riders, by segments, along its long-distance routes. When planning specific train service, this information about "segment riders" provides a truer picture of needs and wishes than does information about "end-point to end-point riders."

Amtrak is also studying passenger behavior at many stations and along many routes within high-volume corridors to determine the sensitivity of demand to changes in fares and the extent to which fare changes and other service factors divert passengers to other modes of transportation.

Promotion

Amtrak has a variety of plans and programs to promote ridership. Many of its new tour/excursion fares are designed to attract travelers to the trains during the off-season, to increase train load factors in general or on specific routes. For example, Amtrak sharply reduced fares for its highly popular U.S.A. Rail

²²Rail Passenger Service Act of 1970 (Public Law 91-518), Section 301.

Pass after Labor Day. Passes that allow unlimited travel were reduced from \$290 to \$185 for the 14-day plan, from \$365 to \$250 for the 21-day plan, and from \$450 to \$295 for the 30-day plan.

An experimental program between June 1 and November 30, 1977, offered a "free kiddle ride" to one child, when accompanied by a full-paying adult, from nine major cities to any other destination in the system.

Other plans include special round-trip fares, which offer appreciable savings over two one-way fares, and discount fares on rides originating or terminating in certain cities during the early morning hours (between midnight and 6 a.m.).

To improve the marketing of the Amtrak U.S.A. Rail Pass abroad, arrangements were made with Pan American Airways to sell the pass through most of its international sales offices, effective January 15, 1977.

Revenue from Amtrak's sales program that offers tickets to passengers through travel agents has increased significantly—from approximately \$16 million in fiscal 1973 to \$44.4 million in fiscal 1977.

Tour packages identifying Amtrak as the mode of transportation are arranged through tour wholesalers and travel agents. With an increasing number of tours offered to ski areas, rail revenues, which rose to \$2.4 million (a 39 percent increase) in 1976, jumped to \$3.5 million in fiscal 1977, an additional 46.7 percent increase.

Intermodal Service

By order served April 12, 1977, the Commission instituted a proceeding (Ex Parte No. 339) to study through routes and joint fares between Amtrak and other intercity rail carriers and motor carriers of passengers.²³

The study analyzed, from an economic viewpoint, the feasibility and practicability of integrating bus and rail passenger service. The study recognized the complexities of funding joint facilities (the extensive funding requirements and methods of financing joint projects) and formulating joint fares and divisions between carriers; the additional cost burden incurred by carriers (especially individual bus operators) in preparing and maintaining current schedules; and the general responsibility and accountability for issuing joint fare vouchers for through travel.

The Department of Transportation expressed its support for the through route/joint fare service arrangements, stating that "a fully integrated system will contribute to a better common carrier surface transportation system." The American Bus Association (ABA, formerly NAMBO) expressed its belief that such arrangements "represent an opportunity for

reducing Amtrak deficits."

Amtrak has said frequently that it aims to attract passengers who currently use automobiles for intercity transportation (and thus is not competing with the bus industry). It has stressed its belief that the intercity bus industry should work more closely with Amtrak to attract the automobile traveler to public surface transportation. Yet Amtrak submitted only limited comments in the Ex Parte No. 339 proceeding. Nevertheless, the Commission, to the extent possible, examined the problems inherent in intermodal coordination and formulated possible solutions to those problems.

The Commission concluded that buses do compete with Amtrak for patronage over the densely populated Northeast Corridor routes and elsewhere. It further concluded that there is potential for establishing intermodal coordination, which would foster public passenger transportation, promote conservation of energy resources, and provide a practical alternative to automobile transportation. Intermodal arrangements can result in economic savings to carriers by virtue of shared terminal expenses; they can provide sparsely populated and rural areas with connections not economically justifiable for a single mode; and they can make travel more efficient and convenient for passengers by saving them time and energy.

The cooperative service between Greyhound and Amtrak at the South Station rail-bus terminal in Boston appears to be generally successful. According to the carriers, the intermodal arrangements have been convenient for the passengers, and there is some indication that the service has attracted some riders who otherwise would have traveled by private automobile.

The relative positions of class I bus companies and Amtrak as to a share of the public surface transportation intercity market, as measured by revenue ridership, may have changed slightly. While Amtrak's ridership increased by 7.4 percent during fiscal 1977 (up from 17.9 million to 19.2 million), bus ridership dropped approximately 4.8 percent (down from 73,795,000 to 70,268,000).24

The experiment in joint cooperation between Amtrak and Auto-Train, which began in October 1976, ended in September 1977. According to Amtrak, the joint service, which ran between Louisville, Kentucky, and Sanford, Florida, "has made no significant contribution to reduce Amtrak's substantial deficit" on its "Floridian." Under the agreement, Auto-Train

²³In compliance with Section 106 of the Rail Transportation Improvement Act of 1976 (Public Law 94-555), the Commission transmitted to the Congress a report of its study. The report is dated September 30, 1977.

²⁴Ten largest bus companies, excluding charter or special service passengers.

passenger cars and auto carriers were handled by the "Floridian" on the Chicago-Miami run.

Market Outlook

Although Amtrak had been optimistic about reducing its operating deficit during fiscal 1977, the results are rather discouraging. Many factors—traveler acceptance of rail transportation as an alternative to automobile transportation, the economy, energy resources, and intermodal competition, among others—will influence the ridership and revenues of Amtrak.

1 Traveler Use of Public Transportation

According to the research firm of Frost and Sullivan, Inc.,²⁵ the use of the private automobile for intercity travel will decline over the coming years, primarily because of a need to reduce energy consumption. The firm predicted that rail's share of the intercity passenger market will rise from 0.1 percent in 1974 to 3 percent in 1995, and that bus travel will increase from 1.1 percent in 1974 to 5.6 percent in 1995.

2 The Economy

During the first half of 1977, the economy continued to expand, showing impressive gains in gross national product (GNP) and employment as well as moderate growth in the level of inflation. Forecasts for calendar 1978 point to moderate but respectable growth in GNP and employment. However, current economic

conditions also indicate that inflation may prove troublesome. Given the expected increases in GNP, personal consumption expenditures for intercity transportation service should also increase. This relationship is shown in table 20, which presents the relative levels of growth in gross national products, personal consumption expenditure, personal consumption expenditure, personal consumption expenditures for intercity transportation, and intercity passenger miles. The strong percentage increases in all four factors during 1976 and 1977 indicate increased revenues for public carriers of intercity passenger traffic in the future.

3 Energy Resources

Since late 1974, the energy situation has played an increasingly crucial role in both the economy and intercity transportation. A significant increase in the price of gasoline and oil has resulted in an increased cost of public and private transportation. Table 21 shows the rising cost of gasoline and oil relative to the consumer price index and the cost of public transportation. The most intensive user of gasoline and oil, the private automobile, has experienced the greatest cost increases. Surprisingly, however, the increase in the cost of public transportation has been relatively small. Despite this large differential in price increases, there has been no significant shift toward the use of public transportation for intercity travel. Rather, as table 22 indicates, the share of intercity passenger miles traveled on public transportation modes since 1974 has actually declined by 0.3 percent. In addition,

Table 20

Gross National Product (GNP), Personal Consumption Expenditures (PCE), Personal Consumption Expenditures for Intercity Transportation (PCT), and Total Intercity Passenger Miles (IPM), All Modes 1971-1977¹

In Billions, except percent

Year	GNP	Percent Change	PCE	Percent Change	PCT	Percent Change	IPM	Percent Change
1971	1,107.5	3.0	691.9	3.4	3.3	0.0	1,229	3.7
1972	1,171.1	5.7	733.0	5.9	3.5	6.1	1,300	5.8
1973	1,235.0	5.5	767.7	4.7	3.8	8.6	1,349	3.8
1974	1,217.8	(1.4)	760.7	(0.9)	4.0	5.3	1,259	(6.7)
1975	1,202.1	(1.3)	755.1	(0.7)	3.8	(5.0)	1,311	4.1
1976	1,274.7	6.0	821.3	8.8	4.0	5.3	1,390	6.0
1977²	1,335.9	4.8	860.0	4.7	4.2	5.0	1,445	4.0

^{&#}x27;GNP, PCE, and PCT in constant 1972 dollars.

^{28&}quot;U.S. Transportation Market to 1995."

²Forecasted Estimate: Source DRI and Bureau of Economics.

Source: U.S. Department of Commerce.

during the first half of 1977, Americans have not only continued to purchase large-size automobiles, but have also stepped up their purchase of small-size, more fuel efficient, foreign cars. Therefore, the impact of anything short of a major curtailment of gasoline supplies on public transportation is speculative.

4 Intermodal Competition

Changes in market share define how successful Amtrak has been in attracting passengers who have decided to use public intercity transportation. Table 23 highlights Amtrak's performance by presenting each mode's share of personal consumption expenditures for intercity travel. After four years of steady decline, rail's share during 1975 and 1976 stabilized at 5.1 percent. This, together with increasing levels of

Table 21

Price Indices, The Cost of Transportation And The
Consumer Price Index (CPI), 1972 = 100

Year	Gasoline and Oil	Public Trans- portation	CPI
1971	98.6	96.0	96.7
1972	100.0	100.0	100.0
1973	109.2	101.0	106.2
1974	146.1	103.2	117.9
1975	156.0	110.6	128.7
1976	162.3	121.5	136.1
1977¹	170.6	126.4	144.9

Forecasted Estimate: Source DRI and Bureau of Economics. Source: U.S. Department of Labor, Bureau of Labor Statistics.

personal consumption expenditure for intercity travel, indicates that Amtrak may be entering a period of increased revenues.

In conclusion, while the long-range forecast for rail passenger service may be encouraging, fiscal 1978 appears to be a critical period in Amtrak's existence.

The pressure of mounting deficits may force Amtrak to make dramatic changes in its basic route structure and services. Passenger uncertainty about schedules and services may decrease ridership and revenues. The net effect may be to *increase* rather than to decrease the operating deficit.

In view of the discouraging economic outlook, the Congress may have to consider either increasing its financial burden to allow Amtrak to continue in the current and planned framework, or redirecting the objectives initially set forth in the Congressional mandate to Amtrak.

Table 23

Percentage Distribution of Personal Consumption Expenditures

For Intercity Travel By Mode, 1971-1976

Year	Rail	Air	Bus	Other	Total
1971	5.9	70.6	17.6	5.9	100.0
1972	5.7	74.3	14.3	5.7	100.0
1973	5.3	76.3	13.2	5.3	100.0
1974	5.0	77.5	12.5	5.0	100.0
1975	5.1	76.9	12.8	5.1	100.0
1976	5.1	82.1	10.3	2.6	100.0

Source: Interstate Commerce Commission, Bureau of Economics.

Table 22

Distribution of Intercity Travel Between Automobile and Public Carriers, 1971-1976

In Billions of Passenger Miles, Except Percent

				Public C	Carriers							
Year	Air		Bus		R	Rail		Water Carriers		Auto	mobile	
	Miles	Percent	Miles	Percent	Miles	Percent	Miles	Percent	Miles	Percent	Miles	Percent
1971	110.7	9.1	25.5	2.1	4.4	.4	4.1	.3	144.7	11.9	1,071.0	88.1
1972	123.0	9.6	25.6	2.0	4.3	.3	4.0	.3	156.9	12.2	1,129.0	87.8
1973	132.4	9.9	26.4	2.0	5.1	.4	4.0	.3	167.9	12.6	1,166.0	87.4
1974	135.4	10.9	27.7	2.2	5.8	.5	4.1	.3	173.0	13.9	1,071.0	86.1
1975	136.9	10.6	25.4	2.0	5.4	.4	4.0	.3	171.7	13.3	1,123.0	86.7
1976	152.3	11.1	25.1	1.8	5.6	.4	4.0	.3	187.0	13.6	1,187.0	86.4

Source: Transportation Association of America Transportation Facts and Tends, Thirteenth Edition, July 1977, p. 18.



Appendix **A**

On-Time Performance

October 1976-September 1977 NRPC

	ATSF	B&M	BN	Chessie System	D&H	GTW	ICG	L&N	MR	MKT	MP	N&W
1976											_	
October	92.2	87.1	94.4	71.7	90.3	96.8	. 65.2	79.0	79.0	100.0	78.7	88.7
November	90.1	73.3	88.5	77.0	8.1.7	98.3	59.7	66.7	83.0	92.0	69.8	91.7
December	90.2	51.6	73.4	73.5	82.3	83.9	60.4	56.5	72.7	96.3	51.4	82.3
1977												
January	81.1	40.3	58.2	66.2	70.0	88.7	35.1	28.6	50.9	100.0	34.0	65.5
February	81.7	46.4	66.9	76.2	53.6	83.9	59.8	4.8	57.8	87.5	29.3	95.5
March	79.6	77.4	69.1	77.5	16.1	93.5	60.3	8.1	58.4	88.5	46.4	79.3
April	82.2	83.3	75.2	73.9	24.2	90.0	66.0	25.0	71.1	88.5	45.2	57.8
May	79.5	90.3	84.6	77.0	38.2	93.6	64.0	45.2	94.5	81.5	54.0	69.4
June	72.6	83.3	82.3	66.1	36.7	85.0	66.4	51.7	92.1	88.1	46.9	71.7
July	65.2	80.6	80.3	58.1	33.9	87.1	57.9	43.5	91.1	84.5	50.8	65.0
August	57.0	62.9	68.8	78.6	16.1	96.8	48.3	50.0	87.1	83.9	50.4	85.2
September	75.3	88.3	83.0	83.0	35.0	93.3	73.5	71.7	92.4	85.3	59.9	71.2
Average	78.9	72.1	77.1	73.2	48.2	90.9	59.7	44.2	77.5	89.7	51.4	76.9

On-Time Performance Continued

	CRC CORR	CRC NON CORR	RF&P	SCL	SP	T&P	UP
1976							
October	73.2	51.5	93.2	91.6	86.5	N/A	90.3
November	74.4	45.6	94.4	91.6	84.1	A/A	93.0
December	68.1	42.0	81.6	85.8	65.6	N/A	98.4
1977							
January	57.0	18.3	57.6	74.4	45.0	N/A	75.0
February	74.4	16.7	42.0	59.5	57.8	N/A	92.9
March	75.1	34.2	67.1	76.6	64.3	N/A	80.6
April	73.0	38.7	66.6	76.7	67.0	N/A	91.7
May	70.6	36.6	87.5	81.8	78.4	N/A	95.2
June	66.3	44.5	82.8	82.5	74.2	N/A	93.5
July	57.2	35.8	80.2	78.5	78.4	N/A	93.5
August	64.3	44.4	80.6	78.2	80.7	N/A	91.1
September	62.4	64.1	94.6	89.9	91.7	N/A	94.2
Average	68.0	39.4	77.3	80.6	72.8	N/A	90.8

Appendix **B**

Amtrak Monthly Comparison of Passenger Train Car Availability

October 1976 - September 1977

	Unserviceable	Own/Leased	Percentage Out of Service
1976			
October	439	2,100 .	20.9
Növember	426	2,052	20.8
December	380	2,064	18.4
1977			
January	655	2,081	31.5
February	627	2,095	29.9
March	558	2,083	26.8
April	558	2,094	26.7
May	466	2,073	22.5
June	457	2,072	22.1
July	485	2,072	23.4
August	428	2,072	20.7
September	463	2,048	22.6

Availability of Passenger Equipment (Units)

October 1, 1976

	Total Equip- ment	Awaiting Dis- position	En Route & Shop	Bad Order	Net A Number	vailable Percen
Passengers Cars		-	_			_
RPOd	8				8	100.0
Baggage	306	52	. 39	29	186	60.2
Coaches	805	72	34	144	555	68.9
Slumber	23		3	7	13	56.5
Diner	165	6	24	34	101	61.2
Lounge	127	3	16	22	86	67.7
Sleeper	328	8	58	66	196	59.8
Amfleet	317		12	21	284	89.6
Total	2,079	141	186	323	1,429	68.7
Γotal	100%	6.9%	19.0%	15.5%	68:7%	
Other						
Metroliner	61			12	49	80.3
RDC ^a	13			2	11	84.6
MUp	10			3	7	70.0
Turbo Cars	64	6	1	2	55	85.9
Steam Generators ^C	12			3	9	75.0
Other	18			1	17	94.0
Γotal	2,257	147	187	345	1,577	69.9
Total	100%	6.5%	8.3%	15.3%	69.9%	•••

Availability of Passenger Equipment (Units) Continued

	Total Equip-	Awaiting Dis-	En Route	Bad Order	Net A	vailable
	ment	position	& Shop		Number	Percent
Locomotives						,
Diesel-Electric	302	27	9	53	213	70.5
Electric	61	9		9	43	70.5
Total	363	36	9	62	256	70.5

Availability of Passenger Equipment (Units) September 30, 1977

	Total Equip-	Awaiting Dis-	En Route	Bad Order	Net Av	ailable .
	ment	position	& Shop	<u>_</u>	Number	Percent
Passenger Cars						
RPOd	8	8				
Baggage	293	30	27	34	202	68.9
Coaches	663	131	36	123	373	56.3
Slumber	23		2	6	15	65.2
Diner	147	17	13	29	88	60.0
Lounge	122	22	9	21	70	57.4
Sleeper	300	32	29	51	188	62.7
Amfleet	492	2	27	57	406	82.5
Total	2,048	242	143	321	1,342	65.5
Total	100%	11.8%	6.9%	15.7%	65.5%	
Other						
Metroliner	61	*************		21	40	65.6
RDC ^a	13	1		2	10	76.9
MUb	10	***************************************		4	6	60.0
Turbo Cars	79	14		6	59	74.7
Steam Generators ^C	17		6	4	7	41.2
Other	21	1	2	3	15	71.4
Total	2,249	259	152	361	1,479	65.8
Total	100%	11.5%	6.8%	16.1%	65.8%	*
Locomotives						
Diesel-Electric	304	19	34	31	220	72.4
Electric	66	10		9	47	71.2
Total	370	29	34	40	267	72.2

a RDC—Rail Diesel Cars-Dual purpose cars with self-contained power.

MU—Silverliner daily scheduled run between Harrisburg and Philadelphia, Pennsylvania.

C Steam Generator—Normally out of service during the summer months as they are not required.

RPO—Rail Post Office Cars.

Appendix C

Net Incentive Penalty Payments October 1976 through September 1977

Railroads	Effec. Date Cont.	October	November	December	January	February	March
 D&H	8/5/74	15,048	7,521	8,688	-0-	-0-	-0-
L&N	11/1/74	14,802	1,838	(2,190)	(3,578)	(1,864)	(4,970)
SP	12/1/74	224,698	201,868	153,636	148,982	270,320	115,750
N&W	3/24/75	25,489	28,524	18,337	712	12,776	14,742
BN	9/1/76	521,654	346,044	94,960	77,485	300,317	407,297
MR	9/1/76	43,915	40,062	37,782	1,841	(1,057)	4,422
GTW	12/1/76	12,901	13,242	-0-	20,358	35,415	36,928
RF&P	1/1/77	29,120	30,556	18,030	14,043	25,744	45,186
B&M	2/1/77	N/A	N/A	N/A	-0-	-0-	6,311
SCL	2/1/77	510,640	509,521	396,714	449,481	230,647	147,744
Totals	-	\$1,398,267	\$1,179,176	\$725,957	\$709,324	\$872,298	\$773,410

Net Incentive Penalty Payments October 1976 through September 1977

Railroads	Effec. Date Cont.	April	May	June	July	August	September
	8/5/74	, -0-	-0-	-0-	-0-	-0-	-0-
L&N	11/1/74	(4,232)	(1,390)	(1,482)	(1,216)	(1,538)	-0-
SP	12/1/74	132,827	144,396	106,141	*9,135	21,685	198,641
N&W	3/24/75	(238)	3,599	-0-	-0-	-0-	-0-
BN	9/1/76	503,528	534,958	477,679	544,174	588,278	394,817
MR	9/1/76	4,088	8,132	3,132	38,858	31,634	37,636
GTW	12/1/76	48,479	42,324	36,365	(1,683)	10,877	4,174
RF&P	1/1/77	37,271	49,835	52,957	42,245	40,167	58,892
B&M	2/1/77	6,017	12,083	6,017	7,813	1,823	10,051
SCL	2/1/77	214,245	221,931	279,718	203,220	190,117	259,304
Totals		\$941,985	\$1,015,868	\$960,527	\$842,546	883,043	963,515

^{*}SP Eff. Date of Contract for July figures is July 1, 1977.

Delaware & Hudson

Incentives (Penalties) Paid or (Charged) Railroad 1976-1977

	October	November	December
Schedule Adherence	13,650	6,370	6,370
(65% Baseline)	(90%)	82%	82%
Recovered Time and			
Excessive Delay	116	(72)	67
Schedule Improvement	-0-	-0-	
Car Cleanliness	-0-	-0-	
Equipment Operability			
Locomotives	172	60	923
Cars	1,110	1,162.50	1,328
Equipment Availability			
Locomotives	-0-	N/A	
Cars	-0-	N/A	
Totals	\$15,048		 l \$8,688

Delaware & Hudson Continued 1977

	January	February	March	April	May	June	July	August	September
Schedule Adherence (65% Baseline)	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
Recovery Time and									
Excessive Delay	-0-	-0-	-0-	-0-	-0-	- 0-	-0-	-0-	-0-
Schedule Improvements	-0-	0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
Car Cleanliness	0-	-0-	-0-	-0-	-0-	- 0-	-0-	-0-	-0-
Equipment Operability									
Locomotives	-0-	-0-	-0-	-0-	-0-	-0-	-0-	· · · · · · · · · · · · · · · · · · ·	0-
Cars	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
Equipment Availability	N/A	N/A	N/A	-0-	-0-	-0-	-0-	-0-	-0-
Locomotives	N/A	N/A	N/A	-0-	-0-	-0-	-0-	-0-	-0-
Totals	\$-0-	\$-0-	S-0-	S-0-	20.2	\$-0-	S-0-	S-0-	 \$-0-

Louisville and Nashville

Incentives, (Penalties) Paid or (Charged) Railroad 1976-1977

	October	November*	December
Schedules Adherence	\$15,500	\$2,200	-0-
(65% Baseline)	(79%)	(67%)	56%
Recovered Time and Excessive Delay	(698)	(362)	(2,190)
Schedule Improvement		N/A	
Car Cleanliness		N/A	
Equipment Operability		• 7,• •	
Locomotives		N/A	
Cars		N/A	
Equipment Availability		. 4	
Locomotives		N/A	
Cars		N/A	
Totals	\$14,802	\$1,838	(2,190)

Louisville & Nashville Continued 1977

	January	February	March	April	May	June	July	August	September
Schedule Adherence (65% Baseline)	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
Recovery Time and Excessive Delay	(3,578)	(1,864)	(4,970)	(4,232)	(1,390)	(1,482)	(1,216)	(1,538)	-0-
Schedule Improvements	N/A								
Car Cleanliness	N/A								
Equipment Operability									
Locomotives	N/A								
Cars	N/A								
Equipment Availability		_							
Locomotives	N/A								
Cars	N/A								
Totals	\$(3,578)	\$(1,864)	\$(4,970)	\$(4,232)	\$(1,390)	\$(1,482)	\$(1,216)	\$(1,538)	-0-

^{*}Effective Date of 1st Amended Agreement 11/1/74.

Southern Pacific Incentives, (Penalties) Paid or (Charged) Railroad 1976-1977

	October	November	December
Schedule Adherence	\$219,030	\$198,170	\$145,064-
(65% Baseline)	86%	84%	
Recovered Time and	(2,843)	(182)	-0-
Excessive Delay			
Schedule Improvement	-0-	-0-	
Car Cleanliness	-0-	-0-	
Equipment Operability			
Locomotives	495	-0-	975
Cars	923	-0-	1,335
Equipment Availability			
Locomotives	3,200	3,880	2,080
Cars	3,893	-0-	4,182
Totals	\$224,698	\$201,868	\$153,636

Southern Pacific Continued 1977

	January	February	March	April	May	June	July	August	September
Schedule Adherence (65% Baseline)	\$145,063	\$250,320	\$114,730	\$125,160	\$135,590	\$93,870	\$9,135	\$21,685	\$198,641
Recovery Time and									
Excessive Delay	-0-	-0-							
Schedule Improvements									
Car Cleanliness									
Equipment Operability									
Locomotives	1,200	1,530		255		480	-0-	-0-	-0-
Cars	1,957	3,015		1,350		1,328	-0-	-0-	-0-
Equipment Availability									
Locomotives	320	9,420		120	1,160	1,120	-0-	-0-	-0-
Cars	442	6,035	1,020	5,942		2,754	-0-	-0-	-0-
Adjustments					7,646	6,589	-0-	-0-	-0-
Totals	\$148,982	\$270,320	\$115,750	\$132,827	\$144,396	\$106,141	\$9,135	\$21,685	\$198,641

Norfolk & Western

Incentives, (Penalties) Paid or (Charges) Railroad 1976-1977

	October*	November	December
Schedule Adherence	\$25,200	\$28,350	\$17,850
(65% Baseline)	(89%)	(92%)	(82%)
Recovered Time and	289	174	487
Excessive Delay			
Schedule Improvement	N/A	,	
Car Cleanliness	N/A		
Equipment Operability			
Locomotives	N/A		
Cars	N/A		
Equipment Availability			
Locomotives	N/A		
Cars	N/A		
Totals	\$25,489	\$28,524	\$18.337

Norfolk & Western Continued 1977

	January	February	March	April	May	June	July	August	September
Schedule Adherence (65% Baseline)	1,050	12,375	14,700	-0-	4,200	-0-	-0-	-0-	-0-
Recovery Time and Excessive Delay Schedule Improvements Car Cleanliness	(338)	401	42	(238)	(601)	-0-	-0-	-0-	-0-
Equipment Operability Locomotives Cars				,					
Equipment Availability Locomotives Cars		·							
Totals	\$712	\$12,776	\$14,742	\$(238)	\$3,599	\$-0-	\$-0-	\$-0-	\$-0-

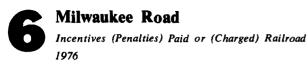
^{*}Effective date of 1st Amended Agreement 3/24/75.

Burlington Northern Incentives (Penalties) Paid or (Charged) Railroad October 1976-September 1977 1976

		October*	November	December
	A. Schedule Adherence	\$478,627	\$299,763	\$50,569
Schedule Adherence (65% Baseline)				
	B. Preventative Maintenance	43,027	46,281	44,391
Recovered Time and Excessive Delay				
Schedule Improvement				
Car Cleanliness				
Equipment Operability Locomotives				
Cars				
Equipment Availability				
Locomotives				
Cars				
Totals		\$521,654	\$346,044	\$94,960

Burlington Northern Continued

	January	February	March	April	May	June	July	Ausust	September
Schedule Adherence (80% Baseline by Train)	\$31,599	\$260,261	\$361,582	\$460,314	\$489,296	\$428,602	\$5,44,174	\$588,278	\$394,81
Preventive Maintenance	45,886	40,056	45,715	43,214	45,662	49,077	0	0	0
Adjustment									.
Totals	\$77,485	\$300,317	\$407, 2 97	\$503,528	\$534,958	 \$477,679	\$544,174	\$588,278	\$394,81



		October*	November	December
	A. Schedule Adherence	34,436	29,704	28,901
Schedule Adherence (65% Baseline)				
•	B. Preventative Maintenance	9,479	10,358	8,881
Recovered Time and Excessive Delay				
Schedule Improvement				
Schedule Improvement				
Car Cleanliness				
Equipment Operability				
Locomotives				
Cars				
Equipment Availability				
Locomotives				
Cars				
Totals		\$43,915	\$40,062	\$37,782
Prior Month Adjustment		•	•	•

Milwaukee Road Continued 1977

*	January	February	March	April	May	June	July	August	September
Schedule Adherence (80% Baseline by Train)	\$8,127	\$24,100	\$28,506	\$37,520	\$32,219	\$26,977	\$38,858	\$31,634	\$37,630
Preventive Maintenance	12,231	11,315	8,422	10,765	10,105	9,388	0	0	0
Adjustment				194					
Totals	\$20,358	\$35,415	\$36,928	\$48,479	\$42,324	\$36,365	\$38,858	\$31,634	\$37,630

Grand Trunk Western Incentives, (Penalties) Paid or (Charged) Railroad 1977

Effective Contract Date 9/11/74

	October	November	December*
1. Schedule Adherence	\$12,512	12,903	-0-
(65% Baseline)	(97%)	(98%)	
2. Recovered Time and Excessive			
Delay	389	339	-0-
3. Schedule Improvement	N/A	N/A	
4. Car Cleanliness	N/A	N/A	
5. Equipment Operability	N/A		
Locomotives Cars	N/A	N/A	
6. Equipment Avabilability			
Locomotives Cars	N/A	N/A	
Totals	\$12,901	\$13,242	-0-

Grand Trunk Western - Continued 1977

	January	February	March	April	May	June	July	August	September
Schedule Adherence	1,841	(1,057)	4,422	4,088	8,132	3,132	(1,683)	10,877	4,174
Totals	\$1,1841	(\$1,057)	\$4,422	\$4,088	\$8,132	\$3,132	(\$1,683)	\$10,877	\$4,174

^{*}Operating under 2nd Amemdment Agreement 12/1/76.

Richmond, Fredericksburg & Potomac Incentives (Penalties) Paid or (Charged) Railroad 1976

	October	November	December
Schedule Adherence	\$27,600	\$28,600	\$16,800
(65% Baseline)	(93%)	(94%)	(82%)
Recovered Time and Excessive			
Delay	1,520	1,956	1,230
Schedule Improvement	N/A	N/A	
Car Cleanliness	N/A	N/A	
Equipment Operability			
Locomotives	N/A	N/A	
Cars			
Equipment Availability			
Locomotives	N/A	N/A	
Cars			
Totals	\$29,120	\$30,556	\$18,030

Richmond, Fredericksburg & Potomac Continued 1977

	January*	February	March	April	May	June	July	August	September
Schedule adherence (80% Baseline)	14,043	25,744	45,186	37,271	49,835	52,957	42,245	40,167	58,892
Recovery Time And Excessive									
Delay	-0-								
Schedule Improvements	N/A								
Car Cleanliness	N/A								
Equipment Operability									
Locomotives	N/A								4
Cars	N/A								
Equipment Availability									
Locomotives	N/A								
Cars	N/A								
Totals	\$14,043	\$25,744	\$45,186	\$37,271	\$49,835	\$52,957	\$42,245	\$40,167	\$58,892

^{*}Operating under 2nd Amendment Agreement 1/1/77.



Incentives, (Penalties) Paid or (Charged) Railroad 1976

	October	November	December
Schedule Adherence (65% Baseline)	N/A	N/A	N/A
Recovered Time and		•	
Excessive Delay	N/A	N/A	N/A
Schedule Improvement	N/A	N/A	N/A
Car Cleanliness	N/A	N/A	N/A
Equipment Operability			
Locomotives	N/A	N/A	N/A
Cars	N/A	N/A	N/A
Equipment Availability			
Locomotives	N/A	N/A	N/A
Cars	N/A	N/A	N/A
Totals		N/A	N/A

Boston & Maine Continued 1977

	January	February*	March	April	May	June	July	August	September
Schedule Adherence	-0-	-0-	6,017	6,017	12,083	6,017	7,813	1,823	10,051
Recovered Time and									
Excessive Delay	N/A	N/A	N/A						
Schedule Improvements	N/A	N/A	N/A						
Car Cleanliness	N/A	N/A	N/A						
Equipment Operability	N/A	N/A	N/A						
Locomotives	N/A	N/A	N/A						
Cars	N/A	N/A	N/A						
Equipment Availability									
Locomotives	N/A	N/A	N/A						
Cars	N/A	N/A	N/A						
Total	\$-0-	\$-0-	\$6,017	\$6,017	\$12,083	\$6,017	\$7,813	\$1,823	\$10,051

^{*}Operating under 2nd Amendment Agreement 2/1/77.

Effective Contract Date 9/1/74

10

Seaboard Coast Line

Incentives, (Penalties) Paid or (Charged) Railroad 1976-1977.

	October	November	December
Schedule Adherence	\$492,000	\$492,000	\$382,700
(65% Baseline)	92%	92%	86%
Recovered Time and Excessive Delay	3,340	5,966	3,969
Schedule Improvement	-0-	-0-	-0-
Car Cleanliness	-0-	-0-	-0-
Equipment Operability			
Locomotive	2,032.50	1,230	(75)
Cars .	6,187.50	2,805	
Equipment Availability			
Locomotive	7,080	7,520	10,120
Cars	-0-	-0-	-0-
Totals	\$510,640	\$509,521	\$396,714

Seaboard Coast Line Continued 1977

	January	February*	March	April	May	June	July	August	September
Schedule Adherence	\$419,200	\$177,570	\$99,818	\$169,514	\$175,922	\$194,475	\$203,220	\$190,117	\$259,304
(65% Baseline)	(74.4)								
Recovery Time and									. .
Excessive Delay	14,016								
Preventative Maintenance		40,364	47,309	44,731	46,009	46,384	-0-	-0-	-0-
Schedule Improvements	-0-			i					
Car Cleanliness	-0-						-0-	-0-	-0-
Adjustments		12,713	617			38,859			
Equipment Operability									
Locomotives	1,958								
Cars	11,107								
Equipment Availability									
Locomotives	3,200								
Cars									
Totals	\$449,481	\$230,647	\$147,744	\$214,245	\$221,931	\$279,718	\$203,220	\$190,117	\$259,304

^{*}Operating under 2nd Amendment Agreement 2/1/77.

AppendixD

Comparison of Income Statements

For the Fiscal Years Ending September 30, 1977, 1976, 1975, and 1974 (In Thousands)

	1977	1976	1975	1974
Railway Operating Revenues		_		
Transportation	\$281,379	\$257,457	\$229,583	\$229,592
Other	29,893	20,312	16,664	18,712
	\$311,272	\$277.769	\$246.247	\$248,304
Operating Expenses				
Maintenance of Way and Structures	45,053	21,692	11,666	8,216
Maintenance of Equipment	216,208	177,102	123,233	85,604
Traffic	42,203	35,472	28,340	32,999
Transportation	266,341	245,763	215,101	188,746
Dining and Buffet Service	60,885	52,599	50,570	50,477
General	49,419	41,255	30,032	25,378
Taxes	81,558	57,968	44,942	36,165
Rents	4,440	6,267	6,840	6,721
Railroads Performance Incentives	10,604	18,016	18,426	1,513
Allowance for Avoidable Costs	6,755	8,675	14,090	18,782
Allowance for Assumption of Risk Liability	779	985	1,108	930
Total Operating Expenses	784.245	665.794	544.348	455.531
Deficit from Operations	A72,973	388,025	298,101	207,227
Corporate Expenses				
General and Administrative	22,942	20,014	16,549	14,988
Interest	40,758	33,304	20,085	14,591
Total Corporate Expenses	63,700	53,318	36.634	29,579
Delayed items reported in the current period, but related to prior periods				(196)
Net Deficit	\$536,673	\$441,343	\$334,735	\$236,610

Appendix **E**

Comparative Balance Sheet

September 30, 1977, 1976, 1975, 1974, 1973

	1977	1976	1975	1974	1973
Assets					
Current Assets					
Cash & Temporary Cash Investments	\$ 5,508,285	\$ 14,643,639	\$ 14,412,625	\$ 6,798,335	\$ 6,838,134
Accounts Receivable	45,226,679	31,767,296	13,364,085	37,532,829	98,137,494
Materials and Supplies	59,863,541	43,039,675	19,713,436	7,543,970	4,895,412
Other Current Assets	1,151,817	728,748	636,697	1,392,591	1,063,229
Total Current Assets	\$ 111.750.322	\$ 90,179,358	\$ 48.126.843	\$ 53,267,725	\$110.934.269
Properties					
Passenger Cars & Locomotives - Net					
of Accumulated Depreciation Roadway and Other - Net of	\$ 711,259,854	\$615,297,213	\$378,328,948	\$228,479,984	\$104,830,920
Accumulated Depreciation	189,757,398	110,050,818	16,478,886	15,452,101	6,313,063
Total Properties	901,017,252	725,348,031	394,807,834	243,932,085	111,143,983
Other Assets and Deferred Charges	10,518,681	10,721,017	11,423,335	3,765,110	489,213
Total Assets	\$1,023,286,255	\$826,248,406	\$454,358,012	\$300,964,920	\$222.567,465
Liabllities and Stockholders Equity					
Current Liabilities				****	£ 45 000 000±
Notes Payable		0.000 7.5.100		· · · · · · · · · · · · · · · · · · ·	\$ 45,000,000*
Accounts Payable	117,672,073	\$126,745,162	, ,	27,465,639	42,228,274
Due to Bank	12,066,638	12,865,400			
Equipment & Mortgage Obligations (Current)	17,525,995	12,755,765	3,988,572	4,989,541	3,224,928
	. 167.224.706				¢ 00 452 202
Total Current Liabilities	<u>\$ 167.324.706</u>	\$152.366.327	\$378.912.191	\$212.455.180	\$ 90.453.202
Long Term Debt					
Long Term Notes Payable	\$ 492,627,500	\$533,300,000			
Equipment Lease Obligations	120,009,366	127,170,145	\$ 88,247,540	\$ 71,691,951	\$ 28,039,066
Mortgage Payable	132,194,210	75,569,450			
Total Long Term Debt	744,831,076	736,039,595	88,247,540	71,691,951	28,039,066
Other Liabilities and Deferred Credits	1,886,166		2,282,265	4,651,739	
Total Liabilities	\$ 914,041,948	\$888,405,922	\$469,441,996	\$288,798,870	\$118,492,268

Comparative Balance Sheet Continued

	1977	1976	1975	1974	1973
Stockholders Equity					
Capital Stock Subscribed					
Common Stock \$10 Par Value					\$ 18,249,878
Capital Stock Issued					
Common Stock \$10 Par Value	\$ 93,856,938	\$ 93,856,938	\$ 93,856,938	\$ 93,856,938	\$ 75,607,060
Paid in Surplus-Initial Capital from					
railroads for which stock waived.	102,263,415	102,922,189	102,922,189	103,238,223	103,238,223
Other Capital Surplus - Federal Grants	1,818,603,267	1,109,869,016	715,600,000	404,511,590	259,811,590
Other Capital Surplus - Contributions	102	102	102	102	102
Retained Income Unappropriated -					
Operating Deficits	(1,905,479,415)	(1,368,805,761)	(927,463,213)	(589,440,803)	(352,831,656)
Total Stockholders Equity	\$ 109.244.307	\$ (62,157,516)	\$ (15.083.984)	\$ 12,166,050	\$104.075.197
Total Liabilities & Shareholders Equity	\$1,023,286,255	\$826,248,406	\$454,358,012	\$300,964,920	\$222,567,465

^{*}Converted to long term debt.

Appendix **F**

Federal Grants

Aggregate Authorizations, Appropriations and Draw-downs for the Fiscal Years ending 9/30/71-77

Date	Au	thorized	Appropriated — Amount	Drawn Down Amount	
Date	Public Law #	. Amount	rinount		
September 30, 1971	91-518	\$ 40,000,000	\$ 40,000,000	\$ 40,000,000	
September 30, 1972	92-316	227,000,000	170,000,000	88,400,000	
September 30, 1973			54,000,000	134,700,000	
September 30, 1974	93-146	107,300,000	95,100,000	144,200,000	
September 30, 1975	93-496	200,000,000	276,500,000	308,300,000	
•	94-119	1,118,000,000	~		
September 30, 1976	94-210	115,832,956	1,176,900,000	394,269,016	
September 30, 1977	94-555	1,362,817,044	671,500,000	708,734,251	
Total		\$3,170,950,000	\$2,484,000,000	\$1,818,603,267	

Appendix **G**

Statement of Changes in Financial Postion

For the Fiscal Years Ending September 30, 1977, 1976 and 1975 (In Thousands)

•	1977	1976	1975
Source of Funds			
Increase (Decrease) in the Notes Payable	\$(20,612)	\$206,300	\$147,000
Federal Grants	708,734	391,838	308,300
Decrease (Increase) in Accounts Receivable	(13,459)	(15,972)	16,371
Increase (Decrease) in Accounts Payable and Accrued Expenses	(4,025)	81,856	20,458
Increase (Decrease) in Capitalized Lease and Mortgage			
Obligations	49,873	127,621	16,555
Other Decreases (Increases) in Working Capital	(23)	2,787	(2,615)
Total Source of Funds	\$720,488	\$794 <u>.430</u>	\$506,069
Use of Funds			
Operation Loss before Federal Operating Grants	\$536,674	\$441,343	\$334,735
Depreciation and Amortization	(32,458)	(20,995)	(13,703)
Total Cash Used for Operations	504,216	420,348	\$321,032
Purchases and Refurbishing of property	208,127	351,537	157,603
Increase (Decrease) in Other Assets	457	(702)	7,651
Increase in Materials and Supplies	16.824	23,326	12,169
Total Use of Funds	\$729,624	\$794,509	\$498,455
Increase (Decrease) in Cash and Temporary Cash Investments	\$(9,136)	\$ (79)	\$ 7,614

Appendix **H**

Summary of Federal Guaranted Loans

September 30, 1977

Authorized		ıthorized	Loans Obtained		Loans Repaid		Balance Outstanding		Balance Ayailable	
BY P.L.	Date	Amount	Year	Amount	Year	Amount	Date	Amount	Date	Amount
91-518	10-30-70	\$100,000,000	1971	\$ 30,000,000	1971	\$ 5,000,000	12-31-71	\$ 25,000,000	12-31-71	\$ 75,000,000
92-316	6-22-72	50,000,000	1972	65,000,000	1972	90,000,000	12-13-72		12-31-72	150,000,000
92-316	7-1-73	50,000,000	1973	144,504,154	1973	25,000,000	12-31-73	119,504,154	12-31-73	380,495,846
93-146	11-3-73	300,000,000	1974	581,300,744	1974	407,101,839	12-31-74	293,703,059	12-31-74	606,296,941
93-496	10-28-74	400,000,000	1975	993,217,876	1975	785,689,335	12-31-75	501,231,600	12-31-75	398,768,400
94-85	8-2-77	(25,000,000)	1976	991,550,000	1976	837,110,474	9-30-76	655,671,126	9-30-76	244,328,874
Total		\$875,000,000	1977	1,386,041,970	1977	1,428,943,091	9-30-77	612,770,005	9-30-77	262,299,995

Appendices I

Analysis of Loan Authority

For the Fiscal Years Ending September 30, 1977

Year	Refurbish Passenger Cars	Rebuild Locomotives	Purchase Pas- senger Cars	Purchase Locomotives	Maintenance Facilities
1977	\$(6,455,655)		\$100,656,404	\$ 8,630,918	\$ 13,579,896
1976	31,331,888	3,102,390	138,745,187	11,750,721	(124,042)
1975	31,938,365	7,874,779	77,406,542	9,501,028	3,919,994

Analysis of Loan Authority-Continued

Year	Station & Office Buildings	Road Property	Other	Total Capital Expenditures	Total Borrowings	
1977	\$ 14,709,515	\$61,427,266	\$ 2,859,256	\$196,552,4961	\$(40,672,500) ²	
1976	15,809,598	8,528,087	5,009,511	214,553,340	206,300,000	
1975	12,654,966	6,581,415	(2,486,644)	147,390,445	147,000,000	

^{&#}x27;Excludes \$11,556,653 of capital expenditures funded through capital grants.

Appendix J

Long Term Debt

September 30, 1977 (In Thousands)

Equipment Obligations (Capitalized Leases) Description of Equipment	Date of Leases)	Principal amount of Lease	Balance due on Lease 9/30/77 ²	Due 1978	Due 1979	Due 1980	Due 1981	Due 1982 and Beyond
25 Locomotives	6/75	15,036	20,984	1,487	1,487	1,486	1,485	15,039
40 Locomotives	6/73	17,787	20,971	1,693	1,690	1,686	14,207	14,207
110 Locomotives	2/74	51,422	64,465	4,901	4,896	4,890	4,884	44,894
25 Locomotives	7/76	19,570	28,246	1,949	1,949	1,948	1,946	20,454
4 Turbotrains	1/75	14,118	18,187	1,337	1,337	1,339	1,334	12,840
12 Metroliners	1/74	4,122	5,280	720	720	720	720	2,400
49 Metroliners	4/76	14,774	17,291	1,504	1,504	1,504	1,504	11,275
Computer Equipment	var.	4,140	4,055	1,168	1,168	1,198	521	
	-	140,969	179,479	14,761	14,754	14,775	14,080	121,109

³Net differences of borrowings and capital expenditures represent the differences between capital expenditures as stated above less capital grants of \$220,498,505 and a \$25 million appropriation for the purchase of the Northeast corridor plus the difference between loan funds of \$10,944,380 available for operation at 9/30/76 and loan fund of \$2,670,868 available for operations at 9/30/77.

Long Term Debt Continued

Date of Leases)	Principal amount of Lease	Balance due on Lease 9/30/77 ²	Due 1978	Due 1979	Due 1980	Due 1981	Due 1982 and Beyond
4/76	96 3661	52.022	10.707	10.704	10.707	10.504	10 500
4//0	80,300	53,977	10,796	10,796	10,796	10,796	10,793
Var.	89.013	89.013					89,013
-							07,015
	175,379	142,990					
_							
1/76	173	232	21	21	21	21	148
						· · · · · · · · · · · · · · · · · · ·	
	=	322,701	25,578	25.571	25,592	24,897	221,063
		492,628					
Total Long Term debt 815,3		815,329					
	4/76 Var.	Date of amount of Lease' 4/76 86,366' Var. 89,013 175,379	Date of Lease' due on Lease 9/30/77 ² 4/76 86,366 ¹ 53,977 Var. 89,013 89,013 175,379 142,990 1/76 173 232	Date of amount due on Leases) of Lease 9/30/772 4/76 86,3661 53,977 10,796 Var. 89,013 89,013 175,379 142,990 1/76 173 232 21	Date of amount due on Due 1978 1979 4/76 86,3661 53,977 10,796 10,796 Var. 89,013 89,013 175,379 142,990 1/76 173 232 21 21	Date of amount due on Due Due Due 1979 1980 4/76 86,3661 53,977 10,796 10,796 10,796 Var. 89,013 89,013 175,379 142,990 1/76 173 232 21 21 21 21	Date of amount due on Due Due Due Due 1981 4/76

Appendix **K**

Comparison of Operating Revenues, Expenses & Payments to the Participating Railroads

For Years Ending September 30, 1977 and 1976 and December 31, 1975, 1974 & 1973 (In Thousands)

	December 31, 1975		December	31, 1974	December 31, 1973	
	Payments to Railroads	Total	Payments to Railroads	Total	Payments to Railroads	Total
		\$252,697		\$256,910	-	\$202,093
Operating Revenues		_				
Expenses						
Maintenance of Way & Structure	\$10,076	12,185	\$7,113	10,418	\$4,511	4,495
Maintenance of Equipment	73,209	134,964	66,179	98,846	61,491	65,515
Traffic	586	26,840	1,703	34,592	2,541	26,542
Transportation	154,234	224,783	142,812	198,251	133,191	158,244
Miscellaneous (3)	1,080	50,449	8,256	52,148	27,341	33,285
General	4,134	32,116	4,658	28,976	6,678	20,515
5% Allowance for Avoidable Costs	14,039	14,039	17,281	17,281	17,901	17,901

Comparison of Operating Revenues, Expenses & Payments to the Participating Railroads Continued

	December	31, 1975	975 December 3		December	31, 1973
	Payments to Railroads	Total	Payments to Railroads	Total	Payments to Railroads	Total
		\$252,697		\$256,910		\$202,093
4% Allowance for Assumption						
of Risk Liabilities	1,106	1,106	960	960	594	594
Railway Tax Accruals	22,369	46,139	23,376	40,782	19,079	22,731
Rent Expense Net of Rent	22,509	70,107	20,211	,	,	,
Income	4,784	6,349	4,669	8,892	4,192	5,149
Railroad Performance Incen-	.,		,	,	,	,
tives	18,011	18,011	6,361	6,361		
Total Rail Related Expenses	\$303,628	\$566,981	\$283,368	\$497,507	\$277,519	\$354,971
Percent of Rail Related	ŕ					
Expenses to Revenues	120/	224%	110%	194%	137%	176%
Other Expenses (Income)(1)		38,246		32,100		5,749
Total Expenses	\$303,628	\$605,227	\$283,368	\$529,607	\$277,519	\$360,720
Percent of Total Expenses to	120%	240%	110%	206%	137%	178%
			September 30), 1977	September 3	0, 1976(2)
			yments to		Payments to	
		R	lailroads —————	Total	Railroads ————	Total
				\$311,272		\$277,770
Operating Revenues				_		
Expenses						
Maintenance of Way & Structure			\$6,990	\$45,053	\$10,196	21,692
Maintenance of Equipment			31,758	216,208	51,410	177,103
Traffic			927	42,203	738	35,471
Transportation			156,016	266,341	160,277	245,763
Miscellaneous (3)			503	60,885	877	52,599
General			10,691	49,419	8,060	41,254
5% Allowance for Avoidable Costs			6,755	6,755	8,675	8,675
4% Allowance for Assumption of						
Risk Liabilities			779	779	985	985
Railway Tax Accruals			22,477	81,558	22,034	57,969
Rent Expense Net of Rent Income			621	4,440	4,056	6,268
Railroad Performance Incentives		_	10,604	10,604	18,016	18,016
Total Rail Related Expenses		•	5248,121	\$784,245	\$285,324	\$665,795
Percent of Rail Related Expenses						
to Revenues			80%	252%	10%	240%
Other Expenses (Income)(1)				63,700		53,318
Total Expenses		5	5248,121	\$847,945	\$285,324	\$719,113
Percent of Total Expenses to Revenue	s		80%	272%	103%	259%
(1) Corporate General & Administrative (2) Includes 4th Quarter 1975 for 12 more (3) Dining & Buffet Services.		ith FY 1977.				

AppendixL

Statement of Northeast Corridor Financial Operations

For the Year Ended September 30, 1977 (in thousands)

	Total `	Total	NEC	N.	E. C. Spine	Segmentatio	n	
	System		Spine	WAS-PHL	PHL-NYC NYC-NH		NHV-BOS	
Revenue	\$311,272	\$110,329	\$104,698	\$38,459	\$44,190	\$8,722	\$13,327	
Operating expenses								
Train operations	211,768	55,469	49,691	19,154	18,279	4,698	7,560	
Maintenance of Equipment	224,162	55,574	51,922	17,476	19,008	5,718	9,720	
Maintenance of Way	40,216	29,592	27,257	9,725	10,908	2,586	4,038	
On-board service	90,179	12,022	11,507	4,898	3,490	1,442	1,677	
Station services	57,529	21,904	19,845	7,081	7,881	1,859	3,024	
Marketing and reservations	45,390	21,140	19,261	6,595	7,799	1,840	3,027	
Operating support	55,480	20,836	18,797	6,125	7,948	1,790	2,934	
Taxes and insurance	18,896	3,101	2,902	982	1,056	331	533	
Depreciation	32,390	10,975	10,355	3,925	4,034	969	1,427	
Total operating expenses	776,010	230,613	211,537	75,961	80,403	21,233	33,940	
General and Administrative	22,942	6,818	6,254	2,246	2,377	628	1,003	
Interest	33,898	13,388	12,281	4,410	4,668	1,233	1,970	
Total corporate expenses	56,840	20,206	18,535	6,656	7,045	1,861	2,973	
Total expenses	832,850	250,819	230,072	82,617	87,448	23,094	- 36,913	
Net profit/ (loss)	*\$521,578)	\$)140,490)	\$)125,374)	\$(44,158)	\$(43,258)	\$14,372)	\$(23,586)	

NOTE: Philadelphia to Harrisburg and New Haven to Springfield spurs are included in Total NEC but not in the NEC spine. Source - Amtrak Financial Planning

^{*}Compiled prior to final audit. Net loss understated by \$15.1 million.

Forward to Appendix M

Operating Results by Route

Procedures and Rationale for Developing Cost of Service Data

Amtrak's Financial and Statistical Records

Revenues

Revenues are accumulated by Amtrak's Revenue Accounting Department on a train and route basis. "Train" revenue (passenger fares, sleeping car revenue, dining and beverage sales, mail, etc.) is shown by route on the Route Profitability System's Profit and Loss Summary. State subsidies and miscellaneous revenues (station concessions, etc.) are shown as other revenues.

Expenses

Railroad

Expenses incurred by participant railroads are billed monthly on standardized forms (greenbills) provided by Amtrak. Expenses reported on these forms include both direct train expense and indirect expenses such as facility expense, general and administrative expense and miscellaneous expense. Also reported are incentives and penalties for railroads operating under incentive/penalty contracts. Amtrak provides its participant railroads with detailed instructions for completion of the greenbill reports. Amtrak also provides the railroads with detailed instructions for allocating all indirect expenses, with the exception of incentive/penalty charges to specific trains.

Corporate

Amtrak's corporate expenses are accumulated by function and location. All expenses with the exception of special train expense, interest, general and administrative and miscellaneous expenses are allocated to routes through Amtrak's expense allocation procedure.

Statistics

Certain statistics such as train miles, locomotive unit miles, and car miles are reported by the participant railroads. Amtrak provides the railroads with detailed instructions for the compilation and reporting of these statistics.

Processing of Data

Amtrak restored the Route Profitability System-Profit and Loss Summary with some modifications. Because of these modifications, which omitted various train statistics, e.g., train miles, etc., it was necessary to use two data sources as the basis for this year's report. Revenues and expenses were taken from the Route Profitability System-Profit and Loss Summary. Statistics were taken from statistical summaries produced by the Revenue Accounting Department.

Revenues

Amtrak's Route Profitability System assigns all ticket and train revenue (dining car, lounge car, etc.) to trains and routes. The system does not allocate state subsidies, special trains or miscellaneous revenues to routes. State subsidies (\$6 million) are the actual amounts billed and are shown in a separate column.

Miscellaneous revenues and special train revenues (\$13 million) are allocated to routes on the basis of directly assigned revenues.

Expenses

Most expenses, both railroad billed and corporate are accumulated by Amtrak's Route Profitability System. Incentive payments, special train expenses, interest expense, general and administrative expense and miscellaneous expense were not allocated to routes. To state expenses at the full expense level by route, we have allocated all expenses, not allocated, to the system (\$57.9 million) on the basis of Amtrak's corporate expenses as shown on the Route Profitability Summary.

Appendix **M**

Summary of Revenues, Expenses and Unit Costs

For Fiscal Year 1977 (In Thousands)

	Total Amtrak System	Northeast Corridor	System Excluding Northeast Corridor	Metroliner Service
Total Revenue	\$311,271	\$ 96,931	\$214,340	\$37,986
Total Expense	\$832,849	\$202,838	\$630,011	\$55,957
Ratio Expenses/Revenue	268	209	294	147
Cost Per Revenue Passenger Mile	22.3 ¢	22.9 ¢	22.2 ¢	19.3 ¢
Revenue Per Revenue Passenger Mile	8.3 ¢	10.9 ¢	7.5 ¢	13.1 ¢
Profit (Loss) Per Revenue Passenger Mile	(14.0¢)	(12.0 ¢)	(14.7¢)	(6.2¢)

Operating Results by Route

For Fiscal Year 1977 (In Thousands)

	Revenues							Profit (Loss)	Ratio of Expenses to Reve- nues	
Amtrak Route	_	Oper-		tate		Total	_		Col.	(Col.
		ating	S	ub- idies		Col. 2 + 3	Expenses		4 - 5	5 ÷ 4)
1	_	2		3		4	5		6	7
Northeast Corridor	_							-		
New York City-Washington (Metroliner)	\$	37,986			\$	37,986	\$ 5 5,957	(\$	17,971)	147
New York City-Washington (Conventional)		46,098				46,098	106,902	(60,804)	232
New Haven-Springfield		596				596	3,830	(3,234)	643
New York City-Harrisburg		783				783	2,785	(2,002)	356
New York City-Philadelphia		8,821				8,821	25,675	(16,854)	291
Philadelphia-Harrisburg		2,578	\$	69		2,647	7,689	(5,042)	290
Northeast Corridor Totals	<u>\$</u>	96.862	\$	69	_\$_	96.931	\$202.838	_(\$	105.907)	209
Short Haul										
Chicago-Carbondale	\$	1,644	\$	395	\$	2,039	\$ 4,685	(\$	2,646)	230
Chicago-Detroit		4,224		225		4,449	13,497	(9,048)	303
Chicago-Dubuque		319		500		819	1,326	(507)	162
Chicago-Milwaukee		1,436				1,436	8,914	(7,478)	621
Chicago-Port Huron		1,078		692		1,770	5,926	(4,156)	335
Chicago-Quincy		938		772		1,710	2,644	(934)	155
Chicago-St. Louis		2,354		410	,	2,764	6,307	(3,543)	228

Operating Results by Route Continued

		Revenue	Profit (Loss)	Ratio of Expenses to Reve- nues		
Amtrak Route	Oper-	State	Total		Col.	(Col.
	ating	Sub- sidies	Col. 2 + 3	Expenses	4 - 5	5 ÷ 4)
1	2	3	4	5	6	7
Los Angeles-San Diego	3,918		4,664	10,929	(6,265)	234
Ainneapolis-Duluth	564	431	995	1,783	(788)	179
New York City-Buffalo-Detroit	8,064	906	8,970	26,451	(17,481)	295
New York City-Montreal	1,796	882	2,678	6,440	(3,762)	240
Oakland-Bakersfield	•		694	3,216	(2,522)	463
eattle-Portland			1,024	4,619	(3,595)	451
eattle-Vancouver	,		616	2,031	(1,415)	330
			636	1,752	(1,116)	275
Vashington-Cincinnati Vashington-Martinsburg			361	2,720	(2,359)	753
Short Haul Totals	\$ 29,666	\$5,959	\$ 35.625	\$103.240	(\$ 67.615)	290
Long Haul Boston-Newport News Chicago-Florida			\$ 6,056 6,023	\$ 11,008 22,883	(\$ 4,943) (16,860)	182 380
Chicago-Houston	•		6,972	23,798	(16,826)	341
Chicago-Laredo			2,819	13,782	(10,963)	489
Chicago-Los Angeles	•		19,363	46,395	(27,032)	240
Chicago-New Orleans	•		5,350	12,167	(6,817)	227
Chicago-New York City-Boston	•		7,814	23,334	(15,520)	299
Chicago-New York City-Boston Chicago-New York City-Washington	•		10,170	29,812	(19,642)	293
Chicago-San Francisco			14,326	44,240	(29,914)	309
Chicago-Seattle (North)			12,102	42,247	(30,145)	349
Chicago-Seattle (North)	•		6,141	25,611	(19,470)	417
Chicago-Washington			3,170	14,976	(11,806)	472
Kansas City-New York City-Washington	•		6,737	23,103	(16,366)	343
Los Angeles-New Orleans	•		5,896	16,680	(10,784)	283
Los Angeles-New Officialis	•		13,508	35,177	(21,669)	260
New York-Florida			38,819	105,380	(66,560)	271
New York-Savannah	•		6,815	14,258	(7,443)	209
Seattle-Salt Lake City	, _		1,117	2,491	(1,374)	223
Washington-Montreal	•		5,517	19,429	(13,912)	352
ong Haul Totals	\$ <u>178.715</u>		<u>\$178.715</u>	\$526 <u>,771</u>	(\$348.056)	295
Amtrak Total (excluding-Northeast Corridor)	\$208 381	\$5,959	\$214,340	\$630,011	(\$415,671)	294
Northeast Corridor Totals	\$ 96,862	\$ 69	\$ 96,931	\$202,838	(\$105,907)	209
Amtrak System Total	\$305,243	\$6,028	\$311,271	\$832,849	(\$521,578)	268

⁽¹⁾ Minor discrepancies in totals due to rounding.
(2) Seattle-Salt Lake City are experimental (Seasonal) routes. Only four months of data is shown-June-September 1977.

Sources: Amtrak Records-October 1, 1976-September 30, 1977.

⁽¹⁾ Route Profitability System-Profit/Loss Summary.

⁽²⁾ Revenue Accounting Department-Train Earning Summary.
(3) Corporate Accounting Department-Records of actual 403b (State Subsidy) billings.

Revenue and Cost Per Revenue Passenger Mile For Fiscal Year 1977 (In Thousands)

Amtrak Route	Revenue	Expenses	Revenue Passenger Miles	Revenue Per Revenue Passenger Mile (Cents) (Col. 2 ÷ 4)	Cost Per Revenue Passenger Mile (Cents) (Col. 3 ÷ 4)	Profit (Loss) Per Revenue Passenger Mile (Cents) (Col. 5 - 6)
1	2	3	4	5	6	7
Northeast Corridor						
New York City-Washington						
(Metroliner)	\$ 37,986	\$ 55,957	289,338	13.1	19.3	(6.2)
New York City-Washington	•					, ,
(Conventional)	46,098	106,902	381,200	12.1	28.0	(15.9)
New Haven-Springfield	596	3,830	8,604	6.9	44.5	(37.6)
New York City-Harrisburg	783	2,785	12,056	6.5	23.1	(16.6)
New York City-Philadelphia	8,821	25,675	155,523	5.7	16.5	(10.8)
Philadelphia-Harrisburg	2,647	7,684	40,564	6.5	18.9	(12.4)
•	\$ 06 021	<u>\$202,838</u>	887,285	10.9		(12.0)
Northeast Corridor Totals	<u>\$ 96,931</u>	<u>\$202,636</u>	667,265	10.9		(1.2.0)
Short Haul Chicago-Carbondale	\$ 2,039	\$ 4,685	22,661	9.0	20.7	(11.7)
		•	•	7.9	23.8	` ′
Chicago-Detroit	4,449	13,497	56,623	7.9 16.5	26.7	(15.9)
Chicago-Dubuque	819	1,326	4,965	7.1	26.7 44.1	(10.2)
Chicago-Milwaukee	1,436	8,914 5,926	20,212	7.1 11.9	39.7	(37.0)
Chicago-Port Huron	1,770 1,710	2,644	14,924 14,075	12.2	18.8	(27.8)
Chicago-Quincy			-	8.7	19.9	(6.6)
Chicago-St. Louis	2,764	6,307	31,654 53,033	8.7 8.8	20.6	(11.2)
Los Angeles-San Diego	4,664	10,929	•			(11.8)
Minneapolis-Duluth	995	1,783	9,601	10.4 8.1	18.6 24.0	(8.2)
New York City-Buffalo-Detroit	8,970	26,451	110,241	11.2	24.0 26.8	(15.9)
New York City-Montreal	2,678	6,440	23,991			(15.6)
Oakland-Bakersfield	694	3,216	11,744	5.9	27.4	(21.5)
Seattle-Portland	1,024	4,619	20,909	4.9	22.1	(17.2)
Seattle-Vancouver	616	2,031	9,312	6.6	21.8	(15.2)
Washington-Cincinnati	636 361	1,752	9,380	6.8	18.7	(11.9)
Washington-Martinsburg		2,720	7,558	4.8	36.0	(31.2)
Short Haul Totals	<u>\$ 35.625</u>	\$103,240	420,883	8.5	24.5	(16.0)
Long Haul						
Boston-Newport News	\$ 6,056	\$ 11,008	204,170	3.0	5.4	(2.4)
Chicago-Florida	6,023	22,883	81,685	7.4	28.0	(20.6)
Chicago-Houston	6,972	23,798	95,814	7.3	24.8	(17.5)
Chicago-Laredo	2,819	13,782	39,579	7.1	34.8	(27.7)
Chicago-Los Angeles	19,363	46,395	212,565	9.1	21.8	(12.7)
Chicago-New Orleans	5,350	12,167	83,723	6.4	14.5	(8.1)
Chicago-New York City-Boston	7,814	23,334	103,144	7.6	22.6	(15.0)
Chicago-New York City-Washington	10,170	29,812	112,691	9.0	26.5	(17.0)
Chicago-San Francisco	14,326	44,240	152,887	9.4	28.9	(19.5)
Chicago-Seattle (North)	12,102	42,247	141,372	8.6	29.9	(21.3)
Chicago-Seattle (South)	6,141	25,611	74,819	8.2	34.2	(26.0)
Chicago-Washington	3,170	14,976	51,723	6.1	29.0	(22.9)
Kansas City-New York City-	.,	,	,			, ,
Washington	6,737	23,103	74,549	9.0	31.0	(22.0)

Revenue and Cost Per Revenue Passenger Mile Continued

Amtrak Route	Revenue	Expenses	Revenue Passenger Miles	Revenue Per Revenue Passenger Mile (Cents) (Col. 2 ÷ 4)	Cost Per Revenue Passenger Mile (Cents) (Col. 3 ÷ 4)	Profit (Loss) Per Revenue Passenger Mile (Cents) (Col. 5 - 6)
1	2	3	4	5	6	7
Los Angeles-New Orleans	5,896	16,680	72,882	8.1	22.9	(14.8)
Los Angeles-Seattle	13,508	35,177	188,544	7.2	18.7	(11.5)
New York-Florida	38,819	105,380	561,246	6.9	18.8	(11.9)
New York-Savannah	6,815	14,258	90,453	7.5	15.8	(8.3)
Seattle-Salt Lake City	1,117	2,491	16,566	6.7	15.0	(8.3)
Washington-Montreal	5,517	19,429	65,534	8.4	29.7	(21.3)
Long Haul Totals	\$178.715	\$526,771	2.423.946	7.4	21.7	(14.3)
Amtrak Total (excluding-Northeast						
Corridor)	\$214,340	\$630,011	2,844,829	7.5	22.2	(14.7)
Northeast Corridor Totals	\$ 96,931	\$202,838	887,285	10.9	22.9	(12.0)
Amtrak System Total	\$311,271	\$832,849	3,732,114	8.3	22.3	(14.0)

Notes:

(1) Minor discrepancies in totals due to rounding.

(2) Seattle-Salt Lake City are experimental (Seasonal) routes. Only four months of data is shown-June-September 1977.

(3) Revenue passenger mile means the carriage of a revenue passenger one mile. It does not include miles generated by the carriage of non-revenue passengers such as railroad employees traveling on passes.

Sources: Amtrak Records-October 1, 1976-September 30, 1977.

(I) Route Profitability System-Profit/Loss Summary.

(In Thousands)

(2) Revenue Accounting Department-Train Earnings Summary.

Revenue and Cost Per Train Mile For Fiscal Year 1977

Cost Per Profit (Loss) Revenue Per Train Train Mile Train Mile Per Train Mile Amtrak Route Revenue Expenses Miles (Col. $2 \div 4$) (Col. $3 \div 4$) (Col. 5 - 6)(Dollars) (Dollars) (Dollars) 2 3 4 5 6 Northeast Corridor New York City-Washington (Metroliner) \$ 37,986 \$ 55,957 2,027 \$18.74 \$27.61 (\$8.87)New York City-Washington (Conventional) 46,098 106,902 3,079 14.97 34.72 (19.75)596 New Haven-Springfield 3,830 266 2.24 14.40 (12.16)New York City-Harrisburg 783 2,785 105 7.46 26.52 (19.06)New York City-Philadelphia 25,675 8,821 614 14.37 41.82 (27.45)Philadelphia-Harrisburg 712 2,647 7,684 3.72 10.79 (7.07)Northeast Corridor Totals \$96,931 \$202,838 6,803 \$14.<u>25</u> \$29.82 (\$15.57<u>)</u> Short Haul Chicago-Carbondale \$ 2,039 \$ 4,685 314 \$ 6.49 \$14.92 (\$8.43)Chicago-Detroit 4,449 13,497 642 6.93 21.02 (14.09)

Revenue and Cost Per Train Mile Continued

Amtrak Route	Revenue	Expenses	Train Miles	Revenue Per Train Mile (Col. 2 ÷ 4) (Dollars)	Cost Per Train Mile (Col. 3 ÷ 4) (Dollars)	Profit (Loss) Per Train Mile (Col. 5 - 6) (Dollars)
1	2	3	4	5	6	7
Chicago -Dubuque	819	1,326	129	6.35	10.30	(5.05)
Chicago-Milwaukee	1,436	8,914	256	5.61	34.82	(29.21)
Chicago-Port Huron	1,770	5,926	231	7.66	25.65	(17.99)
Chicago-Quincy	1,710	2,644	191	8.95	13.84	(. 4.89)
Chicago-St. Louis	2,764	6,307	392	7.05	16.09	(9.04)
Los Angeles-San Diego	4,664	10,929	398	11.72	27.46	(15.74)
Minneapolis-Duluth .	995	1,783	108	9.21	16.51	
New York City-Buffalo-Detroit	8,970	26,451	1,291	6.95	20.49	
New York City-Montreal	2,678	6,440	278	9.63	23.17	
Oakland-Bakersfield	694	3,216	319	2.18	10.08	, ,
Seattle-Portland	1,024	4,619	272	3.76	16.98	• •
Seattle-Vancouver	616	2,031	113	5.45	17.97	, ,
Washington-Cincinnati	636	1,752	323	1.97	5.42	
Washington-Martinsburg	361	2,720	161	2.24	16.89	
Short Hau! Totals	<u>\$35,625</u>	<u>\$103,240</u>	5,418	\$6.58	\$19.06	(\$12.48)
Long Haul						
Boston-Newport News	\$ 6,056	\$ 11,008	757	\$ 8.00	\$14.54	(\$ 6.54)
Chicago-Florida	6,023	22,883	2,112	2.85	10.83	
Chicago-Houston	6,972	23,798	1,798	3.88	13.24	
Chicago-Laredo	2,819	13,782	1,002	2.81	13.75	• •
Chicago-Los Angeles	19,363	46,395	2,523	7.67	18.39	
Chicago-New Orleans	5,350	12,167	673	7.95	18.08	
Chicago-New York City-Boston	7,814	23,334	1,455	5.37	16.04	, ,
Chicago-New York City-Boston Chicago-New York City-Washington	10,170	29,812	1,315	7.73	22,67	
		-	1,757	8.15	25.18	• •
Chicago-San Francisco	14,326	44,240	1,737	7.44	25.16 25.97	•
Chicago-Seattle (N)	12,102	42,247		5.14	21.43	
Chicago-Seattle (S)	6,141	25,611	1,195 1,134	2.80	13.21	
Chicago-Washington	3,170	14,976		3.17	10.88	• • •
Kansas City-New York City-Washington	6,737	23,103	2,123	9.20	26.02	
Los Angeles-New Orleans	5,896	16,680	641			• •
Los Angeles-Seattle	13,508	35,177	994	13.59	35.39	
New York-Florida	38,819	105,380	3,829	10.14	27.52	
New York-Savannah	6,815	14,258	730	9.34	19.53	
Seattle-Salt Lake City	1,117	2,491	251	4.45	9.92	• ,
Washington-Montreal	5,517	19,429	489	11.28	39.73 	(28.45)
Long Haul Totals	<u>\$178.715</u>	\$526,771	26.405	\$ 6.77	<u>\$19.95</u>	(\$13.18)
Amtrak Total Excluding Northeast Corridor	\$214,340	\$630,011	31,823	-\$ 6.74	\$19.80	• • • • • • • • • • • • • • • • • • • •
Northeast Corridor Totals	\$ 96,931	\$202,838	6,803	\$14.25	\$29.82 ————	(\$15.57)
Amtrak System Total	\$311,271	\$832,849	38,626	\$ 8.06	\$21.56	(\$13.50)

Notes:

⁽¹⁾ Minor discrepancies in totals due to rounding.

⁽²⁾ Seattle-Salt Lake City are experimental (Seasonal) routes. Only four months of data is shown-June-September 1977.

⁽³⁾ Train miles means the movement of a train one mile.

Sources:

⁽¹⁾ Route Profitability System-Profit/Loss Summary.

⁽²⁾ Revenue Accounting Department-Train Earnings Summary.

Revenue Passenger Miles Per Train Mile

For Fiscal Year 1977 (In Thousands)

	D D		Revenue Passenge	
Amtrak Route	Revenue Passenger Miles	Tasks Miles	Miles Per	
Amtrak Koute	Miles	Train Miles	Train Mile	
1		3	Col. 2 ÷ 3	
<u> </u>				
Northeast Corridor	•			
New York City-Washington (Metroliner)	289,338	2,027	142.7	
New York City-Washington (Conventional)	318,200	3,079	123.8	
New Haven-Springfield	8,604	266	32.3	
New York City-Harrisburg	12,056	105	114.8	
New York City-Philadelphia	155,523	614	253.3	
Philadelphia-Harrisburg	40,564	712	57.0	
Northeast Corridor Totals	887,285	6.803	130,4	
hort Haul				
Chicago-Carbondale	22,661	314	72.2	
Chicago-Detroit	56,623	642	88.2	
Chicago-Dubuque	4,965	129	38.5	
Chicago-Milwaukee	20,212	256	79.0	
Chicago-Port Huron	14,924	231	64.6	
Chicago-Quincy	14,075	191	73.7	
Chicago-St. Louis	31,654	392	80.8	
os Angeles-San Diego	53,033	398	133.2	
Ainneapolis-Duluth	9,601	108	88.9	
New York City-Buffalo-Detroit	110,241	1,291	85.4	
New York City-Montreal	23,991	278	86.3	
Oakland-Bakersfield	11,744	319	36.8	
eattle-Portland	20,909	272	76.9	
eattle-Vancouver	9,312	113	82.4	
Vashington-Cincinnati	9,380	323	29.0	
Vashington-Martinsburg	7,558	161	46.9	
hort Haul Totals	420,883	5,418	<u></u>	

Revenue Passenger Miles Per Train Mile Continued

Amtrak Route	Revenue Passenger Miles	Train Miles	Revenue Passenger Miles Per Train Mile Col. 2 ÷ 3
1	2	3	4
Long Haul			
Boston-Newport News	204,170	757	269.7
Chicago-Florida	81,685	2,112	38.7
Chicago-Houston	95,814	1,798	53.3
Chicago-Laredo	39,579	1,002	39.5
Chicago-Los Angeles	212,565	2,523	84.3
Chicago-New Orleans	83,723	673	124.4
Chicago-New York City-Boston	103,144	1,455	70.9
Chicago-New York City-Washington	112,691	1,315	85.7
Chicago-San Francisco	152,887	1,757	87.0
Chicago-Seattle (N)	141,372	1,627	86.9
Chicago-Seattle (S)	74,819	1,195	62.6
Chicago-Washington	51,723	1,134	45.6
Kansas City-New York City-Washington	74,549	2,123	35.1
Los Angeles-New Orleans	72,882	641	113.7
Los Angeles-Seattle	188,544	994	189.7
New York-Florida	561,246	3,829	146.6
New York-Savannah	90,453	730	123.9
Seattle-Salt Lake City	16,566	251	66.0
Washington-Montreal	65,534	489	134.0
Long Haul Totals	2,423,946	26.405	91.8
Amtrak Total (excluding Northeast Corridor)	2,844,829	31,823	89.4
Northeast Corridor Totals	887,285	6,803	130.4
Amtrak System Total	3,732,114	38,626	96.6

Notes:

⁽¹⁾ Minor discrepancies in totals due to rounding.

⁽²⁾ Seattle-Salt Lake City are experimental (Seasonal) routes. Only four months of data is shown-June-September 1977.

⁽³⁾ Revenue Passenger miles per tain mile is the average number of revenue passengers on the train at any one time. Sources:

⁽¹⁾ Route Profitability System-Profit/Loss Summary.

⁽²⁾ Revenue Accounting Department-Train Earnings Summary.

Revenue Passengers Carried For Fiscal Year 1977 (Whole Numbers)

Amtrak Route	First Class	Coach	Multiple Ride	Total Revenu Passengers
Northeast Corridor				
New York City-Washington (Metroliner)	196,363	1,773,050	1,079	1,970,492
New York City-Washington (Conventional)	98,801	3,200,561	412,005	3,711,367
New Haven-Springfield	0	195,222	55,147	250,369
New York City-Harrisburg	0	91,243	118,639	209,882
lew York City-Philadelphia	50	1,298,597	1,740,716	3,039,363
hiladelphia-Harrisburg	0	439,972	318,158	758,130
Northeast Corridor Totals	295.214	6.998.645	2.645.744	9.939.603
hort Haul	•			
Chicago-Carbondale	0	136,316	0	136,316
Chicago-Detroit	13,386	316,163	70,280	399,829
Chicago-Dubuque	0	37,340	0	37,340
Chicago-Milwaukee	1,430	251,682	0	253,112
Chicago-Port Huron	3,085	84,175	0	87,260
Chicago-Quincy	0	81,819	0	81,819
Chicago-St. Louis	6,544	166,753	0	173,297
os Angeles-San Diego	0	596,076	0	596,076
finneapolis-Duluth	0	69,827	0	69,827
lew York City-Buffalo-Detroit	5,871	567,725	0	573,596
lew York City-Montreal	2,842	113,790	0	116,632
Oakland-Bakersfield	0	83,005	, 0	83,005
eattle-Portland	0	132,717	0	132,717
eattle-Vancouver	0	81,213	0	81,213
Vashington-Cincinnati	. 0	46,777	71	46,848
Vashington-Martinsburg	0	36,565	169,444	206,009
hort Haul Totals	33,158	2.801.943	239.795	3.074.896
ong Haul				
Boston-Newport News	14,631	491,994	33,114	539,739
Chicago-Florida	9,861	117,127	0	126,988
Chicago-Houston	14,347	213,882	Ö	228,229
Chicago-Laredo	4,013	128,873	0	132,886
Chicago-Los Angeles	36,706	184,364	0	221,070
Chicago-New Orleans	2,316	171,109	0	173,425
Chicago-New York City-Boston	30,737	226,619	0	257,356
	48,034	153,817	18	201,869
hicago-New York City-Washington		,		
•		177.006	0	204.683
Chicago-San Francisco	27,677	177,006 223,450	0 0	204,683 244,077
Chicago-New York City-Washington Chicago-San Francisco Chicago-Seattle (North) Chicago-Seattle (South)	27,677 20,627	223,450	0	244,077
Chicago-San Francisco Chicago-Seattle (North) Chicago-Seattle (South)	27,677 20,627 9,762	223,450 153,696	0	244,077 163,458
Chicago-San Francisco Chicago-Seattle (North) Chicago-Seattle (South) Chicago-Washington	27,677 20,627 9,762 2,778	223,450 153,696 155,692	0 0 0	244,077 163,458 158,470
Chicago-San Francisco Chicago-Seattle (North) Chicago-Seattle (South) Chicago-Washington Lansas City-New York City-Washington	27,677 20,627 9,762 2,778 12,381	223,450 153,696 155,692 157,325	0 0 0 18	244,077 163,458 158,470 169,724
Chicago-San Francisco Chicago-Seattle (North) Chicago-Seattle (South) Chicago-Washington	27,677 20,627 9,762 2,778	223,450 153,696 155,692	0 0 0	244,077 163,458 158,470

Revenue Passengers Carried Continued

Amtrak Route	First Class	Coach	Multiple Ride	Total Revenue Passengers
New York-Sayannah	7,410	355,907	43,183	406,500
Seattle-Salt Lake City	0	36,345	0	36,345
Washington-Montreal	17,117	278,328	40,123	335,568
Long Haul Totals	388,251	4,299,758	116.457	4.804.466
Amtrak Total (excluding-Northeast Corridor)	421,409	7,101,701	356,252	7,879,362
Northeast Corridor Totals	295,214	6,998,645	2,645,744	9,939,603
Amtrak System Total	716,623	14,100,346	3,001,996	17,818,965

Note: Seattle-Salt Lake City are experimental (Seasonal) routes. Only four months of data is shown-June-September 1977. Source: Amtrak Records-October 1, 1976-September 30, 1977. Revenue Accounting Department-Train Earnings Summary.



Free and Reduced Rate Pass Riders Carried

For Fiscal Year 1977 (Whole Numbers)

	No	on 92-316	Pass R	iders		92-316 Pa	ss Rider	s		To	tal		
Amtrak Route	1	Free	Hali	f Rate	F	ree	Hal	f Rate	- <u>-</u>	ree	Hal	f Rate	
	1st class	Coach	1st class	Coach	1st class	Coach	1st class	Coach	lst class	Coach	1st class	Coach	
Northeast Corridor													
New York City-Washington													
(Metroliner)	1,053	25,794	0	67	15	590	8	156	1,068	26,384	8	223	
New York City-Washington		*											
(Conventional)	2,492	49,743	32	328	431	42,320	220	11,760	2,923	92,063	252	12,088	
New Haven-Springfield	0	2,053	0	145	0	3,383	0	224	0	5,436	0	369	
New York City-Harrisburg	0	1,709	0	8	0	2,237	0	127	0	3,946	0	135	
New York City-Philadelphia	6	19,464	0	66	0	22,776	0	2,123	6	42,240	0	2,189	
Philadelphia-Harrisburg	0	19,865	0	254	. 0	41,281	0	3,328	0	61,146	0	3,582	
Northeast Corridor Totals	3 <u>,551</u>	118,628	32	868	446	112,587	228	17,718	3,997	231,215	260	_18,586	
Short Haul													
Chicago-Carbondale	0	939	0	247	0	3,921	0	1,756	0	4,860	0	2,003	
Chicago-Detroit	359	3,471	6	353	47	9,186	114	5,416	406	12,657	120	5,769	
Chicago-Dubuque	0	367	0	63	0	1,160	0	424	0	1,527	0	487	
Chicago-Milwaukee	79	2,668	0	116	1	9,344	5	2,743	80	12,012	5	2,859	
Chicago-Port Huron	34	931	0	123	0	1,216	25	1,791	34	2,147	25	1,914	
Chicago-Quincy	0	315	0	180	0	2,887	0	817	0	3,202	0	997	
Chicago-St. Louis	188	215	5	193	22	1,697	119	3,385	210	3,848	124	3,578	
Los Angeles-San Diego	0	4,994	0	312	0	5,854	0	4,871	0	10,848	0	5,183	
Minneapolis-Duluth	0	667	0	274	0	5,840	0	1,659	0	6,507	0	1,933	
New York City-Buffalo-Detroit	170	4,690	0	466	6	16,885	12	3,282	176	21,575	12	3,748	
New York City-Montreal	103	2,151	0	78	10	1,354	18	812	113	2,605	18	890	
Oakland-Bakersfield	0	1,157	0	247	0	1,666	0	2,413	0	2,823	0	2,660	
Seattle-Portland	0	984	0	208	0	6,273	0	2,196	0	7,257	0	2,404	
Seatle-Vancouver	0	488	0	90	0	1,811	0	833	0	2,299	0	923	
Washington-Cincinnati	0	606	0	105	0	2,820	406	436	0	3,426	0	541	
Washington-Martinsburg	0	1,588	0	34	0	4,719	0	1,990	0	6,307	0	2,024	
Short Haul Totals	933	27,267		3,089	86	76,633	699	34,824	_1,019	_103,900	304	37,913	

Free and Reduced Rate Pass Riders Carried Continued

Amtrak Route	Non 92-316 Pass Riders			92-316 Pass Riders			Total					
	Free		Half Rate		Free		Half Rate		Free		Half Rate	
	1st class	Coach	1st class	Coach	1st class	Coach	1st class	Coach	1st class	Coach	1st class	Coach
Long Haul		,										_
Boston-Newport News	311	8,300	1	79	43	6,444	42	2,876	354	4,744	43	2,955
Chicago-Florida	1,084	4,987	41	295	199	4,640	428	3,338	1,283	9,637	469	3,633
Chicago-Houston	665	2,679	93	1,711	1,283	16,625	636	6,302	1,948	19,304	729	8,013
Chicago-Laredo	371	2,271	21	325	52	2,348	246	4,179	423	4,619	267	4,504
Chicago-Los Angeles	1,634	3,875	151	1,669	3,546	22,128	1,498	7,047	5,180	26,003	1,649	8,716
Chicago-New Orleans	170	3,243	27	363	198	6,993	92	3,644	368	10,236	119	4,007
Chicago-New York City-Boston	858	2,854	38	304	849	8,398	461	3,651	1,707	11,252	499	3,955
Chicago-New York City-								•				
Washington	3,270	3,572	68	230	1,227	7,383	984	3,556	4,497	10,955	1,052	3,786
Chicago-San Francisco	1,241	2,882	126	1,051	1,153	16,832	1,483	8,301	2,394	19,714	1,609	9,352
Chicago-Seattle (North)	992	2,355	96	716	3,503	21,003	1,059	6,350	4,495	23,358	1,155	7,066
Chicago-Seattle (South)	556	1,833	70	643	2,021	15,726	505	4,525	2,577	17,559	575	5,168
Chicago-Washington	218	2,843	9	675	105	12,150	104	4,242	323	14,993	113	4,917
Kansas City-New York City-												
Washington	901	2,602	28	313	620	8,711	318	3,165	1,521	11,313	346	3,478
Los Angeles-New Orleans	565	1,304	31	236	2,019	8,519	449	1,989	2,584	9,823	480	2,225
Los Angeles-Seattle	1,666	3,938	57	462	1,603	15,032	1,123	9,325	3,269	18,970	1,180	9,787
New York-Florida	1,986	17,234	158	559	1,811	12,990	2,354	10,193	3,797	30,224	2,512	10,752
New York-Savannah	340	6,200	1	79	31	4,882	37	2,660	371	11,082	38	2,739
Seattle-Salt Lake City	0	314	0	136	0	2,509	0	1,035	0	2,823	0	1,170
Washington-Montreal	973	4,718	17	61	62	3,654	149	1,376	1,035	8,372	166	1,437
Long Haul Totals	17 <u>.801</u>	78,004	1,033	9,906	20,325	196,977	11,968	87,754	38,126	274,981	13,001	97,660
Amtrak Total (excluding-		*										
Northeast Corridor)	18,734	105,271	1,044	12,995	20,411	273,610	12,667	122,578	39,145	378,881	13,305	135,573
Northeast Corridor Totals		118,628	32	868	446	112,587	228	17,718	3,997	231,215	260	18,586
Amtrak System Total	22,285	223,899	1,076	13,863	20,857	386,197	12,895	140,296	43,142	610,096	13,565	154,159

Notes:

⁽¹⁾ Seattle-Salt Lake City are experimental (Seasonal) routes. Only four months of data is shown-June-September 1977.

^{(2) 92-316} Pass Riders are employees (certain dependents and retirees) of Amtrak member railroads and terminal companies who are entitled to free and/or reduced rate transportation under section 405b of public law 92-316.

⁽³⁾ Non 92-316 Pass Riders are those (Amtrak employees and others) not entitled to free and/or reduced rate transportation under public law 92-316. Source: Amtrak Records-October 1, 1976-September 30, 1977. Revenue Accounting Department-Route Earnings Summary.

Percentage of Revenue Passengers and Pass Riders Carried to Train Total

For Fiscal Year 1977 (Whole Numbers)

Amtrak Route	Total Passengers Carried	Revenue Pas- sengers Car- ried Full Fare	Pass Riders Carried Free and Reduced	% of Revenue Passengers Carried	% of Pass Riders Carried
1	2	rare 3	Rates 4	(Col. 3 ÷ 2) 5	(Col. 4 ÷ 2) 6
Northeast Corridor	<u>-</u>				
New York City-Washington (Metroliner)	1,998,175	1,970,492	27,683	98.6%	1.4%
New York City-Washington (Conventional)	3,818,693	3,711,367	107,326	97.2	2.8
New Haven-Springfield	256,174	250,369	5,805	97.7	2.3
New York City-Harrisburg	213,963	209,882	4,081	98.1	1.9
New York City-Philadelphia	3,083,798	3,039,363	44,435	98.6	1.4
Philadelphia-Harrisburg	822,858	758,130	64,728	92.1	7.9
Northeast Corridor Totals	10,193,661	9,939,603	254,058	97.5%	2.5%
Short Haul					
Chicago-Carbondale	143,179	136,316	6,863	95.2%	4.8%
Chicago-Detroit	418,781	399,829	18,952	95.5	4.5
Chicago-Dubuque	39,354	37,340	2,014	94.9	5.1
Chicago-Milwaukee	268,068	253,112	14,956	94.4	5.6
Chicago-Port Huron	91,380	87,260	4,120	95.5	4,5
Chicago-Quincy	86,018	81,819	4,199	95.1	4.9
Chicago-St. Louis	181,057	173,297	7,760	95.7	4.3
Los Angeles-San Diego	612,107	596,076	16,031	97.4	2.6
Minneapolis-Duluth	78,267	69,827	8,440	89.2	10.8
New York City-Buffalo-Detroit	599,107	573,596	25,511	95.7	4.3
New York City-Montreal	120,258	116,632	3,626	97.0	3.0
Oakland-Bakersfield	88,488	83,005	5,483	93.8	6.2
Seattle-Portland	142,378	132,717	9,661	93.2	6.8
Seattle-Vancouver	84,435	81,213	3,222	96.2	3.8
Washington-Cincinnati	50,815	46,848	3,967	92.2	7.8
Washington-Martinsburg	214,340	206,009	8,331	96.1	3.9
Short Haul Totals	3,218,032	3,074,896	143,136	95.6%	4.4%

Percentage of Revenue Passengers and Pass Riders Carried to Train Total Continued

Amtrak Route	Total Passengers Carried	Revenue Pas- sengers Car- ried Full Fare	Pass Riders Carried Free and Reduced Rates	% of Revenue Passengers Carried (Col. 3 ÷ 2)	% of Pass Riders Carried (Col. 4 ÷ 2)	
1	2	3	4	5	6	
Long Haul	·					
Boston-Newport News	557,835	539,739	18,096	96.8%	3.2%	
Chicago-Florida	142,010	126,988	15,022	89.4	10.6	
Chicago-Houston	258,223	228,229	29,994	88.4	11.6	
Chicago-Laredo	142,699	132,886	9,813	93.1	6.9	
Chicago-Los Angeles	262,618	221,070	41,548	84.2	15.8	
Chicago-New Orleans	188,155	173,425	14,730	92.2	7.8	
Chicago-New York City-Boston	274,769	257,356	17,413	93.7	6.3	
Chicago-New York City-Washington	222,159	201,869	20,290	90.9	9.1	
Chicago-San Francisco	237,752	204,683	33,069	86.1	13.9	
Chicago-Seattle (N)	280,151	244,077	36,074	87.1	12.9	
Chicago-Seattle (S)	189,337	163,458	25,879	86.3	13.7	
Chicago-Washington	178,816	158,470	20,346	88.6	11.4	
Kansas City-New York City-Washington	186,382	169,724	16,658	91.1	8.9	
Los Angeles-New Orleans	92,696	77,584	15,112	83.7	16.3	
Los Angeles-Seattle	445,404	412,198	33,206	92.5	7.5	
New York-Florida	761,582	714,297	47,285	93.8	6.2	
New York-Savannah	420,730	406,500	14,230	96.6	3.4	
Seattle-Salt Lake City	40,338	36,345	3,993	90.1	9.9	
Washington-Montreal	346,578	335,568	11,010	96.8	3.2	
Long Haul Totals	5,228,234	4,804,466	423,768	91.9%	8.1%	
Amtrak Total (excluding-						
Northeast Corridor	8,446,266	7,879,362	566,904	93.3%	6.7%	
Northeast Corridor Totals	10,193,661	9,939,603	254,058	97.5%	2.5%	
Amtrak System Total	18,639,927	17,818,965	820,962	95.6%	4.4%	

Note: Seattle-Salt Lake City are experimental (Seasonal) routes. Only four months of data is shown-June-September 1977. Source: Amtrak Records - October 1, 1976-September 30, 1977. Revenue Accounting Department-Route Earnings Summary.

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